MWC Shanghai 2021

GIO Digital Health Roundtable Summary

Building a Fully Connected, Intelligent World

GLOBAL INDUSTRY ORGANIZATIONS

Digital Health Roundtable overview

Organization Type	Organization Name	Speaker	Title
Industry organization	National Telemedicine and Connected Healthcare Center	Lu Qingjun	Director
	Standardization Profession Committee, Chinese Health Information Association	Han Xiong	Committee member
	Xiamen Health and Medical Big Data Center	Ye Lishan	Director
	Health Management Sub-committee, Chinese Medical Association	Guo Qing	Director
	TMF	Xu Junjie	Manager of TMF China
	Instrumentation Technology and Economy Institute	Ouyang Jinsong (Beijing sub-venue)	Director
	The Open Group	Chris Forde	Vice President
	OPRC	Jonathan Hopkinson	Lead Business Diplomat
	ITS	Xu Yan (online)	Board of Directors
	GSMA	Ian Pannell (online)	Chief Engineer
	Linux Foundation	Julian Gordon (online)	LFPH (Open source umbrella program in the healthcare industry) VP for Asia Pacific
Think tank	China Info100	Zhu Yan (Beijing sub-venue)	Executive Board Member
Hospital	Development Office of China-Japan Friendship Hospital	Yang Xuelai	Deputy Director
University	Hangzhou Normal University	Wang Xiaodi	Associate Professor
Enterprise	Medtronic China R&D Center	Peng Yang	Vice President
	Medtronic China R&D Center	Lu Zhentao	R&D Director
	Roche China	Chris Wang	Director of the Blood Glucose Unit
	AstraZeneca	Rita Song	Director of the Market Strategy Department
	IQVIA	Sosa Liu	Director of the Healthcare Innovation Dept
Telecom operator	Government & Enterprise Business Dept, China Unicom Jiangsu	Li Lan	Deputy GM
	5G Lab, China Mobile Shanxi	Wang Weidong	GM
		Li Xueting	Director for the Healthcare Industry

- 22 industry participants (20 attended in person, and 2 attended virtually).
- 60+ Huawei executives and experts (21 attended in person, and the other attended virtually)

Digital Health Roundtable agenda

Topic	Speaker	Title & Organization	Time
Opening speech	Zhang Wenlin	President, Corporate Strategy Department, Huawei	14:30–14:40
Insights into digital trends in healthcare	Zhu Yan	Executive Board Member, China Info 100	14:40–15:00
Applications and challenges of blockchain in healthcare	Lin Haotian	Deputy Director, Zhongshan Ophthalmic Center, Sun Yat-sen University	15:00–15:30
Applications and challenges of 5G telemedicine	Lu Qingjun	Director of the Development Office of China-Japan Friendship Hospital Director of National Telemedicine and Connected Healthcare Center Deputy Director and Secretary-General of Telemedicine Sub-committee under the China Association of Medical Equipment	15:30–16:00
5G: Developing health management systems that feature early screening, evaluation, and intervention	Guo Qing	Director, Health Management Sub-committee, Chinese Medical Association	16:00–16:20
Break			16:20–16:30
Digital healthcare industry insights and strategies	Ouyang Jinsong	Director of Instrumentation Technology and Economy Institute Deputy Director of SAC/TC 124	16:30–16:50
Cloud-based informatization of medical institutions	Han Xiong	Member, Standardization Profession Committee, Chinese Health Information Association	16:50–17:10
Thoughts on accessing and sharing personal health records	Ye Lishan	Director, Xiamen Health and Medical Big Data Center	17:10–17:30
Discussion: **How will digitalization drive the rapid development of the healthcare industry?**	Moderator: Lu Qingjun	Questions: • What are the main problems that restrict the digitalization of the healthcare industry? • What are the top three scenarios in which new technologies will accelerate the digitalization of the healthcare industry? • How can we accelerate the development of digital health?	17:30–18:30

■ Shanghai main venue

■ Beijing sub-venue

Opening speech

Zhang Wenlin

Director, Corporate Strategy Department, Huawei

Key viewpoints:

1. The healthcare industry is entering a new era of digital health, and a golden age of industry that betters people's livelihoods is about to begin.
2. Global developments in digital health are bringing digital transformations to the healthcare industry.
3. We hope that experts from all industries can inspire each other and work together with an open mind, to make applications and ecosystems thrive and build a digital and intelligent world.

Core views of experts

Lu Qingjun

We can first develop standards for 5G technologies and use cases, and then test and deploy these technologies to develop smart healthcare. I suggest that GIO assume a bigger role in integration with industries.

Lin Haotian

AI can be increasingly, widely used in the digitalization of healthcare. Data is the foundation of AI, and blockchain is key to ensuring data privacy and security.

Han Xiong

Existing hospital information systems are complex and siloed, and should be migrated to the cloud in the future. Network and cloud technologies are essential to realize this.

Ouyang Jinsong

The security and reliability of medical instruments are vital to digital healthcare, so we must build a complete framework of standards for medical instruments.

Digital hospitals:

1. We can first develop standards for industrial use cases, and then test and deploy the related technologies.
2. There is a long way to go in the development of digital hospitals. Technologies such as AI, blockchain, cloud, and networks should all suit real-world situations.

Guo Qing

Chronic disease management could be the biggest challenge in proactive health management. This will be difficult to address in the short term, and we need a brand-new health service model.

Ye Lishan

Conventional medical treatment centers on hospitals. The development of personal health records is shifting the focus to individuals. This new system is based on health management throughout an individual's life, integrating all online/offline resources inside/outside hospitals.

Health management:

1. Issues related to chronic disease management and elderly care cannot be solved overnight. We need to build a brand-new health service model, and new technologies will be key to achieving this.
2. As societies and economies develop, the healthcare system is shifting from being hospital-centered to individual-centered. We must develop a set of standards for personal health records, which will help build personal health profiles.

Core viewpoints (Zhu Yan & Lin Haotian)

Zhu Yan: Executive Board Member, China Info100

Speech topic: Insights into digital trends in healthcare

Core views:

1. Healthcare is part of China's national 2035 plan, and the development of digital healthcare is strongly supported by policies.
2. Over the past 20 years, the development of technologies such as AI, 5G, cloud, and big data have accelerated the development of digital health.
3. I hope GIO platform can expand its reach from ICT to other industries, gain in-depth insights, explore new applications with industrial organizations and experts, and promote the development of new ecosystems and new business models around the world.

Lin Haotian: Deputy Director, Zhongshan Ophthalmic Center, Sun Yat-sen University

Speech topic: Applications and challenges of blockchain in healthcare

Core views:

1. Artificial intelligence and computer vision are closely related to our own vision. Dividing imaging data into the smallest units possible can improve identification efficiency and accuracy.
2. There are three key words for healthcare data: data, privacy, and trust. Blockchain can perfectly solve the problems that plague these key areas. Through blockchain, smart contracts, and multi-medical center cooperation, we can ensure patients take their medicine as prescribed, and help digital hospitals and cloud-based pharmacies to track medication distribution.
3. Data sharing is a challenge due to restrictions in the cooperation mechanism and intellectual property issues. Using blockchain to develop cooperation rules and data usage rules recognized by multiple parties and determine IPR rights is the key to enabling medical data sharing that will boost future development in the healthcare industry.

Core viewpoints (Lu Qingjun & Guo Qing)

Lu Qingjun: Director, National Telemedicine and Connected Healthcare Center

Speech topic: Applications and challenges of 5G telemedicine

Core views:

1. Internet + Healthcare has become a part of our national strategy. Related policies and supervision mechanisms have been gradually improving.
2. 5G + Smart Healthcare drives technological improvements and innovations in the healthcare industry and facilitates digital transformations.
3. Digital healthcare is a promising new trend. With the continuous development of new technologies, we will see an increase in demand for digital healthcare services. The applications rolled out have proved the value of digital healthcare.
4. We hope that we can establish powerful mechanisms between healthcare institutions, businesses, and industry partners through the GIO platform to leverage our strengths and finally build a new ecosystem together.

Guo Qing: Director, Health Management Sub-committee, Chinese Medical Association

Speech topic: 5G: Developing health management systems that feature early screening, evaluation, and intervention

Core views:

1. Population aging and chronic disease are some of the biggest challenges facing humans today. There are no quick fixes to these problems.
2. The key to health management is to build a new health service model, including health checks, health assessments, timely intervention, and data management. This requires a comprehensive service system that covers all aspects and processes related to healthcare. This is only possible with the support of new technologies and the cooperation of partners across the healthcare industry.

Core viewpoints (Ouyang Jinsong & Han Xiong)

Ouyang Jinsong: Director, Instrumentation Technology and Economy Institute of China

Speech topic: Digital healthcare insights and strategies

Core views:

1. When developing the digital health industry, we must uphold the essential principle of safety and effectiveness, strengthen risk-based supervision, focus on the reconstruction of the industry value chain, accelerate the development of a standardized innovation system, and promote the orderly and sound industry development.

Han Xiong: Member, Standardization Profession Committee, Chinese Health Information Association

Speech topic: Cloud-based informatization of medical institutions

Core views:

1. Informatization is a "painful" process for hospitals, as a large number of information silos need to be aligned. Building clouds and networks to meet informatization requirements is the key.
2. We should pay attention to network and data security when migrating information systems to the cloud, as it is one of the major factors that determines whether the healthcare cloud can be implemented.

Core viewpoints (Ye Lishan)

Ye Lishan: Director, Xiamen Health and Medical Big Data Center

Speech topic: Thoughts on accessing and sharing personal health records

Core views:

1. Personal Health Records (PHRs) have gradually extended from traditional medical records to health data management records that are managed by patients throughout their lives.
2. PHR development faces several major challenges: standardization of the medical record structure, data sovereignty, and cross-industry data aggregation and backtracking.
3. PHRs can be used to create personal health profiles, supporting doctors in early disease detection and pre-diagnosis. In addition, PHRs can be used to support public health decision-making. The Internet can be incorporated in the medical and elderly care model to manage personal health.

Health roundtable discussion: Summary and suggestions

■ Key points:

- **Chris Wang (Roche China):** Family-based chronic disease management is a key part of health management. It is vital to enable interactions between families and hospitals through 5G, wearables, and IoT in order to promote a proactive healthcare model.
- **Peng Yang (Medtronic China R&D Center):** Medical instrument vendors focus on the incorporating informatization into medical diagnosis and treatment, which requires cross-domain collaboration.
- **Ouyang Jinsong (Instrumentation Technology and Economy Institute of China):** Compared to other traditional industries, the health industry is more heavily focused on safety and effectiveness, which require traceability and quantitative management respectively.
- **Chris Forde:** The health industry should pay more attention to families and individuals. Whether or not our medical instruments can enable health checks to be conducted by families is key.
- **Janathan Hopkinson:** People's perceptions are an important factor for the development of the health industry, but infrastructure capabilities will also determine whether industry applications can be recognized.
- **Lu Qingjun:** Establishing a patient-centered healthcare service system is an end-to-end project. Factors such as technical capabilities and security issues must be considered.

■ Suggestions:

- **Lu Qingjun (Director of the National Telemedicine and Connected Health Center):** I hope that GIO can also participate in summits of the healthcare industry.
- **Li Lan (Deputy General Manager of the Government & Enterprise Department of China Unicom Jiangsu):** Carriers are also key players in the healthcare industry ecosystem. We hope that carriers will be invited to forums like this in the future.

Huawei executives' viewpoints and suggestions

1. **How can Huawei participate in the digital transformation of the health industry with its ICT and wearables?** This is a strategic matter that we have been exploring. Beyond selling products, Huawei hopes to create real value for end consumers and the entire industry through collaboration with upstream and downstream players in order to promote the development of the health industry.
2. Each type of ICT technology has its own application scenarios. No technology can be one-size-fits-all. GIO aims **to serve as a platform for in-depth discussions among more cross-industry organizations and experts in order to identify opportunities for cross-industry collaboration and create a better industry environment.**

1. Huawei must **determine its positioning and value** within the industry value chain to better participate in digital health, smart healthcare, smart hospital, health management, and public health system upgrades.
2. **Shared success is key to both closed-loop business management** and a favorable industry environment. This involves related laws and policies, among other things.
3. Digital health is a big concept. **We must combine new technologies with various medical and healthcare applications** to fully utilize the value of technologies and promote digital upgrades.

Appendix: Highlights

GLOBAL INDUSTRY ORGANIZATIONS

Thank you