Physical space and its role in the production and reproduction of violence in the "slum wars" in Medellin, Colombia (1970s-2013)

By
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Bachelor in Architecture
Universidad Nacional de Colombia seccional Medellín, 1999
Master in City Planning, 2010

Submitted to the Department of Urban Studies and Planning
in partial fulfillment of the requirements for the degree of
Doctor of Philosophy in Urban and Regional Planning

at the
MASSACHUSETTS INSTITUTE OF TECHNOLOGY
September 2014

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PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN "SLUM WARS" IN MEDELLIN, COLOMBIA (1970s-2013)

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ABSTRACT
Rhetorically, people often make a tacit linkage between the spaces of urban informality ("slums"), crime and violence. This occurs in academic circles—as exemplified by the common occurrence that when researchers seek to understand urban crime and violence, they tend to study urban informal spaces (slums, favelas, barriadas, tugurios). However, it is clear that a direct correlation between conflict and informality does not automatically exist. What does exist is evidence that spaces of informality present challenges for formal (state) security actors to assert and maintain their Westphalian monopoly of violence. Conversely, informal settlements present advantages for non-state armed actors to deploy and exhort power and coercive force. This research here argues that, at the core of this contradiction between state disadvantage and non-state armed actor advantage over the control of security and governance, (physical) space clearly emerges as an important variable to study.

This study then asks: What roles does physical space play in the conflict—that is, in the production and reproduction of violence—in informal settlements in Medellin? Understanding this would shed light on important phenomena about state and non-state control of informal settlements all over the world. This research looks for ways in which space has played a role in the ongoing urban conflict in the City of Medellin over the last forty years. I look for intersections between two parallel longitudinal studies I have conducted. (1) One study analyzes the physical evolution of Medellín’s informal settlements to map critical inflexion points in the production of urban forms. I also map how these urban forms evolved over time. (2) The second study is an ethnographic study of people’s perspectives on their experiences with the evolution of such spaces. I then map their stories of building, rebuilding and urban conflict and merge this with the map of urban forms in the first dimension of my study.

The research reveals that time and space in informal settlements do indeed change in prescriptive ways (stages). These stages of development are each marked by singular forms of conflict and violence. Here I argue that physical space plays a fundamental role in the way armed conflict happens in informal settlements. Physical space, which involves all actors in the conflict, impacts armed conflict in two distinct ways. Physical space (1) becomes a form of spatial conditioning that tailors actors and conflict and (2) creates and reinforces conditions unique to informal warfare strategies.

This research suggests that we need radical changes in the way urban policy and projects are framed in the context of urban informality. It suggests that we need to consider this framing of informality in nations such as Colombia, in which there is a weak state fighting these types of new wars with asymmetrical adversaries on urban terrain and in which informality and criminal armed groups act. Pro-informal settlement policies and procedures could provide more stable and secure environments in informal settlements than the current tactic of massive expenditures on security in an ongoing asymmetrical warfare.
DEDICATION

To my (emotional and intellectual) partner Tamera Marko, who directed my life and got me all my dreams.
Jota (José) Samper has been working as an architect, planner and artist for 13 years and has taught architecture and urban design. Born and raised in Medellín, he studied architecture at the Universidad Nacional de Colombia in Medellín. Since then, he has done research, art and architectural projects in eight countries: Colombia, Panama, Ecuador, the United States, Mexico, Brazil, India and France. His work has won more than six national (U.S.) and international awards. In 2010, his project “Living rooms at the Border,” which he designed with the team while at estudio teddy cruz (the art/architect collective he also co-founded), exhibited at the (Museum of Modern Art) MoMA in New York City. He has a Ph.D. from the Department of Urban Studies and Planning at MIT, where he also completed his master’s degree. His work dwells on the intersection between urban informality (“slums”) and urban violent conflict. His research seeks to understand if policies and practices that have both political and physical implications in the urban context are directly related to the reduction of violence. He is a fellow in the “Drugs, Security and Democracy Program Social Science Research Council.” He has served as an advisor for the “Strategic Masterplan for the Innovation District of Medellín.” Along with his work as a teacher of planning and design, he is co-founder and co-director of DukeEngage Medellin, Colombia since 2007. A is a civic engagement as social justice research program which brings Duke University students to Medellin every summer to live and work for eight weeks. They work alongside architects, urban planners and historians to create an ongoing alternative video, photographic and map archive with marginalized communities who tell stories, in their own words and images, about how they built their neighborhoods in the City of Medellin. These stories are now circulating in film festivals, exhibitions, and schools throughout the Americas.
ACKNOWLEDGEMENTS

Sincere thanks to the many interviewees who were part of this study, especially to community members who walked me through all their neighborhoods and shared their life experiences with me. I thank the planners, architects, and politicians who opened their offices to me during this research, especially Carlos Escobar, Carlos Marin, Alejandro Echeverri, and Eliana Restrepo. I thank all the collaborators on this project who lived during extensive periods of violence and who were witnesses of the “process of transformation of Medellín.” I am especially grateful to those who went beyond the line of duty and risked their lives to provide me with invaluable information.

I give a special thanks to Dennis Frenchman, my thesis advisor, who dedicated his precious time on this project. I also thank Diane Davis, who wrote the recommendation letters to get the funding for this project and that provided an essential framework through her work resilience studies group at MIT. I thank Annette Kim whose work on informality and space opened the possibility of mixing analysis of space and conflict in this work, and Larry Vale that dedicated so much of his time during the entire process of the project.

I especially thank my research assistant Diana Toro, whose work helped to create some of the excellent diagrams in this dissertation. I thank the DukeEngage and MedellinMobility17 Team who went house by house, creating the Medellin mi hogar archive that informs much of the ethnographic portions of this research.

This project would not have been possible without the generous contribution from the “Drugs, Security and Democracy Program Social Science Research Council,” which provided the funding for my field research in 2013 and 2014.

I thank Tamera Marko, who has been a core part of this project since it began and without whom this would not have been possible.

Lastly, thanks to my parents who through their amazing efforts living through much of what I write about here, allowed me to follow my dreams.
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INTRODUCTION

Rhetorically, people often make a tacit linkage between the spaces of urban informality ("slums"), crime and violence. This occurs in academic circles—as exemplified by the common fact that when researchers seek to understand urban crime and violence, they tend to study urban informal spaces (slums, favelas, barriadas, tugurios, comunas)(Estrada C. and Gómez V. 1992; C. O. N. Moser and Mcllwaine 2004a; V. L. Franco 2004; Aricapa 2005; ARIAS 2006; Enrique Desmond Arias and Rodrigues 2006; Koonings and Veenstra 2007; Angarita, Gallo, and Jiménez 2008; Wilding P. 2010; Blake 2013; Sánchez G et al. 2011).

This occurs also in the media in terms of how conflict and crime are framed (Amar 2003). In many cases, the word favela (in Rio de Janeiro) or comuna (in Medellin) denotes places of both poverty and conflict. Since the 1960s and especially since the 1990s, academics and certain politicians tend to strongly emphasize the importance of not criminalizing the inhabitants of informal settlements, that is, to not reduce people to nothing more than poverty, violence and criminality (Perlman 1976a; Turner 1977; Amar 2003; Civico 2012). Yet, there is vast evidence, when listening carefully to people’s rhetoric in their everyday speech and scholarly and media publications, that people do indeed make a strong connection between urban informality and crime. Today, beyond a historical context of criminalization of the poor since the burgeoning of urban slums in 18th- and 19th-century cities, there is no clear understanding of why these 21st-century (informal) spaces are prone to this connection—both in the popular imaginary and some cases, in actual practice—as spaces in which the intersection of poverty and violence prevail.

It is clear that an automatic direct correlation between conflict and informality does not automatically exist. Living in an informal settlement does not predetermine violent conflict. The types of criminal activity that happen in these physical spaces are in some cases no different from those that happen in the formal planned spaces of the city. What it is evident is that spaces of informality present challenges for formal security actors (State) to assert and maintain their Westphalian monopoly of violence, a key feature of the foundation of state highlighted by Max Weber¹, and thus the capacity to govern effectively.

On the other hand, informal settlements present advantages for non-state armed actors to deploy and extort power and coercive force. My research here argues that at the core of this contradiction between state disadvantage and non-state armed actor advantage regarding who controls security and governance, space clearly emerges as an important variable to study.

Understanding how informal settlements work is crucial for several reasons. Informality is the most common type of urban form on the planet (M. Davis 2006). Some authors define informality, for example, as the predominant characteristic of the urban form of African cities (Kihato et al. 2013). Urban informality comprises one-third of the world’s urban forms and this number will increase to one-half of all urban forms by 2050 (Ballesteros 2010). Urban informality is a type of urban development characteristic

¹ The key to the modern Westphalian nation-state is a monopoly on legitimate and organized force.
of "Megacities" (Koonings and Kruijt 2009), in which the urban development logic governed by the regulations of the state and the capitalist system have been subverted. There is often an assumption that informal communities emerge spontaneously and in a chaotic, illogical manner. My research shows, in accordance with other scholars, that actually there is a logic to the establishment and growth of informal settlements and in many cases their development is strategic and not spontaneous at all.

There are a few key reasons why I focus on the City of Medellín as a case study to explore this variable of space. Medellín was once known in 1992 as “the most violent city in the world.” In addition, if you count all the informal settlements in Medellín since the 1960s, when informal cities have been mapped, and consider them all together today, they would account for 37 percent of this city’s urban area in 2014 (Figure 1, Chapter V). Thus, this lack of state control and the power of non-state armed actors, combined with a staggering percentage of informal settlements and the proliferation of one of the world’s largest narcotraffic markets that involve violence on a massive scale, makes Medellín a key place to understand the implications of the connection between physical space, urban informality and violence in general, but especially in the many urban informal settlements in Latin America and the Caribbean, where narcotraffic proliferates.

Specifically, I focus on three categories of actors who influence and are influenced by the relationship between physical space and narcotraffic violence in Medellín. These categories are (1) non-state actors (narcotraffic, guerrilla, paramilitary and gang members), (2) state actors (city government officials and urban planners, police and army) and (3) community members living in informal settlements. I study four informal neighborhoods in Medellín that have the city’s most extreme narcotraffic-related violence. These areas also have the highest levels of recent state-sponsored urban interventions involving physical space that are intended to alleviate poverty and violence. The results of these state-sponsored interventions themselves are important to study in terms of their impact on people and space in the specific neighborhoods where they were implemented. They are also important to study because other governments and city planners in Latin America are now looking to these interventions in Medellín as a model to implement in their own cities’ informal settlements. Furthermore, these state-sponsored interventions in Medellín are being heralded by some as an answer to urban poverty, narcotraffic and violence, as especially evidenced by the tidal wave of media attention worldwide that Medellín received in the months following the announcement that it was named “The Most Innovative City in the World” in 2012. I study the way non-state, state, and community members intersect in these neighborhoods during eruptions of violence (gang fights, police raids, drug turf wars) and during state urban interventions intended to alleviate poverty and violence.

I define physical space in urban planning terms to denote two concepts. (1) I distinguish between (a) space as a mental construct or experience and (b) physical space as a tangible object, such as a house, street, plaza, garden or mountain. (2) My research involves intentionally disaggregating specific dimensions of physical space so I can study the way actors strategically negotiate a discrete object (a house, a road) and how this object impacts security in the region. I study how a discrete object interacts in relationship with other objects in the same physical space. In other words I explore the tensions between the space as a mental and experienced and the tangible object. To do this, I study a neighborhood in terms of what I call its “spatial environment” (topography, weather, and built objects
such as houses and bridges and open areas such as plazas, gardens and streets). Thinking about space in this way, I argue, is fundamental to understanding relationships between physical space and drug violence in Medellin.

I define “slum” not as social or urban pathology, but rather as the byproduct of a capitalist society. It represents the failure of the economic and political system to provide quality of life to all the world’s citizens. The phenomena of what some people call a slum, nor the reasons why individuals who live in them are not the result of personal failure. This has been mentioned often in the studies of the early 1940s and 1960s (Rua and Rua 1966; R. Cardona 1969; Torres 1993; Martínez Zapata 2014). On the contrary, I concur with scholars who argue that these spaces and people who construct them and live in them are bypassing the gaps of our ailed economic system and are therefore more of a result (and/or solution) than a pathological symptom. In those terms Alan Gilbertaffirms that “rather than providing a threat to the political and economic system, invasions and pirate urbanizations actively support it.” (Gilbert 1981, 657).

Furthermore, my research attempts to show that the adoption of such informal construction techniques are not only the product of an economic or stylistic process. I argue that it is, more importantly, a technical one. The Le Corbusier Domino scheme’s largest virtue within informal settlements is that it fits perfectly within a model of city and buildings that are always growing. The Domino is flexible enough to be adapted to any lot size and to any number of levels. This process fits with the philosophy of incrementalism within informal settlements. The incremental housing development is also the result of logic of economic savings within the household. Such methods of constructing urban neighborhoods has proven to be an effective form of constructing a city, including some of the most revered physical environments in the world, such as Italian hill towns or Greek settlements, all of which evolved over time using an incremental process. The similitude between these two types of settlements (historic towns and informal settlements) is then not a coincidence, but rather, is a product of some inherent urban logics.

A staple theme in the literature about drug violence focuses on ways that non-state armed groups NSAG use territorial control as a way to exert power (Sánchez, Díaz, and Formisano 2003; Enrique Desmond. Arias 2006; Koonings and Krujt 2009; D. Davis 2009; Rodgers and Muggah 2009) and to develop their drug markets (Reuter 2009; E. D. Arias 2010; Civico 2012). Scholars also focus on how gangs or guerrilla groups (or other NSAG) fight each other to protect their turf and how this fighting increases levels of violence in these territories (Benson, Rasmussen, and Sollars 1995; Roldan 1999; Penglase 2005; Rozema 2008). In these studies, physical space is an important variable, but scholars tend to limit their analytical perspective on “space” as a physical quality and only in terms of defining the geographical area of study. This is because these scholars’ main focus is their analysis on space as a social construct—such as gender, race, and poverty—and on issues that take place in a particular space. I argue that physical space is not a static variable, nor is it only the result of these issues. Instead, I argue that physical space is also an active core influence on how these issues play out and intersect. My work argues that in the context of drug violence, physical space is not just a location, rather it is a key actor. By actor I mean that physical space influences human behavior (how people move, interact and control social, economic, and political issues).
This study's research question asks: What roles does physical space play in the conflict—that is in the production and reproduction of violence—in informal settlements in Medellin? It sheds light on important questions regarding state and non-state control of informal settlements. Why has the state been unable to wrestle control of these spaces from narcotraffic and other non-state armed groups? Why have non-state armed groups been able to negotiate physical space to maintain control of Medellin neighborhoods? These questions are central to current state policies of urban intervention, drug violence and security in Medellin and in cities throughout Latin America now using “the Medellin case” as a model.

This research presents the space of urban informality as a unique battlespace in the “slum wars” (Rodgers D. 2009). Here I establish a relationship between actors of the conflict (State and Non-state) as conditioned by the spatial neighborhood characteristics of the territories in which they contest each other. The literature on conflict in poor neighborhoods in Latin America and in the ‘developing world’ in general has overlooked spatial issues that I argue can be key to understanding differences of conflict in Latin American cities’ poor informal neighborhoods.

My research focuses on the conditions of (under)development (both in terms of economic and physical form) as opportunities for conflict in which in the context of ‘weak or failed states,’ non-state violent actors increase control over markets and territories (ARIAS 2006; Koonings and Kruijt 2007). As such, the ‘failed nation’ is conducive to conflict and cooptation by non-state actors. This context of non-state actors fighting state actors in the same country (as opposed to state actors in one country fighting state actors in another) involves a new geography of conflict, which Kaldor calls ‘new war’ (2013). This cooptation gets further complicated by the fact that the non-state actors operate on a local and a global scale. At the local (city) scale these actors provide state-like services in the vacuum left by the state in these areas (Tilly 1985; Blake 2013). Jo Beall argues that the conflict in Central America, in terms of civil wars, is moving from the rural area to the urban areas in a phenomenon he calls an “urbanization of the conflict”. Similarly Dennis Rodgers maps the evolution of Latin American civil wars as “a geographical transition from the ‘peasant wars’ (Wolf 1969) to ‘urban wars’ (Beall 2002)” (Rodgers D. 2009). He maps these wars as a continuation of old conflict in a “new spatial context” and gives these 21st-century civil wars a new name: “slum wars”.

The “slum wars” concept becomes important because it spatially represents the intersection of this “new violence” (Wilding P. 2010) and urban informality. The “Slum wars” present the space of action of “Non-State Armed Actors” (D. Davis 2009) who act in Thomas P.M. Barnett’s “Non–Integrating Gap” (Barnett 2004) on those countries not controlled by the predominant economic system; in the so called “fourth generation wars” (Lind 2004) these wars not anymore between states but between states and non-state armed actors at the core of the large cities of the developing south the “Megacities” (Koonings and Kruijt 2009). This process is parallel to the creation of alternative governance structures that are part of an “insurgent citizenship” (Holston 2008) in those spaces of urban informality.

Planning literature engages in how the urban form impacts perceptions of security and actual levels of security in urban settings (Jacobs 1961; Newman 1972; Whyte 1980; Newman 1995; Cozens and Hillier 2012a). Most of this literature focuses on urban form as understood in the formal city and does not really engage with particular issues of urban informality. I argue here that the particular physical conditions of informal settlement in terms of how the population, physical form and connection with the formal city
(Drummond 1981; Augustijn-Beckers, Flacke, and Retsios 2011b), along with social issues of “marginalization,” (Perlman 1976a; Perlman 2010) have substantial influence on how conflict performs at the core of these spaces. The only literature about conflict that directly talks about the role of space in conflict is military literature in which cities as a battlespace are key to understanding the new types of conflict (S. Graham 2003; Stephen Graham 2008). This literature presents the use of physical space as an important tool of the armed conflict (Weizman 2007) and presents tools of urbanization as the tools of war in an urbanized conflict.

From James Turner to James Holston, a recurrent theme about the urban informality is its ever-changing physical form. At the urban scale, there are profound implications of this incremental process in the constitution of the form of the informal city. Didier Drummond’s studies of favelas urban development find that the informal settlements go through a series of phases of evolving consolidation: Phase One “is implantation precarious shelters”; Phase Two is “transformation of shelters to sheds” and Phase Three is “solid construction” (Drummond 1981). Further development of this thinking has created the opportunity to model prescriptive growth scenarios for informal settlements, a process called “Slumulation” (A. Patel, Crooks, and Koizumi 2012).

My research here on Medellin uses qualitative (narratives and interviews) and quantitative methods (physical measurements and statistics) to make maps of the physical evolution that represent specific events and ruptures of violences and incidences of state-sponsored interventions in specific informal settlements. For example, I create a map of the urban informal space and superimpose it with narratives from my interviews with police, gang members and community members to explain a story of how gang members escaped a police invasion in a specific place and time. I use aerial photographs superimposed with city maps of Medellín to match the historical moment I am discussing. I also integrate these maps into my analysis of scholarly and urban planning published histories of development and mappings of conflict over the last 40 years in four different informal neighborhoods in Medellín. All of this research is an effort to locate and analyze the influence of space on conflict and informality in these four informal neighborhoods in Medellín.

This research argues that physical space plays a fundamental role in the way armed conflict plays out in informal settlements. I argue it does so in two distinct ways that involves all actors (state and non-state) in the conflict: (1) Physical space becomes a form of (spatial) conditioning that tailors the actions of actors and the nature of the conflict in specific ways and (2) physical space creates and reinforces warfare strategies that are unique to informal settlements.

**Conditions of Space.** Time plays a key role in coming to these conclusions. As time passes in informal settlements, urban form and social actors change in dramatic ways. This challenges community social ties that were key at the community’s foundational moment. Population and urban density overwhelm early social ties but in turn provide market and associability opportunity for perverse actors. By perverse I mean non-state armed actors who are engaged in criminal and/or narcotraffic activities, markets, and systems of control in informal settlements. The global physical features of informal settlements provide restriction of access, non-defensible spaces (grayspaces) a particular type of urban street network product that all work together to create an urban form that for non-state armed actors is easily controlled by the appropriation of key junctions.
Informal warfare strategies. Here the way space is seen and understood requires the actors of the conflict to deploy and incorporate informal space into their own battle strategies. These warfare strategies differ from the ones used by the same actors in the formal city.

This research suggests that we need changes in the way policy and urban projects are framed in the context of informality. It suggests that in nations such as Colombia, with weak states that are fighting these types of new wars with asymmetrical adversaries (State and Non-state armed actors) (Rosenau 1997) on urban terrain in which informality and criminal armed groups act, the state needs to provide support for settlers at the beginning of the creation of the new informal settlement. So far, the majority of this state support has happened years, and sometimes as much as six decades after settlers have first founded their neighborhood. So, we need a permissive urban agenda that is officially pro-informal development with continuous state presence and that supports informal (non violent and non criminal) social networks. This state pro-informal settlement policy and procedure could provide more stable and secure environments in informal settlements than does the current tactic of trying to remove them. This removal is almost always unsuccessful, which in turn, requires the state to making large expenditures on security in an ongoing asymmetrical warfare.

This research is presented in the following chapters; Chapter I “Methodology” explains the methods and selection process of the cases and the variables used to draw conclusions. It explains also how the mixing of different methods qualitative and quantitative narratives, documentary video, photography, statistics and mappings are useful in the context of understanding and representing issues of conflict and urban informal space. Chapter II “Space, Informality and Armed conflict,” defines conflict in informal settlements in spatial terms. It reviews the literature on conflict, both the social science and militaristic approaches and then narrow the research focus of this conflict by presenting the space of urban informality as a unique battlespace. Chapter III “Understanding evolution of informal settlements,” reviews the literature of urban informality and in this context, defines the unique spatial characteristics of urban informality. These characteristics are the variables I identify and analyze in my research. Chapter IV “Time-Line Space of Informality and Conflict, Four Neighborhoods as Case Studies,” develops two timelines of conflict and urban development during four distinct periods (decades) conflict in the city. I explore each one in terms of population, type of conflict, urban development and typologies of informal settlement occupation. This city wide introduction is followed by a section which introduces the four case studies (neighborhoods) and mappings. I place each neighborhood in terms of their physical evolution into context and conversation with narrative stories of settlement foundation, urban development and conflict. This chapter also introduces four other neighborhoods as control cases. Chapter V ““Slum Wars” Understanding Space as a Variable of Conflict in Medellín” elaborates on the issues raised in earlier chapters about informality and conflict), specifically the theory that informal settlements are a unique battlespace. Here, I test six questions that I raise in response to the historical narratives I gathered from my interviews. These questions are:

1. How common is informal development in Medellin? What are the distinctions between what is formal and informal in Medellin?
2. What evidence can be provided that informal development in Medellin follows prescriptive developing urban pattern as explained in the emerging literature in terms of a “Rational and
predictive urban model”? Can it be asserted that in Medellín the three stages (foundation, infill, and consolidation) (Drummond 1981; Mesa Sánchez 1985; Augustijn-Beckers, Flacke, and Retsios 2011) are clearly visible?

3. Is there evidence for “slum wars” in the Medellín case as a type of urban violent conflict that is unique to the conditions of urban informality?

4. If urban form changes, what implications does this change create for the communities who live there? What does that change imply for communities in terms of the composition of their social organizations? How do social ties change over time given the physical changes that occur in informal settlements?

5. If we follow the military perspective of a “failed” community within a failed state in the context of the “four generation wars” (Sullivan and Bunker 2002; Lind 2004), how do non-state armed actors at the local level compare with the ones at the national scale? Are these actors more present in informal settlements than in formal ones? How “asymmetrical” (Rosenau 1997) are the urban fights in informal settlements in Medellín?

6. And finally, do changes in urban form correlate with changes in urban conflict? In other words are the tools of urbanization also the tools of war in an urbanized conflict?

Here the goal is to address the main aspects of how the space of informality engages with urban conflict. Chapter VI “Space and Conflict”, defines relationships between conflict and space, more specifically how the conflict is conditioned by its battlespace in the informal settlements in Medellín. This chapter presents the findings of the research in which physical space plays a fundamental role in the way armed conflict operates in and impacts informal settlements. I argue, through the mappings and narratives that this happens in two categories: (a) Conditions of Space and (b) Informal warfare strategies. Chapter VII “Conclusion”, articulates what might be seen by some as radical policy recommendations, specifically in terms of state interventions and engagement with informal settlements. This chapter also urges specific issues for future research.
CHAPTER 1 THE CHALLENGE OF RESEARCH ON INFORMAL SETTLEMENTS AND CONFLICT

This research project selected the city of Medellin as a case because it is a key global example of conditions of conflict and informality, the two main variables of this research. First, Medellin is a city with longer and larger variations of conflict when compared with other cities in Latin America and, second, it is a city with a large concentration of informal settlements, the result of an ongoing process of building, extending from the early 1950s to the present. Over this period, the country and city have experienced what may be called a “non-declared civil war” (Bushnell 1993). In this way, Medellin represents an “extreme case or a unique case” (Yin 2009). The goal of this research is to find a deeper understanding of how the modification of urban space plays a role (positive or negative) in a violent conflict in an extreme case.

UNIT OF ANALYSIS AND LEVEL OF ANALYSIS

The unit of analysis is the informal settlements of Medellin from 1968 to 2012. Specifically, this research concentrates on four neighborhoods in four districts (comunas) of Medellin as embedded units (comunas: 1, 6, 8 and 13). These embedded units are selected following the same criteria of the selection of the city of Medellin. They represent the areas of the city with the highest levels of informality and transformation over time and longer and more varied forms of urban conflict: Comuna 1: Santo Domingo Savio, Comuna 6: El Triunfo, Comuna 13: Independencias 1 and 2 and Comuna 8, Villatina. These neighborhoods are also selected because detailed accounts of their histories exist. Four more neighborhoods (Nueva Jerusalem in Bello, El Pinar in Comuna 8, Antonio Narino in Comuna 13 and El Picacho in Comuna 6) as control cases using a variation of the “N of One plus Some” research technique of secondary cases that are used “to identify issues to expect, questions to ask, and data to look for in the primary case[s].” (Mukhija 2004)

ANALYTIC THEORY

This study is trying to understand the role of space in the production of violence. To do so, I aim to find intersections between these two variables of conflict and evolution of space in informal areas by mapping them. It is important here to know that the current ways we map informal physical space differ from ways we currently map conflict and violence. The goal here is to show methodological ways in which both mappings can intersect to, in turn, find how a change in one variable may impact another. Following is a review of how two fields map the two main variables—informal space and conflict an violence—differently.

1. MAPPING SPACE OF INFORMALITY

From James Turner to James Holston a recurrent theme about the urban informality is its ever-changing physical form. At the urban scale, there are profound implications of this incremental process in the constitution of the form of the informal city. In the Architectes des favelas, Didier Drummond studies the urban development of the favelas in Rio de Janeiro and based on his cases, finds that the informal settlements go through a series of phases of evolving consolidation. Phase one “is implantation
precarious shelters”; phase two is “transformation of shelters to sheds”, and phase three is “solid construction” (Drummond 1981).

In these three phases, Drummond reveals the very nonspontaneous mechanisms, which are rather predictable and normative ways in which these urban environments evolve though resident planning. This process is often described in urban planning literature as “spontaneous growth.” Such mappings show the minimal, but key infrastructure additions that accompany each stage and make each one of these phases of the informal environment viable. Kellett and Napier (1995) explore the built form of the informal dwelling as opposed to the entire settlement. In their article, “Squatter Architecture?” they propose to view the self-building production through the perspective of “vernacular” to understand both the process of construction, as well as the final product. They find “there has been a virtual absence of empirical data on “squatter architecture” (Kellett and Napier 1995, 7).

To fill that void from the "space syntax" school of Bill Hillier (1996), a new group of studies is emerging that is fascinated with the growth of the urban informal form, and that is tackling two problems that researchers find when trying to understand informal settlements. One of these problems is the creation of adequate mapping. Large numbers of informal settlements are still unmapped, and their continued process of growth makes it a challenge to accurately formulate policy and project prescriptions. The second and maybe even more elusive problem is the creation of predictive models that can forecast growth of informality. Augustijn-Beckers (et al. 2011b) simulates growth in informal settlements using “An Agent-based Housing Model.” He argues that this model “can successfully simulate the housing pattern of informal settlements growth.” Barros and Sobreira (2002) map slum geometry in terms of ways that urban growth changes in shape and size over time. Patel, Crooks and Koizumi (2012), in their efforts to develop a model to simulate the unique conditions of informal settlements, propose a new term for the process of mapping and forecasting as a “Slumulation”. Finally, Laura Vaughan (2006; 1997) studies the location patterns of ethnic minorities and challenges the homogenous concept of ‘ghettoisation’ and finds that through “self-help” processes, clustering of endangered groups serves as “ways of self-protection from hostile populations.”

The findings of these studies illustrate various links between the concepts of security and informal space, suggesting the need to map them in a more rigorous way. Vaughan’s work is of particular interest to my research because she identifies ways that people strategically create and organize space as self-protection. She determines that, the construction of informal spaces is not spontaneous, but rather there are patterns within informal spaces that are not homogenous. This in-depth study shows particularities of this space (informality) and how the way people use the creation of their space to protect themselves from others (security). There is a body of literature that engages in how the urban form impacts perceptions and real security in urban settings in the developed formal world (Newman 1972; Newman 1995; Jacobs 1961; Cozens and Hillier 2012a). Up to now, however, we lack studies that can empirically find correlation between how changes in the urban form of informal settlements impact the unique conditions of security in these areas.
2. Mapping Conflict

In terms of mapping conflict, two different approaches have been developed. One approach merges geographic analysis with crime data collected by reporting agencies, creating a “spatial crime analysis” (Hirschfield and Bowers 2001). Here space, time and crime are the key variables that can be combined with a multiplicity of other information gathered to find levels of correlation between them (level of unemployment and robberies). The main operations where these variables are mixed are block aggregation, Voronoi diagrams, kernel smoothing and animation (Williamson et al. 2001; Anselin et al. 2000). These mappings help inform security agencies how to deploy their resources. A second approach comes from social sciences (sociology and anthropology). Caroline Moser provides a series of studies of perception of securities by community members that also maps locations of crimes and criminals in her “Participatory urban appraisal” (C. O. N. Moser and McIlwaine 2004b; C. Moser 2009, 71; C. Moser 2000a). Susan Liebermann and Justine Coulson in “Participatory mapping for crime prevention in South Africa - local solutions to local problems” merge research mapping of security with the policy recommendation to integrate community members into the community policing their work reveals that “crime does not happen randomly” over the territory that it actually happens in “predictable spaces” (Liebermann and Coulson 2005). This adds evidence for the claim that that insecurity and space are related issues, but fails to provide an accounting of the qualities that make such spaces as identified as different from others. Other scholars have focused on how communities and security actors have diverse “perceptions of crime” that map differently across geography (López and Lukinbeal 2010; Curtis 2012). Annette Kim in “The mixed-use sidewalk: Vending and property rights in public space” maps conflict and informality on the sidewalk in Ho Chi Minh City, Vietnam. In her spatial ethnography the use of “Sidewalk Cartography” provides a multidimensional understanding of the multiplicity uses that the informal occupation of the public space entails (Kim A.M. 2012). These studies point to the intersection of insecurity and space in the geography of informality. What my research adds to this research a dimension that has not yet been address: an analytical framework that demonstrates how and what spatial characteristics are complicit in the production and reproduction of insecurity. This focus in space is important because as Bruce Stanley explains in “City Wars or Cities of Peace: (Re)Integrating the Urban into Conflict Resolution,” there “has been no discussion about the role of cities as sites or actors in conflict termination and conflict resolution” (Stanley 2003).

3. Analytical Framework of Mapping Space and Conflict

This research maps two longitudinal studies including both the evolution of urbanization and conflict in informal settlements. In this way, and see how changes of social, economic conditions in informal settlements relate to the way the urban form evolves, and reciprocally, how changes to the urban form

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2 Block aggregation, Voronoi diagrams, kernel smoothing and animation are different analytical tools used in spatial analysis. Block aggregation refers to the use of information of spatial data by sectors such as (census tracks, blocks or territorial divisions. Voronoi diagrams uses as inputs points (called seeds, sites, or generators) that divide the space into regions of influence. A kernel smoother is a statistical technique for estimating a real valued function in GIS the goal of kernel smoothing is to estimate how the density of events varies across a study area based on a point pattern. “Kernel estimation was originally developed to obtain a smooth estimate of a univariate or multivariate probability density from an observed sample of observations…” (Bailey and Gatrell 1995). Finally Animation in crime mapping is a way to introduce time as a variable to understand how data changes with time and space.
impact the way communities, non-state armed actors and the state engage each other. The aim is to
demonstrate its repercussions changing form on the ever-evolving conditions of security in informal
settlements. Of the large numbers of longitudinal studies in informal settlements that we have access to,
Janice Perlman’s “Favela: four decades of living on the edge in Rio de Janeiro” (Perlman 2010) is one of
the most-significant ones. This study does not map the changes on urban form over the period of
research that also spans three decades between two data collection points. Therefore, it does not map
specific urban changes that have happened over the span of 40 years in favelas in Rio de Janeiro and how
that has (or has not) had an impact on the populations in them. These two features of urban change and
population change as result of the increases in urban density can greatly impact the findings of the
research in terms of security and community perceptions of it. By not engaging in the particular
conditions of physical urban informality, I argue that Perlman’s study (and those of others who explore
the spaces of informality) miss key differences between research in informal settlements and other
marginalized areas. It is clear from the Perlman case that to generate a coherent mapping of changing
conditions of security and urban form, we need to collect data points more closely and consistently. Also,
I argue that community member’s participation is crucial in the process of historical mapping, both in
terms of the evolution of conflict and urban form. Furthermore, this needs to be done over large
timespans. This is why the design of my project’s research here focuses on mapping urban change
alongside (and often overlapping with) the resident’s personal narrative histories of change on their
neighborhoods.

DESIGN
This research looks for ways in which space has played a role in the ongoing urban conflict in the City of
Medellin. Here I look for intersections between two parallel longitudes that span forty years, : (1) One
study concentrates on the physical evolution of the urban form of the informal settlements of Medellin,
which maps important inflexion points in the production of urban forms, such as foundational moments,
evictions, community and state projects, and the progressive evolution of such spaces. (2) A second is an
ethnographic study of evolution of such spaces that maps stories of building, rebuilding and urban
conflict. For both of these research approaches and corresponding timelines, this research project
analyzes archival material (such as photos, maps, aerial photographs, census, crime reports, and
newspapers) as well as stories (invited through semi-structured interviews) by community members,
state officials and armed actors. I chose semi-structured interviews because they are an efficient method
that “provides detail, depth and an insider’s perspective” (Leech 2002). On the other hand, I have
employed a series of quantitative methodologies to measure physical space and to establish relations
between that what is measurable in quantitative terms and what is revealed by the interviews.
RESEARCH MATERIALS

QUALITATIVE METHODS, SEMISTRUCTURED INTERVIEWS.

Three type of sources are identified in this research. Below is a description of each one of them and how they participated in the study (for location of interviews see Figure 2).

Table 1 Data Collection Sources

<table>
<thead>
<tr>
<th>DATA</th>
<th>DATA COLLECTION STRATEGY</th>
<th>TYPE</th>
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<tbody>
<tr>
<td>INTERVIEWS</td>
<td>Medellin Mi Hogar, Historical Memory Project</td>
<td>492</td>
</tr>
<tr>
<td></td>
<td>Semi-structured interviews with community members</td>
<td>67</td>
</tr>
<tr>
<td></td>
<td>• As Neighborhood Founders</td>
<td></td>
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<td></td>
<td>• Community Members</td>
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<tr>
<td></td>
<td>• Participants in the Conflict</td>
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<tr>
<td>CITY OFFICIALS AND PLANNERS</td>
<td>25</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Police Officers</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Planners</td>
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<td></td>
<td>• City Officials</td>
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<td></td>
<td>• Social Workers</td>
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<tr>
<td>DOCUMENTS</td>
<td>News reports</td>
<td></td>
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<tr>
<td>MEAS</td>
<td>Historical Memory Projects</td>
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</tr>
<tr>
<td>OBSERVATION</td>
<td>Unobtrusive Observation</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Visits to the research sites</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Visits to police station and security installations</td>
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Most of the data about community stories about building the city of Medellin come from 472 interviews conducted as part of Medellin my Home, a historical memory project in collaboration with three U.S. universities and founders and residents in informal communities in Medellin (2009-2015). The interviews include stories from the three areas of study as well as from other areas of the city with conflict and informality. This group was randomly selected from a pool of 45,000 families considered by the city of Medellin to be living in the lowest poverty bracket in the city. Interviews have been conducted by Duke University, MIT, Emerson College and Lesley University students who were trained by the author and project’s co-founder and co-director Tamera Marko, and were video recorded. In this ongoing project, we have more than 6000 hours of video interviews with more than 520 families to date. To compensate for the potential bias of this population, I did other random community interviews in the areas of study with community members not belonging to this database. These groups of individuals were selected through snowballing (Bertaux and Bertaux-Wiame 1981), starting with access to neighborhoods at two
points. The first one is recommended individuals by the social workers team of the EDU and Planning Department. The other one is within community groups or NGO's in the selected embedded units of analysis (comunas). By having these two-entry points, this study seeks to cancel some of the bias that having only one will introduce. In one of the neighborhoods, the focus group was performed with a community group. This confirms relevant thresholds of development and corroborates dates. However, as with previous research experiences, given some of the private nature of the questions (perception of security), the type of dynamics of focus groups in informal settlements produced standardized (safe) responses when the subject of security appears.

- Interviews with state officials include professional experts who have participated in the planning, execution or evaluation of the project in informal settlements. It also includes the works and interviews of the academics who work analyze projects in informal settlements or urban conflict in Medellin. I have interviewed 25 individuals who fit within this category, including mayors, planning directors and planners whose work and opinions have had (and, in many cases, still have) a direct influence in the three selected embedded units (Comunas).

- The last category of armed actors includes current and formally illegal armed actors. This group is smaller than the others, and access to the members represents the largest challenge in this project. One entry point is the large portion of re-integrated illegal armed actors who are part of community organizations (that protect them) and also of state projects that support reintegration process. The second entry point is through a network of community members, state officials and project managers who deal in the day-to-day activities with an active member of illegal armed groups. I have conducted 10 interviews with members of this category.

A CONTECIMIENTOS IMPORTANTES EN MEDELLÍN

FIGURE 1. TIMELINE OF IMPORTANT EVENTS IN COLOMBIA AND MEDELLÍN USED AS A TOOL DURING INTERVIEWS. TOOL DEVELOPED TO LOCATE Histories OF COMMUNITY MEMBERS IN THE CORRECT TIME FRAME.
FIGURE 2. GEOREFERENCED INTERVIEWS INCLUDE A SAMPLE OF INTERVIEWS OF MEDELLIN MI HOGAR (243 OF 492 LOCATIONS ONLY GEOREFERENCED INTERVIEWS PRE-2013) AND THIS PROJECT INTERVIEWS (57).
Several methods were employed in the interviews, including traditional home visits (95% of the Medellin mi Hogar interviews are performed in interviewees’ homes), and group meetings performed in libraries or community centers. About 50% of interviews that are outside of the extensive record of the Medellin mi Hogar have been video recorded or audio recorded with the authorization of the interviewee. Because most of the interview questions focused on the past, I compiled a list of key historical events for Medellin that serve to locate community members' stories clearly in the right time frame. I developed the timeline when we realized that community member stories sometimes miss an accurate date by an entire decade. Once that we introduced the timeline list, Interviewees’ errors stayed within the expected and acceptable limits (these limits will depend on the type of event for some issues have the correct year is not important, but for others it is key to knowing the exact date). Alongside this list, we put the recollections of births and deaths in each family for which community members are really clear. This helped to narrow down the errors in time measurement (see Figure 1).

Two new techniques were also employed: part of the research one came from the “recorridos,” tours given community members or armed actors, in which they took me for their tour of their neighborhood, usually done days after a complete interview. The interview would reenact the stories that have been told at the interior of their houses or in safe places in the actual space. In the public realm, sometimes a single word or sentence will suffice to recall an entire episode narrated in the safety of home. Pointing a
finger to a place or a whisper in the ear will serve to show key spaces and individuals. During the ‘recorridos’ and when the terrain was very complex to understand we used an app to georeference the walk. In this way after the interview it was possible to have the correct location of the path and of the sites visited (Figure 3).

To try to overcome this issue of accessibility to sensitive sources, I have developed a method to let interviewees express their stories freely: my research team and I asked them to privately video record themselves and the areas in which they live (the selfie version of social science research). This method has proven successful to reach members of active groups that otherwise will not meet with an outsider or for whom will be dangerous to be seen talking with an outsider. Yet, even with this method, this area of research has proved challenging in terms of providing valuable information in a consistent manner. This challenge is the result of the complex context of poverty and violence. Two events exemplify this challenge: (a) one of my informants linked to a gang that operates in one of the neighborhoods where I work was assassinated by another neighborhood rival gang. Members of the gang of my informant had at a point sequestered the camera and ask to delete all recordings made by him. To honor this request, the recordings were deleted before they were backed up and (b) after this, the camera was stolen from the house of one my informants. These events made me decide to end that research technique.

QUANTITATIVE DATA AND METHODS

a. Homicides rate: Beyond just the number of homicides, this research focus in the correlation between stories of conflict and georeferenced data about homicides in Medellin and doing so with the understanding that homicides are a proxy of fragmentation of conflict. As such, a lack (or lesser number) of homicides does not represent a lack of conflict, but instead reveals a cooptation by a reduced number of actors of the means of cohesion. This study uses two scales of homicide rates in Medellin to explore the work of this study. That first one is the city-wide homicide rated divided by Comunas (districts), which helps to understand the variability of phenomena over the territory and to select the areas of existing data concentration from 1991 to 2013. A second local scale of conflict is data from 2004 to (first trimester of) 2014 that georeferenced homicides in the city of Medellin in the four Comunas that are part of this study. This final data set permits us to see, in detail, the relationship between moments of conflict exemplified by homicides and their respective spatial location.

b. Gang Mapping: Several methods were employed to develop maps of the turf that each gang controlled: (a) Through the semi-structured interviews with community members who establish the limits of the control of gang members; (b) through the interviews with illegal armed actors who explained the extent of their territory and also that of the other warring groups and (c) through the mapping done by security structures of the state in this neighborhood (police officers, and members of the security research divisions of the municipality).

c. Urban form Growth: Growth of informal settlements over time in this study is understood as a relationship of population growth but also of building growth. I need to redraw new historical
maps of the city of Medellin to see this change. I did this by geocoding historical aerial images I found in the Department of Planning in the City of Medellin. I erased new buildings by reference to the aerial image and created a new map for each one of the time periods where aerial images was found. This was one of the most time consuming parts of the study: Base Cartography for spatial analysis. This involved the construction of maps that show growth at parcel scale of the six neighborhoods studied here. This required site visits to corroborate states surveys, collecting and georeferencing historical aerial photography and the painstaking labor of checking and drawing a map of each building in the neighborhood for each of the four identified periods (and in some cases more time periods). My maps are also informed by archival research in the Planning Department databases and other entities, including libraries university research groups, newspapers and historical maps, crime data repositories, review of historical memory projects historical archival material, and then superimposed with what can be understood from historic aerial photography (1950-2013).

DATA ANALYSIS
First, after becoming familiar with the data collected, I then divided the transcripts and notes of the field interviews and field visits and text or graphical material collected (provided by the interviewees as part of their interviews)into the three categories of story telling: stories told by state officials, community members or non-state armed actors. Second, I coded all the data based on analytical patterns and/or themes that emerge from within the text in what is call “open coding” (Warren and Kramer 2010). Third, I coded all the data in the general categories of the constructs identified in the literature of conflict and informality. I also individually coded them in terms of two violence-space dimensions: (1) the influence of space in conditions of violence and (2) on the way violence in turn modifies the production of space. This process is what Donald Campbell calls “pattern matching,” a process that produces abstract (narrative) and visual (physical mapping). Finally, results from the patterns emerging from the open coding and pattern matching process generated, “explanations” of the “how” or “why” changes in perceptions and why they happen. This final stage is known as “explanation building” (Yin 2009).

VALIDITY AND RELIABILITY
INTERNAL VALIDITY:
To guarantee face validity, I selected different methods for each category of interviewees. These three different pools informed the creation of the two-time lines (urban development and conflict) each timeline is then triangulated by hard data (newspaper articles, aerial photographs, police reports, homicide rates and official historical documents). The conclusion was drawn by the intersections of such timelines (moments in which clear changes on the urban form represents changes in perceptions of security).

To guarantee content validity interviewees will be asked similar a set of questions adapted for the kind of knowledge of each group (State actors, community members and illegal or non-stated armed actors). Geo-referencing of crime data and time are common analytical tools to understand the relationship of security and space (Hirschfield and Bowers 2001). In terms of urban form evolution in informal
settlements, community members provide the narrative, and they narrate their stories and some of the evidence through photo albums. Histories that become key in the understanding of the intersection of space and security in informal settlements could be also corroborated by newspaper articles that would corroborate time and space veracity of such events. The community narratives then should help produce the “thick description” (Geertz 1973) necessary to contextualize the intersection of events and space. In this way, I use triangulation as a “method of cross-checking data from multiple sources to search for regularities in the research data” (O’donoghue 2003, 78).

THREATS TO INTERNAL VALIDITY:
This study has selected subjects (cases) on the basis of extreme characteristics as an example of areas where urban informality and conflict coexist. This approach of selecting an outstanding case could be a threat to “internal validity,” in this case “regression to the mean” (Campbell and Stanley 1963; Cook and Campbell 1979; and Shadish, Cook and Campbell 2002). The objective of choosing outstanding cases is that this research project is not interested in finding correlations between urban informality and conflict, but instead on finding ways in which the space of modification plays a role in urban conflict. In any case, this research should limit its conclusions to contexts in which the inferences are drawn.

REACTIVITY: Individuals, who participate in this research, just because they agreed to participate in the study, might be more willing to show favorable outcomes or corroborate intended outcomes similar to the Hawthorne effect (Heppner el al. 1992), given that the questions will easily inform the interviewee of the research interest and could imply expected outcomes. Answers that positively confirm outcomes need to be examined in more detail, and it will require asking interviewees to provide a larger factual explanation during the interview.

SINGLE-GROUP THREAT: Given that it is not possible to have a control group in this design, (an area with no conflict in Medellin or with urban informality but no conflict), it is the expectation that having three opposing groups with a similar set of questions will reduce this threat.

EXTERNAL VALIDITY-TRANSFERABILITY: This research design, as a single-case study methodology, hinders the possibilities of generalization. Thus, it is important to account for this at the concluding stage. However, it is also important to account for the fact that the conclusions drawn from this analysis can to an extent, be used to all other areas in the city of Medellin that have urban informality and conflict. The conclusions of this research can be applied specifically to new policies implemented in high urban conflict areas in Medellin in the future. Beyond Medellin, conclusions could be transferable to other cities in the country that have the same social political context of conflict and similar patterns of urban development cities like Cali and Bogota. At the Latin America scale, the city of Medellin serves as a powerful case study regarding ways in which drug-related groups generate substantial levels of conflict. Therefore, some of the conclusions of this research can be helpful to understand similar contexts in Rio de Janeiro and Sao Paulo in Brazil, San Pedro Sula in Honduras, and Mexico City, Juarez and Tijuana in Mexico. Beyond Latin American, the comparable conclusions of this study have to be carefully considered in context. Two areas, however, might be possible venues for generalization: (1) those informing CPTED (Newman 1972; Cozens and Hillier 2012b; Jeffery 1971; Schneider 2006) theory and policies about how to secure urban space and (2) understanding the evolution of the urban form of informal settlements at the global scale.
RELIABILITY

CASE STUDY PROTOCOL: I addressed consistency and stability in the responses of the interviewees by conducting semi-structured interviews, using the same interview guide for each group of interviewees, and making sure that each individual feels safe and comfortable in the environment of the interview. I crafted the language of the questions to each group and tested on-site days before the start of interviews to be able to correct for cultural and technical misinterpretations.

THREATS TO RELIABILITY: This research asks individuals to connect actions that happened in the past (up to 40 years ago) with their effects on the present. The context of the present (level of violence in the community, deterioration of physical projects because of passing of time or other factors, or the interruption of policies that were implemented in that neighborhood, current and past conditions of conflict and political affiliations) can affect and vary the results. This reduces the probability of replication of the research. I could use the Split-Halves Method\(^3\) to test for consistency of response, but the number of interviews is small to be divided into a random and consistent way, and this will only prove reliability of the data collected and not of this sample to others taken before or after the study. The goals are that using archival material alongside data collected during the interviews would provide space to understand such process and reduce such risk.

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\(^3\) In the split-halves method, the total number of items is divided into halves, and a correlation taken between the two halves.
CHAPTER 2 SPACE, INFORMALITY AND ARMED CONFLICT.

This chapter defines conflict in informal settlements in spatial terms. It reviews the literature of conflict, in social sciences, planning and militaristic disciplines. For my research, I focus on a particular dimension of conflict: the space of urban informality as a unique battlespace or what some scholars call “slum wars” (Rodgers D. 2009). Here I establish a relationship between actors of the conflict (state and non-state) as conditioned by the spatial neighborhood characteristics of the territories in which they contest each other. Literature on conflict in poor neighborhoods in Latin America and in the ‘developing world’ in general has overlooked spatial issues that can be key to understanding differences within the conflict in Latin American cities poor informal neighborhoods.

In the next five sections, I situate my research within distinct literatures on conflict. Each section focuses on ways that the disciplinary approaches and theories provide tools to understand the spatial conditions of conflict in informal settlements. These theories provide five lenses through which to observe the interconnections between urban space and urban conflict in informal settlements. These lenses serve as variables that in the following chapters, are tools to explore how conflict in informal settlement is conditioned by space.

The five lenses are:

1. The ‘new war’ paradigm, in which non-state actors engage in a borderless conflict across multiple scales, this multi-scale condition of the conflict also has concrete repercussions at the urban scale were part of the confrontations happen.
2. The ecological paradigm, in which physical changes in the neighborhood composition along with social cohesion over time act as deterrents or motivators of crime.
3. The militarist perspective, in which neighborhood physical patterns modify the conditions of battlefield.
4. The ‘slum wars,’ as new battlespace were urban component of the new wars and urban informality intersect
5. Medellin “slum wars”, this city as the space of one of most extreme junctures of conflict, informal settlements and state and non-state interventions.

4 The term “borderless” here can be a misleading. Here, I mean it to denote the lack of fighting across international borders. The fighting then is occurring within the same nation and in the case of the City of Medellín in my case studies, in the same neighborhood among citizens from the same country (Colombians). There are, however, what is known as fronteras invisibles (invisible borders) in the same neighborhoods, which often denote gang territory from one block or even street and another.
THE ‘NEW WAR’ PARADIGM: THE ROLE OF LOCAL IN A MULTI-SCALAR DIMENSION OF CONFLICT

Literature about violence and drugs in Latin America covers a vast field that classifies violence in four categories: political, institutional, economic and social (Winton 2004). Most of this literature presents the space in which the conflict happens as a boundary of research or as an identifier of population groups, who live within these limits (income, race, religion, education, etc.). The literature approaches it this way to readily understand the dimensions of violent conflict at various geographic scales (international, national and local) (E. D. Arias 2010). A vast section of research focuses on the nation’s role in conflict and on the conditions of (under)development as opportunities for conflict, in which in the context of “weak or failed states” , non-state violent actors increase control over markets and territories (ARIAS 2006; Koonings and Kruijt 2007). As such the failed nation is conducive to conflict and cooptation by non-state actors. This cooptation further complicated by the global scale in which many of these actors operate. Part a new geography of conflict called ‘new war’ (Kaldor 2013).

At the local (city) scale these actors provide state-like services in the vacuum left by the state in many informal areas (Tilly 1985; Blake 2013). Jo Beall transfers that condition of state failure predominant in the literature of conflict to the scale of the city. Her observation is supported by the high levels of urbanization occurring globally. In what she calls an “urbanization of the conflict.” This type of post-Cold War warfare (Kaldor 2013) explains how international conflicts reverberate at the city scale. Furthermore, Caroline Moser finds in epidemiology studies that violence is concentrated in areas of the city have a concentration of particular indicators (prostitution, street crime, drug dealing, low-income housing, unemployment, single-parent families, and school dropouts) or what she calls “Informal Community-Level Institutions and ‘Perverse’ Social Capital” (C. Moser 2000b, 32). These findings suggest a need to examine informal settlements at the neighborhood scale as one of the areas in which to understand conflict. In fact, most of participatory mapping of conflict (C. O. N. Moser and McIlwaine 2004b) happens at the scale of the neighborhood.

To explain the type of new urban conflicts that happen in the non-state ruled areas of the city, other theories have emerged, such as “low intensity war” (Koonings and Veenstra 2007) that implies a constant but violent conflict within urban areas especially that new type of cities of the larger south called “megacities” in which is present this new phenomenology of conflict called “new violence”(Wilding P. 2010; Koonings and Krujif 2007; Koonings and Krujif 1999). This concept identifies and spatializes the intersection of national and local conditions in terms of what Koonings and Krujif call “governance voids.” By this, they mean the incapacity of the (local and national) state to guaranty security in specific areas. This, they explain, is “the case where the monopoly of the state has crumbled so that space is opened to armed actors” (Koonings and Krujif 2007). James Holston argues in his study of São Paulo neighborhoods that the isolation of neighborhoods from formal state resources and security generates geographical and ideological spaces for what he calls “insurgent citizenship.” This means that community members realize that under democratic principles and law they are supposed to be equal to everyone else in the same city, but that they are not in fact treated equally. Rather, they are marginalized. This realization then, gives community members ideological justification and inspiration to brave contesting
the state's abandonment of their neighborhoods, including lack of security from drug violence (Holston 2008). There is a well-developed scholarship that focuses on the other dimension of space that my research project employs: space as a cultural construct. Sociologists Caroline Moser and McIlwaine (C. O. N. Moser and McIlwaine 2004b), for example, define the relationship between "perverse organizations" and their use of social capital that has specific meaning in a particular location: the (informal) neighborhoods where they operate.

THE ECOLOGICAL PARADIGM: NEIGHBORHOOD AND CONFLICT

From the social sciences, the Social Disorganization Theory (Shaw and McKay 1969) is the one that has been more interested in the "ecological models" to predict the direction of neighborhood change in relationship with how crime happens. It finds correlations between neighborhood composition and crime. Based on a human ecology determinism of the conditions of conflict (Bursik and Grasmick 1992; Bursik and Webb 1982; Chamlin 1989; Kubrin 2000; Miethe, Hughes, and McDowall 1991; Morenoff and Sampson 1997). New developments of the theory focuses on the changes of the composition over time and growth of communities, it determines that changes in neighborhood ecological structures can strongly influence levels of social control, social ties, and collective efficacy. (Kubrin and Weitzer 2003).

In this group of theories, explanation for crime posits that neighborhood cohesion, participation and informal social control are among the most important ways in which communities' counteract the effects of crime. It encounters that ethnic heterogeneity and fear of crime (Liska and Warner 1991; Skogan 1986) are indicators that negatively impact such conditions. (Shaw and McKay 1942; Sampson and Groves 1989; Bursik and Grasmick 1993, Kirk and Laub 2010). These conditions can reduce residents’ willingness to engage in social control over ‘disorderly individuals’, and thus foster crime. (Markowitz et al. 2001, 293).

Change in neighborhood refers here to the composition of its habitants. In general researchers see housing in economic terms as a durable commodity appraised at different values at different times. This population change explains why some neighborhoods change in the socioeconomic composition. It would seem that changes in urban form can be related with social composition of neighborhoods and cohesion just if only by the increase of inhabitants per hectare as the neighborhood grow and densifies. This correlation between change in urban form and social composition is an important hypothesis to test about neighborhood change within the informal settlements change.

There is a body of literature that engages in how the urban form impacts perceptions and real security in urban settings in the developed formal world (Newman 1972; Newman 1995; Jacobs 1961; Cozens and Hillier 2012a). This literature documents the ability of dwellers to use physical features more easily to supervise their physical environment including such concepts as keeping with "eyes on the street" (Jacobs 1961) and maintaining an adequate mix of locals verses foreigners to achieve a secure public environment (Hillier 1996). Most of this literature assumes urban form as understood in the formal city and does not engage with particular issues of urban informality. Up to now, however, we lack studies that
can empirically find correlation of how changes in the urban form of the informal settlements impact the unique conditions of security in these areas.

THE MILITARIST PERSPECTIVE: MILITARY DOCTRINE THE ROLE OF URBAN SPACE IN CONFLICT AND OF URBAN AND SOCIAL INFORMALITY AS PART OF THAT CONFLICT.

The only literature that directly talks about the role of space in conflict is the military literature. Here I describe the main elements of such doctrine and how they relate to urban conflict within informal settlements. Specifically, one portion of the critique on military contemporary doctrine focuses on the urban strategies and urban form produced in a state of informal development (as the case with the some of the Palestinian territories). Here, first I describe the unique conditions of combat involved so-called “Urban Operations” followed by defining characteristics of the asymmetric confrontation of the “fourth generation wars,” those wars fought between state and non-state actors.

URBAN OPERATIONS

“urban operations have the capacity to become a critical security issue in the twenty-first century, and that cities, the archetype of urban terrain, will provide the politically significant areas of the future battlespace.” (Hills 2004, 5)

The US Doctrine for Joint Urban Operations defines "urban operations" as military engagements in areas with manmade construction or with a large density of noncombatants. Inside the literature of warfare, there is little about the difference between urban and rural war. This scarcity is because in essence there are many similarities between them (Hills 2004). There is, however, a nascent kind of literature that tries to see urban conflict in a different light (S. Graham 2003; Stephen Graham 2008). It argues that the context in which the conflict happens modifies the ways in which military strategy should be deployed. A study of the Russia Chechen wars 1994-2000 concludes that Russia’s "conscious decision not to prepare for a most stressful battlefield (the urban battlefield) met with devastating results" (Oliker 2001). Urban combat puts armies and their enemies at closer range, which can transfer into hand-to-hand combat. This can result in more deadly confrontations than traditional armies are prepared for (Hahn and Jezior 1999, 74; Rosenau 1997). Urban form then is the variable that increases the level of danger and the changes in strategy.

The military perspective of the conflict becomes important in this research project in two ways: (1) it helps to clearly identify the role that urban space plays in shaping violent conflict and (2) it also helps to define a relationship between the non-state actors within the geographies of conflict, explaining how space plays an important role in balancing fire power between asymmetric contenders.
Alice Hills argues that “[c]ities represent a human environment that interacts with armies in a way that jungle and forest do not, and urban operations are special because their environment explicitly shapes them” (Hills 2004, 8). Hills argues that of all the environments in which the military operate, the urban environment is the most complex and challenging, as cities influence the conduct of operation taking place within them to a greater extent than any other type of terrain. There are many reasons for this, of which the following four are part of this research:

1. The physical terrain. There are significant differences between operation in open space and urban settings, where the three-dimensional environment influences the course of all operations taking place in urban areas.

2. The intellectual and professional limitations. Most literature and knowledge about combat and security is based on open space tactics.

3. The presence of non-combatants. Urban areas present a dense presence, who in some cases are difficult to distinguish from combatants. Cities are rarely empty, so securing a city means operations controlling its population, which cannot be compared to open operations and is notoriously difficult.

4. The pre-modern nature of urban fighting. Pre-modern here refers to the non-state nature of armed actors against state actors. Modern warfare refers to wars that are state against state. Also this pre-modern nature of wars is referenced in the literature as “fourth generation wars” that are fought both in urban terrain and rural areas. Many of the actors of these “fourth generation wars operate in both terrains with different tactics. The presence of the same armed actors in rural and urban areas is particularly important for the case of Colombia.

Fourth Generation Warfare
This research focuses on a new typology of wars that explains why it is appropriate to use military theory to explain conflict within the space of urban informality. ‘Fourth Generation Warfare’ refers to military strategy in the case when the state loses its monopoly on war. Wars are no longer fought state to state, but instead state to non-state actors. William S. Lind explains that “[a]ll over the world, state militaries find themselves fighting non-state opponents such as al-Qaeda, Hamas, Hezbollah, and the Revolutionary Armed Forces of Colombia [FARC]. Almost everywhere, the state is losing” (Lind 2004). These organizations operate within spatial urban boundaries and deploy strategies that are the product of their urban setting. Within these new typologies of war, they use the urban environment as a tool to wage war. This is not to suggest that people have not long used spatial environments, urban or otherwise, as strategies of war. What is different here is that the actors who wage war are state actors fighting against these new typologies of non-state actors within these fourth-generation wars. I see this new typology in
line with Stephen Graham's assertion that one of the pillars of the "new military urbanism" is "the deployment of political violence against and through everyday urban infrastructure by both states and non-state fighters" (Stephen Graham 2009). In short, the tools of urbanization are the tools of war in an urbanized conflict.

To further assert the military perspective, it is important to understand that the space of the favela-like environment (informal settlement) is actually seen from all armed actors as a battlefield where a constant war is being waged. Consequently, urban warfare theory is actually applied to these environments, specifically from the point of view of the formal state armed forces. The "Operaciones Mariscal and Orión" in 2002 in Medellin, Colombia and the Alemão Operation in 2010 and Rosinha in 2011 in Rio de Janeiro, Brazil, are examples of full war operations that clearly demonstrate how the state uses of military strategy to take over informal territories.

WAR IN THE FAVELA
To understand the logic of urban conflict in the favela-like (informal) environment, we need to explore two different theoretical positions on urban warfare: one from the point of view of the state, the other from the point of view of illegal armed groups. The role of architecture in a urban "fort generation war" is explored by Eyal Weizman, in his "Hollow Land: Israel’s Architecture of Occupation," (Weizman 2007) that explores Israel’s military position against the urbanization of the Gaza strip by Palestinians. In this case, I loosely attached the qualification of "informal settlement" to the cities and refugee camps which Palestinians inhabit. I do so following the military literature that focuses on urban warfare in what it considers the harsh urban environments of the developing world, the ideal arena for “asymmetrical” adversaries (Rosenau 1997). In Brazil if you live in a favela, you are considered by those who do not live in a favela as a criminal (Johnson 2012). In Israel-Palestine, just being Palestinian makes many Israelis consider you a terrorist. In the Israel-Palestinian conflict, this way of thinking is also political and military doctrine. As Weizman explores in his critique of the state of Israel’s war tactics in the hands of Ariel Sharon that merge the conflict with individuals as related to the urban form that they occupy:

Sharon began to view the conflict with Palestinian guerrillas in the Gaza strip as an urban problem that must be addressed by the transformation of Palestinian cities and refugee camps, which he named the 'habitat of this terror' (Weizman 2006).

Sharon’s "habitat of terror" statement, implies that the urban form is an active participant in the conflict. Thus, it is a rival that needs to be eliminated. The formalization of the destruction and reconfiguration of the Palestinian city is what Weizman called the "Matrix." The matrix is a circulatory grid of streets that cut in a similar way that Haussmann cut the historic fabric of the city of Paris, which permits the undisturbed flows of troops and tanks through the Palestinian cities. The state of Israel modified the labyrinth urban form of Palestinian cities from physical informality to the rational geometric grid that gave back to the army of the State of Israel the military advantage.

To understand why the dissection of Palestinian cities is so important, it is necessary to put this idea in conversation with U.S. urban warfare strategies. Major Robert E. Everson (Everson and U.S. Army Command and General Staff College. School of Advanced Military Studies. 1995) in his Standing at the Gates of the City: Operational Level Actions and Urban Warfare Place, argues that urban warfare is a more
complex endeavor than traditional warfare. He warns about deficiencies of technologically advanced armies, such as the United States troops' struggles to confront urban battlefields. He writes:

*Tactical urban combat creates a battlefield in which most engagements are fought to the bitter end. Units making contact collide with the enemy in close quarters and opponents can easily become decisively engaged. One or both sides quickly lose its ability to maneuver. Operational planning for urban warfare has to consider that combat units have a high probability of being used only once before major reorganization or reconstitution must occur. The U.S. Army is not prepared to conduct offensive operational and tactical level operations in urban terrain during a conventional war. More importantly, the (US) army is not prepared to pay the price for this type of combat* (Everson and U.S. Army Command and General Staff College. School of Advanced Military Studies. 1995)

An important contribution of warfare theory on urban conflict explains the role of space within urban environments as providing symmetry to unbalanced technological opponents. Everson, for example, explains how a “low-technology, foot-mobile army can establish symmetry with a high-technology, mobile army by selecting a large city as the battleground.” This, in a way, explains many of the unsuccessful policing and military operations in Medellin and in Rio de Janeiro. It also explains the predicament of states against their apparently non-symmetrical adversaries and helps explain the success of non-state armed actors in removing or absorbing other non-state armed actors in the battlefield of the favela-like environment.

Within the conflict literature that explores the role of criminal organizations within the context of failed state acknowledges the multi-scalar relationship of these organizations, cartels, highly organized gangs, terrorist organizations all operate inside a globalized world. In this context “failed community, ‘is used as a virtual analog of a 'failed state.'” (Sullivan and Bunker 2002, 41). Here the analogy is made with the so-called "failed states" in which the criminal organizations thrive in a vacuum generated by the lack of strong governance structures. City governance weakness, conversely, creates local vacuums within the communities that are occupied by the non-state organizations that depend on turf control. This research is interested in this scale of the community vacuums of state control.
THE ‘SLUM WARS’: THE INFORMAL SETTLEMENT AS A BATTLEFIELD

Understanding drug violence and its relationship to the spatial environments is important because as Koonings and Kruijt determine, up to 25 percent of urban territory in Rio de Janeiro, São Paulo, Buenos Aires, Bogotá, Medellín, and Guadalajara are what they call "disputed areas" (Koonings and Kruijt 2009, 14). Peter Reuter argues that "[O]ne reason for expecting violence in retail drug markets is that these markets have “geographic specificity” (Reuter 2009, 277). Many studies support Reuter’s finding that violence occurs in certain kinds of geographic areas: include two different studies of garrison communities (ghettos) in Kingston, the capital city of Jamaica, that are controlled by gang leaders (‘dons’) (Clarke 2006; Henry-Lee 2005; Blake 2013); a study of Rio de Janeiro gang violence and police documenting the use of ‘urban counter-insurgency’ tactics in favelas (Enrique Desmond. Arias 2006); a study of Indio Guayas, a squatter settlement in Ecuador where “law abiding citizens” coexist with “drug lords” (C. Moser 2009); and studies of Medellín’s multiplicity of “non-state armed actors” paramilitaries, guerrilla and gang members who take shelter in city edges up in the hills (Rozema 2008; Samper Escobar and Massachusetts Institute of Technology. 2010; Gutiérrez Sanín et al. 2006). While these studies expose the importance of territory regarding drug violence, they do not explore the role of the spatial environment and physical space, specifically how spatial forms of urban informality intersect with such conflicts.

Dennis Rodgers maps the evolution of Latin American civil wars as “a geographical transition from the ‘peasant wars’ (Wolf 1969) to ‘urban wars’ (Beall 2002)” (Rodgers D. 2009). He maps these wars as a continuation of old conflict in a “new spatial context” and gives these 21st century civil wars a new name: “slum wars.” In these new type of wars Rodgers explains that “violent conflict such as gang warfare and urban crime, although usually considered forms of ‘social violence’, can actually be seen as deeply political in nature.” (Beall et al. 2011, 3). This finding, again connects broad scale conflict with the local geography. In a similar vein, I argue that “slum wars” as a concept is also fundamental because it spatially represents the intersection of violence and urban informality within the “Megacity.” Rodgers argues that the “dynamics of these contemporary ‘slum wars’ suggest that this ongoing conflict is becoming more intense in the 21st century, largely as a result of this new spatial context.” (Rodgers D. 2009, 1).

MEDELLIN “SLUM WARS”: URBAN CONFLICT IN MEDELLIN A CASE OF STUDY.

Medellin, was once deemed the most-violent city in the world (in 1992) in great part due to narcotraffic. Over the last nine years, the Medellín city government has employed massive targeted urban interventions to address poverty, violence and drugs. This is a paradigmatic case in Latin America which can help understand ways that spatial environments, physical space and space as a social construct influences violence. Furthermore, the City of Medellín over the last few years has been waging a national and international marketing campaign to show the success of their urban interventions in poor and violent neighborhoods. This campaign called “The Transformation of Medellín” presents the city as born again from the ashes and as a thriving a safe environment for all citizens. Nevertheless, there are
fluctuation periods in violence in these “transformed” neighborhoods in Medellín. This is partly due, some scholars argue, to multiple motivations of non-state armed actors in Medellín to collaborate with state actors and at other times with non-state actors. (Sanín and Jaramillo 2005; Rozema 2008; M. Cardona et al. 2005; Angarita 2002). My previous research has revealed that non-state armed actors also sometimes collaborate with other non-state (drug traffickers, gangs, guerrilla and paramilitary groups) and state actors at the same time. It is common for non-state actors to fight for one group and then switch sides multiple times because they do not necessary fight for ideological reasons, but rather to financially support their family. This I call “a continuum of violence” (Samper Escobar and Massachusetts Institute of Technology. 2010, 40) community members are often caught in between these cycles of violence. This is because different non-state armed actors (such as guerrilla, gangs, and paramilitary) are often deeply connected with the illegal drug trade in informal neighborhoods in Latin America, a connection that scholars call “the synergy of drugs and insurgency” (Rabasa and Chalk 2001). This synergy of trade and spatial control identifies one reason why the formal state has not been able to maintain control in informal spaces. It raises important questions about how conflict relates to the nature of the informal space. As a non-political issue but one were one of the constants is turf control.

This synergy motivates the wars happening at the scale of the favela-like environment. In Medellín and Rio, the different factions of armed actors (drug lords, guerrillas, and right wing armed groups) fight for areas of control. Territories change factions constantly. Another kind of external actor appears. In the case of Medellín, Milicias populares (Urban left wing guerrillas) and the paramilitaries are military non state groups that fight the state at the national scale and apply to an urban environment a modified version of their rural combat strategies. In Rio de Janeiro, there is the external actor of the militias (state dissident groups, not to be confused with the left wing milicias populares of Medellín), who combat the drug lords using a combination of state-learned tactics and techniques used by their drug lord rivals. These groups are actually trained military and police personnel that use drug lord techniques of extortion (A. Zaluar and Conceição 2007).

A key aim of this research is to understand why the state has been unable to eliminate drug violence in specific neighborhoods in Medellín. This inability may be explained by the presence of a core power fueling non-state actors’ control of drug trade and thus control of “their” spatial environments. Today rapid informal urbanization is happening all over the world and urban conflict is being mapped alongside that of urban development. The intersection of “Non-State Armed Actors” (D. Davis 2009) who act in Thomas P.M. Barnett’s “Non–Integrating Gap” (Barnett 2004) that areas of the world not control by hegemonic capitalist system in the so called “fourth generation wars” (Lind 2004) wars now fought not between states but instead between states and non-state actors, provides the global context to understand how Rodgers concept of “slum war” translates to the international sphere. It also provides the international context to see how the city and urban informality can play a fundamental role in providing the space for the intersection of these two concepts at the interior of the “megacities.”

Medellín is a key case where main variables of urban informality and conflict intersect. The following Chapter III frames the context of informality and space and Chapter IV and V brings together the ideas of informality and conflict which I explore as variables in my examination of the last forty years of informal urban development and conflict in the city of Medellín.
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970S-2013)
CHAPTER 3. UNDERSTANDING SPACE AND THE EVOLUTION OF INFORMAL SETTLEMENTS

The concept of “slum wars” differs from traditional conceptions of urban war in a core dimension: it presupposes a conflict that is spatially bound. Within such spaces developmental issues related to poverty intersect with conflict and violence. This chapter unpacks this spatial dimension of “slum wars.” This chapter first explains and limits the scope of space as the main variable of this research and then explores different disciplinary approaches to understanding the space of informal settlements. Much of the literature has focused on understanding informality as an urban pathology and has concentrated on solving this “disease” by using modern ideals or by focusing on de-spatialized techniques. This chapter argues that a significant vacuum exists in the discipline regarding understanding the patterns of development of the most-common form of urban development on the planet. The chapter concludes that some old and new research is shedding light on explanatory analytical tools to understand the phenomena of informal settlements by identifying key patterns that relate the physical form as changing in prescriptive ways. Those patterns of development present informality, for the first time (in this kind of academic literature) as a rational and predictive urban model (one that can be described and forecasted) in which the variable of time-space (how the form evolves over time) plays a fundamental role to explain the apparent randomness of the development process of informal settlements. Conflict then, in this informal settlement, is constrained by time-space variables in ways that help to explain some of the differences between formal and informal conflict. The next chapter (Chapter 4) focuses on a horizontal study of informal settlements with conflict over four decades in the city of Medellin to find the moments of intersection between this key variable of time-space change and its relationship to violent conflict there.

DEFINING “SPACE” AND SPATIAL ENVIRONMENTS

In his 1993 book *The Construction of Places Through Spatial Practices*, David Harvey argues that the material practices and experiences entailed in the construction and experiential qualities of place must be dialectically interrelated with the ways they are both represented and imagined. Harvey responds to three questions he forwards from Henri Lefebvre’s 1974 *La Production de l’espace (The Production of Space)*:

1. How are places constructed and experienced as material artifacts?
2. How are they represented in discourse?
3. How are they used as representations, as symbolic places, in contemporary culture?

Lefebvre and Harvey explored these questions in theoretical discussions applied to a broad swath of urban spaces. These scholars emphasized places and spaces as social constructs and discursive representations. My research explores these same questions, with a twist. First I explore these theoretical
questions in a specific time and place (three districts in Medellín, 1970s-2013). Second, I define physical space in urban planning terms to denote two concepts. (1) I distinguish between (a) space as a mental construct or experience and (b) physical space as a tangible object, such as a house, street, plaza, garden or mountain. (2) My research involves intentionally disaggregating specific dimensions of physical space so I can study the way actors strategically negotiate a discrete object (a house, a road) and how this object impacts security in the environment. I study how a discrete object interacts in relationship with other objects in the same physical space. In other words I explore the tensions between the space as a mental and experienced and the tangible object. To do this, I study a neighborhood in terms of what I call its “spatial environment” (the combination of topography and built objects such as houses and bridges and open areas such as plazas, gardens and streets within a specific climate). Thinking about space in this way, I argue, is fundamental to understanding relationships between physical space and drug violence in Medellin. For example, when I study the physical space of a plaza, I mean the bricks, trees, water fountain, benches and the voids in between. When I study socially constructed space in this same plaza, I mean what happens in the plaza, the interactions between people and how they negotiate culturally and other socially constructed codes.

INFORMAL SETTLEMENTS AS A PARTICULAR ‘SPACE’

Urban informality has many names in different geographies: favelas in Brazil, townships in South Africa, tugurios in Medellin, pueblos nuevos in Peru, slums in India, kampungs and bidonvilles ashwa‘iyya in Egypt (Khalifa 2011). The United Nations still uses the term “slum” for the condition of urban informality and defines it as a “a heavily populated urban area characterized by substandard housing and squalor” (UN Habitat 2007). The word slum with its multiple meanings has been used since the 1820’s as a way to call attention to the unsanitary conditions of the housing of the poorest citizens (Lemma, Sliuzas, and Kuffer 2006). Now the term slum has many meanings. It generally refers to an areas inhabited by extremely poor individuals with lack of land tenure and characterized by low quality or informal housing. Structures there can vary from simple shacks to well-maintained multi-story structures (Khalifa 2011; Habitat 2003).

Alan Gilbert postulates that the return to the terminology of "slum" is dangerous (Gilbert 2007). In the contexts of this study, I found helpful the use of the word slum, because it highlights the pejorative act of labeling these places, structures and residents as both a social aberration and an urban pathology. These characterizations of aberration and pathology are two labels that I disagree with, however, these very labels embodied in the word slum explains why urban projects that intervene in such spaces focus on slum eradication. The fact that the eradication of informal space is used as a means to address social aberration and pathology, is tacit acknowledgement of a connection between the two. To conclude that this is a misguided strategy is to recognize that there are social values to informal space that can be preserved.

Here, I define slum not as social or urban pathology, but rather as the byproduct of a capitalist society. It represents failure of the economic and political system to provide quality of life to all world citizens. Neither the phenomena of what some people call slums nor the reasons why individuals live in them, are
not the result of personal failure, as was mentioned often in the studies of the early 1940s and 1960s (Rua and Rua 1966; Stokes 1962). On the contrary, I concur with scholars who argue that these spaces and people who construct them and live in them are bypassing the gaps of our ailed economic system and are there a result of (and/or solution) to than a pathological symptom (S. Brand 2010; Roy 2011; Rao 2010; Roy and AlSayyad 2004). In those terms Alan Gilbert affirms that “rather than providing a threat to the political and economic system, invasions and pirate urbanizations actively support it.” (Gilbert 1981, 657).

The absence of a clear name for these informal spaces is symptomatic of the multiplicity of the phenomena and how complex it is to establish the defining characteristics of a slum. Instead of entering into the large debate about the accurate (or politically correct) labeling and definition, I have opted to define what this study considers to be urban informality and what I mean when I use the term slum and why.

Given its global scale (M. Davis 2006), informality is the most common type of urban form on the planet. Some authors define informality, for example, as the predominant characteristic of the urban form of African cities (Kihato et al. 2013). Urban informality comprises one-third of all urban form and this number will increase to one-half of all urban form by 2050 (Ballesteros 2010). Urban informality is a type of urban development characteristic of "Megacities" (Koonings and Kruijt 2009), in which the urban development logic governed by the regulations of the state and the capitalist system have been subverted. As such urban informality is a physical space that is both inside the regulated and sovereign capitalistic and state system, and outside of it. To explain in a simple way a slum is both regulated by the state because it is located within its boundaries and outside (and in a way sovereign to itself) of them just because its existence violates the established rules. This is why one of the most salient features of urban informality is the lack of legal land titles in the territories it inhabits.

The key characteristics that define urban informality for this case study are the following:

- The Instability of (land) title, which is the result of occupying the land in violation of official city code.
- Naming a territory as informal acknowledges this territory as a space where state rule is challenged.
- Foundation and evolution urban development processes in which self-construction is a salient feature.
- Extreme poverty.
- A particular urban pattern distinct from formal (planned) urban forms “confirms physical separability of slums from formal settlements” (Taubenbock H. 2014, 35).

Now that we have a definition in place, it is important to examine disciplinary understandings of such spaces and the limits of their current definitions of slum. This is necessary to be able to see even, let alone analyze, the role of space in the conflict in the territory defined as urban informality.
SOCI OC AND PLANNING DISCIPLINE AND INFORMAL SETTLEMENTS

Sociology is perhaps the most evolved discipline in its understanding of urban informality. It posits a provocative question of informality as existing before the appearance of the formal urban realm in the early 18th century. Nezar AlSayyad argues that “many features of the formal/informal dichotomy may owe their origin to unresolved issues in this historical process” (AlSayyad 2004, 25). Other sociological lines of thought define informality as the result of the ongoing process of globalization and the application of neoliberal capitalist practices that exclude large segments of the population (M. Davis 2006; Shatkin 2004). In this regard, Ananya Roy provides an interesting perspective, arguing that “the urban growth of the 21st century is taking place in the developing world, but many of the theories of how cities function remain rooted in the developed world” (Roy 2005). While urban sociology provides a new epistemology for understanding urban informality, it does so in a way that privileges social, economic and political issues. This work does not shed much light on the role of the urban form itself in the process of creating the informal city.

The lack of a coherent discourse about the physical space of informality stems from the disciplinary debates of the early 1960s, when academic publications in architecture, sociology and urban planning appeared about ways that modern urban practices of urban renewal have failed (Fried 1966; Gans 1962; Vale 2002). The collapse of modernist theories modified the discipline of planning into a more plural discipline that moved away from focusing only on the physical space of the city to include other dimensions of it (Sanyal 2005). At this time of urban renewal crisis, a new group of theories based on research in informal settlements in Latin America dismantled many of the “myths” about informality (Perlman 1976b; Turner 1977; Soto and Instituto Libertad y Democracia (Lima, Peru) 1989; Harris 2003)(Perlman 1976; de Soto 1989; Harris 2003). These theories especially question the myth that informal economies exist as separate from the formal economy. Instead, they argue, informal settlements are squarely part of a larger economic system. The connection formal-informal created the possibility of understanding that informal settlements are not a finite static object, but rather the result of a long process of socio-economic exchange and physical improvement with the formal means of production in the city at large.

PREDICTING DEVELOPMENTAL PATTERNS OF THE URBAN FORM OF INFORMAL SETTLEMENTS

A key staple theme in literature on urban informality (Caminos, Turner, and Steffian 1969a; Ward 1976; Turner 1977; Holston 1991; Caldeira 2000) is the territories’ constant state of construction. This happens across various dimensions: population size and characteristics, housing quantity, and quality and infrastructure. The fact that dwellers execute a constant state of physical flux that is not planned by private of public entities is regarded as one of the defining qualities of informal settlements all over the world. While the literature focuses on issues of the self-built nature of informal settlements and describes them as unfinished in nature, it tell us little about how this urban form impacts how communities develop in the context of these constant changes.
Most literature in urban informality is dedicated to the social implications of marginal urban poor (Perlman 2010; Perlman 1976b; Soto and Instituto Libertad y Democracia (Lima 1989; Roy 2005; Roy and AlSayyad 2004). The sparse body of literature on the physical aspects of informal settlements has focused primarily on the housing units within these areas, rather than on the logics of the urban form (Williams 2005).

In “The Form of the Informal: Investigating Brazilian Self-built Housing Solutions,” Fernando Lara challenges the idea of lack of urban order within informal settlements. He explains that to an outsider’s first glance these spaces appear to be organic and lacking of structure, but that "upon closer inspection, the logic begins to emerge. Although most buildings have not been designed by an architect, or had the input of engineer-in the strict sense of the term- they are no less logical than those which have been designed by professionals; they simply follow a different logic" (Lara 2010). Lara found incredible similitudes between modern building material and techniques in informal settlements. These kind of findings are supported by Alfredo (Brillembourg 2004) in his essay about “slum urbanism” (Brillembourg 2004). Lara finds the building techniques used in favelas in Rio are descendants of modernist ideas and opens a very interesting question, “How did the [Le Corbusier] domino’s scheme became so prevalent in [informal building in] Brazil and much of the developing world? (Lara 2010). He establishes a link between professional disciplines of the environment and the builders of the informal settlements. The builders of the modern Brazilian homes and buildings of Lucio Costa and Niemeyer, to name a few, are the same people who build the favelas of Rio de Janeiro and São Paulo.

The adoption of such construction techniques are not only the product of economic or stylistic process. I argue that it is, more importantly, a technical one. The Domino scheme’s largest virtue within informal settlements is that it fits perfectly within a model of city and buildings that are always growing. The
Domino is flexible enough to be adapted to any lot size and to any number of levels. This process fits with the philosophy of incrementalism within informal settlements (Figure 4). The incremental housing development is also the result of logic of economic savings within the household. Shaaban A. Sheuya finds that housing construction in informal settlements “is divided into two stages: start-up (the first shelter) and the successive transformation phases (improvements).” In the first stage people traditionally use their savings and in the second phase other systems of house self-financing are used instead of traditional monetary savings (Sheuya 2007). This includes the subdivision of housing units for rental uses as a way to access funds for future expansion. These subdivisions also are the starting point for diversifying single use housing into multiple uses.

![Figure 5 Architectes des favelas Didier Drummond phases of evolving consolidation phase one “implantation precarious shelters” phase two “transformation of shelters to sheds” phase three “solid construction” Source: (Drummond 1981)](image)

At the urban scale, there are profound implications of this incremental process in the constitution of the form of the informal city. In the Architectes des favelas, Didier Drummond studies the urban development of the favelas in Rio de Janeiro and based on his cases finds that the informal settlements go through a series of phases of evolving consolidation (see Figure 5). Phase one “is implantation precarious shelters”; phase two is “transformation of shelters to sheds” and “phase three is “solid construction” (Drummond 1981). In these three phases Drummond captures in abstract what is always understood as spontaneous growth. Lacking form, these mappings show the minimal, but key infrastructure additions that accompany and make each one of these phases of the informal environment viable. Susana Williams (Williams 2005) in her work on unit growth in informal units in Peru identified three similar stages of development described as: occupation, urbanization and development.

In my own research in Rio de Janeiro favelas (J. (jota) Samper 2013), it was possible to collect records which made visible how infrastructure was constructed through a myriad of partnerships that include community paid and built, a mixed process of state paid and community built or the new and more sophisticated state design financed and built. The following images (see Figure 6) map streets in the
favela Fernão Cardim in terms of historically, when communities did their own improvements and after the implementation of the state sponsored urban upgrading projects as it stands today. These images provide evidence that the continuous process of improvement involves not only infrastructure but also the housing units. Improvements at the urban scale, particularly those executed by the city are followed by improvements in the housing units. Infrastructure improvements change perceptions of tenure security, providing community members with some assurance that they will not be removed and therefore encouraging them to invest in their own properties.

In Medellin, Colombia, a community leader in an informal settlement and founder of her informal neighbourhood, narrates how when she arrived thirty years ago there were no paths or steps (paved or otherwise) to access this hillside community. This was important because in the frequent tropical rains residents and their children would slip and fall in the mud. It was nearly impossible to carry groceries from the city below up the slippery slopes flowing with mud just outside their homes. She explained she and her community organized among themselves to finance and build a path system. Community members here show that they not only built their houses (often as a family unit), but also, as a collective, they also built the urban infrastructure.

This small but significant intervention in the public realm supports the continuous process of upgrading and value adding improvements that are made to the units (Sheuya, 2007). Together these improvements add up to coherent urban environments that not only fulfill the function of housing, but that also include social, religious, educational and production areas. In Santo Domingo Savio, a neighbourhood founded by squatters in 1964, an original resident explains how the first precarious housing units were so small that ‘we needed to lean down just to come in’. She also narrates how the community united around religious ties and built new and improved public facilities that included public buildings, toilets, and the first neighbourhood school. The improvements in the private and public sphere followed the same pattern. As the neighbourhood becomes older, new investments are made in both spheres (public and private). The church along with the school at the Santo Domingo neighbourhood has been rebuilt three times in the last fifty years to accommodate the growing population and the availability of funds. Also, those low-

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ceiling shacks Marin de Mesa describes no longer exist, having been replaced by the Maison Domino scheme that Lara (Lara, 2010) revealed. Chapters IV and V focus on the spatial changes during the last four decades and maps the process explained in this narrative. Key here is that with time, the absent state began engaging also in these practices of rebuilding the urban environment. Maybe more important for explaining those community-state synergies is that today, besides the church, most other public buildings and spaces have some kind of community-state reconfiguration. The well known Parque Biblioteca España (Figure 8), seen in the lower image far left, was built there because the community members originally 50 years before had built their environment to create that space and social network to be the center of the community. In a similar manner, the public facilities and civic spaces built by the city in this informal settlements, have been carefully sighted and designed to reinforce the underlying urban structure designed by the inhabitants. This continuity in form-making and respect for local values can be sighted as one reason for the success of the program.

From these surveys of multiple geographies its clear that the continuous proces of improving the housing units happens also at the urban scale, in multiple iterations. What can we learn from this? From such analysis, it is clear that initial infrastructural interventions (public buildings, streets and paths) condition the way these urban settlements develop over time. In particular, the first public buildings become centers of commerce and locations for public space, where civic activities occur (outdoor markets, religious processions, entertainment). The development of paths, on the other hand, prioritize areas for future growth and development. In terms of expansion, the three phases of Drummond (1981) are valid, but it is important also to understand that the process is uneven, some houses consolidate earlier and that public amenities are part of all stages of that process.
In terms of growth, I contend that in a broad sense informal settlements follow a logic similar to formal urban growth. Given that most of these settlements are located in the periphery, they follow growth patterns akin to those identified in Dolores Hayden’s and Jim Wark’s 2004 catalog of suburbia. Hayden and Wark (2004) identify two main patterns: leapfrog and edge nodes. “Leapfrog,” is a pattern of development away from the edge of the city. This form of development is typical of new informal developments because they tend to jump territorial boundaries to areas still not included in the spaces for future development. It is a politically loaded issue to extend the urban perimeter because it implies incorporating informal settlements into the city (Naranjo and Villa 1997, 68).

“Edge Nodes” are formed when suburban malls are developed adjacent to the main the highway system, similar Edge Nodes occur when a new informal settlement creates a central that in turn is connected to the formal city. From this newly created node, the edge of development will start expanding outward until it finds an edge condition that would limit its growth.

Drummond’s three phases of informal development reveal the very nonspontaneous mechanisms by which informal settlements grow, resulting in predictable normative ways in which these urban environments evolve. This process could be called resident planning and is often understood in urban planning literature as “spontaneous growth”. Lacking externally determine form, these mappings show the effect over time of minimal but key infrastructure additions. Kellett and Napier (1995) explore the

**FIGURE 8 SANTO DOMINGO SAVIO NEIGHBORHOOD IN 1967 AND IN 2012. SOURCE: PHOTO ALBUM OF PRIEST GABRIEL DIAZ AND JOTA SAMPER**

Mankurd, Mumbai, India is an interesting example of such a process, which as seen in Figure 9, continued to expand until the edges of the river on the mangrove made it impossible to fill the land further. The final frame shows state evictions in 2009.

Drummond’s three phases of informal development reveal the very nonspontaneous mechanisms by which informal settlements grow, resulting in predictable normative ways in which these urban environments evolve. This process could be called resident planning and is often understood in urban planning literature as “spontaneous growth”. Lacking externally determine form, these mappings show the effect over time of minimal but key infrastructure additions. Kellett and Napier (1995) explore the
built form of the informal dwelling as opposed to a the entire settlement. In their article entitled “Squatter Architecture?,” they propose to view the self-building as well as the final product. Kellett, Peter, and Mark Napier find that “there has been a virtual absence of empirical data on "squatter architecture" (Kellett and Napier 1995, 7).

To fill that void from the "space syntax" school of Bill Hillier (1996) a new group of a studies is emerging that explores urban growth and is tackling two problems that researchers find when trying to understand informal settlements. One of these problems is the creation of precise mapping. Large numbers of informal settlements are still unmapped and their continued process of growth makes it a challenge to accurately formulate policy and project prescriptions. A vast amount of the literature in informal settlements focus on this deficiency (Hasan 2006). New advances in aerial photography processing are emerging to provide better and more accurate mappings of these areas (Mayunga, Coleman, and Zhang 2007). The second and maybe even more elusive problem is the creation of predictive models that can forecast growth of informality. Augustijn-Beckers (et al 2011b) simulates growth in informal settlements using “An Agent-based Housing Model.” He argues that this model “can successfully simulate the housing pattern of informal settlements growth”. Fabiano Sobreira, and Marcelo Gomes found that informal settlements “present robust configurational patterns” and from these patterns they could predict how an informal settlement will grow. To do this, they created descriptive geometric models for informal settlements (Sobreira and Gomes 2001, 2) and thus, they can map slum geometry in terms of ways that urban growth changes in shape and size over time (Barros and Sobreira 2002). Patel, Crooks and Koizumi (2012), in their efforts to develop a model to simulate the unique conditions of informal settlements, propose a new term for the process of mapping and forecasting: “Slumulation”. Furthermore Amit Patel, Andrew Crooks, and Naoru Koizumi in “Simulating Spatio-Temporal Dynamics of Slum Formation In Ahmedabad, India,” use this approach to think about the relationship of time to the spatial location and growth present and future of informal settlements (A. Patel, Crooks, and Koizumi 2012). This perspective has motivated research and the creation of predictive models to control growth (Sietchiping 2008; Beardsley and Werthmann 2008). In this new technological approach to understand informal settlements a key outcome is the ability to model and predict “growth and consolidation”. This new capability provides data that corroborates and adds detail and precision to the first series of categorizations of Drummond.

Drawing on the research about growth and informality, plus my own work, I describes stages of development in terms that are more useful to understand both physical and social evolution. The aim is to understand not only how growth happens physically but also its implications for the ways different
actors relate to each other in the various stages. The stages of development are: (A) Foundation, (B) Infill and (C) Consolidation:

A. **Foundation**: The first moment of creation as a group of homes, by a cohesive community of dwellers that act collectively.

B. **Infill**: An increase in density and the eradication of open space between units as a result of the growth of existing units and the final use of open spaces left in-between units' and the delineation at the final form of the public space.

C. **Consolidation**: This is the final moment of integration with the urban form, at which point some informal settlements will get successfully integrated into the urban form.

An important question emerges from this classification. What do these phases of change in the physical and social networks in the informal settlements have on the ways the conflict happens there?

**IS TIME-SPACE A VARIABLE IN THE “SLUM WARS”?**: THE MISSING LINK IN JANIS PERLMAN’S WORK

Janis Perlman in her seminal work "the myth of marginality" (Perlman 1976) contradicts the literature at the time and builds on the emerging ideas of the 1970s regarding favelados (people who live in favelas) as an emerging entrepreneurial class. Her latest work "Favela" (Perlman 2010) focuses on her original sample of interviews to re-visit her position after 40 years. She now proposes instead the disheartening proposition that after 40 years those communities continue to be marginalized. She finds that there are noticeable differences between families who stayed in informal settlements and those who relocated to state-sponsored projects (conjuntos and loteamientos), who her study claims weathered better in the sense that they have higher upper mobility and quality of life (measure by Perlman SOS scores) than their informal settlement counterparts.

The Perlman findings pose puzzling questions. How can this outcome be explained, given that she sees a difference between two urban forms (formal versus informal)? What is the role of urban space and design as a variable in what Perlman sees as different outcomes?

I think Perlman and others who focus on conflict in areas of poverty and urban informality miss important variables that are core to the definition of those spaces of informality: that is, their state of constant urban change. They fail to account for the effects of this intrinsic changing urban form over the social and criminal structures of the informal settlements. The important question then is this: What are the effects of the ever changing nature of informal settlements on the social organizations that operate within the informal settlements? When Perlman revisited the same group of families that her research targeted 40 years later, she had expected to find a noticeable improvement in the quality of life, including upward mobility in terms of socio-economic means.

What she found, however, was that most of these families were in lower socio-economic levels than she had surveyed them before "the marginalization of the urban poor became a self-fulfilling prophecy" (Perlman 2010, 333). Her conclusions here fail to notice two important contexts, which are the basis of
this research. First, informal settlements are always changing in terms of population and physical form so
the quality of the buildings and units and public realm had changed greatly over forty years -- better
quality services, space, etc. and these changes should have influence in the quality of life and social
conditions of the original dwellers. Second, the families she was visiting live under conditions of violent
conflict and this new condition greatly influences a sense of belonging to the a larger democratic system
and should have a large influence on the levels of marginalization of informal communities. While
Perlman found violence as the single most distinguishing fact of favelas today and those she maps 40
years ago, she fails to connect that condition of living under the pervasive coercion exerted by drug gangs
as really accounting for the present marginalization that her research finds.

These two variables that she did not account for are the ones that actually influenced the result of her
research. The constant urban change and conditions of violent conflict changed the structural conditions
of the informal settlement. Perlman’s study did not incorporate these changes in structural conditions
because her focus was on surveying the socio-economic status of family households independent of the
urban form.

TIME-SPACE
This spatial-temporal dimension (Amit. Patel 2012), then, is the key quality that differentiates these
informal areas from the formal city and should provide answers for how the conflict plays out in and
impacts the space. The time-space variable that defines very distinct moments within the informal
settlements does not explain why the violence exists, nor how the conflict happens. The time-space
variable, rather, conditions the intensity and form of violence. For this the Medellin city as a case study
should serve as a good example of this evolution process and relationship of conflict and informal
settlements.

I argue here, based on observations in Medellin, that informal settlements grow exponentially from the
moment of foundation to a plateau around the consolidation stage where density and growth are at their
maximum, and that these changes have profound effects on relationships among inhabitants (social ties,
alliances, community management, economy, etc.), and on the organizations that engage in the space of
the informal settlement. Furthermore, I argue that this exponential growth erodes and fragments social
ties which in turn weakens social structures that previously were more able to hold conflict actors at bay.
On the other hand, this growth increases market opportunities both for illegal and legal activities that
along with the increase in the numbers of violent actors, permits their integration into violent social
organizations. The violent groups perceive the non-violent groups (such as community associations) in
the informal settlements as their enemy.

To test this assertion, the following chapters (Chapters 4 and 5) will provide evidence of these changes by
comparing timelines at the neighborhood and city levels. These timelines are constructed with two types
of data: community resident narratives (qualitative) and physical mappings and measurements of growth
at the neighborhood and city levels (quantitative). The timelines focus on two issues: (1) urban
development and (2) urban conflict.
CHAPTER 4 TIME-LINE: SPACE OF INFORMALITY AND CONFLICT, FOUR NEIGHBORHOODS AS CASE STUDIES.

This chapter is divided in two sections. The first one places this study within a history of the parallel evolution of informal urbanization and conflict in the city at large over the last four decades, and how these two phenomena have changed over this time period. This context provides a framework to understand the second section in which I examine four case studies (informal neighborhoods) in detail.

CITY SCALE TIME-LINE SPACE OF INFORMALITY AND CONFLICT: FOUR DECADES OF INFORMALITY AND CONFLICT IN THE CITY OF MEDELLÍN.

This section analyses the history of Medellín’s informal development and conflict. It does so by looking at the city scale evolution of demographic change, urban development, informal development and conflict over four distinct periods spanning 1970-2010. The goal is to understand the evolution of conflict and urban space at the metropolitan scale to establish a context for analyzing what happened at the scale of informal settlements.

INFORMAL DEVELOPMENT IN MEDELLÍN GENERALITIES
The term slum, as explained in Chapter III, has a myriad of meanings. Table 2. Types of informal development in Medellín explains some important distinctions of the different typologies of settlements that are part of this research.

| Table 2. Types of informal development in Medellín |
|---------------------------------|---------------------------------|---------------------------------|
| **INVASIÓN**                    | **URBANIZADOR PIRATA**          | **AUTO-CONSTRUCTION**          |
| **DEFINITION**                 | LAND IS APPROPRIATED FROM ITS LEGAL TENANT WITHOUT HER OR HIS PERMISSION. | THE OWNER SELLS LAND TO THE NEW OCCUPANTS. THE OWNER DIVIDES THE LAND AND ASSIGN LOTS TO THE TENANTS. LAND IS NOT REGULATED FOR SUBDIVISION OR SALE. |
| **LAND TENURE**               | NO LAND TITLE                   | RECORD OF ECONOMIC TRANSACTIONS SOMETIMES SERVES AS A TITLE. |
| **PUBLIC SERVICES**           | NOT PROVIDED AT INITIAL STAGES. | NOT PROVIDED OR LIMITED AT INITIAL STAGES. |

Lots are developed along legal codes and sold to future tenants who later will build their housing units.

Land Title + Construction Permit.

All services provided.

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ANALYZING FOUR DECADES OF CONFLICT AND VIOLENCE IN MEDELLÍN.

The periods of analysis coincide with four decades. This temporal division is not clean cut but, rather, serves to identify a series of overlapping themes. Many of the issues intersect over these selected periods. The division among decades is based on similar temporal breaks defined by other authors of the history of conflict in Medellín (Angarita, Gallo, and Jiménez 2008). Those decades respond to particular conditions of conflict.

One of the unique features of Medellín is the varied number of illegal armed actors that have operated over the past 60 years. Medellín’s history can be divided into periods related to the occupation of such actors. In Dinámicas de guerra y construcción de paz. Estudio interdisciplinario del conflicto armado en la comuna 13 de Medellín, Angarita et. al. (Angarita, Gallo, and Jiménez 2008) provide an example of such temporal division. Here I have expanded on the stages they outline by adding information from the city scale that refers to the four neighborhood areas of study.

MEDELLÍN PRE 1970S

In contrast to its more recent image as a violent city, Medellín represented a "utopia of progress" in the first half of the twentieth century (Jaramillo, Melguizo, and Martínez 1998). Economic progress was achieved by tightly interwoven connections among the private sector, political power and the moral control exemplified by the power of the (Catholic) church. This created an elite, wealthy class that exercised ample social control. Medellín developed as the industrial capital of Colombia and as one of the leaders of the industrialization in Latin America, providing space for upper mobility of the labor force (Farnsworth-Alvear 2000). This process peaked at the end of the 1950s, coinciding with political and security crises of the period call “La Violencia” (Bushnell 1993), in which large numbers of peasants who were fleeing violent conflict from left wing insurgents in the countryside, flooded the main cities of the country. This is also the moment in which the globalization effects of the Colombian government’s protectionist policies (Import substitution Industrialization ISI) on its industries led to stagnation and demise of the industrial model in the city of Medellín. These two process of violent political crisis and the un-competitiveness of local industries triggered dramatic changes in cities that were receiving large percentages of displaced rural populations. This process of rural-urban migration is not dis-similar to other cities in Latin America (Gilbert and Latin America Bureau. 1994). What is different in the Colombian case is that this migration happened in the context of extreme rural violence that impoverished rural migrants and that created conditions of conflict that are still visible. It is at the end of the “Violencia” in 1959 that the guerrilla movement in Colombia is born. And is also during the same “violencia” (1949-1959) period than the first Paramilitary groups appear, there two non-state actors (guerrilla and paramilitar) are essential to understanding the history of conflict in the city of Medellín.

By the 1970s, rural migrants were arriving to an industrial city in crisis. In other words the city had no jobs or infrastructural support to offer. The business of illicit drugs starts in this context (Roldán 1999). In planning terms, the Medellín pre-1950s was a very organized city, a city that was building a thoughtful development plan based on the needs of its elites (Uribe and De Greiff 1981; Botero Herrera 1996;
Schnitter Castellanos, Universidad Pontificia Bolivariana (Medellín), and Area Metropolitana del Valle del Aburrá (Antioquia 2007; Samper Escobar and Massachusetts Institute of Technology, 2010). It is within the context of this crisis of migration and lack of jobs that the informal city of Medellín grows.

By the second half of the 20th century, this Medellín-as-“utopia” (Marden 1940) portrait in the media entered into crisis and a new city emerged from the construction of multiple informal neighborhoods, which in Medellín are called “barrios piratas” or “invasions.” From 1950 to 1960, the urban population in Colombia grew three-fold, and the cities had an urban growth between the 95 percent and 98 percent. Most of this urban growth was characterized by illegal self-construction by the arriving rural population (Jaramillo, Melguizo, and Martinez 1998). From the 1960’s onward there is an increase in the informal economy given the lack of job supply from the traditional employment sectors of the city (Jaramillo, Melguizo, and Martinez 1998, 13). By the 1970s, those effects are felt with more strength and the period 1970s to 1990s is coined by John Betancourt as Medellín’s decade of “decadence” (J. Betancur 2007). Consequently, over this period, the “harmonious” contract between the state and elites developing the future of the city was lost. All planning efforts at this stage were dwarfed by the state’s inability to cope with the unexpected exponential rise in population and the economic stagnation of the city’s industries.

Nevertheless during this time of crisis the state via the Instituto de Credito Territorial ICT, experimented with successful low-income housing projects that did reach some poor populations (Caminos, Turner, and Steffian 1969b). Unfortunately, those projects were not large enough to provide for even a fraction of the arriving populations. In the 1980s, the state suspended this affordable housing effort. Instead of building houses, the state continued facilitating loans to buy homes. The planning department also focused on road infrastructure. These projects were politically more acceptable parts of the regulator plan by the municipal adminsitration these projects did not have the legal restrictions that projects in areas of informality had given the problematic land tenure situation.

The phases of this struggle are difficult to define because general power transitions held by one group to the next did not happen instantaneously. For example, the “Milicias” period in Medellín (Urban Guerrilla group), which is considered a phenomena of the 1990s, had its first incarnations in the “campamentos Colombia” of the early 1980s. Various authors and sources have different opinions. It is clear, however, that transition moments from one group to the next coincide with moments of intense conflict: one group kills the other to take its territory.

This evolution of conflict may be divided into the following decades and themes:

- **1970 - 1980** Economic decline and illicit drugs market.
- **1980 - 1990** Specialization of gangs and the war on drugs.
- **1990 - 2000** Gangs without bosses give way to Milicias transition to from leftwing to rightwing.
- **2000 - 2010** From hegemonic control to fragmentation.

I have compared each decade-theme across four variables that serve to measure and provide a more clear comparative visualization of change over time. There are four variables. (1) *Population* is an overview of growth both from a qualitative and quantitate point of view. (2) *Type of Conflict* maps the evolution of conflict, describing the different actors and their motivations throughout the selected
periods and explaining transitions between one type of conflict to the next. (3) *Urban Development*
follows the evolution of urban physical form at the metropolitan and city scales. (4) *The Typologies of
Informal Settlement Occupation* show how informal neighborhoods behave in each decade. For a detailed
explanation of what happened in each one of these decades in each of these four variables, please see
ANNEX 1 "Time-line space of informality and conflict: four decades of informality and conflict in the city of
Medellín." Below is an outline of what happened in each decade.

- **1970 - 1980**  
  **Economic decline and illicit drugs market:** In the 1970s, Medellín was a very
different city than it is today. In this decade, the city was marked by the stagnation of manufacture
industries that have undergirded the city’s economy for almost a century. This decline in legitimate
industry, created a space for the new market of illicit drugs to evolve from the existing networks of
black market goods (such as cigarettes). Large migrations from the rural areas result from the
national conflict and the process of urbanization that other Latin American countries are
experiencing. This decade is characterized by large invasions. Arriving populations are, by and large,
not able to find jobs in the collapsing industries of the city.

- **1980 - 1990**  
  **Specialization of gangs and the war on drugs:** In these decades, narcotraffic lords
exploit gangs in poor neighborhoods, which escalates conflict in response to the government’s
alliance with the United States in its “War on Drugs." The end of the 1980s marks the highest levels of
homicide in the history of the city. Projects for the eradication of poverty motivate the national
government to support and legalize (give land titles) some informal settlements. The first projects of
urban upgrading happen in the city. Along with state projects that support informal settlements,
narcotraffic also produces urban projects in these areas as a way to obtain legitimacy.

- **1990 - 2000**  
  **Gangs without bosses give way to Milicias’ transition to from leftwing to rightwing:**
The beginning of the decade is marked by the intense fight against the Cartel organizations that
characterized the 1990s. In this decade, there is a transition from the drug Cartel conflict to the
guerrilla and state conflict. Specifically, in the City of Medellín, this also meant a transition in terms of
approaches and justifications for the conflict. In the Cartel phase, *state* politics were used by
government and military leaders as an excuse to justify conflict on economic terms. In the transition
to the guerrilla and state phase, this moved from the state level to the national and was justified
more in terms of a political conflict. This change from “economic” to “political” means that now Non-
State Armed Groups (NSAG), who fight the state at the national level, brought their conflict and
violence to the city. By the end of the decade, the Milicia groups dominated most of the informal and
poor areas of the city. I argue that the decentralization of the municipalities in specific the elected
mayors introduced by the new Constitution of 1991 lead to mayors to be more responsive to
constituencies that lived in informal areas. It is during this decade, that members of the state build on
previous experiences with community engagement in housing improvement in informal areas, such
as the Programa Integral de Mejoramiento de Barrios Subnormales en Medellín (PRI-MED) (J. J.
These projects served as the basis for the large urban integrated projects of the next decade. This is also the period of the metropolitanization of the city with the Metro, which now runs from one end of the city to the other, as a key project leading that transformation.

- **2000 - 2010** From hegemonic control to fragmentation: The fight between leftwing and rightwing NSAG (Milicias and AUC respectively) was won by the AUC with covert help from the national government. In 2003, a peace process with the AUC demobilized the large organization. The Demobilization, Disarmament and Reintegration DDR process with the AUC, involve the turning of weapons and the demobilization of more 2,000 members just in Medellín. but members of the demobilized AUC continued to operate clandestinely until the break of peace accords and the extradition of key figures to the United States. The breaking of accords and extradition of key figures triggered another fight for power within a very fragmented ecosystem of illegal gangs called by some, Bandas emergentes en Colombia or bandas criminales emergentes (Bacrim). By 2010, a new process of power consolidation began involving new and old franchises of crime.

This last period is characterized by a series of experimental large-scale urban interventions in poor areas. This began with the creation of the first urban public transportation system, the metro cable, in 2002, and the integrated urban projects (PUI) from 2004-2011. From 2003 onward, Medellín has undergone an internationally renowned urban transformation (Kimmelman 2012), which itself has been part of a controversial nationwide peace process (Bouvier 2009). This was implemented under Sergio Fajardo’s term as Medellín mayor (2003-2007) and continued under the next two mayors Alonso Salazar (2008-2011) and Aníbal Gaviria (2012-2015). Internationally and locally, people perceive Medellín as an entirely different place than its most recent violent fame. The city of Medellín is seen as an example of how to engage with conflict and violence thru urban peace process. So many physical and policy initiatives and projects were generated in this period that the city of Medellín has not kept consistent records of the process, nor stored the existing records in a single place. Different departments of the city give different accounts of the same process that all came to be called ‘the transformation of Medellín.’

Medellín’s intertwined history of informality and conflict is the result of the influence of the changing conditions of confrontation and the creation of new perverse markets. For the sake of this study, I present the general existence of urban informality as a constant over the four decades, with different levels of intensity. The following section zooms into that evolution of informality and conflict at a neighborhood scale, using four cases that exemplified conditions of urban conflict and violence in this context.
FOUR NEIGHBORHOODS IN FOUR COMUNAS

LOCATION OF COMMUNES AND NEIGHBOURHOODS OF STUDY

FIGURE 10. MAP OF AREAS OF RESEARCH: (1) EL TRIUNFO, (2) SANTO DOMINGO SAVIO, (3) INDEPENDENCIAS AND (4) VILLATINA.
Here I examine the impact of the citywide events I described in the previous section on the four case neighborhoods: El Triunfo, Independencias, Santo Domingo Savio and Villatina. I assembled the story of these neighborhoods based on field research semi-structured interviews, the Medellín mi hogar documentary records and other historical (archival, media) documents. I accompany these histories with mappings of physical growth elaborated from historical aerial imagery and data from municipality documents. All identifiers of interviewees have been removed to protect the safety of some. Therefore, I randomly assigned a code, (in the form of a 3 digit number), to each interviewee. As explained before, these four neighborhoods were selected because they are known for having both a long history of violence and also large levels of informal development, and as such they are studies of extreme cases.

Following is the history of the four main neighborhoods; I focus on three areas of content in these stories as ways to look for the intersection of urban form and the conflict:

**Foundational stories:** I focus on the following questions. How and where did these neighborhoods appear? What are the social organizational structures that help them to get developed? What are the physical characteristics that inspire people to choose places to develop informal areas? Since land taking and illegal development are key features of the informal city, I focus on stories and interviews with neighborhood founders and community organizers regarding their take on their involvement in the kind of social organization and activism necessary to guarantee the permanence of their communities on these sites. Since all the neighborhoods that are part of this study are already included within the city’s urban perimeter, and the majority of their housing units legalized (in varied degrees), these neighborhoods may be considered special cases of success regarding informal development. They are just a sample of the multitude of other efforts that did not have the same luck (of becoming officially part of the city’s urban perimeter and thus having access to corresponding city resources) in the city of Medellín.

**Development process.** To understand the change in informal settlements, I map evolution of the neighborhood from that moment of foundation to the present. Trying to find key transitional moments. I concentrate on the development of public infrastructure, streets, provision of public services and any public amenities that are introduced during those periods both by community members as by projects of the state. For the story of the individual, I focus on his or her own development story from the arrival to the present, understanding how growth influenced their household way of life. I also focus on how the physical housing unit development related to the other housing around it.

**Phenomenology of violence and conflict.** Each actor enacts violence in a particular way, and conflict gets experienced differently over time, given that the typologies of the conflict mutate. Here I focus on those mutations (changes) and on how each actor produces conflict and how

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6 The final section of this chapter briefly describes 4 more neighborhoods chosen as complementary cases that help to illustrate issues of the four main cases.
community members were affected by that conflict. I look at ways actors use physical space within the neighborhood.

The final goal of these narratives is not only to have a clear historical narrative of each one of the neighborhoods, but also to encounter within those narratives, moments in which space and conflict intersect. This to identify ways in which space and conflict interact or ways in which one modifies or conditions the other.


<table>
<thead>
<tr>
<th>ESTRATO</th>
<th>FOUNDATION</th>
<th>TYPE</th>
<th>AREA (HA)</th>
<th>POPULATION (2002)</th>
<th>FISCAL LOTS TO TITLING</th>
<th>UNITS</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>UNIT/HA</th>
<th>PEOPLE/UNIT</th>
</tr>
</thead>
<tbody>
<tr>
<td>EL TRIUNFO</td>
<td>1980</td>
<td>INVASION</td>
<td>11.71</td>
<td>3,439</td>
<td>101</td>
<td>1,135</td>
<td>1,081</td>
<td>54</td>
<td>0</td>
<td>219</td>
<td>4.48</td>
</tr>
<tr>
<td>SANTO DOMINGO</td>
<td>1963</td>
<td>INVASION</td>
<td>56.13</td>
<td>18,890</td>
<td>2,394</td>
<td>6,645</td>
<td>1,625</td>
<td>5020</td>
<td>0</td>
<td>118.39</td>
<td>4.19</td>
</tr>
<tr>
<td>INDEPENDECIAS</td>
<td>1980</td>
<td>INVASION</td>
<td>25.42</td>
<td>14,460</td>
<td>1,109</td>
<td>4,553</td>
<td>4,373</td>
<td>180</td>
<td>0</td>
<td>179.12</td>
<td>3.17</td>
</tr>
<tr>
<td>VILLATINA</td>
<td>1940/60</td>
<td>INVASION/OTHER</td>
<td>40.66</td>
<td>10,619</td>
<td>1,395</td>
<td>4,286</td>
<td>1,781</td>
<td>2,505</td>
<td>0</td>
<td>105.40</td>
<td>4.5</td>
</tr>
<tr>
<td>PICACHO</td>
<td>1950/77</td>
<td>INVASION</td>
<td>41.77</td>
<td>13,010</td>
<td>-</td>
<td>4,245</td>
<td>2,313</td>
<td>1,658</td>
<td>4</td>
<td>95.49</td>
<td>4.43</td>
</tr>
<tr>
<td>ANTONIO NARINO</td>
<td>1961/70</td>
<td>PIRATE</td>
<td>39.39</td>
<td>12,336</td>
<td>-</td>
<td>4,488</td>
<td>615</td>
<td>3,496</td>
<td>377</td>
<td>113.95</td>
<td>2.74</td>
</tr>
</tbody>
</table>

Figure 11. Homicides from 2004 to 2013 in selected cases.
EL TRIUNFO, COMUNA 6

**05**

**Evolutionary Process of the Neighborhoods**

*Figure 12. Urban Growth Neighborhood El Triunfo 1989 to 2013. Source: Areal Images from the Medellín Planning Department.*
FOUNDATIONAL STORY:
El Triunfo is an invasion neighborhood in the Comuna 6 of Medellín. The first land taken there dates from 1982. Following the first building on this land, municipal organizations, including the control de obras, demolished these buildings and subsequent community members' rebuilding. This demolition-rebuilding process happened several times. At this stage (Stage1), the group that invaded was comprised of only 6 families, including Andres Bohorques, Andres Marin, and Falconery Usuga. Falconery, El Triunfo's co-founder and resident, narrates her story in her own words and images, many of which come directly out of her family photo album. (J. Samper and Marko 2010). This story narrates the process of invasion by a community and the state’s and other formal actors' subsequent efforts to evict them. Falconery explains that:

"The neighborhood was started by an elderly man, a friend of ours. We were tired of paying for rent because if we paid the rent; we could not feed the baby, and if we fed the baby, we could not pay the rent and so... he invited us to come with him to the top of this hill where he had got a piece of land for him... So we started collecting sticks and materials and began building our new homes... the owners denounced us [meaning the police came]. First, they knocked down our houses, then, the second time, they burned them down with the flag and everything. I sat to the side of the burning flag, watching my house and everything I had burning, and I began to cry. Because I knew, they were never going to leave us alone. Later when more people had settled, we were already 12 families, and we decided to get everyone together... and we all got on the bus and went down [downtown] to the government building to protest. We stood all of us with our kids outside the building... And so finally, they said yes, that we could live in our houses and that nothing would happen to them. So they (the governor) gave us a paper that said they would stop knocking down our houses and burning them. (027)

She then narrates how they looked at the paper and realized there were no signatures. So, they stopped the bus, turned it around and returned to the City government building, demanding that someone officially sign the paper. The city officials signed the paper and they all got back on the bus.

And when we got home, everyone started singing "We have triumphed!" And everyone was shouting "we have triumphed!" so we decided that since we had triumphed, we would call the neighborhood The Triumph (El Triunfo).
by a contestation over the land, resulting in attacks on informal communities from private and public entities. Through erasure of houses and lives, the state claims the land for the formal city and through reconstruction of their informal communities, desplazados reclaim what David Harvey proposes in global terms as the “right of the city.” Harvey defines this as “an active right to make the city different, to shape it more in accord with our heart’s desire and to re-make ourselves thereby in a different image” (Harvey 2003). In Farconery’s story, attacks are multiple and of increasing intensity, beginning with the demolition of the home structures, to burnings of the entire squatting territory. These attacks are done by both state and private actors. By the time of Farconely story, dealings with the municipality, the El Triunfo neighborhood had already 14 families. A decade later, about 200 families populated the neighborhood, based on accounts of the neighbors. This process of population growth continued to the present: by 2014, as many as 1100 families people there.

DEVELOPMENT PROCESS
The social organization system that permitted claiming the land even against the state initial resistance to it (demolitions) was also useful in helping them to obtain urban infrastructures, such as the provision of water, energy and sewer. In 1985, the water came from a small creek near the site.

We did not create a Junta [Junta de Accion Coming JAC meaning that they did not need the legal framework of the JAC to be able to organize]. We all talked about what to do. We got the water through hoses, the energy we got from [the city] below with some cables... Within five months (of first settling), we already had a supply. We got organized, and tasked groups with what to do. We looked at strategies of how, who and when. The water came from the mountain. The energy looked like a cemetery because of all the wood crosses to bring the cables from below. It was not good but at least it worked. (722)

Community members organized to create a water tank and to connect the houses to the system. They also organized to build both private and public infrastructure (houses and streets), a process they call gathering “convites” (literally meaning “invites”). Community members explain that they were a really cohesive structure. One community member said, “there was a lot of union and solidarity, we all helped each other, even for the building of the houses because all was made by self-construction” (722). One of those pieces of infrastructure that were built in the first years was the school, which in 2009 was demolished and rebuilt by the municipality. Little evidence of those original settlers' urban projects exists today in El Triunfo, because they have been replaced by state public projects.

At the end of the 1980s, they organized themselves to send a delegation to the nation’s capital of Bogota to ask the National Government (of Presidente Gaviria) to include the neighborhood in a national self-build project. This request was approved. The “El Triunfo” then entered into an in-situ upgrading project of self-building, a new layout of streets was made, and the first-floor brick houses were built by community members with materials provided by the funds of the national housing program. Later on that decade, the public services were provided by the municipality’s company Empresas Publicas de Medellín (EPM). Soon after basic needs were supplied, community members explained that cohesive and activist groups decreased in activity.
In those moments of the ranchos [the first self-built housing], every single one of us collaborated and. this changed after we finished the houses because the houses were made by self-construction, and once that each one had their own house, we started to isolate. (731)

Construction of the streets followed a similar process to that of first building the houses. The community group united to ask for funds to build the streets. The community groups worked in a very informal way, meaning that they were not registered as an organization. The community organization structure that helped to access land, ask for services and to build infrastructure stopped operating around 15 years ago. As one community member mentions, "The last convite was made many years ago." Even if convites are not part of everyday activities, the Junta de Accion Comunal JAC is finally created (J.A.C. El Triunfo Arrayanes). From that point on neighborhood improvements appear not to be motivated by community activism, as in the past, but rather by municipal strategies that tackle poverty with city-wide projects like the PRI-MED and the Integrated Urban Project PUI. Both of these projects had influence in this neighborhood.

**Figure 14 Urban development process of housing units**

<table>
<thead>
<tr>
<th>1980</th>
<th>1990</th>
<th>2000</th>
<th>2010</th>
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</table>

**EVOLUTIONARY PROCESS OF HOUSING UNITS**

(Figure with diagrams showing the evolution of housing units from 1980 to 2010.)
By 2001, nine years after the self-build process, most of the original houses had been replaced by permanent construction and had been expanded to include a second floor. The same family builds the second floors. In some instances, as in the case of one community member, the second floors are built and then occupied by the sons and daughters of the founders who live in the floor below. Figure 14 Urban development process of housing units maps the evolution of a housing unit in the neighborhood. It shows how the initial rancho served as a staging area for the future more stable home.

Today in El Triunfo, out of the 892 houses recorded in 2006 as part of the Comuna Development Plan 2016, there are only 24 houses built of fragile materials. Most units are built of brick, and there is a mixed finish from raw to detailed brick and stuccoed brick. There is a proliferation business in those units: small manufacturing of goods, mainly textiles and every block has a corner store.

In 2006, of the 3,998 people who live in El Triunfo, none was considered to be living in a substandard unit by the municipality of Medellín (107 rented rooms, 359 apartments, and 3,531 houses), an amazing achievement. The type of building materials that characterized the neighborhood were 27 of wood, 270 brick or concrete block, 54 finished concrete block, 217 finished brick, 324 brick or block plastered and painted. Floor material of the housing distribution was 648 concrete or gravel, 244 tile, wood or brick. The unit quality standard and proxy of income (estrato) were 805 estrato 1 and 87 estrato 2. And 4.5 was the average people per housing unit. Medellín has 6 estratos and from which 1 and 2 represent the lower income bracket.

The Comuna 6 and the neighborhood El Triunfo were some of the neighborhoods influenced by the PUI North-western from 2009 to 2011. The El Triunfo is inside of the area of influence of the PUI but none of the projects were built in the interior of this neighborhood.

**Phenomenology of Violence.**

Five types of conflict manifest with violence in the neighborhood of El Triunfo. (1) The first type relates directly with the foundation of the neighborhoods and deals with state actors (police) and private owners attacking the housing units that were created informally as part of the land takings. Successive evictions increase levels of uses of violence. The state uses the national police as the actor that produces the
violence while the community is deeply affected by this violence that is not (directly) enacted on the bodies of the community members, but on the goods and the materials of houses and their belongings. After the legal claim on the land is received, the state disappears as a mayor threat. (2) Then emerge small local gangs who profit from small theft. (3) Later, these gang members align with newcomers who bring with them practices of violence present in more consolidated and adjacent neighborhoods. Alliances between newly founded youth gangs in the neighborhood and outsider criminal groups increase level of insecurity and the typology of violence. (4) This phase is characterized by the introduction of the Milicias in the neighborhood that presented a more tight territorial control. The Milicias are then displaced by the (5) Paramilitary groups, that by 2003, will demobilize but continue illegal activities and maintain a very tight control of the territory thru violence.

Following the foundational violence described above, El Triunfo presents an escalation of a type of conflict, from regular theft to attacks, terror and murder. This escalation follows city-wide processes that happened at different periods, but specifically in the 1980s and the beginning of the 1990s. A quote from a community member narrates succinctly that transition:

*We started very peacefully, we took care one of another. After that an armed group [Milicias] arrived here, they started to put people here who were from other places, and they got together with the kids [already existing youth gangs] and that is when the deaths started. They would come to the houses and take them [the children and youth]. This happened just before we built [the brick houses], the new houses, like around 1989.* (722)

This period is characterized by turf control. Community members’ talk about the motivation of conflict has to do with the crossing of territorial boundaries. In the 1990s, the Milicias arrived in the neighborhood and they took control of the gangs and monitored who was allowed to enter the neighborhood.

*All those people who died... that was a horrible war. I think that was because of the invisible borders because if you were from [the near neighborhoods of] Aures, Castilla and el 12 de Octubre, they would ask. Why are you coming here? If they [the arriving person] answered that it was because they have family members here, they would walk you all the way to the house to make sure you were telling the truth.* (722)

The actions of the illegal armed groups are so interwoven with everyday activities, that it is common that community members, who were not participants in the conflict, then become involved in criminal activities, just because of the conflict’s proximity and because they are obligated to cooperate with armed actors. Safekeeping of people and guns are some of the most salient features of cooperation. An elder community member tells the story of how he got a criminal record and an alias. She (tragically) comically explain this embeddedness between armed actors and community members:

*The fiscalia one day took me to jail... [she smiles]. Look, I used to make stuffed dolls, and the muchachos [youth from the Milicia] would come a lot here to my house to buy those things for their girlfriends. And they will stay here in the house to hangout. One day they came inside the house and made a hole on the floor. I ask them that what is that? One of them said, [loudly] “YOU! Silence!” Another came and said that it [the hole] was just a place to put the trash. Then later, another day,*
the police came and raided my house, in that box on the floor under the trash they found some trabucos” [rifles]. The police then took me, and they assigned the alias of “La Cucha”. A social worker who knew me spoke with the “fiscalia,” explained who I was, and got me out. (722)

Here constant interaction and proximity of illegal armed actors and community members outside of the conflict blurs lines that divide the criminal from the victims. A recurrent form in which community members lives are affected by the conflict is by restrictions to their mobility. Armed actors’ control of the territory is done by the closing off important streets, creating check points and keeping information about the population to be able to discern local residents from foreigners. A community member explains the closing off of the streets phenomena in the context of violent conflict:

*Around here, it was really scary at night. They got people, and they would hit them or kill them... people could not pass from the 85 street or the 104 street. They [Milicias] would interrogate people, and if it was not a known person, they would kill them there* (731).

The Milicia period ended with the arrival of the Paramilitary groups. They followed a similar strategy as that of the Milicias, in which they exterminated or adhered to the existing gang groups. “Bloque Metro,” led by “Rodrigo Franco o Doble Cero,” operated in the area. In 2003, all the Paramilitary groups entered into a peace process with the national state The Demobilization, Disarmament and Reintegration DDR where around 2000 members demobilized from the urban factions of the AUC in Medellin, including the Bloque Cacique Nutibara and the Bloque Heroes de Granada (Espinal and Agudelo 2008). By 2008, with the closure of the DDR process, the organization fragmented into many different groups in the Comunas 5 and 6. Based on some communitarian mapping of illegal armed groups, this fragmentation turned into about 49 different gangs. The high slopes of Comuna 6 that are comprised mainly of informal settlements continued being controlled by the only group that still has an apparent alliance with the AUC. Called Grupo de Desmovilizados de las Autodefensas Unidas de Colombia (AUC), this organization is comprised of several gangs. The continuation of the action of ex AUC members is expressed by an interviewee who explains how communities started distrusting the DDR process and how actors after DDR continued the same practices:

*This one [a person] is a [DDR] demobilized but is still walking the neighborhood with a gun in his pocket? So what was left of the demobilization? It was left in the paper. We the inhabitants do not believe in that process.* (604)

This same community member makes a relationship between the conflict today and that of 20 years ago in these terms: even as if the [armed] actors have changed, the way they behave is really similar.

*I see similarities between the process of violence that is happening today and what I lived as a teenager during the times of the narcotraffic.* (604)

Community members today express that the area is safer today that in the past. In reality, El Triunfo has only had two recorded murders in the last 10 years. But community members lower their voices when

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7 A “trabuco” is a rifle that has been shortened to be easy to carry.
the “muchachos” [gang members] pass by the door of the houses during my interviews. I take this as a sign that if security is probably better, territorial control is still very latent. Fascinating is that current gang groups keep the same places of checkpoints where the the Milicia and the Paramilitares once operated them. Now, these check points are less enforced, but are clearly marked by a constant presence of members of the group.
FIGURE 16. URBAN GROWTH NEIGHBORHOOD SANTO DOMINGO SAVIO 1959 TO 2013. SOURCE: AREAL IMAGES FROM THE MEDELLÍN PLANNING DEPARTMENT.
FOUNDATIONAL STORY

Santo Domingo Savio is the oldest informal settlement in this research study. An ‘invasion,’ this informal settlement date from the early 1960s and was populated by displaced peasants from the countryside. At this time, the area was very rural and isolated from the city center. The old railroad that once connected Medellin with the towns in the eastern plateau had been dismantled in 1948, and the tracks left behind became an unpaved road part of the bus service.

Santo Domingo Savio has a very interesting foundational myth in which the first dweller, Domitila, in a recurrent dream saw a man who asked her if she wanted to have a house and a church, and he pointed to the hill where Santo Domingo is today. She tells the story to her husband Vicente and they then both move to the hill and become the neighborhood founders (Bustillo Naranjo 1994).

Early on, the houses were made of the “bareque” a traditional wood and mud construction system. A community member narrates that process:

When I came here, I was a little girl. The house was made of “bareque”. In 1963, there were very few ‘ranchitos’—like four—but ten years later, there were like five hundred. There were no sewers; the houses had several latrines before a system was created. Most ‘ranchitos’ actually behaved like rural homes. There were spaces between them to plant trees and small growing areas.

In 1964, community members organized and started dividing lots for the new arriving members. Lots were rented or sold (illegally). By 1965, the legal tenant of the land, Nicolas Restrepo, claimed ownership and evictions started. These evictions motivated the foundation of the JAC and the community invaded
again and claimed possession of the land. Among the first structures that this organization built is the church.

There is some controversy about where the name of the neighborhood comes from. It appears that many contending names were competing, among them “marquetalia” and “El filo del hambre” (the hill of hunger). But the priest finally decided for the name of the saint.

A community member narrated the process in which she, her family and other families invaded the territory. She also talked about purchasing the illegal title to the land (from an urbanizer pirate) and the fights to keep from being evicted from the state authorities. In a narrative that could be a chapter in a Gabriel Garcia Marquez story she said,

“at that time [in the 1970s] the mayor had ordered for this land to reclaimed [by the state] and sent the military to expel us from here... the Captain [of the Fourth Brigade] ordered their soldiers to not evict any family that had the Colombian flag raised... and we knew about that... the next day we made flags out of our clothing, and that was the way that we were able to stay here.” (101)

Narratives about the value of Colombian flags are very common among histories of founding of informal settlements in Medellín. The real effectiveness of such a tool for claiming land is not clear. In El Triunfo’s story of foundation, for example, the issue that houses were burned with their respective flags are told as part of the motivation that gives leverage for community members to go to the municipality and demand their (land) rights.

DEVELOPMENT PROCESS

Two actors are important in the first years of Santo Domingo Savio: one are members of the JAC, and the other is the priest of the church. The JAC is very active associating community members to work on projects to improve houses and service and infrastructure, such as the provision of energy that is taken from the downhill neighborhoods of Villa de Guadalupe. A community member mentions how key the JAC was as an organization to provide services and how those projects united the community but also by themselves created the physical structure of the neighborhood.

The water arrived through the Accion Comunal work. They would hook some hoses to the main source of water that was on the site of the ‘terminal’ [bus stop]. This area of the terminal is key in the development of the neighborhood and become a commercial hub. (715)

Another community member comments:

The terminal was always an ample place. There was the place of the first business, the first-meat market in the neighborhood inside a house. That was the only place where trucks and buses could turn around. This was also the place where materials that came from Medellín were left. (716)

Today this bus stop is still the commercial and transportation hub of the neighborhood. It is located just 50 meters away from the last station of the Metrocable. This place has the largest concentration of business in the area. The water from high in the mountain still runs through the open space, and it is used to wash the buses. Here is also the sculpture of Santo Domingo Savio, the saint after which the neighborhood takes its name.
The church plays important roles as the support system for the creation of new neighborhoods. Specifically, the priest creates new churches in informal neighborhoods that become hubs for assistance to the poor (Jaramillo, Melguizo, and Martinez 1998). A key example of this is a well-documented role of the priest Gabriel Diaz in Santo Domingo Savio in Comuna 1 (Isaza and Salazar 2012). In 1967, the church by the same name is founded, and the Padre Gabriel Diaz is assigned as priest. He became a key figure in the development of the community. A liberation theology believer, Diaz used his position in the church to legitimize the neighborhood and promote projects like the school and public bathrooms. Gabriel Diaz is a supporter of priest Vicente Mejia, another known liberation theology, a key figure in the founding of informal settlements in Medellin and helping to stop massive evictions (Martinez Zapata 2014, 230). The connection between these priests and the early guerrilla movements is not tacit. They are fierce activists who challenge traditional church views in Medellin.

Alongside the church that is built by the community, other projects are created in these first years such as the water connection and the first-community water tank. The first-community center is built. Most of this projects are founded and built by the community, a trend that will continue for more than a decade. In 1975, the first-kindergarten in the neighborhood began working. State projects started appearing in

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\[8\] Such as the one in the barrio “Lenin”, now known by the more “politically correct” (meaning less leftwing communist) name of Francisco Antonio Zea. a Neogranadine journalist, botanist, diplomat and statesman that served as the 1st Vice President of Colombia under then-President Simón Bolívar
the 1980s, as did the provision of the first residential phone lines, city-provided water and the improvement of the main road (road to the town of Guarne), which permitted the first public transportation mini-bus routes.

Local businesses started very early to provide small but essential goods, such as food, and cleaning supplies. It stayed like that for most of the first twenty years of the settlement. Most businesses were located within housing units. This created a very close relationship between the business and the person who runs the place. However, things started to change. In the last decade, there has been an exponential growth of local businesses in number but also in type as a result of recent urban upgrading projects. The EDU estimates that business growth in the neighborhood after PUI projects is in the order of 300 percent. This is reflected by views of community members about that growth process.

In the mid-1960s, there were very few [stores] 2 or 3. By the 1980s, there were around 15, but only of food goods. Today, there are more than 100, and you can get anything. The only thing missing is a notary. That is the only reason to go to downtown. (714)

Living in the high slopes of the Andes makes transportation difficult and also puts the neighborhood in a high condition of risk. In 1974, a landslide killed an estimated of 100 people. The New Library Park (Parque Biblioteca Espana) today sits on the site that used to have 50-housing units. These units were removed because they were in a condition of high risk of landslide. At the same time, the library served to stabilize the hillside, and provide an important public space.

![Figure 19: Materials Building Center in 1980 and 2014. The price of the materials included the cost of transport to the houses. The donkeys are the key mobility solution to move goods through the narrow and steep paths. Source: Universidad Nacional for 1980s and author for 2014](image)

The tool to make most of those community improvements was the “convite,” a gathering of community members to achieve a single goal. This can be a public project, like a road paving, or the construction of a sewer line. Or a private goal like building a roof for a family house.
The convites were used to pour a concrete slab, build the streets, etc. the last convite was in the Antonio Derca school about 25 years ago [1989]. While some [community members] work [in the construction] others [mainly the women] cook, some women would help with the construction also. The convites stopped because of the lack of communication and leadership. It is as if a fad that faded, now people will only work if you pay. (717)

As this community member denotes, there is reduction in the number convites as the neighborhood ages and grows. The tight social network of the first years seems to disappear as the decades pass. And all interviews of longtime community residents reflect this process.

Before, we knew all the neighbors on our block. Now, there are many renters. We meet for parties, and you know the people who live close, but it only 'de saludo’ [to say hello], each one for her or his load’ [is on his/her own business], this is because many spend the day working outside [of the community]. (715)

Even as community physical projects diminished, construction continued. Most streets have a house that is going through some kind of remodeling or addition. Community members estimated that by 1984, most of the neighborhood was already developed, an assertion which mirrors my analysis of aerial images (Figure 16. Urban growth neighborhood Santo Domingo Savio 1959 to 2013. Source. Areal images from the Medellín planning department). Houses of three levels were already common, and all streets were already paved. Water provision by EPM started in early 1990s (González Vélez and Carrizosa Isaza 2012, 127). The reduction of convites does not mean that there are no community organizations creating projects today. The community members in this neighborhood continue to be organized, but their organization does not work at the scale of the neighborhood, but at a Comuna (multi-neighborhood) scale. This is probably because this is a scale in which funding and technical support is provided to the population in Medellín.

Today in Santo Domingo, 54.58 percent of housing units are owned, a trend that is very similar to other similar neighborhoods in the city. Also, 35.17 percent of homes are led by women (single moms) (Griesbeck, Arboleda Gómez, and Arenas 2010, 28)

The North-eastern PUI in Comuna 1 and 2. The most transformative intervention of the state in Santo Domingo Savio was from the 2002 to 2008. A series of multiple urban projects were part of two successive public administrations of Cesar Perez and Sergio Fajardo. The first one was the MetroCable (2001-2003), a cable transport system that goes up the Andes mountains and that connects to the metro system that runs from one of the city to the other in the valley below. This metro cable substantially improved the mobility of the neighborhood and also linked it with larger volumes of local business (P. Brand and Davila 2011, 95). The Second project is the PUI Northeastern, an urban upgrading project in several neighborhoods in the Comuna (district), including Santo Domingo Savio neighborhood where some of the most important physical projects are located. The PUI in Santo Domingo Savio has six important projects: the library, the school and its community dinner, the Cedezo, several street improvement and three parks. All of them are adjacent to each other. The (España) library is probably the most famous project in informal settlements of the city. That has a daily attendance of around 1,500 people, foreign and local. In March 24, 2007, the library was first opened with the visit of the queen and king of Spain,
who donated part of the equipment for the building. The library, located in front of the first public building of the neighborhood—the church—serves as an anchor of the interconnected projects that are implemented here. The other anchor is the metro-cable station creating an active public realm, supported by a constant flux of people both local and foreign to the neighborhood and to Colombia, who comes to visit the unique structures that are the source of pride for the inhabitants.

Along with the physical projects in 2004, the government implemented the Participative Budget. (Samper Escobar and Massachusetts Institute of Technology. 2010, 99). In the context of this research, this is important because some of the institutions that implemented projects did so through the new spaces that the PUI was providing. This linked the policy part with the physical part of the state intervention.

**PHENOMENOLOGY OF VIOLENCE.**

**FOUNDATIONAL VIOLENCE (POLICE AND ARMY)**

As in the case of El Triunfo, the first accounts of violence in Santo Domingo Savio refer to the police and army evictions. Santo Domingo is the first neighborhood with narratives about the Colombian flag in the informal settlement serving as a way to deter military officers from evicting communities. In general, besides the state and private owners desire to forcefully reclaim their land, violence is not present as it is in later stages of development. Houses are built of very fragile materials and are left open or alone for the day while dwellers go to the city to work. Interviewees’ talk about this as a period of relative peace. There are other tensions about conflict, mainly those that link early revolutionary movements with new religious ideals (as in early guerrilla movements with liberation theology). This is important here because it merges into a single-issue poverty and urban informality, with new ways of governance and state and religious opposition. It is in this period in Santo Domingo Savio that a conscious “Insurgent citizenship” in the terms of James Holston existed. Land taking was used as a way to subvert the power system as a capitalist, classist and Roman Catholic at the service of the elites. The new system took land from big landowners, claimed the right of the city of the poor and re-wrote religious beliefs.

In 1968, the first World Congress of Non Violence was housed in the informal “ranchos” of Santo Domingo Savio, as a parallel event of the Second General Conference of the Latin American conference of Bishops (CELA) held in Medellin. In this conference, a text is drafted (title Medellín) and which was a stepping stone to the foundation of theology of liberation. The term “Medellín” in Catholic circles then acquired in this period a revolutionary connotation. The “Medellín” text produced during the conference merged elements of Marxist analysis with catholic theology (Berryman 1973, 375). The bishops insisted that violence was wrong but sometimes necessary when fighting against institutionalized violence, such as violence waged by the government (McGovern 1989). The association of this religious event and the funding of the “theology of liberation” make the word “Medellín” a more politically loaded term than that of “Kremlin” was at the time in those circles. Medellín then had become a symbol of subversion (Smith 1991, 194). The informal settlements founded by their priests would be the physical expression of this movement. Soon after, those linkages of activism and revolution through informal settlements died out along with the religious movement that supported it.
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE “SLUM WARS” IN MEDELLIN, COLOMBIA (1970s-2013)

GANGS (SICARIOS)
In my interviews, people narrate ways that conditions of extreme poverty and the state’s lack of accountability catapulted the first waves of what might be called “regular crimes”—home robberies, vandalism, pick pocketing. These crimes quickly escalated to organized crime waged by different criminal gangs that by the 1980s become formalized as the Sicarios (assassins), who worked directly with drug lords.

These Sicarios would come to terrify the city throughout the late 1980s and early 1990s. After the main narcotraffic networks in the city of Medellín were dismantled in the early 1990s, these criminal groups were absorbed by other illegal groups who challenged the authority of the state. The neighborhoods of the north of the city see this influence before others. An interviewee mentioned that the phenomena of gangs started earlier. She explains, “[t]he bandas had existed since 1974.” (712). But this is not seen to be the motive for real alarm until the arrival of the Milicias in the 1990s.

MILICIAS
Santo Domingo has seen many “violences,” as Colombians describe periods of conflict. In the interviews, the 1990s is the moment where the first wave of those violences is felt. The first known Milicia group, “Milicias populares del pueblo y para el pueblo,” started in 1986 to operate in the northeastern area including Santo Domingo Savio (N. Betancur and Hermann 2007, 34). In a compilation of stories told by members of the neighborhoods of the northeastern section of the city, “Somos Historia Comuna Nororiental,” 1991 where the Comuna 1 and 2 are located, narrates part of the process of extermination and absorption of gang members by the milicas. The milicianos (guerrilla members) talk about how urban guerrillas used the opportunity to take over the Comunas territories after the gangs of Sicarios had lost their leadership. A member of the then new MP (Milicias populares) talks about this process of absorption: “We executed many of the bosses and members of the gangs of the Sicarios. We did not have any alternative—they were rotten people, and we knew that they would never rehabilitate. These executions were sufficient to make an example of the other small groups, to make them understand that we were talking seriously.” (Estrada C. and Gómez V 1992, 171). The Milicia phenomena is not homogeneous as Fernando Quijano explained in the previous chapter. There are several kinds. Among them, there are the ones that were motivated as forms of vigilantism. In one of the interviews, Estrada and Gomez talks about that process.

Look, when the neighborhood started, the people got organized. They formed security brigades of surveillance, and two people were paid for taking care of the block and the thieves were not delivered to the police, se les ‘pega una pela’ [physically punished] and then they would be kicked out of the neighborhood. (Estrada C. and Gómez V. 1992, 152)

These forms of vigilantism that the Milicias followed are exemplified by the extreme social control of their community members who live within their territory. In Medellín, a process that is called “limpieza social” (social cleansing), a mother interviewed (717) explained that her son was killed during this period because he was a “basuquero” (a drug addict). Drug addiction is one of those activities that was not permitted during the period Milicia control.
The actors of violence are many: police, gangs and the militias. Are occupy the same areas and fight each other. The following narratives shows the relationship of security forces within the spaces of this neighborhood.

_The military presence was a lot in the 1980s. Because they say that this was a nest of the guerrilla. Many of the directives of the JAC were killed. ... Then the violence started, the red car would come. The police would come and abuse people, then the sicarios would come and abuse people too. The scary part was the car that came at night— those were police, who in the daytime were in uniform, but at night were in civil clothes. They would come only with their heads covered._(Estrada C. and Gómez V. 1992, 124)

In an interview, an Ex Miliciano narrates how tacit alliances existed between police forces and Milicias when police were in search of drug-related gangs.

_They [the police] will come up here and see us [Milicianos] also, but because they knew who we were, they would continue looking for them [gangs of Sicarios]._ (727)

Soon after, large domination of Milicias were very recognized in Medellín. The relationship between state forces and the Milicias changed, and this reflected on how the conflict was felt in the neighborhoods. Regarding the presence of the new armed groups in these neighborhoods, the General Pardo from the Cuarta Brigada, a battalion of the National Army located in Medellín, says that at that time, "These new organizations had their umbilical cord attached to the Coordinadora Guerrillera (guerrillas), which has taken advantage of the social decomposition in the Comunas to collect the harvest in a field fertilized by violence and narcotraffic."(Estrada C. and Gómez V. 1992, 172). A Miliciano answered to the change of police Milicia relationship with the following statement. "The government very much resented the Milicias because what they (the government) were not able to do in many years, the Milicias did it in very short time."(Estrada C. and Gómez V. 1992, 130). In fact, that swift execution of the "limpieza social" is, in part, why the army permits the actions of Milicias within the poor neighborhoods.

Topography and informal settlements' physical features are seen by the actors of the conflict as influencing the result of the war. The topography and narrow passages provide spaces for actors who know the terrain to hide from mechanized state forces. A Milicia member said,

_I think that something that has saved us here is the topography. Here there are a lot of narrow paths and that has saved us. Because you see a car here and run and hide there._ (Estrada C. and Gómez V. 1992, 132)

PARAMILITARES AUC

In a similarly violent transition from Sicario gangs to Milicias, the Paramilitares follow a similar pattern of violent process of absorption or destruction, followed by the contestation of the territory by the Paramilitares groups in the late 1990s. In 1997, the AUC was formed by 2002 the “Bloque Metro,” controlled around 70 percent of the territory of the city (Noreña Betancur and Hermann 2007, 108). According to some of the interviewees, this period was marked by a large exodus of community members as a result of the conflict. One interviewee says, "Many neighbors left in the violence of 2001" (716).

One example among hundreds of the type of violence that Paramilitares groups exerted in the
neighborhood is the following. In 1998, paramilitaries of the “Banda de la 29” executed Juan Alberto a 16-year-old young man, after taking him from a public bus while he was going back home. This homicide happened at the bus terminal in Santo Domingo Savio (de Violencia Política 2003). The same terminal of the well.

In 2003, the Bloque Cacique Nutibara demobilized. The DDR had a profound effect on the neighborhoods of Comuna 1, which had the largest number of DDR ex-combatants an estimated of 527 (Espinal and Agudelo 2008, 19). Some interviewees felt that in the beginning, the change was very positive. However, things changed over time. Especially after “Don Berna” is extradited to the United States, violent conflict is generalized all over the city. However, out of the four neighborhoods studied here, Santo Domingo experienced the larger number of homicides. (Up to 53 homicides in 2009). This implies a transition from Paramilitares’ control to that of one of the Bacrim/Odines, characteristic of the last 5 years in Medellín.

As explained before, Santo Domingo is the neighborhood with more urban interventions in the last 15 years (Metrocable and PUI) than in any other informal settlement in Medellín. Santo Domingo Savio is the model neighborhood of the “Medellín Model” of urban transformation. In general, community members are really proud of the interventions. Most of them respond positively to the effects of such projects on their neighborhood. A community member explains that the “neighborhood has improved a lot since the arrival of the metrocable” (717) others (a small minority of my sample) expressed “The metrocable is a smoke screen to hide the violence that the neighborhood suffers and has suffered” (712). Neighbors who live closer to the projects have in general more positive opinions about of the project and explain how the project created areas that they see as being of higher quality than other areas in the same neighborhood. The interviews establish a relation between state projects and reductions in conflict:

Santo Domingo is divided by sectors. People forget that the high areas are also part of Santo Domingo. This is like the zona rosa [high-income area], that is where the library is. This is the area that they [state] cleaned. The worst area [most violent] is the area north of the library. That is a hidden area, that is an area where not even the police goes. (717)

Projects are seen as opportunities to bring a permanent presence of state police, a resident of Comuna 1 comments about this,

We are really happy now that there are police. It is better that the mayor has helped us a lot. For me, everything has been really good. This has also helped to improve the lot of things and has avoided many other problems. Now you are able to see the law [police] walking around. Before, the police were not in the neighborhood and if you called them, they would be afraid to come. Now at least you can see them; before we could not count on them. And if we said anything they would not come, and if they came everything had already happened and there was nothing to see (608)

This arrival of police attached to the urban projects is recurrent in the histories of the conflict change in Santo Domingo Savio. However, this was a very conflictive process. A group of community members explain that to establish the first police station within the neighborhood, a cover operation was needed after the building destined to house, the police had been a bomb. A new site was chosen: the house of a religious organization operated by nuns. The police moved overnight to the site and in this way established the first permanent police post in 2002, just before the construction of the Metrocable.
FIGURE 20. URBAN GROWTH NEIGHBORHOOD INDEPENDENCIAS 1989 TO 2013. SOURCE. AREAL IMAGES FROM THE MEDELLÍN PLANNING DEPARTMENT
FOUNDATIONAL STORY

Independencies is a group of neighborhoods in Comuna 13, situated in the high slopes of an older Neighborhood called Veinte de Julio. It is divided into several areas that respond to three watersheds of small creeks that today are covered with development. Not all the sectors are developed at the same time and at the same rate, but in general the agreed year of foundation is around 1978. The origins of Independencias, as with many other neighborhoods are marked by a violent struggle to keep the land. However, in Independencias, more so than in other areas, those struggles to claim property are the result of land claiming battles. A founder member explains:

"Look… once the police came, and we organized into two groups. And while the group was here shoveling and putting together the ‘ranchitos’ [sheds], the other was down there at entrance in the Veinte [de Julio Neighborhood] throwing rocks blocking the police that were trying to evict us." (707)

Land claim battles happened several times. Houses were dismantled, and the people removed or jailed and days later the process would start again. In an interview, a founding member explains that he arrived in 1978. He knew about the invasion from a brother-in-law. When he arrived, they marked the land and during 20 days he camped outdoors, carving out a flat plot out of the sloped terrain to start building his shack. He was the first to arrive. His other 5-family members came after the shack was ready. He explains that in the beginning there were only ten families.

"A week after arriving here the public force [police] came. They would take us out to the [bus] terminal in the [neighborhood] Veinte de Julio, but every time this occurred we would be back and invade. This happened about five times. Then they [police] got tired." (709)

Ricardo Aricapa narrates this same history. He talks of Esperanza, who was part of the invasion whose house is destroyed three times by the police. The third time, she spends time in jail. During this period, the five neighborhoods that are part of Independencias are founded (Independencias 1, 2 and 3, Nuevos Conquistadores and part of El Salado). This land taking process took around five years, for a total of 5,000 families. This made this land taking invasion to be known in planning circles as the “the most voracious invasion of Latin America” (Aricapa 2005, 7).

DEVELOPMENT PROCESS

To be able to claim possession of land in the long run depends on successful negotiation with political actors as explained before in the case of El Triunfo. In the case of Comuna 13, key to the final stability of Independencias, was Mayor Bernando Guerra Serna [1979-1981], who was mentioned in several of the interviews as a key person who had a permissive attitude toward the settlement of Independencias, even though he commanded the police to evict and jail community members. Finally, around 1980, resilience of the community was stronger than the political and police will.

At the neighborhood level, not all lots are taken by force. Those who arrive first can claim more land and to sell later to the newly arrived. A community member explains this process,

"The first people who invaded the lots, some of them got more and then later would sell them at $5,000Col/1980 [850$$US dollars /2014]" (708)
By 1980, there were already more than 50 families living there. A community member and key organizer in the process of the settlement of Independencias explains the rapid process of urbanization of the neighborhood. He says,

four years after the invasion, the number of “ranchos” increased significantly. The building process was constant—almost every day a new family arrived (708).

These first years were marked by accelerated growth, the result of continuous arrival of new families. He says, “In the year 1989 or 1990, this was really populated. There were like 1,200 families. (709)

Endogenous growth would only become significant at later dates. Most houses, which in the first years were built with fragile and light materials, by the mid-1990s, would already be of solid constructions of two floors, resulting from the growth of families.

Today, houses of three floors and up to five stories in some areas, are common. A community member explains, “in the beginning we used papel fletro⁹” (708). As expected those areas closer to already urbanized

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⁹ Waterproofing roofing material, made of paper composite and impermeablized by a coat of tar. While very inexpensive is a highly flammable material and its life is very short. Most informal settlements before the 90s were made of such material.
areas of the city develop faster than those that have more difficulty of access. A community member adds,

*Sector 2 was the one more quickly developed because it had transport, commerce, materials, the church and services. In the beginning, there were 200 families in the lower part. In two years, there were 1,500. Today we are more than 9,000... The higher [up the hill] the house is, the less expensive the rent is, by the poor accessibility. (708)*

In 1978, the JAC was founded with Agustin Arredondo as president. This organization spearheaded the development of urban projects. Also, as in other neighborhoods, the “convites” were the organizational tool to gather neighbors to build the projects.

*The community started to get organized in sectors through a working committee and the board of directors in 1984... On Saturdays and Sundays, the JAC would ask for collaboration of the families for the people to help build the ‘centro educativo’. While this was being built, the kids got their first classes with the person who would be the first director of the school, Jose Antonio Duke, in a shack in front of Doña Raquel’s house, which at times served as the place of meeting of the JAC. This started to work in 1979 and by 1982, the first nombramiento [official hire to the educational facility] happen. (709)*

One of those projects is the connection to the energy (electricity). Here a community member showed how that process of negotiating between legal and illegal happened and what role the JAC played to provide services and negotiate with the state.

*That was the time of [Mayor] Bernardo Guerra. He would grant us soldiers [to protect the energy posts], we got on loan some busses, and we left [the neighborhood] wearing our dirty clothes to the city hall... Moreover, when we got there, the mayor came out to the balcony and the guards did not let anyone in. They asked for the leaders and then they let a few of us get in. We said that was not possible that he had placed soldiers... I explained that the solution was that they let us put pilas [posts] inside the invasion [land taken], and we will make the connections from there. And yes later the EPM [the electric company] people came and put the pilas in the best places to cover all the sectors. (709)*

This type of process was also done for other services like water:

*Later we got the water 50$Col [around 5$US dollars 2014 money]. We charged for the hookup per rancho [shed] that would cover the cost of the pipes and the labor. (709)*

As the neighborhood develops and other needs appear, negotiating with state entities and local community members gets more complicated. An example was the case of expanding a road in the already very dense neighborhood of Independencias 2, a change which would allow the only access route to homes and to provide space for the cars to turn in a narrow valley. The JAC organized and coordinated military workers for the construction of the road, negotiated with home owners who needed to be removed to go to other places in Independencias or in social housing provided by a local NGO. The community organized evictions and infrastructure projects without much conflict and with the collaboration of a myriad of state and NGO actors.
With the passing of time, the role of JAC and its convites as the lead organization starts to get diluted. The municipality took over some of the functions that the community was doing, and some see this as the why the JAC began to play a lesser role within the community. One community member said,

*There are no more 'convites', when the municipality started to manage the school, many of those projects of the community got lost.* (709)

Another community member and founder added,

*Before we were more united, today we are really distant to the needs of others. For example, a landslide took down the house a couple of times. With the help of the neighbors, in two hours we put the 'rancho' up again. That would not happen now.* (749)

**FIGURE 22. PRI-MED PARK IN INDEPENDENCIAS 1, ONE OF THE LAST REMAINING PROJECTS BY 2014. SOURCE: THE AUTOR**

Community members in Independencias and residents in other informal neighborhoods part of this research, say that with time the close relationship among neighbors is less tight. A community member says, *"Before we all know each other. But now is not like that..."* (709). The reality is that multiple community organizations start fulfilling some of the services that were centralized in the JAC and also the leadership of the JAC is coopted by its political relationship to specific parties. Conflict also plays an important role in diminishing the capacity of local organizations. As the neighborhood developed, the key issues that become important are less those of urban development and more those associated with large violations
physical space and its role in the production and reproduction of violence in the “slum wars” in medellín, colombia (1970s-2013)

of human rights. Many organizations and individuals that try to voice resistance to human rights violations those are silenced, evicted or killed in the last two decades (Calderón Cuevas 2012, 5).

Independencias is one of the first neighborhoods to receive urban upgrading through the PRI-MED project. Here a lot of efforts is placed on mobility through the completion of narrow steps, and the building of an elevated path to move transversally. Community members speak kindly of the PRI-MED, and even though many of the original projects are not there anymore because they have been replaced or upgraded by recent urban upgrading projects, this was the first systematic intervention in this informal area (see Figure 22).

FIGURE 23. PIU CENTER-WEST, CONSTRUCTION AND FINAL RESULT OF ESCALATORS IN INDEPENDENCIAS 1. SOURCE: THE AUTOR

The PUI center-west had three areas of work over the entire Comuna 13. The south zone corresponds with several neighborhoods, including Independencias. The key problem to solve was mobility over the narrow and steep paths and the provision of public facilities like schools and childcare. This project in independencias had five projects: a pedestrian viaduct, a system of electric escalators and a small community center, two improved sports courts and roads and paths pavement. These projects are part of multiple physical projects in the entire Comuna that had been executed from 2004 to the present, including one metro cable line, a kindergarten, the house of justice, a new school and a library. Today there are later phases of the project still in process there, such as the extension of the new pedestrian viaduct that will finally transversely connect several watersheds. Today Independencias 1 is seen as one of the examples of successful state intervention in informal settlements. The novel interventions have
increased mobility and also a sense of pride among the inhabitants who feel that the projects had improved their quality of life.

**PHENOMENOLOGY OF VIOLENCE.**

In Independencias, from the initial stages, there were robberies and some random acts of violence that residents remember as moments of taking of action by the community. Here the construction of a new local school is motivated by the fear they have of their kids walking long distances to other and more formal neighborhoods. This then shows how community members felt safer within their neighborhood boundaries. One community members says,

In 1979, we won a ‘pesebre’ [nativity recreation] competition as a neighborhood that represented an award of 350,000 $Col award [an estimated 36,500$US dollars in 2014]. With that money some wanted to build the streets of the neighborhood but because a little girl had been raped when she was going to the [far away] Leon de Greiff school, Don Joaquin proposed to build the ‘Centro Educativo’ [school, more nearby] and so we did. (744)

With time, there was a transition from low organized crime to turf-related organizations and violence related to drug commerce. One resident says,

When the conformation of this neighborhood was made not only with people of low income and homeless status, but also thieves, more would arrive every time. That is when this area started to be known as the “escondite de ratas’ [Rats’ hideout]. Some of them die, went to jail, left or are dead…. Then the drugdealers and the plazas de vicio arrived. (744)

The development of small businesses in later stages of development created opportunities for profit of perverse actors. A community member says, “When businesses started appearing that is the moment that the ‘vacunas’ started.” (708). So the increase in (economic) opportunity gets matched by an increase in organizations dedicated to crime, and in the way they perform violence in the neighborhood. New gangs in the 1980s like the *parces* and the *escorpiones* start making a name for themselves by using violence. As one resident puts it,

From 1985 to 1988 the violence was really strong. Then there was not only theft, but also deaths, not less than three [deaths] a day. (734)

Community members see here, as they did in Santo Domingo, the complexity of street pedestrian networks as a tool that gives the criminal advantages over other actors who try to control them. The infrastructure [roads and paths] are very complex. This was favorable for the armed groups because they know the escape routes. (734). One resident says,

There is only one access to the neighborhood and the gangs use that to do ‘retenes’ [manage check points]. They will ‘raquetear’ [search your clothes] and take your belongings. (709)
And in turn, those physical features of the neighborhood actually deter the way state actors perform within the neighborhood. One resident reports that, "because there is no road [just narrow and sloped pedestrian paths], the police will not come up here." (720)

Perverse actors see the location of police in strategic circulation corridors as threats to their territorial control and attack the police, as occurred at the site of the new police station, located in the key intersection of access to the informal areas of Comuna 13 can be controlled. One resident says,

"A CAI [small police station] was situated at the entrance of the [neighborhood] San Michel at the entrance of the Comuna. The Milicianos blew it up (Aricapa 2005, 31)"

**MILICIAS**

The first Milicia group (vigilante) was the Comandos America Libre. This group, supported by the Guerrilla group the ELN, was dismantled and its members started their own gangs in the neighborhoods. By 1996, the reverse happened, and a new organization appeared: the Comandos Armados del Pueblo (CAP) formed, with members form the local gangs. This last group did not have any affiliation with the ELN. A pattern seen in other neighborhoods is also visible here: old organizations get dismantled but the surviving members become part of the bounty of the arriving and victorious organizations.

"This CAP tell us that they were a new group, but that was not true. They continue doing the same thing than the elenos [ELN], at the same times and in the same places. To finance they will charge a vacuna [racket] but they will call it contribution... they will even take care of things that were not of their competence like marital disputes if a husband got drunk and did not get money for the house they will talk with him and if he did not improve he will be killed.(Aricapa 2005, 30)"

In the interviews and also in the literature, the Milicias appear as a reaction to the escalation of violent conflict of armed actors and un-social behavior.

"They are a reaction to the thieves that were in the neighborhoods. They infiltrated the area. That is to say, they came to live in the neighborhood and that way they knew whom they were going to attack later." (709)

So in the first moments community members see the Milicias actions as a very positive one.

"1990 to 1992 was a very critical time with the selling of 'basuco' [crack cocaine]. They [kids] consumed this at very early stages, they would smoke on the steps of the paths. It was an epidemic. Then the theft started, many abused the fact that the doors were still of wood.. Because of this is, the Milicias Populares arrived in the 1993 with the purpose of cleaning the neighborhood of the gangs. Thanks to them, the thieves, drug dealers and drug addicts were not visible anymore. The community supported [the Milicias] because of this. They would say "you stop stealing, you leave the neighborhood or you die" (709)"

By 1998, things had changed. The guerrilla were very disorganized, and the victims were the civil population. Also, there were many confrontations with the police. Population control is one of the strategies used to maintain enemies at bay. This involved control of what people did and could do in the public sphere and anything that happened in it, such as community events or games. This control even
went so far as intervening in the private sphere, including solving marital disputes. A community member part of an NGO that specializes in community communications narrates how tight the control of the Milicias was at that time. This organization had their own television station, and they published the first newspaper in Comuna 13 about Comuna 13. He explains that his organization needed to negotiate with the guerrillas to determine which photographs and information could be published. In terms of the private sphere, as in the story in El Triunfo, community members’ houses are used against the resident’s will and/or consent to hide people and arms from the state forces and other competing non-state armed groups.

OPERACIÓN ORIÓN AND THE TRANSITION TO THE PARAMILITARES

By 2002, the confrontation between state and the guerrilla groups in Comuna 13 was very intense. Full military operations were performed in the neighborhoods of Comuna 13, including a total of 11 different operations, ending with the most known and violent in October 16, 2002: the Operación Orión. Of these 11 military operations, four were executed directly in Independencias, including Orión (see Table 4. Military operations in Comuna13 during 2002. Source: Centro de educacion popular y justicia y paz 2003, Policía Metropolitana del Valle de Aburra 2003, Aricapa 2005). These confrontations escalated to the point of full scale war. The state’s involvement in this coordinated military operation included the Army, the National Police, the Colombian airforce, the DAS and the Fiscalia (judicial branch of the state) (Medina, Posso, and
Tamayo 2011). The Milicias closed down the main streets with barricades made of cars or oil barrels filled with sand. Milicia Snipers were sited on houses and terraces in strategic viewpoints. This war employed all the repertoire of military machinery and state security forces. A total of 40 civilians was injured, and 308 were jailed, of which 233 went to court. By 2005, 56 of those continued Awaiting trial (G. M. Franco 2006, 24).

Based on the accounts of the community members, these state military operations were simultaneously supported by paramilitary operations (AUC) to claim the same territory. Multiple human right violations declarations account for this connection between the military operations and the state military operations.

Interviews give an account of this joint effort to conquer Comuna 13 and the Independencias area. As explained here by a community member,

*From the up the hill the paramilitaries who have already created settlement there will come and from below the militaries with tanks will come through the streets (748)*

After Ori6n, the main guerrilla groups that controlled the neighborhood got dismantled, the state left some forces, but the paramilitar groups performed the social control. The paramilitar occupied homes of assassinated members or of families of sympathizers who were forced to leave under the threat of being killed. Many community leaders were assassinated or evicted through this same process. As one community member says,

*"Many were affected by this. When the Paramilitares arrived to Comuna 13, all community leaders were targeted as collaborators" (614)*

An interviewee explains that as a community journalists, they had had to negotiate their publications with the guerrilla groups, were either killed by the incoming Paramilitaries or they fled their neighborhood. In this particular case, the interviewee, who had been only 18-years-old at the time of Orion, inherited the NGO. Another youth who works at this NGO is the founder and star of a Comuna 13 cable show called “Live With Super Jake!” This show is dedicated to community programming, and all filming takes place in a studio on the second floor of the house where the NGO is based. After Operación Orión, a community member standing in the midst of the chaotic military “sweep” in Comuna 13, of “guerrilla collaborators,” (falsely) accused Jake of being a FARC Commander. Jake was one of the 240-community members arrested during this four-day military operation. In fact, he had never been involved with the FARC. According to him, the person who accused him was actually jealous because he was then dating the accuser’s ex-girlfriend. He was in jail for three months. He was 18 years old. When I interviewed him, he said he returned to Comuna 13 because it was his home and because he felt it was important to record cultural life there.
The social composition of the neighborhood changed because of the social engineering done as part of the Paramilitary control. The total number of displaced and dead is not clear at this point. Many people who were taken out of their houses by Paramilitaries or the military are presumed dead, but their bodies have not been found. One resident puts it,

*Today there is less population in the neighborhood because of the forced displacement and because of the people killed by stray bullets. There are more than a thousand-deaths.* (709)
Soon after Orión and the Paramilitaries’ control that happen after, the AUC entered the DDR process. The proximity of these events created a vacuum of power that have negative consequences for community members.

After the Operación Orión and the military left, then came the paramilitars. Then after the negotiations with the government [DDR], they left the neighborhood alone and at that point the gangs came again. (709)

Different then what happened in other areas, such as in Santo Domingo or Villatina, in Independencias the transition from Milicia to Paramilitary control was part of the ongoing conflict for hegemonic control of the multiple guerrilla groups here presented an obstacle to that transition. The violent actions of the state were key in forcing that transition happen. The short distance of time between the Operación Orión and the DDR process and failure, again created quick vacuums that were filled by many small gangs. That used the market opportunity and the availability of guns to start new gangs. Community members mention that the ‘rencor’ (bitterness) felt regarding the various atrocities committed by many perverse actors served to perpetuate the violent conflict in this area. ‘Rencor’ [rancor] is a phrase that come recurrently in the interviews as a motivator of individuals to enter into the conflict and act violently against others.

Today as in other parts of Medellín in Independencias there are gangs that control very small territories. These fulfill some of the control of the other organizations but in a less coordinated fashion. A total of six different groups were identified, just in terms of the neighborhoods of this study. Limits among those groups are constantly challenged and mobility seem to be restricted to young males within the Comuna 13 area.

Some community members mention their relationship with these organizations in less threatening terms. One resident says that,

There are people who take care of the neighborhood today, but there is no problem with them. (720)

Others community members who suffered the consequences of the fighting among factions are less sympathetic to them. A community member whose 8-year-old son was hit by a stray bullet during a random sniper attack that the “La Torre” group did against “Los de dos,” while the child was playing at the only soccer court in Independencias 2. During the interview, he called his son and asked him to show me his face and in it the scar of a bullet that crossed his mouth.

An ex-gang member in Independencias, a 28-year-old young male who participated in the conflict explained some of his daily life as a gang member. His brother was associated with the Milicias and was killed by a gang allied with the Paramilitaries group post Operation Orion in 2002. He later became part of a gang group in Independencias two that was affiliated with a post-paramilitary group in 2009. There he had the job of collecting vacunas (gang taxes) from the stores at the edge of the neighborhood. He narrated how the Milicias used the main street as a "trinchera" (trench). He narrates, "they put a cable some barrels and the sand bags for shelter at this entrance" and in this way they controlled all traffic to the interior of the neighborhood. He left the neighborhood for 3 years to live in Quibdo, Choco, the city of his parents because he had been the lookout for the gang of “La Torre” to be killed. They offered 500,000 $Col
(250$US dollars) for any member of his group. This was announced to the community by shouting out loud the ransom terms from the meeting place of the “La Torre” gang. This shows the compactness of this neighborhood and the small territories that these groups controlled. Now he is back living in the neighborhood. He says,

"I was a demon, they used to fear me a lot" (718)

He took me to a viewpoint, which is now a hangout place for his old organization and pointed to a group of kids playing on the playground below. He said, "you see those kids there? In the war, [he whistled loudly] I would have a whistle, as I just now did, and they would have run and hidden like rats... I from here will get them, you know... I was in the army."

We continue walking along our path toward where his mom lived,

Look there [he points to a house 100 feet below. [I can see the roof of the house from adobe] that is where my mom lives, and here [he points to the house next to us], this was the house of one the guys of the “La Torre” gang. They had bad blood with us... from here they will do things to us, and do not leave us in peace. That is why I had to leave. (718)

Gangs live from the sale of drugs in some of the plazas but also of the extortion to commerce in the neighborhood. The interviewee explained while we walked to the main street where most commerce happens. He says, "look I was the one that collected the ‘vacuna’ of all this here [around 15 commercial locals] each week 50 Lukas [50,000$Col or 25$US per local/week]. (718)

He explains that the spaces that marked territorial control were known as “fronteras invisibles,” which shows the density in which these conflicts happen. He says, "look where that the plant is [the only bush tree on a narrow pedestrian path]— that is the limit between us and La Torre." His house was only 70 feet from this location. Confrontations happen very often in this context, and retaliations for encroachment or other offenses end in frontal attacks. Some of these are spontaneous, to defend members of the group in trouble. "Let’s say that I’m here, and a friend is running up to me because they are going to get him... so if can help him of course I will hide his weapon and protect him." And the others are planned exercises in which routes and targets are determined as to escape other groups. The interviewee showed the narrow path they took during a specific confrontation, where friends and foes have perished. "We would meet to hangout and also to plan, you know we made plans, you know like when you are going to play soccer".

In the end, the youth involved in all these large battles, from the initial gangs to the Milicias and then the Paramilitaries to the fragmented groups of today, have replaced their role of playing as kids with the more deadly play with real guns. The deadly and fearsome confrontations are senseless infantile games played with real armament and with horrible consequences for the kids that participate in it, as it is for the communities embedded within their dense playground.
FIGURE 25. URBAN GROWTH NEIGHBORHOOD INDEPENDENCIAS 1989 TO 2013. SOURCE: AREAL IMAGES FROM THE MEDELLÍN PLANNING DEPARTMENT
FOUNDATIONAL STORY

Villatina is a complex neighborhood to explain in terms of foundation as its various sectors have different foundation dates. The earlier sectors date from 1948, but the roads that connect the area to downtown were not fully built until 1968, when a second wave of development started as part of an illegal development (urbanizacion pirata). Alongside that development, invasion (land taking) also occurred. In 1977, a social housing organization developed a housing project where sites were to be distributed without services. However, a long bureaucratic process permitted a group of community members to claim possession of the land. The varied types of legal tenured formation of Villatina reveals then that this neighborhood has had a complex web of formal and informal conditions since its beginning.

DEVELOPMENT PROCESS

An interviewee explains that he has lived in the neighborhood for 28 years, since arriving from a town in the state of Antioquia called Andes in 1973, at age 12. His family moved to Medellín because it provided...
more future for the kids. He explained that the only school in this rural area was located in the town several hours away. That condition made his entire family migrate to Medellín. The first member of the family to arrive was his sister who bought the lot in which she lives now. When she arrived there were only 50 families. This story is characteristic of city growth in Medellín in poor neighborhoods. After the sister had got settled, the rest of the siblings migrated to the city. Today, two of them still live in Villatina.

As explained before, the many different ways and times in which the neighborhood got started implies a very uneven process of development. In a way, Villatina experienced a process of de-formalization. This means that the first settlements were formal and with time new blocks added to the neighborhood were less and less formal ending, with land takings. As such, this heterogeneous neighborhood followed a path of densification that is more similar to an informal neighborhood than to a planned one.

The JAC again here is an important instrument for the development of the neighborhood, helping the neighborhood members acquire services and support from state agencies for the development of urban projects. In 1974, the Junta de Acción Comunal JAC was founded. Between 1975 and 1980 the JAC in collaboration with EE.PP (a public service company now known as EPM) worked on the construction of the water supply.
From mid-1984 onward, the Villatina developed more informally, thanks to the restriction on pirate urbanizations. A community member narrates his impression of the growth characteristic of this period.

After 1984, there were “ranchos’ everywhere. The work was done on the weekends to build the houses, the people would arrive; they chose a site and placed a flag to signal that this lot already had an owner. This was like what you call now “tugurios.” People would cook with wood fires. (710)

This informal development is happening alongside already serviced and formalized houses. A neighbor narrates how service provision worked.

When we arrived at the neighborhood, there was already energy and water, but it was contraband [of those services] that is why EPM started with the service provision. It was in those moments where the service of water stopped [pipe maintenance by a service company] that they would go and make holes in the main pipe and install the service. (710)

Only in 1982 did EPM fully serve these units (with water, energy and sewer). The ICT later implemented upgrading by self-construction. By 1989, the high sloped areas still remained unserved (Gómez Salazar, Ramírez Toro, and Calderón Vallejo 1987, 67)

Comuna 8 has a history of landslides that qualified the district as being a high environmental risk. The deadliest landslide in Medellin happened in Villatina in 1987. Around 500 people died and around 70 houses, 1.2 hectares were affected, a total of 1,700 people were displaced. Now, 25 years later, some areas that were covered by the landslide have been developed again, others have been left as open space as part of the declaration of “Campo Santo” (literally saint field, meaning that many bodies have not been recovered so this area was declared a cemetery) after the tragedy. In Comuna 8, a total of 488 families
live in areas of “high non-recoverable risk” in the Comuna. (Universidad Nacional 2005) a new study in 2014 has refuted some of these early findings, citing that a total of 210 are now considered in this level of risk. This discrepancy between the first-measurement and the second implies that for nine years, given the first study, 278 number of homes could not upgrade their units, sell them legally or access state funds for their improvement.

The Villatina landslide motivated one of the first exercises in neighborhood upgrading in the city: the “Proyecto Integral Para La Atención y Prevención de Desastres” (Integral Project for the Attention and Prevention of Disasters). It included home relocation, control of streams, reforestation, and development of basic infrastructure of streets and service connections (J. J. Betancur 2007). While some considered this project a paternalistic approach and uncoordinated, it did provide a basis for the development of the PRI-MED. Then when the PRI-MED was enacted in 1993-1997, Villatina was selected as one of the areas to improve because it still had large levels of urban deficiencies in services, infrastructure and quality of housing compared to other neighborhoods in the city.

In 2003, the city started the PUI programs. Comuna 8 was selected as one of the areas that needed the program, including the Villatina Neighborhood. Comuna 8 was the last to receive a PUI and Villatina was impacted, but some of the big projects are still on the process of construction, mainly two new metro cables that through a tramline would connect to the metro system. It is still too early to evaluate the type of impacts that these projects will have on the neighborhood.

**PHENOMENOLOGY OF VIOLENCE.**

Comuna 8 is an area characterized by high levels of violence. Historically those “violences” can be divided into four periods that occur in similar phases in the other neighborhoods that are part of this research: (1) the first gangs in the years that follow invasion; (2) the incursion of the guerrilla movements with the “Campamentos de Paz” that included more organized ways of urban violence and; (3) the following fight between groups allied with paramilitaries against the ones allied with the Militias and a final period (4) of gangs controlled by the franchises of crime of Medellín, in particular the fights between the Oficina de Envigado and the Urbabeños in the present. A commonalty of all those changes is that, in the end, while the changes in conflict had been large, the small corner gangs that deploy territorial control and in which their members live within the Comuna are always present.

From here forward, I focus on the NSAG who participate in Villatina instead of the state, but the relationship between the police and community members here, like that in other areas explored in this research, is a very uneasy one. In Villatina, this relationship follows a process in which the first evictions as part of the invasion are common. Over time, while police stop performing evictions, the lack of them does not provide security as in other areas. This absence of evictions is broken at some point by police abuses. A documented case shows part of this phenomena. In 1992, police forces stop a group of kids in a street corner in Villatina, order them to lay down in the floor and open fire. Eight youth, male and female from 15 to 17 were killed. This event is a turning point in that community – police relationships. Community members from early on see the police as an adversary from which it is important to defend oneself, as one community member says,
In 1975 or 1976, when the police got weapons that was when the kids got armed to defend themselves (Quiceno Toro 2008)

The distrust that this kind of event creates makes communities look for in-house conflict resolution systems. Some gangs provide those services as part of the legitimization process. A community member talks about neighbors’ preferences in terms of how they enact justice.

*People do not go to the police but to the gang to solve any problem within the community, because they consider them to know the community.* (710)

I focus on those four stages of NSAG, followed with a section that focuses on those moments where space is part of the conflict.

**GANGS**

As in the other neighborhoods, it appears that Villatina in earlier periods was less violent than in later ones. Violence and crime happen, but this is more the result of acts of individuals than groups.

*At that time in the early 1970s there was no violence. You could walk from downtown to the neighborhoods without any problem. The problems started in the 1980s, which is when the security started to change... From 1982 to 1990, there was less violence, there were thieves but not violence.* (710)

Fights among neighbors were common in those first years as in rural areas of Colombia where the use of machetes is a custom in fights. Explained an elder in an interview, *"There were legendary people in the neighborhood like Carevieja, Charrón, El Lobo and la Negra Genia, those were the best using white weapons [knifes] during fights”* (Quiceno Toro 2008, 24). Those duels are between individuals and not among groups. At this period, the neighborhood still looks more like a rural area. And the rural precedence of community members defines the way social interaction happens. There is a clear distance between community and the security apparatus of the municipality, typical of marginal neighborhoods. In general, first alliances between low trained and armed individuals start happening in the first years after the invasion. At this state, there are no connection between these gangs with larger organizations.

**CAMPAMENTOS DE PAZ**

Villatina was selected as one of the places to site the guerrilla group M-19 during the peace negotiations of 1984 called “Campamentos de Paz” (peace camps). These camps were sites that served to house guerrilla members during negotiations, but also were places for the training of community members in leftist leanings and military insurgence techniques (G. M. Franco 2006). As explained before, these negotiations broke quickly but left in the neighborhoods militants trained both politically and militarily (and in some cases guns too). From the peace camp in Villatina, a new urban guerrilla group would emerge: the *Milicias 6 y 7 de Noviembre* (M-6&7). This group would move from the lower areas of Villatina to the higher areas of Comuna 8, where there were more informal settlements. This Militia group “went far beyond propaganda, social work, and neighborhood protection. It engaged in an active and extensive ‘social cleansing’ campaign as well, targeting gangsters, robbers, rapists, child molesters, prostitutes, street-corner drug users, and others who were harming the community or offending its conservative sensibilities.” (Lamb 2010, 106). Building on the vacuum, other individuals who did not fit within the
ideals of the M-6&7 but who also have learned from the camps experience would form the group “La Cañada” in the proximities of Villatina.

In this stage, two types of gang organization start appearing. Those who have military training connect their ideals to the other NSAG of the nation and small local organization without clear political ideals but that use turf control as a way to obtain profits.

PARAMILITARES INCURSION

In the 2000s, the control of the territory of the Milicias would be to violently obtained violently by the Paramilitaries organization. The fight between Paramilitaries groups, Milicia, and the other franchises of crime in Medellin creates a high volume of conflict.

Here those changes of territorial control by franchises of crime demonstrate a complex web of actors with very different motivations for violence. They challenge each other for control of the territory. At the neighborhood level, the connection between the larger franchise and the gang that controls the territory is less clear. For example, the Terraza franchise took the area of Villatina. This was a part of multiple changes of power over the same small territory of Villatina as shown by some of the interviewee commentaries about changes.

In 2002, there was an ambush against the gang of this block, and they killed six, some say that they were Paramilitaries, others say that it was another gang that was in coalition with the "La Terraza" [gang]. After that "Los Mellizos" took this area. (710)

Small gangs get absorbed into those organizations and while some of the same members continue there is reshuffling of members among the fighting forces. By 2003, this chaotic context changed and most organizations get violent absorbed within the Bloque Metro BM that then enters into the DDR process that is happening throughout the neighborhood in Medellin at the period.

NEW FRANCHISES OF CRIME

After the DDR failure, as in other neighborhoods, conflict got fragmented, meaning that the groups had merged among the umbrella of the AUC (BM), broken apart again and depending on their alliances with other franchises of crime, started fighting each other for the control of territory. A new franchise, Los Urabeños, use the conflict within the Oficina to acquire areas in Medellín.

The last years of the conflict have seen a sophistication of the armed groups, franchises of crime are supplying better and more deadly armaments to the small gangs to sustain or acquire more territory. What has changed is the visibility of how actors display their military power too.

In the beginning, they would walk around with handguns and “changones.” Today they have assault rifles “fusil”. Before the things were more hidden, more silent.

11 Miguel Ángel Mejía Múnera aka "El Mellizo" or "Pablo Mejía" (born July 11, 1959) is a presumed Colombian drug lord and former paramilitary leader.
Those increases in conflict seem to be related with issues of turf control that mirrors larger profits.

*This year [2013] was the last war with “El Gomelo”, because in this Comuna there were not a charge for surveillance “celada”, “El Gomelo” was going to start to charge for it.* (710)

The conflict between the Los Urabeños and the Oficina in Comuna 8, had transformed the conflict into a racialized one. The neighborhoods from the upper hillside like La Sierra are populated more broadly from people from the Urabá region, where there is a predominant population of afro-Colombians. This is also the area controlled by the neo-paramilitary group “Los Urabeños”. The intersection of these two issues makes race a latent issue when trying to identify friends and foes.

*The negros [Afro-Colombians] founded La Sierra. Before the people that they got here in Villatina took to be killed up there to Los Tanques [water tanks the highest and farthest point in the La Sierra neighborhood]* (710).

This feature of the arrival of a new group by the arrival of a new population is also very recurrent in any of the transitions that have been commented on in all the cases.

*When the ‘blacks arrived’ in 2008 [Los Urabéños], they arrived from Santa Elena; they made the problem bigger. They used the non-employed youth and enticed them to become part of their group. They provided the weapons, also; they enticed people to engage in drug abuse and the sale of marijuana. The first time it is for free, then they will start changing for it, and if they become a problem then, they would kill them.* (710)

In Villatina, an older neighborhood with more mixed race composition being from the Urabá or afro-Colombian, is seen by gangs as signs of affiliation to the Los Urabeños group and sufficient grounds for forced displacement. A community member from Villatina talks about how this happened.

*“The neighbor from the house below had to leave because she is black and then [the Villatina gang] tell her that is she did not leave they would kill her, I helped her to move her things”* (750)

A report on human rights in Medellín (DDHH Y DIH 2003, 5), confirms that “the Caicedo combo linked with the Oficina de Envigado, had intimidated the afro-descendent population of the neighborhood Esfuerzos de Paz 1, as retaliation to the combo Los Negros. Before this area belonged to the Oficina de Envigado and now is with the Los Urabeños. This includes the total displacement of 95 families. As a result, a new invisible border has been placed between the Esfuerzos de Paz 1 and 2.

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12 *Juan Camilo Naranjo Martínez*, alias “el Gomelo” and head of the gang “Villatina,” a former member of Medellín’s Oficina de Envigado switched allegiance and began working with the Urabeños, was captured in 2012. http://www.elcolombiano.com/BancoConocimiento/C/captura_de_el_gomelo_costo_cinco_vidas/captura_de_el_gomelo_costo_cinco_vidas.asp
Displacement of community members is a very common feature and one that has clear spatial and social dimensions. Here I explore some of those salient features in Villatina.

SPACE
Here are some of the ways community member’s description of the conflict reveal some of the ways that that space is part of the conflict. For example alongside the Villatina landslide the times of the larger conflict also arrived. 1989 marks a period of intense violence that is related to the narcotraffic gangs. Community members link the two events as one creating the other “After the landslide; everything changed. The people became more violent and more aggressive. This was also because other new people arrived. This way the “union” [togetherness] was lost.” (Coupé, Arboleda, and García 2007, 34). It is not the that the landslide produced the conflict, but that during that time two things are happening. One is that the landslide displaced many families and that the projects to rebuild the neighborhood created opportunity for newcomers that happened at a time of peak violence in the city. Community members experienced all those events together and connected them as producing conflict.

As with other neighborhoods explored here there have been many gangs and affiliations with political or drug cartels or non-state actors. Turf protection is one of the most evident features over these transitions. The sloped topography of Comuna 8 make this Comuna, relatively close to downtown to be an isolated area. The topography also generated very clear distinctions between sectors. One particular geographic feature determined fragmentation of the territory. The Quebrada La Castro (Castro Creek) which flowed down Cerro Pan de Azucar (Hill) serves as the limit of two areas of Comuna 8, La Sierra, Villa Liliam and Las Estancias, Villatina and San Antonio. This creek that intersects the territory in two has served to define illegal armed actors’ territories over its history. In the mid-1980s, La Cañada gang took its name from it and controlled the lower areas and was in constant confrontation with the groups that control the high hillsides like the Milicia group M-6&7. Actually, individuals expelled from La Sierra were part of the social cleansing by the M-6&7 and ended up being part of the most socially flexible group (meaning that they admitted drug addicts) of La Cañada.
Later on this division by geography during the Paramilitares incursion into Medellin also became the stage for confrontation. After taking down the Milicias of “8 de Marzo” the Bloque Metro and the Bloque Cacique Nutibara and its allied gangs fought each other until the BM won control of the entire territory and then entered into the DDR process in 2003.

This geographic separation of armed groups continued until the present. Groups and affiliations changed. For example, the “Villatina” gang affiliated to the larger criminal organization “La Oficina de Envigado” and was in the fight with the other gangs of La Sierra affiliated with the “Los Urabeños.” The creek still is the site of part of that division. A Community member explains how those limits are formed,

*The invisible borders are between areas of drug consumption. The buyers cannot cross from one side to the other. During the time of war, the kids do not go to school because there was an [invisible] border in the ‘los charcos’ area. Today the only [active] invisible border is the one between Villa Lilliam and La Sierra [the Castro Creek]… combos were founded in La Sierra. However, they will come down [to Villatina] to the football court to meet with the community. These were groups of 20 to 30 young males. First there were not so much war between groups. Each one took care of their sector. However, for issues of power they have started to fight against each other.* (710)

Here over more than three decades and three different NSAG the geographic feature serves as a way to delimit boundaries between different groups.

There are other ways that space appears in the interviews besides geography. Territorial control is done by controlling access to the neighborhoods A neighbor of Villatina explains the gang member methods of control.

*They [the gang] will search the public transport car going up to the neighborhood to see who was there going up or going down.* (710)

This is similar to the actions of Paramilitares in San Antonio Savio. Beside the access, places are selected because they permit the ability to escape from police or because they provide a strategic location to look at or shoot at potential enemies.

*There are many paths and exits from which to escape. They use the terraces to shoot.*

The neighborhood here is seen as the entire battle space where the boundaries of what is private and public are transgressed at moments of confrontation. In Comuna 8, there are some areas that have seen so much conflict that community members decided to cover their windows with bricks and mortar to assure they will be safe at moments of confrontation. In a way to assure that those boundaries between the private and public are not crossed. This is the ultimate physical barrier created as a result of fear.
As the different periods here is showing the gangs are constantly changing affiliations with larger criminal organizations, the community member explain that “The time that a ‘banda’ is in power is very short is just of moths to a max of three years. (710). Armed actors leave the conflict by death, arrests, fleeing the neighborhood or in some cases are fortunate that they could just leave because the groups that they belong are decimated before they are killed and become “adults” as this interviewee commented,

Today there are adults who were part of the gangs. They at some moments decided to leave the conflict, or are left without a job [gang], and that way stayed alive. The ‘bandas’ [gangs] they respect that you become or not part of the group, but they try to allure you to get in. They make ‘novenas’ [Christmas events], tours, food events, loans, etc. In this way, they involve the kids and when they grow up become part of the ‘banda’. (710)

The ephemeral existence of a particular gang is contrasted with the permanence of the space that is part of the turf control that change hands from gang to gang overtime. I will concentrate on that on the chapter VII.
FOUR MORE NEIGHBORHOODS AS CONTROL CASES

LOCATION OF FOUR NEIGHBORHOODS AS MORE CONTROL CASES

FIGURE 32. INFORMAL SETTLEMENTS CONTROL CASES. (1) NUEVA JERUSALEM, (2) PINARES DE ORIENTE, (3) ANTONIO NARIÑO AND (4) EL PICACHO.
El Triunfo, Santo Domingo Savio, Independencias and Villatina were selected because they are neighborhoods that have a long history of informal development and conflict. As such and as the first section of this chapter shows, there are many commonalities within these cases. Here I have added four more neighborhoods as control cases using a variation of the “N of One plus Some” research technique of secondary cases that are used to “to identify issues to expect, questions to ask, and data to look for in the primary case[s].” (Mukhija 2004)

The neighborhoods selected as secondary cases are: Nueva Jerusalem in the municipality of Bello, Pinares de Oriente in Comuna 8, Antonio Nariño in Co, El Picacho. These areas were selected because they permitted us to see features that in the selected neighborhoods were not possible to see. And also because they help to corroborate findings in the selected neighborhoods. Following there is a brief explanation of why those neighborhood were selected and a brief description of similarities or differences that these cases present in the four areas of the historical mapping. Here after a brief introduction of the neighborhood and why it was chosen I focus on its story of the development and its phenomenology of conflict.
This is a neighborhood in Bello, a municipality north of Medellín in the same valley (Valle de Aburra). This territory has been developed informally in the last seven years. This neighborhood provided the opportunity to see an informal neighborhood at an early stage of development. The houses here are still much separated from each other that gives a rural appearance that is very similar to the pictures of Independencias in the 1980s and Santo Domingo Savio in the 1960s. Most houses are built of very fragile materials while others are transitioning from light material to other more solid as brick and mortar. Most paths are no paved, and some are just lines on the floor, community group just gather on Sundays in “convites” to widened streets and put illegal connections to power lines. The narrow paths are being expanded to accommodate cars. The urban street network is being built as I write these lines.

The neighborhood size is large comparable to that of a Comuna it is actually the largest informal development in the metropolitan area in all its history. The size provides some problems of comparability for this research because in itself there are areas that already behave as being on later phases of development, and this influences how the new areas behave. It is also outside of the Medellin jurisdiction and as such it has to respond to different political systems. However, the ability to see the convites and to see the transformation process as it happens is invaluable.
By visiting the upper-hill slope of the neighborhood, it was possible to see many things happening at once: houses being built of all types of materials from very code-complying concrete and brick construction to wood and plastic. Most of the road network were simple lines on the floor carved by the passing of the dwellers. A new road that reached the last group of houses was in the process of construction, which means that the hill had been carved up to the minimum required 7 meters so a car could pass, no other finish than the bare soil was placed on this road. All the work was done by way of convites. Some public services were provided by community members that gave maintenance to the infrastructure, in this case, the electric cables. In one of the visits, a community member struggled trying to connect the service again for hours claim in a makeshift ladder.

**CONFLICT**

Nueva Jerusalem is far from being an isolated neighborhood is a 5 min walk from el Triunfo. To cross between territories, there are some empty lots large enough to fill a neighborhood like El Triunfo. Community members considered these areas dangerous, and the presence of groups at particular points of the walk showed that the fear to encounter such groups was felt by the community members.

So while community members were close to each other and knew each other by name and gathered together in the convites. There was some presence of rather sophisticated illegal armed actors in this neighborhood. Their presence did not pose a large enough threat to have combat on the streets as in Independencias or Villatina, but they controlled some of the services provision in the areas that I visit.
PINARES DE ORIENTE, COMUNA 8

This Neighborhood in Comuna 8 (the same Comuna than Villatina) has 5 years of founded. It was a very small area at the fringe of the city, an area that is already fully developed. Houses here are mostly built of wood and other lightweight and temporary materials. The population of this group is majority registered desplazados, and most of them have received, thanks to the national program on desplazados (Programa Nacional de Atención Integral a la Población Desplazada), some kind of state-sponsored help to cope with issues of displacement as part of a national program of retribution to victims of the Paramilitar violence. Here state and local initiatives mix to provide the neighborhood with infrastructures like electricity, sewer and water.

URBAN DEVELOPMENT

The Pinar is one of the most recent invasions in Medellín; it has a similar foundational story in other invasion neighborhoods of the study. Many of their population is declared displaced which makes the government less interested in being seen as displacing this population again. Here is very clear that rural connection of the new dwellers, the neighbors have joint together into an organization that has permitted them to use some of the land for growing produce. This settlement works more like a very compact rural area in an urban neighborhood in terms that each house is a tiny farm. This group of
dwellers is very organized, and the houses are small and light, but firm. Many of the small houses are being upgraded with new and strong materials. Houses are sold and bought, which shows a healthy real estate market under conditions of informality. Five years after the invasion, most basic physical needs have been covered and good connections with municipal and state institutions have provided subsidies and support for several community projects including the building of paths and the provision of seeds and soil for the community gardens.

CONFLICT
While Comuna 8 is a very conflictive area when I interview the members of the neighborhood, they explained that gangs operated outside of their perimeter, and that they had not had any problems with security. Other community members from other neighborhoods corroborated part of that perspective but explained that given that the gardens were seen as an income source there were rumors that they “the gangs” will start to charge a “vacuna” (a fee) soon.
Located in Comuna 13 (the same Comuna as Independencia) is a “pirate neighborhood” in one of the oldest and better areas served by the city's street urban network. This permitted us to see how informal neighborhoods behave when it was well connected to the city and had a more accessible street network. This neighborhood is developed on a grid structure and flat terrain and adjacent to better served areas of the city. Here there are still some levels of conflict that permits to see some of the differences with its neighboring area of Independencia.

This is a non-state sponsored self-help neighborhood, as such it had to go through many of the struggles that invasion neighborhoods have to go through, for example, the creation of a JAC permit community members to use clientelistic networks to access services provided by state companies like water, sewer and energy. This was done by the newly formed Junta de Acción Comunal that through connection with Juan Cortes (an employee at EPM) make the connection of the application to the EPM.

While there is some violence, and history of gangs in this specific neighborhood community members consider that the areas that are the most dangerous are the hilled streets and paths that flank the flat area of the neighborhoods.
FIGURE 38. URBAN GROWTH NEIGHBORHOOD INDEPENDENCIAS 1989 TO 2013. SOURCE: AREAL IMAGES FROM THE MEDELLÍN PLANNING DEPARTMENT
A neighborhood of the late 60s Antonio Nariño developed lot by lot, each family create fragile structures like the ones done in the neighboring invasions despite have a relative legal tenure of the land. So the first units were very fragile and got stronger and dense over time as dwellers have more income to improve them. During the decade of the 80s, most of the houses had already reached the second floor. The higher densities saw the beginning of store corner commerce. The first stores started in the 80s with three-corner stores, to date there are 20 stores total. A very cohesive and active JAC build the projects like the church and the first kindergarten. What is happening as density is increasing. An interviewee explains that *The last lot to be occupy was the church, and that was 40 years ago (703)*

by 1985, dwellers left space for the creation of the church. The importance given to the creation of the church as the first communal public facility is a recurrent issue on all the narratives of foundation that are part of this study. This becomes a key piece to study on that of informal development not only at the social scale (as assistance to the poor), but also at the scale of the urban form (as the first public facility).

With the development and more state intervention small community or individual projects become state of large NGO projects. As an example in this neighborhood, the first kindergarten was located in the community built *Casa de accion communal*. And run by a single teacher. Today the same lot was seed to an NGO “Carla Cristina” to provide the same service.

With the construction of the metro station (1996) and the last station of the B line (San Javier) at just four blocks from the neighborhood, the type of business in the neighborhood changed and increased. In the interviews explain that the fist mini-market appear just after metro open. The connection transportation improvement with more commerce mirrors what happen in Santo Domingo Savio after the Metro Cable station.

**CONFLICT**

Community members say that his neighborhoods founded around the 60s not by invasion but pirate development was very calm most of his 30 years a community member that live since foundation explains.

“The presence of thieves and gangs was evident by the 90’s. At this point, the neighborhood was already very populated. (704)

She explains that:

*40 years ago the fights were with knives and machete, but were something very rare. Then the ‘mariqueneros’ [addict to Marijuana] appear, and they will situate in the corners and at the hill, the first gang here were ‘los Gilligan’ this gang took care of security, later other gang appeared was the “cuquitas” (that gang disappeared five years ago [2008]) (705)*

They explain that there is a change in the way the conflict happens now in their neighborhood

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*13 Gilligan from the TV show the Gilligan’s Island*
And recently are people from other neighborhoods that come to live in the neighborhood. They come and rent houses in strategic places [she points to an alley close to her house]. They look for places that hidden, but that have easy vehicular access and or have a great view of the neighborhood. (705)

They see this new wave of violent actors more as groups that use the neighborhood as a place to hide from others. They strategically located houses to preempt any police raid or warring groups. These houses are taken by force explain the interviewees. An interviewee explains that a house in the corner was used by known drug lord (not named) to hide until the police raid the house. He was able to escape. The geographic limits (a river and the slopes at its edges) of the neighborhood delimits the boundaries of groups and the presence also of the invisible barriers of other neighborhoods. A neighbor explains that; the Invisible borders are something new, that those are stablished by neighborhood of by blocks (704). Most stories of conflict and barriers point to the sloped areas. This area is in itself the limit between the better off (in terms of conflict) part of Comuna 13 and the areas that are considered the most conflictive. The interviews seem to corroborate those ideas.
The Pichaco is a self-help neighborhood built by Instituto de Crédito Territorial (ITC) the lots were delivered with supply of public services (water, energy and sewer). It was one of the first experiments of social housing in Medellin. And had large success. The Pichacho as a neighborhood is very large but its upper section is very close to El Picachito an invasion neighborhood that share many characteristics with El Triunfo. Today beyond that some streets are strait and other not is very difficult to distinguish the difference between the higher part of el pichacho and pichachito.

**URBAN DEVELOPMENT**

The level of state support that implies that lots are provided by the state at reduced cost $96,000 COP of 1979. And some technical assistance was given to the type of construction should imply serious differences in the way this neighborhood behaves when compared with for example to El Triunfo or Independencias. But the truth is that the state is very absent after the delivery of the lots and communal organizations are the ones leading the development projects.

A show of how in need this neighborhoods is when compared with informal ones is that the PRI-MED that only invested in the most unequipped neighborhoods in the city invested funds in these areas a community member mention that she was part of the JAC and that the park and playground were built with some money from the PRIMED $3million pesos/1990 [$ 1,500 US].
As all the houses were built by self-help system that incremental process is very visible here, and homes even today are getting upgraded. The house of one of the interviewees, a first floor, was finished in 1979 the windows openings at that time were covered with wood (instead of glass) that served as a window, and the second floor was only built until 2001 (to house her ex-husband).

CONFLICT
With the consolidation of the neighborhood and the struggle to get higher level of services also arrived the elements of conflict.

*When we started working on getting the clinic and the bus lines that were at the same time that the gangs started that was around the 1990s. Also with that also came the invisible borders.*

With the increase of violence in the 1990s, many of the founder members of the neighborhood left. Also, here many of the youth were involved in gangs and died at very early age. A community member explained that proportion of killed youth.

*Many of those kids died, some left others got married. From like a hundred (that were her students), today there are only 30 left in the neighborhood. My house was the clinic of the neighborhood during the violence if a member of a gang got hurt they would bring it here (711).*

The violence gang combat and turf fight.

*In the hard time of the violence the two gangs that fought each other were the “El Ojón” and the “Tintos frios”*. There were also “Los Frisqupanes”, “Los Machacos” (de la maracaná) and the “El Castillo”. One day the muchachos from “las torres” came up to take the territorial power. They were approximately 70 men dressed in black and with orange headbands. They were led by “Arley,” he was the son of one the community mothers he will be killed later by the “Tintos frios” gang. This happened around 12 years ago [2001]. At that time, they killed a 5-year-old girl who was playing on swings. She was left alone when the shootout started and died seated on the swing. (711)

In the pichacho and pichachito, the same groups over long periods of time (Milicias, and pramilitares) are visible. Also, members of the AUC are still operating after the failed DDR. In one of the neighborhood tours, I had the opportunity to meet a group of men who were fixing a two-story house. After leaving their sight, my guide explained that the person was an ex-Paramilitary. That that house was taken away from a community member. And that the leader of one of the groups had been part of the DDR. In this community to climb the hill we stop at particular points. Said greetings community members and check on the security state of the next block after each checkpoint greeting we were allowed to continue. Meaning that as we approached the edge of the city, community members felt less comfortable walking with a stranger like me (a Colombian male asking questions).
CONCLUDING
Here I have provided a descriptive narrative of the research areas. The last four neighborhoods were provided as context that inform the main cases. The salient feature is the similarities of the types of conflict in the main cases. The same franchises of crime in Medellín operate in them, in most the state is very absent and as in the case of Comuna 13, its police and military commit abuses on the population that further distances state from the communities that house NSAG. In terms of the physical form, buildings, streets and public buildings follow a very similar patterns and growth rate. Territorial control by neighborhood gangs (called with different names and affiliated to different large criminal organizations) is very similar. Corner gangs are the salient feature and their violent techniques evolve as they relate to the large franchises. The next chapter V queries this data versus the main research questions.
CHAPTER 5 “SLUM WARS”: UNDERSTANDING SPACE AS A VARIABLE OF CONFLICT IN MEDELLÍN

This chapter focuses on the issues raised in theoretical chapters about informality and conflict (Chapters II and III), specifically the theory that informal settlements are a unique battlespace. Here the goal is to address the main aspects of how the space of informality engages with urban conflict.

This section is divided into two interconnected parts. The (1) first part dwells on the questions about urban informality as a physical space. It provides evidence using the case of Medellín to identify and analyze developmental processes and to define conflict in informal settlements spatially. (2) The second section explores this Medellín case study’s issues of conflict and identifies ways in which space is a variable that affects conflict.

Part one. Space of informality tests the following questions:

a. What is the distinction between formal and informal space in Medellín?

b. What evidence can be provided that informal development patterns in Medellín follow prescriptive development as explain in the emerging literature in terms of a “rational and predictive urban model”? Can it be asserted that in Medellín the three stages (foundation, infill, and consolidation) (Drummond 1981; Mesa Sánchez 1985; Augustijn-Beckers, Flacke, and Retsios 2011a) are clearly visible?

c. Is there evidence for “slum wars” in the Medellín case as an urban violent conflict that is unique to the conditions of urban informality?

Part two. Conflict:

a. If the urban form changes, what implications does this change create for the communities who live in it? What does this change imply for communities in terms of how it impacts the composition of their social organizations? How do social ties change over time given the physical changes that occur in informal settlements?

b. If we follow the military perspective of a “failed” community within failed states in the context of the “four generation wars” (Sullivan and Bunker 2002; Lind 2004), how do non-state armed actors at the local level compare with the ones at the national scale? Are these actors more present in informal settlements than in formal ones? How “asymmetrical” (Rosenau 1997) are the urban fights in informal settlements in Medellín?

c. And finally, do changes in urban form correlate with changes in urban conflict? In other words, are the tools of urbanization also the tools of war in an urbanized conflict?
PART I INFORMALITY

Figure 40. Urban Perimeter + Informal Settlements History. Urban growth and informal settlements history. Source: (Naranjo and Villa 1997; Bahamón Álvarez 2009) and Departamento de Planeación.
How common is informal urban development in Medellín?

Medellín is a city with about 85 years of documented informal development. As of 2014, 15 percent of the city is still considered informal, but maybe more importantly, Medellín is a city in which a staggering 37.1 percent of its current territory, at some point, was developed in an informal way. Table 5 provides an important mapping of such evolution historically. This data of growth makes evident that informality is a very common form if not the dominant form, of development in the city, perhaps one of its most salient features.

**Table 5** Formal vs. informal urban development in Medellín. The following data is based on the historical mapping of informal settlements based on this research. The total number for informal represent areas that were at some point considered informal.

<table>
<thead>
<tr>
<th>Year</th>
<th>Total (HA)</th>
<th>Informal (HA)</th>
<th>Informal (%)</th>
<th>Formal (HA)</th>
<th>Formal (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1960</td>
<td>6,875</td>
<td>1639</td>
<td>23.8</td>
<td>5,236</td>
<td>76.2</td>
</tr>
<tr>
<td>1970</td>
<td>6,875</td>
<td>2125</td>
<td>30.9</td>
<td>4,750</td>
<td>69.1</td>
</tr>
<tr>
<td>1980</td>
<td>8,287</td>
<td>889</td>
<td>10.7</td>
<td>7,398</td>
<td>89.3</td>
</tr>
<tr>
<td>1990</td>
<td>9,055</td>
<td>1,740</td>
<td>19.2</td>
<td>7,315</td>
<td>80.8</td>
</tr>
<tr>
<td>2000</td>
<td>10,264</td>
<td>1,624</td>
<td>15.8</td>
<td>8,640</td>
<td>84.2</td>
</tr>
<tr>
<td>2014</td>
<td>10,277</td>
<td>1,729</td>
<td>16.8</td>
<td>8,548</td>
<td>83.2</td>
</tr>
</tbody>
</table>

Along with the proportion and numbers, it is important to highlight that the informal development process seems to follow very specific geographic patterns. Figure 40 shows all areas that had been considered informal since 1959, when the planning department started to map such developments. Since most of the development of informal development happens at the edge of the city on the slopes of the Andes Mountains, it is understandable why that most of the development follows a different urban pattern than in the city center down below, built in flat areas of the valley. There are two types of urban form with different urbanization logic that respond to these topographic features. One that is in the low slope areas of the valley and the other is in the higher slope areas of the Andes Mountains.

It is also important to highlight from this mapping that some areas at historical points are considered informal but in later periods, given their consolidation and integration into the urban formal city, are no longer considered as such. There are many reasons for this type of inconsistency of mapping. Medellín suffers from a struggle, as in many other cities throughout Latin America, to find a reliable methodology to define what an informal settlement is. Thus, at different moments in time, different metrics are used to map the same form, which in turn gives different results that can be difficult to compare with each
other over time. There is also the issue that municipalities have often undertaken slum eradication. As a result, many of the oldest informal settlements have been removed, and new formal urban forms have replaced them. A perfect example of this are the informal settlements at the edges of Medellin's downtown area, which during the 1960s and 1970s, were removed to make space for the new regional highway and also for the new administrative center (Centro Administrativo la Alpujarra). Alongside this process of replacement and as some of the neighborhoods histories have shown, all informal neighborhoods suffer some kind of eviction threat, many of them several times. Some are more successful than others in maintaining permanence over time.

This kind of mapping reveals that some areas are very successful in the transition from informal to formal. From segregated (from the formal city and its resources) to integrated. Some areas, once considered informal, receive services, develop and stabilize to such point that by most measurements they become formal and integral to the city. It is not possible then to consider them informal anymore. I argue here that this happens in Medellin, as possibly distinct from other cities in Latin America, thanks to the blurred line that exists between what is urban formal and urban informal both physically and ideologically. In Brazil, for example, there is a specific label for informal development: “favela”. This term favela refers both to the people who live there (favelados) and to the unique type of housing that happens in this specific geographic location. Many people who live in favelas and many who do not, see this term favelado as pejorative. This relationship between the name of the people and the urban typology means that you can transform the place into a formally incorporated neighborhood with higher quality of life, yet people who live there are still called “favelados” and the place a “favela.”

In Medellin, that distinction is less clear. First, given the confusion about what to call these places, there is no single term used to refer to informal urban developments. For example, a commonly used term to refer to informal development in Medellin in the media is “Comuna,” but the term, technically and legally, refers to a district. The term Comuna does not discriminate between formal and informal areas. The other term that was used in the early 1960s was “tugurio,” which would be similar to the term favela but a tugurio is a building type and not an urban form. A tugurio is the temporary structure built in the first stages of informal development. The key distinction here between the favela and tugurio is not only semiotic. When a tugurio gets replaced by a solid structure, it stops being a tugurio. This transition is quite evident in all the narratives of the previous chapter. All interviewees did live first in tugurios, today live in houses. Thus, semantically and technically, their housing units cannot be considered tugurios anymore. This illustrates how the labeling of urban form can contribute in a pejorative way to the permanent marginalization of poor communities.

In the maps of the history of informality in Medellin, a pattern appears of what stops being informal and what remains being informal. Areas located in the flat terrain tend to loose their informal distinction in the minds of the public. Informality move towards the edge of the city, the older and lower (on the Andes mountain) informal areas are absorbed by the formal city.

Finally, this mapping reveals two other significant findings. (1) Time is an important variable to understand informal settlements and (2) there is a mutable condition of informal settlements in which
change seems to be the only constant. These two conditions are central to my focus of study in this next section of inquiries.
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLÍN, COLOMBIA (1970s-2013)

MEDELLÍN URBAN PREDICTIVE MODEL OF INFORMALITY

Current literature on informal settlements largely supports the idea that informal development follows a prescriptive series of stages (Drummond 1981; Mesa Sánchez 1985; Augustijn-Beckers, Flacke, and Retios 2011). Scholarship about Medellín informal development does not, however, recognize these prescriptive series of stages. From the studies that trace informality in Medellín, Nora Elena Mesa Sánchez’s stands out, she observes a series of stages of urban development within informal settlements in Medellín. She comes to three phases similar to Drummond’s, which she defines as follows: “Stage 1, Poblamiento (populating): Allotment or subdivision, the moment of settlement-behavior relative to the ground. Stage 2 Edificación (Building): the volume, or three-dimensional aspect of the constructions of the buildings. Stage 3 Adecuación (adaptation): Consolidating and establishing relationships” between the physical infrastructural networks (e.g. streets, transportation, public services) between informal settlements and the city (Mesa Sánchez 1985).

Beyond recognizing stages of growth, these earlier studies tell us little about the concrete defining characteristics of each stage. Here, I provide a more detailed picture of each one of these stages as they emerged in my research. This division into stages later permits me to take some specific measurements from which I assert the spatial performance of these distinct types regarding conditions of conflict.

STAGES OF INFORMAL DEVELOPMENT

To measure the stages of development, it is important to define in formal terms what the singular characteristics of each stage are. I have compiled this list from the literature about informal settlements and note where my case studies in Medellín support this list and/or offer site-specific additional insight into these arguments. Reflecting the perspective of the research, I call these stages: (a) Foundation, (b) Infill and (c) Consolidation. Based on the specific case of Medellín, I would add a fourth stage, which now I call (d) Integration. I believe that this fourth stage is ripe for future research, especially in the specific case of Medellín because of its large numbers of displaced communities and the unprecedented scope and scale of city-intervention over the last decade.

D. FOUNDATION: This is the first moment of creation of a group of homes. In Medellín, this refers to that moment of first “invasion” of the land (land taking) that is preceded by the formation of a group of families and individuals who together create and execute a well-organized plan to claim ownership of the site. Formally this period is characterized by light and quick construction. Because of the way informal settlements look at this stage, informal settlements often incorrectly get called “spontaneous.” Speed is paramount in the land taking process. Swift action in occupying the site and in building is essential for successful land taking. By moving and building fast, communities slow the state’s ability to enact legal evictions. In many cases, this first moment of building happens in a single day. While work will continue over the following months, the first land taking will be planned in advance, but executed in a matter of hours. That speed of construction leads to the second mislabeling and misconception about informal settlements: at they are “temporary” settlers have to erect the houses with limited economic resources and in

14 With the possible exception of Medellín’s urban perimeters, that is the legal city urban edge (Bahamón Álvarez 2009) or the work on Medellín urban growth (Schnitter 2007).
little time, and these limitations determine the architectural housing typologies they build. In the literature, the term “ephemeral” is often used to define the physical characteristics of informal settlements. The mistake here is that what is ephemeral is the typology and the materials from which the housing is made at that initial moment of “invasion,” does not reflect the intention of sustained occupation. None of the dwellers who embark on the process of illegal occupation and land taking are thinking of this as a temporal solution to their housing needs. The housing that is built at this stage is precarious and minimal. It does not occupy the entirety of the terrain claimed. The buildings do not touch those of their neighbors. Ample space is left between units. The square footage of the houses supply minimal needs of shelter and the building quality depends on the expertise and the materials accessible to each dweller.

Along with this process, the number of members of the community is relatively small when compared with the final number of occupants of informal neighborhoods. Based on the interviews, the magical number to conquer a site, or the “goldilocks”15 of informal invasion is this: too many to be removed easily and not so many that they cannot be easily coordinated by the community leaders – a range between 25 and 75 families. Low density (Unit/hectare), small units are the key defining physical features of this period. Because of the relative small population, this is also the period in which massive evictions are more frequent. The state does most of these evictions; private landowners undertake fewer. On occasion, extreme violence was used by illegal armed actors to remove informal dwellers.

E. INFILL: This is an in-between period after the foundation of the neighborhood. It is characterized by a change in density and the diminishing of open space between units as a result of the growth by existing homes and creation of new plots by the subdivision of existing ones. At this stage, the ultimate relationship between open spaces and built structures is determined. At this stage, the neighborhood also obtains its final distinctive urban structure of paths of movement and public space with respect to private space.

All the initial housing units are replaced in this period by larger and more substantial buildings. Roads, public buildings and public services are installed. Contrary to popular misconceptions, a large portion of the units’ construction are, in one way or another, supervised by professional contractors, who in Medellín are called “Oficiales.” These are the same people working throughout the rest of Medellín building the formal city. In the essay “The Form of the Informal,” Fernando Luiz Lara states that the builders of modern Brazil are also the builders of the favelas (Lara 2010, 30). In Medellín, at the same time, to all units because a lot of the physical labor is shared in “convites”. Dwellers are invited to not only build and improve public amenities and infrastructure, but also to build private units. At this stage, most of the first level areas claimed are fully utilized. “Light roofing” material are used to cover the one-story units. Many of the families who took more than the land they need will sell or share the property until most of the

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15 The Goldilocks principle states that something must fall within certain margins, as opposed to reaching extremes.
lot is developed. The ground area coverage during this period almost reaches maximum occupation. The process of densification happens by increasing the number of units, their square footage and number of dwellers who occupy them. The population growth at this point is exponential. Public services as sewer, water, electricity are installed as well. At first, these public services are connected illegally, but not for free. An installation fee is charged per unit. And maintenance and reconnection fees are also charged. By community members who construct and manage the system. Finally, the units become more substantial as the temporal materials of the invasion are replaced by more solid materials like brick or concrete blocks. The temporary appearance disappears.

F. **CONSOLIDATION:** In this stage, informal settlements obtain their mature urban form as the process of growth reaches a plateau. Some are successfully integrated into the formal city. Even as growth continues, it does so in a marginal way compared to the previous stages. At this stage, once again housing density increases. Most units go from single story to two, three, four or more floors in height. This depends a lot on the economic standing of the families. Most second levels are the result of family size increases. Based on my interviews, these increases are the result of sons and daughters arriving to an age in which they need a separate home and provide an extra income to make the development. The roof of the housing unit becomes the site for a new home. In that process, houses that have been built with terraces already are more easily upgraded while houses with lighter roofs are dismantled, and a flat roof is built along with the reinforcement of the foundations and structure (in the best cases). The roof (a terrace) of the extension will be used as a space for future expansion, or in a case of lack of resources, the roofing material of the old structure will be used as material for the new second (or third) floor addition.

At this point, threats of eviction become more improbable given the number of families who would be required to be displaced and the lack of low-income housing projects to relocate such families. This mean that the state also enters into a different type of relationship with the informal settlement. The state finally provides most services and most state-sponsored urban upgrading programs are dedicated to neighborhoods that have arrived at this stage. Density is double or more than in the previous stage (see Table 6). However, it is also apparent that the neighborhood reaches a plateau in which population increases are not feasible at the rate that have happened before. In most cases, there are small losses in population in these last years.

In terms of urban form, high density is the most salient feature. Quality of life improves because of a larger presence of the state public infrastructure as roads, bridges, public buildings. Many of these state improvements replace older structures that had been built by the community or NGOs in earlier stages. In general, public infrastructure (buildings, services and roads) get improved by replacing already community built infrastructure. In Medellín, extensive urban upgrading programs are implemented.

All these state interventions can occur because at this point the legality of most settlements have been resolved, terrains have been acquired by the city or negotiated with legal owners, and
settlements have already incorporated into the urban perimeter. So all legal restrictions that before had prevented the state from intervening have been removed. Along with improved structural changes, aesthetic improvements start to become evident in the units. Facades are painted or covered with materials that become an aesthetic representation of self and identity, with colors, murals, thought to design for design’s sake. All of this does not happen at the same time, but unit improvements are a reflection of the economic standing of particular families. The different levels of quality of housing also reveals the heterogeneous nature of income in informal areas.

Figure 41. Santo Domingo Savio. Stages of Development
MEASURING CHANGE OVER STAGES OF DEVELOPMENT


<table>
<thead>
<tr>
<th></th>
<th>Stage 1</th>
<th>Stage 2</th>
<th>Stage 3</th>
<th>Foundation</th>
<th>Infill</th>
<th>Consolidation</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>El Triunfo</strong></td>
<td>BUILD AREA</td>
<td>1,050</td>
<td>29,739</td>
<td>41,331</td>
<td>m²</td>
<td>11.7</td>
</tr>
<tr>
<td></td>
<td>UNITS</td>
<td>25</td>
<td>564</td>
<td>1,135</td>
<td>****</td>
<td></td>
</tr>
<tr>
<td></td>
<td>POPULATION</td>
<td>113</td>
<td>2,540</td>
<td>3,998</td>
<td>***</td>
<td></td>
</tr>
<tr>
<td></td>
<td>DENSITY</td>
<td>2.1</td>
<td>48.2</td>
<td>97.0</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>BUILDINGS</td>
<td>25 (1983)</td>
<td>1,121</td>
<td>1,506</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Santo Domingo</strong></td>
<td>BUILD AREA</td>
<td>19,168</td>
<td>55,385</td>
<td>78,605</td>
<td>m²</td>
<td>16.2</td>
</tr>
<tr>
<td></td>
<td>SQM</td>
<td>5-500</td>
<td>2,383</td>
<td>4,885</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>UNITS</td>
<td>3,500 *</td>
<td>10,490</td>
<td>21,505</td>
<td>**</td>
<td></td>
</tr>
<tr>
<td></td>
<td>POPULATION</td>
<td>30.8</td>
<td>147</td>
<td>301.5</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>BUILDINGS</td>
<td>541</td>
<td>2,915 (1994)</td>
<td>3,671 (2013)</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Independencias</strong></td>
<td>BUILD AREA</td>
<td>3,159</td>
<td>81,346</td>
<td>199,009</td>
<td>m²</td>
<td>17.2</td>
</tr>
<tr>
<td></td>
<td>UNITS</td>
<td>50</td>
<td>4,157</td>
<td>6,996</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>POPULATION</td>
<td>225</td>
<td>11,222</td>
<td>18,887</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>DENSITY</td>
<td>2.9</td>
<td>241.7</td>
<td>406.7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

The stages of informal development maps these first three phases to reveal if change between is happening. From this mapping, we can acquire quantitative data to understand the rates of this change.
Table 6 provides data on population, housing density, and area coverage for three neighborhoods (El Triunfo, Independencias and Santo Domingo). I produced this table by cross-referencing multiple sources as this information is not available in any archive or pre-existing study. I combined information from aerial imaging that provides information on the coverage of land. A 2010 Medellin map provides a relatively updated mapping of existing conditions on Medellin. Historical aerial images allowed me to determine what used to be open and built space before the informal settlements. Ground photos of different periods show building types and heights to create a general idea of density per lot. Finally, family album images and interviews provided the information about the founding of informal settlements and do so in the words and images of the founders themselves.

This information has allowed me to quantify the evolution of informal settlements in these three stages as a measurable phenomenon. It supports what is evident in the interviews in that it shows urban growth happening at distinct rates for each period. It also presents the three moments as a very distinct urban spaces. As a three similar (in the sense that they are each informal communities) but separate neighborhoods. This also shows evidence of a correlation between urban growth as measured by density (housing units/hectare) and population density.

Specifically, the three phases create two unique transition moments:

From stage 1 to stage 2, there is the largest population growth. Most neighborhoods growth 3 to 20 times their size in population, depending on the cut time used (beginning moment of invasion or end of the period). This means that in most cases, for every founding member, 20 more people will arrive during this period. This is a radical change in neighborhood composition that should have profound effects on the social network. Also land coverage changes significantly, to as much as 30 times the original area coverage. This marks the transition from a rural model, in which open space is the predominant feature, to an urban model where open space is restricted and defined by the buildings.

From stage 2 to 3, population grows between two to three times as large and then halts. Most building growth happens in terms of height. At this stage, there is an increase of land coverage but not as radical as in previous moments, which is up to two times as in the previous stage. The change here is not as radical as in the past stage. But in any case the final densities of between 200 to 400 units/hectare.

Therefore, it can be concluded that in Medellin, informal settlements follow a “rational and predictive urban model,” in which the three stages of foundation, infill, and consolidation are clearly visible and can be quantitatively described. Each neighborhood is very different yet presents informality as evolving in very particular ways in terms of urban form. This raises important questions in terms of a city in urban conflict in Medellin. If the urban space is in constant flux in informal settlements, does conflict present itself differently at each one of those stages? To answer such a question it is important first to understand if conflict in Medellin has unique manifestations in the spaces of informality. This is the subject of the next section.

THE ‘SLUM WARS’ OF MEDELLÍN

War is a hard label to use in the context of urban violence. Here in this study, the use of the word war refers to the understanding of a violent conflict in which organized groups of actors systematically use
violence to legitimize market and/or territorial urban control. There is not an agreed definition of the urban conflict in Colombia as war. Furthermore, there is no agreement across the literature that the conflict in which guerrilla groups have being involved against the Colombian state is a ‘civil war’. Colombian conflict is very violent both in rural and urban areas. Moreover, Medellin is the city where the urban conflict has been the most visible in the entire country. The scale of conflict has led some organizations to address the conflict from a ‘war’ perspective. For example the first time that the International Committee of the Red Cross (ICRC), intervened in an (non-officially designated war zone) urban conflict was in Medellin (Begg 2010), where it created its first urban conflict office.

As shown in several parts of this study, (Chapters 11 and VI), Medellin is a city that has gone through a multiplicity of conflicts. It is a city that has high levels of violence executed by a multiplicity of actors in all its territory (Narcotraffic, Milicia, Paramilitar and BACRIM). Does the conflict of the city of Medellin have different expression in its informal areas than it does in its formal areas?

Dennis Rodger defines slums wars in the context of Nicaragua as the continuation of past struggles and as a geographical transition from ‘peasant wars’ (Wolf, 1969) to ‘urban wars’ (Beall, 2006). He also argues that in this process of urbanization of the conflict, the localized conflict among gangs in the marginalized areas is the continuation of such conflict on a “new spatial context”: the slum. In this theoretical context, I contend that Medellin is the stage on which many of the national conflicts have been fought. I argue that local gangs continually provide the labor force for the larger nationwide conflict. Furthermore, I argue here that urban conflict is not waged homogeneously over the territory of the city but that its manifestations are different in the marginalized areas of the city which have a history of informality than in the formal areas of the city.

Even as violent conflict happens almost all over the city, I argue that the urban conflict in Medellin has specific manifestations in informal areas. It is within this specific context that I call this phenomenon the "slum wars of Medellin." To know if there really is a slum war in Medellin, one would have to find the following conditions: (a) a space in which the conflict happens as a result of informal urban development, (b) the actors of war who deploy violence at multi scales of conflict (neighborhood, city and national), have distinct actions and strategies for the space of informality, and finally (c) those actors’ target of violence is different in the informal areas than in the formal areas. While many different kinds of violence happens in the city, I argue that the local manifestations of violence in informal settlements should be different to those of the city as large.

A. SPACE OF THE SLUM WARS

Does urban conflict and informality intersect in the informal settlements in Medellin?

It is argued by many that the conflict in Medellin is more intense in the informal areas than in the rest of the city (Angarita Cañas 2003; Melguizo 2001). Does this mean that what happens in these areas in terms of violent conflict is different than what happens in the formal areas of the city? Here, I try to I explore the differences between the conflict in informal areas and that of the formal city. Homicide rate is a variable that is used often to measure levels of conflict. This variable is more accurate than others like theft or fear because homicides are more consistently recorded than those others. But it is also important to clarify that this variable only really provides an idea about where violent conflict is happening.
Homicide rates tell us little about other conditions of the conflict. Homicides do tell us where illegal control and conflict is being resolved by use of deadly force. For example, drastic reductions of homicide—as was the case during the period 2003 to 2007 throughout all of Medellin—does not automatically mean there is a corresponding reduction in criminality or the lack of control by illegal armed actors. This reduction was actually the result of a homogenization of the control of illegal armed actors in the city of Medellín. So from here onward, I will use homicides to try to understand conflict in Medellín, but it is important to be clear that the use of this variable will be understood more as tool that permits us to understand levels of fragmentation of conflict.

This glimpse of recorded homicides over the last decade in Medellín does not provide a clear division between the types of conflict that occurs in the formal versus the informal areas. The conflict seems to be in the entire territory of the city. It also appears to not be constant. Year to year, the violence seems to move from one district to another, from a range of informal and formal areas. In conclusion, the violent conflict happens in Medellín in a relatively homogeneous way.

By looking at the homicide variable from another angle, we start to have more clarity about differences in terms of violence. For example, looking at the motivations for homicides reveals that some areas of the city appear to be more prone to other types of homicide violence than others, as is expected in any city.

A mapping of homicide rates in 2009 (Figure 43), which were a product of narcotraffic confrontation, shows that homicides related to confrontation between narcotraffic groups are clustered on the edges of the city alongside places where historical informality is mapped. This mapping reveals such phenomena of spatial correlation between the places of homicides by narcotraffic groups and places of informality. While this does not mean causation (informality causes narcotraffic violence), it demonstrates that spatially these places have a different type of conflict than the one happening in other (formal) areas of the city.
If we look at theft of motorcycles in the city, for example, it shows a very different story. This is a kind of economic crime, which happens all over the city, but tends to occur more concentrated in the downtown area. Here I choose to highlight motorcycles instead of cars (that also have a similar clustering in the formal city) because cars are not common on the high slopes of the city where most informal settlements are. Motorcycles are a preferred private mode of transportation in poor areas of the city.

These two preceding mappings (Figure 43 and Figure 44) present two different stories of the types of violence of the city of Medellín and one that correlates with the spatial segregation of the city. Those two stories are that drug related confrontation happens in marginalized poor and traditionally urban informal areas of the city, and that personal security, such as robbery (which is about economic gain in the moment and not taking control of a particular territory) happen more in those urban formal areas of the city.
Medellín as the previous chapters explained has been a place in which a myriad of illegal armed actors have taken siege. These actors, have multiple and diametrically different motivations to use violence. So how do those different actors occupy the territory of the city and, how do their different motivations for violence relate to the different spaces that they occupy? A major part of my research effort has been dedicated to compile mappings from different sources and from different time periods to be able to see over time what patterns these actors follow. These maps are derived from newspapers, private collections of researchers, academic articles, and the interviews conducted as part of this project. These maps are valuable individually but they are imprecise when trying to make arguments about a territory or city. I have superimposed sources from multiple mappings into the same map to show a pattern of where...
illegal armed actors have located over the last thirty years. (See annex 2 for a detailed count of locations of armed actors).

Figure 45 shows clustering of non-state actors (gangs, paramilitary groups, militias) in the last thirty years superimposed over a merging of multiple maps that show the areas of informal settlements since 1950.

This aggregation method presents the areas of the city that are more prone to be used as a base by illegal armed actors. Figure 6 also shows that the areas of the city that are or were informal settlements (in...
white). There is a correlation between informal areas as where these non-state armed actors tend to locate.

These maps show that in Medellín, different spatial urban forms are related to different types of conflicts. Specifically, it shows that illegal armed actors and their use of certain forms of violence are related to the spatial forms that they control. This map of gangs territories allows us to see that in Medellín there is a concept of the "disputed areas" (Koonings and Kruijt 2009, 14), in terms of territories that lack state control and that they are the place of contention between multiple non-state armed actors and the state. The key here is the intersection of those territories that are considered informal and the territories that non-state actors tend to control. This is akin to the concept of 'slum war.'

B. ACTORS

In Medellín's wars, the multiple actors of the urban conflict are in many cases (if not in all) the same actors of the national conflict. Here the distinction between the gang as a local condition and of armed non-state actors as a national phenomenon of the weak state is blurred. It can be asserted that the geography of where actors situate has historically been negotiated using violence. The historical transition of the conflict explain in chapter IV shows how those periods of transition between one illegal armed actor and the next are always marked by periods of extreme uses of violence. These actors fulfill two important conditions of the "slum war" that Rodgers articulates. One is that the actors in the national conflict have migrated from the rural setting to a new spatial order. The second is that the use of local violence in the form of gangs is the new medium through which that conflict is negotiated. In Colombia, there is a difference, however, from Rodgers' formulations. In the case of Nicaragua, Rodgers argues that violence that the gangs produce is also political violence. In the case of Colombia, the actors who control the gangs in informal settlements are actually the political actors in the conflict. So the connection between the national conflict and violence in the local slum is direct. This is especially true in the sense that in Medellín and in Colombia write large, negotiations and re-negotiations between state and its illegal armed counterparts happen in the spaces controlled by these illegal armed actors and these negotiations and even some of the actors are part of the national political process of negotiating power and an eventual peace.

The actors of the national conflict, from drug dealers to Guerrilla to Paramilitary to BACRIM (or neo-Paramilitar), were first present in the rural areas and then migrated to establish violent presence in the poor neighborhoods in Medellín. The mappings of the previous section show this intersection (Figure 45). Secondly, these national actors outsource their violence to local groups in the forms of gangs (Combos), and the members of these groups switch sides depending on their economic gain or threat of being killed.

C. TARGET OF VIOLENCE

Is violence experienced in a different way in the informal settlements in Medellín than in the rest of the city?

I have determined that the motivations for conflict are different in informal settlements than in formal ones. The mappings that compare the two areas reveal that the violence is a product of drug related business and territorial control. The narratives of conflict in the research neighborhoods also reveal differences in the way conflict is experienced in these areas. The vacuum of state presence leaves spaces
for non-state armed actors to fill state like functions, including security, justice and citizenships in the sense that they determine who can live in the neighborhood and who has to leave (or die). This para-state autonomy is performed by the use of violence. This then indicates is a particularly different experience of conflict and violence in the city in informal versus formal areas.

Forced displacement is a particular form of violence that in the urban setting affects particular populations who live in informal settlements and does so in terms of individuals, family or entire groups. In Medellín Comunas, a high number of informal settlements have the largest concentration of the phenomena. Figure 46 shows the number of registered displaced individuals per Comuna in 2012. Here Comunas 1, 8 and 13 (with 203, 431 and 611 cases respectively) are the ones with the highest number of cases. A particular case is the one where the illegal armed group (gang) “La Loma” forced 74 families, a total of 286 people to leave the neighborhood. This was a product of a retaliation for the killing of two gang members (Fiscalía General de la Nación 2014). This case is extreme, but it serves to show the magnitude of the control these groups can have over the territory and how violence and fear is used as a method to maintain that territorial control. This is very different to what happens in other (formal) areas of the city.

![Figure 46. Registry of victims of force interurban displacement for threat to life in Medellín in 2012: Source: Registry FUD -UPDH of the Personería de Medellín.]

Displacement then becomes a method of territorial control. In the interviews, displacement appears in moments of transition between one illegal armed actor and another as a way to purge collaborators or sympathizers from the previous regime. One community leader in Comuna 13 expressed it this way:
When the Paramilitaries arrived at Comuna 13, all leaders were targeted as collaborators [of the Milicias]. Many of the [community] leaders had to leave the Comuna after the Operación Orión, because of fear that they will be killed. (606)

This process of the removal of key community members weakens existing community organizations that can challenge the newly arrived perverse organizations. Another way in which displacement is used is to access property and land. For economic, or strategic purposes. Strategic in the sense that some properties are located in places that are easier to defend or from where is more strategic to attack. Community members are caught in the middle of this process of neighborhood social engineering. One community member in Comuna 13 says,

*I bought this house [from a neighbor who had been displaced], they kicked her [the owner], out I do not know the reasons. They [the gang] occupied the house, and after I had bought it from her I had to go to them [the gang] and ask them to disoccupy the house because I had already bought it from the previous owner. They did, and I was able to move in.* (731)

Also the properties are important in the sense that they are key pieces of the control of the territory in symbolic ways because they belong to the previous group, or spatially because of their location. A community member explained this process after the arrival in Comuna 13 of the AUC after the Operación Orión. The community members said,

*When the paras arrived here, they took strategic houses* (707)

Displacement in these informal areas then puts together two issues: one of social composition of the neighborhoods that are controlled by illegal armed actors and one of space as strategic within the conflict there. The current territorial control as performed by non-state armed groups in informal settlements is a distinct form of violence that is experienced in these areas, and that is not experienced in the formal areas of the city. The next section will focus on how urban form changes the impact of social organizations in this context of conflict.
PART II CONFLICT

URBAN FORM AND SOCIAL ORGANIZATIONS

Chapter II explores what the literature in social disorganization says about the relationship of community members social ties in ways that are spatially bound and their influence on crime (Bellair 1997). Specifically, I examine how changes in neighborhood ecological structures can strongly influence levels of social control, social ties, and collective efficacy (Kubrin and Weitzer 2003). Social ties here are considered a good indicator of crime levels. An inverse correlation between social ties and fear implies that as more social ties breakdown, there is more fear and this itself correlates with higher levels of crime. (Taylor, Gottfredson, and Brower 1984).

Social ties, as presented in the previous chapter (IV), are fundamental to the foundation of informal neighborhoods. These ties and the close interdependence of community members are what finally allows them to claim ownership of land. A question that emerges here is what role do the stages of urban development in informal settlements play in the strength and configuration of social ties? In other words, what effects does growth have on informal settlements' social relationships? I argue here that urban growth and population density (1) increases the number of members, but it also increases and (2) fragments the number of possible social organizations. As this phenomenon occur, it creates an opportunity for (3) specialized and cluster social organizations within the community.

1. INCREASED NUMBERS OF RESIDENTS: Foundational moments require a relatively small amount of members from 25 to 100 families. As shown before, the number of community members is expected to increase tenfold (or more depending on the case) within the first years of informal development. In the informal community Independencias, for example, for each founding member there are now 83 new ones (see Table 6). Examining the ties of informal communities by its how close they are together) propinquity can tell us a lot about the ability to establish social ties. The exponential growth between stages of informal development implies that as the neighborhood grows it becomes unfeasible to know everyone in the network.

2. INCREASED NUMBER OF SOCIAL ORGANIZATIONS: Growth over time opens the opportunity to create new social organizations, while in the foundational stage a single group (usually a Junta Accion Comunal or an informal group that will fulfill its functions) can accomplish all communitarian needs (from social gatherings to housing and infrastructure provision). As the neighborhoods grow, new organizations start appearing that take functions away from the organization or add new needs. In the first stages, there is a single group or two including the church as a key organizational structure in Colombian informal settlements (like in the case of Santo Domingo Savio or Moscu), but as time passes the number of organizations grows at the same rate as the population. To show some of this growth today in Comuna 1, there are 16 legal types of registered social organizations currently participating and competing for budget to provide services within the Comuna 1 in the Participative Budget (PB) that is ten times more type of organizations and 30 to 40 times more single organizations. A revealing aspect of this growth
on communitarian organizations is also that they become really specialized in what kind of services provide.

3. SPECIALIZATION: the increasing numbers of organizations also is reflected in the variety of interest and areas of work of each one of those organizations. There is then, not one single group that has to coordinate all community projects. There is instead a myriad of typologies of interest that represent a specialization of those interests. For example, these are some of the typologies of social organizations that participate in the PB of the Comuna 13: communal associations and groups that each represents the interests of youth, women, group, elderly, community mothers, housing, cooperatives, religious groups (now more than just Catholic), NGOs, parent associations, environmental, ethnic, sports clubs, race and LBGT. Political groups are excluded from the PB, but they are also present in these areas. Figure 47 maps the growth of these organizations within Comuna 1. Moreover, it shows how time and urban growth play an important role in this fragmentation and specialization.

![Figure 47: Social Organizations' Growth per Informal Stage. Source: The Author using interviews and the Alcaldía PB Info 2010](image-url)
With the population growth, those increases in social organizations and their specializations are to be expected and also lauded. However, I argue here that growth modifies, in a radical way, the social ties and this growth has negative effects on security levels in informal neighborhoods. Growth modifies social ties in several ways (a) an increase in the number of community members requires a more complex community organizational system; (b) the specializations of social organizations' motivations also include those of perverse (armed illegal actors) organizations; (c) the population growth gets confounded with fear, intensifying the cycle of decreasing social ties which in turn increases levels of fear and crime.

a. COMPLEX ORGANIZATIONAL STRUCTURE NEEDED: As population grows, the same system that permitted the organization of the community to do their projects becomes more complex to control. The sheer amount of members makes this exercise more difficult, competition between community leaders become fiercer as larger numbers leaders appear. These changes are no different to other organization growth challenges, but in this context the scale of growth along with the lack of an external (state or otherwise) support for such process makes the process more complex. As a result, a single community organization is unachievable.

b. SPECIALIZATION OF SOCIAL TIES IS MIRRORED BY PERVERSE ORGANIZATIONS: I argue that the exponential growth of dwellers also means that there is an increase of those within the community members who participate in crime. Opportunities for association by participation in crime then appear. This type of association also becomes more specialized as time passes, following the same process of the other social organizations in later stages of development. This means that as the neighborhood grows, the type of criminal activity and the type of violence that those groups execute is different and more specialized. In Stage 1 (Foundation), theft is the most common crime. All interviewees attested to this. At this stage, there is no mention of the presence of illegal armed actors as organizations within the informal settlement\textsuperscript{16}. In Stage 2 (Infill), gangs appear, for the first time. These groups are very local and do not have an association with larger groups (drug lords, Milicias, Paramilitares or Bacrim). In Stage 3 (Consolidation), neighborhood gangs establish connections with the most sophisticated criminal organizations and franchises. Informal territories offer economic, political or strategic benefit for those organizations. The criminal franchises outsource, train or eliminate local gangs as a way to acquire control of the territory. Interviewees associated with gangs seem to have no problem switching from working for one type of (criminal) franchise to another. Those who do have a problem with this kind of switching groups (or sometimes even sides) would not survive the transition.

c. FEAR & SOCIAL TIES CYCLE ARE REINFORCED BY POPULATION GROWTH: In the interviews, every new threat to the security of the neighborhood appears to arrive from outside of the informal settlement. Repeatedly, the interviewees use the theme "they' arrived" to refer to some transition ways than an

\textsuperscript{16}With the exemption of Paris, an informal neighborhood in Medellin burned down by a gang (740, 736). This gang, however, seemed to not have territorial control inside the settlement, it was just behaving in some ways like the state (police) and private actors who are from the outside. There are no accounts of such a process in the foundation stage.
illegal armed actor is acting in the territory (gangs, Milicias, Paramilitares, Bacrim). This arriving condition of armed actors creates confusion, because most illegal armed actors live in these informal communities. In other words, the actors who day to day use violence in the neighborhoods are indeed community members by definition. One part of this incongruence can be attributed to real new threats that arrive from other places and forcefully locate in the neighborhoods. The case of the Paramilitares groups taking Comuna 13 is a good example here. Most of the leaders of such groups arrived from other places and locate within the neighborhood, sometimes in the same houses that the *Militias* members occupied. But in most places, gang structures are reconfigured (by killing or expelling a significant number of their members) to serve the new criminal organization structure.

During the transition from Milicia to Bloque Metro (BM) in Comuna 8 in 2002, members of Milicia and competing paramilitares groups join the BM once it had acquired control of the city and entered into the DDR (Disarming Demobilization and Reintegration) process. (For more about DDR, please see Chapter IV). This process is depicted in the documentary film “La Sierra” (Dalton and Martinez 2005). I argue that most of that process of the arrival of illegal armed actors is part of the population growth and that from the perspective of the neighborhood dwellers it seems like foreigners coming to its neighborhoods. In reality, it is a little of both new members arriving and creating new associations, some criminal some not. These new arrivals and new organizations create a new pool of actors within the space of the informal settlement. Moreover, the community members already living there often must choose with which groups to align, leave or risk losing their livelihoods or worse, their lives.

Fear produced by the actions of armed actors also plays an important role in reconfiguring population and the composition of informal neighborhoods as well as reinforcing the growth processes. The previous section (on slum wars) presented displacement as phenomena of violence in informal areas in Medellin, which is used as a tool to control and condition the community by killing or forcing out members of those groups or by removing entire groups. The following example shows the importance of illegal armed groups on the population composition of the territories they control. The case of the massive forced displacement in Comuna 13 by a single gang is a good example of such processes. In Comuna 8, a distinct phenomenon is starting to happen in which race is becoming a variable of the conflict and is reshaping the neighborhood composition. The arrival of a new group “Los Urabeños” associated with the coastal area of the Departamento de Antioquia called Urabá, where a large percentage of the population is Afro-Colombian, has inspired in other non-Afro-Colombian residents of Comuna 8 to use race as a supposed identifier of belonging to a particular group. This has introduced to the forefront in this Medellín informal community race as a component of the conflict in Colombia. Race is a deep part of centuries of conflict in Colombia starting with the colonization by Spain and Africans being forced into slavery, as in all of Latin America and legacies of slavery and resulting racism that accompanies it extends into the 21st century in Colombia. What is different here in Comuna 8, however, with the Urabeños, however, is that people are openly accusing people of being “dangerous” simply based on the color of their skin. At the city and Comuna level the war between “Los Urabeños s” and the gang “Oficina” has become a racialized conflict in which community members are labeled now by the color of their skin as sympathizing with a particular group. This generates multiple and massive displacements from neighborhoods to neighborhoods. Comuna 8, in fact, now has the largest number of community members who come to live there as
displaced people and then are displaced again. Comuna 8 is the largest number of Afro-Colombian displaced people arriving to Medellín, and it is this population that is the largest number of people begin secondarily displaced.

The case of Comuna 8 is distinct and part of a new typology of conflict in which race plays an important part, but it only serves to show that displacement is a form of social engineering that the neighborhoods themselves, in many ways, control. This, along with the process of exponential growth help to decrease the social ties important in the construction of community security.

FAILED STATE, FAILED COMMUNITY FOURTH GENERATION WARS IN MEDELLÍN.

The harsh urban environment, particularly in the “developing” world, is an ideal arena for “asymmetrical” adversaries seeking to neutralize the technological, logistical, and organizational advantages currently enjoyed by modern military forces. (Rosenau 1997, 371). Next, I describe the nature of urban space in the urban wars of Medellín. In Chapter IV, I have described the nature of the evolution of conflict in this city in the last forty years. There is a series of actors (illegal armed actors) who have used the urban setting of informal neighborhoods to stage their fight, which is both an economic and political one. In this section, this “asymmetrical war” is explored as market and turf that have particular spatial features of the urban conflict.

The term “asymmetrical war” refers to the disparity of contenders’ military capability in the fourth generation wars in terms of technological and armament and capability. Colombia’s conflict can be defined as one of these types of wars. In Colombia, the army and police (The Fuerzas Militares and Policia Nacional) are one of the largest armies in the world and account for 446,000 members with a budget of US$ 12,900 million (AFP 2012). This force has been in active fighting for almost 50 years with the FARC and ELN, which combined have an estimated 9,500 members (Lannini 2010). This disparity of numbers (without even counting the military equipment) put the Colombian conflict within the definition of (deep) asymmetry.

John P. Sullivan, and Robert J. Bunker. (2002) provide a provocative argument about the role of local communities in the context of new type of “small wars and insurgencies." They argue that akin to the concept of “failed state,” in which states that are not able to assert their sovereignty are challenged by non-state actors. Now, at the city scale gangs and their ‘networked’ evolved typology of drug cartels are the non-state actors that challenge the state in this new “Netwar." They map an evolution drug criminal organizations from aggressive competitor (like the cartel de Medellín in the 1980s) to the subtle co-opter (cartel de Cali) to higher and evolved “criminal state successor” (Ciudad del Este, Netwarrior model), in short a transition from Turf gang and Turf Protection, to Drug Gang and Market protection to a final stage of mercenary gang and Power/financial acquisition.

In these new fourth generation wars (Lind 2004), that are part of the ecosystem of “failed states,” are in those areas of the world that are considered by the Pentagon as the “non-integrating gap” (Barnett 2004). The slum, with its “failed communities,” (others would call them “marginalized”) become the material space at the scale of the city where these wars are fought. I argue that in Medellín, depending
on the analytical lenses and the historical period employed, you can find these three different types of "cartels" (Sullivan and Bunker 2002). However, in the context of this research in which space is the lens from which conflict becomes important, two features of these drug related wars become important to highlight here. They are related to those first two stages of cartel development: control of turf and markets. Turf control is important because it shows the interdependency of criminal organizations with the territory that they control.

One reason for expecting violence in retail drug markets is that these markets have geographic specificity. Competition can be a struggle for literal "territory," even if it is only a particularly lucrative street corner (Reuter 2009, 277). Now, drug cartels in Mexico are much more powerful than those in Medellín. Therefore the local cartels in Colombia, whose major markets used to be for export outside the country, have now started selling drugs within Colombia. These in-country drug sales have become an important source of income for drug cartels. Turf control in the form of territorial control for extortion of business and public space control for the sales of drugs, then become an important element of today's urban conflict in Medellín and it is one of the forms in which space and conflict intersect.

While sales of drug happen all over the city, territorial control and retail drug trade intersect in Medellín in informal areas making such spaces more important and prone to violent conflict. Figure 48 Turf control and drug sale spaces (Plazas de Vicio) map a particular illegal good (Marijuana and Basuco). On this map are places for the retail drug markets in Medellín. Figure 49 shows clustering of homicide violence in Medellín. The two maps intersect in the spaces of informality.

Up to this point, a series of tests provide evidence of the intersection of conflict and space as variables that intersect. The important question then becomes how those two relate to each other. In other words, do changes in one variable (space) mean changes in the other variable (conflict)? On this question, the final section of this chapter concentrates.
FIGURE 48 TURF CONTROL AND DRUG SALE SPACES (PLAZAS DE VICIO) SOURCE: FERNANDO QUIJANO CORPADES
Figure 49 Map of Homicide Clustering 2010 Source: SISC
CHANGE URBAN FORM AND CONFLICT

In this final section I concentrate on an important question: do changes in urban form correlate with changes in urban conflict? In other words, are the tools of urbanization also the tools of war in an urbanized conflict?

In the section above, I explain how the process of urban densification as part of the (three stages of) development process of informal settlements mirror a process of intensification and sophistication of illegal armed actors. In this way, as the informal settlements become denser and more populated, the criminal organizations in them also appear to grow and become more sophisticated as part of this process. I have argued here that this is the result of the multiplication of social networks included within the informal communities that grow in parallel with the criminal networks. These criminal networks flourish in these contexts because the absence of state presence in these areas, both in terms of security (army and police) as in terms of state services, social and economic programs create governance vacuums that are fill by the criminal networks. Physical disconnection with the city and multiple levels of population marginalization (racial, economic, social) are the variables that permit illegal armed actors to claim sovereignty and control territories of informal settlements in Medellin.

Following this logic then, if a relationship between physical space and conflict exist in informal settlements, then the modification of the space would in turn affect how the conflict behaves. Here I explore examples of such modifications and determine the types of changes to the conflict that can be attributed to those modifications.

I argue that intervention in the urban form of informal settlements in Medellin produces three types of modification to the conflict: (1) Intensification of the conflict is the product of higher extortion opportunities brought on by the infrastructure investments; (2) extensive transformation of the urban environment changes the conflict, including the landscape of turf control and (3) this is maybe the most significant, some state projects exclude their work from territories where the turf conflict exists in informal settlements. Below I concentrate on cases of state urban intervention in Medellin during the last 11 years. Specifically, I map three PUI (Proyecto Urbano Integrado) in three Comunas—1, 6 and 13. Each of these intersect with the neighborhoods that are part of this research. The three interventions are each similar in scale and are performed by the same state company EDU as explain in chapter IV.

A. PROJECTS AND CONFLICT

I argue here that the introduction of urban projects during the construction phase of state projects increases potential levels of conflict by increasing the pool of extortion market for local gangs in two ways: one is increased income of gangs that profit from extortion and the second is the increases in the pool of possible income sources, which in turn creates space for higher levels of competition. In the fragile context of a fragmented conflict in Medellin, this in turn produces more violent conflict.

I want to introduce the state interventions projects’ context of conflict. Often, community members described how their community’s “independence” from the formal state permitted other armed organizations to fulfill state functions, such as security and dispute resolution. A community member said
that in his community (Comuna 13), the guerrilla had been the authority since 1990. This community member said, "They [the Guerrilla] arrived in the early 1980s but consolidated authority in 1990. The police would arrive here and leave... [the Guerrilla] intervened in all internal disputes in the neighborhood. All community leaders at some point would need to negotiate with the authority [Guerrilla]." (606).

By 2003, when the first projects started to be built in Comuna 13, the Milicias had lost their power grip on the community, but a new set of actors [AUC] have taken their place and started to fill those voids left by the exterminated group. The DDR process with the AUC resulted in a reduction of the number of homicides, but the failure of that process by 2008 created a fragmentation of what by then was a single illegal group controlling the entire city. The state then called this illegal armed actor fragmentation Bacrim. In the neighborhoods, small illegal armed organizations (see Figure 50a, map of gangs in Comuna 5 and 6) controlled territories as small as one neighborhood block and with very loose connection with the large franchises of illegal trade in the city. In this context of conflict, the state-project PUI Northeastern is introduced (see Figure 50b) with its 25+ urban projects (library, road improvement, bridges, parks and schools). The intersection between gang territories and urban projects created an opportunity for these 50+ criminal organizations in two Comunas to compete for the opportunity to offer their security services "vacunas" (extortion in the form of monthly charges in the name of security services). In a letter to the then mayor Alonzo Salazar the "Mesa de Derechos Humanos y Convivencia Comuna Seis" (July 6, 2010) denounced the paying off of gangs by the state-sponsored construction companies building in these areas. In the letter, he explains that the "Hogar Infantil Castilla" pays 700 bags of cement month to a non-specified armed group.

The intersection of state and community projects and gangs then presented an opportunity for projects to become sources of income to the multiple warring groups. The intersection of future projects and gangs then is a map of income possibilities by illegal armed actors. It opens an important question in the context of turf war. What happens when these projects crossed the feared invisible borders (between formal and informal, between state and nonstate illegal armed actors)? Moreover, what implication does this have for community members who live in these areas? The data provided by community members in Comuna 6 permitted me to create a map that estimates the probability of conflict by establishing the extortion value of the projects vs. the number of invisible borders that those projects crossed (Figure 50c). Street improvement projects represented the most risk areas of intervention. By this point, most of this mapping was speculative. In the end, only firsthand information from the contractors would provide space for understanding the interworking of such phenomena.
As part of the ongoing Integral Urban Upgrading project, City officials, working with urban planners and Comuna 13 community leaders, decided to introduce an electric escalator in the neighborhood Independencias. This escalator is inserted in a 45-degree incline up the unpaved Andes Mountain that turned into mudslides during frequent tropical rain. It increased access between communities in the upper areas of the hillside to the lower areas with more amenities, including public buildings, public spaces, and public transportation. This project included widened streets and expanded the pedestrian networks within the densely populated, steep hilled neighborhoods of Comuna 13. In addition to crossing physical barriers of height, this project crossed several 'invisible borders' (fronteras invisibles) of drug gangs. Here topography-caused difficulties of mobility had separated two warring gangs in a space of less than 300 feet (91 meters).

A contractor in this Comuna 13 project explains:

*We are surrounded by 4 combos [gangs], the first one in the reversadero [cul-de-sac] managed by el Barbado, and the second is from the reversadero up that is led by el Pitillo or Andei and the third is*
called el faro and the fourth is the area of la Torre. The police even protects these groups... I had the experience of seeing them [The Barbados] in a shootout with the group of up the hill and the police next to The Barbados telling them to move so they will not get shot. The first group that created problems was el Barbado. First they did not want to let us use the football (soccer) court [space that they controlled]. Then the demand was that we needed to pay 2 million pesos every 15 days [to the people of el Barbado]. Finally after five very tense meetings we negotiated to be one million month. In one of those meetings to pay the fee, I informed them that the group of the hill was asking for money and that if we had to pay them too we will need to reduce how much we paid them. Barbado laughed and told me to give them [Pitillo] the first payment, because the Pitillo in less than eight days will be a muñeco [Spanish for male doll that means killed]. (752)

The competition intersecting with the project then intensified the conflict with in the neighborhood. The contractor continues to explain:

*Fifteen days after we agreed to pay the Pitillo, the gang of Pitillo killed el Barbado. That started a war. There were shootouts up to 4 times a day during 20 days. There were many dead: two more from el Barbado. The gang from down here went up and one night, 2 the other, 3 the other, and then another 2. The Pitillo ended up leaving the neighborhood.* (752)

An EDU social worker on a tour of the projects points up to a house in the proximity of the escalator projects and explained to me what happened in that part of the confrontation:

*In that house at night they [the Barbado gang] came and killed 3 in front of the family.*

The contractor explains that it is clear to those working on the project that their proximity to several gangs makes them more prone to have more extortion.

*The construction company knows that there are four combos here and that this means that we need to pay four vacunas [extortion payments]... the other day the ones [the gang] of la Torre asked me to go up and told me that I could not pay any more to the others... After they had finished with their sentence, they had to run because one of the groups below saw them and started shooting at them. They hid, running up to the [narrow] stairs.*

**B. NEW SPACE NEW TURF**

Turf fights are not foreign to these groups. Turf gets negotiated on a day-to-day basis. This electric escalator, however, redefined Comuna 13 and Independencias 1 residents’ perception of their territory. The elevator increased mobility to tourists, mothers with small children, and elderly people as they made their way back and forth up and down the hill to the market or downtown. The one narrow path is now a single connected space from the top of the hill all the way to the bottom. In turn, the fragmentation of space that separated the two groups has been removed a single group can now control it.
This escalator increased mobility and decreased distance between warring gangs. In the end, the lower hill gang killed most of the members of the upper hill gang. The protection that the space allowed to have clusters was disturbed by the physical project, so it was not only fight over taxation of the project, but it became a fight in which the battlefield had been redefined. Thus, changing the spatial environment through changing one physical object changed the way these drug sponsored gangs interpreted their sovereignty, redefining their own socially constructed or imagined space of boundaries and threats. This killing was not part of the City of Medellin’s intention in building the escalator, but it does provide an example of how space conditions the rules of engagement in a drug-related conflict before, during and after urban renewal that intends to improve the quality of life in the neighborhood. By unifying space, these projects force gangs located in proximity into a fight that would end in the consolidation of their territory. By doing so, it also homogenized the perverse actor in this particular area, reducing the future confrontations. Today the project, the public buildings, new tourist tours and increased state security create a very different context than the one before and during construction. The everyday shootouts are not present any more; gang control continues but its violent expressions are less visible. The people who live near this escalator say it has improved their living conditions.

**Figure 51. Comuna 13 Gang fight over turf (A) electric stairs, (B) gangs territory and (C) final gang territory after confrontation. Source: The author.**

C. PHYSICAL PUBLIC INTERVENTIONS AS TOOLS TO EXCLUDE TERRITORIES FROM TURF CONTROL

Here I concentrate on the final question. What happens after urban upgrading projects are built and how do they impact security conditions in informal settlements? Currently in the media, Medellín is portrayed as a historically violent city that has succeeded in controlling security through the introduction of urban projects in poor areas.
Homicide rates tell a very different story to that of the media. They show that Medellín still has a large level of conflict in poor areas and that illegal armed actors are as present and as powerful in these areas as they were before. However, I argue that beyond those indicators there have been very important contributions to security by these urban projects. Specifically, these urban projects have impacted how community members feel about their neighborhoods. The overwhelming majority of the interviewees see the interventions as positive. They also see them changing security conditions on their neighborhoods. A resident of Comuna 1 framed these projects as responsible for enhancing the neighborhood security, specifically calling on mobility projects as spearheading the security changes. This resident says,

*After the construction of the physical projects there was an effect on the amount of violence in the neighborhood, it was a very large change... The metro cable has improved the neighborhood a lot.* (609)

Another resident of Comuna 13 believes the key projects that have transformed his neighborhood especially include the metro cable, PUI, the PB, and the Parque Biblioteca. Several community members also mention the metro cable as transforming their neighborhoods and daily lives in significant ways. A community member says,

*The metro cable has been great. Transportation has improved by 95%. The Comuna, the metro cable has been a great strategy because the image and the physical space around the station has improved. Also because it has created spaces that are secure and protected and are not isolated areas, places where you can gather, but it is also the transportation that is a great thing.* (607)

A resident of another neighborhood in Comuna 13, said of the Parques Bibliotecas in his community,

*That was a spectacular impact. You can see that many of the kids of the neighborhood use the Parques Bibliotecas and spend less time on the street. They have access to things that we were not able to have before like the computers and the internet. We, the least economically favored, [in the City] now have access to the technologies. That is the gift that they gave us. I would not even know how to start or turn off a computer. The community has appropriated that space in an impressive way. You see kids of all economic levels (estratos) in the Parques Bibliotecas. There is no discrimination for the way you dress. They treat everyone as equal. [This provides the] capacity that the kids need to acquire to get out of the conflict.* (607)

As expected, many community members perceive the programs held in these new public buildings to have had a positive influence on the conflict by provided spaces of escape spaces from the dangers of the streets. One community members says,

*I see this unidad [sports facilities project] is occupied at all times. The good thing about that is that there the young kid or adult has his time occupied instead of being on a corner looking at people and thinking of what kind of crime he is going to commit. Eight years ago these areas did not have any function... people will do their things in this spaces...* (607)

Others see the projects as motivators of economic development. One community member said about the food stands and craft vendors outside the metro cable and lining the walkway up to the Parque Biblioteca
entrance that “the metro cable created an economic resurgence of community-owned projects around this project. We have not seen that before.” Juan Diego Lopera, the Assistant Director of Planning said,

Before the cable, there was not a single bank in Santo Domingo [Comuna 1 and 2]... You can see how tourism has changed in the city, the hotel industry in Medellin [which now during vacation times is thriving with tourists] used to take vacations [close] during holidays [because there was little to no business because the city’s reputation of violence prevented tourists from coming]. That says a lot about the [tourist] industry in the city and that has changed completely now. (610)

Most planners and architects interviewed will not establish direct linkages between forms of projects and changes in security. They see security as something that is related with the state organizations’ work in these areas. However, most of them agreed that the lack of economic resources are part of the problem of insecurity and that the projects bring with them opportunities to increase the quality of life and in this way contribute to increases in security in the long run.

A key important question then is this: Why is there an overwhelming positive answer to projects as having improved areas of security? An important clarification before we dwell on this question is that while almost 100% of people I interviewed were positive about the new urban projects, the small minority of projects that did not receive positive reviews have something in common. These more negative reviews
are usually from individuals for whom the projects had little effect on their daily lives. For example, community members in Independencias 2 in Comuna 13, whose watershed did not have an electric escalator. They responded less positively and even negatively to the role of urban projects. In contrast, community members in Independencias 1, where the escalators and connecting pedestrian paths were improved, have overwhelming positive reactions toward the project and its effects on security, even if security as such has not, in documented measurable terms, improved. This means that as community members are far from those public improvements their benefits decreased and given that these neighborhoods are so small in area, it also determines that the rate of diminishing returns by proximity to the projects is inverse and maybe even exponential. In other words, a short distance from the physical interventions, positive attitudes about the projects quickly diminish. That is probably why people are more positive regarding mobility infrastructure (metrocable, for example; that carries people from the upper mountains to the city center) than the other projects, because it affects a larger pool of people than the other interventions. In the following chapter (VI), I will explore in detail the relationship of mobility and security.

Possible answers to why the projects are seen as linked with security include turf war and state intervention in physical space. As explained before, gangs control small pieces of the territory which raises an important question: What is the impact of state urban intervention on the phenomenology of conflict? Here a mapping of gang territories built with community members and security officials was created. This map shows those gangs in relationship with the urban interventions of the Northeastern PUI (Figure 52). It also shows how gangs are peripheral to urban projects introduced to PUI. Gangs appear to avoid areas of intervention of urban projects. A closer look at the map provides a more detailed interpretation of the phenomena. Some areas where new projects have also been built show gang presence. These areas are usually disconnected from the urban projects. Clustering of projects, meaning areas where many urban projects are close to each other are the areas that tend to not have gang presence.
Figure 53. Santo Domingo Savio Homicides from 2004 to 2014 locations and point density map. Source SIC and Author.
POSSIBLE WAYS IN WHICH THE URBAN PROJECTS ARE AFFECTING PERCEPTIONS OF SECURITY.

In other words, are the tools of urbanization the tools of war in an urbanized conflict?

Figure 54 URBAN PROJECTS AND CONTROL BY CRIMINAL ORGANIZATIONS, A. PARQUE BIBLIOTECA ESPAÑA, B METROCABLE LINE, C, COMMUNITY KITCHEN AND SCHOOL, D, CEDÉZO AND PARK, E. SANTO DOMINGO METROCABLE STATION.

Figure 53 shows homicide clustering from 2007 to 2014. It shows how areas with higher occurrences of homicides are further away from the cluster urban projects. This image of clustering of homicides away from urban projects mirrors community narratives that talk about these spaces as safer since being built and populated by the community members and people from the outside. While numbers of homicides is not a direct correlation of security, it does provide a glimpse into the value and impact of these projects.

Clustering of urban projects is a possible explanation of how urban form affects security in these informal areas. This idea of clustering of physical projects as providing security was explored as “safe spaces” in (Samper Escobar and Massachusetts Institute of Technology. 2010). Here I try to show in a closer detail how that clustering can be understood and what are the physical and social features of those projects that inspire a reading of them as providing security.

I have selected a very particular successful cluster in Santo Domingo Savio in Comuna 1. Here the famous Parque Biblioteca España and the final station of the Metrocable serve as anchors of a continuum of projects that include four parks, a pedestrian promenade, a school, a community kitchen and the Cedezo...
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLÍN, COLOMBIA (1970s-2013)

(a small business entrepreneurial state organization). Located in between these projects is a very successful commercial neighborhood scale core that includes a bank, retail, food, and even small manufacturing, next to the Parque Biblioteca and the church (see Figure 55). This success was not the case 15 years ago. When Santo Domingo Savio was considered among the most-violent neighborhoods of the city. Historical narratives of community building show that in the beginning, very few stores existed and the only public building was the church built by the community (see chapter IV, Santo Domingo Savio). The school was a project that springboarded from community work at the church in the 1970s.

So what is the result of such state-intervention and project cluster transformation? I argue here that two issues are the key to the apparent success of this cluster. Physically, the proximity of projects play an important role. Second, the seamlessness of the public space that connect them is important as it anchors and maintains a constant flux of people, with a good balance between local and foreign (Hillier 1996, 144). In social terms, a unique condition happens here. Each building that is part of the cluster is responsible for a small well designed public space near it. Each public building has its own security guard, which by extension takes care of the public space next to it. This fragmented approach to security provides a permanent presence of “eyes on the street” and also provides real security that is non-repressive (as many cases with the police). This provides a “safe space,” that in general terms, secures the rest of the neighborhood around it.

**Figure 55. Cluster of buildings and public space creating “safe spaces.” Source: The author with Info form EDU.**

CONCLUDING THOUGHTS
This chapter has focused on those six issues that the literature has revealed as important to answer the key question of: What is the role of space in the slum wars of Medellín? Exploring answers to each one of these questions has permitted us to see the relevance of physical space in informal settlements in the context of urban conflict. It has presented the space of informality as offering a very particular form of conflict and the physical space as an important variable that conditions the way conflict is performed. The following chapter VI will focus on the findings of this section and merge those with the historical narratives of chapter IV. I present how space and conflict intersect in the space of informal settlements. It does this in two different ways: (1) Space conditions conflict and (2) Each actor develops their own specific strategies for the spaces of informality.
CHAPTER 6 SPACE AND CONFLICT

Chapter IV developed two timelines of critical importance to understanding the evolution of informal communities in Medellín: The first timeline charts the physical urban development of informal settlements, and the second depicts urban violent conflict in the city of Medellín. The intersections of these two timelines provide data to test literature inquires about space role in the conflict in informal settlements in Medellín, the role of the preceding chapter. The reflections on those tests are the underlying findings of this chapter.

This chapter examines social and physical aspects that have remained constant over time. Conversely, it traces how particular changes in the urban form over time have influenced the way the urban conflict is performed. Here I define relationships between how the conflict is condition by its battlespace in the informal settlements in Medellín. This research argues that the physical space plays a fundamental role in the way armed conflict develops at the core of informal settlements. And it does so in two distinct ways, which involves all actors of the conflict. (I) Physical space becomes a form of spatial conditioning that tailors actors and conflict in specific ways and (II) These physical space conditioning in turn force actors to deploy warfare strategies unique to spaces of informal settlements.

- **Part I Conditions of Space.** Time plays a key role here. As time passes in informal settlements, urban form and social actors change in dramatic ways that challenge community social ties that were key at the community’s foundational moment. Population and urban density overwhelm primitive social ties but in turn provide market and associability opportunity for perverse actors. The global physical features of informal settlements provide restriction of access, non-defensible spaces (grayspaces) and the particular urban street network product of the process of housing aggregation creates an urban network that for non-state armed actors is easy controlled by the appropriation of key junctions. This section describes six distinctive conditions defining the battlespace of informal settlements in Medellín.

- **Part II Informal warfare strategies.** Individuals and their associations use spatial conditions as strategies during conflict. The way space is seen and understood requires the actors of the conflict to deploy and incorporate informal space into their own battle strategies. These warfare strategies differ from the ones used by the same actors on the formal city. I point to the most salient strategies the research: Asymmetric confrontations in urban terrain add a level of complexity to military incursions into the space of the IS. When territorial control is a key strategy placing of security infrastructure need to follow the location logic of perverse actors to be successful. In informal settlements the tight urban form, non-repetitive geometry, and topography are complicit on strategic advantage that determine the field of view and the operational distance of combat. The constant evolving informal settlements creates an
uncertainty of its mapping that plays a strategic role on how state and illegal armed actors understand the battlespace and finally informal settlements public-private flexible relationship creates two very different versions of what the battlespace are for the local forces and for foreign forces.

These conditions and strategies are based on the stories of community members and on the narration of illegal armed actors. Mappings and diagrams have been created to complement those narratives with measurable tools. The different conditions and strategies that define the battlespace are not mutually exclusive; they intermix to generate a very complex role for urban informal space in conflict. To explain each condition in detail, here are considered one at a time on the following pages under the two categories. These conditions and strategies serve as final analytical conclusion of this research project, from which policies are drafted in the concluding chapter.
PART 1 CONDITIONS OF SPACE

There is only one access to the neighborhood and the gangs use that to do ‘retenes’ [check points]. They will ‘raquetear’ [search your clothes] and take your belongings. (709). Because there is no road [just narrow and sloped pedestrian paths] the police will not come up here. (720)

As shown in chapter IV the evolution of the urban form correlates with equal transformations in the social composition of communities living in informal settlements. Population and building density create distinct stages of development in informal settlements. That process creates a distinct urban form. Here I analyze how those peculiarities of the urban form of informal settlements condition the conflict that within those spaces is waged.

This section describes six distinctive conditions defining the battlespace of informal settlements in Medellín; they can be summarized as:

1. **Time and Density**: Relationships between the physical evolution, population growth and densification of informal settlements over time, generate distinctive phases of development, paralleled by distinctively different roles for actors in the conflict.
2. **Accessibility**: Isolation from the state is a condition required for Non-State armed groups to operate. Informal settlements provide social, political and physical isolation conditions. In turn, this feature helps to perpetuate the conflict.
3. **The tree vs. the network**: Informal settlements have a unique urban street network result of the incremental process of multiple single additions. This process produces in most cases a street network kindred to a tree like urban structures. These tree-like urban networks are fragile systems, easily disrupted by natural disasters or events (Buhl et al. 2006, 521). This condition provides opportunity for small NSAG organizations to claim territorial control and also to defend themselves against other NSAG or the state security forces (police and army).
4. **Legacy spaces**: These tree street like network creates key junctions that are so important to turf control that these spaces remain over generations in the control of illegal armed actors, even when the succeeding actors have very different motivations. Territorial control confrontation is center in conquering these spaces. These nodes are key for implementation of security strategies in the informal communities.
5. **Greyspaces**: Alongside the formation of the street network the additive process leave unclaimed spaces. These are vacuums, or vacant spaces on the path of development of informal settlements that become spaces for violent acts away from the watchfulness of communities or state security actors. Their identification and eradication should become an issue of public policy and security strategy.
6. **NSAG territory components**: Finally the identification of those spatial features permit to define NSAG territories. Here I identified the salient components of a turf gang in Medellín. These are based on the survey of history of gangs, interviews and mapping NSAG in Medellín.
TIME AND DENSITY

As we have seen in Chapters III and IV, informal settlements are always changing. I argue here that as time passes, urban form and social actors change in dramatic ways. The relationships between the physical evolution, population growth and densification of informal settlements over time, generate distinctive phases of development that are paralleled by distinctively different roles for actors in the conflict.

### Table 7. Perverse actors action by stage of informal development. Source: the author.

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<thead>
<tr>
<th></th>
<th>Foundation</th>
<th>Infill</th>
<th>Consolidation</th>
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<tr>
<td><strong>INDIVIDUAL ACTORS</strong></td>
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<td>Theft</td>
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<tr>
<td><strong>LOCAL GANGS</strong></td>
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<td>Territorial control, association by propinquity</td>
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<td><img src="image6.png" alt="Image" /></td>
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<tr>
<td><strong>FRANCHISES OF CRIME</strong></td>
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<tr>
<td>Organized crime, specialized gangs, multi scalar territorial control</td>
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Literature on conflict has focused on areas of poverty as static physical entities with defined limits. Even detailed longitudinal studies like Janise Perlman’s “favela” (2010) fail to take into account the role that time has played in changing the social composition of the neighborhood, by the mere increase on the density. Within physical density, growth lies population density growth. As the urban forms become denser the population as measured by inhabitants per hectare also increases. These changes alongside the imprecision of measurement of the form and inhabitants of informal settlements hide the relationship within these two factors density growth and type of conflict. This confusion has been exacerbated by difficulties in accurately and consistently mapping informal settlements. The lack of accurate mapping not only creates problems of planning at the municipal level in terms of providing...
accurate services and policies, but also creates problems of how to deploy security apparatus within neighborhood spaces.

When mapped over time, we see different types of communities emerging in the same territory, as measured by the density of population and amount and types of building. It is this changing nature of informal settlements that has led to confusion about the form of these neighborhoods in prior studies. By looking at informal settlements conflict along set developmental stages, conflict appears as distinctive at each one of those points.

In Chapter III three stages of urban development that relate to stages of urban growth were identified both in the literature an also in the mappings of the evolution of those informal settlements as part of this research. These were the (a) foundational moment, that first moment of community mobilization to “invade” and take possession of the land. (b) The infill phase, when the moment of accelerated growth community infrastructure provision and severe increase in density and (c) the consolidation phase, when after maximum first floor occupancy is achieved second level development become a pattern that in turn double or triples population by increasing vertically by default quality of housing also increase. These three phases represent not only physical and social evolution moments, but also mark important changes in the way conflict happens inside informal settlements.

**Stage 1: Foundation.** The reduced number of community members and their interdependency necessary to survive creates a very tight group that does provide some level of protection against the also reduced amount perverse actors. Low opportunities for rent also create a disincentive for other organizations to profit from dwellers at this stage.

**Stage 2: Infill.** The elevated number of new residents overwhelm the capacity of community organizations. New market opportunities appear at this stage like small stores. The increased number of dwellers open opportunities for a myriad of opportunities for association, among those are associations through crime. The increased number of dwellers challenge community social ties that were key at the community’s foundational moment, fragmenting community into multiple groups with different affiliations. This open space for newly formed gangs to act. Gang associations are by proximity; their actions are local and very tight to the neighborhood territory. Infilling creates irregular spaces and paths of movement, providing an advantage to those who know the territory.

**Stage 3: Consolidation.** Commerce and density grow hand by hand, the market opportunities for illegal profit increase and the competition that creates violent conflict. Large NSAG takes place at Informal settlements and profit from outsourcing their violence and turf control to the ever-changing small gangs at informal settlements who continue to control local territories made accessible and defendable by their intimate local knowledge of the space.

Below I explain in more detail the differences in conflict at those stages of development. These findings provide an underpinning for policy recommendations discussed in the concluding chapter VII.
STAGE 1: FOUNDATION

Across the interviews, community members talk about this period as an idyllic period of time in which armed actors were not present, a provocative finding. My initial interpretation of these reports was that time had colored the memories of such important foundational moments, some up to 40 years in the past – painting a better picture of life than actually existed and erasing situations of conflict in a typical case of what social scientists call “false memories” (DePrince et al. 2004). A more detailed look at the interview descriptions, revealed a plausible explanation for the consistency in people’s memories of this period. Around 20% of the large pool of interviews include foundational stories and 30% of the semi-structured interviews. All of them present similar prescriptions about conflict that can be described as follows. In the beginning, criminals existed but not the kind of criminal organizations that would arrive later, even as perverse actors existed they did not act in groups and were seen as less threatening. The enemy during this period is clearly not illegal armed actors, but landowners, and the police (or army) which act with a myriad of institutions (military, police, and municipal nonsecurity institutions). These actors and institutions arrive to evict families, tear down structures, arrest community members and burn houses. A family in the Moravia neighborhood recounted that they had been evicted and their house destroyed a total of twenty times. Such stories do not include illegal armed actors; community members reply over and over saying “they arrived later”.

The explanation for such a puzzling phenomenon I argue is as follows. At the foundational moment successful communities (those that we can interview now and have achieved permanence over time) are a small and very tight group of 50 families or so as shown by the cases in this study. They depend on each other to survive. They ally to fight common enemies, to build necessary infrastructure as paths, streets, sewers, energy connections and to build their houses take care of family members when outside, etc. In Medellín residents of informal settlements called meetings to build “convites” as shown in the chapter IV in all the cases. Most founders know each other intimately. Interviewees could recount the full name of each of the families that constructed their neighborhood. It can be speculated that this tight society does not leave space for competing social organizations, even criminal ones. There are not sufficient members to create competing organizations in the neighborhood, including illegal organizations.

Space is also very particularly constructed at this stage. Housing units are small and do not touch each other. Large open spaces do not offer protection to armed actors as it does the tight narrow paths and spaces in later stages of development. This spatial quality explains, in part, why it is physically so easy for state security institutions to dismantled entire neighborhoods at this stage. And also to control them with their excessive force.

STAGE 2: INFILL

At this stage population growth is the most salient feature. As seen in the previous chapter, the increases of population are in the order of 10 or more times than of the foundational moment. This growth in population is mirrored in increased and specialized community organizations, which also includes the first
appearance of organized criminal groups in the forms of street gangs. Conflict now changes from a focus on state security institutions or specific individuals to these new organizations.

Along with the population increase, there is a reduction on the number of “convites,” as the basic infrastructural needs are covered. Streets have been widened and some of them paved. Houses are fitted with public services like water and electricity. These new improvements are brought both by communities, the state and in some cases a combination of both, like the case of electricity provision in Independencies in chapter IV. Two things then happen simultaneously: (1) those issues that for all neighborhoods are essential for their survival (like water provision) are being supplied and (2) is that because of neighborhood population growth it became more difficult to coalesce the community towards a single goal. The as community member mention the sense of “union is lost.” In discussing this period, interviewees lose their grasp on understanding the entire social network of the neighborhood, they cannot recall the names all members who live in the community. The cohesive social network of the foundational stage fragments, multiple community organizations, start challenging the hegemonic power of the Juntas de Accion Comunal (JAC), and compete for resources thru different political networks, or thru the same pool or resources. In Comuna 13, for example, the JAC as organization has been traditionally more connected to the traditional parties while new youth organizations as Siglo XXI gets its support initially thru NGOs and non-traditional political parties. Later in 2008 they will compete for the same pool of money during the participative budget (PB). This type of competition further foments fragmentation of that single community organization. This fragmentation per se is not necessary in detriment of the community, a heterogenous voices and interest are good for governance. The problem resides in that there is not a framework in which those multiple voices can negotiate and organize to solve the new set of issues that the growth is bringing to the community among them the most important is how to deal with the new association among lines of crime and its security issues.

Among those new organizations are also perverse organizations, the first gangs appear at this stage. Community members belittle the power of this groups when compared with other stages, expression like “los pelados [they youth] that fight among them” are often found when describing these first criminal organizations in the neighborhoods. The opportunity of a racket market encourages gangs to use violence and a way to generate income. The fragmentation of a cohesive social structure aloud gangs that increase in sophistication to control and supplant the by now fragile community social organizations.

Interviewees connect changes in the type of conflict with its escalation of violence as the result of newcomers. They connected new type of organizations as groups that arrived. “When those (name of the organization) people arrived” at first, this could be attributed to a way to distinguish themselves from criminals, we are not like “them” kind of response. However, even when talking with ex-members of the conflict, arriving individuals and groups are mention as one of the sources of escalation of conflict at this stage and the next one. An ex-member of a group who talks about the arrival of the “negros” (Urabefnos).
He mentions how this new arrival intensified conflict and how conflict was not like that before the arrival of such group.

While some new organizations bring with them new members from other areas. It is clear that existing residents also become part of new organizations. So the argument that all of this change come from outside it does not hold thru. The gangs at this scale are small not very sophisticated. Also the types of weapons that they use and the strategies to control territory are very primitive. Community members know the names of the participants of the groups and also their mothers. This could mean that at this stage perpetrators of violence are local. But that the fragmentation makes some community members to feel that the perpetrators are coming from the outside. This would change in the following state were outsiders as criminal organizations clearly arrived.

During this stage, the final urban street network forms and a distinctive neighborhood urban structure emerges. The network of streets and spaces becomes very tight, and houses are packed at a higher density. The proportion between what is public and private changes. Mobility in and out of the neighborhood is, therefore, impeded, and in turn, territorial control from within by illegal groups becomes easier. The first lockdowns appear at this stage; informal checkpoints at strategic places are a way to secure protection of turf. In El Triunfo the first turf battle will be followed by the installation of those check points at the “entrances” on the bordering streets. A phenomena that today is called “invisible borders” all over the city. This practices will become more systematized on next stages of development.

STAGE 3: CONSOLIDATION

Commerce and density grow hand by hand; the market opportunities for illegal profit increase and the competition creates violent conflict. Large NSAG takes place at Informal settlements and profit form outsourcing their violence and turf control to the ever-changing small gangs at informal settlements.

In this final stage, density continues to increase two- to three-fold. Most open spaces have been developed in the previous stage; homes expand upward by the addition of several stories. Fragile temporal structures of the foundation stage become rare or are completely gone. The technological challenges that presuppose taller structures in turn make buildings more substantial and sophisticated than in the previous stages. It is also a period were house improvements also include esthetic considerations that demonstrate better incomes of some dwellers with respect to other periods. James Holston in Brazil connects this process of façade decoration in informal settings to dweller meeting their class aspirations by decoration styles and materials of new owner upgraded structures. In the neighborhood El Triunfo for example 77% of homes are made of a solid construction and have some type of decorative exterior vs. 3% that present some kind of fragile material construction. The unit’s appearances are in some way a reflection of the possibility of have some disposable income for some dwellers.
This income increase at the interior of the dwelling units is also reflected by the commerce growth at the interior of informal settlements. Interviews compare the lack of commerce options of the previous stage to the abundant number of commerce establishments and the variety of services. "20 years ago there were no more than fifteen stores, today there are more than 100" (716). The EDU estimates business grow up to 300%, between 2003 to 2008 in Santo Domingo Savio neighborhood (Samper Escobar and Massachusetts Institute of Technology. 2010). Here I see a close relationship between larger market given by the population growth and business growth. Also, the investment in units at this point is a reflection of security in that evictions by the state or private actors are improbable at this stage.

The fragmentation of community organizations continues, now each one of those organizations specialize and become more sophisticated. For example in Comuna 13 (Independencias) there are now youth organizations that mix arts as tools toward peace “Casa Morada”. This organization a NGO operated by community members with ties and funds from multiple state and non-state resources, have a state of the art studio, they teach hip-hop alongside with art classes on graffiti (Comuna 13 style). In Comuna 8 (Villatina) the community planning council, is developing a community plan for Comuna 8 that compete against the city “green belt plan”.

![Figure 56. Neighborhood El Triunfo type of constructions. Source: Plan Estratégico Comuna 6 2006-2015 Construyendo Ciudad (100)](image)

The flipside of the economic success of the neighborhoods is that the economic and organizational growth is mirrored by similar developments with the perverse organizations. Economic growth creates new market for racketing opportunities to the existing and new gangs. New bus lines are meet with
demands for taxation to gangs in Comuna 13. Competition to include those market opportunities generates conflict and space for more violence among warring gangs. In Independencias control over taxation of the commerce at the entrance to the two neighborhoods is motive for armed confrontation between “los del Dos” against “Los del Uno” as narrated by one of the ex-members of one of the groups. Drug distribution and the protection of places of drug sale (plazas de vicio) are a new objective for gangs.

The organization specialization and sophistication present on the existing organizations is also meet by the gangs. As some of them start selecting market niches within the crime market. Like gangs that are specialized in for-hire assassinations (which in Medellin is are called sicarios). This is also a period with those organization affiliate or get violently absorbed by large criminal organizations like the Milicias, Paramilitares, Oficinas or a specific drug lord. An example of such process is the “Groupos de Vigilancia y Seguridad Privada (convivir)” in 1995 that later became the ACU and then gangs (combos) by 2001 (Angarita, Gallo, and Jiménez 2008). The connection with those organizations that operate at a larger scale bring with them better warring techniques and better armament. These upgrades in armament and training make gangs more effective in reproducing violence. This connection of gangs into larger organizations is actually quite fragile, and can be measured by the loose coalitions that form and reform within neighborhoods, resulting in the ever changing nature of the franchises of organized crime in Medellin. A way to explain such fragility of relationships can be noted by the lines of communication between large franchises and small neighborhood gangs. In Medellin in 2012 two drug lords fought for the control of Medellin’s drug market Alias 'Sebastián' against Alias 'Valenciano' in the vacuum left by alias “Don Berna” in the Oficina de Envigado. Gangs would affiliate with one or the other capo and only would sell products (drugs) from one of the providers. For obvious reasons big “capos” (drug lords) do not visit the neighborhoods very often, and if they are seen, their presence is narrated more as fascinating myth than a landlord overseeing his property. A key local person is dedicated to communications between the larger organization that supplies money, drugs and jobs. Many of the members of the gangs do not get to meet even with the intermediaries.

This organizational structure is reflected in the characteristics of space. Higher density leads to a paradoxical phenomenon of territorial control. With each level (of housing above existing units) added to the neighborhoods the battlespace becomes more tridimensional and more complex. As the complexity of the environment increases, it diminishes the ability of local gangs to control territory, so their domains become smaller. The small gangs provide little competition to older and organized criminal organizations but they are fundamental for such organizations for the distribution and transference of power to the scale of street.

Finally is at this stage that state and neighborhood relationships seem to change in the city of Medellin. At this final period is obvious that these informal settlements are here to stay and that new approaches are needed beyond traditional evictions. This is the phase in which most of the urban upgrading projects are implemented in Medellin. No urban upgrading project has been implemented on the other two informal settlement developmental stages. Based on the projections of DANE and community narratives,
changes continue to happen in terms of housing, but population growth seems to reach a peak at the later parts of this stage. In some neighborhoods it actually looks more like they start to lose small portions of population, a phenomena which can be accounted for, as member of the population flee conflict and also as the process of increased income, gets reflected in less overcrowding of the units.
TAKE AWAY FROM THE THREE PHASES IN TERMS OF SPACE AND CONFLICT

1. Time and density in informal neighborhoods provide space for different actors to exert their territorial control and power. Meaning security institutions of the state (police and army) are stronger at the initial stages, gangs only appear in later two phases, and they become more sophisticated and interrelated with other scale up criminal organizations as the neighborhood consolidate.

2. Social urban networks increase as population growth with them also actors increase both as competing social organizations but also as competing illegal armed organizations. Each phase them has different types and number of illegal armed actors. Urban density and market
opportunity provide support for this increase see Figure 57 for growth and Figure 58 for a detail map of those developed networks)

![Diagram of social network](image)

**FIGURE 58. SOCIAL NETWORK DETAIL DIAGRAM SHOWING THE RELATIONSHIP BETWEEN MULTIPLE GANGS, COMMUNITY MEMBERS TERRITORIES.**

3. Informal settlement growth creates very different contexts to apply policy. Today we lack a system of classification of informal settlements. The only city that classifies informal settlements is Rio de Janeiro, in which favelas are classified by their relationship to the geography (costal, plain and hilled). Classification of informal settlements according to its stages of development would permits to tailor policies of intervention in strategic ways. And to use resources more efficiently.

In general here, I demonstrate that as informal settlements growth the level of gang violence increase as the actors of the conflict specialized and become more sophisticated the urban form as measure of density accompany this process. This intensification I argue is the result of negative aspects of growth under physical and social isolation of the informal settlements in the next condition I explore that issue of isolation.
Figure 59. Chronology informal neighborhoods and slums 1954-2011. This collection of maps is created using all informal settlements records created by the city of Medellín Planning Department since 1950 to the present.
Isolation from the state is a condition required for non-state armed groups to operate. The failed state concept is based on the idea that in countries with low levels of governance NSAG groups proliferate and contest the legitimacy of the state (Huber and Reimann 2006; Davis 2009; Rodgers and Muggah 2009). I argue here that Informal settlements provide social, political and physical isolation conditions. In turn this feature helps to perpetuate the conflict.

Isolation is a factor that plays an important role on the autonomy of informal settlements. The urban form of the city that is dense and leaves few spaces at the core that can be occupy illegally or that are cheap to provide low-income housing, this condition forces lower income population to move to the periphery. Or to areas that by conditions of geography or availability of transportation infrastructure (like roads) are disconnected from the formal development of the city. This situation of housing at the edge plays a very important role in reinforcing such isolation by making more difficult to access informal areas form the rest of the city. Isolation in the conflict is important because it permits spatially autonomy that is fundamental in the creation of state contestation and the creation of new forms of governance, called “insurgent citizenships” (Holston 2009). In conditions of conflict like the ones in Colombia the contesting citizenship conditions match the ideals of the NSAG that operate in the entire country. In short, the challenges to the authority of the state that implies the creation of an informal settlement are match by the challenges of authority that actors like the Guerrilla, Paramilitaries and Drug lords are having with the national state. In Colombia drug lords like Pablo Escobar influenced by violence the re-writing of the constitution on regard with extradition of Colombians, the same constitution writing (Asamblea Constituyente de Colombia of 1991) led by the exM-19 (guerrilla member) Antonio Navarro Wolff here in this case we see the NSAG literally re-writing constitutional agreements. While that case is extreme, it help to understand the motivation of NSAG with respect of the rule of law.

At the city scale during the 1980s for the peace negotiations with guerrilla groups (M-19 and the Ejército Popular de Liberación), the state sponsored the creation of the “Campamentos Colombia” (Roldán S. 2004) within the urban areas as spaces for negotiation. Those institutions were staged in poor informal neighborhoods in Medellín one of them “Villatina” the sites selected were marginalized communities that were receptive to their political ideals. After negotiations ended some of they stay as resistance points their location at the periphery geographically and of state security operations offer a strategic location to perform urban warfare. The post in Villatina trained the members that later give found the Milicias of “Milicias 6 y 7 de Noviembre” (Lamb 2010, 105) that would move up the hill to the most defensible informal neighborhoods of La Sierra. In general informal settlements have by definition an uneasy relationship with the state as show in all the cases in this research. Police is seen in many cases as the enemy that comes as destroy homes. That isolation of security apparatus of the state creates a vacuum that others can easy claim.
Land at the periphery is more susceptible to be taken by informal settlements this physical isolation delay responses form legal owners or from policing authorities. Those are factors that help informal settlement formation. In physical terms Medellín topography contribute to further isolate and limits accessibility.

Several factors contribute to such isolation that limits accessibility, the 1st factor that is very similar to other cities with a large presence of informal settlements happen in the perimeter of the city. Informal settlements in Medellín are literally at the physical fringes of the city and as such that geometric condition places them in an unfavorable positions in terms of accessibility. The 2nd factor that relates to the Aburra Valley topography that amplifies that accessibility issue by twofold making those edges even more inaccessible (see Figure 59 all informal settlements in Medellín's history in their relationship to the topography). The 3rd factor has to do with the nature of the urban form that evolves within informal settlements, that is difficult to understand and negotiate. This serves as a barrier to outside groups -- military or otherwise -- and a haven for inside gangs who can exploit their knowledge of the territory to offset the power of others.

A big question that emerges about the issues of accessibility presented here is that of measuring the impact of how accessible is a particular neighborhood in relationship with how conflict is presented there. In interviews, as explained before, the recurrent idea appears in terms of inaccessibility as an important variable of the conflict. Here I have devised a way to show correlation (not causation) of those two variables: violent conflict and accessibility. By merging two different ways of mapping each condition and being able to assert places of intersection. I have tested those in a specific district of the city of Medellín Comuna13.

MEASURING ACCESSIBILITY AND ITS RELATIONSHIP WITH CONFLICT

To measure conflict I have used a traditional technique of measuring security, clustering of geo-located homicides using a point density tool in ARC-GIS. I have used the last 10 years of geo-referenced homicides in Comuna 13 collected by the Sistema de Información para la Seguridad y la Convivencia - SISC of the Secretaría de Seguridad in Medellín. The clustering of points of homicides permitted to see areas in which homicides were more common. A second variable that of accessibility has been achieved by using the “Urban Network Analysis (UNA) toolbox for ArcGIS” (Sevtsuk and Mekonnen 2012). The toolbox can be used to compute five types of network centrality measures on spatial networks. I have computed “Reach” good indicator of how accessible a specific location is in relationship to all others. Using the UNA toolbox it was possible to create a weighted map of each address in Comuna 13 in relationship of how accessible it was with respect to all other address. Figure 60 (Urban Network Analysis and Homicide clustering in Comuna 13) mergers this two measuring techniques.
Figure 60: Urban Network Analysis and Homicide Clustering in Comuna 13. Source: CI2 Comuna 13, Sistema de Información para la Seguridad y la Convivencia - SISC, Departamento de Planeación Municipal Medellín, and the Author.
This map shows the intersection of two important variables when clustering homicides along with the inaccessibility rating, both high in the areas of concentration of informal settlements in Comuna 13. The “Reach” value of the UNA toolbox rates accessibility from 0 to 2285 on the reach value being zero (0), the less accessible. Clustering of homicides rates areas from 0 to 60, being sixty (60) the larger number of homicides per radio of cluster (47 meters ratio). Meaning the area where most homicides were presented close to each other. To be able to understand how those two measurements relate to each other I have use equal chromatic classification to both variables one that maps areas (clustering of homicides) and the other that maps value of each specific construction (accessibility of buildings). This map reveals that the area of Comuna 13 were high intensity of conflict measured by homicides happens and the area that is less accessible intersect is the Independencias neighborhood. This maps shows that a correlation between homicides and accessibility exist. In no case correlation determines causation also as I have explained before lack of homicides is not an indicator of lack of conflict or lack of gang control but it permit to understand how those two variables that community members place together are present in this same territory. In this map I also have located the places where gangs hangout (what I will call here “legacy spaces”) as identified by the Centro Integrado de Intervención (CI-2) in Comuna 13. These gang points, also as expected, cluster among the same areas.

Concluding together physical isolation and social isolation create spaces for cooptation of NSAG, following I look in more detail to those physical features of urban informality and how they in turn interact with those NSAG at their interior. By examining the urban street network of informal settlements in Medellín.
THE TREE-LIKE VS. GRID NETWORK

Tree-like vs. Grid network Not only informal settlements are located at particular type of sites that determine that quality of difficulty of accessibility mention before. However, they in most cases have unique street patterns that help to differentiate them from the rest of the formal city. This unique urban street network is the result of the incremental process of multiple single additions. Simple rules of appropriation and construction lead similarities between informal settlements; size of unit, type of available materials, rapid construction techniques, availability of land. Accessibility and topography. These simple rules are determined by the restrictions imposed by the market of informal settlement creation.

Because informal settlements are usually constructed in open or unplanned land the way the open land is accessed is a key determinant how the settlement would be configured formally, this in turn determine the urban street pattern and urban 3D form. In simple terms, the last build house become the place of access for the next house. This process produces in most cases a street network kindred to a tree like urban structures, called a “vector-based, micro scale housing model.” That was implemented to simulate the informal settlements growth in Dar es Salaam, Tanzania (Augustijn-Beckers, Flacke, and Retsios 2011) This additive condition produces the very typical tree like street structures that we see in informal settlements today “Informal settlements as a fractal like patterns, result of an incremental process involving local aggregation rules. The resulting typologies are complex and deviate from simple regular patterns such as square-grids” (Buhl et al. 2006).

This additive process along access paths provides the unique pattern that helps to identify informal settlements all over the world. This street pattern is sometimes called “tree-like settlements” (see Figure 61) meaning that those settlements are not layout in a regular grid and that give more importance to specific streets in terms of accessibility than others (some suburban developments follow similar
patterns). Unfortunately, that street pattern presents some mobility restrictions. J. Buhl, J. Gautrais, N. Reeves, R. V. Solé, S. Valverde, P. Kuntz, and G. Theraulaz use of graph theory as a tool to compare the topology of street network of non-planned settlements (SNS). In a comparison between grid and tree like find that “tree-like settlements are highly vulnerable to random failures [in comparison] to meshed urban patterns... SNS exhibit fragility under selective removal... The removal of high - k nodes has an important impact on the network reliability.” (Buhl et al. 2006). These failures, they conclude, can be the result of natural phenomena as floods, landslides or human actions events (closing off of streets) or traffic to some key streets of the network.

The topography of Medellín informal settlements favor tree like street patterns over grid, even when the “damero” tradition (Spanish tradition of building new cities on a square grid) is strong among “urbanizadores piratas” (illegal developers) like the Antonio Nariño neighborhood in this study. Those neighborhoods with high slopes tend to use the tree-like street structures, neighborhoods like Santo Domingo Savio and Independencias are examples of such type of urban form.

Figure 62. Comuna 13 street grid showing the tree-like pattern

CONFLICT AND TREE LIKE URBAN PATTERNS.
An important question that appears in the study of conflict and space in informal settlement is this: How does this condition of fragility play out in the midst of conflict and does this circulatory fragility have any important role in the conflict?

Traditional views about the relationship between street network patterns and security favors discontinuous streets against grid connected structures. “Hierarchical discontinuous street system has been found to deter burglary rates compared with easily traveled street layouts, since criminals avoid street patterns where they might get trapped” (Southworth and Ben-Joseph 2003, 131). Here that ability
of diminished traffic flow making foreigners stand out or fell trap is important when considered in the context of urban conflict in informal settlements but the conclusions are quite different.

The fragility of this street patterns detected by Bulh et. Al. 2006 named "network failure" can be transpose to the urban conflict in informal settlements and provide tools to measure the differences between conflict in formal and informal areas. In the case of conflict this vulnerability can be experienced in several ways. In tree like structures the main road (trunk) is a vital part of the structure were all incoming traffic need to pass, control of that junction them implies control of the entire territory. In terms of flows not only determines the ability of illegal armed actors to strategically close an entire area of the neighborhoods, but also of close access to state forces. Key nodes are then very important on how to control territory, fragile tree like networks provide more places for collapse of such networks and thus provide the ability for mayor control. So while in the formal city the street closed network deters perverse actors, in informal settlements occupied by NSAG, this puts community members at a security disadvantage by allowing them to be trapped with the violent actors and keep out others that can contest their actions.

EXAMPLES OF THE USE OF KEY NODES BY NSAG.

The neighborhood Independencias has one of these types of street urban patterns (see Figure 62), situated at the edge of the formal city with a very steep topography. Independencias is only accessible from the neighborhood Veinte de Julio and from there only one street leads to each of the independencies neighborhoods 1, 2 and 3. These main streets are the public streets that later connect the other alleys not wider than 3 feet at some points (see Chapter I, figure 3 for an image of one of these paths). As explain in chapter IV each neighborhood here is actually a watershed and the main street is located directly above from where the stream is running (see Figure 62). The place where all main streets merge serves as a door to the informal neighborhoods of Comuna 13. This form presented its advantages and disadvantages at several times of its history. As explain by some of the interviewees' stories:

In the foundational story of Independencias 2, a community member founder tells how he divided the community on two fronts one collecting rocks and station at "the entrance" (now after the PUI is called the Parque 20 de Julio) at this place the goal was to stop the police forces into accessing the land. The second group inside the watershed had the task of building the houses at such accelerated pace than the police would not be able to turn them down easily. The bottleneck provided the opportunity to defend the neighborhood against the incoming police forces.

By the late 1990s, Comuna 13 was controlled by the three urban guerrilla groups the Milicias Populares, the FARC and ELN. The Milicias Populares controlled the Independencias 2 neighborhood. Explains a
community member, "to be able to enter or leave the neighborhood there where two places and at each place they have controls were names where check to know if you belong to the area. At that time the police could not come to the neighborhood" more dramatically the same community member explains the horrors that come out of such type of neighborhood lock down. "In one of those lockdowns I was with my daughter of only 17 days old, she had a very strong fever. I try to leave the house with her but they [the Milicia] threaten me that they were going to kill me if I left my house. I waited until the next day and the same thing, by the third day she started having convulsions and I wrapped her in a towel and left the house in the middle of the crossfire. When I finally arrived to the hospital, the doctors told me it was too late and that my daughter would have brain damage for the rest of her life. She lived without being able to move or eat by herself for 11 years and died on April 17, 2011"

Another community member explained that by the time of the Operación Orión in 2002, a car was used as a barricade to enter to Independencias 2. Milicianos raised the car with their hands to create sufficient space for a pedestrian to pass by. An area of 6,000 inhabitants was controlled by the closing of a single street with a car. In this story is clear that the ability to close down an entire neighborhood thanks to the limited exits had horrendous repercussion for the communities that inside of them live under conditions of conflict.
In Comuna 8, the tree-like structure provides a security surveillance method for current NSAG. Gang members’ station at multiple stops alongside the only transportation corridor that gives access to several neighborhoods in the Comuna can provide quick information about any police or army force that enters into Comuna 8. In these cases the limited accessibility plays a key role on the conflict by leaving out the state forces or by limiting the mobility of the entire community. The limited number of access points make such task easier to perform for the illegal armed actors. Police officers commented in the difficulty of create surprise assaults in Comuna 8 high up neighborhoods Villatina and La Sierra because of how limited street access is. Specific intersections like “cuatro esquinas” (four corners) in Comuna 8 became the place for contestation between gangs groups because it geographic importance as the transportation hub, commerce center and one access to the La Sierra Neighborhood.

In conclusion, these type tree-like urban street networks are fragile systems, easily disrupted by natural disasters or events. (Buhl et al. 2006, 521). This condition provides opportunity for small NSAG organizations to claim territorial control and also to defend themselves against other NSAG or the state security forces (police and army). An important question emerges then: what correlation exists between these nodes and gangs territorial claims? I explore answers to this in the next section.
LEGACY SPACES
These street-like networks create key junctions that are so important to turf control that these spaces remain over generations in the control of illegal armed actors, even when the succeeding actors have very different motivations. Territorial control confrontation are crucial in conquering these spaces. These nodes are key for implementation of security strategies in the informal communities. Legacy spaces are not hot spots in the sense that these are not areas were crime concentrates (SHERMAN 1989). Legacy spaces are places of territorial control. Crime and violence occur in this sites because of the prolong presence of perverse actors. And because is a predictable space for their enemies to attach but not necessary because is a place were victims are attacked.

By mapping NSAG locations over time revealed a preference of these group for marginalized poor neighborhoods over time (figure 6, Chapter V) this was explored in the preceding chapter V. Poor and informal neighborhoods are more prone to be the place for locations of known illegal armed groups. At the neighborhood scale a similar type of mapping of gangs and place over time made thru the interviews revealed an interesting pattern. The permanence over time of illegal armed actors in particular places. By places here I refer to specific corners or on front of specific addresses or nodes inside the territory that the illegal armed groups dominate (street corners, land clearings, bus sheds, energy towers etc.). Many gangs use as its name the neighborhood (or sector) name or a geographic feature of their territory that they occupy (la Torre, los de independencies 1, 2, 3, el filo, La 115, etc) some authors of Medellin evolution of the conflict narrates the transition between the gangs of the 1980s to the more standardized gangs of 90s., Diego Alejandro Bedoya Marin, and Julio Jaramillo Martinez explain this phenomena as follows:

“...Each neighborhood has two or three small gangs inside its territory. But [they are] gangs without the identity that characterized the first ones [of the 1980s], there are no names, no rites of initiation, no satanic cults and no other purpose than of delinquency. The names are not anymore the names of their leader, specific characteristics or something selected by the gang themselves. The people identify these groups based on the place where they are located within the neighborhood” (Bedoya and Jaramillo 1991, 52)

I would argue that what we start seeing here is a different phenomenon that responds to the fragility of leadership within local gangs and the intensification of succession within their ranks. This situation alongside the ever-changing affiliation to franchises of organized crime of the actors in the conflict, require those organizations to be more fluid and flexible. Figure 64 explains part of that fluidity in which big organizations change but gangs mutate while maintaining their same territory but changing affiliations.

I would argue that the naming of gangs based on geographic features of the territory that they occupy respond to the flexible nature of the composition and affiliations of its members and that the only constant over time is the space. Naming a group after a leader that is going to last a few moths is not a good strategy, the same thing can be said for affiliations to larger franchises and/or their political or economic motivations, that seem to fluctuate almost as much.
FIGURE 64. DIAGRAM GANG SCALES AND TIME. HERE SHOWING THE CONTINUATION OF LOCAL GANGS OVER LONGER PERIODS THAN THE LARGE FRANCHISES OF CRIME. BY AFFILIATING WITH THE NEW FRANCHISES.

ONLY THE SPACES SEEM TO BE MAINTAINED OVER TIME.

Here I provided some of those examples of space as the only constant of conflict. Again it is important to highlight here that this research does not see space as the causal variable of conflict but as one important feature of the conflict that condition the way conflict is reproduced.

A high ranking official on a security organization in Comuna 13 explains how puzzled they find themselves on the issue of gang dismantling even today (2013). “Look even after we capture 15\textsuperscript{17} of those pelsos [kids] from the same gang, they later reproduce as if we have not done anything.” This ‘reproduction’ is part of a succession in power within the structures of the local criminal organizations, a very common phenomenon. The re-structured gang will then spatially occupy the place left by the older organizations and with it, in many cases, its name too.

\textsuperscript{17} Being 15 members captured a large percentage (more than 80%) of the total number of members.
What is different here is that the criminal organizations are in a way supported by the spatial configuration of the neighborhoods or the specific places where they situate themselves. These spaces are inherited from generation to generation some over forty years. Born in a specific block attach individuals to the experiences and social pressures of peers allied with specific groups locations, tacit alliances are drawn by the location of your residence for youth and for the community in general. Then within the space of the neighborhood (or zone within the neighborhood) some places provide strategic and symbolic leverage to defend (and attack) from foreign threats.

Here I reveal some of those places found through the interview process—spaces that show this kind of space permanence of gangs over time.

**THE GANG OF LA TORRE**

Situated in Comuna 13, this gang controlled the crest of a hill. From there, there are great visuals to the three watersheds, which correspond with 3 neighborhoods or sectors called Independencies 1, 2 and 3 respectively. The key spatial feature here is the energy transmission tower for one of the lines that supplies energy to the entire city. This tower is strategically located in a place that provides views of these watersheds. This group has existed there now for more than 10 years. Its formation is very linked to the demise of the Milicias that controlled the Comuna 13 pre-Operacion Orion (in 2002). This gang has been “exterminated” in several opportunities, one of the most recent being during the construction of the escalators of Independencies 1. The gang from el *reversadero* 1 and the la Torre found themselves fighting over the control of taxation of “security services” of the construction site, which is a very common
practice of extortion in informal settlements in Medellín and many gangs assume all physical projects requirement of provision of such taxation. The lower gang killed and expelled from the Comuna all members of the ‘La Torre’ gang after news of a double taxing. Today both gangs are still operational and have command over their territories. They both have the same name even when leaders of the organization have changed. Also the gang’s affiliation to larger franchises of crime had changed twice since this confrontation. Showing this ability to survive even after many structural changes happen to the organization. Many features of the organization changed, the space that they occupy and its name is the only one that had stayed as a constant.

EL PLAN DE LA VIRGEN

This site is located in the Villatina neighborhood (Comuna 8) inside a gang territory that bears the same name. This space, still active today, has been the center of operation of multiple groups since the early days of the Parcelacion of Villatina (stage 2 of informal urban development), this is the site of the historical gathering of a myriad of groups that have fought against each other. The site is a small clearing at the edge of a hill that overlook what is now an upgraded sport facility by the PUI Center-east located on the protection setback of a creek (Quebrada San Antonio). From this site it is possible to observe as far as 1km, in the interviews the possibility of field of view was given as the main reason for why it is an important place of gathering. This place has been occupied by gangs, Milicia, Paramilitars and BACRIM. The leader of such a post today occupies (Dec, 2013) an important position in the structure of the Oficina (as his new given name explains ‘el 6’) in the war against the Los Urabeños that are coming down from La Sierra neighborhood taking territory that one belong to the Oficina. This is just the latest war in a succession of many
in which this site is a key piece to conquer. At the end of each one of those succession battles the victorious group will settle in the residences of the families of the dead or defeated and occupy the site alongside the “Virgen” or will absorb the still alive members of the other group. As narrated by a community member one of those battles to conquer the site and its commanding turf:

In this block in 2002, there was an intense war, [pointing to the floor the interviewee said:] in that place were that tarp laid is where they had the caleta [weapons and drug hideout] of the pelaos [gang members] from here. They [a paramilitary group] came from all sides, ambushed them, they were locked up. And they [the attacking gang allied with the paramilitary killed six]. There was no time to escape. They all lived in this area.

During this attack, the power was succeeded to the new generation of youth interested in protecting the turf. Several successions of the site continue until the present day. Not all successions of power of the site of the ‘Virgen’ come from the outside. Many come from the same youth, who coming to age, challenge the existing structure in power what is called “Probar Finura”. The importance of the site is not only military, it also fulfills political and physiological functions for the neighborhood, the one that controls the site is the one in power. Group events become rituals that demonstrate the power of the gang towards the community while at the same time fulfilling concrete goals. This space is the recruiting site for new members, the site for public events sponsored by the criminal organization meals, and Christmas events etc. These events show the community the good deeds of the organization.
In El Triunfo at the corner that divides the invasion from what today is a park that was retrofitted by the PUI North-Eastern. The park and the corner today belong to a group that use it as a “plaza de vicio,” the name used for the sale of small quantities of drugs (microtrafico) in Medellín. A number of three individuals control the transactions day and night. Two (1 and 2) stay in the park and one (3) in this particular corner. This corner is important because it is the only access from the main road to the neighborhood. The third one is the most exposed and is the face of the transactions he is stationed at the corner, is the one that first talks with the clients and later calls the ones in the park to approach and deliver the goods. The third man is the one that receives the money. Having the drugs away from the corner adds a security layer to the transaction. It does not require special skills to detect the inner workings of the operation. The corner is a strategic place to establish contact with the neighborhoods through a narrow steep street that takes you to another main meeting space. During the Milicia time, this corner was the checkpoint of community members before they entered into the neighborhood. This junction was important to guard at that time to prevent access to military, police and also to competing organizations. As explained in chapter IV, community members talk about the operation of street closure during this period.

_Around here it was really scary at night, they got people and they would hit them or kill them… people could not pass from the 85 street or the 104 street, they [Milicias] will interrogate people and if it was not a known person they would kill them there (731)._

Today the control of the NSAG in Comuna 6 is large and El Triunfo is just one of the many sectors that conform the territory of the controlling group. A low homicide occurrence during the last 10 years is proof of that. Still, the site continues to be guarded as control point and as place of drug sales. In this way, it fulfills a security and economic function.

Here I argue that these spaces provide conditions that are beneficial to the organizations to fulfill some of their functions such as gathering space, surveillance, access control, and attack leverage. Those conditions are what other groups acquire once they position themselves on those areas and it is why they continue to exist as key spaces even when the conflict motivations and tactics are completely different.

The ability to see your opponent from the distance, control of access and the symbolic power of possessing such place appears in some of the narrations about conflict succession in Medellín. Ana María Jaramillo, Ramiro de J. Ceballos Melguizo, and Marta Inés Villa Martínez narrated how a group in Comuna 1 killed all the members of the contesting group and took as a price a bus stop, the main hangout place as a symbol that they have achieved their goal (Jaramillo, Ceballos, and Villa 1998).

_Space here then presents itself as the price, the place, and the strategy. To the contesting group it becomes clear that with control of those particular spaces you access the market, the symbolic power_
and the military advantage in the conflict. The one who controls any of these spaces controls the kingdom at least for the period of time that takes to the next in line to claim it.
GREYSOURCES
Alongside the formation of the street network in informal settlements the additive process leave unclaimed spaces. These are vacuums, or vacant spaces on the path of development of informal settlements. These spaces by not being claimed in the context of perverse actors' domain become spaces were violent acts can happen, away from the watchfulness of communities or state security actors.

On the surveys of these neighborhoods another space appears as really important in the construction of fear with in the spaces of conflict. These spaces play a key role in the stories of fearful memories and are the stage of some horrific stories of conflict and fear. I have call this spaces greyspaces. Greyspaces are not important or strategic places. On the contrary, they are spaces that are not of key importance in the structure of the neighborhood— they are not entrances or exits so they are not important to control. They are spaces empty of use and meaning. These are spaces that are not controlled explicitly by any actor per-se but their lack of importance make them good for other types of activities that need to be covert (a.i. the disposal of dead bodies, drug consumption in time of prohibition of consuming in public, rape, torture, theft, etc.)

Kees Koonings and Dirk Kruijt in “Megacities: the politics of urban exclusion and violence in the global south” mentions that in megacities there are areas of the city that they call 'grey zones.' These are spaces of urban exclusion, these zones are defined as territories of the city that escape the curfew of the state. They use this term as a proxy of areas controlled by NSAG. Here I define greyspaces as a zoom in to the zones within the landscape of informality that are still undeveloped and unclaimed and that offer opportunities to make in these areas any activity. Ingasi de Solà-Morales introduce a romantic dimension of such spaces that are un-programed abandoned or outside of the curfew of capitalist development, naming it "terrain vague" (de Solà-Morales 2013). In his depiction, these are mainly obsolete spaces that open the opportunity to be filled with new imaginaries that are still not realized. A perfect example of such spaces are the images of the abandoned elevated private railroad in New York, which inspire the movement of the friends of the highline. On their informal counterpart, 'greyspaces' are also spaces outside of the development of informality in the sense that they have not yet been claimed or developed in some cases are areas that were developed but claim again by their legal owner or that have some special restriction that makes harder to conquer within the rules of informal development. As explained to me by a community member on a walking tour when I asked why there were no houses in a particular space, “ah that place there, that one cannot be occupied because it has an owner” as if any of the acres of land that we were walking by did not have an owner before it was illegally occupied. As un-programed spaces they get used in very transitory ways and in incognito. More importantly these uses generate a stories that fill the imaginary of the dwellers with a meaning to the space as a place of violence and fear. As such these unclaimed territories become important referents of the sense of insecurity. These are also typically spaces that are not highly visible, or lie hidden, as opposed to the legacy spaces that are typically highly significant and visible. The presence of both serves the purposes of NSAG.
During one of my visits to the fringe of the city in Comuna 6 an example of how such spaces present to community members as places of fear became evident. A community mother agreed to take us on a walk to El Picacho, a geographic feature a hill at the edge of the city where there is a great view of the city. On our path, she recreated many of the stories that on the private she had narrated on detail. We never arrived to the top of the hill because the sight of two feet moving at the top of the monument at the top of the hill alarmed our guide as a sign that we were not welcome that day. We started our tour back on the curvy and sloped road that we had been for the last 45 minutes. Half way down, our guide, a mother and retired daycare provider, explained with chilling detail the story of one of the empty lots that flank the road in which we were. There she said “in that place one girl in her route to school was raped by the muchachos, her mother found her dead body a day later in a horrifying state” (707) just as she ended her story a school girl passed us very quickly and left the road using the path that our guide had pointed out just few seconds before, as if she was reenacting the story. This story reveals these are key spaces for the community in terms that they are spaces that they constantly inhabit and have meaning attached to them, and that modify the way they see their space in both imaginary and real spaces. Community members alter routes and create restrictions of when and who could use of these areas.

Informal settlements are created out of filling the voids that the formal city has not been able to fill or that is in the process to do so. That is why most informal settlements happen at the fringe of the city. Is this condition of fringe a perfect example of such type of phenomena of the greyspaces. The fringe is the back of the city, the inaccessibility of these areas make them perfect spaces to do activities that need to be outside of the surveillance of the community, or state.

On El Pichacho, another woman narrates the story of the construction by community members of the road in front of her house. She narrates her role in the community organizing, distributing tasks among community dwellers to get the excavator, removing the soil, paving the road—all this to be able to provide better access to their houses. This road is at the fringe condition, hers was the last house before rural Medellín begins. After she end the narration of such an epic story, she smiles to me and asks, “and do you know what was the first car that inaugurated the road?” She stopped and waited and then continued, “well the second car was the morgue ambulance… the first car came to throw a dead body there” (501). This is actually a recurrent story that is tied to these ‘greyspaces’. It gets repeated in all other informal settlements explored in this research. In Santo Domingo “El Hueco” the hole was the place where different gangs will dump the bodies. Physically the hole was the intersection of geography of a creek (Quebrada La Herrera) whose slopes cannot be build and the back of houses that close the view to that space. Making it a vacuum space within the tight urban fabric of these 60-year-old informal settlements. The use of the land fields of construction materials (escombreras) at the edges of Comuna 13 for the extermination of Milicia members and it’s allegedly sympathizers in Comuna 13 in 2002 is a good example that shows how these are spaces that extend the lawless actions of illegal (and sometimes legal) armed actors.
These unoccupied spaces are key in perpetuating and extending the actions of the illegal armed actors within the informal settlements. They permit the prosecution of activities and actions that are inappropriate or illegal in public space. Looking from the outside, this is a confusing aspect of the situation, which also accounts for the kinds of criminal activities that are performed in the public spaces of informal settlements controlled by criminal actors. It is in the public space, where most of the crimes happen (theft, display of violence, intimidation and killings) in full view of the community. The greyspaces then permit activities that have been negotiated (tacitly or explicitly) with the illegal armed actors that fall outside the established rules of engagement. These spaces provide cover for actions that violate an agreed cultural code, out of view of the general population, or other armed groups.

WHAT HAPPENS TO GREYSpaces WHEN THEY ARE DEVELOPED?

The definition of greyspace as non-programed space is difficult to access and away from the supervision of others. This changes when the site gets appropriated and developed. During the PUIs time in Medellin, space was needed to locate many of the new facilities the city needed to build in these areas where open space is rare. Greyspaces (not defined by the state like that) were attractive places to locate new infrastructure. Their empty nature made them desirable areas to site the new infrastructure in very dense areas. During community planning meetings held by the social department of the EDU, the group designated to manage the communication regarding the project goals with the community, gathering of community input and follow-up of project advance. (This is called in Spanish socialización). This department held a series of workshops called "imagining" (imaginarios), in which the planners asked community members to define particular spaces that have been identified as potential places for development. Projects would be developed on those sites based on the feedback of the community. Community members are asked two key questions; what memory do these spaces hold for them? And later they are asked what they would like to see in those areas? (See Figure 65)
Largely, the responses to memories people have of these spaces reveals a narrative of illegal uses, danger and risk. The PUI then developed some of those sites by placing in them libraries, parks, playgrounds or schools. Some of those projects have been successful at changing the narrative of those spaces from negative to one of a secure space. I see those successful examples effective in integrating these vacuums of development of the greyspaces with the rest of the neighborhood by positively reinforcing programs. A particular case in Comuna 13 was the construction of the “Parque Biblioteca San Javier in an empty site between the women’s jail and a cemetery. As explained by a member of the community, “8 years ago this area did not have any function, people would do [bad] things in this space” (607) Comuna 13 interviewee. He later explained that now that the library was in this place, the use of the space by those actors (drugdealers and drugadicts) was not possible in the way that happened before.

A similar condition happened in Santo Domingo to the “El Hueco,” which was replaced by a park that serves as entrance to the new library and that is now a key route into the neighborhood. This place, the back of buildings that look over a creek, was before considered a very dangerous area as told by a community member during a tour of her neighborhood.

If that place could talk how many stories it would tell. Look, that place there is called el Hueco “the hole.” In that hole was where they [gangs in the early 2000s] threw the dead bodies. (201)
After the PUI, fifty houses were removed from the edges of the creek and a public library was placed on one edge of the site and in the other a park. Community members connect the construction of the infrastructure (library and park) as the intervention that contributed to the increases in security of that specific sector. Mapping of homicides in the Santo Domingo Savio from 2004 to 2014 do not show any homicide in the respective creek or park, which corroborates changes of the security of the site.

Projects like the libraries are seen by community members as removing perverse actors from some particular problematic spaces. It is important to also remark here that other cases are less successful in removing actors and unwanted actions. Playgrounds are one of those unsuccessful projects. Many of the once greyspaces are turned into playgrounds. Playgrounds are occupied simultaneously by gangs, drug addicts and children. They do not seem to deter perverse actors—on the contrary, they maintain permanence and creates opportunity for mixing of at-risk youth with those perverse actors. Fear of recruiting into gangs is one of the preoccupations of community members have of children who play in spaces inhabited by gangs. Greyspaces are spaces to shield perverse actors from the public sphere, the act of just building a playground only provides better accommodations to shield yourself in that space. A playground alone is not able to change the use of such spaces, an unattended playground on a greyspace only provides a space for more illegal activities and a constant supply of victims. Only eyes on the place and strong communitarian or institutional presence can change such situation.

The successful examples mirror other cases like the Violence Prevention Through Urban Upgrading (VPUU) as security in Africa project (Haskins et al. 2007) that identified that areas around the townships, "flood areas" that because of its intended use (collect water in times of strong rain) are left unoccupied. These areas were identified by the community as areas of danger where women were molested and crime occurred. This project “focused on the design of public space which aims to ‘occupy’ the most dangerous locations through physical upgrade which introduces round-the-clock activity and surveillance” (V. Watson 2012, 13).
Greyspaces are created as informal development “leapfrogs” (Hayden and Wark 2004, 54) to other areas where conditions for development are right. Learning to identify, target and develop urban strategies to dismantle the physical features that permit the covert actions of illegal armed actors in these spaces is key to understanding the role of space in crime and conflict in informal areas. Of course such grey spaces also exist in the formal city where they may create the same conditions. What is unique in the space of informality with respect to greyspaces is that they happen alongside other spatial conditions of conflict where neighborhoods are dominated by illegal armed actors that make these spaces exceedingly dangerous, as reported in the interviews by both the residents and illegal armed actors. Within the complex geometry of informality, greyspaces large and small are intertwined with the fabric of the community, providing the opportunity for illegal armed actors to create a shadow network of space in which to operate. In this context, greyspaces contribute to the development of control strategies by illegal armed actors.
NSAG TERRITORIES IN INFORMAL SETTLEMENTS.

Following on the previous discussion, here I identify the salient components of a gang turf in Medellín Informal settlements. These are based on the survey of history of gangs, interviews and mapping NSAG in Medellín. In Medellín the macrostructures of crime can have very varied sizes of territorial control. They can at some points control the entire city as is the case in 2003 with the AUC; they can also control a sector that includes several Comunas, a Comuna or a group of neighborhoods. In general, these large organizations operate at multiple scales (city, nation, global) and depend on the small local gangs to deploy their territorial control in Medellín. The small neighborhood gang organizations control spaces that varied from a neighborhood to a street corner. The size depends on the level of organization of these low-level gangs. Here I try to describe the physical features of such territorial control. Here it is important to clarify that this generalization comes from the study of the 30+ gangs that have been mapped as part of this exercise and that as such can be limited by the size of the sample and it is generalization to other areas beyond the Medellín context.

Is important here to describe the nature of turf control of the illegal armed actors to understand how it interacts and how it is deployed. I found here that gang turf have the following components: (a) Of the gathering spaces, which include, grey, public and private spaces, one can infer from the interviews that the most important is the Legacy space as the core space where members gather; (b) the Income generation sites, including the plaza and other sites for extortion; (c) a perimeter or edge that defines the extent of the territory that is controlled; (d) an access point or several access points that permit control the mobility and (e) the frontera invisible that is the area where the border meets warring groups. Here I describe those features of such territory in terms of space.

A. GATHERING SPACES

These are the areas where gang members meet, hangout, and loiter. It included private and public spaces. The most important of these is the legacy space, which is the center of all turf controlled by the group. This space is fixed in location. The legacy space is the throne and is used mainly by the senior and more prestigious members of the group. All have access to it but it is the space that is more guarded. It is occupied by these senior members not only because of its symbolic power but also because given its physical features is the safest – due to views, topography, routes of access and surrounding context. Homes are also important because they become spaces for meetings away from the view of the community. Appropriated homes (from community members) are used for these types of functions. In Santo Domingo, a gang took over an apartment as the place of gathering and consume of drugs. It took several years, a police raid and the dismantling of the gang for the owner of the apartment to be able to claim its space again. In Comuna 13, the AUC took homes of families that have been displaced as residence for their new members. These homes were selected based not only on the affiliations of the previous members, meaning that there were homes of allegedly Milicia supporters but, these homes were also selected based on their strategic location as to control the territory. The homes of gang members are also important and they are within the turf with some few exemptions. Community
members' homes are included here because they provide cover for hiding of goods, weapons, drugs and also as escape routes or firing post. For example, in Villatina, the house of one of the community members interviewed was the place chosen by the gang to install a sniper with a long range rifle to fire at the gang at the other side of the creek. In El Triunfo and in Independencias, the homes of community members interviewed were used by gang members as the place to hide weapons.

B. INCOME GENERATION SITES
A key component of any turf is the production of sufficient funds to maintain the organization. As such, the places here are those that are important for controlling income revenue streams. These include the “plaza,” that is the place of selling drugs, the commercial areas key for revenue by racketeering, called in Colombia “vacuna.” These also can include in some cases bus routes. Security fees to community members can be in some cases extended to all housing units in the turf. In Villatina a fee of 2000 week was imposed by the gang of the same name, lead at that point by alias “Gomelo”.

C. THE PERIMETER OR EDGE
This is the area of control of turf. It includes all the other spaces where the members of the group socialized. From the legacy space, the plaza (of micro-traffic) and the micro-extortion areas. This territory get negotiated and adjusted, merged with others. It appears from the interviews that most of the gang member live within the perimeter with very few exemptions. Most boundaries correlate with neighborhood limits that in Medellín not always correlate with the mappings of the city. For example independencies is a single neighborhood by the municipality, but for the community it is divided in three areas that are for them very distinct neighborhoods. Many times, the limits of the territory are defined by geographic features such as creeks and edges of the hills.

D. THE ENTRY POINT
This is located at the edge or outside of the edge. It is the control place from where intrusions into the territory can be seen and informed. This is a post for low position members of the group. Lookout spaces that are sites for the strategic location of members to guard the turf. Located at viewpoints or along access points. In Comuna 8 lookout post are placed kilometers away from the turf for example to inform about police or military access with time. In Independencias some look out places are within the boundary of the gang along the main (and only) car accessible road.

E. FRONTERA INVISIBLE (INVISIBLE BORDERS)
The frontera invisible is an edge of conflict, a territory of dispute and grievance. Crossing from one side to the other could mean punishment or death. All the community members suffer from such phenomena, but youth and specifically men, suffer more than others of such condition. Contrary to what I was expecting, these borders are not equal to the perimeter of the gang. They only appear at edges of conflict they can be away from the perimeter of within the perimeter of control of the gang. These borders are as much physical in terms that they correspond with geographic and urban features (a creek, or road or a public space) as they are psychological in terms that at times are more mental than real. If an individual thinks at some point a frontera (border) existed at a specific place would not dare to cross, years after the real border has been dissolved. In Comuna 13, I experienced such psychological fear and realized the perverse consequences for youth at these invisible borders. During a visit, I commented that I was
heading from independencies 2 to independencies 1 to check out the development of a graffiti. A young community member not affiliated with gangs feared for my security and insisted on joining me on my journey. I have done the cross between these two distinct places many times and actually feel safer in independencies 1 than in 2 but I did not express such a feeling. He walked with me all the way to the place of the graffiti at the top of the electric escalators. I took some pictures, had a drink in the tienda (shop) at the top as I always do. When was time to come down, my keeper confessed that it was the first time he has been at the escalators. This was shocking for me because the escalators opened three years earlier and are one of the main attractions of the city located only 340 meters (1,100 feet) from his house. He explained that he has always been fearful of the people from this neighborhood and of what could happen to him if he crossed. That same week, a kid cross the ‘frontera invisible’ between the 20 de Julio and Independencias 2 and was badly beaten. This was one of the areas that we crossed on our path to the escalators. Real or not, the ‘fronteras invisibles’ are physical barriers that limit mobility and mold behavior inside these communities.

FIGURE 68 DIAGRAM OF A GANG TERRITORY, BASED ON FIELD OBSERVATIONS AND COMMUNITY AND ILLEGAL ARMED ACTORS’ NARRATIVES
PART 2 INFORMAL WARFARE STRATEGIES

"The area of the city that where I feel the most fear going to work is Comuna 13"

Interview with a sergeant of 12 years of service with the National Police in Medellin.

Here I explain how individuals and groups incorporate those spatial conditions before described as strategies during conflict. The way space is seen and understood requires the actors of the conflict to deploy and incorporate informal space into their own battle strategies. Those warfare strategies of the informal settlements differ from the ones used by the same actors on the formal city. I point to the most salient strategies the research revealed here.

I focus on the ways actors use space during conflict and in which ways the informal space modifies the way conflict happens. Not all spaces of informality can be considered battlespaces. And from those that have been at some points is really important to highlight that they do not behave as such all the time. But there are the differences and peculiarities of combat in such spaces. Here I describe the strategies revealed thru the historical and qualitative research. More importance has been place on the relationship between space and warfare strategies than on other relationships. This is based on in the interviews with illegal armed actors as also with state armed forces and the experiences of community members living among conflict.

There are very important considerations that differentiate urban from rural warfare. Chapter II is dedicated to making this distinction. Here I define the differences and key strategies that differentiate formal from informal urban-warfare. There is very little in the literature of urban warfare that defines differences between the battlespace of informal vs. formal urban space. There are narratives and studies of specific combat fought in both areas, in settlement camps (Weizman 2006a) and business districts (Powell 1992; Graham 2009; Graham 2008). I argue that such a distinction is important because in action different strategies are applied to these two different spaces. In terms of preparedness and what kind of spatial knowledge is needed to go to battle and also the resources deployed at the moment of combat.

Specifically in Latin America there are not any military battles called “Operacion Poblado” for Medellin or “Operacion Ipanema” for Rio de Janeiro, which are the wealthy neighborhoods of these cities. And yes we can argue that this is because there are not such concentration of violence and conflict in these areas. But it is also because even when military incursions are needed the level of preparedness, the resources necessary and ability to deploy those resources is very different in formal verses informal areas of the city. In fact many of the figures in the ongoing conflict in Medellin from Pablo Escobar lieutenants to Sebastian’s second in command have been apprehended in the prestigious and affluent residential area of El Poblado (Investigaciones 2012). For those operations, lower number of police officers are needed. Lower level also of preparedness because there is a better understanding and control of the urban
terrain. There are here in these neighborhoods social and spatial conditions that permit the use of less apparent force as I will explain.

In the context of this study I define formal battlespace as akin to military operations that occur in the planned and not marginalized areas of the city. The literature of urban warfare is fill with examples of such type of conflicts the siege of Leningrad during the Second World War (Stein 1983) the advance of Russian troops on Berlin at the end of the same war (Andreas-Friedrich and Boerresen 1990). These are classical examples that are followed by other in the context of the Latin American cities like the US invasion of "Panama City" (B. W. Watson and Tsouras 1991). All of these examples have something in common: they operate at the scale of the entire city but the main target is the unique structural components of the planned city. More importantly they can be still be described as 3rd-generation warfare (Lind 2004). Even in Colombia, when we focus on the urban wars fought in the country side i.e., attacks of guerrilla groups on urban towns away from large urban centers (BEDOYA LIMA 2008), the battlespace in which those wars are fought pertain to the ‘damero’ (Spaniard grid) of those towns and as such respond to planned urban environments that possess the advantages of being mapped, and that have a recognizable urban hierarchical structure. These type of wars are different to those fought in areas of informality, something that Dennis Rodgers defines as “Slum Wars”(Rodgers D. 2009).

Slum wars represent a different type of urban conflict fought not in rural areas or in the established core of cities but at their emerging fringes. There are those places within cities in which the following features intersect: Non-formal urban development, poverty, marginalization and NSAG. They are different in the sense that the urban space has those identified conditions of indeterminacy (for the state forces), high density, and constant change. Factors that give leverage to non-symmetrical contenders (Glenn 1996).

Following are the identified informal warfare strategies employed in Medellín.

- **Intrusion, accessing informal settlements (IS) with an army.** Asymmetric confrontations in urban terrain add a level of complexity to military incursions into the space of the IS.
- **Security by environmental design, claiming space using physical strategies of security.** Institutional buildings as a strategy of security the case of Comuna 13.
- **Visibility, if I see you, you are already dead.** Urban form and topography as complicit in strategic advantage.
- **Field of view the operational distance of combat.** How the width of the public network influence the combat.
- **Terrain knowledge, the constant evolution of informal settlements creates an uncertainty of its mapping that plays a strategic role on how state and illegal armed actors understand the battlespace."
• The threshold between the public and the private. IS public-private flexible relationship creates two very different versions of what the battlespace is for according to the local forces and for foreign forces.

In the previous section of this chapter, I identified conditions of space that influence conflict. Those conditions are combined or used to inform different battle strategies. Figure 69 shows the relationship between those identified conditions and the strategies that are going to be explain following in detail.

Figure 69. Relationship between Conditions of Space and Informal Warfare Strategies

INTRUSION, ACCESSING INFORMAL SETTLEMENTS WITH AN ARMY
As explained before, by definition IS are difficult to access, they are located in areas that have been taken out of the formal process of development of the city. They situate mainly at the periphery or in areas in which the cost of development is prohibited by the methods of the formal market. This phenomena explains why so many IS are situated in areas of high environmental risk, like steep topography or on the flood zones of rivers. From a military perspective, during an army “invasion” the element of surprise is very important. The more difficult it is to access the terrain, the more difficult it will be to have the upper hand in battle. The most violent informal settlements in Medellín have very limited routes of access in many cases as entire areas of tens of hectares and thousands of inhabitants are only accessible by a single road. This physical condition makes it difficult to bring in foreign troops. Also the steep topography in Medellín plays an important role by providing viewpoints from which to watch over the access points making easy for groups up on the hills to see any advance and take any needed measures for its protection. In the case of lack of those geographic advantages the predictability of the main road of access permit illegal armed actors to position lookout stations to provide vital and real time information. Even before cellphones, low ranking members located at payphones in key places provided real time information of who had access to specific areas, a method used during the 1980s and early 1990s to cover and distribute information over the territory (Los Archivos Privados de Pablo Escobar 2004).
Based on the interviews in Comuna 8, a community member affirms that at the moment that a police car left downtown and entered into the Comuna through the Calle 52, the road that leads to the neighborhoods of the Villatina and La Sierra, the main group got information about the intrusion. An interviewee explained that method in reference to my intrusion as a foreigner to the neighborhood.

“When you arrive to that corner these guys [pointing to a corner where a group of youth were hanging out] already knew you were coming, from the moment you got off the bus in the main road and took the steps [that was three blocks away].” (710)

In an interview with a group of police officers they commented about how accessibility was one of the main concerns at moments of intrusion to make large or small operation. And how this information apparatus along the tight entrance corridors makes it more difficult to have the surprise element during police operatives. In this interview a second element of access and strategy was revealed, which is the difficulty of flank informal settlements given their geographic location and on how the urban form respond to such topographic features.

“Once we had an operative in the Comuna 8 that was very hard, there is only one entrance road and from there we were not able to come in. We have to divide, and halve the group… we were like 100 policemen, we had to take the Santa Elena Road [the old road to climb the hill and leave the city to the east] from there we took the road [unpaved] that goes to the water tanks [located at the periphery of the city] and from there came down.” Policía Interviewee (723)
Here the police force needed to be divided. In this specific case, to actually leave the city to enter again through the rural areas using the service roads of the water tank at the periphery of the city. By doing so, explained the policeman, they were able to have control of the access. These require a large number of personnel and even so it did not provide the required surprise element.

In Comuna 13 during 'Operación Orión' (a military operation to take the Comuna 13 control from Milicia) a similar tactic was employed here the national state forces allegedly allied with paramilitary groups of the urban side of the AUC in Medellín to take the Milicia controlled neighborhoods in Comuna 13. The AUC forces took camp on the hillside of Comuna 13. The state combined forces (army and police) took over the three main roads and only vehicular access that merge in the Veinte de Julio neighborhood Church. The army used Blackhawk helicopters as air support to complement those forces to flank the Milicia snipers located on the terraces and high visibility points.
Figure 72 Operación Orión, warfare strategy of State Military (red) and AUC combined forces (blue) to control the Independencia neighborhoods 2002 based on news records and on community and police members recollections.

On the ground tire based tanks (tanketas) were used at the forefront to break the barricades made with cars, sandbags and oil barrels filled with sand that the Milicias had placed at junction of the three streets. The Bloque Cacique Nutibara BCN (urban branch of the AUC) forces maintained control of the mountains and used their rural side as place to judge and execute (illegally) the alleged members of the Milicias while the military and police forces took control over the territory block by block house by house. The road to each of the neighborhoods were the key military targets (see dark red small arrows in Figure 72).

The key lesson here from this military operation that has similar characteristic to others in other informal settlements in Latin America (Rocinha and Complexo do Alemão in Rio de Janeiro) is that of how access roads play a fundamental role in achieving the goal of controlling the neighborhood. Here the military force needed to conquer such spaces was disproportionate when compared to the number of illegal armed members: the ratio here was 10 to 1 (see Chapter IV for more details on the 'Operación Orión'). Even after having tanks, helicopters, all police and military personal at their disposal, the state allied with another NSAG as the BCN to conquer Comuna 13. This demonstrates how location provided a strategic advantage that needed an overwhelming force to balance the confrontation and secure a "win."
Many observers assume that by introducing more policing into informal settlements, an improvement in security can be achieved. As part of the policy of security in Medellín, especially in Comuna 13 following the military operations that culminated on the Operación Orión, series of new security infrastructures were build in the most isolated areas of the Comuna considered among the ones that were controlled by illegal armed actors.

Two of these structures were located in these neighborhoods: one for the national police and the other for the army. The actual impact of the deployment of the physical apparatus of security on this terrain has varied consequences and today is difficult to evaluate as positive. Community members express dissatisfaction about the outcome of the provision of security of such structures within the neighborhoods. Residents cite major complaints of inefficiency and the abuses of some by the security personnel.

As part of this study I was interested on the value of such installations as providers of security and how where the physical location served security perceptions among community members. After interviews with community members I found that those installations in general had failed in their mission to bring lasting security to the neighborhood. Beyond the personal issues, the installations were located in the wrong places, where large structures existed or places were space to build such structures exited. But in
doing so a crucial opportunity was lost, which was to locate state security structures replacing the ‘legacy spaces’ that had been controlled by decades of succession of illegal armed actors. As such they not only lost the opportunity to replace the symbolic aspect of such places but more importantly on take advantage of the strategic locations that the legacy spaces occupied. When plotted on a map the places in which this structures are located, this condition becomes evident. For example in Independencies 2 the military facility, Base Militar T.N. Mario Alonso Villegas Garcia is located on the hill that divides the two watersheds of Independencias 1 and 2. From that perspective it appears that is a good place, on further evaluation it becomes evident that the station is located at the edge of the branches that permit access to the community. This has a profound effect of the efficiency of the facility, making it difficult to access from other points. Actually, this maintains the legacy spaces intact and perpetuates control of illegal armed actors.

The military station at the edge takes a defensive position in which the leverage of positioning security infrastructure is lost. In this case the irony is that the military are in a constant lockdown by the illegal armed actors see Figure 73. To access the military facility personal has to walk on foot passing the area control by “Los del Uno” claim steps on the narrow and sinuous path. While the physical distance is short, less than 100 meters, the isolation makes their actions very ineffective. Still sniper assaults to “Los del Uno” continue and community members get in the middle of that confrontation. Adequate response time is low because of its position at the edge of the tree-like street network, complicated by the geography. Community members express dissatisfaction of the performance of such strategies and in their language express that distance that the security forces had with the community as a community members express “they are always up there” “ellos se mantienen alla arriba.” This distance is not only of action but also a physical one and one that has repercussions on how these structures and their personal perform.
VISIBILITY, IF I SEE YOU, YOU ARE ALREADY DEAD.

In a war the ability to see your adversary before, he can see you is paramount. The invention of the radar technology gave the upper hand to the inferior in numbers British Air Force (RAF) over the more sophisticated and numerous German Luftwaffe in WWII. It was the ability to see the enemy before they arrived to the British coast that determined the victory; Churchill denoted in his famous speech, "Never was so much owed by so many to so few." In Informal settlements, the case is not much different. This advantage is provided by the topography in the case of Medellín that provide a varied a favorable viewpoints from where control over other territories is possible. This topography also introduced another aspect of the visibility over your opponent and is the tridimensional nature of urban warfare complicated by the undulating patterns of the topography that make second floors, terraces and roofs accessible from the ground level (see Figure 75) and the exponential treat that comes out of the addition of every floor.

Look out points are important places to see the movements of your enemy and also to shoot at him. As explain before terraces and hillside viewpoints are used by NSAG during combat to have a strategic advantage. The particular typology of informal settlements lent itself to be appropriated that way. In chapter IV, a member of a gang explained how he used his military training and the location of its post as an advantage to kill members of other gangs' located bellow. In Villatina, the terrace of a community member was used to locate a riffle with that purpose.

As in the case of radar in rural warfare permitted to have knowledge of a more expansive battlefield one that extended beyond the direct field of view. The ability to see the enemy determines the field of action in which the combat happens the dangers of urban warfare is that that distance in which you are aware of the presence of your adversary gets reduced by the conditions of the urban form.
In informal settlements, the narrow nature of streets limit the ability to see the enemy much more than in formal areas of the city (see Figure 76 and Figure 77). At some points, such distance would be as small as an arms length. This condition of field of view creates a tactical nightmare for combatants. Once inside the urban maize make confrontation at close range limits the action of heavy weaponry and long-range ammunition. Like the difficulty of turn 180 degrees quickly with a military rifle in a 3 feet wide street. In urban warfare, this type of closeness of combat condition is linked with more violent encounters between warring groups where fatalities are more common (Glenn 1996). The conditions of time and density play an important role here in how that closeness of combat happens as the neighborhood densified the closeness of combat narrows (see Figure 57). Confrontations happen at closer range, which can lead to more fatal outcomes of confrontation based on what the literature suggests. This increase in violent encounters as the density of development increases in informal settlements is a particular condition of the space that changes strategies in the “slum wars.”
**TERRAIN KNOWLEDGE**

Another feature informal settlements that get introduced into the conflict is the ever-changing nature of the form of the informal neighborhoods. Different to other parts of the city, the urban form in the informal settlement is constantly changing, day to day new buildings and stories and paths are added to the settlements. This rate of change diminishes with time and urban consolidation. In general, it is widely acknowledged that informal settlements are in a state of constant construction and as such, they are a landscape in constant flux in which the knowledge about the actual territory becomes dated and un-precise. In Caracas, for example, maps of the informal settlements did not exist at all. In most areas in Africa mapping of informal settlements is one the key tasks that communities engage in as a way to leverage services from the state in the context of lack of any kind of information about these spaces.

In Medellín, mapping of informal settlements has been maintained over the years and a more precise mapping has been done in the last decade. Today a system that does not discriminate between formal and informal is really helpful as a way to have a better understanding of the urban form of informal settlements. This system works better than those implemented in other cities of the world were legal regulations prohibit that kind of mapping. The Medellín mapping fails to map areas outside of the legal urban perimeter. See Annex 1 for a history of the urban perimeter considerations in the context of informal settlements in Medellín. Those areas are mapped with less consistency. Most-informal settlements in Medellín dwell at the fringe and add some level of imprecision to the mappings of all informal areas. On the other hand, dwellers of IS know very well their terrain and the nuances about how it evolves day to day. The changes that neighbors are making are part of public knowledge, the past, present and future infrastructure projects executed by them are also part of this public knowledge.

The differences here between what the communities know about the terrain and what the state or outsider forces know about the territory are important strategic advantages at the moment of confrontation. In an interview with a security analyst of the Comuna 13, she explained to me the gang territories that field researchers had mapped, after four years of working in the Comuna (her office is inside Comuna 13), excluded certain key sites and territory that they had not yet been able to visit for fear of illegal armed groups. "No, I have not gone there because of security..." (747) In contrast, community members explained to me small openings between buildings of less than a foot that, "the muchachos [referring to gang members] know every single crevice and when they are followed they take advantage of that." Pointing at the small crevice the community member commented: "look they get in there and from there the get to the other side (of the block)" (755). These characteristics of the informal terrain and the lack of up-to-date knowledge (battlespace) result in large disadvantages to state security forces (police and army) during combats in informal settlements, and is that discrepancy what is use as leverage by illegal armed actors as a strategy during combat.
Here I argue that IS public-private flexible relationship creates two very different versions of what the battlespace is for the local forces and for foreign forces. That is why they deploy different battle strategies. The nature of the space and that relationship between the private and public that gives strategic advantages to NSAG when confronting state forces.

The immediacy of the public and private sphere is one of those conditions that are part of the life on an informal settlement. Scarcity of space is so that the threshold between what is a private in the residence and what is public on the street is negotiated at all times. Door thresholds become living rooms, open doors connect private and public spaces in ways that link them in more intimate ways than exist in the formal neighborhoods. The public space then extends into the realm of the private, the wall that divides the street from the house becomes an important membrane that defines the levels of intimacy that are possible. James Holston in his "Autoconstruction in Working-Class Brazil" dedicates a section to the unpacking of the symbolic value of the front of the house in auto constructed neighborhoods. He focuses on explaining why the front (façade) of the houses had better finishes than the rest of the unit even when doing so compromises individuals’ quality of life. The concluding experience in Holston’s argument is that the façade, more than anything, becomes a communicative experience that filters that relationship between the public and the private, between the individuals and the collective. The value of how others perceive the place you live is important in establishing your place within the community. This condition also can be say for formal and informal neighborhoods alike. In the United States how your lawn looks has a similar connotation. The manicuring of landscape fills a communicative relationship more than a spatial one, since very little activity happens here compared to, for example, the backyard.

What it is different is that in informal settlements, it is the distance between the public and the private given the precariousness and scarcity of the public space is closer and more flexible. This plays large importance at moments of violent conflict. At moments of confrontation, the flexibility and ambiguity of the relationship between the private and the public permits illegal armed actors to cross this boundary easily, both in physical and social ways, from the use of the space of the private as an impromptu physical public strategic corridor, to the extension of the social regulations that are exerted in the public realm all the way into most intimate spaces. As such, illegal armed actors’ control goes from the plaza to the bedroom. In the neighborhood El Triunfo, that flexibility permitted the muchachos (gang members) to use the house of one interviewee on a daily basis to meet. At some point, carving the non-paved soil to hide guns, ammunition and drugs. To the “surprise” of the community member the day that a police raid her house and found the hidden bounty. She went to jail where she was labelled as co-conspirator and became “alias la cucha.” The vouching of many members of the community and a director a state agency served as proof that explained her permissiveness of the actions of the gang members in her

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18 Cucha in Medellín refers to an elder it could be an endearing term of affection or depending on the context a pejorative term that denotes the advance age of the female.
house. To my question on why she allowed them to use her living room, she responded with a look and the shrinking of her shoulders as to explain to me the hopelessness of the situation.

The quality of the front door determines the degree of connection between inside and outside. Having a strong metal door is a must in these neighborhoods to prevent against theft. Wooden and fragile doors are replaced along with the construction of the first solid floor during the second stage of informal settlement development. However no door, no matter how strong it is, can resist the desperate knowing of a gang member being persecuted by his foe. An interviewee commented on a situation when the police had a raid on the block and a gang member came to her door and called for help. Living with the consequences of not opening the door and house to the member of the gang is something the family cannot afford. They open the door and let him come in. Hidden under the bed the family waited for the police to arrive to their house but they never did.

![Figure 78: "Waking thru walls" diagram of the IDF strategy of movement during the attack to the city of Nablus, April 2002 diagram: OTRI, 2004. (Weizman 2007, 189)](image)

This issue of flexible barrier between the public and the private does expands the battlefield options for the NSAG members while making it more complex to control for state forces. The inverting the rules of what is public and what is private has profound implications on combat defense and attack strategy. Eyal Weizman in his essay “walking thru walls” (Weizman 2006b) explains the Israeli Defense Force’s (IDF) new urban tactic to move troops in Palestinian control settlements during the taking of the city of Nablus in April 2002. As public space becomes dangerous for troops, result of the coalitions of those elements here explained; low visibility, the tridimensionality of the urban space exaggerated by the narrow dimensions of the streets, the alternative becomes to move thru the private space away from the view of those that control the public space.

Weizman explains that the troops “...moved horizontally through walls and vertically through ceilings and floors. This form of movement, described by the military as ‘infestation’, sought to redefine inside as outside, and domestic interiors as thoroughfares. The IDF’s strategy of ‘walking through walls’ involved a conception of the city as not just the site but also the very medium of warfare — a flexible, almost liquid medium that is forever contingent and in flux.” (Weizman 2006c, 53)
FIGURE 79. THIS DIAGRAM ILLUSTRATES THE STORY OF A COMMUNITY MEMBER IN VILLATINA. A PARTICULAR CONDITION IN WHICH THIS FLEXIBILITY OF PRIVATE PUBLIC IS EVIDENT IN WAYS THAT PERMIT ILLEGAL ARMED ACTORS TO MOVE IN MORE COVERT AND FLUID WAYS THAT EXTERNAL ARMED (LEGAL OR ILLEGAL) ACTORS. THE WHITE LINE REPRESENTS INTRUSION BY POLICE AND THE RED LINE REPRESENTS A ROUTE OF ESCAPE THAT TRANSVERSES THE INTERIOR OF A HOUSE AND SEVERAL BACKYARDS UNTIL ARRIVING TO A CONTROLLED RESIDENCE THAT SERVE AS A POINT TO ESCAPE TO THE STREET.

This inversion of public and private as an urban warfare strategy gets a counterpart in the informal settlements. Here the local NSAG do not need to make holes on the walls. But the permeability of the informal space permits access to the interior of houses and the uses of backyards, terraces patios; creates mobility corridors at moments of violent conflict. In an interview with a community member in the neighborhood of Villatina, he explained this kind of permeability of the conflict he presented how his house served as corridor of access and escape route for gang members during times of conflict he explains that:

"They come to the house and through the window they got out to the backyard, from there if you continue walking, you get to one of their houses where they store their weapons. Or from there they can escape to the other street or through other houses" (710)
The case in Villatina and in el Triunfo is not unique. Figure 80, maps the differences of perception of the battlespace in which the conflict happens. The large discrepancies between the two areas (up to a 100% more area) demonstrate how the social control of gangs impact the actual space in which the conflict happens. Here what is important to show is that the limits of public space as battlespace are very different from what the foreign armed actors perceive they are attacking. That perceptual difference permits a larger mobility to local actors that goes beyond our understanding of those limits between public and private. And this flexibility, common in these types of informal neighborhoods, provides incredible leverage to the local armies to move, escape and attack foreign forces. This can explain how low numbers and badly trained gang members have such capacity in terms of combat to control and defeat more numerous and trained forces, such as the state and military forces.

**FINAL COMMENTS**

This chapter has analyzed some of the features of the physical space of informal settlements in Medellin that are key to understanding its role in the production and reproduction of conflict in these areas. It also
has placed these features in the context of strategies used by the actors who participate in conflict in these spaces, to demonstrate the relationship between the urban form and the military strategy. The goal here has not been to establish judgment about them, but merely to provide a description of those features and how they play a role during moments of algid conflict. The final and concluding chapter is dedicate policy and physical recommendations that can assist governments and communities in their fight against the control of non-state armed actors and how after the combat, they can re-infiltrate the spaces of the neighborhood without being seen by the police.
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLÍN, COLOMBIA (1970s-2013)
CONCLUSION, POLICY IMPLICATIONS AND FUTURE RESEARCH.

This section reflects the findings of research presented in Chapter V and summarized in chapter VI to presents policy recommendations for cities that confront challenges of informal urban development in the context of weak states and non-symmetrical military confrontations. Finally, this chapter also identifies areas that require future research.

First, this dissertation argues that physical space plays a fundamental role in the way armed conflict happens at the core of informal settlements. Moreover, physical space does so in several distinct ways that involve all actors of the conflict. Most important here to understand is the way physical space impacts perverse groups' decision-making and actions over time. Perverse groups here include non-state (usually illegal) armed actors, such as gang members, paramilitaries, drug lords and guerrilla members. Specifically, this research reveals ways that perverse groups carefully consider the way physical space operates when they consider all options in the city to choose their terrain for urban operations. Informal settlements offer specific advantages that facilitate the economic and strategic objectives of these perverse groups. Second, this dissertation argues that the informal spatial conditions found in these neighborhoods tailor conflict in ways that favor the illegal (perverse) groups. Third, I argue that the way that urban space is seen and understood by each actor of the conflict, in turn permits each one to deploy and incorporate informal space into their battle strategies. These strategies are fundamentally different from those of the formal city. They are the result of the incremental growth process that creates different stages of development with particular forms of resilience and conflict.

In this last section of this dissertation, I present a series of policy recommendations that come out of the research. Those policy (and project) recommendations I divide into two scales: one that deals with acceptance instead of the rejection of informal settlements and other that deals with enhancing city and neighborhood security.

In general this research suggests that radical changes need to be done to the way policy and urban projects are framed in the context of informality. This horizontal study of informal settlements in Medellin has provided a clear distinction in terms of how informal settlements evolution can be divided into three distinct stages. Today, there is no policy that deals with poor neighborhoods in conditions of urban informality that distinguish between these different stages. A single policy approach to all informal settlements, regardless of its age (and thus, stage) misses important formal issues and social differences that greatly influence the impact and outcome of these policies.

Regarding nations with weak states in which criminal armed groups act in the urban informal settlements, this project makes a concrete suggestion: there must be a policy of state support for early informal settlers that provides continuous state presence and resource infrastructure to its social networks. This, I argue, could provide better (less violent and ongoing poverty) results in the long run than having to later make large expenditures of money, time and people to take on asymmetrical warfare.
to reclaim the neighborhood. Obviously, this would require planning for informal settlements to be built (as they are being built), rather than the state first looking the other way and then actively and violently fighting the problem.

Finally, I devote a section to a reflection on the limitations of this current study to provide generalizations and to what this study inspires in terms of future areas of research.
CONCLUSIONS, SPACE AND CONFLICT IN INFORMAL AREAS.

Informal settlements are a staple of the landscape of Latin American cities. Even with increased economic gain as a measure of income per capita in new emerging countries like Brazil, there is no evidence that urban informality will disappear. This continued growth demonstrates that current policies that control growth of informal settlements in cities are ineffective. The United Nations estimates that by the year 2050, a third of the world population (around 3 billion people) will live in informal settlements. There is a need for new approaches that prepare cities for these populations.

In general here there are five important conclusions that this research brings to the issues of informal and urban conflict:

1. Physical space plays an important role in the conflict in informal settlements (IS). The way informal settlements develop permits particular forms of violence.

2. This research provides a framework to understand informal settlements as a process: A predictable and almost normative series of stages of informal urban development.

3. There is a close relation between local gangs and the spaces that they occupy. Modifying these spaces modifies the conflict.

4. Social networks (criminal and not) evolve over time they fragment and specialize in informal settlements. These changes in social composition happen as a result of the densification nature of informal settlements. That is, as population grows; social networks evolve both for community members in general and for the members of the perverse organizations who live within informal settlements.

5. Viewing the informal settlement as a “battlespaces” makes where and how to intervene physically of utmost importance.

PHYSICAL SPACE & ITS IMPORTANT ROLE IN THE CONFLICT IN INFORMAL SETTLEMENTS (IS).

Violence in Informal settlements is very different to the violence experienced in other areas of the city. Lack of state presence and the physical urban environment qualities permit an easier territorial control by perverse actors such as gangs and other NSAG. The way informal settlements develop both physically and socially permits these specific forms of violence. Narrow streets, high population and urban form density and physical isolation (from state and official infrastructural and security resources) are physical features that favor gang control, and that puts state military forces at a disadvantage. In general, the specific qualities of the physical space enhance social marginality. This presents advantages for perverse actors to control the territory.

Interventions that deal with those social and physical structural issues of marginalization help communities to be able to protect against perverse actors. Projects and policies that deal in a consistent
matter with those issues of physical and social marginality are a must to improve security and quality of life conditions in informal settlements.

A FRAMEWORK TO UNDERSTAND INFORMAL SETTLEMENTS AS A PROCESS

This research has provided evidence of a prescriptive model of informal settlements development in stages. It provides qualitative and quantitative data that describe that process. There is sufficient evidence in the literature that this framework can be mapped in most informal settlements in the world.

This research has placed significant importance on understanding informal settlements as a process of city building. It has identified three distinct stages of informal settlement development: Stage 1 Foundation; Stage 2 Infill and Stage 3 Consolidation. These stages represent different urban forms, spatial characteristics and densities (stage 1: 2 to 30 Unit/Hec, stage 2: 100 to 200 Unit/Hec and stage 3 200 to 400 Unit/Hec). Moreover, different scales of urban conflict (Stage 1: single criminals, Stage 2: low level gangs and Stage 3: gangs affiliated with local, national and international organized crime).

Table 8. Stages of informal development urban density and scales of conflict

<table>
<thead>
<tr>
<th>STAGE 1</th>
<th>STAGE 2</th>
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<tr>
<td>FOUNDATION</td>
<td>INFILL</td>
<td>CONSOLIDATION</td>
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<td>URBAN DENSITIES</td>
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Scales of Urban Conflict:

- Single criminals
- Low level gangs
- Gangs affiliated with local, national and international organized crime

Furthermore, understanding urban informality in terms of these three Stages then reveals the different opportunities and challenges present at every stage in terms of urban development and security (see table 1). Thinking of informal areas as in the process of city building, implies policies need to be tailored to intervene in different ways at different stages of development. This urban informality-in-stages frame implicitly exposes why blanket policies toward informal areas are so ineffective and opens the doors for a new vision to understanding and intervening in areas of informality. It permits us to look at informal areas today and forecast important inflexion points in the future. The ability to predict the future of these informal settlements is key for planning in cities with large and ongoing growth as a result of urban informality. This type of framework can permit new ways to plan and intervene in informal settlements. It also can help to rethink much of the social science research to date that does not account for the incredible changes in the social organizations and urban density that these areas suffer over time.
CLOSE RELATION BETWEEN LOCAL GANGS AND THE SPACES THAT THEY OCCUPY.
In the Medellin case it is clearly visible that local gangs persist for longer periods of time than their larger organized crime group counterparts, what is called here the franchises of crime. These franchises of crime control criminal networks at the scale of the city, nation or international scale. The longevity difference exists because of the spatial conditions at the core of informal settlements. This research argues that the spatial conditions permit small and badly trained groups to control local territories. Even if most members of a gang are killed (or apprehended), a new gang will form out of what it was left using the space as a support framework for its continuation over time. Specific spaces permit these gangs that depend on the turf qualities of physical space to control territory. The space-gang relationship is not a causation argument; it is a matter of warfare strategy and it explains the complex role that space plays in a violent conflict.

This finding has large repercussions on how security policy should be applied at the national and the local scale. At the national scale, this explains the real value of the franchises of crime, such as NSAG. Specifically, at the urban scale, these franchises support the conflict economically, but outsource their violence to the local gangs. Dealing just with the large franchises left the small groups ready to be absorbed by other large organizations. This finding helps to explain why single peace accords with larger franchises do little to change security conditions in the neighborhoods where the violent conflict happens. Local gangs change affiliation often, the resilient structure depends as much on the structural social inequalities that lead youth to crime as it does on the spatial conditions that make the exercise of territorial control possible. At the local scale, this finding of the role of space in conflict is important in terms of creating spatial policy, particularly how to modify space in ways that remove the leverage from those local gangs.

SOCIAL NETWORKS (CRIMINAL AND NOT) EVOLVE OVER TIME: THEY FRAGMENT AND SPECIALIZE IN INFORMAL SETTLEMENTS.
This research maps the process of community groups’ fragmentation and specialization over time. It maps that their evolution from a single tightly cohesive group able to challenge the state and perverse groups to that of a multiplicity of organizations with distinct motivations from legal to illegal in which the distinct organizations are easily coopted by perverse, violent groups. The process that local organizations follow, from single-oriented community group to fragmented myriad of specialized organizations, is mirrored by a similar process for the perverse organizations. This mirroring process is the result of urban densification of informal settlements.

Regardless of the kind of official state policy and projects regarding these neighborhoods and the people in them, these informal settlement community group networks have important repercussions on the future of security in these areas. As community organizations fragment and specialize, they also lose their strength to fight back against the criminal organizations evolving in those areas. Supporting positive (non criminal and non violent) organizations that can challenge criminal networks should be a goal to create sustainable security. This goal and consequence also explains why it is so common for criminal organizations to co-op community organizations in informal settlements. Viewing it this way also helps us
to see at what moments and scales we expected community group fragmentation and criminal network cooptation of them to happen. This then supports my argument that strong, unified social network can have better benefits toward security than large expenditures on security.

**WHEN INFORMAL SETTLEMENTS ARE UNDERSTOOD AS "BATTLESPACES" WHERE AND HOW TO INTERVENE PHYSICALLY IS OF UTMOST IMPORTANCE**

In this research, informal settlements are shown at times as actual "Battlespaces" in which "slum wars" are fought. The space result of that process of informal settlement formation gives those territories and the NSAG that take siege core strategical advantages when confronting state security forces (police and army). Space plays an important role in how the conflict develops. Changing the space then change the nature of the conflict. Urban projects, which by nature are about changing the space in these areas, in turn modify the conflict. Moreover, these interventions have the possibility of improving the living and security conditions of inhabitants, by creating a safer environment that cannot easily be co-opted by criminal actors. Thus, a strategic perspective on how and where to intervene is important to improve conditions of security.
POLICY RECOMMENDATIONS

I argue that policies that assume informality as a normal (rather than criminal) process of city building can provide better tools to manage growth and better ways to anticipate future needs and security of these Latin American cities.

A tacit acceptance of urban informality by state regulators is already in practice, through regularization programs. For example, public service provision to informal areas, amnesty programs are part of some of the pro-poor state policies applied across borders in Latin America (and other regions) in these areas. However, most of these policies are intended as a way to by-pass current regulation that promotes evictions, public services disconnection, and penalization of violations of the urban code. This process of penalization and support generate the bi-polar behavior of the state as both the most dangerous and violent actor for informal settlements at their foundational stage and on the other hand the one that provides the largest level of products and services that improve the quality of life in these areas at the consolidation stage. This bi-polar behavior of state regulations transfers to the institutional and the state scale. Police forces are used to evict people, dismantle and burn homes and also to run sports tournaments, provide civic education. Police forces are presented (by the state) as a pacifying force in informal settlements. Planning officials are helping with regularization, urban upgrading programs, and water and infrastructure provision and also painting numbers on houses stayed for demolition.

These state actions are the product of different organizations trying to claim the land from urban informal areas and often show a disregard for the needs of the communities. This conflict creates a distance of communities from the state and from the state to those informal areas that were not able to evict. This context of state absence is one the most mentioned causes among interviewees of why illegal armed actors control informal territories. This research finds that in that context of marginalization of informal dwellers, the physical and social conditions of informal settlements produce space for particular forms of violence. In the context of states with the presence of NSAG, these spaces present social and physical strategic advantages to contest the state. Those physical conditions permit larger leverage to NSAG in the asymmetric conflict during these called “Slum Wars” (Rodgers D. 2009).

A structural change of state policies toward informal dwellers would permit the state (local and national), a larger leverage into claiming sovereignty over territories that it clearly does not control. A pro-informality process of urban planning in cities with a large number of informal dwellers will give government officials the tools to plan in advance the areas that it would need to service in the future. It would permit the re-direction of new populations to areas where service (transport, water, sewer) can be provided at a lower cost for the companies, which in the end would be providing such service. These proactive actions and thinking would not cost more than the current urban practices to alleviate urban poverty and in the long run would result in social and economic benefits for formal and informal communities alike.

A pro informality planning policy possible, structural changes to national housing urban policy would be required. A state of exemption could be applied to urban regions where large numbers of poor populations are newly arriving and/or who have lived through periods of time that encompasses the
entire migration series of waves spanning decades. That state of exemption would permit municipalities to bypass current urban policies. It would help with litigation from rightful landowners and permit access to funds to compensate those whose land has been appropriated. This exemption would be based on the long run benefits of providing space for future citizens and fast-tracking the process of informal urbanization in ways that helps the social and economic future of the entire region.

In concrete, the following are policy suggestions that emerge from this research. Specifically here I argue that two types of policies are necessary to engage in a more realist way with the informal settlements in the context of Latin America poverty and urban conflict. The first one would require a new framework to deal with urban informality in a more pro-informal development approach. The new approach would mean (1) Acceptance instead of the rejection of informal settlements, that in the long run provide social economic benefits, but that in specific ways bypass the opportunity to create spaces for the proliferation of NSAG within these areas. (2) The second series of policies focus on enhancing city and neighborhood security. Each one of these two types of policies would have specific actions at the identified stages of development.

**Acceptance instead of the rejection of informal settlements**

City planning requires a new way of thinking about informality in urban areas and must accept urban informality as one of the types of urbanization. As informality becomes the most-prolific form of urbanization, we need new tools to deal with these issues of quality of life. The denial of informality as a form or urbanization has not stopped its growth in the 100+ years of attack against this type of urban form by proponents of the formal, modern city.

Informality planning would require it to become part of the plan of the cities prone to this form of development. Resources expended in evictions and relocation is costly and largely ineffective. Municipalities spend large amounts of money and political capital forcibly evicting informal dwellers. In the neighborhood of Moravia, for example, the state expelled and demolished a single family home twenty times. Rebuilding your home nineteen times create impacts on the expenditures on poor families that hamper their future and, by extension, the future of their entire community. Instead, those scarce resources of the state and the urban poor should be focused on the planning and the provision of housing, land and services.

The first years of informal settlement are shown here as key in the production of urban space and the creation of community social ties, what I call here Stage 1: Foundation. At this stage, community ties are key to making communities succeed in claiming their rights to land. This process creates a very cohesive community group that takes on governance and management roles in the absence of those roles being played by the city. This tight group provides services and infrastructure that parallel and challenge the rules and regulations that the state is supposed to enforce and provide. The conditions necessary for communities to succeed to claim land also places the community at odds with state. Moreover, it is at this stage that state and community relationships are severed. It takes years or decades for the state to provide its services. In that time, the cohesive nature of community social organizations in informal settlements are weakened by the complexity of demographic growth (around 1000%). This hampers community organizing capacity and its ability to provide community security.
In this foundational stage, most physical features of the informal settlements are seeded: streets, public spaces and private areas are defined. This is also the stage where changes and interventions require less effort by state or community. Houses are built of very light materials and changes to the urban form, like the re-lining of the streets, can be easily made. During the funding years of the neighborhood Independencies 2 in Medellin, community members organized to relocate homes to provide space for streets at very low cost. On the contrary, this is the stage were the state is more absent and thus this absence is a costly mistake. Infrastructure projects that will be low cost become large enterprises at later stages of development. Thus, the cost of urban projects increases exponentially as the informal settlement consolidates. Positive interventions at the foundational stage (Stage 1), can provide incredible benefits for communities and the rest of the city.

Some of those policies of acceptance of informal settlements as a form of urban development could focus on the following:

STAGE 1 FOUNDATION

- **Instead of future upgrading policies, a co-production of space policy** can produce, at low cost, enduring and significant improvements with short- and long-term effects. However, the ability of settlers to locate and design and build their dwellings, spaces and paths need to be preserved since the state does not have sufficient resources to construct the neighborhoods. Scarce state resources should be applied where they are most effective and needed. Needs are probably best determined by the settlers themselves. Plans that involve imposition of formal models from the outside are not appropriate in this situation.

- **Support informal settlements foundations and state presence over the life span of the settlement.** Successful Informal settlement foundation requires the community organization against state and the regulations that protect property rights. As such, it implies a severing of the relationship between communities and state. This severing of ties with the state creates state vacuums that are filled by criminal organizations (NSAG), which then fulfill state functions as security and justice without the check and balances of the state, which tends to end in abuses from those organizations. This is a situation that Chapter IV shows recurring over decades. A pro-informal development policy would create simple, effective, and long lasting channels of communications between communities and the state. These channels should be implemented early on in the formation of informal settlements to create synergies between state and community that create leverage against NSAG. Moreover, as the neighborhood grows, the type of governance structures needed also to improve to cope with the new challenges that growth and security will present in the future.

- **Dismantle policies that criminalize informal dwellers.** It is still possible to criminalize informal developers, but not the communities who live in these areas. Community members cannot be called and treated as criminals and then expect that they will not ally with other criminalized groups.

- **Establish a planning group dedicated only to the planning of new (and future) informal neighborhoods.** The goal of all the previous policies recommendations I offer here is to incorporate the inevitability of informal settlements into municipal planning practices. Cities need to create teams that present
alternatives to work alongside with existing communities of urban informal development. This team should assist communities in formation to connect the planning of their neighborhood with the city planning, using realistic (from the point of view of the community) expectations. For legal reasons and operative ones, this group could be funded by state sources but should dwell outside of the state bureaucratic process. It could be an NGO or a private company. Examples of private companies planning informal settlement development can be found in urban upgrading practices in Latin America, such as the EDU in Medellin (a public, private company), and the architecture offices that planned the PAC, Morar Carioca and the Favela Bairro in Rio de Janeiro.

Stages 2 and 3
- **Urban Upgrading Projects UPP.** This provides, when applied correctly, significant improvements on not only the quality of life of informal dwellers, but can also have high levels of perceptual changes on the conditions of conflict. There are important recommendations of how urban upgrading can be implemented to improve conditions of security. The recent history of urban upgrading in Medellin has demonstrated that large improvements can be achieved from this type of intervention. Urban upgrading projects that invest in transportation infrastructure, public buildings and public space are more effective when public projects and well-designed public areas create secure spaces that are not easily coopted by illegal armed actors. Mappings of existing criminal networks should be used to station projects that create safe networks, and that remove illegal armed actors’ control over key territories (legacy spaces).

- **Today upgrading practices are very top-down; a more balanced participation method is needed.** Top-down practices have negative effects on the capacity of community organizations. UPPs have been, in general, a top-down approach that uses foreign modern design and development models that are inappropriate to the area because they are not derived from the residents’ needs, capabilities or the geographic context. After implementation of upgrading practices in Medellin, informal communities, community organized projects “convites” disappear and with them the value of the social organizations that help to support them. The synergies that can happen at the community level at this stage are crucial to the development of not only co-produced space but as a tool to generate state—community coalitions against NSAG. Those moments of state intervention beyond infrastructure provision should be used for civil society support and to develop long lasting relationships between community organizations and the state.

For example, during the PUI in Medellin, a social team dealt with the communication with the community. This group trained a series of community members who would serve as the conduits to the rest of the community and that along with older social organization would call the community to participate at important thresholds, such as the workshops to suggest ideas for future projects (in Medellin called imaginarios). This network was effective in communicating with the social teams’ issues that were beyond the scope of the UUP, including issues of security. Also, social workers through their respective connections and expertise would help community organizations and individuals link with other state-sponsored projects. They, in short were a key institution that
presented a positive face of the municipality (supported by the physical projects that were improving the community), and social force that supported communitarian initiatives. Shortly after the delivery of each project, these teams were dismantled or moved to other areas. The social capital in them created and maintained over the years of the PUI was then lost. A support system like this would, over the years, understand the unique challenges of community groups and accordingly link those with projects and institutions that could support specific needs at important moments.

- To be able to plan it is important to know the territory. As explained here, informal settlements mapping is at best a dated material. In most of the cases, it is a non-existing feature within municipalities. Consistent and constant mapping of informal settlements is important for planning and intervening in informal settlement communities, but it is also important to know the terrain in which conflict happens. One of the features that permit NSAG located in informal settlements to have leverage in their asymmetric conflict is their better terrain knowledge. A system of constant mapping is needed in these areas to understand how they are changing and to then know what kind of strategies are needed in the future.

**Enhancing City and Neighborhood Security**
The second series of policies are guided toward enhancing city and neighborhood security. In this research, there has been evidence that separates early founded informal settlements from consolidated ones, in terms of security. This research has found that in the founding years, communities appear to be more resilient to the effects of criminal actions by armed groups. Their social organizations are tighter and conversely criminal organizations are more fragile, because the number of individuals who can participate in organized crime is smaller, so as not been able to associate in large numbers against a community group that is tight.

**At the foundational stage** informal settlements are more distant from the state than in any of the other two phases of informal development. The damaging effects of state attacks to communities by then have increased the distance between the state and the communities. Sentiments of justified mistrust originate at this point. It is this distance from the state that illegal armed actors need when they are looking for a place to reside. This distance creates spaces (physical and social) for the introduction of such actors, especially in countries where a large national portion of the budget is expended to counteract the effects of illegal armed actors, as is the case in Colombia, where 19% of the national budget in 2013 was spent on security (Carranza Garzón 2012). Expending resources on attacking and destroying the housing of the informal poor produces negative effects on the security front. Establishing policies that create early connections between state and communities is fundamental to avoid the state vacuums that can be opportunity sites for illegal actors to control. Protecting the key social organizations and social capital that are created at this initial stage is fundamental to preserving the tight social network and to provide a more secure future.

A different set of policies are needed for neighborhoods at the **later stages of informal development (Infill and Consolidation)** when the conditions of conflict are more severely felt. While many variables
contribute to conflict in poor areas, the way informal settlement develops in later stages contribute to NSAG to control and limits the effectiveness of state forces.

Following are policies that focus on the interaction of space and conflict. These policies distinguish between those two different moments of informal development with the goal of increase security:

STAGE 1
- **Stop the use of police forces for destroying informal settlements.** In interviews, foundational stories are always full of confrontations with police forces and with the painful accounts of how police or army forces were used to destroy, attack, and prosecute informal dwellers. It is not possible then for a community to trust in the police, a challenging feature in Latin America, if the police fulfill role both as foe and savior.

- **At this early stage, immediate security support should be provided.** Guarantying an initial secure context will lessen the distance between state and community and maintain perverse actors at bay.

OTHER STAGES (2 AND 3)
- **Identification and elimination of ‘greyspaces’**. Greyspaces are those territories that are not developed within informal settlements and that are not protected by institutions or any group andm thus, are used by perverse actors to deploy violence. It is important to introduce a new type of programming to areas identified as greyspaces. Community input is fundamental to identify such places and also for suggesting the type of programing that can happen there to erase the social meaning of such spaces. It is also important to follow the recommendation of Chapter VI on how playgrounds are not the most-effective solution for the eradication of greyspaces. In general, these are key spaces that present the opportunity in which state infrastructure can be placed in these neighborhoods, as in the case of the ‘Parques Bibliotecas’ in Medellin.

- **Public space and security.** Evaluate the security aspects of all public spaces in the informal settlements, provide upgrades following the recommendations point out in Chapter VI, in which public space is only secure if supported by public infrastructure and interconnected with other public and private interventions that create a sense of a secure, safe space where community members can meet away from the control of NSAG. Isolated interventions can easily be coopted within turf areas.

- **Improve access to informal neighborhoods.** The lack of easy access to and communication with the rest of the city is a key component that provides the opportunity for illegal armed actors to control who enters and leaves the conquered areas. Breaking tree-like street networks by providing new streets and paths that multiply the number of access, removes leverage of armed actors to control such spaces. It is important to create clear metrics to evaluate the level of accessibility of Informal settlements. These metric would make it possible to determine which levels of accessibility give leverage to illegal armed actors to control neighborhood areas. Further study on the subject is necessary. Along with these metrics, community narratives can help to identify the lack of
accessibility or the places that are key nodes in the urban structure and that are used historically (as shown in several narratives here) as places of control.

- **Spatial mapping of armed groups.** Police and security organizations in Medellin are producing their versions of illegal armed actors’ mappings with a varied level of precision. These maps sitting and gathering dust in the privacy of an office are of little use in preventing crime. The secrecy of this security tools are such that many times the maps are kept private from the security officers who could use them as tools to prevent conflict and crime. I argue that these mappings should be released to the public. The secrecy of this type of security information is a disservice to urban security. Tentative mappings of gangs can be shown to the public and could be updated and corrected in real time using crowd-sourced techniques. Better mapping would create better security strategies. I found that many of the personnel who manipulated the mapping of security were not well trained or had the tools to manage or maintain these types of maps. This situation leads to imprecision of the security organizations mappings. A police lock down based on an imprecise map is not an effective tool for security.

Following that idea of the mappings, it is not only the actors who should be mapped, but also their areas of action and conflict. Invisible borders ‘fronteras invisibles’ should be mapped. Today in Medellin, the official rhetoric of security it is that they (invisible borders) do not exist, but it is clear in my interviews and fieldwork that they are still present in the imaginary of community members and that there are still violent events (including the death of children) that are the result of the violation of those boundaries by community members. The security mappings should not be left to the municipality because it can be easy coopted by the political interest of any current administration. Secrecy and disinformation only serve to make it more difficult to use security resources in a more effective way, and this in turn, produces larger levels of insecurity.
FUTURE AREAS OF RESEARCH
The following are three dimensions and reasons for future research that I identified as part of this dissertation. I seek to (1) understand the limitations of this project’s current research, such as the limits of the research sample in turn limits our ability to generalize certain findings. (2) I also identify key areas where new data is needed and (3) identify what this study inspires in terms of new paths of research.

This research project selected the city of Medellin as a case. That is, a city that in terms of violence and informality, presents a very unique phenomena. This in turn, presents problems of generalizability of these research findings. Medellin is a city with some of the largest records of urban drug-related conflict in Latin America and a city with large levels of urban informality. Those conditions made it a perfect candidate to study relationships between conflict and urban space. However, it is also that condition that present problems of generalizations about the findings of the Medellin case. Data from other geographies is needed to check some of the findings of this research. A cross-city study can test the main variables of urban change and density along with conflict. In that order of ideas, there are two scales in which a cross-city study should focus. One is on Latin American and Caribbean cities. And other, that takes a more global perspective, that find similarities between different regions (Asia, Africa and Latin America) with informality and conflict.

I have divided what I recommend as futures areas of research into two overarching sections: the study of urban conflict and urban development in relationship with informal settlements.

CONFLICT
Most literature on violence focuses on large franchises of crime. The longitudinal study that this research presents shows that at the local and territorial scale of the neighborhoods, not the large franchises, is where violence occurs. Thus, the small gangs are a more important actor of violence than those in the large franchises (Milicias, Paramilitars and Drug Lords). The larger franchises later on come and go, but those small gang organizations mutate over time and reproduce violence over decades in the same places. We need to focus more research at this scale. This focus of research should help to develop and implement policies in the context of the micro scale of the neighborhood. Alongside a focus on the micro, research should focus on the connections between micro and macro NSAG. In other words, how do large franchises of crime communicate and affect small gang organizations at the scale of the neighborhood?

Levels of urban development in informal settlements reflect levels of violent conflict and cooptation from NSAG. This finding implies that is possible to map and predict where conflict will emerge as a result of changing urban density conditions. But the research sample used here is too small to determine with precision where those breaks happen, that is, when an informal settlement transitions between one stages of development to the next. More data collection is needed to be able to provide accurate mappings of such conditions. Social network mapping of perverse organizations over the life span of informal settlements will help to identify the threshold (tipping point) in which these perverse organizations are strong enough and co-opt the social organizations weakened by exponential population growth.
MAPPING CONFLICT
Mapping of conflict over time is not a standardized practice. Few cities in the world follow any systematic approach to mapping turf areas of perverse actors on an open way. (Chicago is one of the few exceptions.) Most cities that have some mapping, have done it in a private and secretive way. There must exist a standardized way to understand and map gang territories over time and a platform in which information can be shared safely.

Mapping conflict is always a complex endeavor. Not only is conflict data difficult to find, but also the constant interaction between different actors of the conflict (the fight among actors) make current mappings of conflict obsolete within short periods of time. Most of the mappings of conflict of this study are already obsolete by the time these pages go to the printer. By this I mean the specific make up of these gangs by then will have changed. So it is important to develop new ways to collect information safety and in real-time.

INFORMAL SETTLEMENTS
Here in this research emphasis has been placed on understanding urban informality as a process of city building, and not as a pathology. Thinking of informality as a process has produced the three stages of informal settlement development as a predictor of how urban form change over time. Still, there are more measurements needed to narrow down and unpack what that process entails. There is a need to narrow down the exact characteristic of each one of those stages of development. This amount of data of this research has permitted me to create a general picture of the process, but more research and data collection is needed to measure these dimensional changes accurately.

Here Informal Settlements are researched as isolated units within the city—the effects of nearby Informal settlements security conditions were not accounted for. Missing that proximity variable impedes understanding the influence of conflict change by conflict proximity. Instead, here citywide trends of conflict and violence were used to understand changes that follow city trajectories and those that were just effects of the changes within the Informal settlement selected. There is a need to understand the interconnectedness and interdependence of IS with other adjacent IS and how this condition impacts their conditions of security. For example, in El Pinares de Oriente in comuna 8, a six-year-old informal Settlement is reaching Stage 2: Infill Development. This is a neighborhood very close to Villatina and La Sierra, two older informal settlements at Stage 3: Consolidation, a stage that presents larger levels of conflict and cooptation by large franchises of crime in Medellin (Los Urabeños and the Oficina de Envigado). Interviews The Pinares de Oriente in Comuna 8 found that while all individuals confirmed the lack of presence of perverse groups (gangs). However, there were also rumors that one of the franchises of crime (in this case La Oficina de Enviado) was interested in starting a racketing scheme with homes with community gardens. That is because those with such gardens are perceived to have larger incomes than others without vegetable gardens.
This research finds that the accessibility, or the lack of it, is a key component that provides the opportunity for illegal armed actors to easily close and control who enters and who leaves the conquered areas. Tree-like urban street networks provide key nodes (street intersections) that make territories very fragile to territorial cooptation from armed actors. Further research should focus on that condition of the K fragile nodes. It is important to create clear metrics that evaluate the level of accessibility to determine at what level leverage of territorial control switches toward illegal armed actors.
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PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970s-2013)


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PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970s-2013)

Schnittner Castellanos, Patricia., Universidad Pontificia Bolivariana (Medellin), and Colombia Area Metropolitana del Valle del Aburrá (Antioquia. 2007. José Luis Sert Y Colombia : De La Carta de


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<td><strong>Bareque</strong></td>
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<td><strong>BNC</strong></td>
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<td><strong>Comuna</strong></td>
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<td><strong>Estrato</strong></td>
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<td><strong>Fiscalía</strong></td>
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<td><strong>Invasion</strong></td>
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<td><strong>Junta de Acción Comunal</strong></td>
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<tr>
<td><strong>Microtrafico</strong></td>
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<tr>
<td><strong>Oficial</strong></td>
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<td><strong>Papel Fielero</strong></td>
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is very short. Most informal settlements before the 90s were made of such material.

<table>
<thead>
<tr>
<th>Pelao</th>
<th>Medellin vernacular for kid</th>
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<tbody>
<tr>
<td><strong>Plazas de Vicio</strong></td>
<td>Is the territorial space were small quantities of drugs are sold (microtrafico). In the metropolitan area are approximate of 220 plazas de vicio documented by the police.</td>
</tr>
<tr>
<td><strong>Sicarios</strong></td>
<td>Assassins</td>
</tr>
<tr>
<td><strong>Trabuco</strong></td>
<td>Rifle that has been shortened to be easy to carry.</td>
</tr>
<tr>
<td><strong>trabucos</strong></td>
<td>A “trabuco” is a rifle that has been shortened to be easy to carry.</td>
</tr>
<tr>
<td><strong>Tugurios</strong></td>
<td>Fragile homes or slum houses</td>
</tr>
<tr>
<td><strong>Vacuna</strong></td>
<td>Illegal tax change as a security fee or extortion be gangs</td>
</tr>
</tbody>
</table>

Diego Fernando Murillo Bejarano, alias “Don Berna”
## ACRONYMS/ABBREVIATIONS/TERMS

<table>
<thead>
<tr>
<th><strong>SPANISH</strong></th>
<th><strong>ENGLISH</strong></th>
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<tbody>
<tr>
<td><strong>OO.PP.</strong> Secretaria De Obras Publicas</td>
<td></td>
</tr>
<tr>
<td><strong>AM</strong> Area Metropolitana</td>
<td>Metropolitan Area</td>
</tr>
<tr>
<td><strong>AUC</strong> Autodefensas Unidas de Colombia (AUC)</td>
<td></td>
</tr>
<tr>
<td><strong>AUC</strong> Autodefensas Unidas de Colombia</td>
<td></td>
</tr>
<tr>
<td><strong>Bacrim</strong> Bandas emergentes en Colombia or bandas criminales emergentes</td>
<td></td>
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<tr>
<td><strong>BCN</strong> Bloque Cacique Nutibara</td>
<td></td>
</tr>
<tr>
<td><strong>BID</strong> Banco Internacional de Desarrollo</td>
<td>International Development Bank</td>
</tr>
<tr>
<td><strong>BM</strong> Bloque Metro</td>
<td></td>
</tr>
<tr>
<td><strong>BNC</strong> Bloque Cacique Nutibara</td>
<td></td>
</tr>
<tr>
<td><strong>CAI</strong> Centro de Atencion Inmediata</td>
<td>Small police station</td>
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<tr>
<td><strong>CCCC</strong> Consejo Consultivo de Comunas y Corregimientos</td>
<td></td>
</tr>
<tr>
<td><strong>CCC-C</strong> Consejos Consultivos Comunales y Corregimentales (CCC-C)</td>
<td>Consultive councils per comunas and Corregimientos</td>
</tr>
<tr>
<td><strong>CI-2</strong> Centro Integrado de Intervención in Comuna 13</td>
<td></td>
</tr>
<tr>
<td><strong>CODHES</strong> Consultoría para los Derechos Humanos y el Desplazamiento</td>
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<tr>
<td><strong>convivir</strong> Grupos de Vigilancia y Seguridad Privada</td>
<td></td>
</tr>
<tr>
<td><strong>CORVIDE</strong> Corporación de Vivienda y Desarrollo de Medellín</td>
<td>Housing and Social Development Corporation of Medellín</td>
</tr>
<tr>
<td><strong>CORVIDE</strong> Corporación De Vivienda Y Desarrollo</td>
<td></td>
</tr>
<tr>
<td><strong>DANE</strong> Departamento Administrativo Nacional de Estadística</td>
<td></td>
</tr>
<tr>
<td><strong>DAS</strong> Departamento Administrativo de</td>
<td>Colombian version of the FBI</td>
</tr>
<tr>
<td><strong>DDR</strong> Demobilization, Disarmament and Reintegration</td>
<td></td>
</tr>
<tr>
<td><strong>DNP</strong> Departamento Nacional de Planeacion</td>
<td></td>
</tr>
<tr>
<td><strong>EDU</strong> Empresa de Desarrollo Urbano</td>
<td>Urban development company</td>
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<tr>
<td><strong>EE.PP.MM</strong> Empresas Publicas De Medellín</td>
<td></td>
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<tr>
<td>Abbreviation</td>
<td>Term or Definition</td>
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<tr>
<td>EPL</td>
<td>Ejercito Popular de Liberacion</td>
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<tr>
<td>FARC</td>
<td>Fuerzas Armadas Revolucionarios de Colombia, Revolutionary Armed Forces of Colombia</td>
</tr>
<tr>
<td>FOVIMED</td>
<td>Fondo Municipal de Vivienda de Interés Social</td>
</tr>
<tr>
<td>FTO</td>
<td>Foreign Terrorist Organization (DoS designation)</td>
</tr>
<tr>
<td>I.C.T.</td>
<td>Instituto De Crédito Territorial</td>
</tr>
<tr>
<td>ICT</td>
<td>Instituto de Credito territorial, Institute of territorial credit</td>
</tr>
<tr>
<td>ICV</td>
<td>Indice de Calidad de Vida</td>
</tr>
<tr>
<td>IDH</td>
<td>Indice de Desarrollo Humano</td>
</tr>
<tr>
<td>IDP</td>
<td>Internal Displaced Person</td>
</tr>
<tr>
<td>INVAL</td>
<td>Instituto De Valorizacion</td>
</tr>
<tr>
<td>ISI</td>
<td>Import substitution industry</td>
</tr>
<tr>
<td>ISVIMED</td>
<td>Instituto Social de Vivienda y Hábitat De Medellín</td>
</tr>
<tr>
<td>JAC</td>
<td>Junta de Acción Comunal</td>
</tr>
<tr>
<td>JAL</td>
<td>Junta Administradora Local, Local Administration Board (state body)</td>
</tr>
<tr>
<td>M-19</td>
<td>Movimiento Abril de 19, April 19th Movement (guerrilla)</td>
</tr>
<tr>
<td>M-6&amp;7</td>
<td>Milicias 6 y 7 de Noviembre, November 6-7 Militia (urban militia)</td>
</tr>
<tr>
<td>MAS</td>
<td>Muerte a Secuestadores, Death to Kidnappers (death squad)</td>
</tr>
<tr>
<td>METROSALUD</td>
<td>Instituto Metropolitano De Salud</td>
</tr>
<tr>
<td>MoD</td>
<td>Colombian Ministry of Defense</td>
</tr>
<tr>
<td>MPPP</td>
<td>Milicias Populares del Pueblo y para el Pueblo Popular, Militias of the People and for the People (urban militia)</td>
</tr>
<tr>
<td>MPVA</td>
<td>Milicias Populares del Valle de Aburrá, People’s Militias of the Aburrá Valley</td>
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<tr>
<td>NGO</td>
<td>Non-Governmental Organization</td>
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<tr>
<td>NSAG</td>
<td>Non-state Armed Groups</td>
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<tr>
<td>NVC</td>
<td>Núcleos de Vida Ciudadana</td>
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<tr>
<td>PD</td>
<td>Plan de Desarrollo, Development Plan</td>
</tr>
<tr>
<td>PEPES</td>
<td>Perseguidos por Pablo Escobar, People Persecuted by Pablo Escobar (death squad)</td>
</tr>
<tr>
<td>PJL</td>
<td>Peace and Justice Law,</td>
</tr>
<tr>
<td>PNUD</td>
<td>Programa de las Naciones Unidas para el Desarrollo, UNDP United Nations Development Programme</td>
</tr>
<tr>
<td>POT</td>
<td>Plan de Ordenamiento Territorial, General Plan</td>
</tr>
<tr>
<td>PP</td>
<td>Presupuesto Participativo, Participative budget</td>
</tr>
<tr>
<td>PRI-MED</td>
<td>Programa Integral de Mejoramiento de Barrios Informales, Integral Program for the Informal Settlements Improvement of Medellin</td>
</tr>
<tr>
<td>PUI</td>
<td>Proyecto Urbano Integrado, Integrated Urban Project</td>
</tr>
<tr>
<td>Acronym</td>
<td>Description</td>
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<tr>
<td>PUI</td>
<td>Proyecto Urbano Integral</td>
</tr>
<tr>
<td>SENA</td>
<td>Servicio Nacional De Aprendizaje</td>
</tr>
<tr>
<td>SISC</td>
<td>Sistema de Información para la Seguridad y la Convivencia</td>
</tr>
<tr>
<td>SNS</td>
<td>street networks of self-organized urban settlements</td>
</tr>
<tr>
<td>UNA</td>
<td>Urban Network Analysis toolbox for ArcGIS</td>
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<tr>
<td>UNDP</td>
<td>United Nations Development Programme</td>
</tr>
<tr>
<td>UP</td>
<td>Unión Patriótica</td>
</tr>
<tr>
<td>ACPP</td>
<td>Alto Comisionado para la paz</td>
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ANNEX 1 TIME-LINE SPACE OF INFORMALITY AND CONFLICT: FOUR DECADES OF INFORMALITY AND CONFLICT IN THE CITY OF MEDELLIN.

This section analyses the history of Medellin’s informal development and conflict. It does so by looking at the city scale evolution of demographic change, urban development, informal development and conflict over four distinct periods spanning 1970-2010. The goal is to understand the evolution of conflict and urban space at the metropolitan scale and to establish a context for analyzing what happened at the scale of informal settlements in Chapter IV.

The periods of analysis coincides with four decades. This temporal division is not clean cut but it does serve to identify a series of overlapping themes. Many of the issues intersect over these selected periods. The division among decades is based on similar temporal breaks, defined by other scholars of the history of conflict in Medellin (Angarita, Gallo, and Jiménez 2008). Those decades respond to particular conditions of conflict.

One of the unique features of Medellin is the varied number of illegal armed actors who have operated over the past 60 years. Medellin’s history can be divided into periods related to the occupation of such actors. In Dinámicas de guerra y construcción de paz. Estudio interdisciplinario del conflicto armado en la comuna 13 de Medellín, Angarita et. al. (Angarita, Gallo, and Jiménez 2008) provide an example of such temporal division. Here, I have expanded on these stages by adding information at the city scale that refers to the four areas of study.

In the 1970s, Medellin was a very different city than it is today. In this decade, the city was marked by the stagnation of manufacture industries that had undergirded the city’s economy for almost a century. This decline in legitimate industry, created the space for the new market of illicit drugs to evolve from the existing networks of black market goods (such as cigarettes). In the following decade, narcotraffic lords exploited gangs in poor neighborhoods escalated conflict in response to the government’s alliance with the United States in its War on Drugs. The end of the 1980s marks the highest levels of homicide in the history of the city. In the 1990s, the drug lords vanish from the picture in poor neighborhoods, giving way to insurgents operating on a national level. These insurgents moved their operations from rural areas to the city, urbanizing the conflict with the epicenter in the city of Medellin. The urban guerrillas (Milicias) claimed sovereignty over territories of the city, killing, or absorbing existing gangs. At the turn of the century, right wing groups (Paramilitary Autodefensas Unidas de Colombia AUC) challenge the Milicia territorial control. The fight between left and right NSAG (Milicias and AUC respectively) was won by the AUC with covert help from the national government. In 2003, a peace process with the AUC demobilized the large organization, but its members continued to operate clandestinely until the break of peace accords and the extradition of key figures to the United States. The breaking of accords and extradition of key figures triggered another fight for power within a very fragmented ecosystem of illegal gangs, which
some call bandas emergentes in Colombia or bandas criminales emergentes (Bacrim). By 2010, a new process of consolidation began involving new and old franchises of crime.

The phases of this struggle are difficult to define because transitions from one group to the next not happen instantaneously. For example, the “Milicias” period in Medellin (Urban Guerrilla group) that is considered the phenomena of the 90s had its first incarnations in the “campamentos Colombia” of the early 1980s. Different authors and sources have different opinions. It is clear however that transition moments from one group to the next coincide with moments of intense conflict. In which one group kills the other to take its territory.

This evolution of conflict may be divided into the following decades and themes:

- 1970 - 1980 Economic decline and illicit drugs market
- 1980 - 1990 Specialization of gangs and the war on drugs
- 1990 - 2000 Gangs without bosses give way to Milicias transition to from left to right
- 2000 - 2010 From hegemonic control to fragmentation

Each decade-theme has been compared across four variables that serve to measure change over time, providing a clearer comparative visualization of the process of change. The variables are (1) Population: an overview of growth both from a qualitative and quantitate point of view. (2) Type of Conflict: maps the evolution of conflict, it describe the different actors and motivations thru the selected periods and explain transitions between one type of conflict to the next. (3) Urban Development: follows the evolution of urban physical form at the metropolitan and city scales, and (4) the typologies of informal settlement occupation: shows how informal neighborhoods behave in each decade.
These are those four variables to look per decade-theme:

1. Population
2. Type of conflict
3. Urban Development
4. Typologies of informal settlement occupation

MEDELLIN PRE 1970S
This section describes the historical process of conflict and urbanization in the city of Medellín. In contrast
to its more recent image as a violent city, Medellín represented a "utopia of progress" in the first half of
the twentieth century (Jaramillo, Melguizo, and Martínez 1998). Economic progress was achieved by
tightly interwoven connections among the private sector, the political power and the moral control
exemplified by the power of the church, creating an elite, wealthy class that exercised ample social
control. Medellín developed as the industrial capital of Colombia and one of the leaders of the
industrialization in Latin America providing ample space for upper mobility of the labor force (Farnsworth-
Alvear 2000). This process peaked at the end of the 50s, coinciding with political and security crises of the
period call “La Violencia” (Bushnell 1993) in which the main cities of the country became large receptors
of the influx of peasants who were fleeing violent conflict from left wing insurgents in the countryside.
This is also the moment in which the globalization effects of the protectionist policies (Import substitution
Industrialization ISI) of the Colombian government on its industries let to stagnation and demise of the
industrial model in the city of Medellín. These two process of violent political crisis and the un-
competitiveness of local industries triggered dramatic changes in cities that were receiving large
percentages of rural populations. This process of rural-urban migration is not dis-similar to other cities in
Latin America (Gilbert and Latin America Bureau. 1994). What is different in the Colombian case is that
this migration happened in the context of extreme rural violence that impoverished rural migrants and
that created conditions of conflict that are still visible. It is at the end of the “violencia” that the guerrilla
movement in Colombia is born. And is also during the same “violencia” period than the first Paramilitar
groups appear, to counter them two non-state actors that are key to understanding the history of conflict
in the city of Medellín.

By the 1970’s rural migrants were arriving to an industrial city in crisis which can offer no jobs or support.
The business of illicit drugs starts in this context (Roldán 1999). In planning terms the Medellín pre-1950s
were a very organized city, a city that was building a thoughtful development plan based on the needs of
its elites (J. R. Uribe and De Greiff 1981; Botero Herrera 1996; Schnitter Castelanos, Universidad
Pontificia Bolivariana (Medellín), and Area Metropolitana del Valle del Aburrá Antioquia 2007; Samper
Escobar and Massachusetts Institute of Technology. 2010). It is on this crisis of migration and lack of jobs
that the informal city of Medellín growths. Informal and non-planned developments had existed in the
city since its foundation, as referenced in many plans of development (Melo 1996; Coupé 1996).

By the second half of the 20th century, this "utopia" (Marden 1940) portrait in the media entered into
crisis and a new city emerged from the construction of multiple informal neighborhoods what in Medellín
are called “barrios piratas or invasions." From 1950 to 1960 the urban population in Colombia grew
three-fold and the cities had an urban growth between the 95-% and 98% most of this urban growth was characterized by illegal self-construction by the arriving rural population (Jaramillo, Melguizo, and Martínez 1998) From the decade of the 1960’s onward there is an increase of the informal economy given the lack of job supply from the traditional employment sectors of the city (Jaramillo, Melguizo, and Martínez 1998, 13). By the 1970’s, those effects are felt with more strength and the period 70’s to 90’s is coined by John Betancourt as the Medellin’s decade of “decadence” (J. Betancur 2007). Consequently, over this period, the “harmonious” contract between the state and elites developing the future of the city was lost. All planning efforts at this stage were dwarfed by the state’s inability to cope with the unexpected exponential rise in population and the economic stagnation of the city’s industries. At this point, all arriving population found most sources of formal employment in crisis.

Nevertheless during this time of crisis the state via the Instituto de Credito Territorial ICT, experimented with successful low-income housing projects that did reach some poor populations (Caminos, Turner, and Steffian 1969). Unfortunately those projects were not large enough to provide for even a fraction of the arriving populations. In the 1980s, the state suspended this affordable housing effort. Instead of building houses, the state continued facilitating loans to buy homes. The planning department also focused on road infrastructure. These projects were politically more acceptable parts of the regulator plan.

INFORMAL DEVELOPMENT IN MEDELLIN GENERALITIES
The term slum, as explained in chapter III, has a myriad on meanings. Table 2 explains some important distinctions of the different typologies of settlements part of this research.

<table>
<thead>
<tr>
<th>Table 9. Types of informal development in Medellín</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Invasión</strong></td>
</tr>
<tr>
<td><strong>Definition</strong></td>
</tr>
<tr>
<td><strong>Land Tenure</strong></td>
</tr>
<tr>
<td><strong>Public Services</strong></td>
</tr>
</tbody>
</table>
1970-1980 ECONOMIC DECLINE AND ILLICIT DRUGS MARKET

FIGURE 82 MAP OF INFORMAL SETTLEMENTS OF MEDELLIN 1970 SOURCE: THE AUTHOR AND PLANNING DEPARTMENT OF MEDELLIN.
In the 1970s, Medellin was a very different city than it is today. In this decade, the city was marked by the stagnation of manufacture industries that have undergirded the city’s economy for almost a century. This decline in legitimate industry, created the space for the new market of illicit drugs to evolve from the existing networks of black market goods (such as cigarettes). Large migrations from the rural areas result from the national conflict and the process of urbanization that other Latin American countries are experiencing. This decade is characterized by large invasions. Arriving populations are, by and large, not able to find jobs in the collapsing industries of the city.

**Population**

By the early 1970s Medellin was as many of the urban centers of Colombia exhibiting accelerated population growth at a rate of 6.9% (Nelson, Schultz, and Slighton 1971). By the 70s, 53% of the population of the country (of 22.5 million) resided in cities (Melguizo and Cronshaw 2001). Medellin was experiencing growth very similar to other cities in Latin America (Gilbert and Latin America Bureau. 1994), but with the difference that some of that migration was accelerated by the national conflict in rural areas. The migrant population that arrives at this time comes mainly from other areas of the department de Antioquia. Specifically from the urban and rural areas where there is significant armed conflict. Areas like Uraba, Norte Magdalena and Magdalena Medio (Coupé 1996, 568).

**Table 10. Population Growth Medellin. Source: Census DANE**

<table>
<thead>
<tr>
<th>YEAR</th>
<th>CITY</th>
<th>INFORMAL SETTLEMENTS</th>
</tr>
</thead>
<tbody>
<tr>
<td>1973</td>
<td>1,077,252</td>
<td>N/A</td>
</tr>
<tr>
<td>1975</td>
<td>1,480.382</td>
<td>185,000</td>
</tr>
<tr>
<td>1990</td>
<td>1,621.920</td>
<td>N/A</td>
</tr>
<tr>
<td>1993</td>
<td>1,698.777</td>
<td>202,500</td>
</tr>
<tr>
<td>1997</td>
<td>1,840.975</td>
<td>248,965</td>
</tr>
<tr>
<td>2002</td>
<td>2,030.593</td>
<td>302,904</td>
</tr>
<tr>
<td>2005</td>
<td>2,216.830</td>
<td>320,000</td>
</tr>
<tr>
<td>2006</td>
<td>2,525.902</td>
<td>330,000</td>
</tr>
<tr>
<td>2007</td>
<td>2,553.012</td>
<td>340,000</td>
</tr>
<tr>
<td>2008</td>
<td>2,580.414</td>
<td>350,000</td>
</tr>
</tbody>
</table>

The total population of the city in 1973 was 1,077,252; by the end of the decade it had grown to 1,480.382, a 37% change. The Medellin urban perimeter was extended in 1963 (Acuerdo N, 52 de 1963)
(Bahamón Álvarez 2009), and this was the fifth time that the perimeter has been extended since 1905, and it would be the largest extension of the urban perimeter in Medellin’s history. A total of 2,336 Ha was added to urban areas. In economic terms from the 60s on there is an increase of the informal economy result of the lack of jobs supply from the traditional employment sectors of the city (Jaramillo, Melguizo, and Martínez 1998, 13)

<table>
<thead>
<tr>
<th>YEAR</th>
<th>LAW</th>
<th>AREA ADDED (CALCULATED) HA</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>1905</td>
<td>ACUERDO 35</td>
</tr>
<tr>
<td>2</td>
<td>1912</td>
<td>ACUERDO 51</td>
</tr>
<tr>
<td>3</td>
<td>1934</td>
<td>ACUERDO 97</td>
</tr>
<tr>
<td>4</td>
<td>1945</td>
<td>ACUERDO 85</td>
</tr>
<tr>
<td>5</td>
<td>1963</td>
<td>ACUERDO 52</td>
</tr>
<tr>
<td>6</td>
<td>1981</td>
<td>ACUERDO 09</td>
</tr>
<tr>
<td>7</td>
<td>1992</td>
<td>ACUERDO 09</td>
</tr>
<tr>
<td>8</td>
<td>1999</td>
<td>ACUERDO 62</td>
</tr>
<tr>
<td></td>
<td></td>
<td>TOTAL 10,219</td>
</tr>
</tbody>
</table>

**TYPE OF CONFLICT**

There is very little criminal activity in the city of Medellin in the decade of the 60’s, when compared with the decades to follow. There is some political violence to political leaders and also to community members at large. Gangs and common criminal were also commonplace in the city. These organizations were small and disorganized (Melguizo and Cronshaw 2001).

While most of the literature deals with violence on the rural areas (Henderson 1984), there is intense use of security forces within the boundaries of the city to control populations. The period of the “la violencia” has seen police force used as a way to execute political violence from the 1949 onwards.
FIGURE 83 MEDELLIN URBAN PERIMETER EXTENSIONS SINCE 1905 SOURCE: THE AUTHOR BASED ON CARTOGRAPHY BY GABRIEL ENRIQUE BAHAMON ALVAREZ (BAHAMON ÁLVAREZ 2009).
A key motivation for violence can be traced to economic activities. By the 1970's, the main sources of income in poor areas is derived from the sale of contraband of highly taxed or prohibited imports, such as cigarettes. The import restrictions on cigarettes in the early 70's part of Import substitution industry (ISI) policies open the opportunity for criminal entrepreneurs to generate networks in which they provide the city with untaxed goods, alcohol, cigarette and appliances became an important source of income for a novel network that to function needed to expand beyond the limits of the city, state and country. Is over this network of illegal goods that the first illegal substances are trade. The fight for markets of this illegal goods is what starts one of the first Medellin’s “wars” of the underworld, “la guerre del Marlboro” (Caycedo 2013) as explaining by Pablo Escobar himself in an interview with German Castro Caicedo:

"I was made in the war, in a very violent war, that of the Marlboro. I swear that not even the paisas, unless they have been ‘bandidos’ [gangsters] at that time would have known that that battle existed."

This era mark by the transition between the "pillo" or individual criminal to the appearance of the first criminal networks based on the trade of cigarettes and marijuana. The level of control over territory and sophistication of criminal groups are very minimal compared to any of the other type of criminal organizations that appear in the following decades (Mesa Sánchez 1985; Melguizo and Cronshaw 2001) along the routes of the prohibited goods the marijuana trade gets established.

Alongside the appearance of the narco-traffic networks, there is an apparent need to increase securities especially in poor neighborhoods. Is at this moment that the first private community organized security organizations appear (The Decreto N1355 of 1970, Diario Oficial, sep. 4 de 1970, p732 authorized the juntas de Accion Comunal (JAC) Community groups at the scale of neighborhoods that are connected by partisan representation to the municipality) these are civil defense groups could perform surveillance tasks.

The creation of these civil defense groups were a response to legalize and control some of the vigilante groups that are already operating in the city a result of the "violencia" conflict. By the 1960s, there are records of "escuadrones de la muerte" (death platoon’s) that killed convicted criminals that have escaped sentences for lack of “evidence.” This phenomena of private security operating outside of the curfew of the state, fulfilling apparent state functions that are not well documented in this era later become common practice during each of the other periods that are explored here. What is important is to clarify that a precedent existed for modalities of collective violence and private security.

**Urban Development**

By 1960, the city had established a planning department and a regulator plan. The first-regulator plan of the city was approved in 1959 (Mesa Sánchez 1985). This decade is where most of the planning of the "modern" infrastructure of the city was placed. The regulator plan was decanted and actualized version of the 1950’ plan of Wiener and Sert. (Schnitt Castellanos, Universidad Pontificia Bolivariana (Medellin), and Area Metropolitana del Valle del Aburrá (Antioquia 2007) that placed upon the post-colonial city modern imprint. In which zoning and transportation networks are the key elements. In this plan an administrative, recreational and housing zones are defined connected by a network of highways running along the river. The sloped hills are considered land unbuildable and left without any program
designation. Those areas outside of the plan would be the ones that will be taken by the new-arriving poor populations. At this time also the first regulations that control the building along the many creeks of the valley are some of the features of such plan that get translated into concrete actions in the city.

The territorial division of Medellin by Comunas is done in 1963 (Naranjo and Villa 1997). In this period also the establishment of the Instituto de Credito Territorial (ICT) a housing institution dedicated to providing housing at low cost. That would develop many experiments in social housing guided to house the expelled informal populations living in central areas. Projects like Carlos E. Restrepo would be developed at the end of the 60s and along the entire decade of the 70s. Those Low-income housing projects would fail to supply housing at low cost. Alongside those incremental projects would be procured both by local NGOs in projects like Villa del Socorro (Caminos, Turner, and Steffian 1969) that would set up a path for excluded low-income families at the sloped periphery of the city (Samper Escobar and Massachusetts Institute of Technology. 2010, 77).

Figure 84. Villa del Socorro, 1967. Source: Instituto de Credito Territorial

New experimental typologies of social housing were implemented in Medellin poor neighborhoods. Neighborhoods like Villa del Socorro that focus on core housing and incremental growth part of the site and services agenda of the World Bank this project would also be implemented by the Instituto de Credito Territorial in the Barrio 12 de Octubre at the northwest of the city (Antioquia 1971).

This two projects would initiate a pattern of exclusion of the poor to the north of the city these projects would not be followed by other state interventions and the end of the decade the time of experiments on
social housing in Medellin would end. New informal settlements would climb the sloped mountains from these experiments on social housing. The pattern of poor segregation, self-build and state absence would have serious consequences for the future of the security of the city.

The total area of the city by the end of the decade after the incorporation of some of the rural areas was of 61,317,928 square meters (6,131.79 ha) (URIBE, Teresa, and Bustamante 1978, 155, 162). Most of the informal development then happens at the edge of the city. Outside of the urban perimeter by informal developers or by communities that take land illegally.

**TYPOLOGIES OF INFORMAL SETTLEMENT OCCUPATION**

There are records of informal settlements in Medellin that date back to 1932. These were located at the edge of what it was the downtown in the areas that surrounded the train station now known as the Alpujarra. The closeness to the train station and the main open market of the city made the non-developed land along tracks very attractive to the poor. In 1963, the municipality follows a process of "eradication of tugurios" (slum clearance) in the "important areas of the city" areas like "la Alpujarra, the roads that flank the Medellin river, La Estacion villa, Sanbenito (next to Botanica Gardens) and the area of the Cementerio Universal" (Rua and Rua 1966, 21)

![Figure 85. Barrio 12 de Octubre in Medellín 1970s. Source: (Antioquia 1971).](image)

Already in By the 1960s the city see the growth of the uncontrolled areas of the city as a grave problem. The rhetoric used to describe these areas is very similar to the mainstream thinking about slums in the US and elsewhere. In terms that scholars see these populations as "losers of economic development" something that would get challenged at the end of the decade by scholar as Turner (Turner 1977) and
Perlman (Perlman 1976). A research of the time in Medellin presents this view of the inhabitants of the “tugurios” (informal settlements) as a hopeless population:

The people that arrive in a “tugurio” [slum] do not integrate to the local society they are not adapted to the everyday life and society. In the tugurios [slums] they meander without direction in a state of chronic social failure” (Rua and Rua 1966, 13)

The large scale of informal urban development in Medellin at this time is revealed by these studies (Rua and Rua 1966; Vidal G 2007). The Previous decade has been characterized by the development of ‘urbanizaciones piratas’ but by the decade of the 70s the ‘invasiones’ become the most common type of informal urbanization.

At this point in 1970, the city has seen around 15 years of continuous informal development. The total area of the city dedicated to informal settlements is of was of 2,550ha from which 1,403 ha were inside of the urban perimeter that represents the 20.55 % of the urban area (calculations by the author). It was calculated that they represented a total of 64,182 housing units (Mesa Sanchez 1985). By this moment Wilfred Bonilla in “Protagonismo juvenil, movimientos sociales y crisis de la politica, 1995 declares that the decade of the 70s was characterized by the land grabbing and self-construction; the organization and

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19 A clarification is that before of 1960 in Medellin there was no an established instrument of land regulation as such. So all construction in Medellin was not controlled, There were some general regulations that rule everyday transactions but as a process all buildings in the city were more the result of private initiatives (Mesa Sanchez 1985)
mobilization with respect of the state and the relations of solidarity. This decade is characterized by the struggle community’s against the state thru the efforts of community organizing along the lines of land grabbing.

All areas of the city, Comuna 1 is the area with most of the informality can be encountered. a key developer was the ‘urbanizador pirata’ (pirate developer) Juan Arango and Cock Alvear Hermanos Ltda, who owned the land and that saw in the fear of land taking an economic opportunity that motivate him and others to divide and sell plots at low cost. In Comuna 1 neighborhoods like Santo Domingo Savio, are founded in the last years of the 1950’s. In Comuna 13, the independencias neighborhoods are founded at the beginning of the decade. By the end of the decade, multiple evictions are common place for both areas.

The process of consolidation’ of each informal neighborhoods is long, and the time period between the moment of the taking of the lots and final public service provision that is part of the recognition by the state can be of up to 15 years. Evictions are numerous among the multiple informal communities; this creates a state of uncertainty that forces residents to minimize investment in their living units. As one scholar on informality in Medellin states “The fear that units would be destroyed by the state in this period is reflected on the little investment on the housing units. (Coupe 1996, 568).

A unique case of state intervention of informal settlements in Medellin is the service company that belongs to the municipality has provided services to informal settlements regardless of legal tenure. In June 3, 1964 Empresas Publicas de Medellin EPM created a division called “habilitación de Viviendas” (Housing improvement) that later was known as “Política de mejoramiento de las viviendas marginal” (policy of housing improvement to marginalized units) the goal of this group was to provide public services of water, sewer and energy (Gómez Salazar, Ramírez Toro, and Calderón Vallejo 1987, 93). These improvements are done with funds from the company based the companies’ own study of investment returns. What is different here is that decisions to supply services then do not run by the municipality but by the own bureaucratic process of EPM. The service provision and addresses were given to informal dwellers before achieving legal tenure because were better to provide services and charge for them, than to have those services stolen from the public network and have to pay for the repairs. This process is seen by scholars as an incentive to informal settlements formation in Medellin (Cadavid Monroy 2010).
1980 -1990 SPECIALIZATION OF GANGS AND THE WAR ON DRUGS

**Figure 87** Map of informal settlements of Medellin 1988 Source: The author and Planning Department of Medellin.
In these decades, narcotraffic lords exploit gangs in poor neighborhoods, which escalates conflict in response to the government’s alliance with the United States in its “War on Drugs.” The end of the 1980s marks the highest levels of homicide in the history of the city. Projects for the eradication of poverty motivate the national government to support and legalize (give land titles) some informal settlements. The first projects of urban upgrading happen in the city. Along with state projects that support informal settlements, narcotraffic also produces urban projects in these areas as a way to obtain legitimacy.

POPULATION
The Medellin population by the mid-80s had grown to 1'480,382 with an estimated of 185,000 inhabitants living in informal areas, representing 12.5% of the population. Informal settlements cover an 889 ha of land from the 8,331 ha of the entire city meaning that a 10.67% of the total area of the city is informal. The change in the percentage has to do with the readjusted perimeter of 1981, and with that by the 1980s some of the informal settlements of the 60s are not consider as such anymore. The urban perimeter is readjusted once again to accommodate for the large number of settlements that are now at the perimeter of the city (see Figure 83 urban perimeters extensions and Figure 87 of informal settlements by 1980s). At this point on most of the informal development is occurring on slopes. The accelerated rate of population growth of the previous decade slowdown.

TYPE OF CONFLICT
In this decade, two types of criminal organizations develop so called narco-gangs that fill specialized services for drug lords, and leftist groups affiliated with the guerrilla groups operating in Colombia.

NARCO-GANGS
Large transformations of the conflict in the city of Medellin happen during this decade, this is maybe the most crucial decade to understand the conflict in the city. The phenomena of narco-traffic permeate all spheres society both public and private institutions are embedded with the narco-traffic networks. Narco-traffic money is used to support many companies in Medellin (among them construction is an important one), Capos of the narco-traffic get directly involved in politics as the case of Pablo Escobar that get a suppliant seat on the Colombian senate. Moreover, at the local scale the narco-traffic drug lords uses clientelistic strategies to gain legitimacy and extend their social base with projects like the “Medellin sin tugurios” (Medellin without slums) (Angrita 2002; Cardona 2007). The “Medellin sin tugurios” program provides housing, and football courts in marginalized neighborhoods were sponsor by Pablo Escobar himself in his role as a politician.

In parallel with these events, a new type of criminal organization appear in the poor neighborhoods the "bands" or "galladas" the small traditional gangs specialize into specific market areas. The most important was groups with exclusive dedication to homicide called "sicarios" (assassins). Some of the most famous were the "los priscos" in the Aranjuez Neighborhood and the "la Ramada" en Bello. The "bandas" evolve from the corner gangs of the 70's called "Barra" to these specialized groups called "bandas"(Marín and Martínez 1991). At the end of this decade, there were important transformations in a relationship with the type of crime, by the presence of the narcotraffic, and the increment in the number of homicides by the "asesinos de la moto" (motorcycles were the vehicle of choice of the "sicarios") also new forms of violence appear like the kidnapping, car thief, terrestrial piracy, (Jaramillo 1996; Melo 1996). the first
areas that saw this new type of local turf organizations where located in the northeast of the city neighborhoods like Pedregal, Doce de Octubre, Santander, Florencia (Marín and Martínez 1991). The “sicario” phenomena happens first in neighborhoods traditionally poor or in areas that transition from the middle class to lower economic levels and finally on consolidated informal areas. Around this decade, the overall criminal network of Medellin known as the ‘Cartel of Medellin’ gets structured taking into account the different scales of organizations. Most of its criminal tasks are outsourced to these specialized criminal gangs.

Pablo Escobar was born in 1949 in Medellin into a poor family, and his entire childhood happened within the period of the “La Violencia.” He studied political science but dropped out of school early. In 1975, he started developing a cocaine operation. At some point, he accumulated so much wealth that he allegedly offered to pay off the Colombian U.S. debt. In 1989, Forbes magazine estimated Escobar to be the seventh-richest man in the world with a personal wealth of close to $25 billion. As a politician was elected as a deputy alternative representative to the Chamber of Representatives of Colombia’s Congress, as part of the Colombian Liberal Party. When news about his criminal record came to scandalous public light, he was expelled from the Congress. As a retaliation for this expulsion, Escobar ordered the assassination of Rodrigo Lara Bonilla, the Colombian Minister of Justice. A few weeks later, the Minister was assassinated on April 30, 1984(Kenney 2002). This event fomented the Colombian national government formally to declare an alliance with the U.S. War Against Drugs, in this case specifically against the Colombian drugs cartels. This war fought mainly in Colombia’s urban areas, cost thousands of deaths. Escobar founded gangs comprised of poor youths, called sicarios, who received a reward for killing police officers. More than 600 officers died in this way. The three cities most affected by this war were Bogota, Medellin and Cali. In 1993, Pablo Escobar was killed in Medellin in what was the end of a long and costly manhunt. Escobar’s death represented the end of the old Cartels in Colombia. Over the course of the next few years, many narco-traffickers were killed, imprisoned or extradited to the United States. The demise of the powerful cartels left the drug trafficking open to be appropriated by the guerilla groups and the newly formed Paramilitar groups.

The cartel introduced new forms of the criminal organization in terms of different scales of who produces the violence. What Pablo Escobar introduced is a new scale of conflict by outsourcing its violent actions to guns for hire, found in the poor neighborhoods of Medellin. The ‘bandas’ are criminal business highly train, specialized and well-armed that operate for hired to the lords of crime in the city. Coordinated by the large "bandas" or at large by the "Oficina" an overarching syndicate that manages disputes and territories among the myriad of illegal business of the city. All this new types of criminal actors introduce high levels of violence at the scale of the city and the escalation on the number of homicides. Added to this new ecosystem of violence is the end of the period of tacit embeddedness of the state and the drug lords. A period of competition starts is the "la crisis de los ochenta" (the crisis of the 80s) (Roldán S. 2004) the end of the tolerance period between the state and the drug lords and initiate the period of largely scaled drug-related conflict in the city of Medellin.

The Oficina de Envigado (that actually started in the city of Itagui) is a criminal organization that emerged from the drug cartel of Medellin in the 1980s. This organization can be characterized, as a "criminal company" that provides protection to specific private interests or "customers" who contract their services
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE “SLUM WARS” IN MEDELLIN, COLOMBIA (1970S-2013)

(Gambetta 2007, 37). Others compare the work of the organization more as a “conflict resolution body” in which different criminal business will hire their help or solve security or criminal business related issues (Restrepo 2014).

Figure 88. Map of location of gangs in Medellin 1990s and informal settlements. Source: Juan Diego Restrepo.
MILICIAS

Alongside this criminal phenomena Medellin becomes the site for the experimentation on the peace process at the national level with the creation of the Campamentos de Paz (Campgrounds of peace) in 1984 during the Belisario Betancur presidency. Sites in the city were selected to house conversations of a peace process (See Figure 89 of Milicias in Medellin). Alongside this process the camps serve as places for the training and recruitment of new members to the insurgency groups like the M19 (M-19 Ejercito Popular de Liberation) in the “Campamentos” (Roldán S. 2004). These sites are located in poor neighborhoods alongside Medellin. As an example, The Comuna 1 was one the sites selected. This peace process will have mixed results. Soon after the process lost political support and was dismantled. The result of such failed process left groups of youth trained in combat and a considerable stock of weapons (Bedoya and Jaramillo 1991).

FIGURE 89. MAP OF LOCATION OF MILICIAS IN MEDELLIN 2002, AND INFORMAL SETTLEMENTS. SOURCE: JUAN DIEGO RESTREPO
Luis Fernando Quijano Moreno, an ex Miliciano who participated in the peace process, narrates in an interview that it is important to clarify that there was no presence of the guerrilla groups in Medellin. In this period, there is a change in the ways they occupy the territory. Their presence before was covert and at this period what became important was the territorial control. Quijano Moreno classifies the Milicias in Medellin as three groups: (1) those belonging to the traditional guerrillas that were not interested in territorial control (and tend to act more in universities); (2) the Milicia part of the peace process that use neighborhoods as sites; and (3) Milicias that are born as self-defense structures that later work at the same time but in different territories than the urban guerrilla project with the same name. Control over crime and other non-socially accepted practices as rape and drug addiction generate initial support from community members. The efficacy of the swift execution of the rule of law imposed by these groups creates a wide acceptance and support of the communities that they controlled. The kind of rule of law that these groups control is very varied and goes from small civil disputes (trash, gossip, illegal tapping, notice) to more structured ones as property disputes (Roldán S. 2004). Most of these groups of self-defense are operated by local individuals who lived in the neighborhoods some of them retired, or that had contacts with the guerrilla, but they start these organizations as personal initiative and not as an organized strategy.

These two main types of territorial urban guerrillas demonstrated by these two examples “Campamentos de Paz” of the M-19 and the EPL in 1984 in the neighborhoods Popular 1 and 2 and in Villatina and the self-defense kind like the “la banda de Los Capuchos” (Jaramillo et al., 1998: 62). At the camps beside the political militancy also military training was given to community. This action will entice the government to declare the camps illegal by 1985. (Lamb 2010, 85). The trained groups would later become organized gangs that will use the training acquired to control territories. One of the organizations that came out of this was “los Nachos” that will get a link to Pablo Escobar as for hired gang (Lamb 2010, 89). At these period increases in fighting over turf between small groups are reflected on the increase of homicide rate in Medellin from 1985 on as a community member explained “They started killing each other, they fought over business affairs, retribution, turf disputes” (Salazar 1990, 86). By 1991, poor neighborhoods are disputed between the bandas and the Milicias (Jaramillo et al., 1998).

These two phenomena of increase non-state actors in Medellin. Plus the break of the embeddedness between state and illegal drugs organizations intensify the conflict in the city. In Medellin at this point homicides escalate in the most accelerated way to take the city by the beginning of the next decade to 377 homicides per 100,000 inhabitants. Most of this conflict is the result of state and drug lords fighting. “At the end of the 1980s and in the full apogee of the gangs and the war between the Medellin cartel and the state (1989-1991), lower-class Milicia groups (Milicias Populares) further complicated violent conflict in Medellin.” (Jaramillo, Melguizo, and Martínez 1998, 119)

**Urban Development**

The advances of the previous decade in terms of planning continue during the first part of the decade, the city in 1980 created the Metropolitan Area (Area Metropolitana). Based on the initial idea of the Plan Piloto, this type of regional institutional body was the first of its kind in the country. And permitted to tackle issues at a regional scale. One of the infrastructural changes that most reflects this town-municipality shift in mentality was the Metro de Medellín. In 1984, Metro de Medellín began construction.
of a rapid transit railway, which after construction stagnated due to the political battle between the national government and the local municipalities about the release of funds until 1992 (Naranjo and Villa 1997), was finally inaugurated on November 21, 1995. (Morrison 2008). Alongside with the large metropolitan projects, in 1982 the Empresa de Desarrollo Urbano (EDU) was created that had as main objective the urban renewal of the central area of San Antonio (Naranjo and Villa 1997). This organization will become instrumental in the 2000’s decade in the urban transformation of informal areas. But at this point was charged with the eviction and development of public space in downtown. In 1987, a new Estatuto de Planeacion, usos de suelo, urbanismo, y construcion (acuerdo n 38 de 1990) introduced the normativity for urban renewal (Acuerdo n14 de 1990). That was the legal framework for a large infrastructure and public projects in the city.

**TYPOLOGIES OF INFORMAL SETTLEMENT OCCUPATION**

In 1986 and 1992 Medellin has the largest percentage of citizens living under the poverty line compared to the other 7 big cities of the country, this is similar to the unemployment and income concentration index (de Medellín 1995, 66–67). In the decade of the 80s there is a diminution of the index of migration from the rural areas, but the price of expansion of the last two decades have left. As a result, of the proliferation of informal settlements (Naranjo and Villa 1997, 97). The 28% of the total population lived in informal settlements an estimated of 64,182 (Mesa Sánchez 1985, 6). From which a large percentage was still located in Comunas 1 and 2 part of the process of urbanization of these Comunas (districts) from the 60s to 80s.

The policies of peace of the begging’s of the decade were transferred in the next administration to policies of legalization of informal settlements at a national level part of the "Plan de Erradicacion de la Pobreza Absoluta" of the presidency of Virgilio Barco program 'asentamientos humanos' (human settlements). At the beginning of the decade, an estimated of 250,000 inhabitants lived outside of the urban perimeter; a total of 45,000 tugurios (fragile homes or slum houses) and a total of 118,000 non-regularized houses existed in the city. Thru a law of amnesty (Acuerdo 29 de 1982) process of legalization of these units started. The expansion of the city forces the city to expand the urban perimeter again to include those informal neighborhoods that were within the rural perimeter.

This condition of socio-economic segregation characterizes the city. In 70s the organization of communities along the lines of land grabbing was the most salient feature of informal development. The decade of the 80s was characterized by the negotiations between state and communities along the lines of access of public services, thru the channels of political clientelism, and the creation of local social networks.

Important here is the establishment of the first programs that serve communities in marginalized areas, and that uses state resources to help improvement of physical space. Programs like the "Desarrollo integral y autoparticipativo de las comunidades" in the area of Moravia in 1984 where before was the trash dump, this program reached a total of 15,000 families. Other private projects also followed this program as the religious organization Minuto de Dios, and the corporation Antioquia Presente. Among the projects was the resettlement housing for the affected by the landslide of Villatina, (Acta N55, Junio 9
de 1987) on one of the neighborhoods selected for this research. Not surprisingly the ‘Medellin sin
tugurios’ the Pablo Escobar program also mirrored some of this programs.
1990 -2000 GANGS WITHOUT BOSSES TO MILICIAS THE TRANSITION TO FROM LEFT TO RIGHT

FIGURE 90 MAP OF INFORMAL SETTLEMENTS OF MEDELLIN 1997 SOURCE: THE AUTHOR AND PLANNING DEPARTMENT OF MEDELLIN.
The beginning of the decade is marked by the intense fight against the Cartel organizations that characterized the 1990s. In this decade, there is a transition from the drug Cartel conflict to the guerrilla and state conflict. Specifically, in the City of Medellin, this also meant a transition in terms of approaches and justifications for the conflict. In the Cartel phase, state politics were used by government and military leaders as an excuse to justify conflict on economic terms. In the transition to the guerrilla and state phase, this moved from the state level to the national and was justified more in terms of a political conflict. This transition from “economic” to “political” means that now Non-State Armed Groups (NSAG), who fight the state at the national level, brought their conflict and violence to the city. By the end of the decade, the Milicia groups dominated most of the informal and poor areas of the city. I argue that the decentralization of the municipalities in specific the elected mayors introduced by the new Constitution of 1991 lead to mayors to be more responsive to constituencies that lived in informal areas. It is during this decade, that members of the state build on previous experiences with community engagement in housing improvement in informal areas, such as the Programa Integral de Mejoramiento de Barrios Subnormales en Medellin (PRI-MED) (J. J. Betancur 2007). These projects served as the basis for the large urban integrated projects of the next decade. This is also the period of the metropolization of the city with the Metro, which now runs from one end of the city to the other, as the key project leading that transformation.

POPULATION
The Medellin population by the mid-97 had grown to 1,840,975 from which was estimated that 248,965 inhabitants were living in informal areas. The urban perimeter will be readjusted twice during the decade 1992 and 1999 (Acuerdo N.009 de 1992 and Acuerdo N.62 de 1999) (see Figure 83 urban perimeters extensions).

TYPE OF CONFLICT
The beginning of the decade is marked by the intense fight against the Cartel organizations that characterized the 1990s. In this decade there is a transition from the Cartel conflict in which politics was used as an excuse to justify a more economic conflict, to an urbanization of the national political (that of guerrilla and state) conflict in the context of the city of Medellin. Meaning that the Non-State Armed Groups (NSAG) that oppose the state at the national level will bring their conflict and violence to the city. By the end of the decade, the Milicia groups will dominate most of the informal and poor areas of the city.

By 1990s, the cartel was using terror as a means to solidify its control. Car bombs were a common site in Medellin (Davis 2007). And massive number of homicides performed by the ‘sicarios’ that appear in the previous decade. Homicide rates scale up in the city at this period to its historical peak of 375 Homicides per 100,000 inhabitants what grant the city the infamous nickname of ‘the most dangerous city in the word.’ The state deploys intensive operations across the city. A new actor appears the organization ‘los PEPES’ that stands for “Perseguidos por Pablo Escobar” (People persecuted by Pablo Escobar). That is actually a branch of the cartel de Cali against the Medellin Cartel they deploy the same violent techniques than the Medellin Cartel (terrorism, killing, extortion and torture) to find Pablo Escobar. The national police form, an elite force ”Bloque de Busqueda” [search block, ] to hunt Pablo Escobar and to dismantle its organizations. The elite force will be supported unofficially by the CIA with members and technology.
Both los ‘PEPES’ and the ‘Bloque de Buqueda’ informally will join forces and use violence as a tool to take down Pablo Escobar (Bowden and Pablo 2002; Caycedo 2013).

The hunt and death of Plablo Escobar in 1992 disarticulated his cartel’s international, national and local networks. It did not completely destroy the crime organizations in Medellin because many of the other gang lords actually deal with the security apparatus of the state to take down Escobar (Bowden and Pablo 2002). Key figures in this fight like Diego Murillo Bejarano, alias “Don Berna” that was key informant in the hunt of Escobar (as a vendetta for the exclusion of his ex-employers by Pablo) and Fidel Castaño one of the heads of los PEPES continue criminal and violent activities, they become the heads of a national Paramilitar alliance in Colombia, the United Self-Defense Forces of Colombia (AUC). That would have a key role in the conflict in the city in the following decade.

By 1990, there were an estimated 120-youth gangs, involving about 3,000 youths with an average age of 16 years (Rodgers 1998). The end of the Medellin Cartel did not mean the disarticulation of the Bandas linked to the networks of crime. A period of transition occurred during which guerrilla groups took over the vacuum of power left by the cartel. Drug gangs were quickly disbanded or absorbed into vigilante groups or the guerrillas. By the end of the decade, most of the territory of poor neighborhoods of Medellin came to be dominated by one of five different groups of Milicias Figure 89. While turf control was important for these groups, there is little evidence that they fought each other. Large gangs and the police represented a more important enemy that needed to be maintain at bay. In Independencias, a total of three different guerrilla groups controls the three small watersheds.

Important police reforms are accomplished during this period. The war with the drug cartel exposed the fragility of the Centros de Atencion Inmediata (CAI) (Samper Escobar and Massachusetts Institute of Technology. 2010, 123). More than 600 police deaths and docents of CAIs were caused by gunfire or explosions and corruption proliferated, what motivate strong central control. As a result, the CAI strategy As a result neighborhood police stations lost the authority to participate in conflict resolution which reverted to city and national agencies. This legislation change reduced the capacity of the local police force in the eyes of the community to control of non-state actors. The result was to “incentivize local forms of surveillance and popular justice that included beatings, expulsions and in later cases death” (Jaramillo, Ceballos, and Villa 1998).

In 1994, The Media Luna agreement with the Milicia groups was signed. A peace ombuds-man (conejero de paz) for the city was appointed. In 1995, The Office of Peace and Coexistence was created. It institutionalizes a policy of peaceful handling of conflicts through dialogue with armed groups, especially gangs. The Medellin Consejo Municipal records estimated 180 gangs and 19 Milicia groups existed in Medellin by 1996.

The period between 1995 and 2000 marks a transformation of the gangs as they acquire more autonomy from narcotrafic. They start to offer their services to large crime organizations like the officials, the big gangs like "La Terraza, La Canada, los Triana and La Banda de Frank" (Alonso et al. 2007, 21).
URBAN DEVELOPMENT
The new national constitution of 1991 removed the requirement that city mayors be selected by the state governor or the country’s president. Under the new constitution, mayors had the opportunity to be elected by popular vote. Elected mayors need to respond to their constituencies and not only to their political affiliations. The elected mayor was a significant change, modifying the ways in which the mayor’s office operated and related to its citizens. It also has extended the period in which mayor were in power form short periods determine by political maneuvering to a fix three years that later would get extended to four years. The overall power structure and image has shifted from an authoritarian approach to a more citizen-oriented policy. This new democratic route has allowed members of Independent parties, such as Antanas Mocus in Bogotá and Fajardo in Medellín, to become city mayors. This opened the possibility for these mayors to experimenting with new types of projects in the cities (Sanín et al. 2009).

The constitution created a new Territorial Law. This law for the first time included public participation in the planning process. The Territorial Law also included a new planning instrument called the Plan of Territorial Order (Ley de Desarrollo territorial, Ley 388 de 1997 el 18 de Julio). These new municipal plans regulated the buy and sell and the expropriation of land. While Medellin already had a regulatory plan and a well-developed planning Department this new legislation give more structure to the planning process. The metropolitan efforts of the past decade get implemented in this period. Leading with the Metro that started construction in 1984 and opens its doors in November 21, 1995 (Morrison 2008).

TYPOLOGIES OF INFORMAL SETTLEMENT OCCUPATION
By the 90s, the lands to be expropriated by emigrating settlers start to be scarce. Nevertheless, expansion of the city continues but a reduced pace. Two additional expansions of the urban perimeter (1991, 1999) happen during this decade to accommodate growth that is equally formal and informal.

Changes in the constitution leads to changes in the way the city treats informal areas. Is in this decade that builds on previous experiences with community engagement in housing improvement in informal areas. In 1991, the Programa Integral de Mejoramiento de Barrios Subnormales en Medellín (PRI-MED) (J. J. Betancur 2007) was a pilot program that includes housing improvement as physical infrastructure improvements. It was conceived in 1992 as a form of incorporation of these settlements into the city, both physically and socially. The program integrates for the first time multiple organizations; state (local and national), civil society, the academy and along international cooperation.

The PRI-MED was divided in two phases and lasted a total of nine years (1993-1997 and 1998-2003). For the first phase the intervention was in the neighborhoods: El Triunfo, El Mirador, El Picacho and El Picachito in comuna 6; Independencia, Nuevos Conquistadores, El Salado, El Progreso en la comuna 13 and los barrios Isaac Gaviria, La Primavera, el Trece de Noviembre, El Pinal, Los Mangos and Villa Tina in comuna 8 (zone Center-West) (Quiceno Toro 2008, 49). The second phase started in 1998 in the

20 from the ley de Desarrollo Urbano of 1970 in terms that give a clear responsibility to the municipalities thru the first time elected mayors
21 Ley Territorial and the Plan de Ordenamiento Territorial POT of 1997.
neighborhoods Carpinelo, Aldea Pablo VI, El Compromiso, La Avanzada, María Cano, Carambolas en las comunas 1 y 2 (zona nororiental) y los barrios Las Estancias, Villa Liliam, Villa Turbay, La Sierra, Ocho de Marzo y Juan Pablo 11 en las comunas 8 y 9 (zone Center-East).

The program attended 15 neighborhoods, 9,000 houses and a total population 11,000 families. In accordance with the Planning Department of Medellin at the time the PRI-MED was in action a total of seventy "sub-normal" neighborhoods existed. Meaning that these areas did not fulfill the minimum standards of formal urbanization, construction and land use, a precarious condition of the habitat lack public services, low-quality housing and lack of land title. It was estimated that a total of 37,000 houses were improved for a total population of 185,000 people. A total cost of US$ 31 million 80.9% for house improvements and relocation and 38.9% neighborhood upgrading (Ziss 1993).

This program is important because it provided experience on urban upgrading in the city of Medellin and served as a base for other future projects in the city. The program builds on large academic experience in public universities. While interventions were small by today measures their impact, measured in how community members remember the intervention is significant. The PRI-MED also to set a precedent for the Favela-Bairro project in Rio de Janeiro the largest upgrading program in the world at its time.

Alongside the PRI-MED a massive regularization process appears in the city, See Consejo de Medellin, Acuerdo municipal No. 62 de 1999, on the adoption of the Plan de Ordenamiento Territorial (POT). Moreover, the Consejo de Medellin. Acuerdo 23 of 2000. Regularization will become common practice over the next decades and will include non-register housing units into the final count of the city by offering amnesty to housing and improvements that have been build more than 5 to 7 years before the signing of the regularization law.
2000 - 2010 FROM HEGEMONIC CONTROL TO FRAGMENTATION

Figure 91: Map of informal settlements of Medellin 2011. Source: The author and Planning Department of Medellin.
The fight between leftwing and rightwing NSAG (Milicias and AUC respectively) was won by the AUC with covert help from the national government. In 2003, a peace process with the AUC demobilized the large organization. The Demobilization, Disarmament and Reintegration DDR process with the AUC involve the turning of weapons and the demobilization of more 1,500 members just in Medellin, but its members continued to operate clandestinely until the break of peace accords and the extradition of key figures to the United States. The breaking of accords and extradition of key figures triggered another fight for power within a very fragmented ecosystem of illegal gangs called by some, Bandas emergentes en Colombia or bandas criminales emergentes (Bacrim). By 2010, a new process of power consolidation began involving new and old franchises of crime.

This last period is characterized by a series of experimental large scale urban interventions in poor areas. This began with the creation of the first urban public transportation system, the metro cable, in 2002, and the integrated urban projects (PUI) from 2004-2011. From 2003 onward, Medellin has undergone an internationally renowned urban transformation (Kimmelman 2012), which itself has been part of a controversial nationwide peace process (Bouvier 2009). This was implemented under Sergio Fajardo's term as Medellín mayor (2003-2007) and continued under the next two mayors Alonso Salazar (2008-2011) and Aníbal Gaviria (2012-2015). Internationally and locally, people perceive Medellín as an entirely different place than its most recent violent fame. The city of Medellín is seen as an example of how to engage with conflict and violence thru urban peace process. So many physical and policy initiatives and projects were generated in this period that the city of Medellin has not kept consistent records of the process, nor stored the existing records in a single place. Different departments of the city give different accounts of the same process that all came to be called ‘the transformation of Medellin.’

**Population**

The Medellin population by the beginning of the decade had reached the two million inhabitants with an estimated 302,904 living in informal areas around 15% of the city is considered informal by the Planning department standards at this time. A final readjustment of the urban perimeter occurred in 2006. That add 105 ha, which only account to 9.8% more of land. (Acuerdo N.46 de 2006) (Figure 83). Over the decade, the city population will have growth by 25% reaching the 2,580,414. The population living in informal settlements growth proportionally. Most of it to already established informal areas and a small portion to new informal settlements at the fringe of the city, what represents a slowing down of the proportion of informal settlement in Medellin but not on the metropolitan area.

This population growth is motivated by the continuing displacement of populations from the rural areas by conflict by among the National state army, the Paramilitar groups and the Guerrillas, part of an undeclared civil war throughout the nation (Gutiérrez Sanín et al. 2006). These national and other local conflicts have made issues of informality in Colombia distinct from those in Latin America: Colombia is a country with the largest number of internally displaced individuals in the world (Ibáñez and Velásquez 2009). Moreover, “Colombia remains the country with the highest number of IDPs [Internally Displaced People (IDP)] in the world, with between 4.9 to 5.5 million IDPs according to the IDMC.” (UNHCR 2014). By 2010, the registered displaced population in Medellin was 189,144 (SIPOD 2010, 2). The comunas
(districts) with the most displaced populations in Medellin were those with larger numbers of informal settlements (Alcaldía de Medellín 2011, 4). Displaced families arrive without resources and become part of the pool of poor on the city. Medellín counts with 491,380 families, from which the 18.9% lives with less than one minimum salary 14,456.67 $Pesos (7.57$US Dollars) daily. (Ministerio del Trabajo 2014) Moreover, the 35.9% live with less than two minimum salaries.

<table>
<thead>
<tr>
<th>Year</th>
<th>Pop City</th>
<th>Pop Informal Settlements</th>
</tr>
</thead>
<tbody>
<tr>
<td>2002</td>
<td>2,030,593</td>
<td>302,904</td>
</tr>
<tr>
<td>2005</td>
<td>2,216,830</td>
<td>320,000</td>
</tr>
<tr>
<td>2006</td>
<td>2,525,902</td>
<td>330,000</td>
</tr>
<tr>
<td>2007</td>
<td>2,553,012</td>
<td>340,000</td>
</tr>
<tr>
<td>2008</td>
<td>2,580,414</td>
<td>350,000</td>
</tr>
</tbody>
</table>

**Type of Conflict**

This is the decade with the most drastic transitions on the phenomenology of crime in the city, is a period where more fluctuations of conflict happens. This variations of intensity of conflict measured by homicide rates can be attributed to changes of the same phenomenology of conflict at the national scale. This correlation between the national and the local happen because the main actors of the national conflict are also operating at the scale of the city, and the policies that deal with such actors were implemented at the national scale but reinforced at the local level. This is different to what happen in other decades in which narco-traffic was a local (but with global connections) phenomena that had implications at the national scale. During the 2000s the reverse occurred: national policies that deal with the conflict have visible impacts at the urban scale.

The decade start with a plateau of a homicide rate of about 170 homicides per 100,000 inhabitants this is the result of the of the process of cooptation by Milicia groups in the city and the response of Paramilitar groups that allied with the large franchises of narcotraffic to take those areas from the Milicias (1997-2003). While there is a reduction of homicides from 375 in 1992 to 167 in 1997, this does not imply less violence. What is happening here is a transition from the drug violence of the 90’s to the Milicia control by end of the decade to the entrance of the paramilitar control in the first years of the 2000s. The plateau at the beginning of the decade ironically coincides with the negative effects of the national peace process with guerrilla groups in the administration of President Andres Pastrana, result of a public cry for a pacific solution of the national conflict (Samper Escobar and Massachusetts Institute of Technology. 2010, 29). This process reduced the number of military operations on guerrilla controlled areas in rural
territories and by consequence on urban areas. As a result of this incapacity of the local state to police some areas of the city, a large portion of poor and informal areas of the city were in control by the Milicia groups (see Figure 89).

FIGURE 92. PARAMILITAR CONTROL IN MEDELLIN BY 2003. SOURCE: JUAN DIEGO RESTREPO ARCHIVE.
Drug lords and landowners, seeking to protect their 'interests,' founded private security forces by the end of the 1990s, would form Paramilitary groups. These Paramilitary groups included the United Self-Defense Forces of Colombia (AUC). Between 1997 and 2006, the AUC, a far-right Paramilitary group reached an estimated 20,000 militants. The AUC was led by Carlos Castaño Gil, son of a wealthy agricultural family in Antioquia whose father was killed by FARC. Castaño was one of the leaders of the organizations Los PEPES of the early 90s that helped to capture Pablo Escobar. The AUC supports itself by income from narco-traffic and donations from its sponsors which include large landowners and industrialists. There are many allegations that the national government supported the AUC, even if it was by looking the other way, both in the countryside as in urban areas. Paramilitary groups took control over territories dominated by guerrilla groups. In Medellin, this war would be felt with the most severity than in other areas of the country (Figure 92). This transition from guerrillas to Paramilitary groups mark a period of constant violent conflict. The place for this confrontations are in the peripheries of the city since this is a turf war.

2002 marks an important inflexion point on the history of conflict on the city. The fail peace process with the FARC motivates a change in security policies for the next president Alvaro Uribe (2002 to 2010) who has a different approach to security policies. Among the two most predominant of these objectives were demobilizing illegal groups and increasing defense spending (Á. Uribe 2003). This new policy of active defense spending was supported by millions of dollars of funding provided by the United States through the 'Plan Colombia.' This makes Colombia the third largest recipient of U.S. aid (Israel and Egypt are the first two). Plan Colombia actively modified the characteristics of the conflict in Colombia. First, armed conflict by all groups intensified migration from rural areas within Colombia to major cities throughout the country. Moreover, second, the intensification of the armed conflict took the war from the rural areas to the interior of cities. The conflict was most visible in Medellin. By 2002, Comuna 13, one of the groups of neighborhoods in the city, was an extreme example of places where conflict (waged among paramilitaries and guerrilla urban groups) that usually had been situated outside of the city was now actively fighting inside of it. In 2002, the national army initiated 'Operación Orión' (Rozema 2008) during
which military and police forces swarmed the neighborhoods of Comuna 13 by helicopter, tank, and troops. For four days, the neighborhoods of Comuna 13 became a battleground. In this single space of the city, the three different armed groups of Colombia fight each other to take control of the territory.

The other policy involved demobilization of illegal armed groups. The first part of this process included 850 Paramilitar members of the AUC Paramilitar group known as Bloque Cacique Nutibara (BCN) giving up their weapons in a publicized ceremony in 2003 (Amnesty International. 2005). The Demobilization, Disarmament and Reintegration DDR process with the AUC, started the second period of the decade that was a mark by a drastic diminution of the homicide rate (2003 to 2008) and consequently of manifestations of violent conflict. The simultaneity of this reduction with urban local urban policies and the DDR process mislead many to link those as the reasons why Medellin experienced this period of apparent peace. This period that now some call "donbernabilidad" that was characterized by the homogeneous control of the AUC over the areas of the city. The end of the relative peace is a result of the end of the DDR process that by 2009, is seen as an ineffective way to control crime and as a policy that have failed in many levels and second as a frontal period of persecution to the leaders of the apparently dismantled AUC. The relative peace period will end with the extradition of “Don Berna” to the US.

![Figure 94. Forced displacement in the city of Medellin 1999 - 2012 Source: CODHES](image)

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22 Donbernabilidad is a play of words that merge AUC Paramilitar and drug lord name Diego Fernando Murillo Bejarano, alias “Don Berna” with the term “gobernabilidad” Spanish for governability. It’s used to depict the period of apparent homicide reduction between 2003 and 2008 and implies the continued control of the AUC over the crime in Medellin (Castrillón 2009). Don Berna is and ex-guerrilla member that work for the narcotrafic under the supervision of the Galeano Brother in the towns of Itagui and Envigado, and that were partners with Pablo Escobar. Pablo will later kill the two brothers in July 1992 when in “captivity” at the “Catedral de Enviado” a jail build to house Pablo Escobar after his surrender to the authorities. (Ramirez 2013)
Post-2008 a new period of criminal organization fragmentation will start. The vacuum of power left by “Don Berna” after its extradition on May 13, 2008 ends a reign of almost two decades as a key illegal armed actor in the city and opens space for competition between the many factions within the by then dismantled but still operational AUC (Díaz 2013), to this phenomena the national police created the term Bandas Criminales Emergentes BACRIMs to differentiate from the previous and dismantle AUC (Samper 2012; Merchan Bonilla and Arcos Palma 2011, 53)23.

Violence in this decade against poor marginalized populations by armed actors become more frequent. There is an increasing number of individual’s families and groups that are forced out of their neighborhoods by the illegal armed actors. The decade starts with a count of 515 recorded internally displaced individuals, and the number will growth by the next decade tenfold to be of 11,401 displaced people bases on the records of the Consultoría para los Derechos Humanos y el Desplazamiento CODHES. Comunas with the largest number of displaced are those that with larger levels of inequality and informality see Figure 94.

Urban Development
This last period is characterized by a series of experimental urban interventions of large scale in poor areas. Beginning with the creation of the first urban public transportation system thru cable (metro cable) in 2002, and the integrated urban projects (PUI) from 2004-2011. From 2003 on Medellín has undergone an internationally renowned urban transformation (Kimmelman 2012) which itself has been part of a controversial nationwide peace process (Bouvier 2009). Implemented under Sergio Fajardo’s term as Medellín mayor (2003-2007) and continued under the next two mayors Alonso Salazar (2008-2011) and Aníbal Gaviria (2012-2015). Internationally and locally, people perceive Medellín as an entirely different place than its most recent violent fame. The city of Medellin is seen as an example of how to engage with conflict and violence thru urban peace process. So many physical and policy initiatives and projects were generated in this period that the city of Medellín has not kept consistent records of the process nor stored the existing records in a single place. Different departments of the city give different accounts of the same process that all came to called ‘the transformation of Medellín.’

The physical interventions of such new political practices had become the center of research of various articles (Blanco and Kobayashi 2009; Calderon 2009; Hernández 2010; Samper Escobar and Massachusetts Institute of Technology. 2010; Kidokoro and International Workshop on Vulnerable Urban Space: Making Community Work 2008). Key from this intervention is the state new quality of projects and how they connect into the informal structure of neighborhoods to reinforce patterns of life and space

23 Fights among leaders within the organization for the control of the “Oficina de Envigado” started. The first fight for succession is between alias Valenciano and alias Sebastián. This fragmentation of the power have a direct relationship to the territorial control of the city neighborhoods and gangs previously controlled by the Oficina de Envigado (or is equivalent the AUC) will be divided between the two heads that are fighting for control of the networks of the organization. Finally this fragmentation of power open space for other competing organization the “Los Urabeños” that in 2008 to challenge the former hegemonic territorial control of neighborhoods and criminal business in the city (Franco and Caputo 2013, 8). The “Los Urabeños” will use the opportunity that alias ‘Valenciano’ is captured to annex its territories and will initiate confrontation with the groups allied with alias ‘Sebastián’ (Monroy Giraldo 2011)
that were established by the residents themselves. This quality measured by the number of architectural awards (national and international) that projects in informal settlements received for the following criteria. First, the new projects’ interconnectivity created by the various infrastructures and public buildings being built next each other, which created a new continuous public urban space. The introduction of effective transportation and economic transportation systems for steep (Andes Mountain) areas that integrated them into the more formal fabric of the city. While schools and recreation areas are the central core of this project, most of these public buildings and infrastructure replaced existent, obsolete or decaying ones. Therefore, their value did not reside in the ability to provide more service (education or play), but rather that now these new education and play spaces look and perform at the same level or better in many cases than another public infrastructure of the formal city (Samper Escobar & Massachusetts Institute of Technology., 2010). Most of those improved schools replaced those initially founded by communitarian organizations.

Medellín is today an example of ‘good governance’ (Gilbert 2006) but different to what happened in Bogotá during the Mockus and Peñalosa administrations. The city had the benefit of already having a developed coverage of public services and a good record of fiscal responsibility. The key of the Medellín projects then was not on an increased ability to collect funds — the city already had a good tax collection record and profits form its companies. The success, rather, was in how the city used their institutions as a way to coordinate spending those resources. A unique example of this new-institutional capacity is the ability to coordinate all initiatives from the municipal branches (Secretarias), along with private and public funding.

From the initiatives of this period, perhaps the most important in the context of physical space of informal settlements was the Proyectos Urbanos Integrados PUI (integrated urban projects). Five PUIs were executed form the 2003 to 2011 (see Figure 95). The PUI strategy cost (with the exemption of the Moravia area) an estimated budget of 130,000 million $Col (75,000,000 SUS)24. They focus on transportation infrastructure, public buildings and public space in critical locations within informal neighbourhoods. The PUI Nor-eastern alone had more than two hundred individual physical projects. For example, Figure 96 shows the interconnection of the projects executed. In this neighbourhood there are three distinct public spaces, a metro-cable station, a business incubator, a state-local bank a community kitchen, the renovation of a new school (I. E. La Candelaria) and a community center and library.

Furthermore, these projects were all built together in the span of two years. A large measure of this projects’ effectiveness is the state’s ability positively to modify the physical public structure of a neighbourhood where the state had not previously had any meaningful presence.

24 (The actual number varied from PUI to PUI) the PUI Center-east PUI cost 30,000 Million $Col and the PUI Center-west (comuna 13) has a cost of 65,000 Million $Col
FIGURE 95 ALL FIVE INTEGRAL URBAN PROJECTS (PUI) IN MEDELLIN FROM 2004 TO 2011. THIS MAP SHOW THE SCALE OF INFLUENCE OF THE URBAN PROJECTS AND HOW DIRECTLY RELATED WITH THE INFORMAL AREAS OF THE CITY. SOURCE: JOTA SAMPER
Also, the opportunity to make these projects in terms of a continuum of a single large urban project had allowed the implementation — simultaneously — of a new network of publicly connected amenities throughout the existing neighbourhoods to create a series of related ‘safe spaces’ for both the community and the state (Samper Escobar and Massachusetts Institute of Technology. 2010). These new areas permit these once isolated communities to maintain open lines of communication with the larger city that are based on physical, human and architectural presence of the state. The new buildings and infrastructure compete in quality and style with the quality of new projects executed in other parts of the city, regardless of socio-economic strata (Estrato) having the potential to empower the communities, which have usually been approached as second-class citizens.

These physical interventions executed along with a number education oriented policies such as increasing student capacity of public education facilities, educational subsidies for the tuition of low-income students, food subsidies for students enrolled in city-run educational facilities, student transportation subsidies, health services and programs oriented to at-risk populations, scholarships for college and a series of events aimed at making the students in all schools more competitive.
TYPOLOGIES OF INFORMAL SETTLEMENT OCCUPATION

A pattern that is visible in this stage is that large scale invasion and informal development start happening on the other cities of the metropolitan area, with weaker municipal governance structures and resistance to corruption. Bello, a municipality north of Medellin, presents the most informal growth in this decade.

While the Medellin administration that the creation of informal settlements has substantially decreased, there is still significant construction outside of the urban perimeter. The comunas where you can see most of it are in comuna 1, 3 and 8. More than ever there is a connection between the informal development and the conflict elsewhere in the country. Entire neighborhoods are established here under the umbrella of desplazados, meaning that entire communities arrive to Medellin and founded neighborhoods informally, as a result, of being forcibly displaced from their rural settings. The hordes of new arrived join mainly the informal market, the DANE estimates that the informal commerce goes up to 51% in 2007 of the entire commerce in the city.

Neighborhoods like "Pinares de Oriente" in Comuna 8 attest to such kinds of development. Founded in 2006 has already developed most of its first-level and its starting its entering into a more mature physical state of informal development the introduction of infrastructure as (water, sewer, energy and the construction of steps as ways of access). This neighborhood population is of around 90% of self-denominated displaced community members.

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25 DANE Gran Encuesta Integrada de Hogares 2001-2007
FINAL THOUGHTS, ON THE HISTORY OF INFORMALITY AND CONFLICT.

Medellin history of informality and conflict are intertwined. This section has showed the distinct features over time of those decades at city-wide scale. Here conflict and violence had been showed as changing result of the influence of the changing conditions of confrontation and the creation of new-perverse markets. Urban informality is presented as a constant over the four decades with different levels of intensity.
ANNEX 2. MAPPINGS OF NSAG LOCATIONS IN MEDELLIN
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLÍN, COLOMBIA (1970-2013)

06

TURF CONTROL AND DRUG SALE SPACE
Invisible barriers, megaplaza and drug dispensing

Source:
Luis Fernando Quiliano, CORPADES
DANGEROUS GANGS

And informal neighborhoods up to 2000s.

Source: Archive of Juan Diego Restrepo, Policía Metropolitana, and El Tiempo.
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970s-2013)

04

MILICIA CONTROLLED NEIGHBORHOODS

And informal neighborhoods up to 2000s

Source: Archive of Juan Diego Restrepo
PARAMILITARY CONTROLLED NEIGHBORHOODS
And informal neighborhoods up to 2000s

Source: Archive of Juan Diego Restrepo
ANNEX 3. INFORMAL SETTLEMENTS HISTORICAL MAPS.
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLÍN, COLOMBIA (1970s-2013)

CHRONOLOGY OF INFORMAL SETTLEMENTS AND SLUMS
1984

Base Map: Year 1970
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970s-2013)

A-02

CHRONOLOGY OF INFORMAL SETTLEMENTS AND SLUMS
1970s

Base Map: Year 1970

Settlements: 1971
Settlements: 1987
Settlements: 1991
Settlements: 1993
Settlements: 2001

Kilometers

310
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970-2013)

A-02

CHRONOLOGY OF INFORMAL SETTLEMENTS AND SLUMS

1964

Base Map: Year 1970
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970s-2013)

A-02

CHRONOLOGY OF INFORMAL SETTLEMENTS AND SLUMS
1970

Base Map: Year 1970
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970s-2013)

A-02

CHRONOLOGY OF INFORMAL SETTLEMENTS AND SLUMS
1981

Baseline Map, Year 1965
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLÍN, COLOMBIA (1970-2013)

A-02

CHRONOLOGY OF INFORMAL SETTLEMENTS AND SLUMS
1955

Base Map: Year 1955
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLÍN, COLOMBIA (1970s-2013)
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970s-2013)
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970s-2013)

A-02

CHRONOLOGY INFORMAL NEIGHBOURHOODS AND SLUMS
From 1954 to 2011

Base Map: Year 2013
ANNEX 4. FIELD TRIP GEOTAGGED SURVEY
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLIN, COLOMBIA (1970s-2013)

A-03
'RECORRIDOS' TOURS BY COMMUNITY MEMBERS
Santo Domingo neighborhood - Comuna 1

[Map showing 'recorridos' tours by community members]

La Avanzada
Interview number 717
Interview number 714
Interview number 700
Interview number 717
Interview number 712
Interview number 713
La Esperanza No.2
La Esperanza No.2
La Avanzada
La Esperanza No.2
La Avanzada
A-03

'RECORRIDOS' TOURS BY COMMUNITY MEMBERS

Picacho neighborhood - Comuna 6

Map showing areas of interest in the Picacho neighborhood.
PHYSICAL SPACE AND ITS ROLE IN THE PRODUCTION AND REPRODUCTION OF VIOLENCE IN THE "SLUM WARS" IN MEDELLÍN, COLOMBIA (1970-2013)

A-03

'RECORRIDOS' TOURS BY COMMUNITY MEMBERS

Independencias neighborhood - Comuna 13

Interview number 726
Interview number 725 and 735

Las Independencias

Interview number 708

El Corazón
A-03

RECORRIDOS TOURS BY COMMUNITY MEMBERS
Villatina neighborhood - Comuna 8

[Map of Villatina neighborhood showing various interview numbers and gang territories.]
Rhetorically, people often make a tacit linkage between the spaces of urban informality ("slums"), crime and violence. This occurs in academic circles—as exemplified by the common occurrence that when researchers seek to understand urban crime and violence, they tend to study urban informal spaces (slums, favelas, barriadas, tugurios). However, it is clear that a direct correlation between conflict and informality does not automatically exist. What does exist is evidence that spaces of informality present challenges for formal (state) security actors to assert and maintain their Westphalian monopoly of violence. Conversely, informal settlements present advantages for non-state armed actors to deploy and exert power and coercive force. This research here argues that, at the core of this contradiction between state disadvantage and non-state armed actor advantage over the control of security and governance, (physical) space clearly emerges as an important variable to study.

This study then asks: What roles does physical space play in the conflict—that is, in the production and reproduction of violence—in informal settlements in Medellin? Understanding this would shed light on important phenomena about state and non-state control of informal settlements all over the world. This research looks for ways in which space has played a role in the ongoing urban conflict in the City of Medellin over the last forty years. I look for intersections between two parallel longitudinal studies I have conducted. (1) One study analyzes the physical evolution of Medellin's informal settlements to map critical inflexion points in the production of urban forms. I also map how these urban forms evolved over time. (2) The second study is an ethnographic study of people's perspectives on their experiences with the evolution of such spaces. I then map their stories of building, rebuilding and urban conflict and merge this with the map of urban forms in the first dimension of my study.

The research reveals that time and space in informal settlements do indeed change in prescriptive ways (stages). These stages of development are each marked by singular forms of conflict and violence. Here I argue that physical space plays a fundamental role in the way armed conflict happens in informal settlements. Physical space, which involves all actors in the conflict, impacts armed conflict in two distinct ways. Physical space (1) becomes a form of spatial conditioning that tailors actors and conflict and (2) creates and reinforces conditions unique to informal warfare strategies.

This research suggests that we need radical changes in the way urban policy and projects are framed in the context of urban informality. It suggests that we need to consider this framing of informality in nations such as Colombia, in which there is a weak state fighting these types of new wars with asymmetrical adversaries on urban terrain and in which informality and criminal armed groups act. Pro-informal settlement policies and procedures could provide more stable and secure environments in informal settlements than the current tactic of massive expenditures on security in an ongoing asymmetrical warfare.