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HOW COULD CHINESE COMPANIES APPLY MERGERS & ACQUISITIONS TO S-M ENTERPRISES FOR SELF-INNOVATION

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Abstract

The Eighteenth National Congress of the People's Republic of China advocates independent innovation of enterprises and encourages enterprises to invest in R & D. Small and medium-sized enterprises, which account for 70% of Chinese enterprises, still face difficulties in independent innovation: lack of innovative talent, lack of innovative resources, backwardness of exiting technologies, and so on. Research shows the main purposes of international mergers and acquisitions by Chinese companies are: entering new markets (61%), acquiring new technologies (58%), expanding the size of enterprises (54%), and reducing operating costs (40 %). Innovation has thus become an important motivation for mergers and acquisitions. This research uses case study and make proposals: from equity acquisition to talent introduction, using technology acquisition as the gradual development stage of transna-

tional mergers and acquisitions. The hope is those enterprises could effectively integrate without compromising technological innovation. Besides, using imported technology to create sustainable core competitiveness can achieve the ultimate goal of innovation independence through international mergers and acquisitions.

Keywords: Merger & Acquisition, Innovation, Core competitiveness

Introduction

Starting from the 2010s, Chinese enterprises have been using mergers and acquisitions (M&As), a well-known organizational strategy through which companies increase their market share, to enter new markets or enhance their capabilities. M &As as a corporate have already known to companies for a long period of time. As far as innovation is concerned, the effect of increased competition through new products and processes has been put on the agenda of both practitioners and academics. Research shows the main purposes of international mergers and acquisitions by Chinese companies are: entering new markets (61%), acquiring new technologies (58%), expanding the size of enterprises (54%), and reducing operating costs (40 %). Innovation has therefore become an important motivation for mergers and acquisitions. It emphasizes two important characteristics of the innovation process: the creation of new knowledge through endogenous R&D efforts, and the ability to adopt existing technologies developed by others.

External resources for innovative renewal can complement endogenous capabilities and enable companies to cope with complex technologies through shared resources for increased learning capacity and improved innovative skills.

This paper, through case a study, we estimate the effect of a merger on future innovation output when there is premerger technological overlap between merging firms.

This example highlights a number of key features of merger transactions. First, merger participants pursued related R&D activities prior to the acquisition. Second, certain technologies of one party appear valuable to the other party and vice versa, triggering the transaction. Third, improvements in post merger innovation output occurs through technological synergy.

To understand whether this example represents a general pattern un-

derlying M&As, we examined the following research questions. How are firms' innovation activities related to transaction incidence? Do merger participants possess related technologies prior to the transaction? Does the presence of a premerger technological overlap affect post merger innovation output? Assuming acquirers and target firms are active in technological innovation, we expect parties with inter firm linkages in the technology space to more likely to form merger pairs.

The Oversea A & M for China

The reason for Chinese enterprises' overseas investments is to gain advanced countries' leading technologies, brands, and new market. In particular, recently, companies in advanced countries have become one of the main targets of large-scale acquisitions by main-land China enterprises. As shown in table 1, there are many advanced industries, both high-tech and consumer-related. Part of the reason for accepting mergers and acquisitions is also to focus on the emerging middle class purchasing power in mainland China.

Table 1. The Importance of the M & A Case for China (2016-2018)

Year	M&A	Object	Trade Value Billion US$
2016/3/23	Midea, China	TLSI,Japan (80.1%)	4.73
2016/5/28	JAC Capital, Beijing	NXP Semiconductors: Re-power	18
2016/6/28	Midea, China	Kuka, German (94.55%)	50
2017/7/14	China Vanke Co Ltd; Hopu Investment Management Co; Bank of China Ltd; Hillhouse Capital Management Ltd; SMG Eastern Ltd	Global Logistic Properties Ltd	160
2017/6/2	China Investment Corp	Logicor Europe Ltd	167.66
2017/12/27	Zhejiang Geely Holding Group Co Ltd	Volvo AB (7.9%)	32.17
2017/1/23	State Grid Corp of China	CPFL Energia SA)	35.71

		(40.1%)	
2017/1/24	Yanzhou Coal Mining Co Ltd	Coal & Allied Industries Ltd	31.00
2018/1/28	COSCO SHIPPING Holdings Co Ltd; Shanghai International Port (Group) Co Ltd	(Orient Overseas (International))	83.88
2018/2/26	The Orient Overseas Container Line	Genworth Financial	27.0

Most of the Chinese companies actively making acquisitions are manufacturing companies, mainly for acquiring advanced technologies and brands overseas to help upgrade their domestic industry. Generally, those enterprises choose overseas mergers and acquisitions to achieve the company's outbound growth. They are also seeking domestic market while exploring overseas markets.

China make new policies to curb foreign investment, resulting in a 32% reduction in China's outbound M & A activity. However, cross-border M & A has remained strong, accounting for 30% of total transaction volume. Cross-border mergers and acquisitions accounted for 36% of the total transaction volume in 2016 and 31% in 2015. In 2017, the volume of M & A transactions in China fell by 13%. Due to the country' continued capital controls and new policies to restrict irrational foreign investment, outbound M & A declined by 32%. At the same time, domestic mergers and acquisitions in China showed greater resilience, and benefitted continued domestic integration activity especially for SOEs. Against the background of Sino-US trade frictions and increased scrutiny, China's outbound M & A volume has fallen for the second consecutive year (23%) year-on-year since its "super peak". Despite this, the total value of China's overseas M & A transactions is still about one-third higher than the pre-year peak level.

M & A Case Analysis in China

China Haier M & A Case (Haier against GE acquisition)

In October 2011, Haier announced the acquisition of Sanyo Electric 's white appliances in Japan and parts of Southeast Asia, achiev-

ing the integrated development of the Haier and Aqua dual brands in the Japanese and Southeast Asian markets. A year later, Haier successfully acquired New Zealand's national treasure-class home appliance brand Fisher & Paykel, consolidating the R & D and manufacturing capabilities of high-end home appliance products.

On June 7, 2016, Qingdao Haier Co., Ltd., which holds 41% of Haier Group, and General Electric of the United States announced they had signed the required transaction settlement file for the transaction of Qingdao Haier's integration of General Electric Appliances.

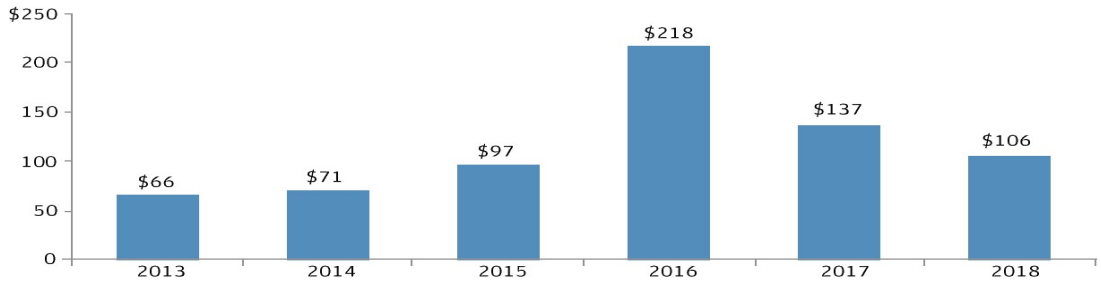

Figure 1. China M & A Transaction Volume (billion USD)

Through the acquisition of the GE brand, Haier broke away from the “low-priced brand” image. Besides, due to GE being the second largest home appliance manufacturer in the U.S., Haier reached fifth in the global home appliance market. From this moment, Haier has t10 global R & D bases (including 8 overseas), 21 industrial parks, 108 factories, and 66 marketing centers, and has initially formed a localized development model of "trinity" of design, manufacturing, and marketing. Global brand development provides continuous motivation.

China Mides M & A Case (against Toshiba; against Germany KUKA)

The Midea Group acquired Toshiba's home appliance business as well as its patents. For more than 20 years, Midea had expanded and acquired globally superior resources from Toshiba. Midea obtained its product technology, overseas market channels and talents through acquisitions, and implemented its globalization strategy in a more convenient and effective way.

In August 2016, Midea acquired

94.55% of KUKA Schweissanlagen Roboter GmbH. to improve its automated production efficiency and respond to the pressure of mainland China's wage increase in the past 5 years. Industrial robots and warehousing automation are both very suitable for the strategic layout of Midea's intelligent manufacturing.

From the perspective of technical capabilities, KUKA only had 9% global market share, and wanted to enter the application field. However, having advanced technology, this natural advantage is exactly what the Midea Group needed. From the cost point of view, Midea chose to implement artificial intelligence through overseas mergers and acquisitions and enjoying the dividend of manufacturing upgrades. This achieves Midea's acquisition of German KUKA with a low-cost vision.

At present in the Chinese market, the industrial robot industry is severely suppressed by foreign brands. About 92% are occupied by the top four big brands: Japan Fanuc, Japan Yaskawa, Germany KUKA and Sweden ABB. In recent years, the Midea Group has increased its asset scale, sales revenue and profitability through its own business expansion and external mergers and acquisitions. Cooperating with the KUKA Group has enhanced the Midea Group's competitiveness and development potential in the field of robotics and automation. At the same time, this transaction will further develop overseas business for the Midea Group, seek new business growth points and lay the foundation for improving the profitability of listed companies.

China Geely M & A Case (against Sweden Volvo, US Daimler-smart, Proton49.5% & LOTUS51%, etc.

Since becoming the largest shareholder of Manganese Bronze (known as the parent company of London taxis) in 2006, Geely embarked on a path of overseas mergers and acquisitions. In 2009, it acquired the Australian automatic transmission company DSI (Only 10% of the shares are held); Volvo was acquired wholly in 2010, after which Geely acquired Malaysia's Proton and Lotus, and invested about 9 billion US dollars last year to become the largest shareholder of Daimler Group.

On July 20, 2017, Volvo Car Group announced it will establish a joint venture technology company with Geely Holding Group. This

joint venture company will share automotive technology. Besides, they will jointly develop electric vehicle technology. Volvo Cars, Geely Automobile and Lynk & Co. all belong to Zhejiang Geely Holding Group. Through newly established joint ventures, those three will use mutual licensing to achieve technology sharing in the field of vehicle construction technology, power transmission, and joint procurement of parts. Undoubtedly, Geely's growth has been through a series of mergers and acquisitions.

Summary of this chapter:

(1) Successful mergers and acquisitions have driven the company's transformation and upgrading, strengthened its core competitiveness, and expanded the company's share of the domestic market.

(2) By acquiring foreign technology, brand, market, and channels through mergers and acquisitions; These complies have successfully completed their corporate strategic goals.

(3) None of these mergers and acquisitions companies open new international market or successfully squeeze in or replace international brands. Contrarily, they remain focused on domestic market snatch.

(4) The company may be able to acquire the technology of the target company being merged, but these technologies are not the latest in the world, and even with Geely's mergers and acquisitions, it can refer to but cannot use the intellectual property before the merger. Geely is by no means a special case. Until now, China may be able to use other people's technology, but it has still been unable to independently create new technologies.

(5) So far, China has not yet areached a complete supply chain integration, nor has it been able to promote the transformation and upgrading of its supply chain manufacturers through mergers and acquisitions.

Implications For China's International Mergers And Acquisitions

Focus on new technology introduction but neglect of innovation.

From the cases above, no matter which merger and acquisition model is used, it is of little help in corporate innovation. Midea's successful merger and acquisition led to a magnificent transformation from the white appliance industry to a high- tech industrial robot. Geely also developed new modular platforms or new vehicle designs through cooperation.

However, the two mergers and acquisitions contributed little to their own innovation.

Emphasis On Domestic Market But Less Development Aboard.

China's local industrial robots have weak core technologies, low product conversion rates from R & D to practical applications, and difficulty in getting operation funds. The introduction of Kuka from Germany quickly filled the vacancy in the domestic market, exploited the lower operating costs compared to its original and to develop the international market. Kuka also took the opportunity to wipe out its old technology and long-term accumulated debt, and moving forward to German industry 4.0. Geely is more subject to the knowledge ownership problem of the agreement, which can only be applied improving domestic models. The Volvo car series that was originally swallowed in the international market has fully turned over, not only capturing the hearts of the Chinese, but also successfully regenerating.

Less Independent Innovation And Ignore Domestic Technology Transfer

Domestic mergers and acquisitions are all based on technology buyouts, with an inability to increase the salary for future new technology development, or transfer technology to local industries. Neither form technology industry chain knowledge sharing mechanism; nor help domestic small and medium-sized enterprises development. The Geely case only allows the right to use knowledge without sharing or transferring rights, which making it impossible for Geely Automobile itself or its supply chain manufacturers to share the benefits. Geely has not made a significant leap forward in the domestic market after the merger.

Inability to form an industry strategic alliance.

The domestic supply chain has not yet formed to really constitute strategic partnership. Mostly, it is only a strategic procurement partnership. R & D is full risk but low reward. Enterprises need to be able to form their own supply chain partnerships. Those members of the supply chain coming from different industries - can jointly develop new technologies, jointly share risks & benefits and contribute different but complementary professional skills. Thus, their competitiveness can be integrated and improved and ulti-

mately create more value for customers. However, neither the domestic automobile industry, communication industry nor the industrial robot industry have a complete supply chain system. Then, strategic partnerships have been established. This is why the S-M enterprises have trouble with self-innovation.

Problems Faced By Chinese Enterprises In Self-Innovation

This study also found that regardless of the scale of the enterprise , there are blind spots in the independent research and development of Chinese people. These blind spots may be caused the culture itself.

(1) Scarcity of self-innovation. The typical Chinese attitude is to focus on profits and avoid risk. They would rather take a wait-and-see attitude toward R&D. Innovation activities are full of uncertainty and risk. To maintain their benefits to the greatest extent, Chinese would rather adopt inflexible countermeasures in innovation to make use of advantages and avoid disadvantages. Most Chinese are encouraged to take the philosophy of being second. This does not mean they won't innovate but they would rather not share their result. This kind of cautious thinking culture for thousands of years has caused Chinese to regard independent innovation as a risky venture.

(2) Scarcity of independent innovation. For such a long time, Chinese culture has been influenced by western technology. They have paid too much attention to tracking western technology development in teams of imitation, but neglect the original mining of technology and research on new inventions. This inertial also influences industries in technological innovation. For the development and utilization of new knowledge, most still hold the thinking of self- preservation, and are not yet ready for knowledge spillover or knowledge sharing. The expansion of the professional field of technology is a problem of "demand traction". However, the improved independent innovation capability is a problem of "technical pull". If imitation and application are carried out for a long time, it limits scientific construction and development. It also directly affects a series of complex issues

such as: the employment, training and motivation of talent. This might harm the survival and development space for technical people.

(3) Scarcity of collaboration concepts in the innovation ecosystem. Innovation should never be a solitary battle. Innovation has to become an ecosystem and effectively integrate: a complete system with policy chain, technology chain, capital chain, service chain and talent chain. China's science and technology service organizations still have bureaucracy which lack horizontal cooperation and exchange of science and technology innovation. Moreover, the fact that innovation resource is controlled by a few bureaus and difficult to form a run way or multi-directional communication and cooperation pattern.

For the long term, China enterprises value introduction but despise absorption, value imitate but less innovation. Short of scientific and technological resources like China, especially for S&M enterprises, it is necessary to form an ecosystem of superior resource integration and sharing. This ecosystem should include a value chain composed of core enterprises, policy formulation, technology, capital, technical services, and professional talents. Through this ecological network, these different members interweave an ecological network, and exchange their resources, skill, and information. They exist in a symbiotic relationship, and multiple symbiotic relationships form an ecological network of R & D ecosystems.

(4) Scarcity of value chain integration and innovation alliance. Compared with other large companies aboard, technology acquisition is still an important method for domestic enterprises to obtain technology. In view of the risk of sharing or industrial complementarily, most foreign companies mainly use technology alliance to acquire technological know-how and emerging technologies through strategic alliances. With the alliance, they can achieve extraordinary technological innovation and further enhance enterprises core competitiveness. Through establishing a strategic alliance with technology research and development, these multinational

companies achieve advantage complementary and shared risks among members. On the other hand, Chinese enterprises still haven't really connected their supply chain as an alliance of manufacturers to acquire new technologies and achieve mutual complementarily in resources and capabilities. Generally, when forming an industrial alliance, members should have certain technical strengths, and there is not much gap between them. It is more suitable for the transfer of hidden knowledge and skills, and both parties can maintain a high degree of strategic flexibility. Usually technology leaders refuse to cooperate with non-alliance companies, so as not to train future competitors.

Conclusions and Suggestions

(1) In China, high-tech corporate mergers and acquisitions are still dominated by state-owned or large enterprises. The purpose of the mergers and acquisitions is not only to introduce new technologies but also for enterprises upgrading. There is less consideration given to assistance upgrading their supply chain. Moreover, after the merger, the manufacturers still pay more attention to the domestic market, but not the developing foreign market.

(2) Domestic SMEs can only become a part of OEM under the double torment of no tech assistance outside and no talent inside. There is no way to improve them in the long run. Sooner or later, with the international industrial division and resource endowment factors, domestic OEMs will be moved out or shut down.

(3) Therefore, large domestic enterprises should lead and integrate their supply chains and establish their own (Corporate Synergy Development Center; CSD) by imitating Japan and South Korea. With the cooperation ability of third-party manufacturers, we can create a win-win with its central factory. The technology transfer of the central factory enhances the capacity of the cooperative factories.

(4) Domestic SMEs should also organize cross-industry alliances among themselves. They can collect available resources from the alliance to authorize or jointly develop of common technology. Then, it will be

developed and used by the alliance members to reduce R&D costs or risks.

(5) Domestic manufacturers' technology mergers and acquisitions are still positioned at the application, and not ready for transforming and upgrading via self R&D. Moreover, the high-tech domestic industrial development is still subject to two statuses: export-oriented enterprises or the military industry purpose. Both are leading in R&D, but there is an unwillingness to transfer to private SMEs. This is not conducive to helping private units reach their potential. For example, in this epidemic period, the flexibility of China private industry is insufficient, and it is difficult to adapt to the supply chain mutation.

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Reference

GM Grossman, E. Helpman, Trade, Innovation, and Growth, American Economic Review, 1990, 80 (2), pp. 86- 91.

John R. Baldwin, Wulong Gu, Trade Liberalization: Export-market Participation, Productivity Growth, and Innovation, Oxford Review of Economic Policy, 2004.20 (1) , pp. 372-392.

Nieto M. J. & Rodriguez A., Off shoring of R&D: Looking Abroad to Improve Innovation Performance, Journal of International Business Studies, 2011,4 (3). pp. 345 — 361.

Luo Y. & Tung R. L., International Expansion of Emerging Market Enterprises: Journal of International Business Studies, 2007, pp. 481- 498.

Hitt M. et a1. Mergers and Acquisitions and Managerial Commitment to Innovation in M - Form Firms [J]. Strategic Management Journal, 1990, 11,

(Special Issue) pp：29—47.

Cassiman, Bruno, and Reinhilde Veugelers, 2006, In search of complementarily in innovation strategy: Internal R&D and external knowledge acquisition, Management Science 52, 68–82

Maksimovic, Vojislav, Gordon Phillips, and Liu Yang, 2013, Private and public merger waves, Journal of Finance 68, 2177–2217.

Phillips, Gordon, and Alexei Zhdanov, 2013, R&D and the incentives from merger and acquisition activity, Review of Financial Studies 26, 34–78.

J.P. Morgan, 2019 Global M & A Prospects.

Somaya, Deepak, Teece, David, Wakeman, Simon, Innovation in Multi- Invention Contexts: Mapping Solutions to Technological and Intellectual Property Complexity, California Management Review, University of California, Berkeley. 2011, 53 (4) , pp. 47 - 74.