

# Competitive Strategies for Online Businesses

—The Duality of Mechanisms for Building Uniqueness  
and Imitation in Online Securities—

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**【Abstract】** Internet business has brought radical changes to business domain structures, methods of competition, and corporate management, not only in Japan, but also globally. Still, there is insufficient academic research on competition between companies at the dawn of the Internet business age, when the market was still extremely uncertain. Especially in the internet business world, where it is relatively easy to mimic the strategies of other companies, questions remain as to how competitive advantages were achieved and maintained in the earliest period of this market, what logic underpinned the mechanisms and background for these developments—research on these issues is still required.

The present study takes up inter-company competition in the Japanese online securities industry at the dawn of the internet era. A robust hypothesis is derived on the basis of a detailed literature review. Thereupon, careful empirical analysis is made of both quantitative and qualitative aspects. This study presents breakthrough research, making a logical, empirical contribution with high novelty and usefulness. A major fruit of this study is in regard to the mechanisms that engendered large differences in performance between companies. These were clarified through a strategic, dynamic approach. Further, in regard to mechanisms that enabled companies to retain a competitive advantage despite imitation, a new evolutionary model constructed via focus on the dual-sided nature of imitation is shown.

As described above, the present research provides sweeping academic results, covering innovation theory, competitive strategy theory, management and information systems, and sociology fields. This study can thus be said to have successfully provided major contributions.

**【Keywords】** Online business, Online securities, Competitive strategy, Innovation management, Early days of a new market

## 1. Introduction

My book *Competitive Strategies for Online Businesses: The Duality of Mechanisms for Building Uniqueness and Imitation in Online Securities* (December 2018, published by Yuhikaku) won the Research Encouragement Award at the 2020 Japan Academy of Business Administration Awards. Following being awarded the 2006 Japan Academy of Business Administration Award for “Competition and Formation of Differences among Companies through ‘Dominant Conventional Wisdom,’” I am sincerely happy about receiving this highly prestigious award.

An “Academy Award Session” was organized for the 93rd Annual Meeting of the Japan Academy of Business Administration, and I had the opportunity to deliver a lecture before many of its members. I would like to take this opportunity to express my gratitude to the professors of the Japan Academy of Business Administration and the Review Committee for the Academy Awards for their support in my life as a researcher.

In this book, I discuss competition in the early days of the online securities industry in Japan, asking the following questions: “Why does so little imitation happen in an environment where imitation is relatively easy, so that the competitive advantages of certain companies are sustained for a long time?” “When strategy homogenization caused by imitation occurs, why does the performance of imitated top companies sometimes continue to grow, despite intensifying competition in the same strategy group?”

In the course of the analysis to address the research questions, I could contribute to the theoretical research on innovation management and competitive strategy theory and empirical research on the rapidly developing online business model. The following provides an overview of the arguments I developed in this book while keeping these points in mind.

## **2. Outline of the Book**

This book comprises two parts. Part I describes the theoretical background and framework of this study, and Part II explains the qualitative and quantitative empirical analyses of competition among firms in the early days of the online securities market. The following examines how the research questions were answered through a review of individual arguments.

### **2-1. Theoretical Background and Framework**

Part I contains Chapters 1–3 and discusses the framework for surveying and analyzing existing research related to the research questions.

First, Chapter 1 includes a literature survey on innovation theory to provide hints regarding competition among firms in the early days of a new market. Specifically, I examined a series of studies on dynamic changes in the competitive structure caused by innovation, focusing on the Abernathy-Utterback (A-U) model (Abernathy & Utterback, 1978) (e.g., Abernathy, 1978; Utterback & Suárez, 1993). The model argues that an analysis based on the view of competition assumed by general competitive strategy theory is challenging because the uncertainty of the competitive environment is exceedingly high in the early days of a new market. Essentially, the structural characteristics of an industry and companies’ strengths and weaknesses cannot be regarded as given conditions. Thus, “external and internal factors of a company dynamically change while influencing each other over time” must be considered an approach to analyzing and describing competition among companies in the early days of a new market.

Next, Chapter 2 highlights the limitations of conventional competitive strategy theory in terms of answering the book’s two research questions. This is based on a literature survey of competitive strategy research. Regarding the first research question, the longitudinal approach focuses on the dynamic processes by which a company’s competitive advantage is formed and maintained (e.g., Noda & Bower, 1996; Fujimoto, 1997); however, this discussion is insufficient. For the second research question, I argue that dealing with the positive aspects of imitation is difficult because existing research on competitive strategy tends to focus only on the competitive aspects of a narrow range of

players. In the early days of a new market, when the “right answer” is unclear, the number of companies with the same strategy does not increase because of the intensifying competition. Rather, this is done as a way to signal to various actors, such as (potential) customers and other stakeholders, that the strategy is “right,” making it easier for imitated companies to acquire the resources they need from outside. Nevertheless, dealing with such positive aspects of imitation according to conventional competitive strategy theory is difficult.

Accordingly, this chapter concludes by discussing the possibility that these problems in existing research on competitive strategy can be overcome by adopting a behavioral system approach (e.g., Numagami, 2000).

Chapter 3 further discusses the two research questions addressed in the book: “Why does so little imitation happen in an environment where imitation is relatively easy, so that the competitive advantages of certain companies are sustained for a long time?” “When strategy homogenization caused by imitation occurs, why does the performance of imitated top companies sometimes continue to grow, despite intensifying competition in the same strategy group?”

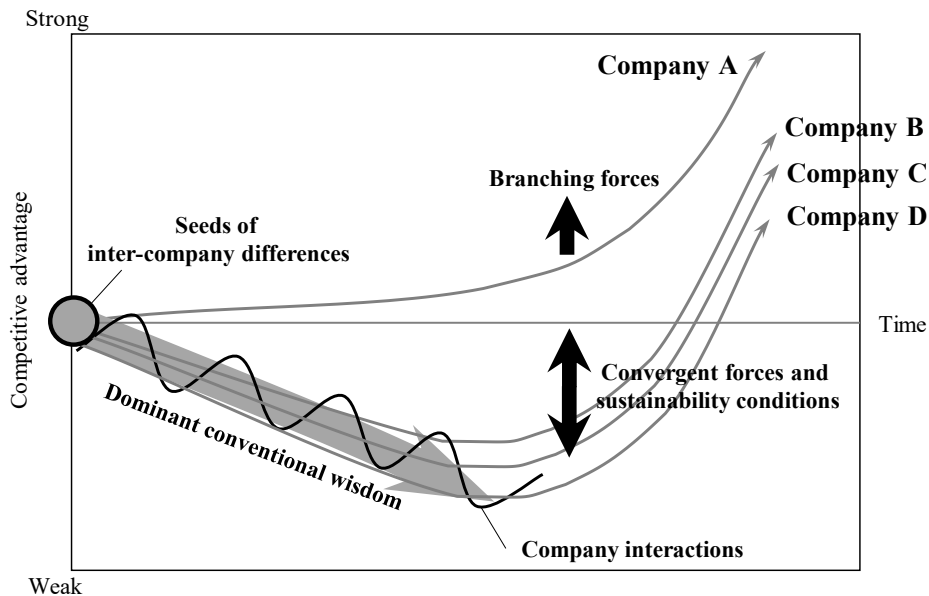
First, as a new framework for conducting analysis relevant to the first research question and based on Noda and Collis (2001), a well-known study using the chronological approach introduced in Chapter 2, I incorporate the perspective of the behavioral system approach and construct a framework for “the processes of forming, expanding, maintaining, and converging differences among companies with competitive advantages.”

Noda and Collis (2001) sought to construct a strategic theory about the processes of forming, expanding, sustaining, and converging differences among companies with competitive advantages in the same industry. They presented a comprehensive framework that focuses on the strengths and weaknesses of the following three components and their interrelationships: (1) the “initial conditions” and “initial experiences” that produce the “seeds” of differences among companies with competitive advantages, (2) “branching forces” that expand the differences among companies with competitive advantages, and (3) “convergent forces” that lead to the convergence of differences among companies with competitive advantages and the “sustainability conditions” that hinder and maintain the former. This framework can describe dynamic processes whereby differences in positions, resources, and capabilities arise among companies. While these differences are expanded by internal factors in individual companies, they gradually converge through imitation by other companies. As such, this answers the two research questions of the book to a considerable degree.

However, in their framework, the only factor that widens differences among companies with competitive advantages is inertia within the company, as defined by initial conditions and experiences. Moreover, for them, only two factors maintain differences among companies with competitive advantages. First, other companies fall into inertia. Second, certain properties of unique resources and capabilities formed within companies make it difficult to imitate, such as adherence to patents and information and ambiguous causal relationships. Thus, in industries relatively easy to imitate, such as the online securities industry, explaining the mechanisms by which certain companies maintain their competitive advantages over a long period has not been easy.

Following the above, this chapter uses the analytical framework of Noda and Collis (2001) and proposes a new framework that can more comprehensively describe the processes of forming, expanding, maintaining, and converging differences among companies with competitive advantages. This framework includes (1) “differences in interpretations of technologies and customer needs” as a factor that leads to differences in initial experiences, and (2) “institutional isomorphism” as a factor that defines the strength of sustainability conditions (Figure 1).

**Figure 1. Processes of forming, expanding, maintaining, and converging differences among companies with competitive advantages**



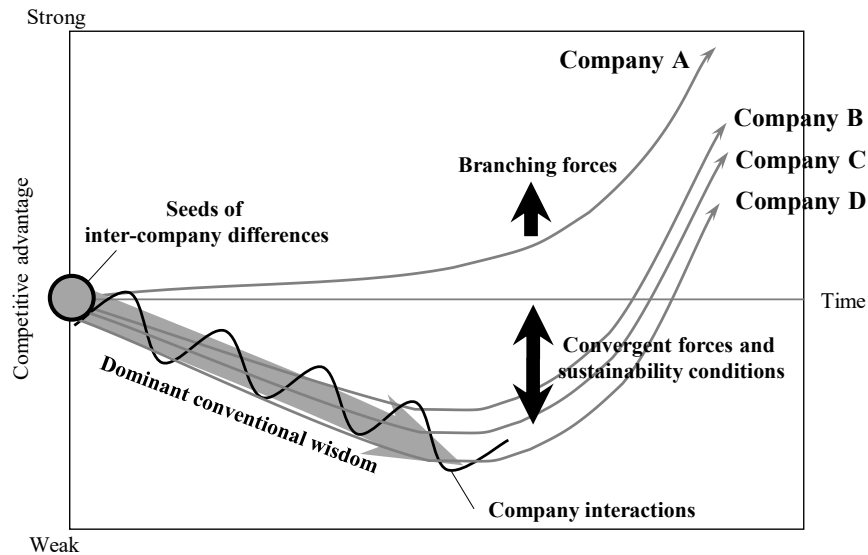
Factor (1) signifies that even if the requirements inside and outside the company are the same from an objective viewpoint, if top management and other managers in individual companies interpret technologies and customer needs differently, there will be differences in behavior among companies. This will, in turn, create differences in initial experiences and sow seeds for differences among companies with competitive advantages. Furthermore, by influencing the direction and size of the vector along which companies move, it will act as a branching force that amplifies and expands the differences among companies with competitive advantages.

Factor (2), institutional isomorphism (e.g., DiMaggio & Powell, 1983), highlights the importance of synchronizing with laws, higher-level organizations, and other companies when selecting a strategy plan from among multiple proposals in periods of extreme uncertainty, such as the early days of a new market. It refers to the process of gaining legitimacy (e.g., Hannan & Freeman, 1984). As a strategy becomes widespread, this process of institutional isomorphism (especially imitative isomorphism) eventually transforms into “dominant conventional wisdom” in the industry. Thus, the strategies adopted by many companies become dominant conventional wisdom, creating powerful isomorphic pressures that will not easily change as long as overlapping factors reject change within each company, even if they do not secure any strategic advantages when observed retrospectively. This can lead to endless competition along an irrational axis, resulting in a phenomenon where the strategies of successful companies are not imitated over time.

In this new and revised framework, the strategic path of each company and persistence of differences in competitive advantage formed as sets are determined by how strongly each of the three elements exercises its influence after incorporating the above two conditions. If “differences in interpretations of technologies and customer needs” lead to big differences in initial conditions and initial experiences, or if “dominant conventional wisdom” is formed so that the sustainability condition among the three factors becomes exceedingly strong, the differences among companies with competitive advantages will be larger than usual and are more likely to persist for a considerably longer period.

Second, as a new framework for conducting analysis relevant to the second research question, I constructed a framework for a “four-stage evolutionary process in new markets” based on the evolutionary approach of Aldrich (1999) (Figure 2).

**Figure 2. Four-stage evolutionary process in new markets and the effects of imitation**



The framework assumes that the growth process of a particular strategy group and its leading companies in a new market will occur in the following stages. A particular strategy group and its leading companies gradually grow while gaining support from their customers. However, there will be an increasing number of entries as other companies engage in imitation. This will increase the number of companies in the strategy group, and simultaneously, the leading companies' share will be lost to other competitors as competition intensifies. Nevertheless, the increase in the number of companies boosts the social recognition of and trust in the strategy group; thus, the total amount of the proverbial pie increases. In the early days of a new market, as positive effects outweigh the negative impacts, the final share of the leading companies is expected to increase ultimately (e.g., Carroll & Hannan, 1989). Nonetheless, as the strategy group continues to expand and eventually becomes a dominant player in the new market, the negative effects of the growing number of companies will become greater than the positive ones, causing more companies to depart from the strategy group. If the group can survive this period of severe selection, its members at that time will become major players in an oligopolistic market.

Therefore, according to this framework, regarding the influence of imitation, there are negative and positive effects as well as a total effect, which are obtained by subtracting one from the other and change as the evolutionary process develops. Thus, the positive effects outweigh the negative ones in the early days of a new market, so that the performance of leading companies may actually improve as they are imitated by others.

## **2-2. Qualitative and Quantitative Empirical Analysis of Inter-Company Competition in the Early Days of the Online Securities Market**

Part II includes Chapters 4-9. In these, the research questions are answered through analysis that employs the framework constructed in Part I.

## **2-2-1. Preparation for Framework Application: Empirical Analysis of Success Factors in the Online Securities Industry**

First, Chapters 4 and 5 present a quantitative analysis of the “success factors of the online securities industry.” These have not yet been sufficiently verified based on data evidence and are subject to anecdotal discussions. This is to prepare to apply the framework presented in Chapter 3 to the case analysis.

In Chapter 4, I examine the question, “What types of companies performed well in the early days of Japan’s online securities industry?” To this end, a multiple regression analysis is conducted for six new top companies specializing in online securities that took the lead in the early days of the industry.

The results showed that in the early days of competition in this industry, diseconomies of scale were evident, where performance decreased when the number of accounts increased. Furthermore, the introduction of margin trading and flat-rate pricing (including notice of the latter) positively impacted performance improvement. Essentially, it was quantitatively shown that strategies to increase the number of accounts worsened performance, while those to increase the use rate per account by acquiring active users who frequently trade improved performance. However, in this regard, I also note the substantial differences in the actual strategies of individual companies, which might have occurred because of differences in their resources and capabilities.

Next, Chapter 5 analyzed how long all companies that entered the early days of the online securities industry in Japan survived to determine “What types of companies survive the fierce competition for survival?”

The results showed that in the early days of competition in this industry, measures such as margin trading, low fees, and large product offerings, which are important for acquiring and retaining active users, had a positive impact on the time survived. Furthermore, first-mover advantage was observed in that “companies that entered the market early had a lower risk of withdrawing from the online securities industry.” Nonetheless, even some companies that entered the market relatively early were more likely to withdraw if they failed to take measures crucial for acquiring and retaining active users.

The results of Chapters 4 and 5 were significant because they quantitatively examined success factors in the online securities industry, which were previously only anecdotal and without sufficient evidence. However, the discussions simultaneously highlight the implications of differences in corporate strategy for companies’ performance and survival. Now, assuming that it is easy to imitate the strategies of other successful companies in the online securities industry, the following question emerges: “Why do differences among companies arise, and why are they maintained in an industry where it is relatively easy to imitate others in the early days of the market?” The quantitative analysis of success factors in the online securities industry highlighted the book’s first research question.

## **2-2-2. Framework Interpretation: Qualitative and Quantitative Empirical Analysis of Competition Among Companies**

Next, Chapters 6-9 introduced detailed examples of competition in the early days of the online securities industry and reinterpreted them as per the framework presented in Chapter 3 to verify its effectiveness.

First, Chapter 6 chronologically describes the process of the emergence of competitive advantages among companies in the online securities industry in Japan. Here, I focus primarily on the six leading online securities companies (which later became five companies due to a merger) currently ranked at

the top of the industry. I meticulously trace their strategic actions and resulting performance back to the time each entered the market.

In the early days of Japan's online securities market, many companies implemented a "strategy to acquire as many accounts as possible" by reducing fees to acquire a large number of new customers. This was in the hope of an "explosive influx of new customers into the market." However, no large influx occurred, and their business performance worsened. Only Matsui Securities continued to do things its way, implementing a strategy to improve the use rate to introduce margin trading and a flat-fee menu to acquire active users and improve the use rate per account (turnover rate). The company achieved such success that it became known as the "only winning company." In this chapter, I clarify these facts and confirm that Matsui Securities' strategy has been considerably effective since that time. I also highlight that despite this being well-known through various objective indicators and President Matsui's words and actions, other companies did not follow this strategy. Consequently, only Matsui Securities continued to profit for more than two years.

Moreover, after more than two years, other companies belatedly imitated Matsui Securities' strategy. Despite an efflux of many customers and other negative effects for Matsui Securities, its performance improved overall because it was being imitated by others.

Chapter 7 empirically examines the patterns of product innovation and process innovation adoption at the corporate level during the early days of Japan's online securities industry. Using text mining, this chapter also explores the influence thereof on the industry, competition, and corporate performance.

The results showed that (1) at the individual company level, the rate of product innovation was initially high, and the rate of process innovation was low. However, around the time a dominant design emerged, the rate of product innovation decreased, and the rate of process innovation increased in a reverse pattern. Furthermore, (2) around the time the dominant design was adopted, there were changes in market share, performance, and innovation.

Based on the framework for "the processes of forming, expanding, and converging differences among companies with competitive advantages" constructed in Chapter 3, Chapter 8 reinterprets the case studies described in Chapter 6 to clarify the effectiveness of the framework. An outline of that discussion follows.

Under the initial condition of having become a call center-only securities company before the full-scale start of the online securities market, Matsui Securities learned the importance of attracting active users and improving the use rate per account rather than merely increasing the number of accounts. Thus, the company chose to develop and provide products and services that combine margin trading and flat-rate pricing, resulting in it successfully attracting middle-aged and older wealthy individuals, who comprise the core of those with experience in investing in stocks. This initial experience created momentum in the company to implement a use rate improvement strategy targeting active users more thoroughly.

Conversely, other companies focused on acquiring as many accounts as possible through fee price reductions and mergers. Initially, they experienced a rapid increase in the number of accounts. This difference in initial experience between them and Matsui Securities created momentum in each company to pursue an account acquisition strategy subsequently. This widened the differences between Matsui Securities and other companies.

However, this difference was no more than a small barrier because the other companies could imitate Matsui within a few months. Here, the biggest sustainability condition preventing imitation was that companies other than Matsui Securities acted in accordance with the "dominant conventional wisdom." They were caught up in the "dominant conventional wisdom" of "an explosive

influx of new customers” fostered through precedents in the United States and the IT bubble. Consequently, they implemented a strategy of “winning the price competition, attracting many new customers before other companies, and then making money” rather than imitating that of Matsui Securities.

The strategy adopted by Matsui Securities in the early days of the online securities industry to “improve the use rate by acquiring active users” was aligned with the true needs of customers at that time. The strategy was effective based on published data and President Matsui’s remarks. Nevertheless, although other companies were aware of the effectiveness of Matsui Securities’ strategy, they underestimated it, considering the company’s target market a niche and believing that its strategy could not become mainstream. Thus, they continued competing for fee reductions in an endless quagmire.

Although a change in market perception finally occurred more than two years after the full-scale start of the market, at that time, the difference in performance between Matsui Securities and the other companies had already widened considerably. From late 2001 to 2002, other companies finally began to catch up by imitating Matsui Securities’ strategy, although the effects of its leading the market for two years without imitation by others continued for a long time. During that time, Matsui Securities continued to grow as if it were in a “gap caused by the concentration of multiple companies” at an important time when the market was developing.

Thus, although imitation was relatively easy, it did not happen for more than two years, and Matsui Securities established an overwhelming advantage in the early days of the new market. This clarifies the effectiveness of the framework of “the processes of forming, expanding, and converging differences among companies with competitive advantages” constructed in Chapter 3 (Takai, 2006).

Finally, Chapter 9 examines the effectiveness of the framework for a “four-stage evolutionary process in new markets” presented in Chapter 3. To this end, it empirically examines the processes through which multiple strategy groups were born in the new market of the online securities industry, and one strategy group became dominant. The role of imitation in these processes is also examined.

In competitive strategy theory, strategic homogenization through imitation is considered harmful to the imitated company; thus, it should be avoided. However, the density dependence theory of organizational ecology argues that imitation of predecessors by other companies has two effects (e.g., Carroll & Hannan, 1989). The first is the competitive effect, which is a negative impact where increased competition leads to more rivalry and makes it difficult to obtain resources and survive. The other is the legitimacy effect, a positive impact where the strategy group gains legitimacy and increases social recognition and trust as a consequence of increased competition, making it easier to acquire resources and survive. Although research in the field of competitive strategy has focused only on the negative competitive effect, it is assumed that the positive aspects of imitation also benefit companies, especially in the early days of a new market. Thus, this chapter focuses on and verifies this “duality of imitation,” a discussion on which is mostly lacking in the extant literature.

Three strategy groups were formed in the early days of the online securities market: (i) a group led by Matsui Securities; (ii) a group comprising five specialized companies other than Matsui Securities; (iii) a group of several existing securities companies, including major, semi-large, and medium-sized companies. Quantitative analysis using text mining and customer analysis based on stock certificate transfer data provided quantitative confirmation that Matsui Securities’ strategy was gradually imitated by five other online specialized securities companies, resulting in some of its customers moving to its competitors. Furthermore, many more customers moved from the other strategy groups.

I also found that Matsui Securities' strategy was gradually imitated by other companies. As the number of such companies increased, the social recognition of the strategy group increased, and new labels were likely applied to them. Here, by measuring and comparing changes in the dynamic relationship between the competitive and legitimacy effects, as proposed in the density dependence theory of organizational ecology, I empirically show the duality of the negative and positive effects of imitation in the early stages of inter-company competition (Takai, 2017).

### **3. Answering the Research Questions**

#### **3-1. Answering the First Research Question**

Based on the above discussion, I would like to reiterate the answers to the research questions addressed in this book. The first research question was, "Why does so little imitation happen in an environment where imitation is relatively easy, so that the competitive advantages of certain companies are sustained for a long time?"

In the early days of the new market of Japan's online securities industry, from 1996 to around June 2003, the difference in strategy stemmed from differences between Matsui Securities' "initial experience" of "successfully improving customer turnover" and the other companies' "initial experience" of "the number of accounts increasing thanks to fee reductions." This resulted in a difference in performance. In this industry, products, services, and performance were immediately published. Therefore, tracking the products and services of other companies was relatively easy, making it less challenging to imitate the successful strategies of others. However, while aware of the strategic differences, companies other than Matsui Securities competed according to the "dominant conventional wisdom" that "priority should be given to an explosive influx of new customers, with profits following after that" (which was wrong in hindsight). They did not imitate Matsui Securities' strategy for more than a year, which widened the performance gap between Matsui Securities and the other companies.

#### **3-2. Answering the Second Research Question**

The second research question was, "When strategy homogenization caused by imitation occurs, why does the performance of imitated top companies sometimes continue to grow, despite intensifying competition in the same strategy group?"

Research on competitive strategy theory frames the convergence of differences among companies with competitive advantage as an "event to be avoided"—it means the loss of those companies' unique competitive advantages. However, according to the density dependence theory of organizational ecology, the convergence of differences in competitive advantages among leading companies in the early days of a new market means that the leading strategy group has established its legitimacy and survived successfully. Thus, it is more appropriate to consider it an "event to be celebrated."

Actually, it is rare for a strategy group and its members to grow steadily from the early stages. In many cases, social awareness and trust are initially low; thus, there is a shortage of the necessary resources, including funds, equipment, and human resources. As such, the strategy group and its members will advertise the "rightness" of their strategies, for example, by citing previous cases and instances from other countries or pointing to "endorsements" from well-known managers, scholars, critics, and so forth. Moreover, they try to secure the necessary resources through joint research with

public research institutions and universities by obtaining subsidies from national and local governments, winning prestigious awards whenever possible, and building non-market connections (networks) such as securing strong supporters (sponsors) and partners.

However, when there is convergence toward the “right” strategy (= dominant design) as determined retrospectively, and a leading strategy group (Strategy Group A) is established, simply belonging to that strategy group will ensure legitimacy, making it considerably easier to secure the necessary resources. As the social recognition and trust of the strategy group increase, members can easily procure resources from various stakeholders, including customer support, financing from financial institutions, and excellent human resources from the labor market.

From this stage onward, strategic differences among the leading companies will be trivial; therefore, the focus of competition will be on how to operate efficiently and reduce costs. At this stage, economies of scale and experience curve effects will be crucial. Thus, leading companies’ (in Strategy Group A) advantage (over other companies) will make it easy for them to acquire resources and construct large-scale operation systems, boosting their advantage and likely accelerating their growth.

In this way, as the convergence of differences in competitive advantage among companies progresses, the range of differences in competitive advantage among leading companies (in Strategy Group A) narrows, while that in competitive advantage with other companies widens. This rapidly increases the competitive advantage of the leading companies—imitated and imitating (meaning all companies in Strategy Group A)—so that their performance continues to grow for some time.

Matsui Securities’ strategy of “improving the use rate by acquiring active users” was only imitated by several companies more than two years after the start of substantial competition, resulting in many customers flowing from Matsui Securities to companies that imitated it. However, many customers also flowed to Matsui Securities and other securities companies that imitated it, leading to its performance improving rapidly for nearly two years thereafter.

#### **4. Conclusion**

In recent years, the speed of business transactions has increased dramatically as information is now distributed online in most industries, including all online businesses. In this environment, the most important issues for companies to acquire and maintain a competitive advantage are how to prevent imitation by other companies and how to obtain accurate information from the overabundance thereof to make accurate decisions.

I believe this study allowed me to present the new perspectives described in the previous sections. However, the framework presented in this book has only been verified in one case of the Japanese online securities market. Thus, further verification is needed with examples from other industries to develop its contributions.

Moreover, even in the case of the Japanese online securities market, the analysis in this book was only concerned with the period until around mid-2005, when the differences in competitive advantage among companies were moving toward convergence through imitation. Therefore, I could not discuss competition after that point, and additional analysis is necessary in this area.

Finally, as I already mentioned, this book leaves many outstanding issues, and further theoretical and empirical research is required.

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