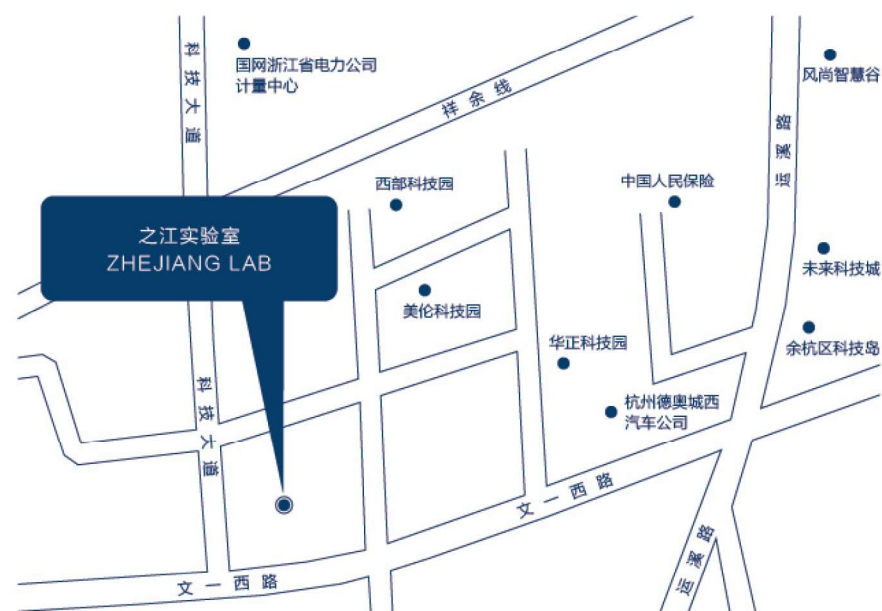


之江实验室



ZHEJIANG LAB



杭州市  
文一西路1818号  
人工智能小镇10号楼

BUILDING 10,  
ARTIFICIAL INTELLIGENCE  
TOWN, 1818, WENYIXI ROAD,  
HANGZHOU

TEL: +86 0571-56390515  
FAX: +86 0571-56390666



Highlight Original Innovation

Embody National Level

Innovate Ideas and Thinking

Simulate Creative Vitality

Enhance Open Coordination

Promote Harmonious Symbiosis

Follow Scientific Laws

Persist in Steady Advances

# 1

## 实验室简介 OVERVIEW

As a major sci-tech innovation platform launched by Zhejiang Provincial Government and Party Committee to implement General Secretary Xi Jinping's thoughts on technological innovation and the innovation-driven development strategy, Zhejiang Lab takes the initiative to shoulder the responsibilities of Zhejiang Province during the construction of an innovation-oriented country and a science and technology power in the world.

Jointly established by Zhejiang Provincial Government, Zhejiang University and Alibaba Group, guided by national objectives and strategic demands, Zhejiang Lab centers on tackling major scientific missions and building large-scale scientific infrastructure, focusing on network information and artificial intelligence. Zhejiang Lab plans and pushes forward innovations with a global vision, assembles and aggregates high-quality innovation resources from universities and institutes both at home and abroad and central and private enterprises, to build a novel scientific and research institution to pursue breakthroughs, to take the lead and to act as a platform with an ultimate goal of becoming a national laboratory.



Zhejiang Provincial Government

Zhejiang University

Alibaba Group

Zhejiang Lab is organized with the structure of “one system, two pivots and multiple points”.

### One System:

As a public institution of mixed ownership with the status of an independent legal person, Zhejiang Lab operates as an entity.

### Two Pivots:

Supported by Zhejiang University and Alibaba Group, Zhejiang Lab undertakes major frontier basic science researches and investigates key technologies.

### Multiple Points:

Zhejiang Lab assembles advantageous scientific and research power in the fields of artificial intelligence and network information both at home and abroad and aggregates innovation resources.



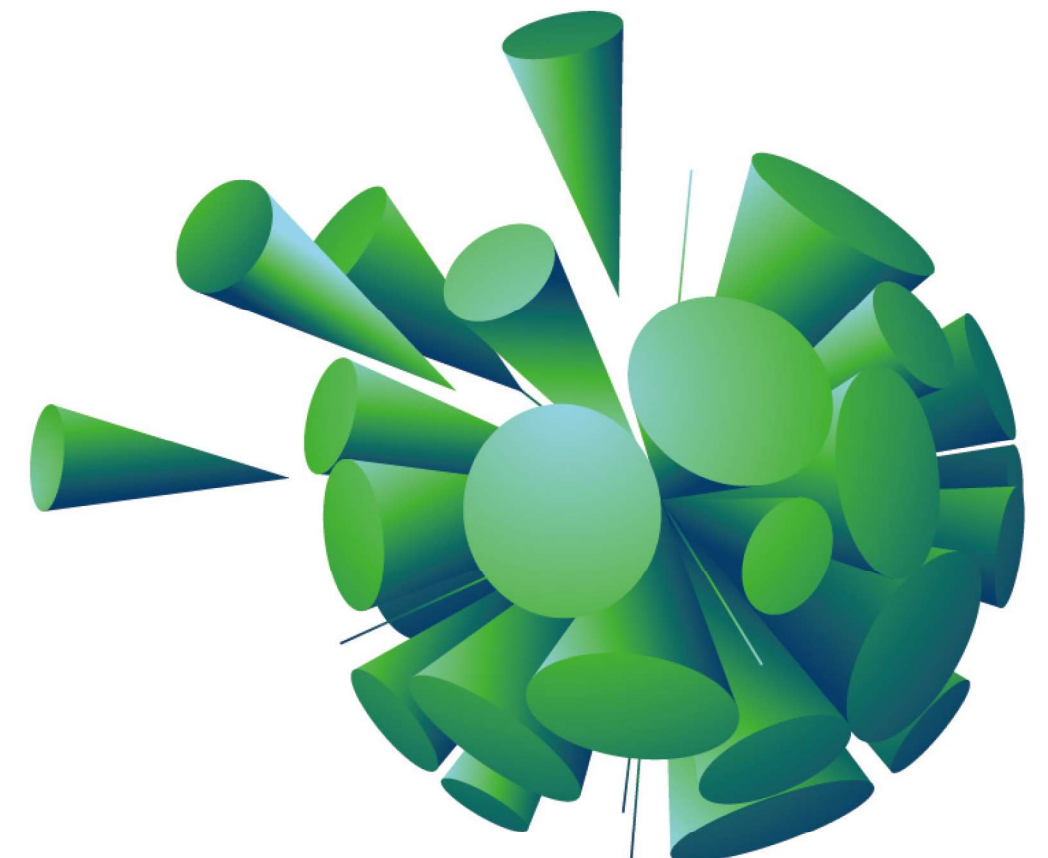
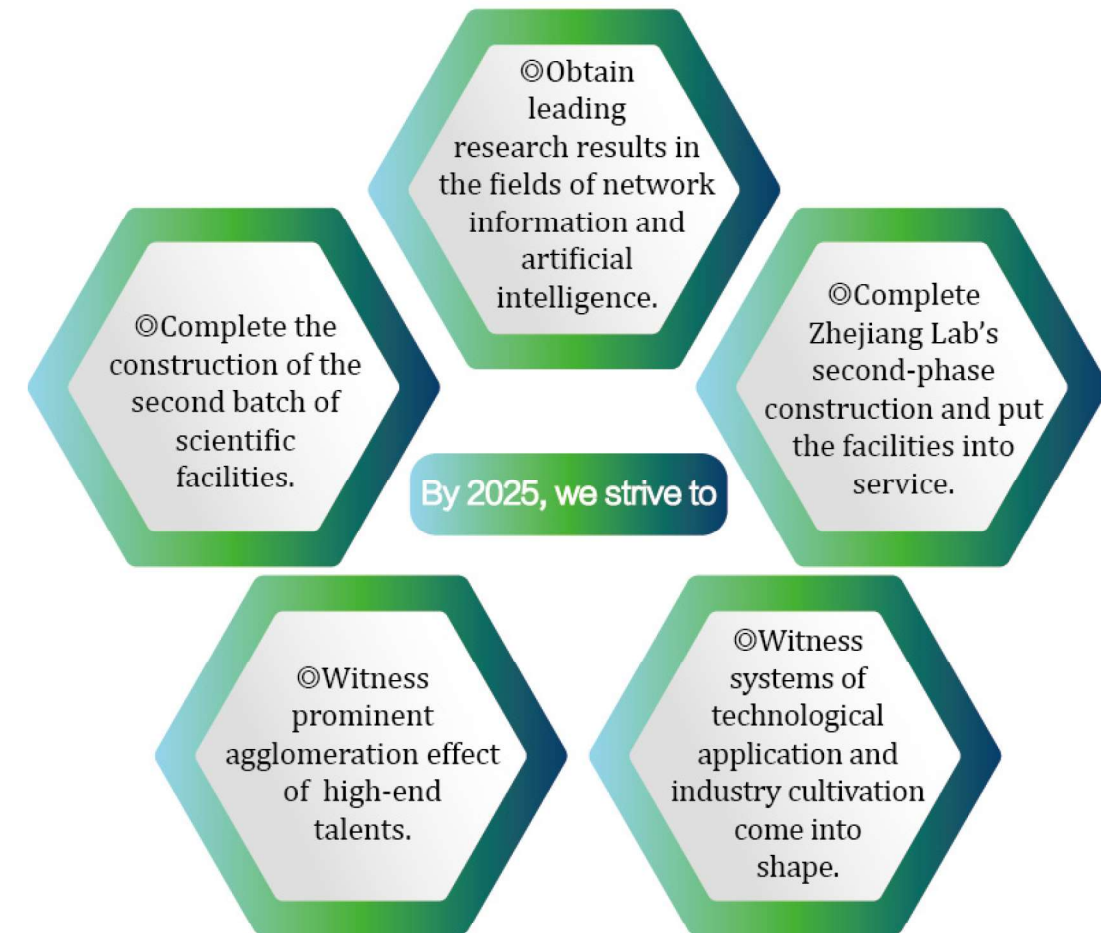


# 2

## 总体目标

### VISION & MISSION

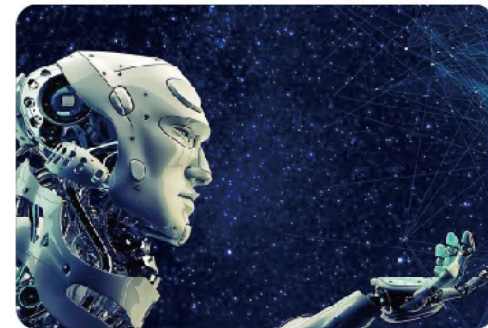
- ☑ Integrate and coordinate a number of major scientific infrastructures.
- ☑ Gather a batch of world's leading research and development teams.
- ☑ Build a world-class research base of basic sciences.
- ☑ Obtain significant and common technological results of great impact.
- ☑ Support and lead clustering development of innovative industries with world competitiveness.
- ☑ Develop into a national laboratory.



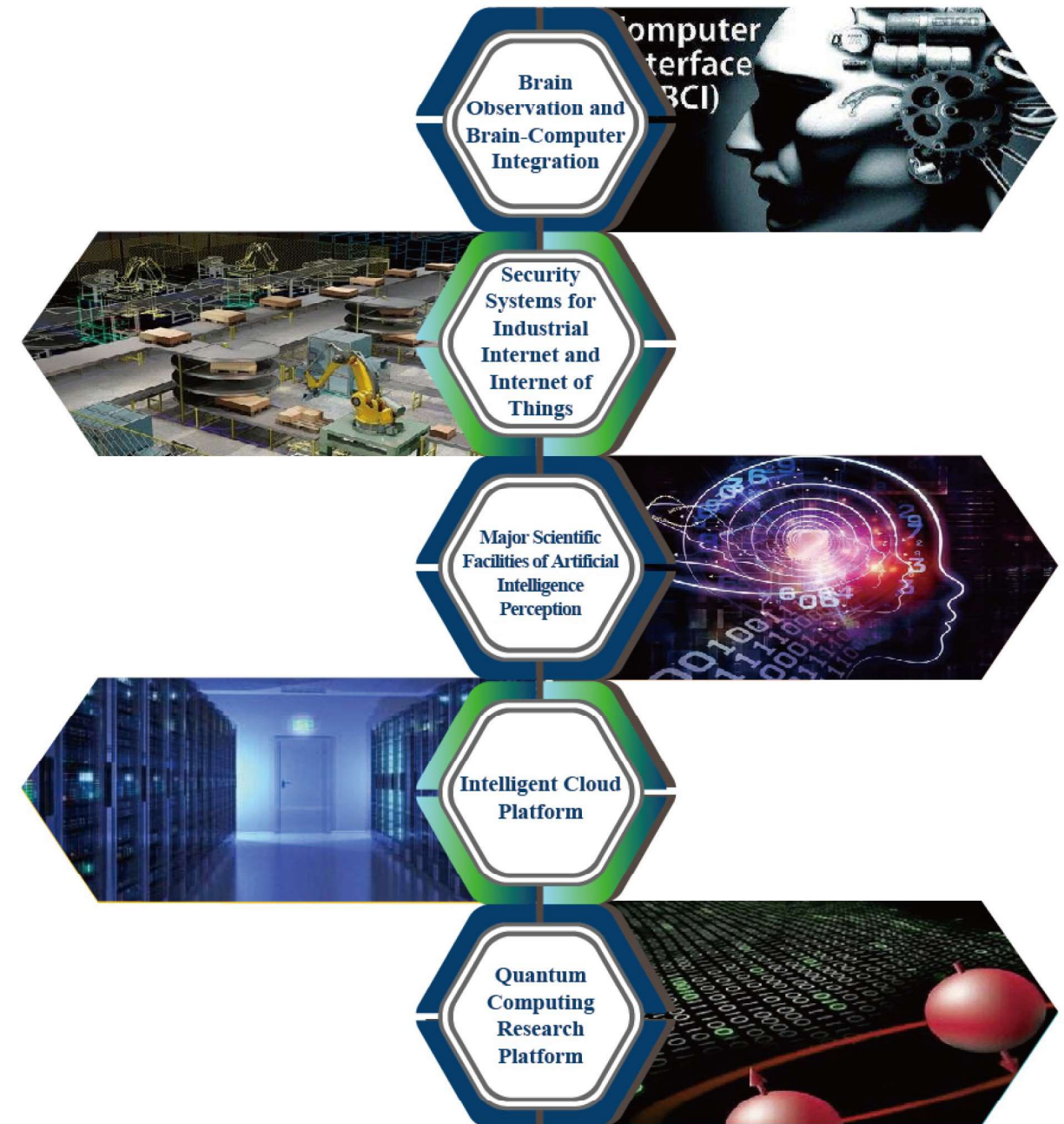
# 3

## 主攻方向 RESEARCH AREAS

Focusing on the Two Areas of Network Information and Artificial Intelligence



## Major Scientific Facilities and Platforms





### Five Main Research Areas

#### Future Network Computing

- ◇ Big Data
- ◇ Edge Computing
- ◇ Future Network Operating System
- ◇ Quantum Computing

#### Generalized Artificial Intelligence

- ◇ Brain-computer Hybrid Intelligence and Brain-like intelligence
- ◇ Novel Intelligent Computing
- ◇ Automatic Unmanned Systems
- ◇ Intelligent Control and Decision-making

#### Barrier-free Perception and Interconnection

- ◇ Communication Networks and Sensing
- ◇ Mixed Reality
- ◇ Perception

#### Ubiquitous Information Security

- ◇ Network Security
- ◇ Security of Cloud Computing and Data
- ◇ Deep Security of Industrial Control System
- ◇ Security of Internet of Things
- ◇ Security of Privacy and System

#### Intelligent Manufacturing and Robots

- ◇ Personalized Design and Manufacturing
- ◇ Novel Robots
- ◇ 3D Printing
- ◇ Intelligent Equipment for Engineer Operations

## First Batch of Seven Major Projects and One Scientific Facility to be Launched

Intelligent Barrier-free Perception Chips and Systems

Network Security and Industrial Internet

Studies of Next-generation Internet Identifier System

Advanced Artificial Intelligence Algorithm Platform

City Brain

Multi-center Coordination and Intelligent Information Technology Platform of Bio-medicine

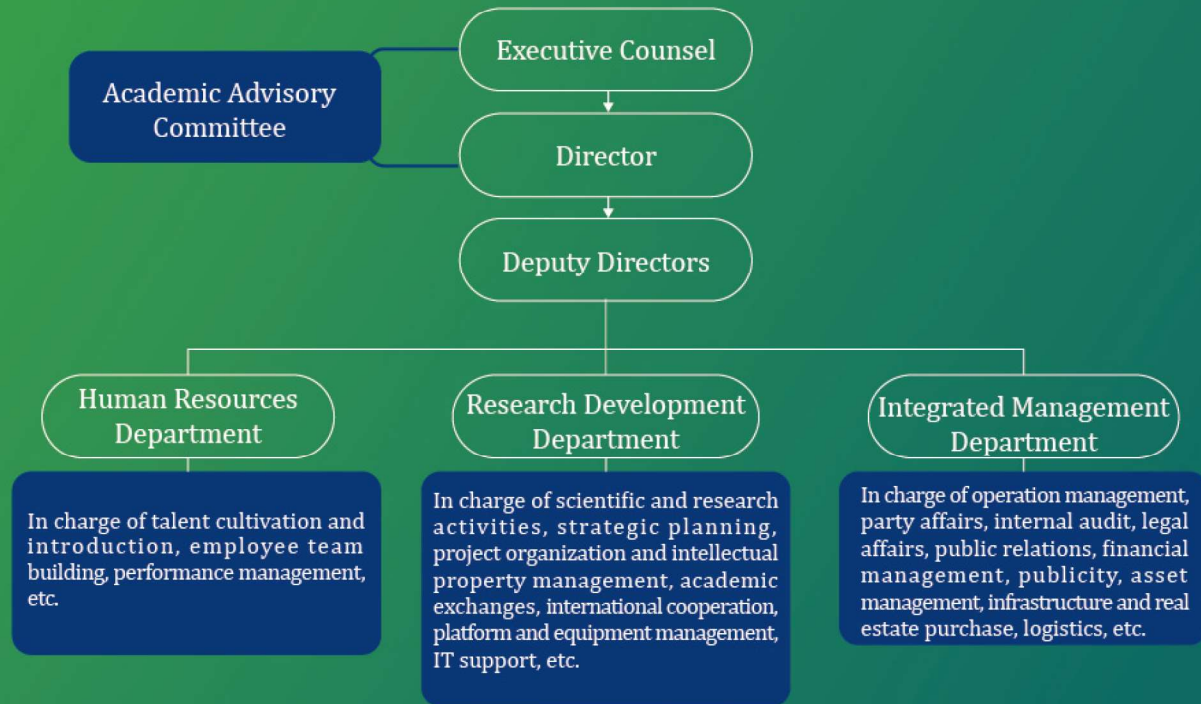
Innovative Researches, Development and Construction of Industrial Brain

Scientific Facilities of Brain Observation and Brain-computer Integration



# 4 组织架构 STRUCTURE & ORGANIZATION

## Administrative Structure of Zhejiang Lab



## Scientific and Research Structure of Zhejiang Lab (Preparatory)





## Executive Counsel

Organization of macro management and leadership, in charge of significant decisions including development strategies, development areas, fund orientations, major projects, management of researchers, etc.



**Counsel Director:**  
**YUAN Jiajun**

(Governor of Zhejiang Province)



**Deputy Director of Counsel:**  
**FENG Fei**

(Executive Vice Governor of Zhejiang Province)



**Deputy Director of Counsel:**  
**XU Liyi**

(Mayor of Hangzhou City)



**Deputy Director of Counsel:**  
**WU Zhaohui**

(Academician of the Chinese Academy of Sciences, President of Zhejiang University)

## Academic Advisory Committee

Composed of renowned experts from home and abroad. Organization of academic advising and guidance, in charge of providing Counsel with advisory opinions and advice on academic issues relevant to directions of innovative researches, major development areas, major research missions and objectives etc, instructions on and grasp of Zhejiang Lab's research directions, and evaluation of Zhejiang Lab's academic work.



**Committee Director:**  
**LU Yongxiang**

(Former Vice Chairperson of the NPC Standing Committee, Former President of the Chinese Academy of Sciences, Academician of the Chinese Academy of Sciences and the Chinese Academy of Engineering)



**Deputy Director of Committee:**  
**PAN Yunhe**

(Former Executive Vice President of the Chinese Academy of Engineering, Academician of the Chinese Academy of Engineering)



**Deputy Director of Committee:**  
**WU Hequan**

(Academician of the Chinese Academy of Engineering)



**Deputy Director of Committee:**  
**WU Jiangxing**

(Academician of the Chinese Academy of Engineering)



**Deputy Director of Committee:**  
**WU Manqing**

(Academician of the Chinese Academy of Engineering)



# List of Zhejiang Lab's (First) Academic Advisory Committee Members

(In Alphabetical Order)



**CHEN Chun**  
Academician of the Chinese Academy of Engineering



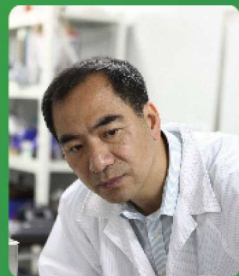
**CHEN Jie**  
Academician of the Chinese Academy of Engineering



**CAO Jian'ong**  
IEEE Fellow



**GU Jianjun**  
Fellow of the Canadian Academy of Engineering



**GONG Qihuang**  
Academician of the Chinese Academy of Sciences



**GAO Wen**  
Academician of the Chinese Academy of Engineering



**HUA Xiansheng**  
From Alibaba Group, IEEE Fellow



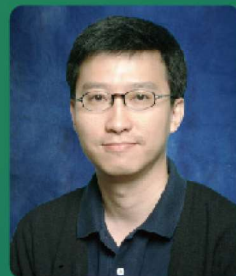
**HE You**  
Academician of the Chinese Academy of Engineering



**LU Jianhua**  
Academician of the Chinese Academy of Sciences



**LI Peigen**  
Academician of the Chinese Academy of Engineering



**LV Zicheng**  
IEEE Fellow, ACM Fellow



**Paolo Dario**  
IEEE Fellow



**Raj Reddy**  
Professor of Carnegie Mellon University, Winner of the Turing Award



**REN Kui**  
IEEE Fellow



**SHEN Xuemin**  
Fellow of the Canadian Academy of Engineering



**SONG Yonghua**  
Fellow of the Royal Academy of Engineering (UK), Rector of the University of Macau



**SUN Youxian**  
Academician of the Chinese Academy of Engineering



**WANG Shafei**  
Academician of the Chinese Academy of Engineering



**WU Zhaohui**  
President of Zhejiang University, Academician of the Chinese Academy of Sciences



**XU Yangsheng**  
Academician of the Chinese Academy of Engineering



**YANG Huayong**  
Academician of the Chinese Academy of Engineering



**YU Quan**  
Academician of the Chinese Academy of Engineering



**ZHANG Jianwei**  
Member of the Academy of Sciences and Humanities in Hamburg



**ZHANG Xiaodong**  
IEEE Fellow, ACM Fellow



**ZHAO Wei**  
IEEE Fellow



**JIN Shangzhong**  
Top Expert of Zhejiang Province



**LI Lihua**  
Awardee of the National Science Fund for Distinguished Young Scholars



**YU Li**  
Awardee of the National Science Fund for Distinguished Young Scholars



## Leaders of Zhejiang Lab

Director of Zhejiang Lab is the legal representative of Zhejiang Lab, in charge of various management work of the lab. Deputy directors of Zhejiang Lab assist the Director in daily routine, in charge of management of research section and functional section severally.



Director of Zhejiang Lab:

**ZHU Shiqiang**

(Vice Secretary of the Party  
Committee of Zhejiang  
University, Expert at  
Intelligent Robots)



Deputy Director of

Zhejiang Lab:

**YUAN Jixin**



Deputy Director of

Zhejiang Lab:

**SHI Yaoyun**

(Chief Scientist of Quantum  
Technologies, Aliyun,  
Alibaba Group)





# 5

## 主要任务 PRIMARY MISSIONS

- 1 Researches on Major Forefront Basic Sciences and Technological Breakthroughs
- 2 Construction of Major Scientific Facilities and Research Platforms
- 3 Domestic and Overseas Scientific Cooperation and Exchanges
- 4 Cultivation of High-level Scientific and Research Talents
- 5 Taking on China's Strategic Technological Innovation Projects on Network Information
- 6 Transfer and Transformation of Scientific Research Results and Industrialization



# 6

## 园区建设

## CAMPUS CONSTRUCTION



Selected site of Zhejiang Lab's new campus is located in Zhejiang Hangzhou Future Sci-tech City with a total planned area of 2 km<sup>2</sup>.

