Scaling Consumer Fintech Ventures: How Firms Seek to Extend Their Initial Technology Advantage and Capture Value Over Time

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ABSTRACT

The fintech sector has experienced intense interest from financial industry participants as the number of fintech start-ups has proliferated and robust growth statistics have prompted financial sector incumbents to respond with their own investments in the sector. As a result of the rapid increase in competition, innovators who have created value have found challenges to capture and deliver this value to end users with sustainable business models. This thesis presents the results of a study of the leading fintech firms using the lens of a value capture and value delivery framework. The framework reveals not only how these firms have successfully navigated through this challenging landscape, but also how they need to be aware of the evolving competitive dynamics over time. The insights presented have implications for potential entrants that seek to launch a consumer focused fintech firm. In particular, a review of the experiences of the most prominent fintech firms reveals how they have used technology to uncover under-served markets and have sought to differentiate themselves and extend their initial advantage by scaling and through strategic partnerships with incumbents.

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Introduction

According to KPMG, venture capital investments into the fintech sector totaled $13.6 billion across 840 financings in 2016. This represented nearly 7% more than the prior high in 2015 (KPMG). Aside from being a powerful indication of the technology driven changes that are underway in the financial services sector, these figures point to the challenges that would-be disruptors face in distinguishing their offerings from those of competitors. In February 2016, McKinsey estimated that there may be as many as 12,000 start-ups globally offering traditional and new financial services. Along with the increase in the number of service providers in the sector, fintech challengers have discovered that the existing clients of incumbent firms are sticky, presenting unique customer acquisition and product adoption challenges for the new technology led businesses. In an ecosystem that invites fast followers, and where the core-products are often not easily differentiable, leading companies will have to identify and invest in the unique capabilities and assets - their strategic resources - that give them a sustainable differentiation advantage over the competition.

The wave of growth in the fintech sector has been characterized by two features that have limited the ability of firms to capture the value that they create through fintech innovation. The first is a proliferation of firms on the supply side which has led to increased horizontal competition. The second is demand side bottlenecks, which have manifested themselves in the tendency of consumers to use only a handful of providers at a time to fulfill their financial needs.

The proliferation of firms on the supply side has occurred as a result of low overall entry barriers due to new technology. Specifically, technology has been an enabler of entry through the combination of cloud computing, big data analytics and new distribution channels. These factors enabled start-ups to replicate and improve on incumbent financial institution business models, as well as to serve previously underserved and unattractive markets (Goldman Sachs Equity Research).
On the demand side, bottlenecks in the ability to sell to the customer have occurred primarily because of the sticky relationships that incumbents have with customers. These sticky relationships have been a contributing factor to the frequently cited high customer acquisition costs in the sector and the difficulty of achieving customer adoption for consumer financial products, especially in markets with a high level of financial service penetration. The strength of the sticky relationships that banks have with customers is particularly well illustrated in instances where fintech banks, such as Moven that set out to “break banks”, are now actively pursuing avenues to partner with and sell their products to banks (Yurcan, American Banker. Sep 2016).

The preceding observations are not intended to deny the early successes that have been achieved in this nascent sector: Lending Club, an online lender, despite experiencing a 75% loss in market capitalization since its IPO, is a leading brand valued at over $2 billion; Betterment, a robo-advisor, has a valuation pegged at approximately $700 million. The point, instead, is to highlight the fact that the path to growth has been more difficult than previously anticipated, and, in so doing, to understand how the most successful fintech firms have managed to gain traction in the market. The leading fintech businesses remain a small fraction of the market value of the incumbents that they initially sought to dislodge. Moreover, the fintech sector continues to draw intense interest from better endowed incumbents who have demonstrated an ability and willingness to replicate the sector’s innovations.

How can fintech firms differentiate themselves from competitors, and how can they craft ways to deliver innovative products and services in the face of these challenges? In particular, how do they manage the twin challenges of increased competition, and demand side bottlenecks? How do they overcome the limitations imposed on them by the sticky relationships that customers have with incumbents? A review of the experience of the most prominent fintech firms suggests that two main capabilities have
been critical to success. The first is an ability to leverage an initial technology advantage in order to serve an uncontested or under-served market. They then extend that advantage through size and defend it through brand building efforts. The second is an ability to leverage a technology advantage to form strategic partnerships that provide access to sticky customer relationships.

Both of the two capabilities mentioned above have limitations. While it makes sense to build on a technology advantage in order to unlock an under-served market at a lower initial customer acquisition cost, over time, these costs increase and introduce risks that threaten the business models of start-ups when they try to scale rapidly. On the other hand, while partnerships enable fintech start-ups to access existing sticky relationships, over time, these relationships become a source of differentiation and competition between stakeholder firms (both fintech and incumbents), requiring an assessment of how capabilities, contributions and competitive positioning evolve over time.

The ensuing analysis offers a useful framework for understanding what it takes for a fintech firm to achieve commercial success and a leading position in a sector that is dominated by powerful incumbents. In addition, it may provide a useful framework for thinking about the decision for a start-up to enter a market, given the predictions about the capabilities needed to acquire customers and to remain competitive over time.
Extending Technology Advantage in Uncontested or Under-Served Markets

We begin this section with the discussion of a generalizable insight that provides a framework for organizing and understanding the evidence that follows. The key insight is that an often-overlooked feature of the initial wave of fintech innovators is that they, despite the hype and rhetoric of disrupting the big banks, began by serving customer segments that incumbents either neglected or served with an inferior product because these segments were hard to serve with prevailing business models.

Once they found and occupied a market segment that was uncontested by the incumbents, the early consumer fintech companies sought to differentiate themselves by scaling rapidly and sustaining their differentiation by building a brand. This strategy makes sense within the context of sticky financial service customers who provide ongoing and potentially increasing revenue streams overtime. Unfortunately for these early round of innovators, their initial technological advantages have proved to be short-lived. As other new entrants and incumbents have replicated their business models, the fintech firms have found it difficult to rapidly scale.

A later cohort of fintech firms has taken the place of the first wave of innovators in leveraging a technology advantage in order to re-segment the market and pursue a new class of under-served customers. They differentiate themselves with ever more unique innovations that are harder, although not impossible, for incumbents to replicate. Similar to the early wave of fintech incumbents, these companies also seek to leverage the window of opportunity provided by their technology advantage in order to scale and eventually build a brand. They too will need to manage the unique challenges of scaling in the financial services sector.

Potential entrants looking to launch a consumer-focused fintech start-up must think carefully about how their technology advantage makes it possible to better serve a
previously under-served customer segment, and relatedly, how it enables them to scale cost-effectively.

**Initial Innovators in Under-Served Markets**

To illustrate the assertions made about the role of innovation in facilitating the opening up of hitherto under-served customer segments, we consider the examples of robo-advisers, free peer-to-peer money transfer services and online market-place lenders. Robo-advisors entered the market in order to provide investment advice to a customer segment that could not afford the high account minimums associated with traditional investment advice, and offered these customers a low-cost product with either a low or no-minimum balance requirement. Likewise, Venmo, the free peer-to-peer money transfer service entered the market at a time when banks did not have such a service, separate from a fee-for-service domestic wire transfer product. Similarly, online lending platforms such as Lending Club entered the market with attractively priced unsecured consumer loans that appealed to prime rated credit card customers who wanted to consolidate their debt at lower interest rates at a time when banks were constrained by regulation from offering unsecured consumer loans to this customer segment. Technology was the key enabler in these innovations to serve customer and product segments that incumbent institutions had previously not considered viable.

The technological advantage that these companies initially enjoyed has eroded over time, as other new fintech entrants and incumbents replicated their business models. Established wealth management institutions such as Vanguard, Fidelity and TD Ameritrade have set up their own robo-advisors. Banks have introduced competing free peer-to-peer money transfer services, beginning with their own branded money transfer services (Chase QuickPay is one example). More recently they launched Zelle, a money-transfer app built on top of a bank owned payment network that connects the country’s biggest banks (Del Rey, Recode, Oct 2016). In the unsecured consumer lending sector,
banks and credit card companies have demonstrated an ability to enter the market, with Marcus by Goldman Sachs and NextStep by American Express as prime examples.

Faced with the diminishing importance of a technology advantage as a key differentiator, the leading firms have generally sought to differentiate themselves by scaling rapidly. This has been particularly true in the online marketplace lending sector, where the key innovation was leveraging technology to bypass the banking system and match investors with borrowers with speed and at scale. Lending Club grew its loan originations by 271% over a two-year period beginning at the end of 2012. Of particular significance, this growth came at a time when many banks had pulled back from lending to lower credit borrowers. Lending Club reportedly lent to borrowers with FICO scores of 660, a respectable score, but lower than what most banks considered acceptable at the time (Andriotis. WSJ. May 2016).

On the surface, scaling quickly makes sense in the consumer financial services sector if a firm can take advantage of sticky customers. The justification here is that once acquired, companies can cross-sell to sticky customers. This is exactly what these companies have sought to accomplish. Once the source of differentiation has been established through size, the new companies can then attempt to defend and cement this differentiation by investing in building a brand, increasing customer loyalty or switching costs and eventually attempting to enter adjacent customer or product segments through cross-selling.

SoFi is an example of a fintech company that has moved aggressively beyond its roots as an online student loan provider to become a $4 billion company that now provides other asset lending products including auto and mortgage loans, insurance products, and is also transforming itself into a deposit taking institution. SoFi continues to distinguish itself by targeting the millennial customer who was the original target customer at the time that the company decided to launch student loans. As these customers’ lives evolve,
they now need more financial services beyond student loans, and SoFi is well placed to provide these. With respect to investing in building a brand, SoFi famously paid for a 30 second advertisement spot in the 2017 superbowl – a fintech first.

Scaling rapidly in the credit extension business, however, comes with particular risks. The rapid growth of Lending Club and other online marketplace lenders came at a price as they later began to report higher than projected credit losses. Their stock prices have since suffered, as the market has realized that these lending businesses could not grow sustainably at the prior projected rates, absent any technological advantage that provided an edge in selecting a better credit borrower. Lending Club stock is approximately 75% off its high point, while OnDeck Capital, an online lender to small businesses, is approximately 80% off its high point, at the time of this writing. SoFi has not been spared either as it has seen its borrowers defaulting at higher rates than the underwriters for one of its bond deals had expected. The CEO of Prosper, another online lender that laid off at least 28% of its workforce in 2016, was quoted as saying that the credit issues at the company that resulted in staff cuts were largely the result of “lending too much, too fast, and a grow at all cost attitude fueled by insatiable demand from investors” (Scully, Matt. Bloomberg. March 13, 2017).

In the robo-advisor world, the source of technological advantage was the ability to provide low cost customized wealth management advice online. Robo-advisors found faster adoption by millennials, given the challenges associated with early technology adoption by older generations and given the fact that these robo-advisor offerings did not require account minimums. The challenge for robo-advisors is that they have not been able to scale fast enough. While the future growth trends associated with automated wealth management advice might be promising, the millennial market has not been a sufficiently lucrative market as millennials are not yet wealthy.
Next Wave Innovators and New Customer Segments

A later cohort of firms has sought to differentiate through a hard to replicate technology advantage that gives them access to a new customer segment. Specifically, these are firms that have tried to establish alternative credit rating or credit selection methodologies that do not rely on the widely-used FICO credit score. Examples of these non-FICO lenders include companies such as Affirm, which targets millennials who do not have a good credit score and uses other metrics including estimates of the customer's future potential earnings to determine credit worthiness. Zest Finance is another company founded by Google's former CIO and VP of Engineering that uses machine learning in order to incorporate more data to use in underwriting. Finally, EFL has developed a psychometric scoring tool that creates an understanding of an individual's risk and opportunity profile in order to enable lenders to make lending decisions.

It is difficult for incumbent players to follow these types of new entrants because traditional lending businesses are built around the FICO score. All the underwriting models as well as financing contracts and stakeholder views about the credit quality of their portfolios is based on the FICO credit models. To the extent that the new non-FICO based credit underwriting models actually deliver a competitive advantage in terms of enabling the selection of better credit borrowers, they would prove to be a compelling differentiator upon which to scale.

Affirm has also sought to differentiate itself through a customer acquisition strategy that is anchored in building proprietary relationships with merchants and linking access to its credit facilities to the consumer's purchase decision. It does this by making installment or purchase loans to customers at the point of sale. Merchants are incentivized to adopt Affirm as a payment option for their customers because it enables the merchants to get a larger share of customer wallet, much as is the value proposition for a credit card. Affirm's purchase loans boost conversion, revenue and customer
loyalty. In its marketing to merchants, the company cites a 75% lift in average order value, a 10% increase in revenue per visitor, and a 20% lift in conversion as better financing reduces price sticker shock\(^1\). The network that Affirm has built of proprietary merchant relationships and customers who need credit provides the firm with a basis upon which it can scale and extend its ability to acquire new and repeat customers cost effectively.

The challenge that the new non-FICO based lending business models face is that standardization is often needed in order to attract large-scale capital deployment which then ensures scale. In established economies, they would need to engage in the kind of confidence building activities that require open exchange and revelation of the mechanics of the very same models that make them unique. To illustrate this last point further, in the United States, the Federal Trade Commission issued a 2016 report asserting that big data could be used as a tool for inclusion or exclusion and reminded market participants of the regulations that govern equal opportunity such as the Equal Credit Opportunity Act. The upshot is that as alternative credit scoring firms scale and potentially access sources of regulated capital in the United States, they would increasingly attract the attention of regulators who will likely engage in a process of inquiry that requires firms to justify their credit decision making process and prove that they are non-discriminatory. This is a very different state of affairs than what a firm such as Google deals with when it optimizes and changes its proprietary search algorithm - it does so at will and in secret. In addition to regulatory scrutiny, alternative lenders looking to scale would need to convince a large swathe of capital markets participants of the validity of their methodologies and in attempting to do so, may need to share key aspects of their proprietary credit underwriting models.

\(^1\) [https://www.affirm.com/business/d](https://www.affirm.com/business/d)
Extending Technology Advantage Through Strategic Partnerships

One of the more surprising developments of the fintech innovation story has been the prevalence of partnership relations with incumbents. This is notable because the rhetoric of the fintech start-ups in the early days was focused on competing against and replacing the banks. There are a number of examples that illustrate the prevalence and diversity of these strategic partnerships. In the small business lending sector, OnDeck Capital, a non-bank online small business lender has a partnership with JPMorgan Chase, a large global bank, in which JPMorgan Chase uses OnDeck technology to offer online loans to its existing small-business customers. In the wealth management sector, SigFig, a San-Francisco based technology company that develops technology for automated wealth management advice, has partnered with UBS, a large global bank, in order to develop financial technology to power UBS' ambitions to have a robo-advisor that would be plugged in as a resource to its army of financial advisors and clients. In the mortgage lending sector, Blend, a Silicon Valley technology company that provides an end-to-end enterprise solution for lenders, has partnered with a number of lenders, including Movement, in an arrangement that uses technology to power Movement's mortgage lending business.

The key consideration in assessing the nature and quality of these partnerships and their strategic implications for collaboration and competition in the value chain is understanding how much each party in the partnership relies on the other for value creation, who owns the customer and how the contribution of value to the relationship and customer ownership changes over time (Simester. Delivering Value).
Why Fintech Companies and Incumbent Financial Institutions Partner

It has become clear over the last couple of years of the existence of high growth fintech companies that the high switching costs for customers - due to loyalty or habit - are a strategic resource for incumbent financial institutions. The scale and existing relationships with sticky customers gives incumbent players a significant advantage over fintech firms in capturing value. Thus, fintech companies have had to seek partnerships as a way to get access to banking customers.

On the other hand, incumbent financial institutions have been attracted to relationships with fintech firms in order to access the kind of innovation that they either do not currently have the capacity to develop or have made the decision to not invest in developing. Incumbent players have discovered that their real current competition continues to come from other large incumbent players. As such, incumbent firms see fintech players as a source of innovation and differentiation with respect to their current competition. They recognize that they benefit from developing relationships with innovators and a reputation for collaboration in a robust innovation ecosystem, precisely because the recent advances in technology and the digitization driven changes in customer expectations means that no single firm has a monopoly on cost effective and timely innovation.

A clear example of the association that incumbent firms make between meeting their competitiveness needs and partnership with fintech firms was evidenced in early 2016 when JP Morgan laid out a technology plan that included developing fintech partnerships across the bank and providing fintech companies with in-depth exposure to the bank’s challenges as top priorities (Glazer, E. WSJ. Feb. 2016). The interest in developing a robust ecosystem is observed across the sector with incumbents such as Barclays, BBVA Santander and many others setting up fintech innovation centers to connect with fintech start-ups.
Who Owns the Customer?

In the current construct, where incumbents retain the ability to deliver the customer relationships, they clearly own the customer. However, as has already been noted, incumbents partner with fintech firms in order to access innovation which helps them differentiate themselves with respect to their competitors. This would imply that the differentiation that their customers care about is precisely the differentiation that the fintech firms provide, thus putting the fintech firms in a position where their bargaining power may increase over time as customers become more reliant on the innovation that the fintech firms produce.

In order for a fintech firm to gain power over a customer relationship it is important that the technology advantage that forms the basis of the partnership is not easily replicated. To the extent that it is easily replicable, then the incumbent firm is more likely to maintain ownership over the customer because it can credibly threaten to replicate the technology. The same result would obtain if there are other capable fintech providers. To the extent that the technology is not easily replicable, then customer ownership is more likely to shift toward the fintech firm. As has already been discussed, incumbent firms have demonstrated an ability and willingness to replicate the innovations in a sector which also has a number of other new fintech entrants. This suggests that the transfer of customer ownership away from large incumbents may not always occur.

Analyzing Fintech Partnerships

In order to illustrate the considerations that come into play when fintech companies seek strategic partnerships in order to access financial institution customer relationships, we review a short case study of the partnership between JP Morgan Chase and OnDeck. As has already been briefly mentioned, in this partnership relationship, JP Morgan Chase uses OnDeck technology to offer online loans to its existing small-business customers. JP
Morgan provides both the capital and the customers, while OnDeck provides underwriting and product distribution technology. JP Morgan entered this relationship in order to provide a needed service to its small business customers who were not very well served by any of the bank’s existing products.

OnDeck’s technology enables JP Morgan to satisfy its existing customers and to acquire new ones in its bid to gain market share from its rivals, Bank of America and Wells Fargo, in the small business lending sector. In addition, the partnership is consistent with JP Morgan’s desire to efficiently maintain and grow a small business lending strategy that helps it bolster the narrative of a bank that helps the economy. In exchange, OnDeck gets fees to originate and service loans for JP Morgan. OnDeck can also use the data that it gleans from the partnership in order to improve its lending models.

To the JP Morgan client, OnDeck is invisible. OnDeck clients who come through JP Morgan’s banking relationships remain JP Morgan customers. OnDeck is also prevented from pitching its loans to borrowers that JP Morgan rejects (Rudegair, Glazer, Simon. WSJ. Dec 2015). These provisions suggest that in addition to the impact of market and technology specific dynamics over customer ownership, JP Morgan Chase also uses contracts to protect its ownership of its customers.

An additionally important strategic question that this partnership raises is whether JP Morgan, a sophisticated financial services firm that spends almost $10 billion a year on technology investments (Glazer, E. WSJ. Feb. 2016), would choose to replicate OnDeck’s capabilities over time, thus becoming less reliant on OnDeck or, more ominously, transforming into a more aggressive direct competitor. More generally, how long might an incumbent find it beneficial to partner with fintech firms before deciding to develop capabilities that compete directly with these firms? In the case of the partnership between JP Morgan Chase and OnDeck, it would appear that JP Morgan’s incentives to build an OnDeck replacement are diminished because OnDeck has made a credible
commitment to not compete with JP Morgan for any of its customers, including over those who do not get approved for loans by JP Morgan Chase. In addition, for reasons of cost and convenience, JP Morgan Chase for now appears to have made a strategic commitment to outsource the technology that makes possible the provision of small business loans. By contrast, JP Morgan has not made a similar commitment in the unsecured lending space where it already has a large credit card business that might be cannibalized if it were to partner with an unsecured consumer loan provider such as Lending Club.

For as long as JP Morgan is concerned about a rapidly evolving business environment where it sees the competitiveness-driven benefits of bringing innovation from the outside-in, it is likely to tilt toward activities that support, rather than those that destroy their fintech partnerships. In addition, given the risk mitigation and heavy compliance imperatives associated with operating in a heavily regulated industry, it is in a bank's interest to have a service partner that has a robust business with the appropriate risk mitigation controls in place. As such, a bank like JP Morgan may avoid strategic moves that could lead to the decline of OnDeck, when OnDeck provides a valuable and differentiating service to JP Morgan's customers. Further, by delineating their roles in the manner that they have done, each partner has an incentive to make continued investments in the partnership's success – JP Morgan on customer acquisition, OnDeck on improving the technology and credit underwriting model.

Over time, if OnDeck were to exhibit the characteristics of growing to become a competitor, we might expect to see JP Morgan choose to either enter strategic partnership relationships with OnDeck's competitors, or to buy OnDeck outright. Given its size at a $300+ billion market value (roughly 1,000 times the size of OnDeck), JP Morgan Chase has the ability to exercise either option at will. Thus, it is highly likely that at the end of the current innovation cycle, the story that will be told is not how large
banks got disrupted by fintech upstarts, but rather, how they incorporated fintech innovations through strategic partnerships.

From the perspective of the fintech start-up, a tie up with a single financial institution may be undesirable when an incumbent cannot afford to allow its fintech partner to get too large and is incentivized to undermine the fintech company's bargaining power. A dominant strategy for the fintech is therefore to cultivate multiple partnership relationships. Although most fintech firms only speak about their strategic partnerships from a value delivery perspective, the ability to strike a diverse range of partnerships is a critical value capture defensive move that fintech companies should consider. Fintech companies can leverage their capabilities to empower smaller banks and lenders that can provide additional distribution avenues and thereby improve the ability to bargain vis-a-vis the larger industry players. In June of 2015, Lending Club played this precise move by signing an agreement with more than 200 community banks through the industry cooperative group, BancAlliance. The community banking business model has been under assault for years in part because of the growth of national brands with a wider product suite. The hope for the community banks is that partnership with fintech firms such as Lending Club, will enable them to harness the power of technology that they couldn't develop themselves, provide a broader product suite to their existing customers and better compete within their territories against the national brands (Sterngold, James. WSJ. June 2015).

Fintech firms can also seek to exert influence on the partnership relationship by choosing those relationships where they can extract and contribute increasing value from data aggregation over time. For instance, OnDeck’s underwriting algorithms benefit from capturing JP Morgan customer data and pooling it with data from other partners and also from OnDeck’s own underwriting activities. The value of an increasingly smarter algorithm should prove attractive to JP Morgan in incentivizing it to maintain an ongoing relationship with OnDeck.
In the robo-advisor space, incumbent players seem to have taken a less collaborative approach toward robo-advisors, instead launching direct competitors that go after the fintech robo-advisor business models. The partnership between Betterment and Fidelity collapsed in less than a year and Fidelity promptly launched a competitive robo-advisor product, Fidelity Go. As has been mentioned before, a number of established wealth management institutions such as Vanguard, Fidelity and TD Ameritrade have set up their own robo-advisors.

The more aggressive response to competition in the robo-advisor space may have occurred because the fintech robo-advisor companies represented a more direct assault on the incumbent's customer base. In addition, other capabilities matter in lending, such as the ability to pick and choose different customer segments based on the differentiated risk appetite of the capital providers. As such, even though JP Morgan has a large balance sheet, it likely does not have the risk appetite to serve the entire universe of small business customers. It therefore needs to pick and choose its customer segments through a combination of its access to capital and its risk appetite, leaving OnDeck and its other partners to serve other customer segments. If JP Morgan had unlimited access to capital, or an unlimited desire to take on risk, they might find it less appealing to support the growth of a partner like OnDeck.

SigFig in the wealth management category and Blend in the mortgage lending space offer yet more examples of partnership relationships with incumbents where the fintech start-ups develop a product that has the capability to interface with and deliver value directly to the customer. These two firms have chosen to focus almost exclusively on serving the needs of incumbents as opposed to also building a consumer brand. SigFig develops technology to enable incumbents to provide a ready to use robo-advisor service, and has signed up partnerships with UBS, Wells Fargo and Cambridge Savings Bank among others. Blend provides end-to-end mortgage lending technology solutions to
underwriters and has partnerships with Movement Mortgage, Guardian Mortgage, Concord Mortgage and many other groups.

In both examples, the fintech companies have developed technological capabilities that should dis-incentivize the incumbents from investing in these capabilities themselves. The fintech companies are developing capabilities that cut across the industry needs in specific customer use cases and they do not appear to present a current competitive threat. Their services exhibit features of embeddedness and replace various parts of an incumbent's workflow.

The question for incumbents who engage in relationships with these start-ups is whether over time, a start-up such as Blend, having established the industry standard for delivering an end-to-end technical solution for mortgage lending, might then choose to launch its own direct to customer mortgage lending experience. As such, should Blend appear to be gaining dominance in the industry, we might expect the future industry adopters to either develop their own capabilities, or transfer their support to a competitor of Blend. In knowing this ahead of time, Blend can make a strategic and credible commitment to remain in the business-to-business service provision business. Companies such as Bloomberg and Intex Solutions have built lucrative businesses by committing to become service providers and not competitors to the financial services industry.
Conclusion

As the sector evolves and technological changes usher in a new generation of fintech innovators, fintech firms will likely be faced with similar choices about the extent to which they should use their own resources in order to scale versus the extent to which they use partner resources. To the extent that they have a technology advantage that is harder for an incumbent to replicate, they will be in a more powerful position to acquire and own the customer. However, meeting the standard of a technological innovation that is hard for a powerful and motivated incumbent to replicate is difficult. As such, the more likely outcome in the near to medium term is that the market will continue to evolve in order to accommodate strategic partnerships that enable fintech companies to access sticky customer-incumbent relationships and that provide incumbents with the kind of differentiating innovation that enable them to compete with each other. For aspiring fintech innovators, the implication would be to start building partnering capabilities early in the business formation process.
Works Cited List


Del Rey, Jason. “America’s biggest banks have announced their Venmo competitor, Zelle”. Recode. 24 October 2016. https://www.recode.net/2016/10/24/13376676/payments-zelle-banks-venmo-paypal-send-money


