



China Emerges as a Smartphone Power

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THE RISE OF CHINESE SMARTPHONE MANUFACTURERS

China has overtaken the US to become the world's largest smartphone market, and its continued growth looks promising. In 2012, 178 million smartphones were sold in China accounting for 26.2 percent of the global total. By 2015, 484 million smartphones will be sold in China, accounting for 31.2 percent of global share.

Chinese smartphone manufacturers have expanded at a breakneck pace. The largest firms—Huawei, ZTE, and Lenovo—are now among the world's top five smartphone manufacturers. They are, moreover, dominant players in what is now the world's largest smartphone market. In 2012, Lenovo, Coolpad, Huawei and ZTE ranked second and fifth respectively in sales volume, accounting for 36 percent of Chinese smartphone sales. From

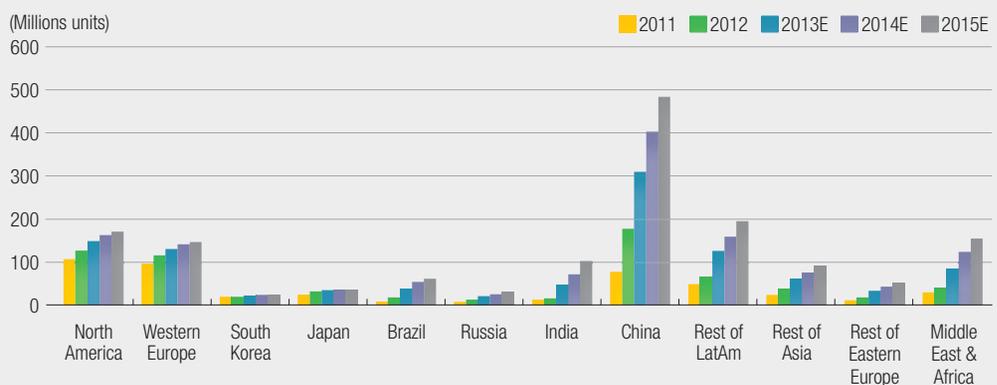
January to May of 2013, total market share for these four manufacturers rose further to 39 percent. Share for Chinese firms exceeds 50 percent when adding smaller domestic manufacturers like K-TOUCH, OPPO, Gionee and Xiaomi.

CAUSES FOR CHINESE FIRMS' RAPID GROWTH

Chinese firms have differentiated their products in the low-end market, attaining strong response from consumers due to their low prices. Chinese firms are dominant in smartphones of 2,000 yuan or less, while Apple and Samsung control the higher end market for phones of 3,000 yuan and up.

Huge subsidies from telecom operators have also helped Chinese firms continuously expand and launch new products. From 2009, three

Figure 1 Smartphone Sales and Forecasts (by region)



Source: Goldman Sachs Research (2013), "Transforming China, Beyond 500mn smartphone users in China."

Table 1 Top Five Smartphone Manufacturers from 2012 Q3 to 2013 Q1

(Unit: Millions of units)

| 2012 Q3 | | | 2012 Q4 | | | 2013 Q1 | | |
|---------|-----------|--------------|---------|-----------|--------------|---------|-----------|--------------|
| | Shipments | Market share | | Shipments | Market share | | Shipments | Market share |
| Samsung | 56.3 | 31.3 | Samsung | 66 | 29 | Samsung | 70.7 | 32.7 |
| Apple | 26.9 | 15 | Apple | 47.8 | 21 | Apple | 37.4 | 17.3 |
| RIM | 7.7 | 4.3 | Huawei | 10.5 | 4.6 | LG | 10.3 | 4.8 |
| ZTE | 7.5 | 4.2 | ZTE | 10 | 4.4 | Huawei | 9.9 | 4.6 |
| HTC | 7.3 | 4 | Lenovo | 9.4 | 4.1 | ZTE | 9.1 | 4.2 |

Source: IDC (2012-2013), "Top 5 Worldwide Total Mobile Phone Vendors."

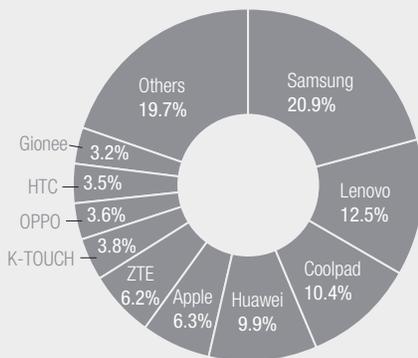
Chinese operators began to promote mid and low-end smartphones. By 2012, three operators were providing subsidies for 3G terminal devices worth more than 70 billion yuan.

Another key factor for the success of Chinese firms is the free and open Android platform from Google. Google launched Android in 2007, and provided most of its source code to anyone to freely modify. From January to May of 2013, 913 out of 930 new models of smartphones used Android as their operating system.

At the same time, Chinese firms have benefited

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Figure 2 January 2013 - May 2013 China Smartphone Market Shares (by volume)



Source: GFK (2013).

Table 2 Smartphone Manufacturers' Shipments by Price

| | Below 1,000 yuan | 1,000-2,000 yuan | 2,000-3,000 yuan | More than 3,000 yuan |
|---------|------------------|------------------|------------------|----------------------|
| Apple | 0 | 0 | 0.75 percent | 99.25 percent |
| Samsung | 11.96 percent | 44.77 percent | 14.13 percent | 29.13 percent |
| Huawei | 66.66 percent | 31.36 percent | 1.97 percent | 0 |
| Lenovo | 60.42 percent | 39.13 percent | 0.44 percent | 0 |
| ZTE | 62.72 percent | 37.27 percent | 0 | 0 |

Source: GFK (2013) & SERI China.

from a constantly improving local supply chain. Except for the application processor and other core parts, Chinese firms can now manufacture every part of a smartphone, including passive components, circuit boards, LCD panels, touch modules, antenna modules, batteries, shells, lenses, and acoustical devices. Using domestic components, the material cost for low-end smartphones from Chinese manufacturers has now dipped below 400 yuan, and can go even lower as orders increase in scale.

LEADING CHINESE MANUFACTURERS

Lenovo

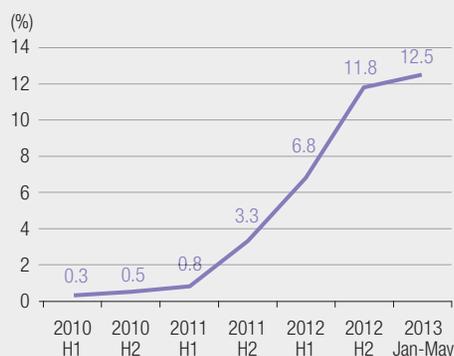
Lenovo's debut in the smartphone industry has been especially noteworthy. On Jan 18th, 2011, Lenovo announced the formation of its Mobile Interconnection and Digital Home Group (MIDH) which is responsible for developing its mobile devices.

Since then Lenovo has rapidly become China's largest smartphone manufacturer, and is now entering emerging markets. By 2012, Lenovo's mobile phone shipments exceeded 30 million, with 500,000 of them shipped overseas. Lenovo's market share reached 10.2 percent in China by July 2012, surpassing Huawei (9.8 percent),

and becoming second only to Samsung (20.7 percent). From October 2012, Lenovo began selling smartphones in Indonesia, the Philippines, Vietnam, India, and Russia, and began entry into Latin America and the Middle East.

Lenovo's rapid growth is attributable to its ability to leverage its existing marketing channels. After more than ten years in the PC business, Lenovo possessed widespread and diverse sales channels, including Lenovo branded stores, and a strong presence in home appliance chains. Lenovo was able to designate 3,600 of its PC stores and 600 mobile phone stores as sales channels for its Lephone smartphone. Lenovo's marketing channels cover all levels of the mar-

Figure 3 Lenovo's Smartphone Market Share in China (by volume)



Source: GFK (2013).

ket in China, with more than 30 thousand Lenovo stores in rural areas. Lenovo has also maintained balance between its operator channels and its social channels. Lenovo is the largest mobile phone supplier for China Mobile and China Unicom, with more than 20 percent of total phones provided by Lenovo for each telecom operator. Sixty percent of Lenovo's marketing channels are operator channels while forty percent are social channels, indicating that Lenovo is not dependent on operators for its business.

As the largest PC manufacturer in China, Lenovo can produce smartphones with a trusted brand image. Lenovo's high brand recognition helped Lenovo rank first in the Chinese PC market for many years. Lenovo has also accumulated significant independent technology, with more than 7,000 core patents, of which more than 5,000 are related to wireless communications, intelligent dynamic management, and energy management that can be deployed in smartphones. Lenovo's successful PC business, moreover, gave it the startup funds needed to grow its smartphone business. By March 31st, 2013, total sales of Lenovo Group amounted to \$33.9 billion, with 15 percent annual growth, while net profits reached \$635 million, with 34 percent annual growth.

Lenovo has superior supply chain management capabilities that can efficiently respond to changing demand, allowing Lenovo to start its development plans two to three months earlier than its competitors. In order to leverage its supply chain advantages, Lenovo has adopted a "sea of models strategy" launching a wide variety of products to meet consumers' various requirements. Lephone for example, covers four product series, S, A, P and K. The S series focuses more on fashion and appearance, while the A series are positioned for price sensitive consumers, the P series are targeted toward

businessmen, and the K series is focused on performance and hardware. This strategy has allowed Lenovo to move into the middle and high-end market with potential for continuous growth. Since Lenovo's smartphones are positioned toward the low-end of the market, their gross profit ratio in 2012 was only 15 percent, much lower than profit leader Apple at 55 percent. The average price of a Lephone in 2012 was 1,174 yuan, much lower than Apple at 4,814 yuan and Samsung at 2,871 yuan. Chasing higher profits, Lenovo developed a high-end smartphone to challenge Apple and Samsung, launching the K900 in May 2013.

Huawei

In 2012, Huawei made a series of dramatic transformations: from a B2B to B2C business model, from an ODM contractor to releasing products under its own brand, and from providing feature phones to providing smart phones. This rapid mobilization of resources has made Huawei into one of the world's leading smartphone manufacturers. Huawei launched its Ascend series smartphone line in 2012. It is expected to generate \$9 billion in smartphone revenue and 60 million in unit sales by 2013.

Moreover, Huawei has successfully positioned itself to graduate to a high-end product strategy. In 2012, Huawei's flagship phones (including the Ascend P1, D1 Quad and Glory) achieved strong response in developed countries, with the 2012 Ascend P1 claimed as the world's thinnest mobile phone. Huawei also launched LTE products in developed markets. In the United States, Huawei cooperated with operator MetroPCS for its entry-level LTE mobile phone M920. In Western Europe, Huawei cooperated with a British operator for the Ascend P1 LTE. In February 2013, Huawei released the D2, Mate and P6. Huawei's Ascend series in particular re-

ceived strong acclaim from the industry in addition to a favorable consumer response.

Huawei's more than 20 years of accumulated experience and expertise in communications technology have enabled it to swiftly respond to customer demand and anticipate upcoming technologies and trends. Its investment in R&D has given it a solid reputation for innovation in the global market. Huawei has maintained its own chip manufacturer, Hisilicon, since 2004, and is one of the few manufacturers in the world that has independently developed a quad-core application processor. Huawei invests 10 percent of its revenue in R&D every year, with its R&D expenditures in 2012 reaching \$4.8 billion. More than 70,000 of its 150,000 employees work in R&D, and the company maintains 16 independent R&D centers worldwide. As of July 2013, Huawei had applied for more than 40,000 patents in China, with more than 30,000 global patents approved.

Huawei also rapidly deployed customized models for its operator marketing channels. Huawei has built cooperative relationships with 45 out of the world's top 50 telecom operators, helping it to efficiently expand to the global market. Operator customized models are usually ordered in large volumes, enabling Huawei to boost sales while leveraging economies of scale.

Xiaomi

Xiaomi's smartphone business has developed at a meteoric pace. Xiaomi Tech was founded in April 2010 as a mobile Internet business operator. Xiaomi developed MIUI in August 2010, an Android based smartphone operating system, and released Miliao¹ in December 2010, a mobile social APP. The Xiaomi phone was official-

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¹ Miliao is developed by Xiaomi, and supports cross platform and inter-operator mobile communication terminals. It is a free instant messaging tool.

Figure 4 Xiaomi's Development History



ly released in August 2011, and by 2012 sales exceeded 719 million units. Revenue was 13.27 billion yuan, and unit sales were 7.03 million by the first half of 2013. Xiaomi is likely to be among the leading domestic smartphone manufacturers in 2013.

First, Xiaomi applies an Internet business philosophy that drives hardware sales by software. Xiaomi Tech positions itself as a mobile Internet company, rather than a phone manufacturer, with an emphasis on software over hardware. Xiaomi Tech has three core product lines: MIUI, Miliao and the Xiaomi phone. Since its release in 2010, MIUI's users have reached 20 million worldwide, while Miliao's active users number 22 million. The company released the MI-One on August 16 of 2011, and then released the Xiaomi MI-Two on August 16 of 2012. The exceptional user experience of MIUI and Miliao played an important role in the success of its mobile phones. MIUI users in multiple countries formed the core market for Xiaomi phones in the early days.

Second, Xiaomi uses an Internet-based open development model that has attracted many users to participate in improving product quality. Every Friday, the development team continues to improve based on feedback. Xiaomi also en-

courages users and media to dismantle the phone to collect user feedback to improve product design.

Third, use of the Internet for word-of-mouth marketing has helped Xiaomi achieve quick acceptance in the market while developing a distinct brand image. Xiaomi does not use traditional TV or web advertising. Instead, Xiaomi uses Internet marketing on forums, microblogs and professional review websites to disseminate product information to the market. Xiaomi has many loyal fans. Its official micro blog has about 1.5 million fans, while the Xiaomi online community has 5.5 million registered users. Though such enthusiasts do not represent the majority of users, their feedback helps Xiaomi constantly improve the user experience; they also function as a major force in word-of-mouth marketing. Aside from customized models for operators, Xiaomi only sells through e-commerce platforms to eliminate middlemen. Seventy percent of Xiaomi's users buy through of its official website, while 42 percent of users buy more than two Xiaomi phones. Xiaomi Tech has also experimented with "hunger marketing" to great effect. The MI-One was released in August 2011, officially opened online booking in September, and opened its first formal network limited time sale in December. Thirty

million units sold out within 5 minutes.

FUTURE PROSPECTS AND IMPLICATIONS

Chinese firms' strategy can be summarized as entry into the low-end market and attainment of market share on price competitiveness, extension of cost advantages through economies of scale, and then increased investment to enter the high-end market. As a result, Chinese firms are emerging as fully competitive smartphone makers. Chinese smartphone manufacturers have started to expand to medium and high-end markets, and will continue to accelerate their global market expansion. Today the top Chinese manufacturers boast high-end products whose specs are fully competitive with global market leaders. For example, the ZTE Grand S and the Xiaomi 2S have quad-core processors with speeds of over 1.5GHz, while the Lenovo K900's screen size is 5.5 inches and the Huawei Ascend Mate's is 6.1 inches.

Chinese smartphone manufacturers will continue to accelerate their global market expansion. In emerging markets, they are drawing on their experience at home by using low-end smart phones as pioneer models. Although consumers in emerging markets are more price-sensitive, their demand for smartphones is growing rapidly, and Chinese smartphones are better tailored to suit these markets. In developed markets, Chinese firms are using high-end flagship products to develop brand recognition. Huawei launched its high-end Ascend P1 in the European market, and hired BMW's designers to tailor its appearance to suit European customers. Lenovo is also putting high-end smart phones on the global market, and is planning to enter Europe in 2014.

Because the future market potential in China

and other emerging markets is mostly in low-priced smartphones, leaders like Samsung need to introduce more low-priced products to develop greater visibility on the low-end. The Chinese smartphone market in particular has a "long tail effect;" while the current emphasis of leaders like Samsung is on first and second tier markets at the top of the demand curve, the vast majority of the demand in the market is dormant in the "tail" of the curve.

As low-end mobile phones from global leaders like Samsung have few obvious advantages compared to domestic smartphones, leading firms need to focus on the development of value-added services in order to maintain competitive advantage. Hardware will be less important in the future, and most value will come from value-added services like cloud computing. Value-added services can be provided by leaders or from cooperation with other vendors. Global leaders need to create a differentiated service ecosystem. Moreover, intense competition and homogenization of smartphone hardware in the future will mean shrinking profit margins; global leaders should thus be prepared for a price war on the low-end. **SQ**

Keywords

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