

THE INCOMPLETE

Submitted by Joseph Francis Wong
Bachelor of Arts with a major in Architecture
University of California at Berkeley
May 1991

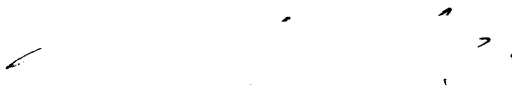
To
The Department of Architecture
School of Architecture and Planning
in partial fulfillment of the requirement for the degree of
MASTER OF ARCHITECTURE
at the
Massachusetts Institute of Technology

May 7, 1993

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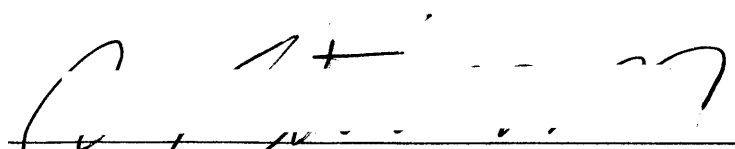
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May 7, 1993

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Wellington Reiter, Assistant Professor of Architecture,
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Departmental Committee for Graduate Students

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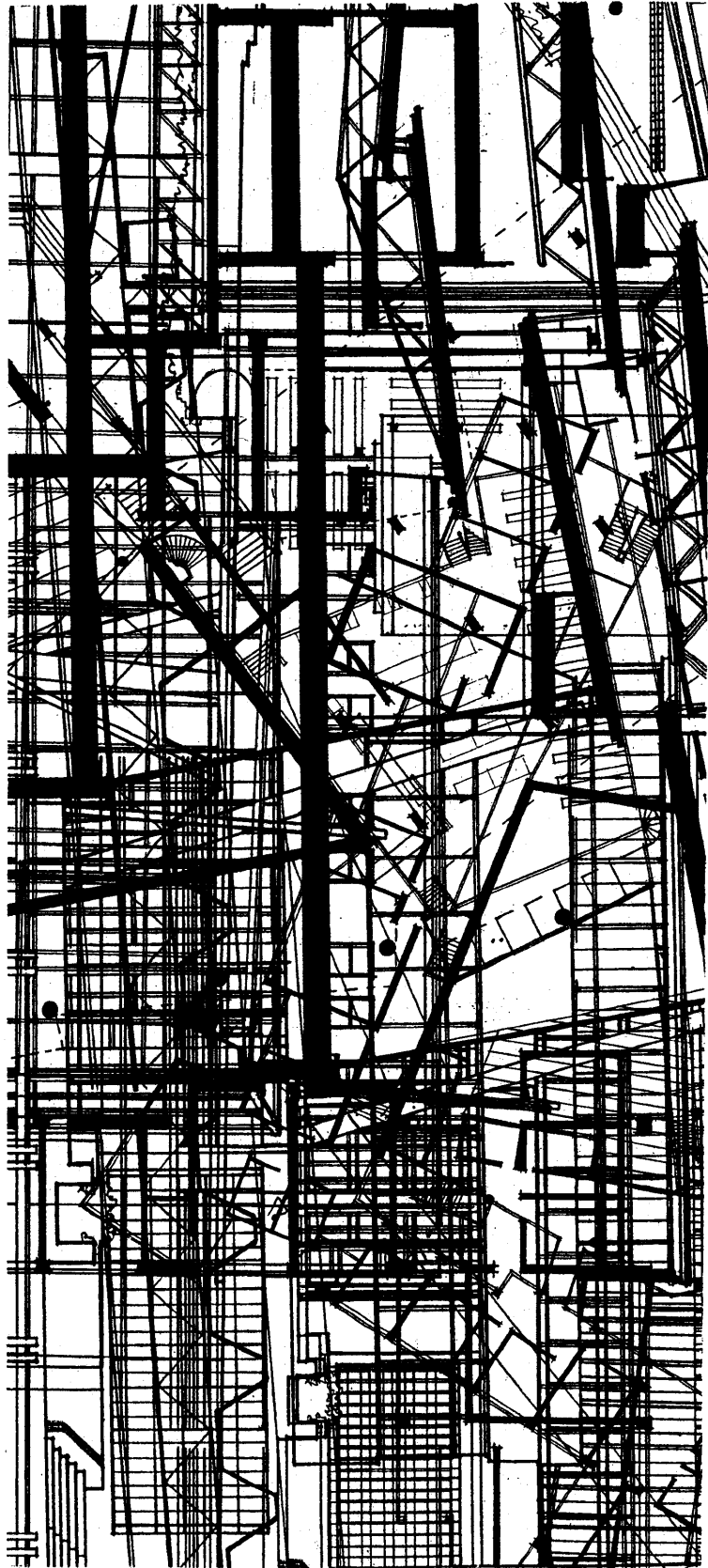
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Abstract

Alienation in the built environment can happen in two ways: 1. When man cannot relate himself to his immediate surrounding (for example, the structure he is in); or 2. when the place he is in does not relate to the larger context. Both of these are issues of continuity, or rather, the lack of it, in our physical habitat. At present, the majority of buildings going up are mostly composed and conceived as self-contained/complete entities, that they are coherent wholes standing on their own. Often, the design of such buildings pays little or no attention to their relation to the surrounding. As a result, these buildings excludes reciprocity, and hence continuity, in the built environment. This investigation attempts to address this condition by introducing a set of strategies and (more importantly) ways of thinking that might lead to (re)building continuity in the built environment.

Thesis Supervisor Wellington Reiter
Title Assistant Professor of Architecture



THE INCOMPLETE
Building Beyond Buildings



Acknowledgments

Thanks to **Duke**, for putting up with all my strange ideas and being critical throughout.

Thanks to **Tom**, for all his invaluable advice and insights and for introducing me to new ways of thinking in architecture.

Thanks to **Kristen**, my "cell" mate, for sharing an office with me, and to my classmates for being a great group.

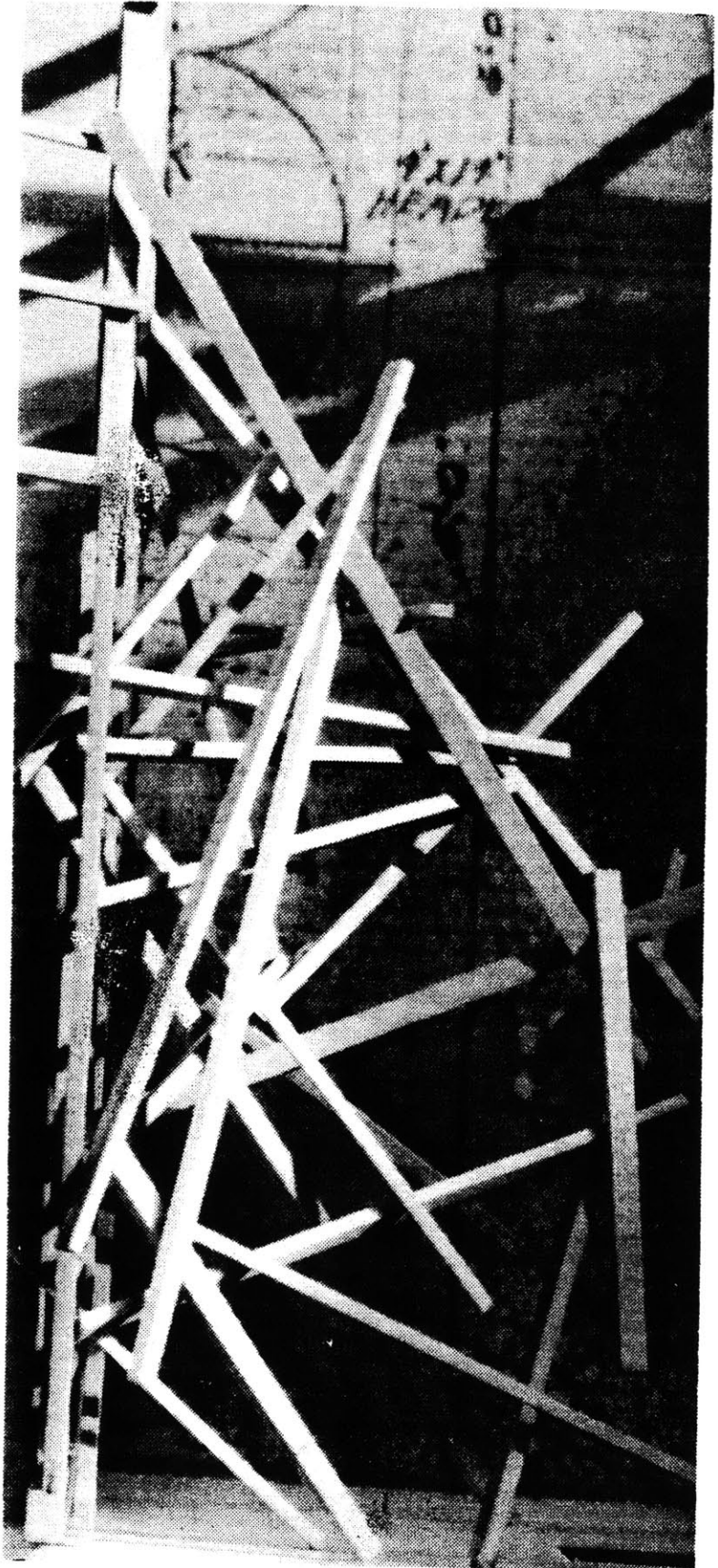
Thanks to **My mother**, for her love and support from the very start, and to **Stacey**, my brother, for having so much confidence in me and saying, "I'm not surprised at all that you got accepted by MIT!"

And especially,

Debble, for being the inspiration behind all this.

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FRAGMENTS

The reader is a virtual creator...[The writer can only] offer instruments for study, a collection of references...What is transmitted is not "ideas" but "language"...forms which can be filled in different fashions.

The pleasure of the text is that moment when my body pursues its own ideas -- for my body does not hve the same ideas I do.

Roland Barthes *The Pleasure of the Text*. New York: Hill and Wang, 1973.

The text is composed of fragments that relate only loosely to one another. These fragments - geometry, mask, bondage, excess, eroticism - are all to be considered not only within the reality of "ideas" but also within the reality of the reader's spatial experience: a silent reality that cannot be put on paper.

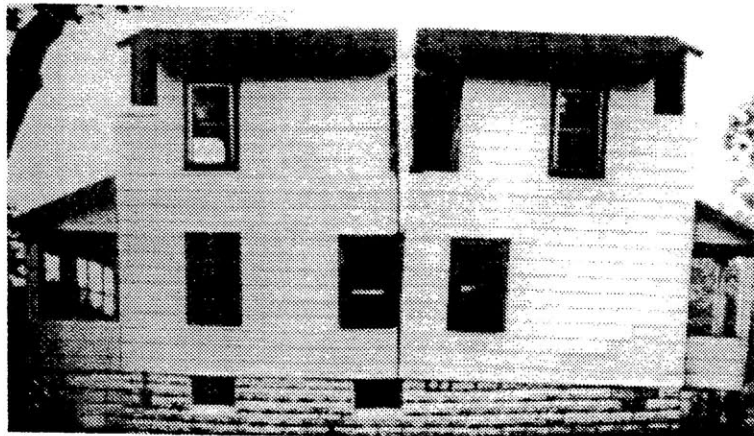
Fragments of architecture (bits of wall, of rooms, of streets, of ideas) are all one actually sees. These fragments are like beginnings without ends. There is always a split between fragments which are real and fragments which are virtual, between experience and concept, memory and fantasy. These splits have no existence other than being the passage from one fragment to another. They are relays rather than signs.

These fragments are like sentences between quotation marks. Yet they are not quotations. They simply melt into the work. They may be excerpts from different discourses but this only demonstrates that an architectural project is precisely differences find [] expression.

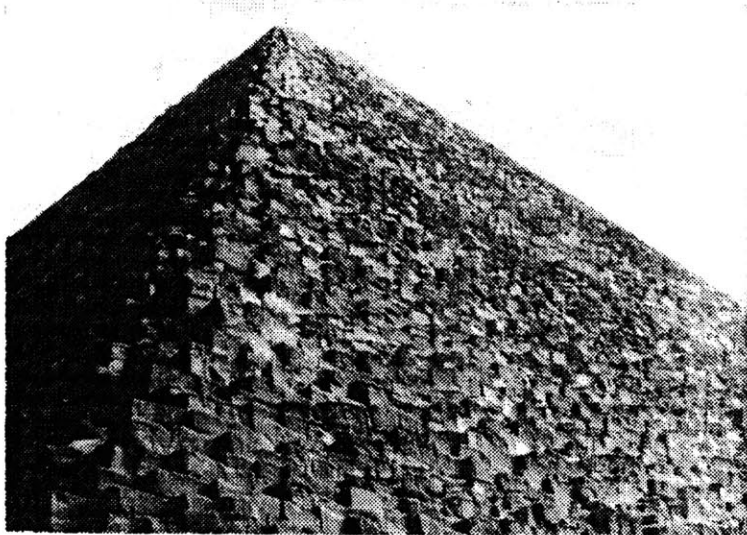
Bernard Tschumi Text 5: Questions of Space

Fragment I Contradictions¹

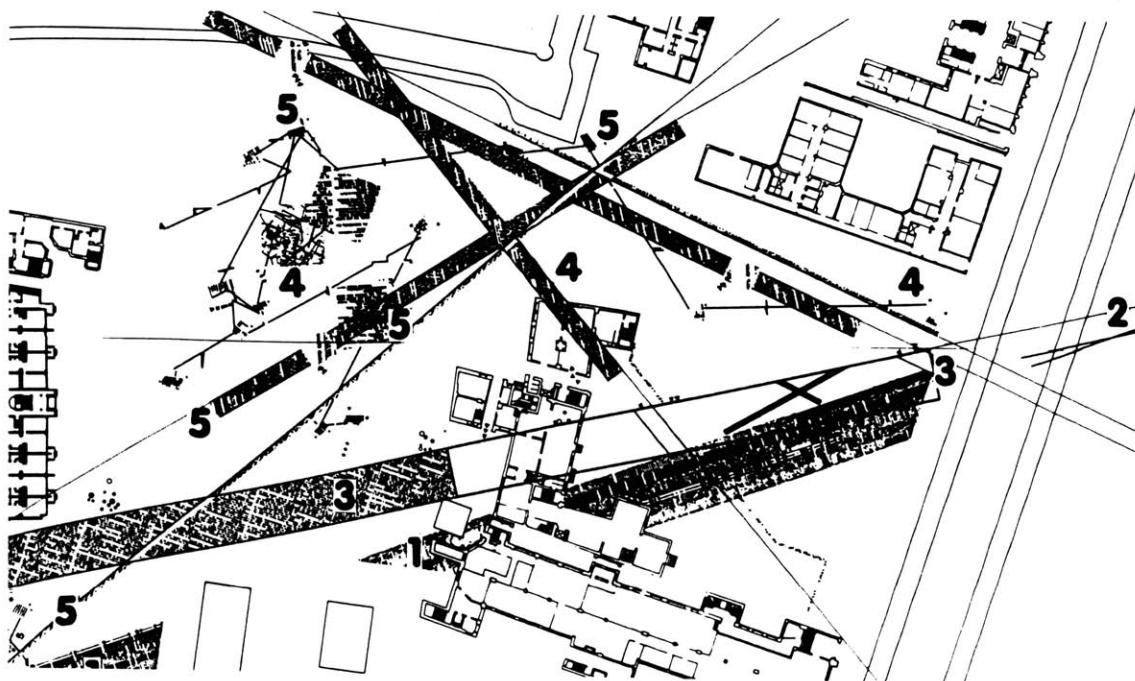
It is a common practice in architecture to credit/invest the work of building with coherence/completion/individualization, that it is mostly being composed in isolation of, or with little connection to the higher levels (its context). If there happens to be irregularity in the street system surrounding it, running in several non-perpendicular, non-parallel directions, a set of paths that do not necessarily follow a single logic, existing site dimensions that cannot be put under one system, then they all seem to be subordinated to something of lesser importance. It is



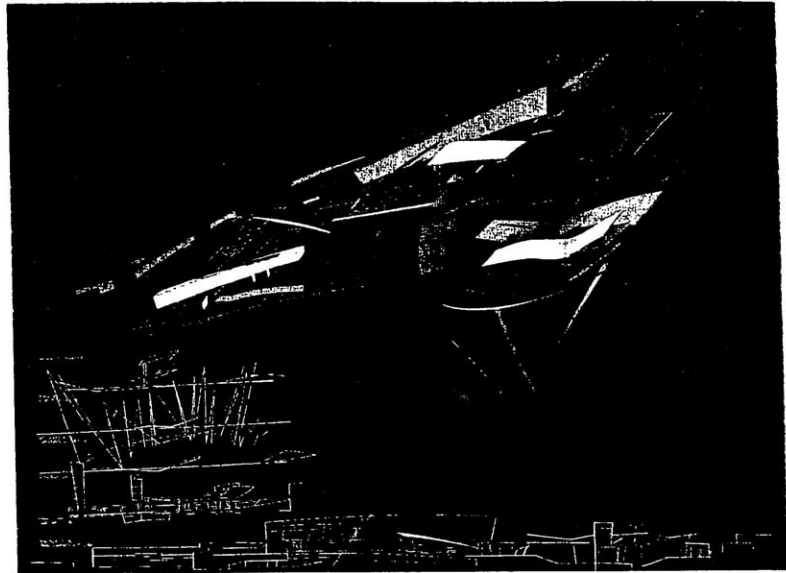
the work itself as a coherent unit that draws the most interest. After all, when designing a building, the architect is most likely not responsible for anything that lies higher than the building level; his involvement is limited to satisfying all the programmatic requirements at that level only. The differences/incompatibilities are all givens already existing and he has no power, not to mention obligation, whatsoever to resolve them. His job is therefore to establish at the building level a coherent organized unit which follows a prescriptive



order throughout. And historically, somehow, this notion of *coherency* became a central theme in architecture. All buildings are conceived and evaluated as coherent wholes in and of themselves, that all "good designs" should manifest in their various configurations a consistent ordering principle. However, the building is not an isolated entity. It constitutes only one of the many levels that make up

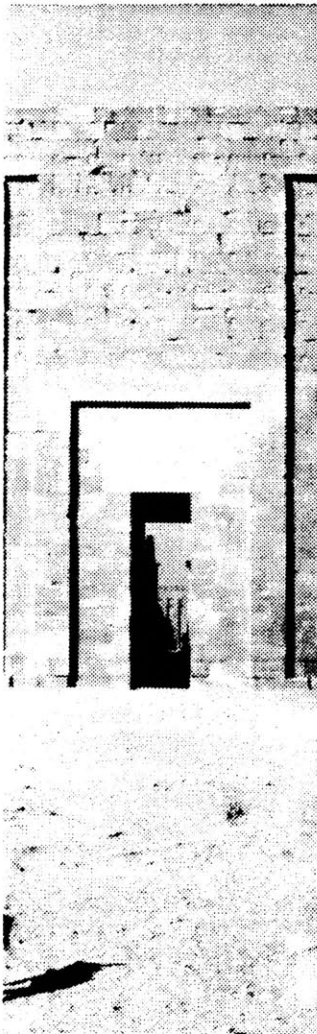


our built environment. The definition/delimitation of a building relies on its relationship with the various configurations of the different levels and is therefore never clear-cut. It is caught up in a system of references/registration to other buildings, systems of paths, street patterns, recurring sizes: it is a node within a network. And this network of references in no way remains static; it changes both in time and place.



The delimitation, or *framing*, of the building, even in the sense of a group of relationships, cannot be regarded as identical in each case. The extent of architecture is therefore relative and variable: it depends on the relation to references and registrations that varies from place to place and from period to period. In most cases, these references and registrations often appear independent or even incompatible/contradicting.

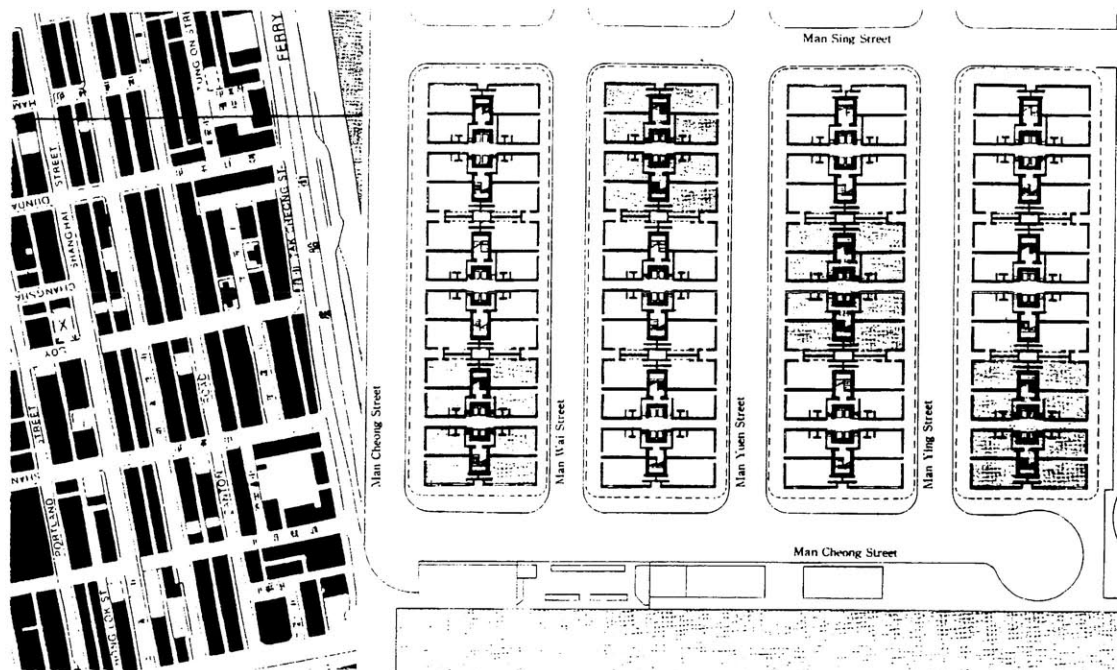
Fragment II



Open Architecture / Levels

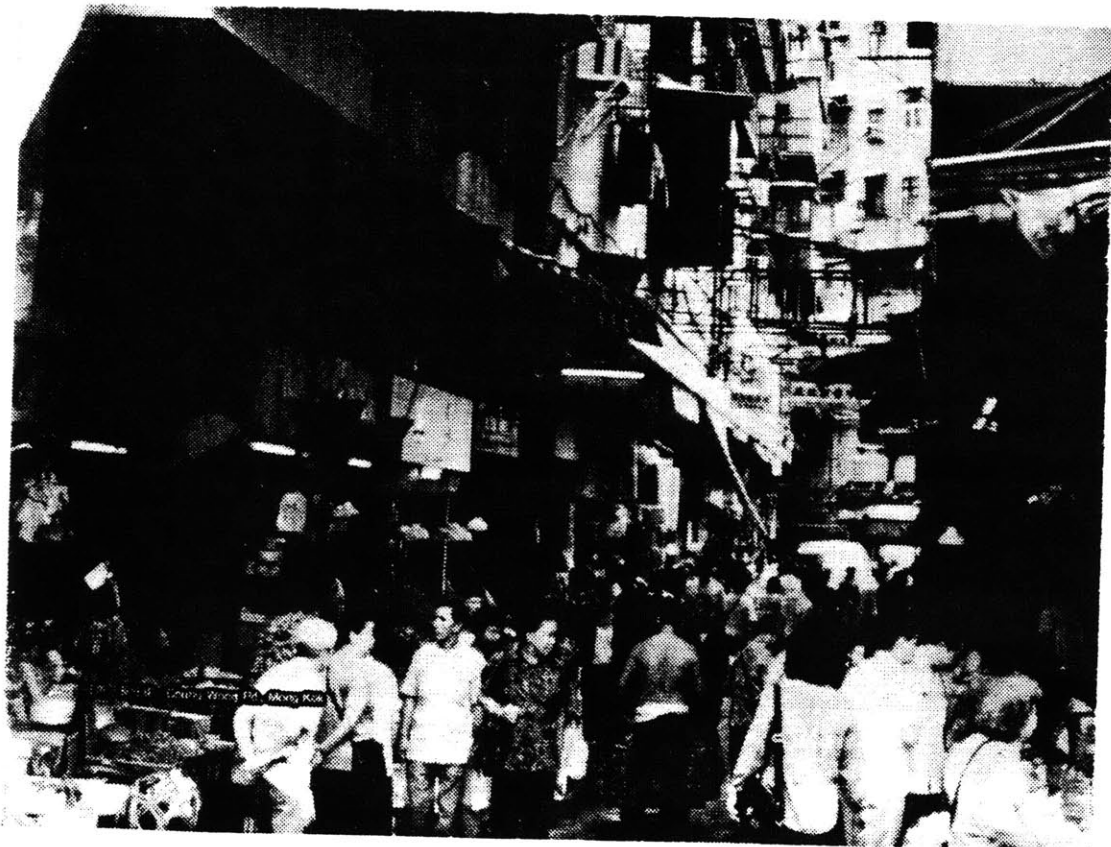
Architecture should, by no means, be limited to the physical construction and the activity we call "building"; it has a much wider and bigger scope (encompassing a whole range of activities, both mental and physical). We must question the very *unity/totality* of "building" and re-evaluate the coherence of this very grouping of built elements and/or spatial constructs that we have become to accept from the outset. At first sight, the validity of this unity would seem readily recognizable, that there is an absolute physical boundary separating the *inside* from the *outside* -- whatever lies inside this boundary constitutes the parts that make up the whole and those outside belong to some other unity alien to this whole. What clearer distinction does one need? There is a definite delimitation of what is and what is not. Or is there? As soon as one starts to scrutinize the matter ambiguities begin to arise. Take the case of a room "inside" a building, doesn't it also have an absolute physical boundary just like the building? Isn't the unity of the space it occupies even more determined than that of the building, which, after all, is

divided up into rooms and various access space. How then does the *unity* of the room compare to the *unity* of the building? Or, instead of coming down a scale, we go up a scale: How about the city block? Is its boundary not also given in the most definite way? And on and on.

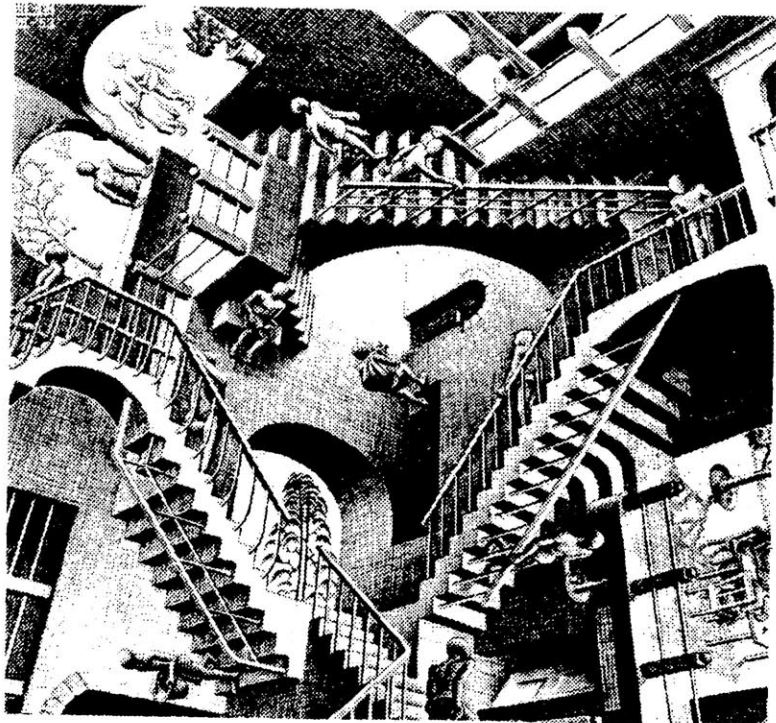


Put another way, we can look at this problem in terms of the issue of *inside/outside* in architecture. When architects design a building they often speak of connecting the inside of a building to the outside, or establishing some kind of continuity between/from the inside and/to the outside. And the tool they rely on mostly is the addition of some sort of in-between space straddling the two zones they designated inside and outside. But precisely by thinking in terms of an "inside" and an "outside" - the binary opposition inside/outside - one is already mentally separating the two zones that lie on opposite sides of a wall (or any

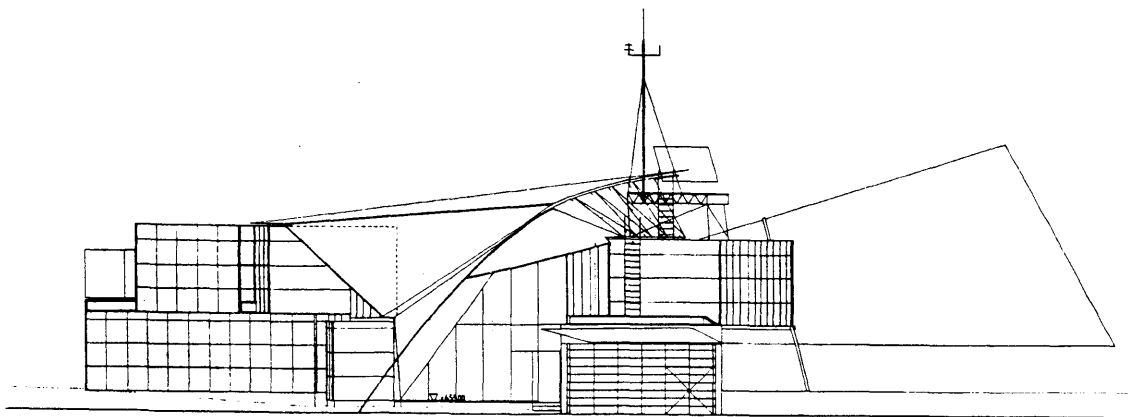
kind of containment). By giving a name or notation to something means one has distinguished it as other-than-self, thus marking the full entry into a (symbolic) order/understanding prescribed by that name which in turn fashions our comprehension/conceptualization accordingly. Therefore, by naming the two adjacent zones "inside" and "outside" one is already preoccupied with the idea of an opposition and a subconscious separation takes place whenever issues concerning inside/outside are being considered. And because of this preconception, attempts in reversing emphasis or pacifying this opposition would be nothing more than a notional gesture, a reversal or collapse that leaves the separation still very much in place without beginning to shift the conceptual ground wherein its foundations are securely laid.



To tackle this problem we need a new naming device, and the idea of *levels* is introduced. Levels can be loosely defined as spatial definitions of different scales one moves through when experiencing the built environment. When one walks from his own room out to the common living area we can say that he moves from a lower level space *up* to a higher level one; or go *down* a level when moving from the street back into his house. The designation of levels are relative: the house is the higher level relative to the rooms in it but is the lower level relative to the street block. One can therefore move in two ways. Movement can either be *horizontal*, moving from space to space on the *same* level, or *vertical*, moving from a space of one level to one of a *different* level. Vertical movement can be up or down. The notion of levels does not only apply to physical movement from one



space to another but can also be useful in terms of the description and consideration of form and space. Any element in the built environment, be it a building or the whole street block, can be conceived (and perceived) as a result of the selection and assemblage of parts. A building can be described as a collection of rooms and the street block a distribution of buildings and the residue space between them. Hence, a *configuration* of components from/on one level can be an element on another that is higher and, conversely, the form of an element is a configuration of a lower level whose components build up that element.² (A configuration of rooms makes a house, where "room" is a component/element of one level and "house" another which is higher.) This whole concept of building involving configurations, elements, and levels of course in no way resembles that of the actual construction process of the built environment. It does not necessarily need to be. The notion of levels represents a way of conceptualizing space without a presupposed separation. Space are now defined in the various levels - one building up to the other - and the built environment is the continuum these levels assemble.

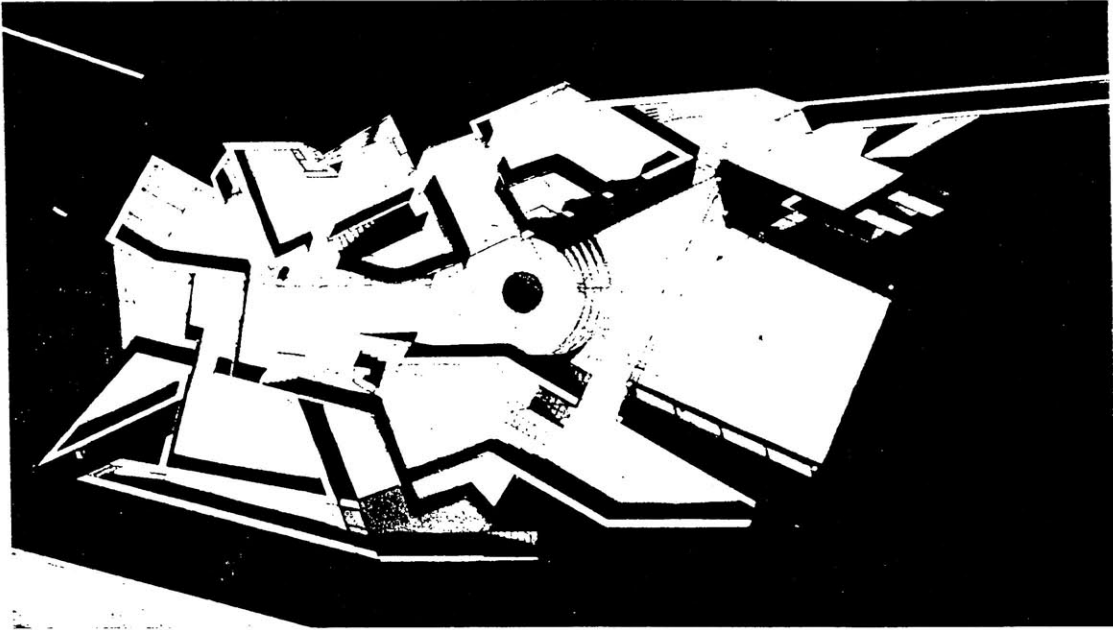


Fragment III (Dis)order / Pieces

In the "text" part of this document, it is the author's intention that there is a lack of a rigorous overall conceptual hierarchy (over-riding general order) governing the structure of this investigation. However, there is, of course, a physical order in the formatting of this document. But this *imposed* order, in a lot of ways, does not reflect much about the investigation itself. The traditional way a paper or a book is composed - the all too familiar introduction-content-conclusion form - is discarded in favor of a new one. Unlike traditional polemical literature, the constituents parts of the text do not follow any logical sequence to form a coherent *main* argument; in fact, the sections can hardly be said to be any kind of sequence whatsoever. Any section precedes or follows another section no more than any of the remaining sections precedes or follows that same section. The sections do not necessarily proceed linearly as the placement of them might suggest. The only reason they are placed one after the other linearly is because of the limitations of publication and writing (or could this be *domination*, for the rules of language dictated their form). Whereas the rules governing the structuring of the texts are mostly ignored, the same cannot be said about those concerning the appearance of these texts. The texts cannot be, after all, presented in a way such that all or some of them appear simultaneously and bears no inference of any linear hierarchy of ordering as in conventional practices of publication. In a sense, the texts which are no longer governed by the rationality of an academic paper is now governed by the

rationality of written language and typography. In terms of content, however, the paper becomes but a juxtaposition of texts with no perceivable ordering, more or less like a collage of texts. None of the texts occupies a more privileged position in the overall structure than any other. The general configuration of this paper is a collage of pieces that - theoretically - can be read in any order. Like a jigsaw puzzle, each piece that together form the structure is not defined by what comes before or after it nor does it gain its significance by what position it occupies in the whole. Each piece is what it is by virtue of its relation to every other particular piece, albeit being unrelated and related. They are not related by ordering but related because each text is explained by every one of the texts and is in turn involved in the explanation of every one of them. This text is put together in such a way so that one can cut into it at any intersection point. This is possible because one could start anywhere as there is no starting point. And since there is generally a lack of any kind of linear order, one does not have to follow any specific sequence in reading the texts. Hence, one should be able to jump and begin anywhere - the first section, the last one, or any one text in between - and it makes no difference. One should be able to read the text in any order other than the printed/presented one as well as start with any text, even starting with the last text and proceeds backwards back to the first one. No text has immediacy over another and thus making it possible to mix them around. This text is divided into pieces and should be so taken, but the pieces can be had in any order and the text still remains valid. What is

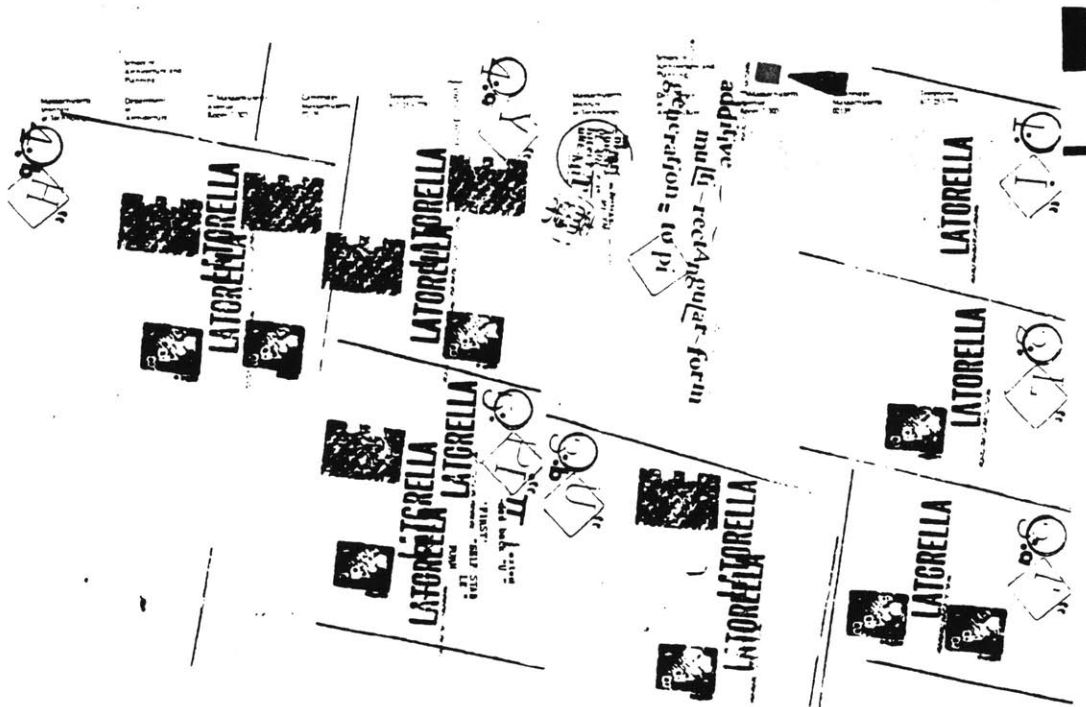
important lies not in the fragments themselves but in the possible interpretations one reads into the relationships between them.

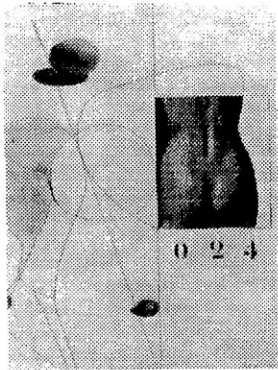


Fragment IV Incomplete

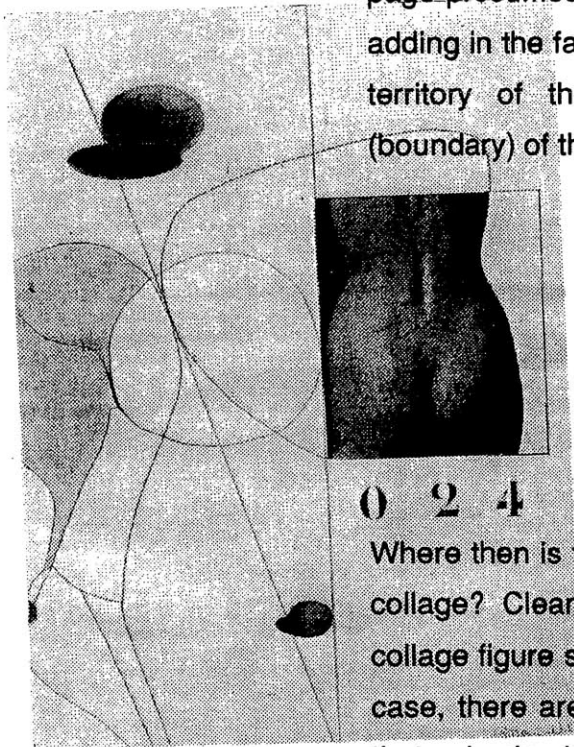
The concept of the incomplete resembles that of collage, which can be loosely defined as an assembly of fragments. But there lies one fundamental difference. Collage depends on the juxtaposition of (arbitrary) fragments into / of an imaginary greater whole. (Here "collage" does not refer to Maurice Smith's notion of "collage", to which the concept of the incomplete is very closely related to. Smith defines "collage" as follows: "Not the insubstantial collage of paper gluers or theatrical revivalists, but additive collage in the sense that each different family of form and each method of building is sufficiently self-stable to exist in its own right. The realization of the complex at any given phase must still be coherent. The processes of building can be intrinsically understandable , self-stable, but not complete.³⁾ The

incomplete on the other hand does not imply nor entail a unified whole. It is not an end / whole in itself. In fact, it is this para-unity that characterizes the incomplete. (The Oxford English Dictionary gives the prefix "para" the following definition: "As a preposition, para had the sense 'by the side of, beside,' whence 'alongside of, by, past, beyond,' etc...". Para-unity therefore indicates something like a unity turned against itself, pushing beyond itself - one not content to remain within the area / domain defined by the unity. Para-unity represents an approach to which architecture is dynamic not static; an architecture in which unity does not mandate a determined boundary nor have a fixed definition.) Put another way, we can say that whereas a collage can be complete or incomplete formally it is nonetheless conceptually



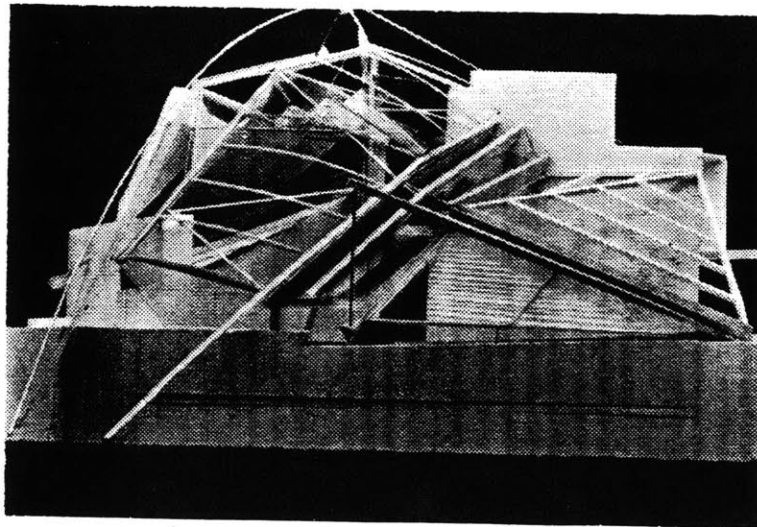


complete. It is closed. The presence / materialization of the collage signifies a finished product, the result of the termination of a (process of) making. The incomplete, like a collage, may be formally complete or incomplete, yet conceptually open-ended and relies on its definition something other than itself, something "external". The completion of the incomplete requires the partial union of its separate elements among themselves and with elements "outside" its domain. Take the "collage" below for example. By transcending the frame of the collage (protruding beyond the rectangular boundary of the space on the page presumed to be designated for the collage), and adding in the fact that this text itself is running into the territory of the collage, the point of completion (boundary) of the collage is now put into question.



Where then is the demarcation of the boundary of the collage? Clearly not just the rectangular outline of the collage figure such as that of the top collage. In this case, there are parts of the collage reaching beyond that simple boundary and because of the few overlapping lines of writing, the text becomes one of the elements making up the collage - the text running into the collage is clearly attaching the text on this page as part of the collage. How about this page then? That is also questionable as the text on this

page is only part of this section labelled "Incomplete" which continues from the page before this one and runs onto the page after and, furthermore, this section as a whole is, in turn, related to, and hence bound up, with other sections of this thesis. Even the thesis, or the booklet, itself cannot be looked upon as a coherent whole because of the various outside referents in which the thesis relies and refers. It is through a kind of marriage, both intra-level and trans-level, of apparently disparate elements that relationships and meaning are generated. Incomplete architecture therefore refers to a state of incompleteness that may or may not be formal, but is always conceptual -- not that a work lacks internal unity, but that a work is never intended to be perceived as a whole/an end by/in itself. The incomplete operates in a state of constant making, of



indefinition. (If one's consideration is not limited to a single level) Its conclusion / completion is always in flux, forever deferred in a chain of referents spanning different levels. The concept of the incomplete also implies the possibility of the condition of simultaneously accommodating a collection of differing ordering principles. A singular order throughout a work subordinates the various parts under an illusion of a whole, turning attention inward and away from the extra-work referents; it begins to draw definite boundaries. It unifies. A single dominant order is therefore violently working against the concept of the incomplete. This calls for the incorporation of a complexity of order in a work.

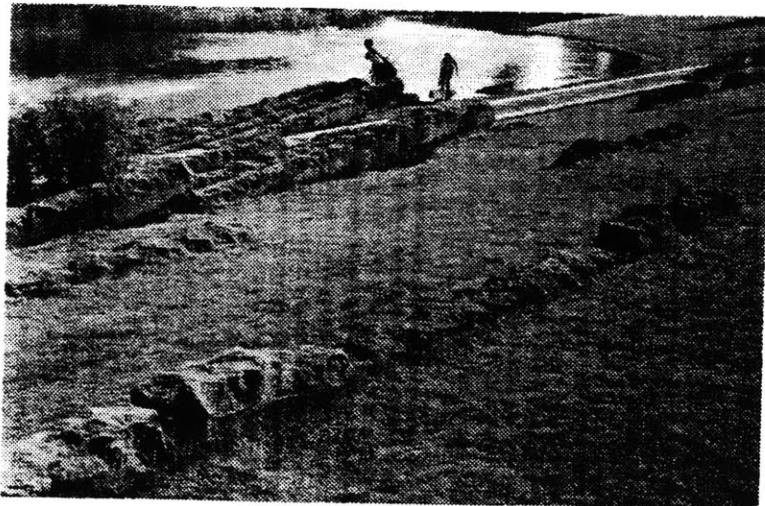
Fragment V



Nature

(A few thoughts on nature inspired the beginning and a significant part of this investigation)...One of the very first dwellings was the natural and man-made caves human beings took on as shelter from the natural elements. However, such a dwelling form in no sense brings about the reconciliation of man and nature; by retreating into a cave, man flees from nature instead of adapting it to his existence. (The modern building in the form of glass boxes and concrete blocks is becoming more and more "cave-like" in this respect -- that it is by and large conceived as a physical boundary or buffer separating man from the natural elements, imprisoning him in an air-conditioned, fluorescent lit cell that is hermetically sealed off from the outside world. A world that became *outside* only because of an imposed boundary -- the building itself.) But to serve that

existence we must ourselves complete our environment, not by setting up boundaries and separate compartments of space, but by supplementing the natural contrast of unlimited solid and void with a continuous field of interrelated spatial definitions. This way, architectural space must be seen as an addition to natural space whereby conflicts between it and the prerequisites to our activities is overcome. This container of human activities is however not a physical addition, instead, it entails articulation of and modification to nature by which natural space is completed and made habitable for us.



Architecture is the *supplement* to nature. (In Truth in Painting, Jacques Derrida explains his idea of *supplement* as something that is not the mere supplement or optional feature that may or may not be added as required, but a *supplement* is also that which is required to complete or fill up some existing lack, some hiatus in the present order of things; that it induces change.⁴)....Architectonic space owes its definition to the presence of containments/enclosures (partial or complete) which bounds the space from

without. By contrast, the space that we experience and relates to gets its definition from the extent of our various activities, which determines its boundaries from within. And precisely because they are diametrically opposed they are able to complement/supplement each other exactly: the containments/enclosures, which seem to divide us from natural space, in fact enable the space of our experience to be assimilated into the greater space, so that through the medium of the building we are able to bear and inhabit the space in all its vastness.

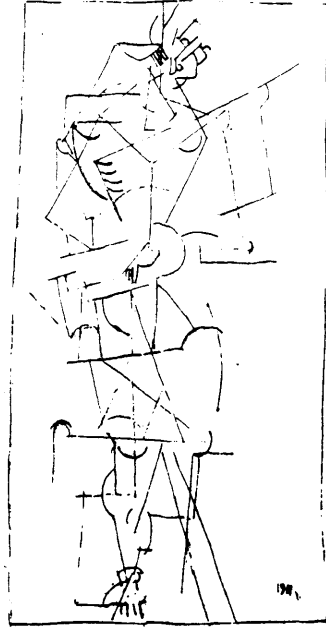
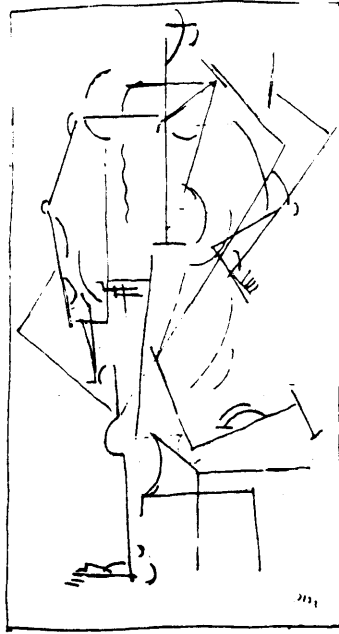
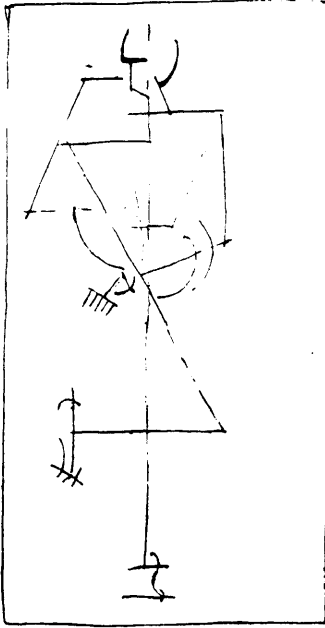
Fragment VI Complexity



Christopher Alexander in The Timeless Way of Building writes,

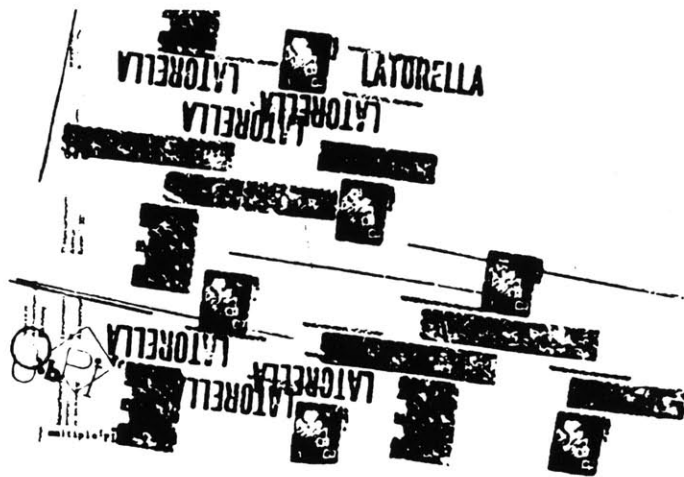
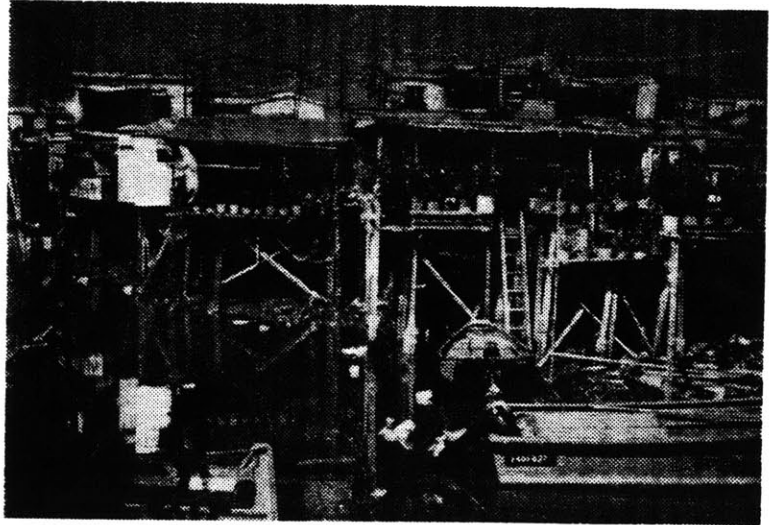
(Differentiating Space) Within this process, every individual act of building is a process in which space gets differentiated. It is not a process of addition, in which pre-formed parts are combined to create a whole: but a process of unfolding, like the evolution of an embryo, in which the whole precedes its parts, and actually gives birth to them, by splitting.⁵

The embryo develops by continuous doubling and differentiation from a single cell at the very beginning into a much more complex multi-cellular living being. Its development marks the transformation of a simple / singular order into not just another order, but a multiplicity of complicated *orders*, each having its own specific functions and structure. Although "the whole precedes its parts," this so called "whole" is only a whole with respect to the starting point and not to the subsequent stages of development. It is no longer



recognizable as a coherent whole in and of itself as soon as the early stages of self-splitting passed by. The "parts", on the other hand, do constitute a whole, but this is not the "whole" we started with, but a much larger and more complex whole within which these different parts interact and support the whole. The original "whole" is therefore only a generator, one that generates complexity from simplicity / singularity; it itself degenerates in the process of bringing about the parts. Similarly, the development of a work of architecture can also be the same sort of transformation from a simple origin to a more complex being. One might start composing elements with the aid of a simple orthogonal grid at the early stages of design, taking certain usable size as the reference unit. But as the design evolves the simplicity of the repetitive grid becomes more and more restrictive, greatly limiting the possibilities of the design. At this point, one should feel free to break away from the monotony of the grid and explore the potential of the design itself. The capacity of any organizing device

employed in designing is always limited, but by no means should it also be limiting. (Another analogy is that of the game of chess. The game starts off with the two sides' pieces arranged in a very orderly fashion on the playing board [which is of course a simple grid] and requires a relatively low level of understanding. But as soon as a few pieces are moved around, the situation becomes more complicated. Each piece has an impact on the squares on the board in its own unique way and creates a complex network of relationships on the playing surface, with pieces from its own side and the

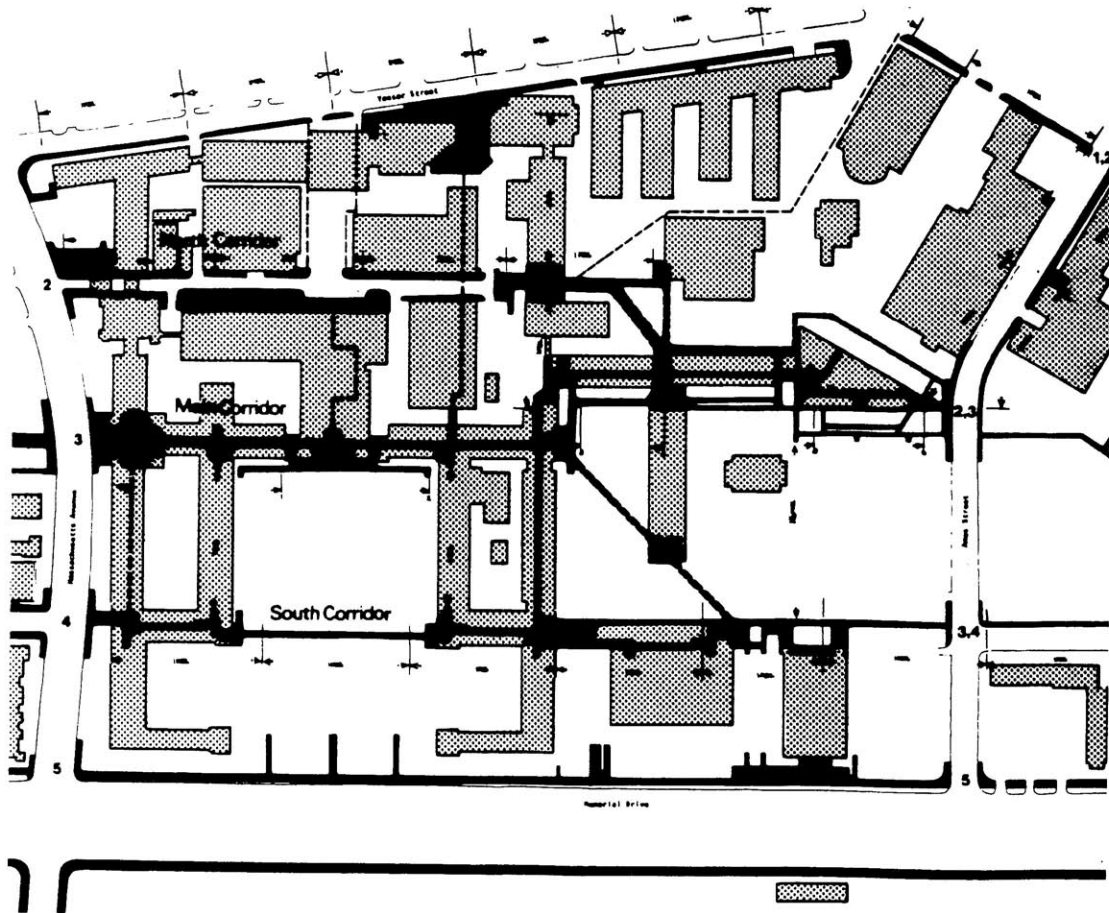


opposition's. The game of chess is thus about a constant moving away from the simple, inert original position as a process of establishing relationships with the opposition's pieces as well as empty squares on the board. In the same way, architecture should be about turning outward and relating to the various systems already present in the larger context, not turning inward and relying on a simple/single internally imposed ordering principle. A building should therefore manifest in itself the continuation of these systems into its domain. And because of the present pluralist condition of our built environment this inevitably leads to an architecture of complexity, not a complexity resulting from random selections (chaos), but one that follows from building continuities.

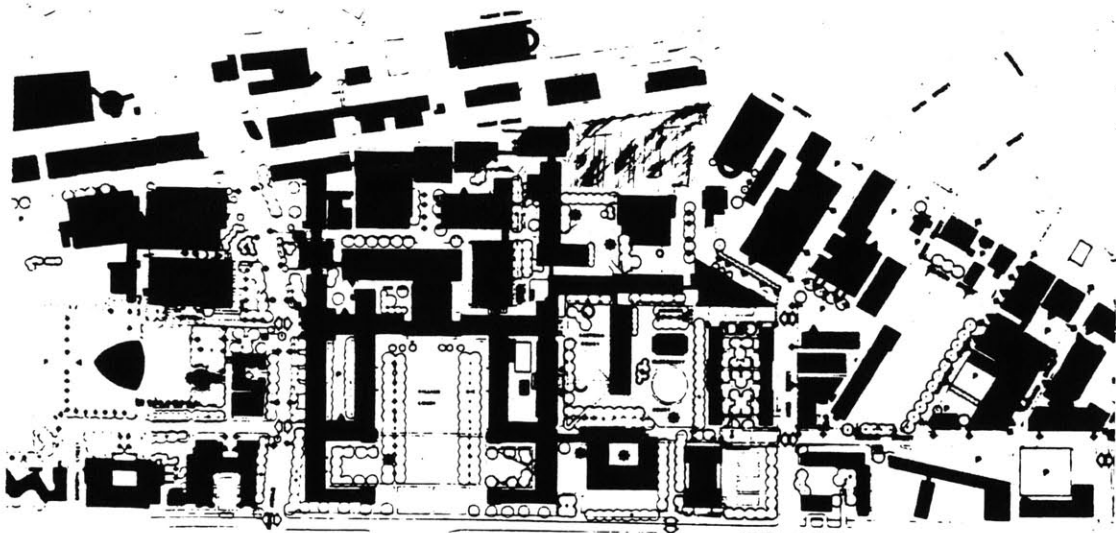


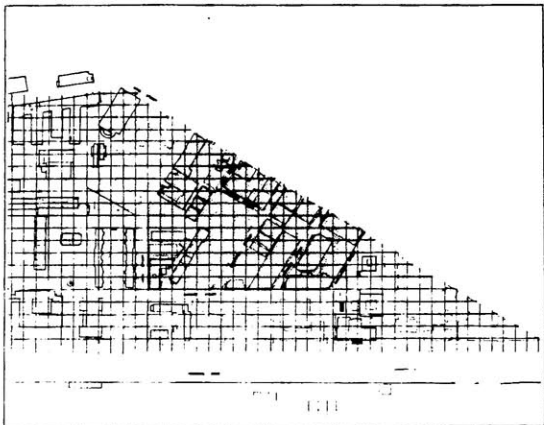
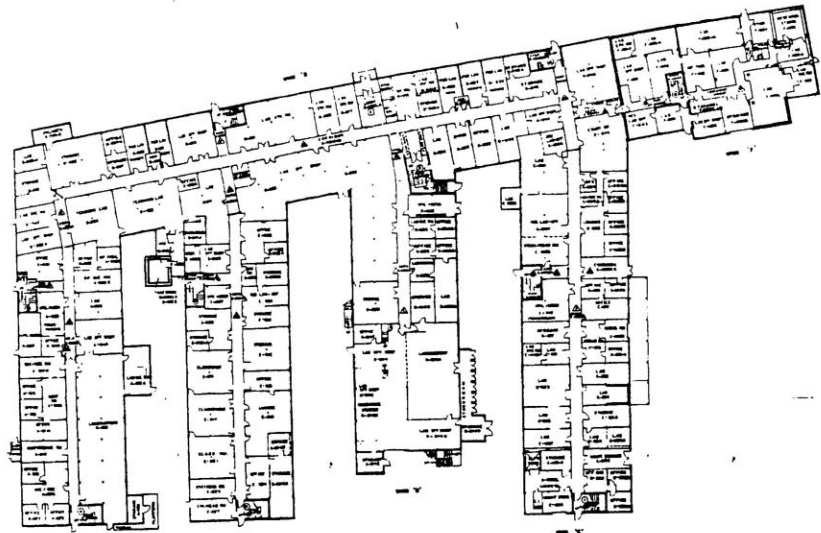
MORE FRAGMENTS

Site The site is located on Vassar Street in the eastern part of the MIT campus in Cambridge, Massachusetts, where Building 20 now sits. The total site area occupied by this three storey wooden building is roughly 120 000 square feet. The scope of this thesis is limited to the western portion of the site. The site is chosen because it lies at the fringes of the campus, where contact with the urban fabric begins to take place. It is a place where conflicting conditions run into each other and attention has to be paid to the confrontation of these differing factors. The existing building, however, does a very poor job in recognizing and reflecting the different systems acting on the site. For example, it is in this region where the campus grid

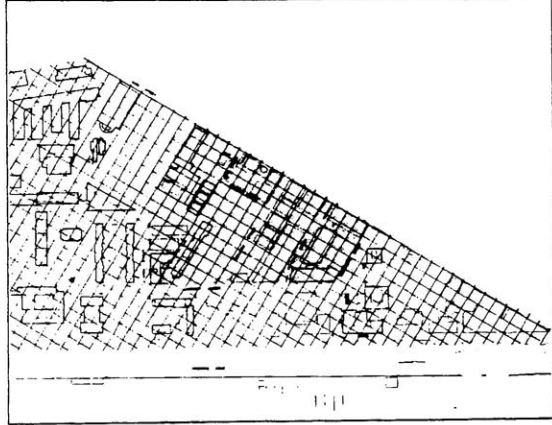


and the city grid meets, thereby raising interesting questions concerning the nature of the building in terms of how the two systems interact. One might argue Building 20 is responding very strongly to the hard edge formed by Vassar Street, which runs at an angle to the orthogonal campus grid. But erecting a three storey high vertical wall is not really responding to the presence of the street as it discourages any kind of exchange between street and building. Another criticism is the building's total disregard for the movement / access running in and out the site. By blocking off most of these movements and not providing / being any kind of stopping place, it breaks up the continuity from the campus into the site and therefore results in the separation of this part of campus from the larger urban context. By (re)building these movements and recognizing the various conditions influencing the site, this place has the potential to become MIT's gateway to expansion / integration into / with the urban fabric.

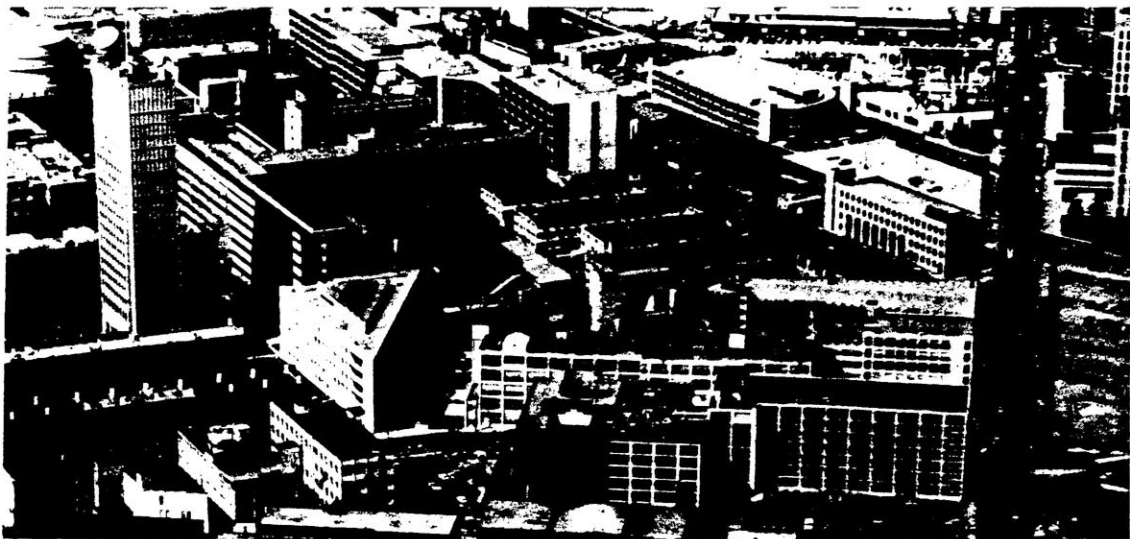




MIT Grid



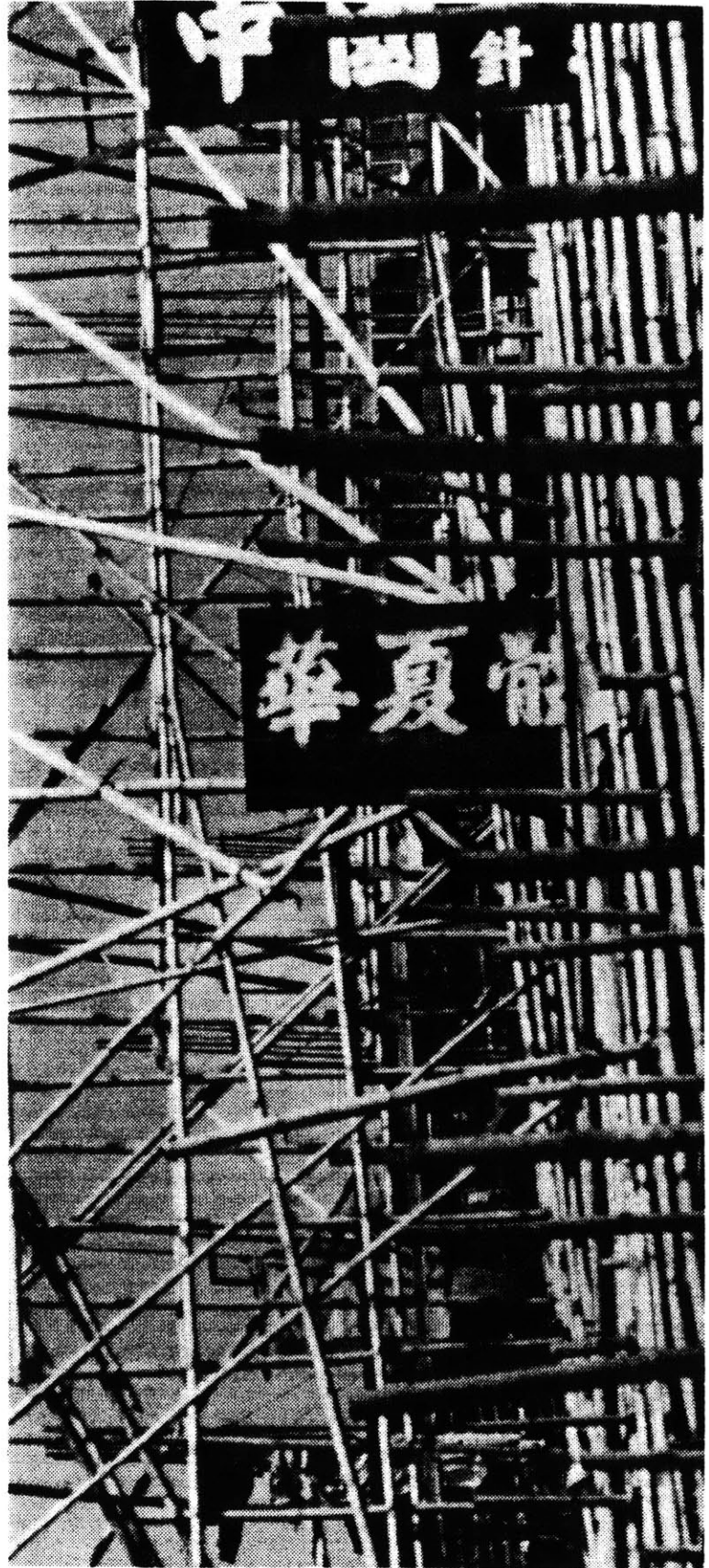
City Grid



Program Building 20 houses the Department of Linguistics and Philosophy at MIT. The program for this project is to provide the department with new classroom / auditorium / office / library facilities, replacing the old ones in the existing building.

Break-down of the various pieces of the program:

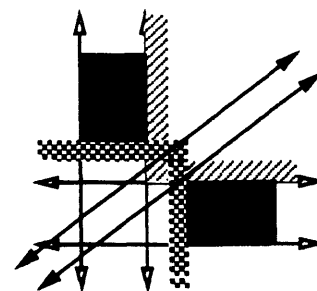
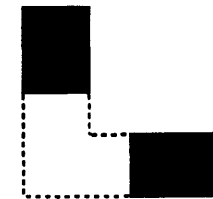
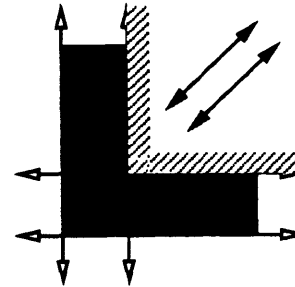
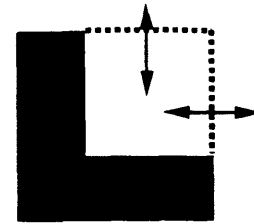
Library Pieces	Circulation	300 sf
	Computer Catalogue	200 sf
	Reference	500 sf
	Offices	1100 sf
	Staff	650 sf
	Conference Room	350 sf
	1st Fir Reading Room	1000 sf
	Main Reading Room	3300 sf
	Open Book Stacks	4000 sf
	Periodical Stacks	2500 sf
	Periodicals Reading Room	500 sf
	Microfiche	330 sf
	Computer Area	700 sf
	Individual Carrels	360 sf
	Individual Work Rooms	750 sf
Storage	500 sf	
Loading	180 sf	
Others	Auditorium	3800 sf
	Control Room	150 sf
	Classrooms	7500 sf
	Offices	2500 sf
	Cafteria	500 sf
	Restrooms	800 sf
	Storage / Mechanical	750 sf



STRATEGIES

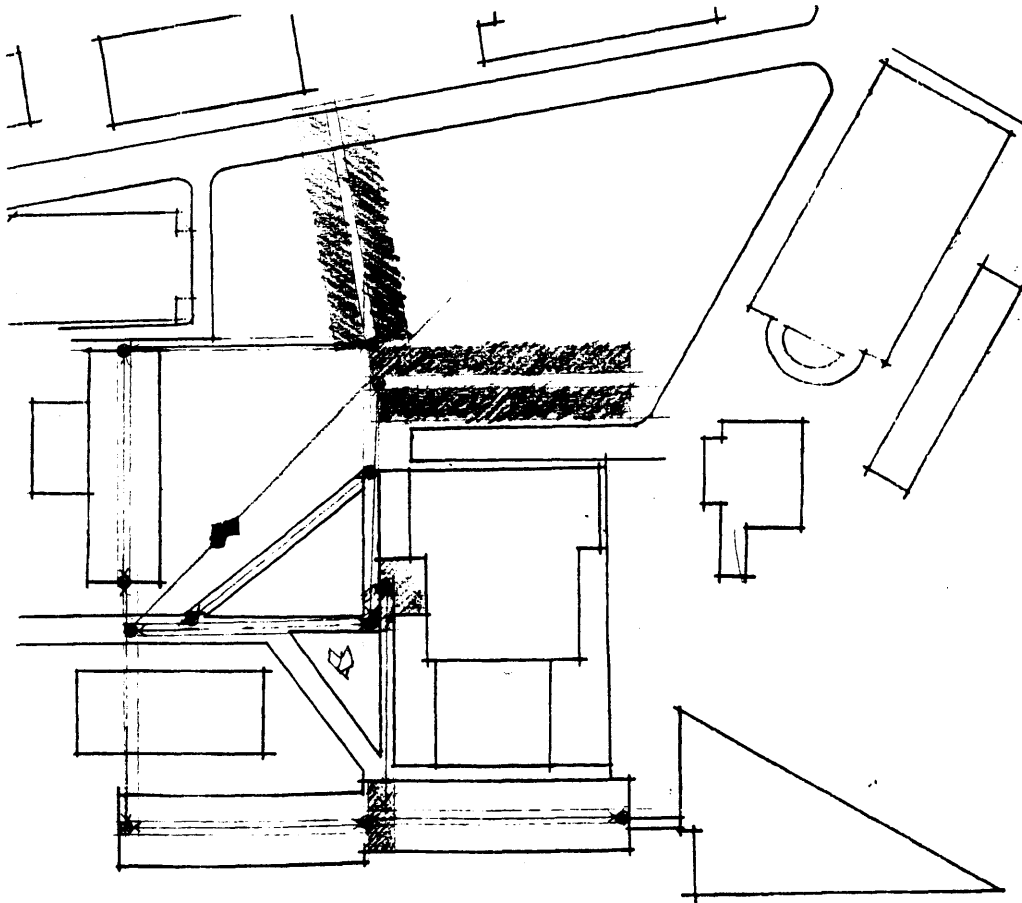
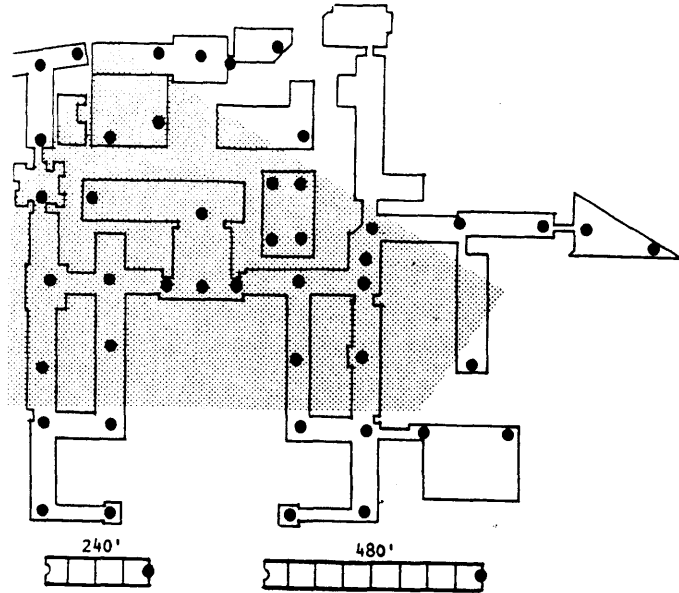
The Double "el"

The "el" (L) shape is interesting in that it borders between figure and ground (object and place). It is a fragmentary frame which can no longer definitively wall off a territory. Also, unlike the square (or other "complete" forms), in which the claimed territory is coterminous with its boundary, the el claims (or frames) territory beyond the space it occupies physically. And because of this virtual / implied boundary, part of the territory it claims is open to "outside" as opposed to closed in the square (or most other recognizable geometry). It represents a receiving form - its incomplete physical boundary allows exchange. This is however a one-sided condition. The form is still very much closed on the other side and discourages interaction. To solve this problem, a double receiving el is created by taking off the corner of the el, allowing exchange from both sides. In terms of the site, a continuous movement is now built between the building imprint and the larger context.



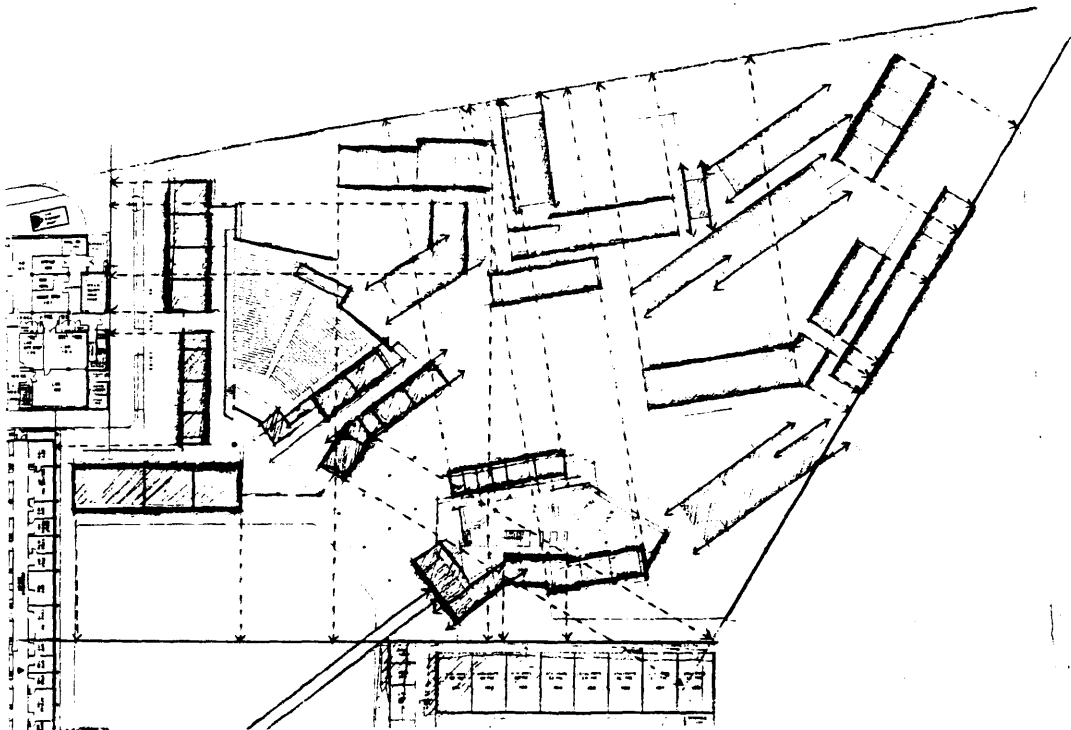
Recurring Dimensions

The MIT campus has a built in rhythm of a distance of 240 feet between exits, which is roughly a minute's walk. This dimension is compressed at the eastern part of campus and changed to around 200 feet around the site. However, the existing building does not accommodate this system and hence terminates the continuity of movement into the site. This recurring dimension is thus used as a reference to determine the location of the entrance area for the new building and several other sizes in the site scale.



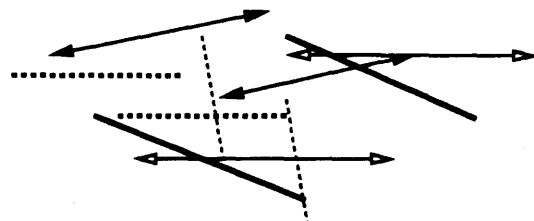
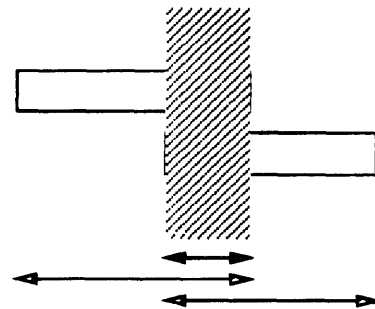
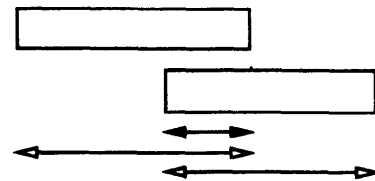
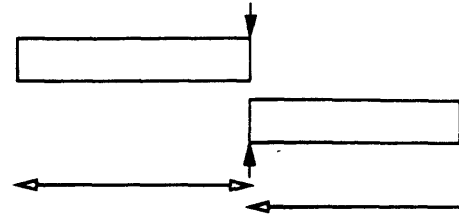
Directional Registration

Pieces of the design are aligned to the various directional systems working on the site (Vassar St, the MIT grid, Ames St., paths going into the site, etc.) as an attempt to relate parts of the design to the larger context. By registering these differing directions onto the inner parts of the site and not just the edge adjacent or closest to any particular system, the presence of these systems are brought into the site and, more importantly, they are now allowed to interact.



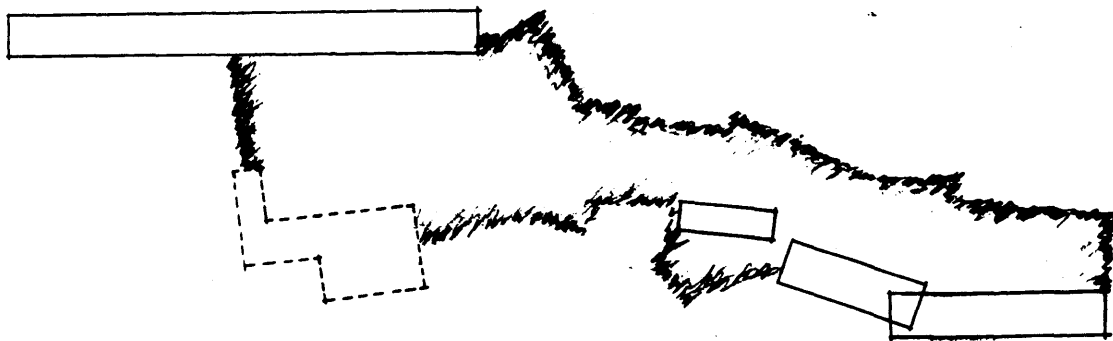
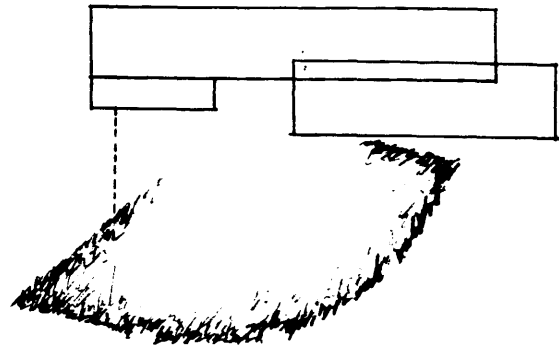
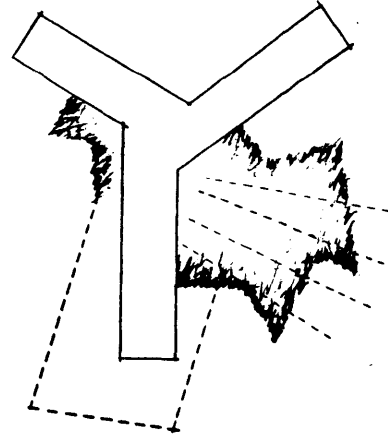
"Collapsed" Grid

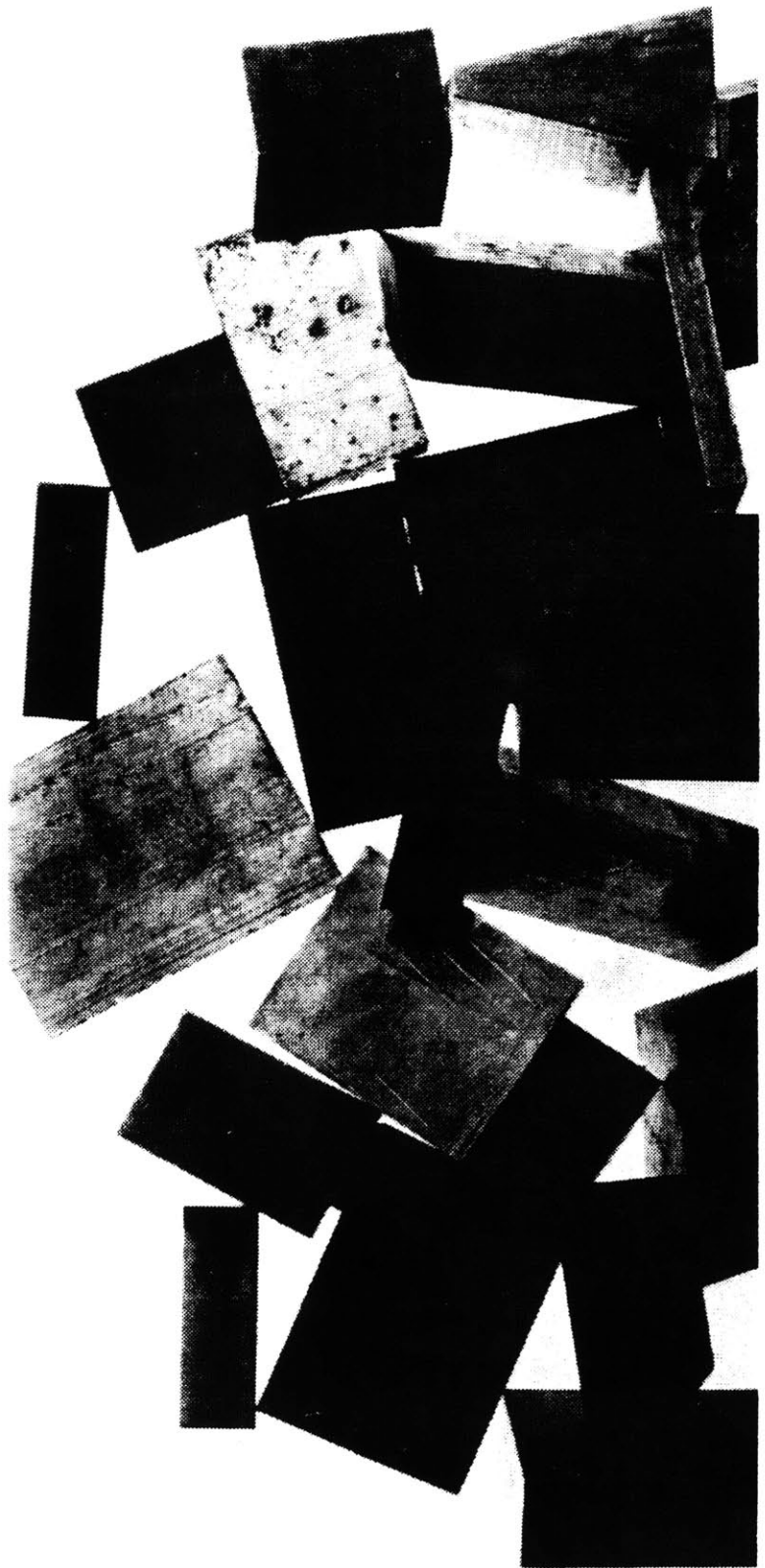
In common practice, a recurring dimension is employed as a module in design. This same module would then be repeated in an end-to-end fashion, giving equal intervals. Repetition in perpendicular directions results in the regular grid. In this case, contact is limited to a line where the two same dimension units meet. On the other hand, by "collapsing" the module and creating overlap, a much wider contact zone is made, allowing exchange between the pair. While the old model accommodates a rigid rhythm, it also encourages the division of the built territory into separate discontinuous regions. To avoid this, building should be based on a field of "collapsed" recurring dimensions which facilitates exchange among various parts of the built territory.



Anchorage

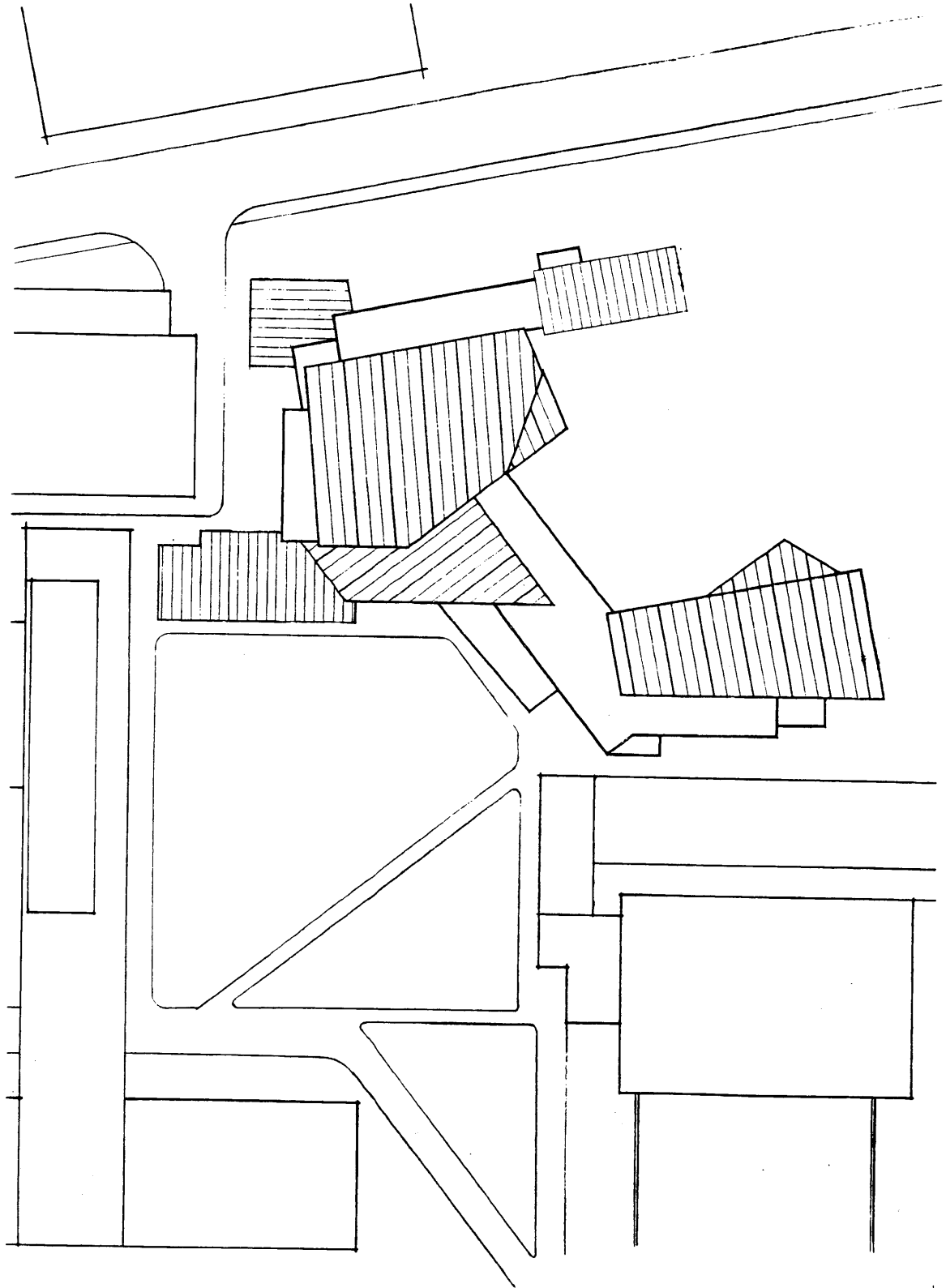
One of the strategies used is a way of building observed in analyses of works by Aalto, Behnisch and Scharoun. It involves the employment of directional bar-like elements for the layout of a general field which both defines access and acts as a framework from which a more open, free form extends. With the field of more rigid "bars" (consisting mostly of rows of repetitive rooms) acting as anchorage to the site, the larger space (the main reading space in the Aalto and Behnisch examples, and the main foyer and theater in the Scharoun example) is allowed to take up a less regular geometry.



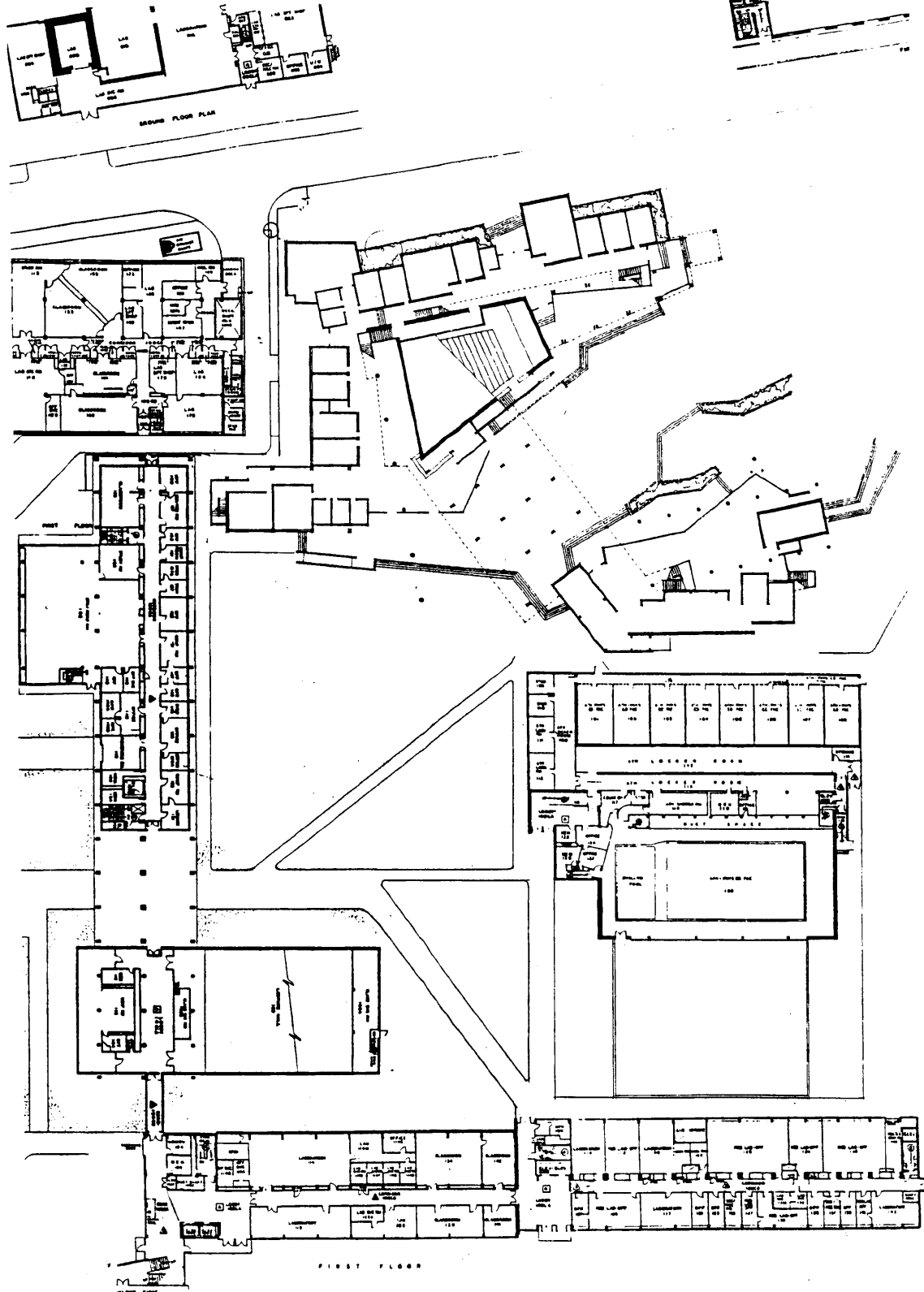


PIECES

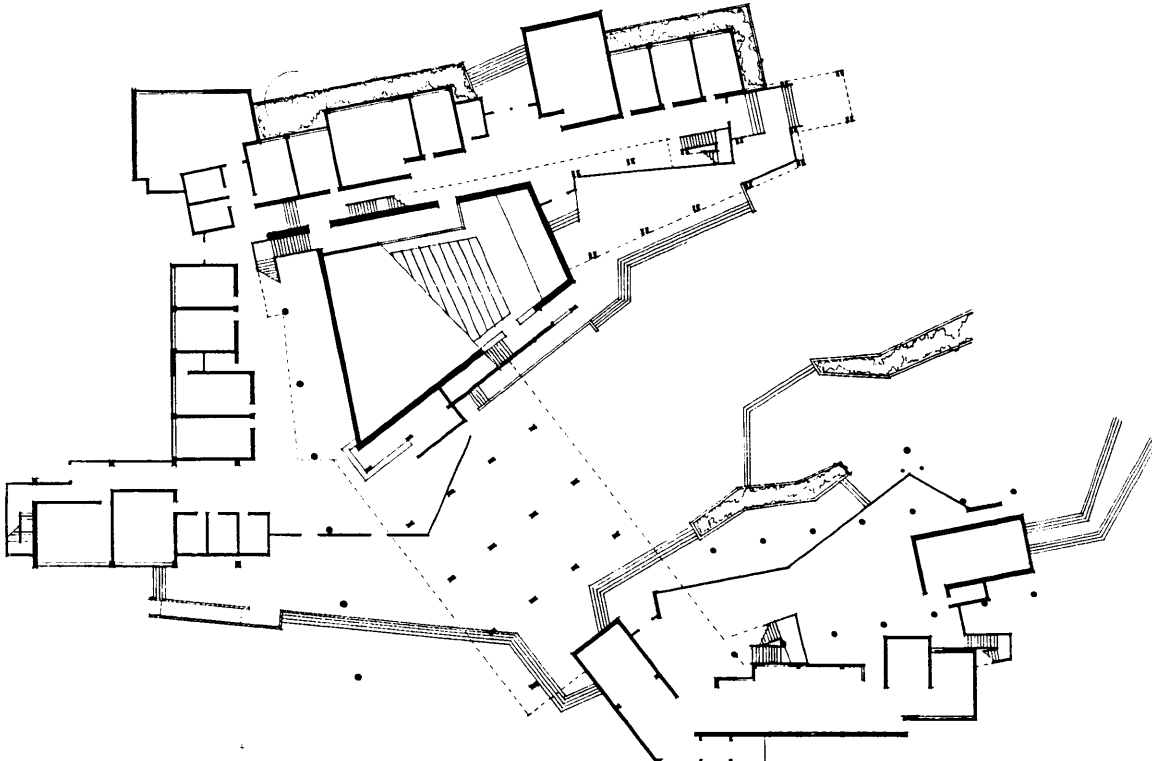
Site Plan (Roof Plan)



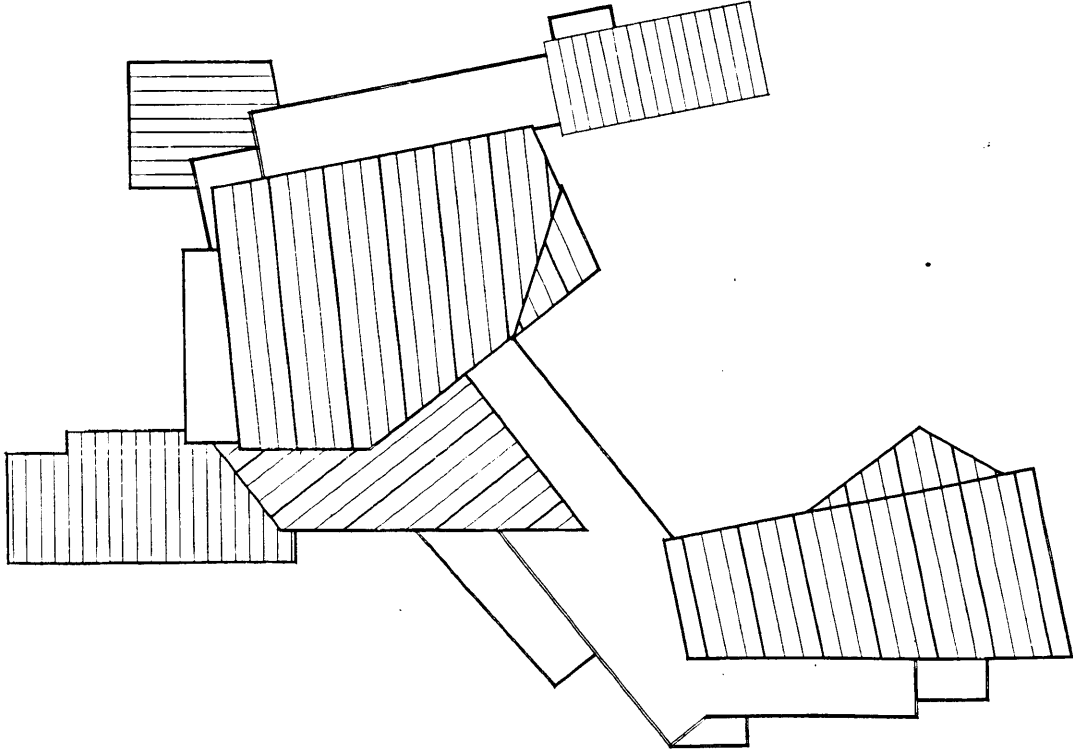
Site Plan (1st Fl)



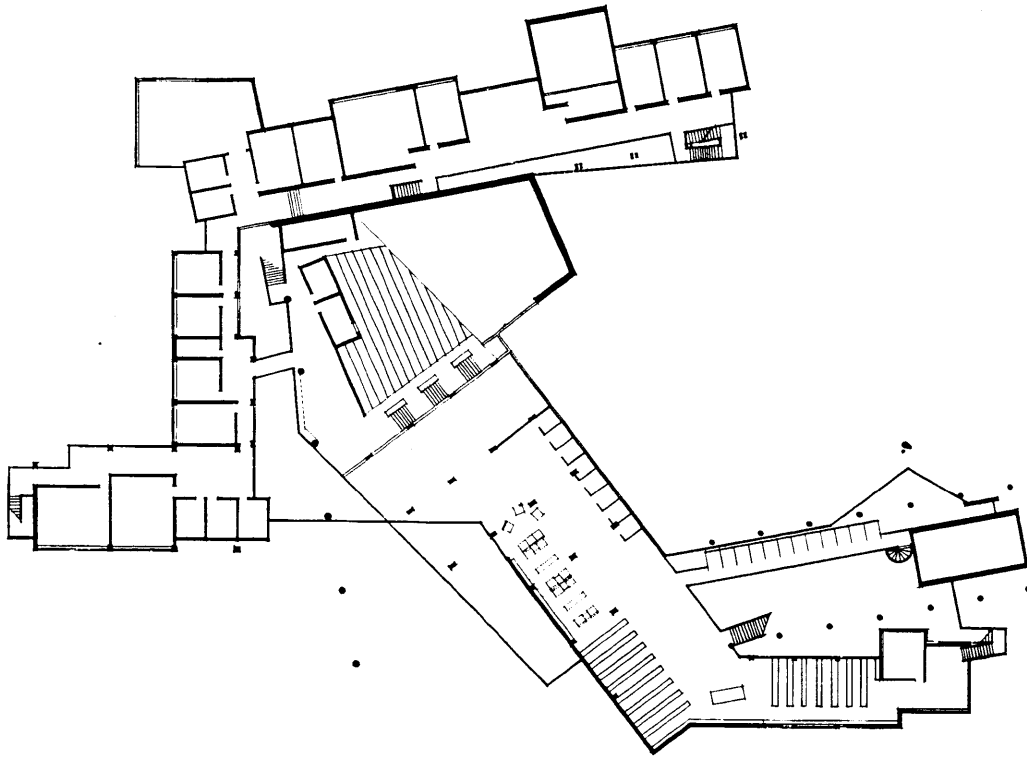
1st Floor Plan



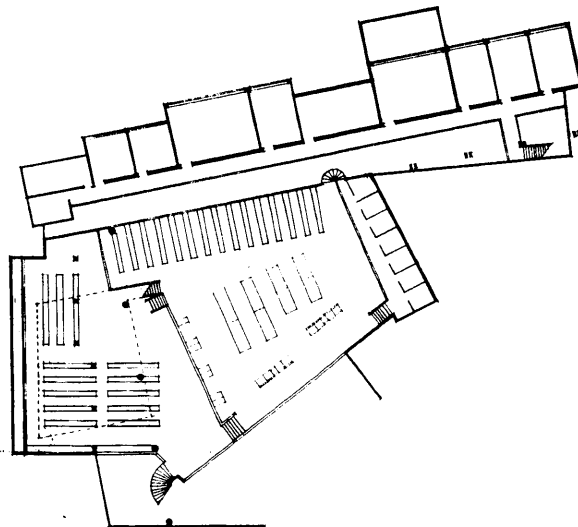
Roof Plan



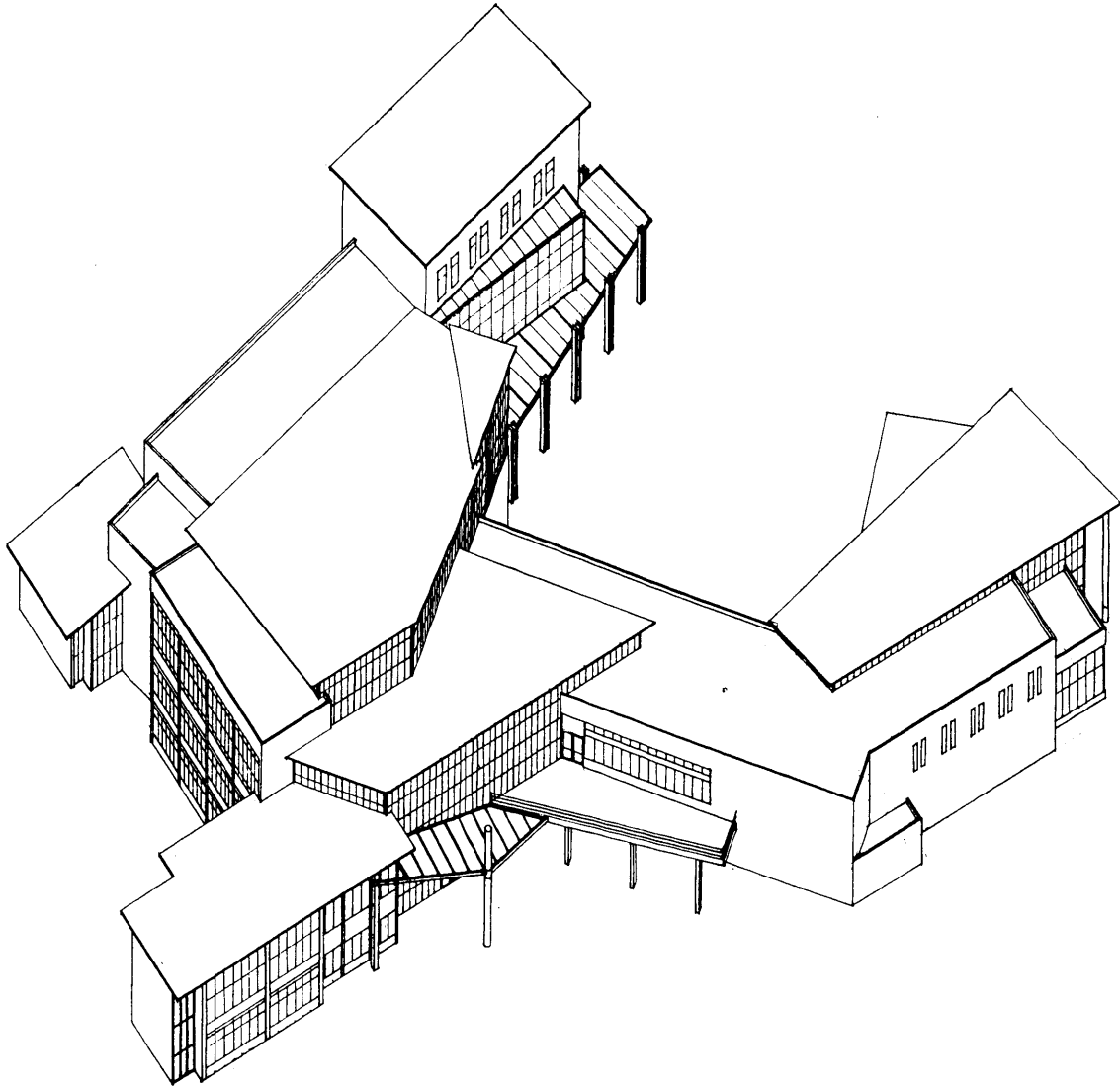
2nd Floor Plan

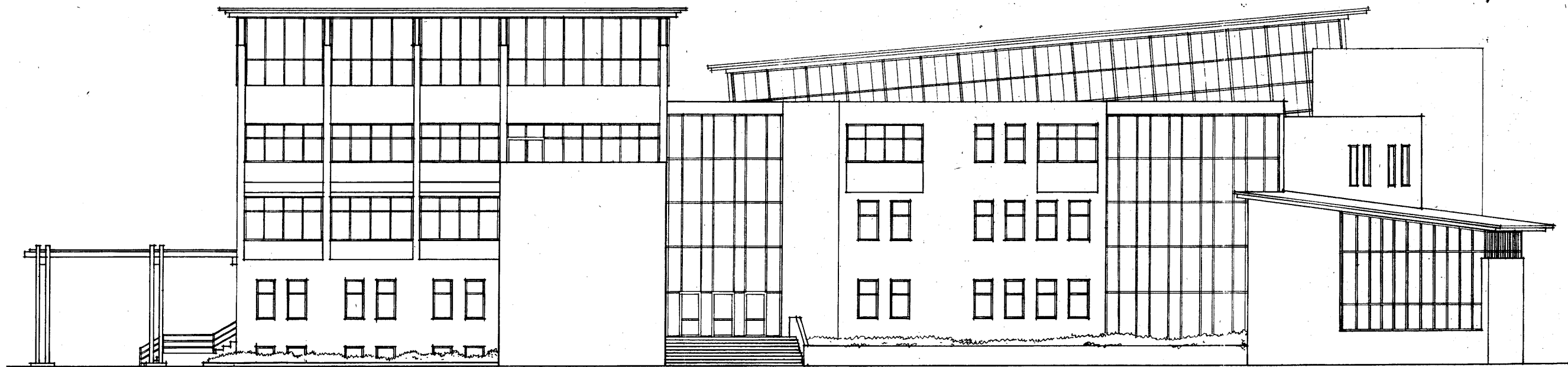


3rd Floor Plan

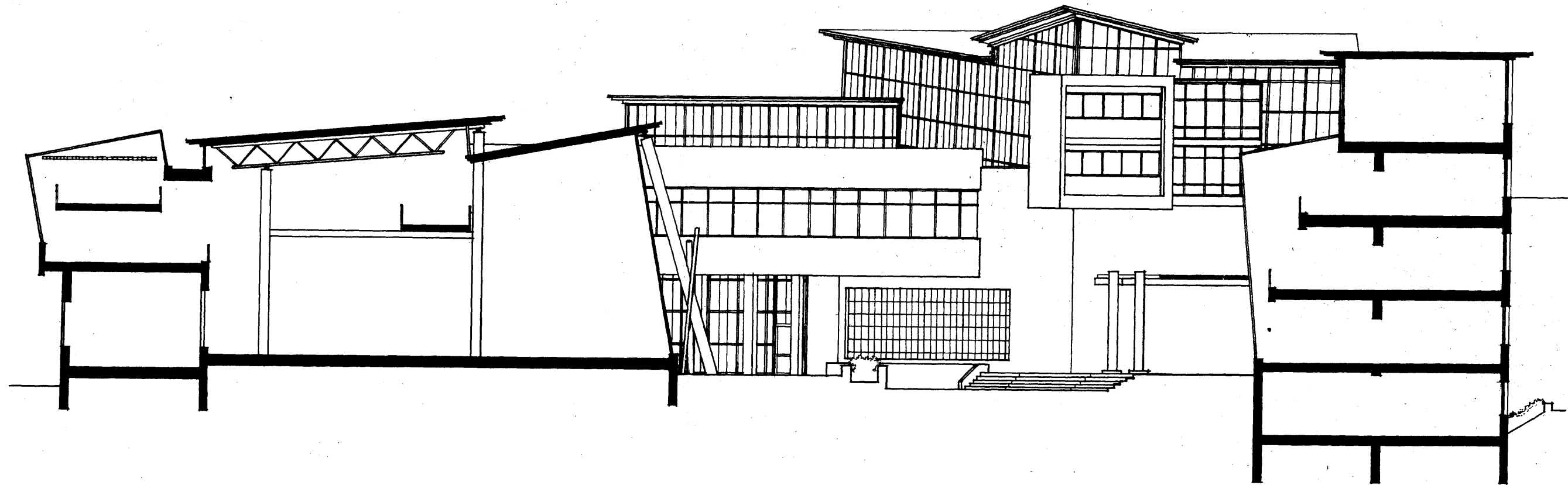


Axonometric

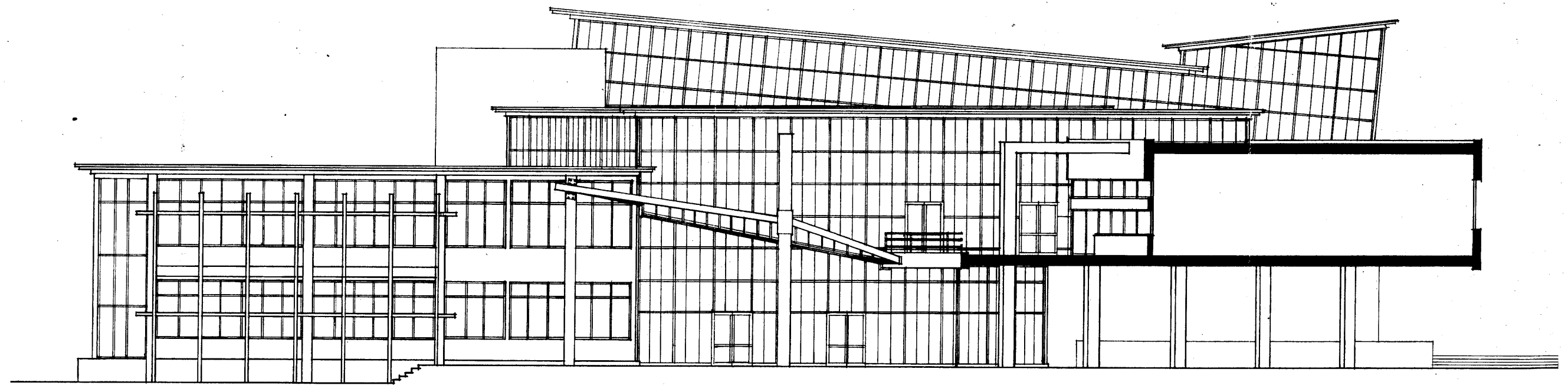




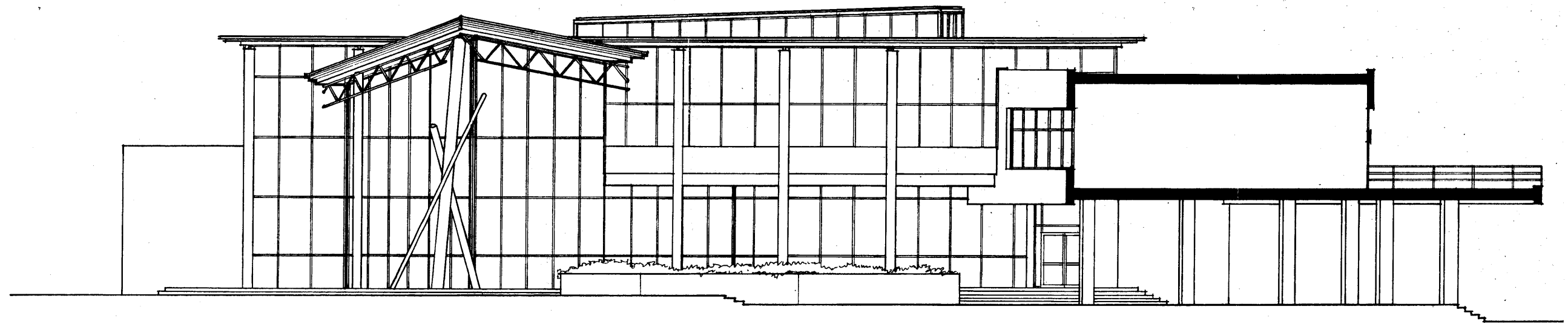
North Elevation



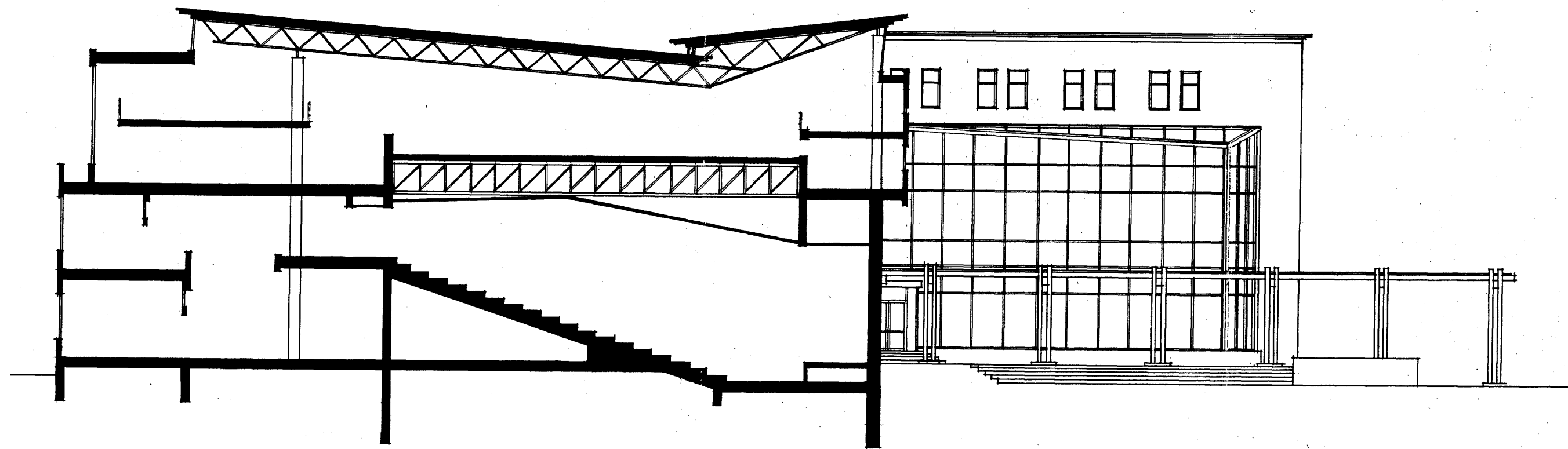
North-South Section Looking West



East-West Section Looking North



East-West Section Looking South



East -West Section Through Auditorium

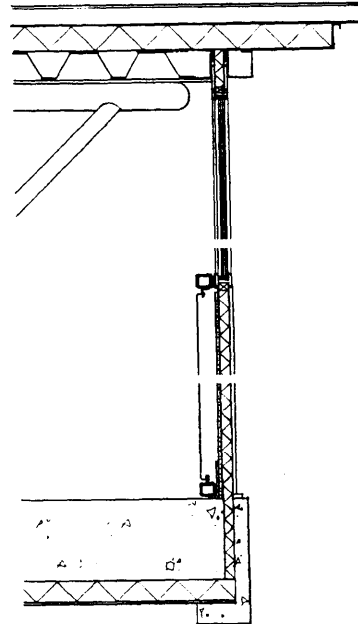
Roof Detail

roof system upper level:

- aluminum profiled sheets
- thermal insulation
- corrugated sheeting
- hollow section roof frame
- reinforced steel column

roof system lower level:

- gravel
- vapor pressure equalizing layer
- thermal insulation
- vapor barrier
- concrete slab
- suspended ceiling



Facade Detail

facade panel:

- aluminum panel
- thermal insulation
- heat storage panel
- aluminum sheet

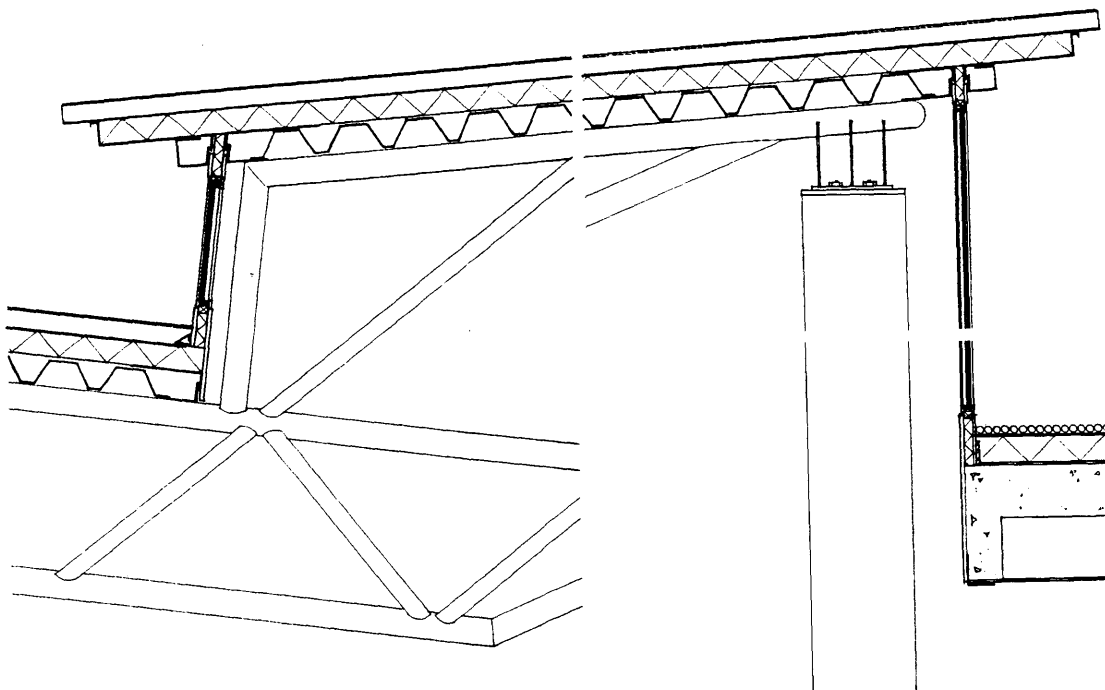
aluminum composite section

insulation glass

plastic insulation

hollow steel section

L section



Trellis Detail

support system:

- wooden column*
- wooden beam*
- bottom plate*
- steel bracket*
- concrete base*

roof system:

- hollow steel section*
- plastic profile*
- aluminum composite section*
- sand-blasted glass*

Glass Wall Detail

hollow steel section

plastic profile

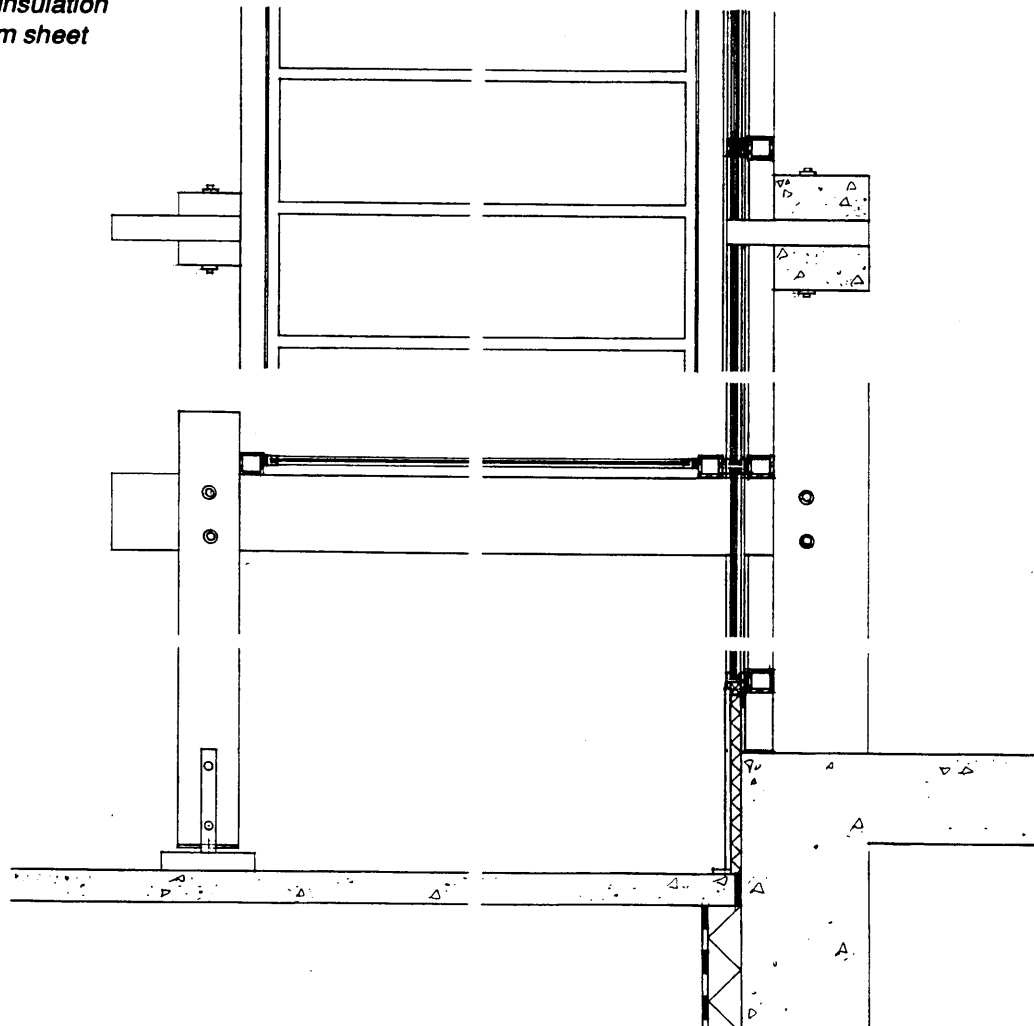
aluminum composite section

insulation glass

aluminum panel

thermal insulation

aluminum sheet



Double Decker Stacks Detail

support system:

steel support

I section

steel plate

steel ring

floor system:

steel girder I

L section

grating

chipboard plate

rubber coating

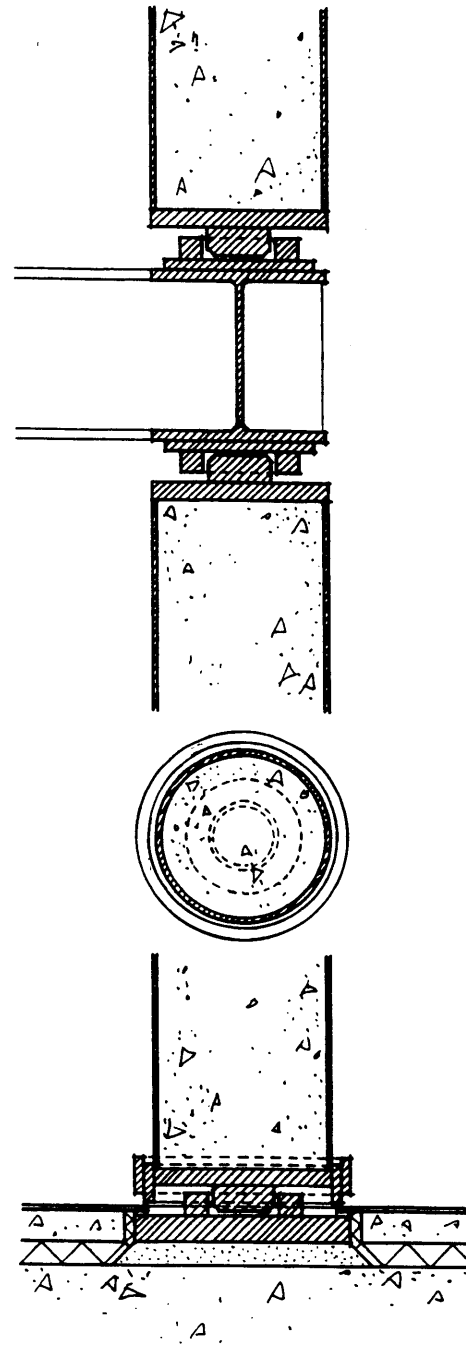
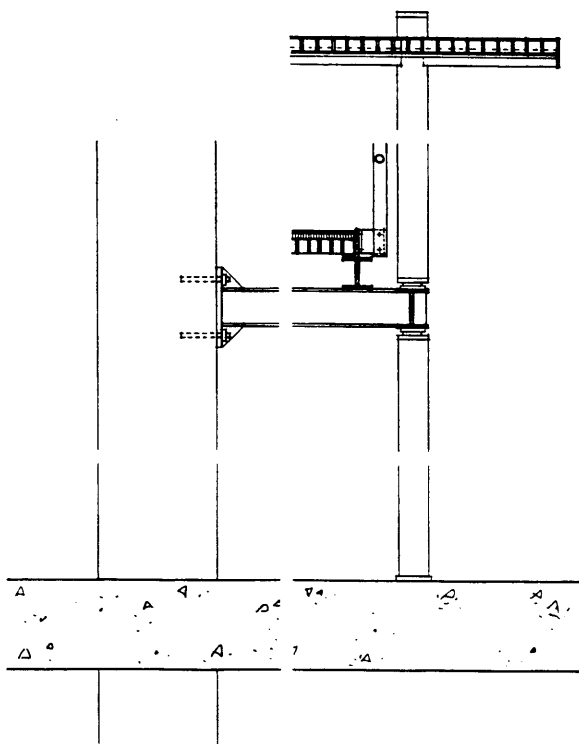
flat steel

steel railing

shading device:

stainless steel bracket

aluminum bar grid



roof system:

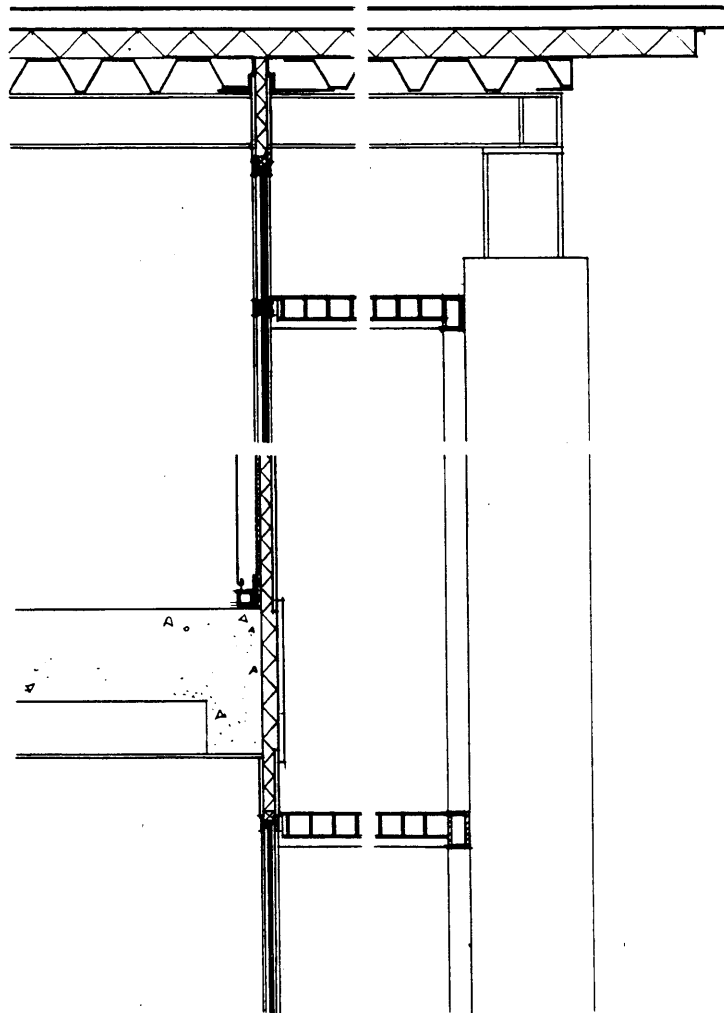
- corrugated sheeting*
- steel girder I beam*
- reinforced steel column*

shading device:

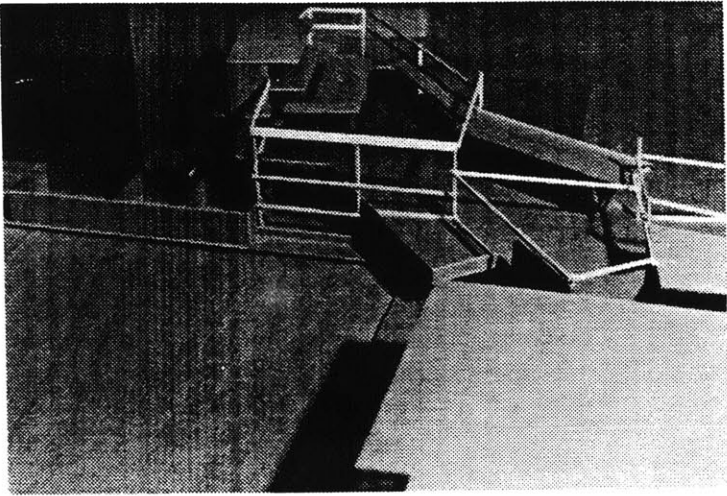
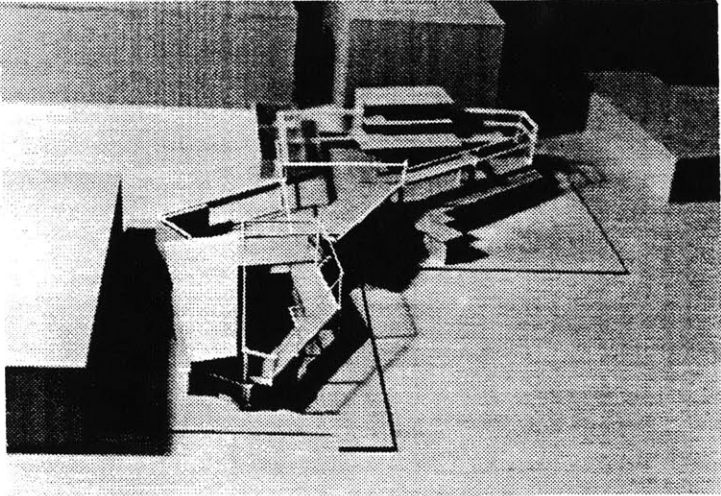
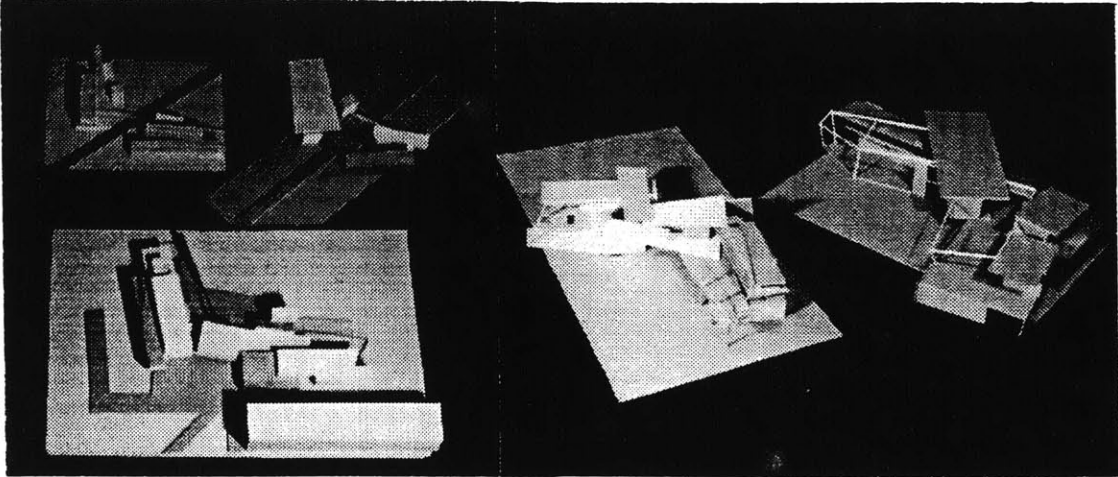
- hollow steel section*
- stainless steel bracket*
- aluminum bar grid*

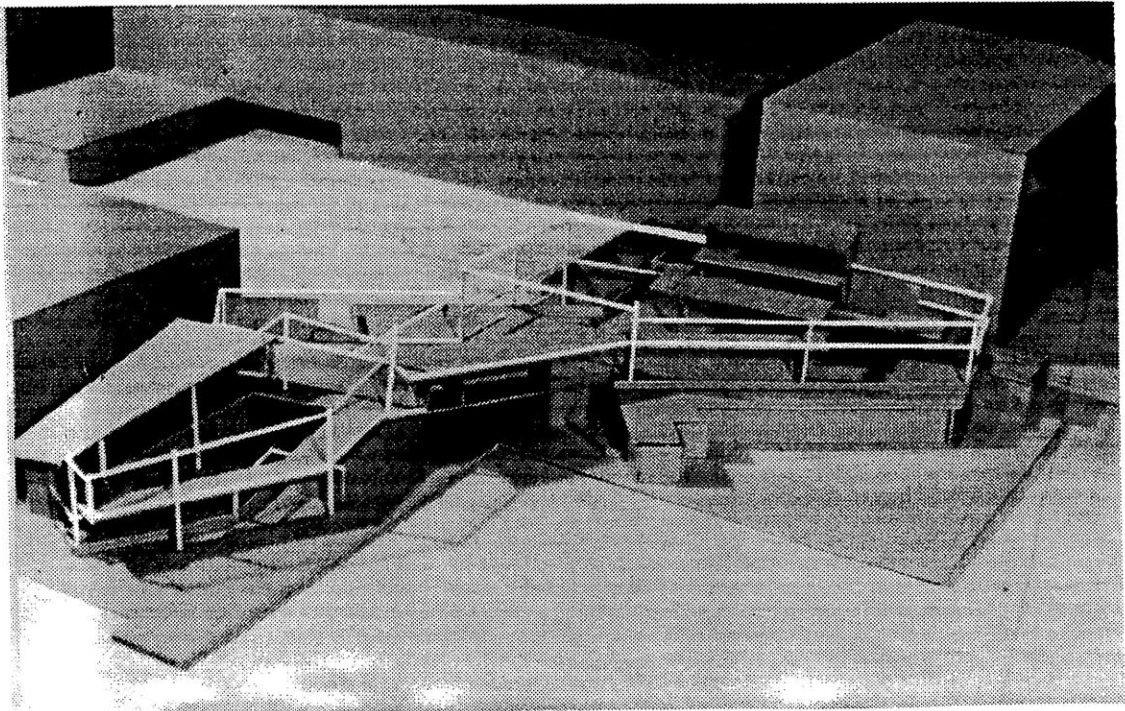
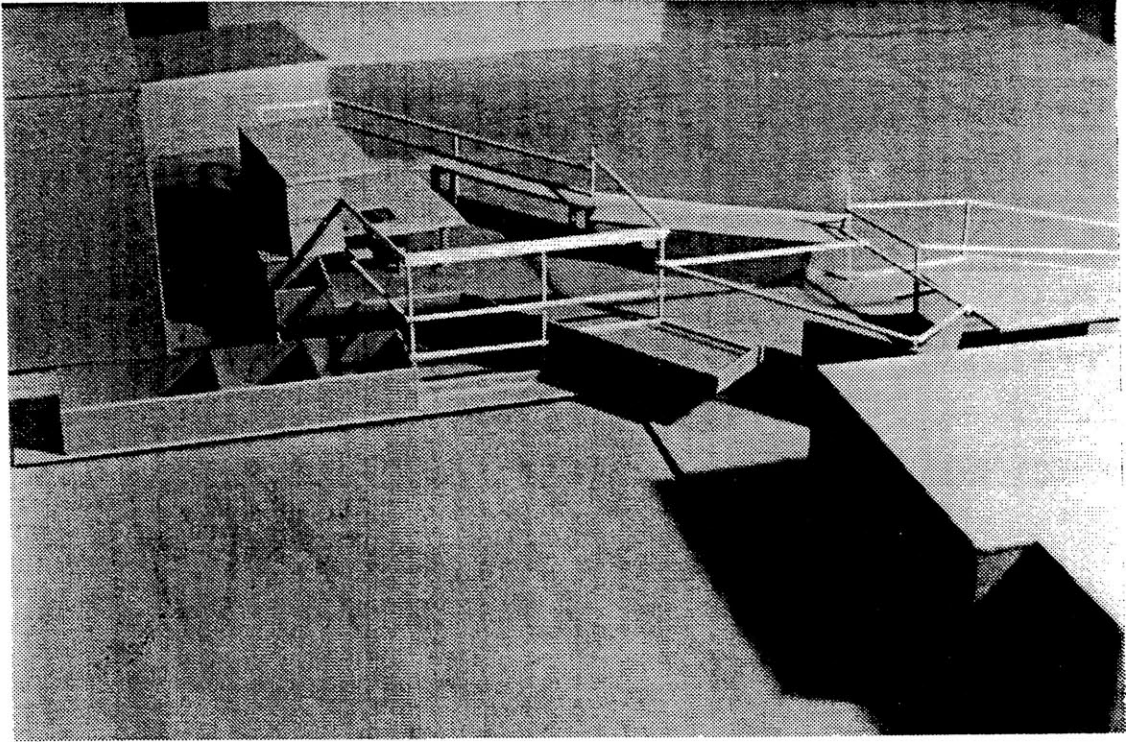
wall system:

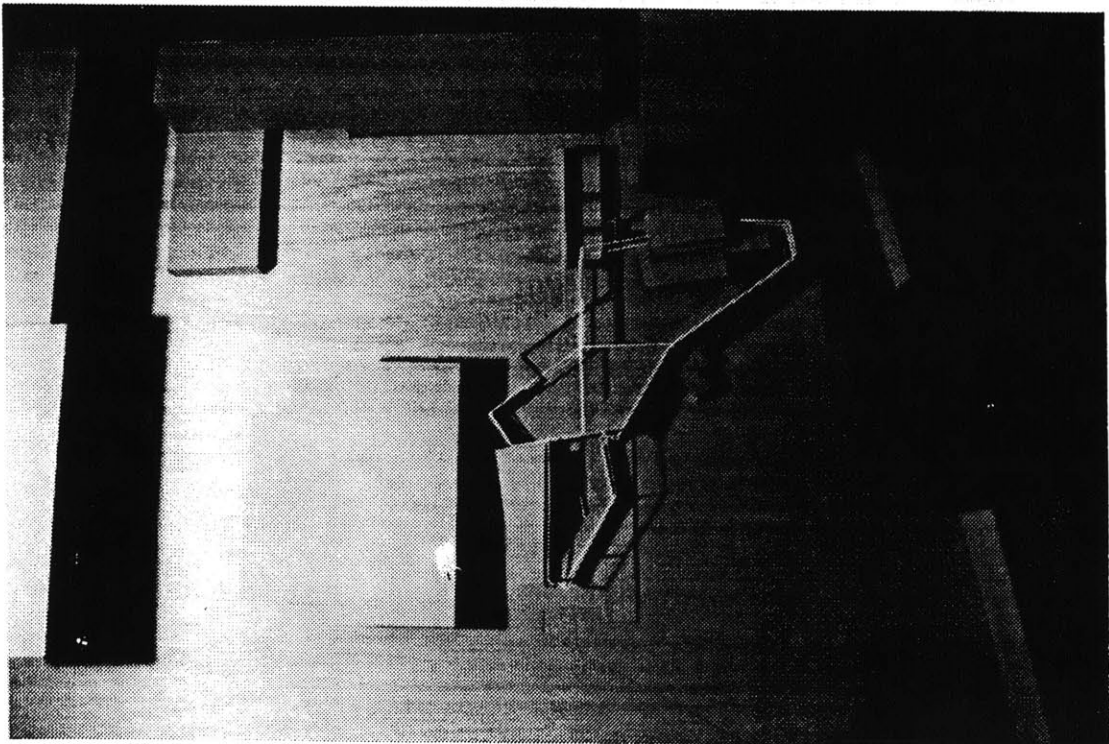
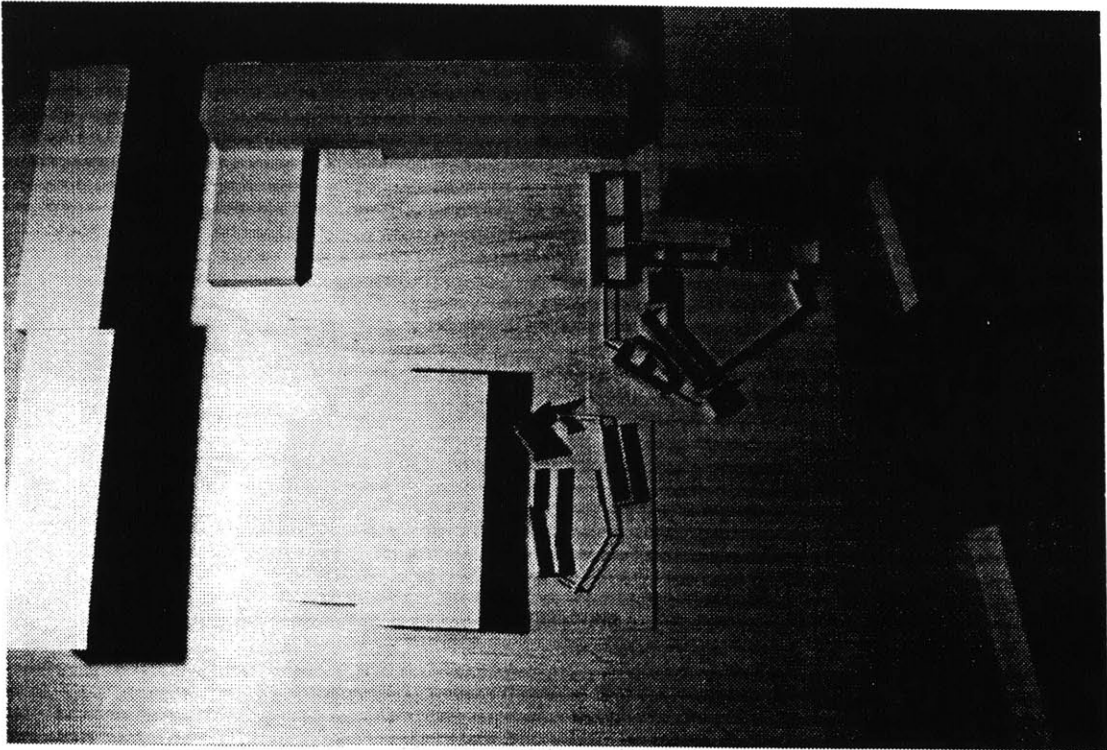
- mineral fiber masonry*
- aluminum panel*
- thermal insulation*
- heat storage panel*
- aluminum sheet*
- hollow steel section*
- L section*
- aluminum composite section*
- insulation glass*
- plastic insulation*



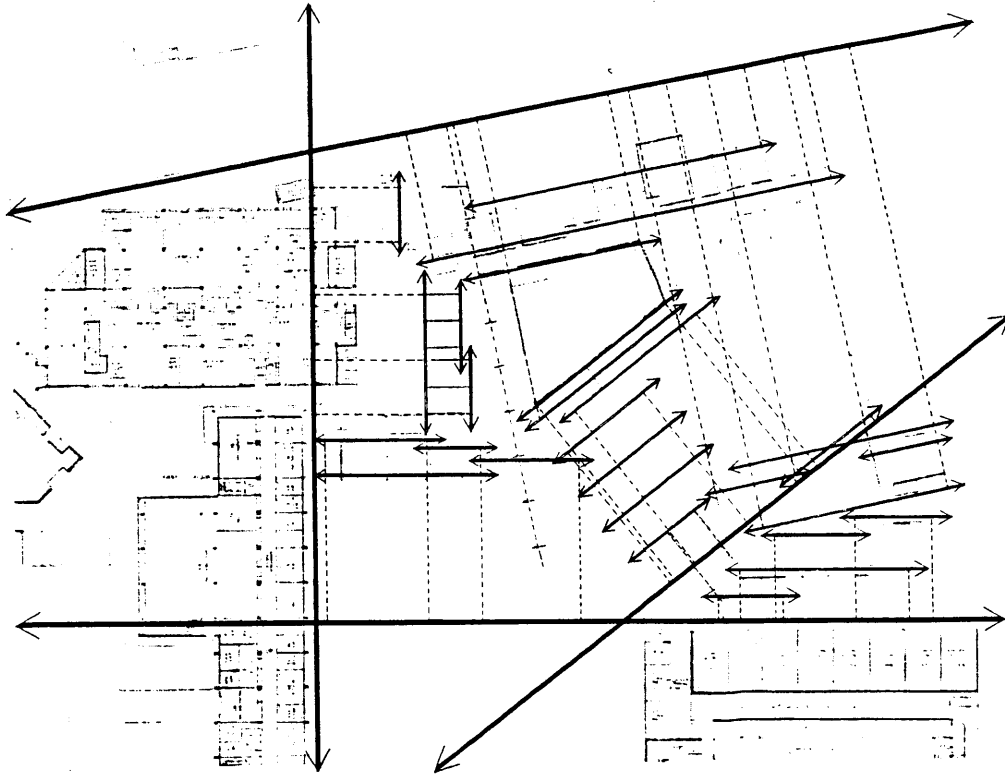
Sketch Models



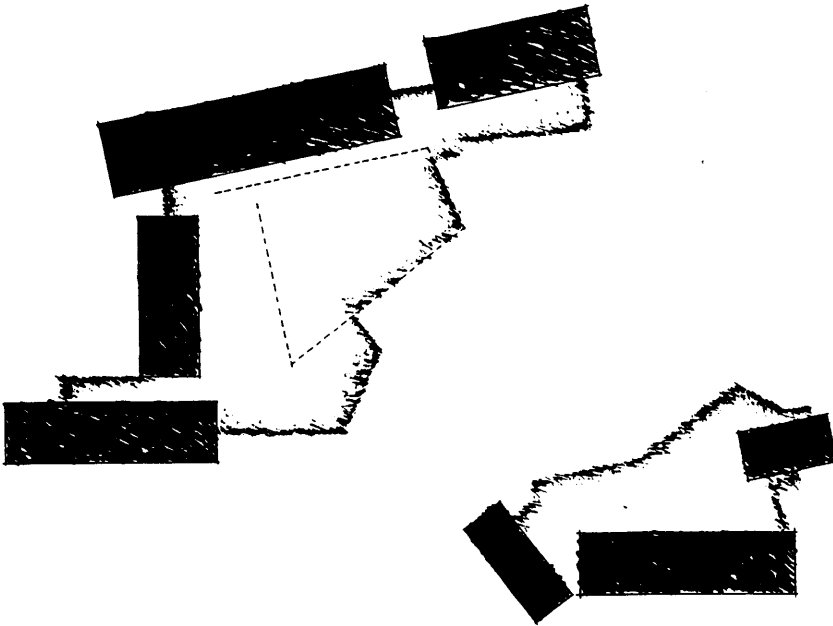




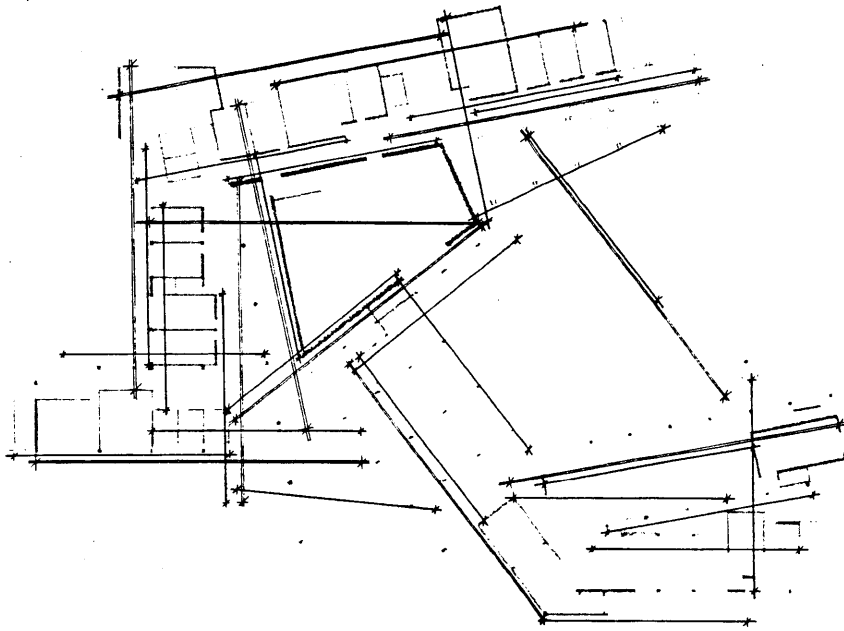
Directional Registration



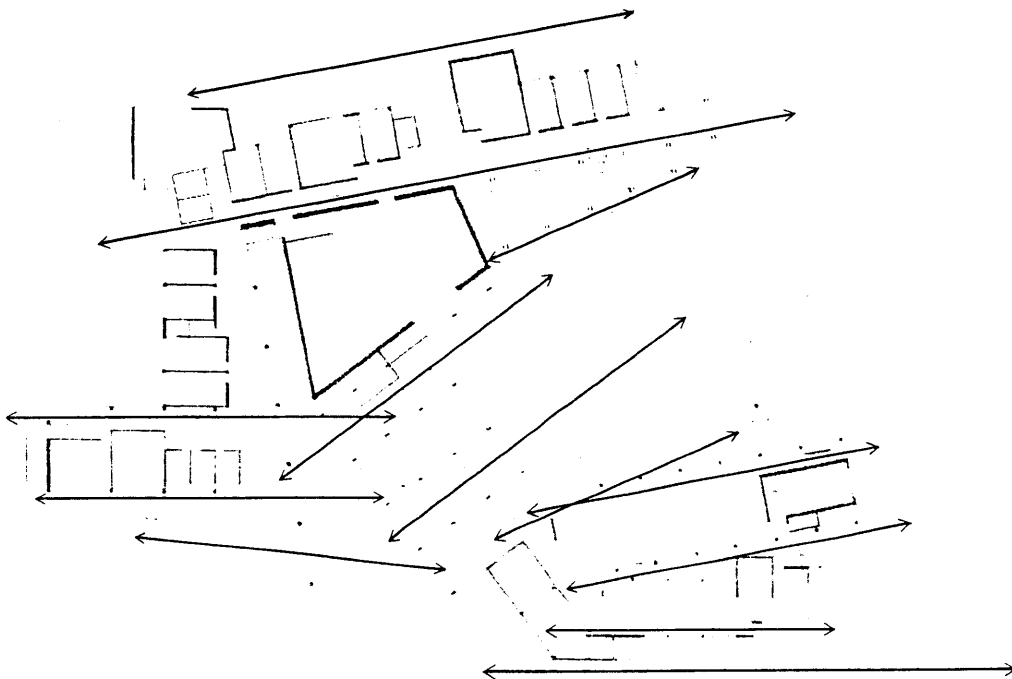
Anchorage

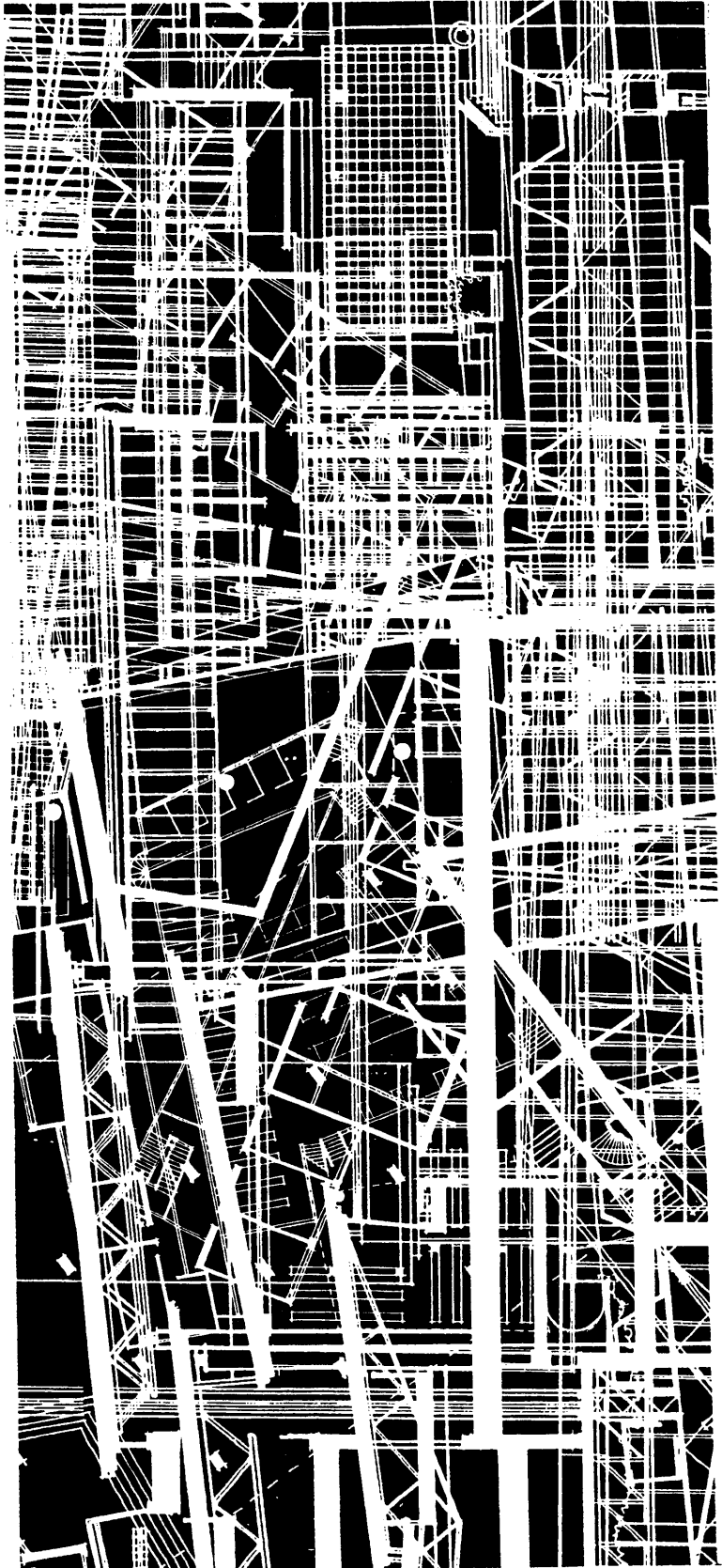


Dimensions/Collapse Grid



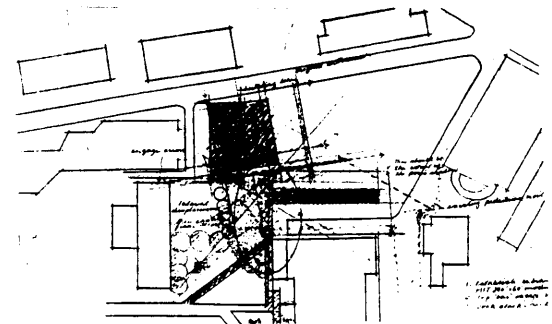
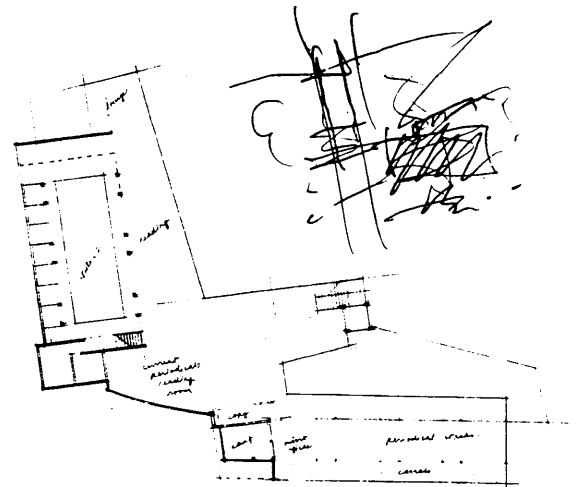
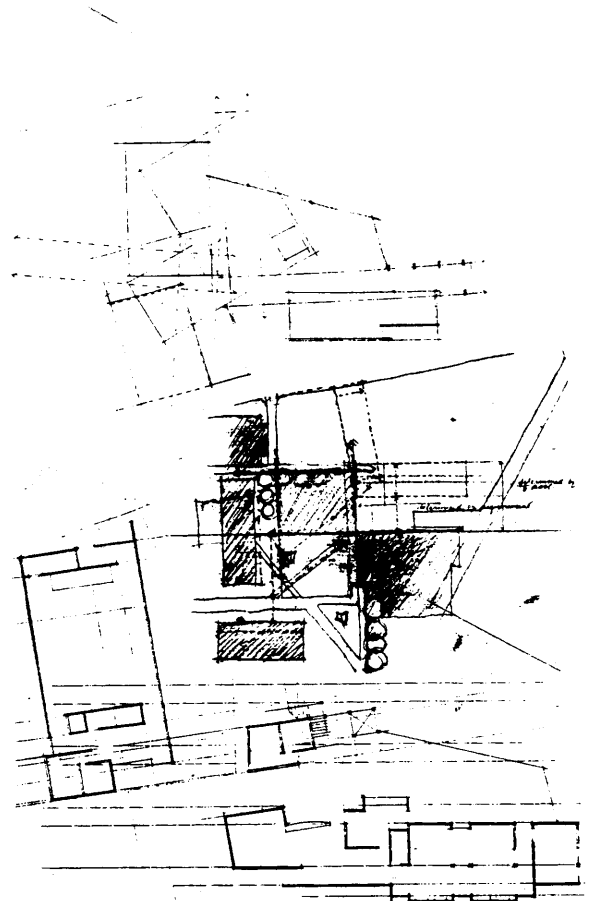
Demarcations



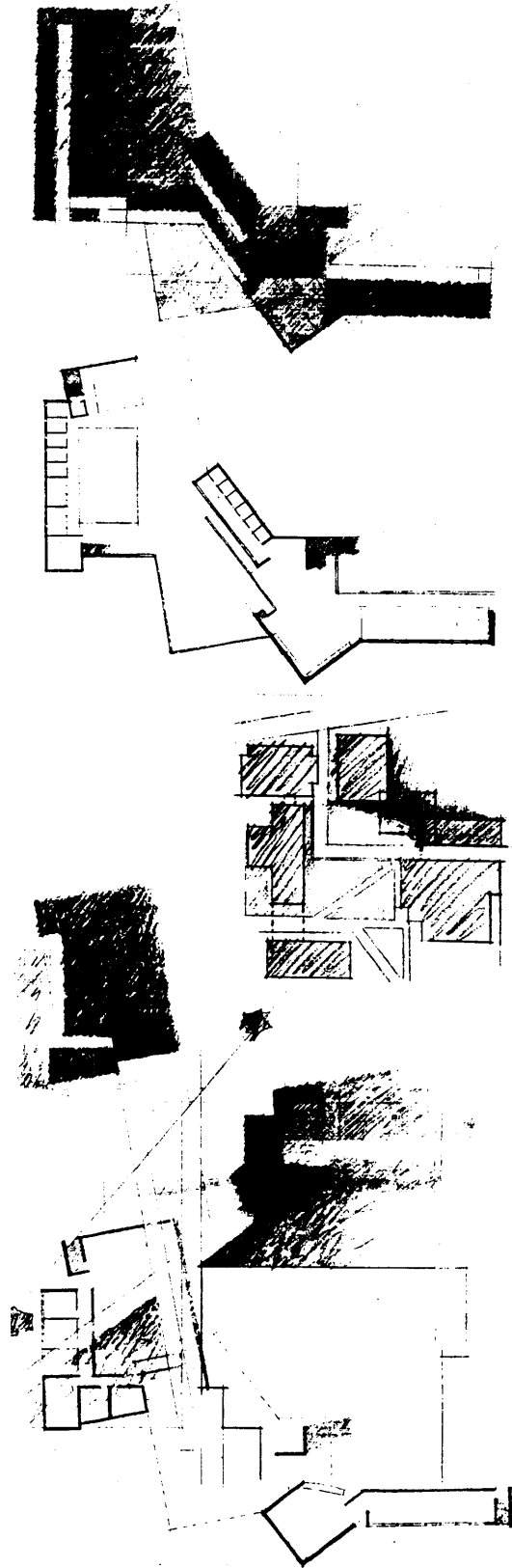


The Beginning

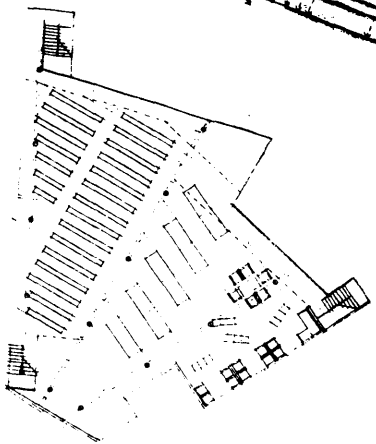
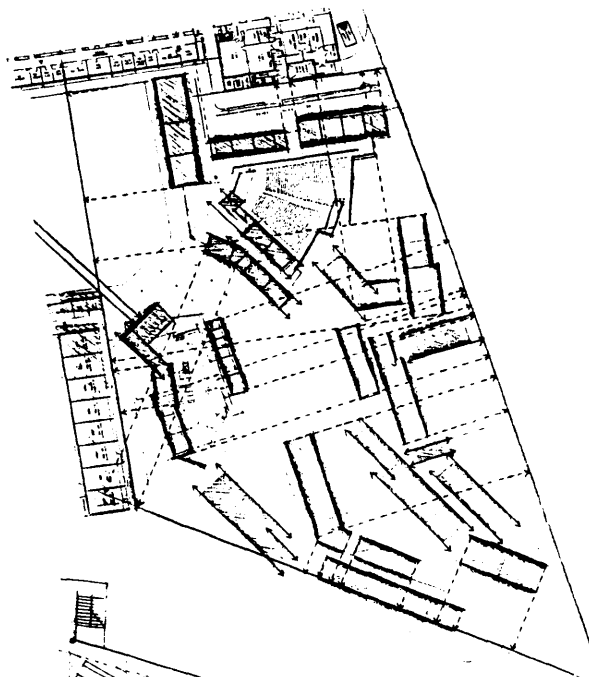
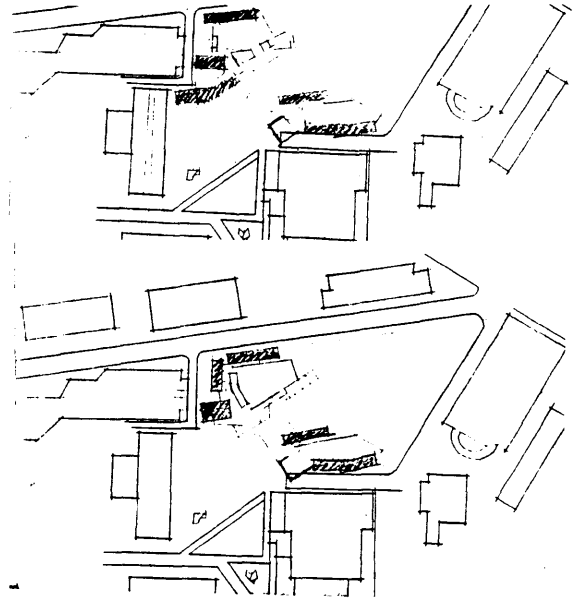
In isolation, every work of architecture/building seems to hold its own justification to be worthy of "being"/existing. They normally contain certain orders/consistencies which tend to bind the work together as a coherent entity, a sufficient whole. This sufficiency, however, relies heavily on the very possibility of the work being autonomous, that each work can indeed exist in isolation. As soon as we view them as a possible component of some larger enterprise, the sufficiency of each work immediately becomes constantly contested by every other. Why a certain modular dimension appears nowhere but in this one work? Or how does the access system react to the larger scale movements? While buildings are mostly conceived, or at least constructed, as autonomous wholes. their autonomy nonetheless remains at the physical level. After all, it is in the void - space not occupied by material constructs - where human habitation takes place. For every work, this building void/habitable space is never isolable, it is inextricably bound with each other and with the space of the fabric they sit in. They together form the space continuum that houses human existence. And they do so without ever the need to give rise to corporeal links. Thus, the act



At the beginning, this investigation was undertaken with no specific goal in mind (maybe with the sole exception of finishing the thesis, which means nothing more than the documentation of the stage / state the investigation is in just prior to the due date of the thesis). There are certainly objectives - probably too many of them - but none of these qualifies to be called a goal. Often, rather than helping to pin down the direction or course of this endeavor, these so-called objectives only serve to lead into more and more issues, ones that were never quite considered before their sudden emergence. Some simply lead nowhere and their only significance is in the time wasted on them.... The more time spent on trying to work things out, to steer oneself "to the right course", the more confused one became, falling deeper and deeper into the insurmountable ambiguity of the labyrinth. (Of course, the analogy between architecture and labyrinth is an extremely alluring one, but what kind of labyrinth are we talking about here?) . . . Historically, the metaphorical significance of the labyrinth is twofold: of losing one's way, and of the desire to get out; the latter being depicted as a direct consequence of the former. Far from being a catalyst to end, to find the solution to the labyrinth, the wish to get out



of building depends on the the relation / continuation from space to space, which naturally rules out the viability of a simple autonomous building. Instead, the act must be conceived profoundly as a kind of "building in relation." It can no longer merely represent the making of objects, of wholes, but must entail the building of relations. The notion of absolute wholes is antithetical to any kind of thinking about continuity as it implies the division of the continuum into separate objects, each possessing unity in itself. This inevitably destroys the continuum. In the most general way, a building is only one of many in an intricate network of entangled fragments. These fragments are composed in the built environment in the form of enclosures / demarcations defining a multitude of space, each having its own capacities and serving specific needs / uses - and the existence of any building can in no way be isolated form this composition. Building (the act) is therefore not only about buildings (the physical structures) but involves an agenda concerning relations and continuity beyond the physicality of buildings.



only transforms the labyrinth into a prison. Resigning to the project of planning to find one's way out, of locating the exit, only results in locking oneself into a standstill within the labyrinth. In fact, one can never be sure if there is really an exit (or a final destination), because, unable to grasp it in a single glance, one never knows where one is, inside or outside; one never knows when one stumbled upon the labyrinth and ended up lost in it. By making the task of finding the way out the "project" closes the labyrinth, imprisoning oneself in it.⁶ Therefore, the "project" is not the search for a way out but the labyrinth itself -- the experience of discovery and rediscovery, of side-tracking, of hitting dead-ends, detours, of starting over, of RETHINKING over and over and over again. The labyrinthine therefore has no conclusions, no goals, just beginnings.

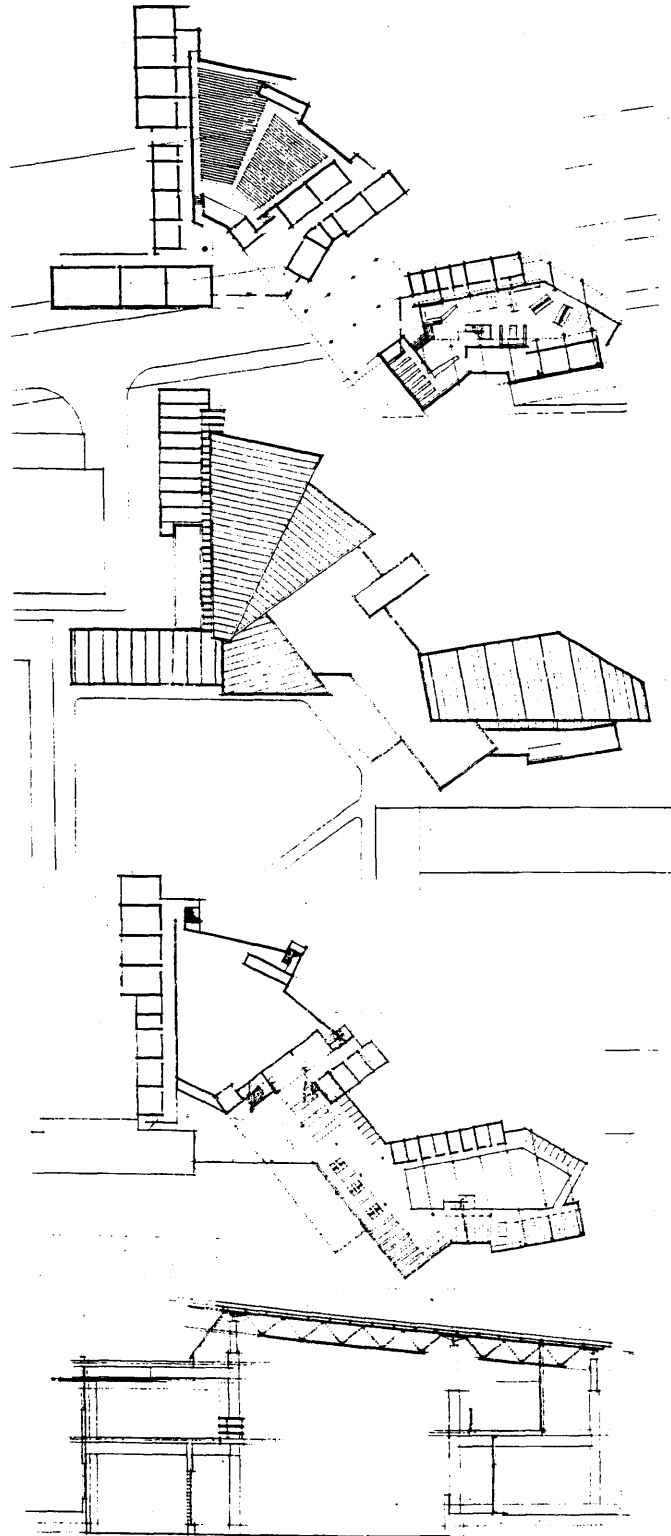


FIGURE CREDITS

- pp. 6 *Rag Face*, Irving Penn, from *Passage: a Work Record*, New York: Alfred A. Knopf, 1991.
- pp. 10 Model of Gehry House, Frank Gehry, from Philip Johnson and Mark Wigley, *Deconstructivist Architecture*, New York: Museum of Modern Art, 1988.
- pp. 14 *Splitting: Four Corners*, Gordon Matta-Clark, from Philip Johnson and Mark Wigley, *Deconstructivist Architecture*, New York: Museum of Modern Art, 1988.
- pp. 15 Site plan, City Edge, Daniel Libeskind, from Philip Johnson and Mark Wigley, *Deconstructivist Architecture*, New York: Museum of Modern Art, 1988.
- pp. 15 Pyramid of Cheops, Giza, from Stanley Abercrombie, *Architecture as Art*, New York: Harper & Row, 1984.
- pp. 16 Composite surfaces and park elements, West Hollywood Civic Center, Zaha Hadid, from *Deconstruction: Omnibus Volume*, New York: Rizzoli, 1989.
- pp. 17 Zoser's funerary complex, from Stanley Abercrombie, *Architecture as Art*, New York: Harper & Row, 1984.
- pp. 18 Mong Kok, Hong Kong, from *Space Design*, no. 330, March 1992.
- pp. 18 Walled City, Hong Kong, from *Space Design*, no. 330, March 1992.
- pp. 19 Mong Kok, Hong Kong, from *Space Design*, no. 330, March 1992.
- pp. 20 *Relativity*, M. C. Escher, from *The Graphic Work of M. C. Escher*, New York: Hawthorne Books, 1960.
- pp. 21 Elevation, Hysolar Institute, Behnisch and Partners, from *Deconstruction: Omnibus Volume*, New York: Rizzoli, 1989.
- pp. 24 Stone House, Gunther Domenig, from *Architecture and Urbanism*, October 1991.
- pp. 25 Collage, Maurice Smith, from *Fragments*, MIT Class reader, 1991.
- pp. 26 *Venus 024*, Ramon Marinel-lo, from *El Collage Surrealista en Espana*, Teruel: Museo de Teruel, 1989.
- pp. 27 Rooftop Remodelling, Coop Himmelblau, from Philip Johnson and Mark Wigley, *Deconstructivist Architecture*, New York: Museum of Modern Art, 1988.

- pp. 28 Late Mesolithic cave drawing, from Robert Brooks, *Stone Age Painting in India*, New Haven: Yale University Press, 1976.
- pp. 29 Kiyose Kanayama Green Park, Suzuki Zoen Kenkyusho, from *Contemporary Japanese Landscape*, Tokyo: Process Architecture Co., 1988.
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- pp. 31 *Scheme of Dynamic Cubism*, Kasimir Malevich, from Willy Rotzler, *Constructive Concepts*, Zurich: ABC Editions, 1977.
- pp. 32 Settlement on water, Hong Kong, from *Space Design*, no. 330, March 1992.
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- pp. 34 *AEON*, Lebbeus Woods, from *Mega II - Origins*, London: Architectural Association, 1985.
- pp. 36 Campus map,
- pp. 37 Campus grid and city grid diagram, from East Campus
- pp. 38 Photo of area,
- pp. 38 Plan, Building 20, from
- pp. 40 Scaffolding, Hong Kong, from *Space Design*, no. 330, March 1992.
- pp. 48 *Collapse*, Irving Penn, from *Passage: A Work Record*, New York: Alfred A. Knopf, 1991.

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Notes

1. This section is the result of an architectural reading / adaptation of Michel Foucault's critique of unities in his book *The Archaeology of Knowledge*, trans. A. M. Sheridan Smith, New York: Pantheon Books, 1972.
2. Habraken, N. J., *Transformations of the Site*, Cambridge: Atwater Press, 1982, pp. 19-20.
3. See Smith, Maurice. *Fragments*. MIT Class Reader, 1991.
4. Derrida, Jacques. *The Truth in Painting* (Trans. Geoff Bennington). Chicago: University of Chicago Press, 1987, pp. 57-58.
5. Alexander, Christopher. *The Timeless Way of Building*. New York: Oxford University Press, 1979, pp. 365.
6. Hollier, Denis. *Against Architecture: the Writings of Georges Bataille* (Trans. Betzy Wing). Cambridge: The MIT Press, 1989.

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