



Investa Insights

MARKET RESEARCH REPORT

Technology, Media & Telecommunications

Investa Insights - Rotman Commerce

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Table of Contents

1) Industry Summary	3
2) Subsectors	3
3) Key Market Players	4
4) Industry Drivers & Trends	5
5) Risks	5
6) Sources	6

INDUSTRY SUMMARY

The technology, media, and telecommunications (TMT) industry is a broad market consisting of various smaller sectors including semiconductors, hardware, software, mobile, Internet, networking, and more. This market experiences a particularly significant amount of M&A and IPO activity due to the increasing number of new, high-tech firms and low barriers to entry. With high M&A activity, frequent IPOs, and organic growth due to recent innovations within AI and data analytics, the sector offers a strong growth prospect. Companies within this sector vary widely but are similar in the respect that their businesses rely heavily on research and development (R&D), patents, and other intellectual property protections that accelerate growth and viability.

SUBSECTORS

TECHNOLOGY

The technology sector is comprised of stocks relating to the research, development, and/or distribution of technologically based goods and services. This sector contains businesses related to the manufacturing of electronics, creation of software, as well as computers, products, and services related to information technology (IT). The technology sector offers a wide range of products and services for both customers and other businesses. Consumer goods like personal computers, mobile devices, wearable technology, home appliances, and televisions are continuously being improved and sold to consumers.

Businesses across all industry groups are dependent on innovations coming out of the technology sector to create their enterprise software, manage logistics systems, protect databases, and provide the critical information and services that allow companies to make faster and more strategic decisions.

In terms of its structure, the technology market is extremely segregated with big and small players all over the globe. Six of the largest companies by market capitalization are currently technology companies, and the global TMT industry is expected to surpass a further USD \$3 trillion by the end of 2019 in terms of market size. The demand for services and solutions provided by the industry is only expected to increase as businesses and consumers seek to improve processes and lifestyles.

MEDIA

Within the media sector, firms develop and distribute multimedia material via radio, television, online, and in print. Television networks, cable television providers, production studios and social media companies, in particular, may be included in this subsector. The target audience for media and entertainment companies includes businesses and customers that demand innovative experiences.

A distinct market that is currently impacting the media and entertainment industry is the growing e-sports sector, boosting the earnings of publishers and marketers. With expectations to generate USD \$1.5 billion in global revenue by 2020, large-scale media companies are anticipated to increasingly partake in the marketing and publishing of these e-sports events.

TELECOMMUNICATIONS

The telecommunications sector includes both Diversified Telecom Services, such as Alternative Carriers and Integrated Telecom Services, and Wireless Telecom Services. The telecommunications sector is comprised of businesses that create infrastructure for data transmission and communication such as telephone operators, satellite companies, cable companies, and internet service providers (ISP). The sector operates on a highly decentralized system with decreasing regulations and barriers to entry: this reality has motivated a significant number of small and large firms to enter the sector.

Small players tend to deliver equipment, such as routers and infrastructure, while the major players focus on providing the actual service. The market is divided between Residential & Small Businesses and Corporations.

Moreover, the demand for telecommunications has been on the rise, driven by the call for quicker data connectivity, enhanced resolution, and well-developed application programming interfaces (API). In terms of expansion, this sector is heavily capital intensive due to the need of infrastructure and network systems: this implies that the most successful companies will be the ones that retain economies of scale and reliable cash flows. Telecom companies will also be required to delve deeper into product innovation and inorganic growth strategies to expand their business lines and to capture greater market share.

KEY MARKET PLAYERS

The global TMT sector is overall relatively fragmented in the respect that several different subcategories compose the market along with rapidly growing startups. However, a number of large, high-tech firms remain powerful key players within the industry including Microsoft Corporation, Apple Inc., Intel Corporation, Cisco Systems Inc., and Oracle Corporation.

Company	Market Value (USD)
Microsoft Corporation	1.23 Trillion
Apple Inc.	1.36 Trillion
Intel Corporation	256.39 Billion
Cisco Systems Inc.	199.94 Billion
Oracle Corporation	174.66 Billion

INDUSTRY DRIVERS & TRENDS

Emerging technologies, such as process automation, artificial intelligence (AI), and the Internet of Things (IoT), continue to drive the market. Firms from each TMT sector must continuously adapt to market changes and competitors such as innovative start-ups. At the same time, TMT firms are able to use emerging technologies as growth catalysts; employing AI and process automation can offer an operational edge by shifting the company towards innovation. Blockchain could also assist in creating better, more secure content. Similarly, growing 5G networks could offer room for growth for the media subsector, providing new platforms and faster connectivity for companies to access and explore. 5G wireless networks, voice-assisted technology, IoT, and blockchain will also act as significant drivers for the telecom sector especially as businesses must adapt their models and strategies to the changing environment. This can clearly be seen by following the trend of shifting towards wireless growth rather than pay TV.

Another current trend in the market is cybersecurity priorities by corporate senior executives. As the frequency of cyberattacks will continue to increase with new technology, senior executives will direct their efforts towards

understanding the risks of and preparing for security breaches. Organizations within TMT, mainly tech and telecom firms, should embrace cybersecurity as a catalyst for growth by integrating it into their digital transformation efforts and third-party partnerships to create the appropriate security tactics.

The largest global tech companies are also under stricter regulation for matters such as tax avoidance, hate speech, data privacy, and false news. As many of these regulations have been implemented in fear that the giant tech firms (i.e. Google, Amazon, Facebook) can negatively influence society, TMT enterprises should work to develop a positive, transparent, trustworthy reputation for consumers.

Finally, the uncertainty surrounding the US-China trade war continues to negatively impact sales, profits, and global supply chains of TMT organizations. Similar consequences are occurring due to the Brexit situation, with many firms facing cost, pricing, and supply chain challenges. TMT IPOs have also been impacted by tense US-China relations; as high-tech firms such as Alibaba seek listings in Hong Kong, they are becoming reluctant to appoint US investment banks which can be suboptimal in achieving their maximum potential funding.

RISKS

One of the major risks for this market is the abundance of disruptive innovations that are steadily gaining traction and attention. This indicates that businesses must continuously monitor their short- and long-term strategies along with current product portfolios as they can become obsolete. Disruptive innovation also entails formulating robust adaptation strategies that can be immediately executed and allocating more resources into R&D. Currently, as 5G networks, IoT, and AI move into the market, businesses will have to act fast in integrating these technologies to expand.

The rapid entry of start-ups and competitors due to low barriers to entry are posing another significant risk. With many technological advancements, the industry is experiencing a constant widening in not only product and service improvement but also innovations and inventions. This trend has been breeding an environment for financing to be received with little to no impediments, prompting an abundance of tech IPOs.

Finally, privacy and information security are another crucial risk that the industry faces. Constant innovation and improvement have consequently produced greater loopholes and areas prone to threats. Legislation such as the General Data Protection Regulation (GDPR) and constant consumers' concern for their privacy and security have shifted businesses to emphasize and monitor their systems. Data breaches can have severe implications to the success of a business as brand equity, reputation, and revenue generation can all be undermined. Mitigating this risk is imperative to remain competitive and to execute strategies.

Overall, the TMT sector faces disruption from competing start-ups, new technological innovations, and cybersecurity regulations. However, these risks can be mitigated by monitoring and adapting to rapidly evolving consumer demand, implementing new innovative technology into their operations, and by sharing the value of cybersecurity through offering safer products and partnering with companies to create security strategies.

SOURCES

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Boston Consulting Group

Deloitte

Ernst & Young

EMIS

GlobalData

FactSet

Protiviti

Willis Towers Watson