

Intelligent Data Center

Lighting Up Your Business Innovation

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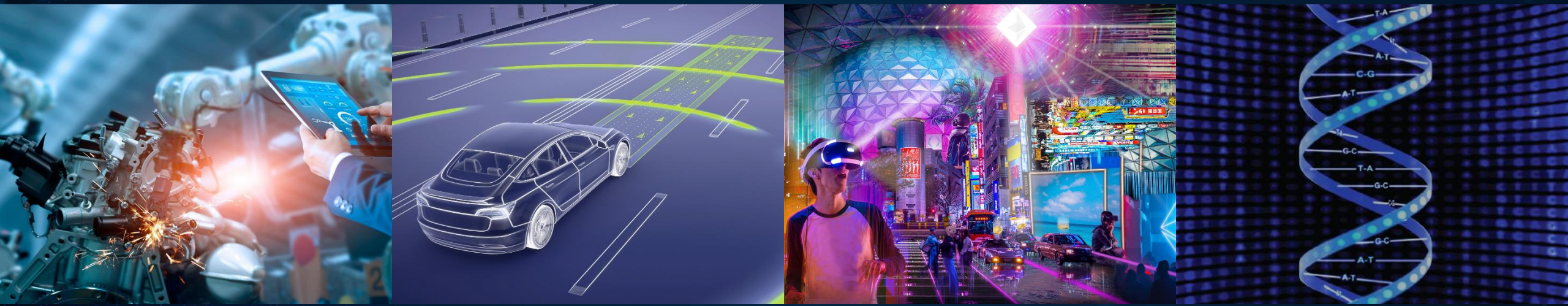
How Big Is the Digital Economy

HBC

10.2% of U.S. GDP or
\$2.1 trillion in 2020

6.3% average annual
growth, 2012-2020, led by
growth in infrastructure and
e-commerce

7.8 million jobs in 2020,
2.5% average annual
growth, 2012-2020



Source: bea.gov/data/special-topics/digital-economy

Data Centers Are the Cornerstone of the Digital Economy

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Computing
Power

Data

Connection

The global data center market investment was valued at **USD 215 billion in 2021**, and is forecasted to reach **USD 288.3 billion by 2027**, growing at a **CAGR of 4.95%**.

Source: Arizton Advisory and Intelligence

WHAT WILL FUTURE DATA CENTER LOOK LIKE?

Considerations for Future-proof Data Center



High Speed
Low Latency

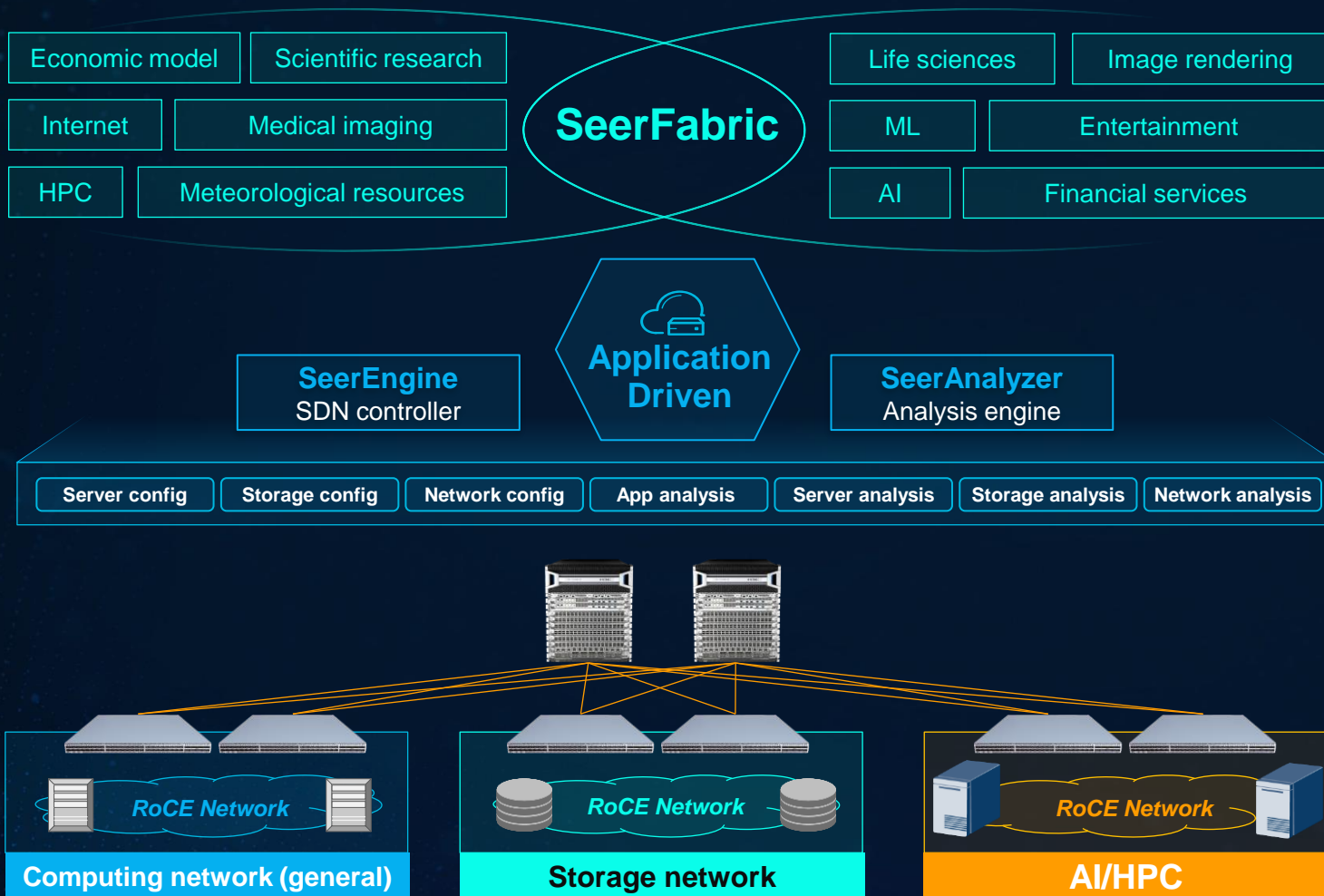
Reliability

Sustainability

TALENT
Professional
Service

H3C will provide a one-stop solution for **intelligent, lossless and green data centers**, to accelerate the development of the digital economy.

H3C SeerFabric Data Center Solution



Ultra-broadband & lossless

- Supreme 400G
- Lossless network with RDMA/RoCE

Intelligent O&M

- Consistent optimization for lossless network
- Proactive troubleshooting

One-stop solution

- ICT infrastructure
- Application-driven engines

H3C SeerFabric Solution Portfolio



400G Core Switch

Industry-leading performance



S12500R



S12500G-AF

S9850 Series



S9850-4C



S9850-32H

S9820 Series



S9820-8C



S9820-64H

S6850 Series



S6850-2C



S6850-56HF

AD-NET Solution

SeerEngine
SDN controller



SeerAnalyzer
Analysis engine

Virtualization, SDS and HCI



H3C ONEStor

UIS



Servers



R4900 G5



R6900 G5



R4300 G5

NIC



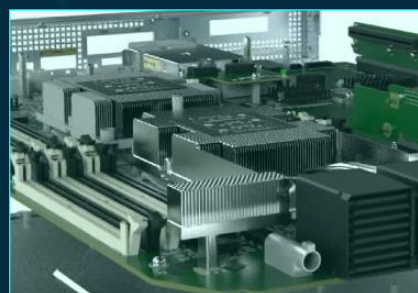
RDMA NIC

Low Power Consumption Design for Green Data Center

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Custom PCB Sheets



Optimized structural design

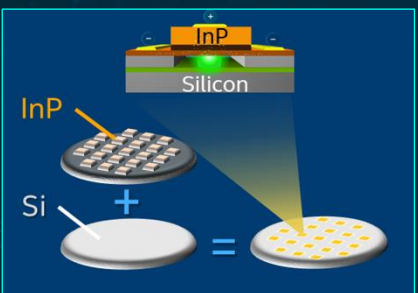


Improve power supply efficiency

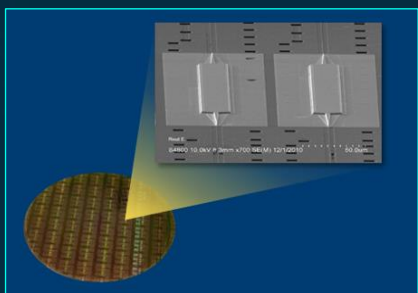


48*400G ports

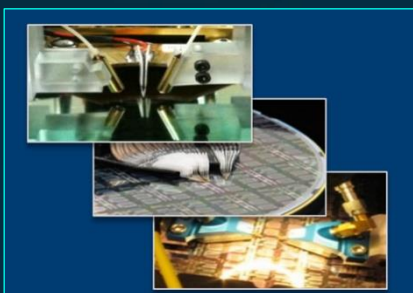
Cost reduced by **50%** per Gb



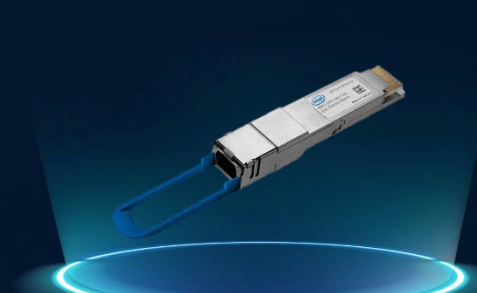
Hybrid Laser Technology



Advanced CMOS Process



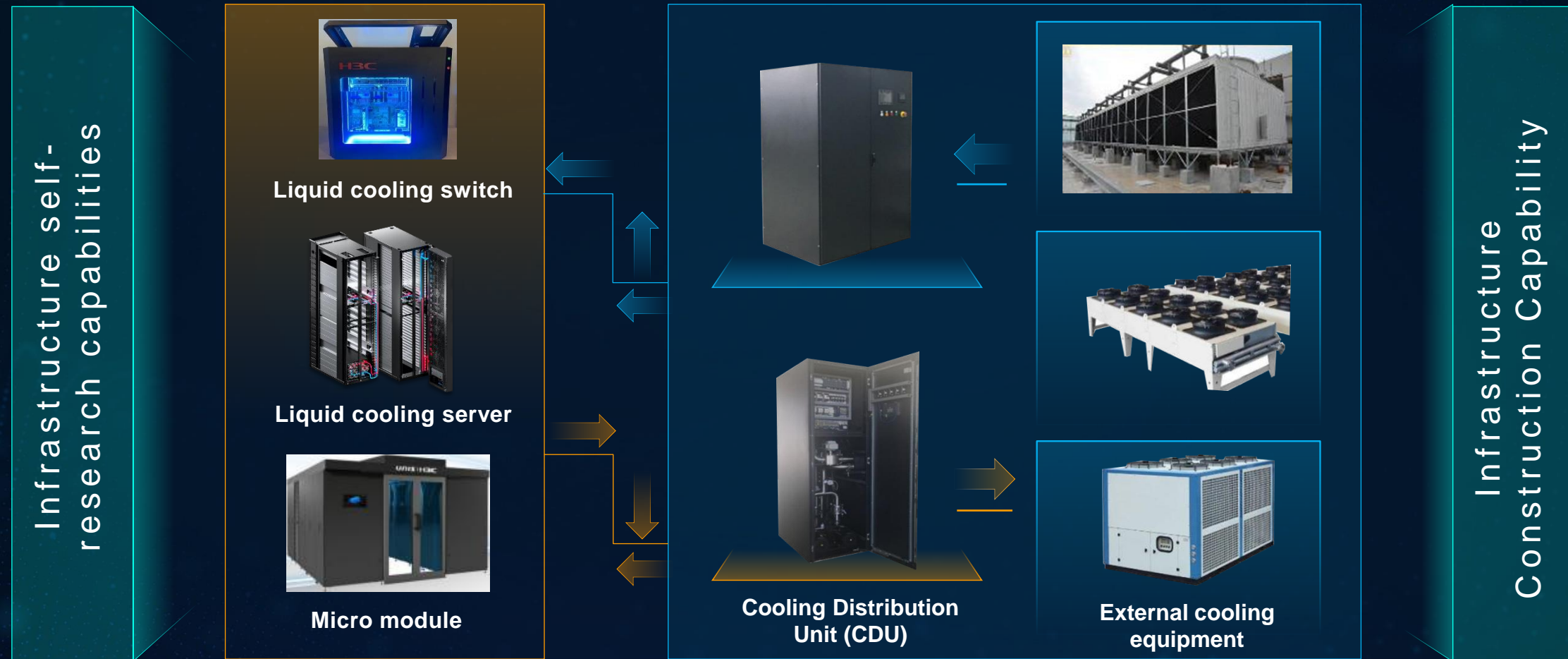
On-chip optoelectronic testing



400G
DR4+/FR4/LR4

Power consumption reduced by **75%** per Gb

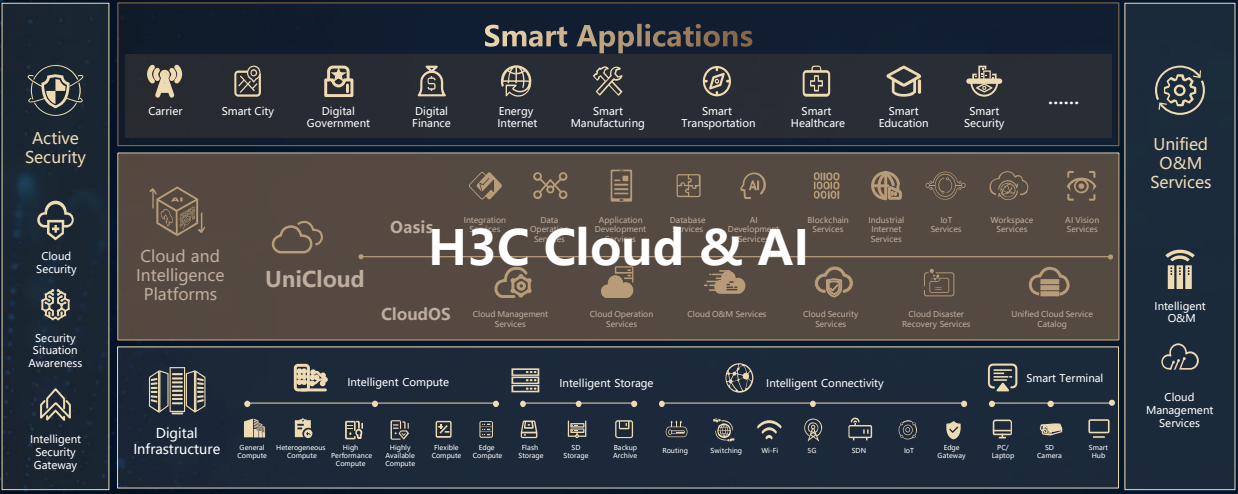
H3C Liquid Cooling Solutions



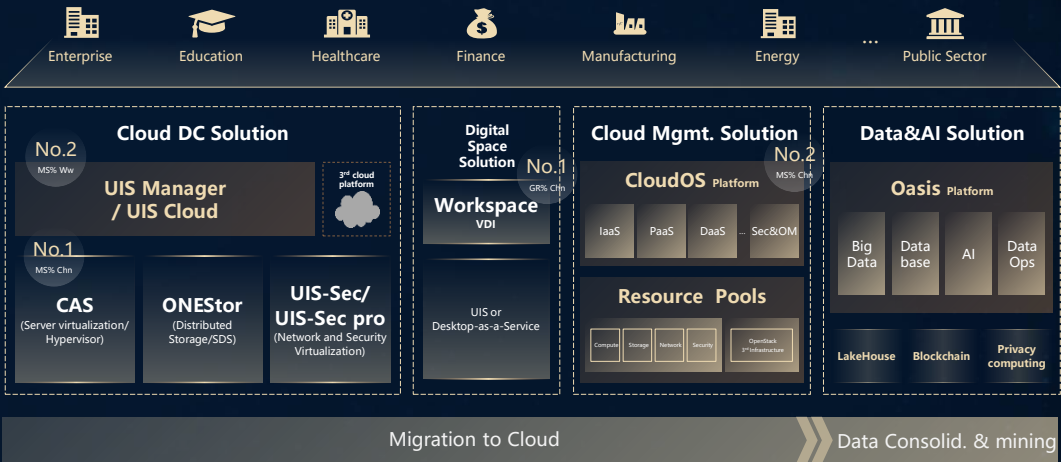
Innovative Solutions: Full-domain Coverage ,Full-stack Enablement



H3C Digital Brain Project

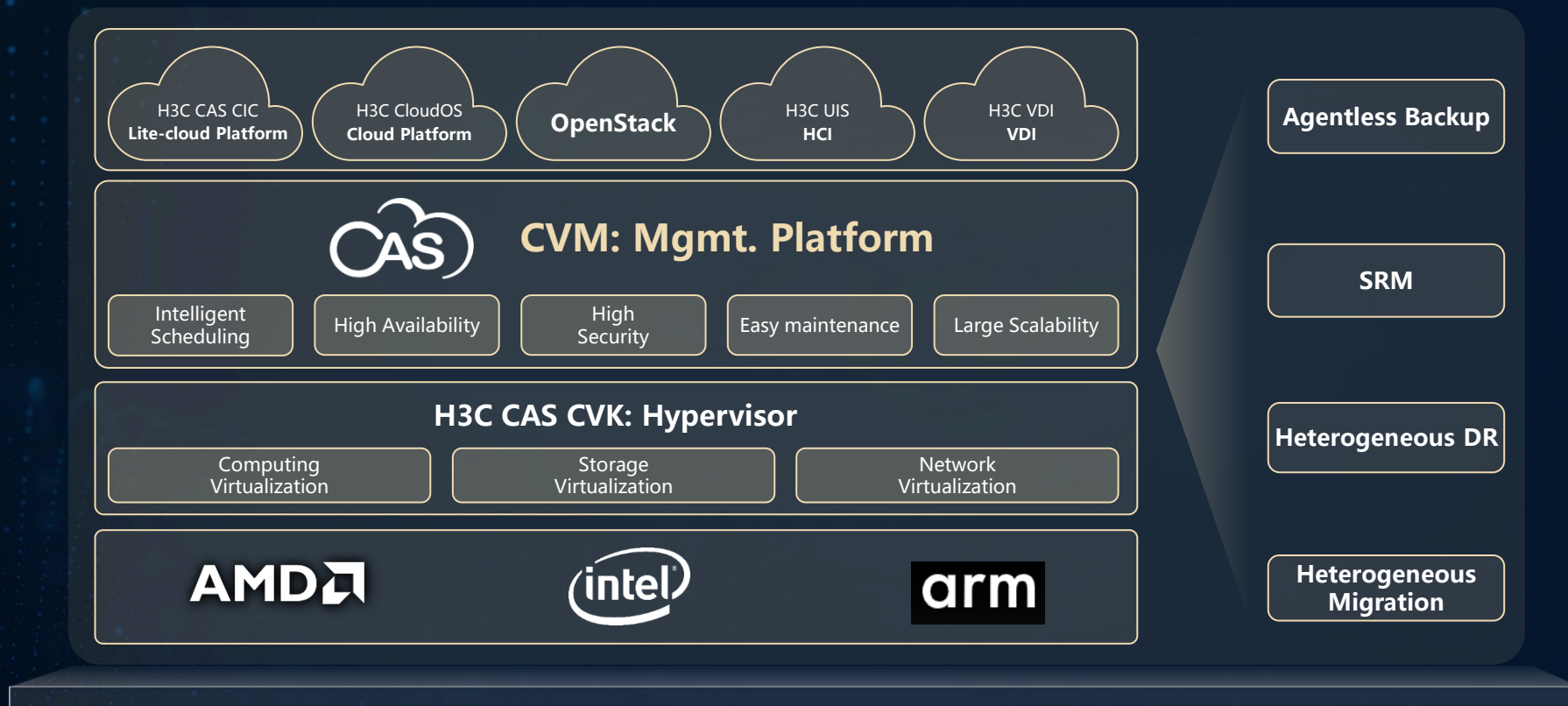


Smart Digital Platforms



Help customers migrate to cloud, consolidate & mine data and empower intelligence for different scenarios

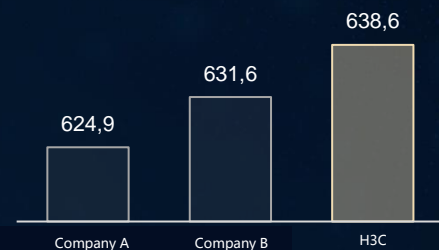
CAS: The Most Competitive Hypervisor



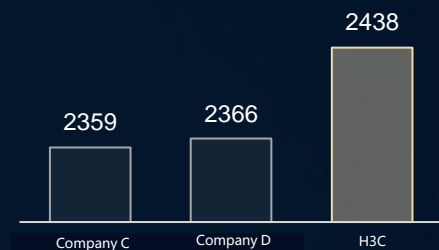
Rank No. 1 in China's virtualization market among domestic brands for **7yr**

Deliver more than **400,000** CPU on-line licenses

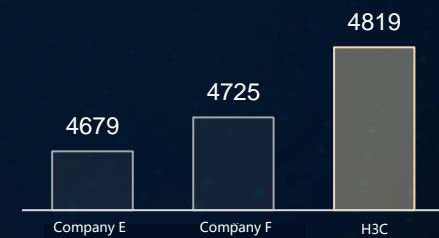
Broke record **3 times** under SPECvirt test



Server Config: Intel Xeon E5-2690, CPU 16 cores, RAM 256GB



Server Config: Intel Xeon E5-2699 v4, CPU 44 cores, RAM 512GB



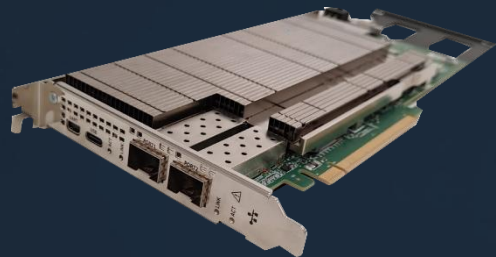
Server Config: Intel(R) Xeon(R) Platinum 8380, CPU 80核, RAM 2TB

UIS8.0: New Generation of UIS, Best Choice of HCI

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Three
Architectural
Innovations

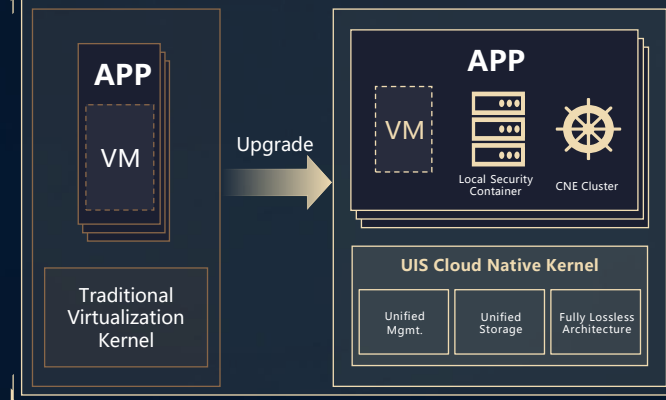
DPU as HCI



Chixiao Accelerator Card

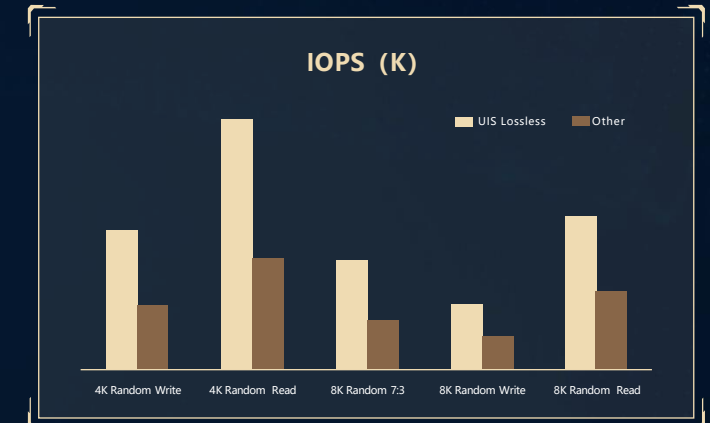
- Disruption: HCI running on card, host CPU freed
- Advantage: hardware and Software fused, high perf.
- Plug&Play: compatible to any UIS-certified servers

Cloud Native Kernel



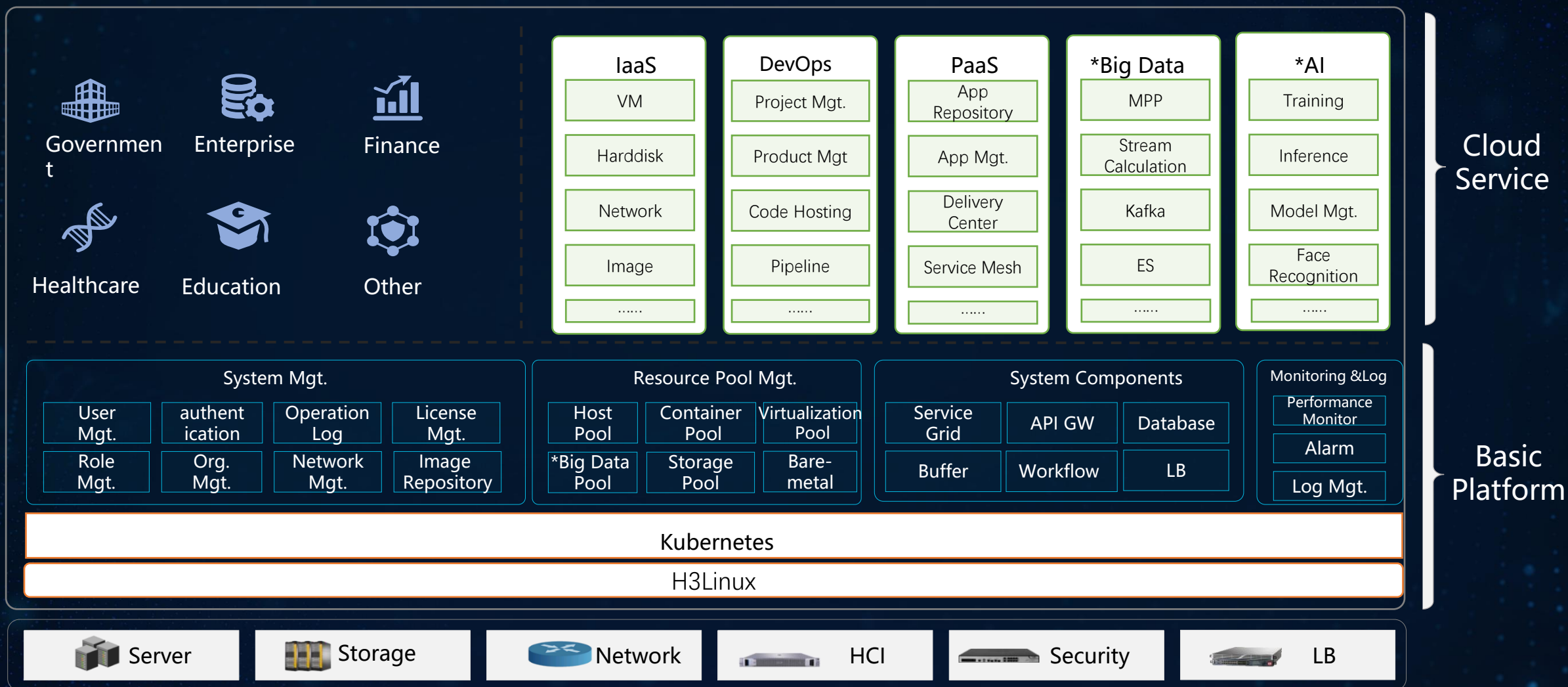
- Unified mgmt.: container ,VM and BareMetal
- Better security: local sandbox containers & isolation
- Full-scenario: multi-runtime supporting

Lossless Storage



- Deploy. mode: based on host or Chixiao accelerator card
- Performance: IOPS 100% up & latency reduction to μ s
- Certification: component of AD-DC soln. certified by Tolly

H3C CloudOS: Full Stack IaaS, PaaS Cloud Platform



*on Roadmap

Data Center Lifecycle Professional Service

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H3C Data Center Lifecycle Professional Services

Planning

Designing

Provisioning

Operation and Maintenance

DC consultation

- Planning project
- Demand analysis of ICT facilities
- Site selection and grade planning
- Data center concept design

DC design

- Craft design
- Energy-saving design
- Facility renovation and expansion design
- LEED certification
- Data center tier certification

DC construction

- General contracting
- Expansion and transformation implementation
- Project management
- Construction cost
- Micro module products

DC verification

- Verification and integration testing
- Building management system (BMS)
- Energy efficiency assessment EEA2.0
- Building information modeling (BIM)

DC O&M

- O&M system construction and training
- Outsourcing services
- O&M process evaluation and consultation
- Data center health check

- **Best practices:** 800+ data center cases worldwide (400+ in China), with trusted partners including 3 Internet giants, 3 state-owned banks and 4 major exchanges in China.

- **Industry standards:** participate in the preparation of many international and domestic standards and white papers.

- **Green data center design:** the most energy efficient data center with PUE<1.1.

- **Safe and reliable:** the first company to pass the Uptime T4 certification in financial industry in China.

Jointly Build a Green and Lossless Data Center with Alibaba



RDMA lossless data center

- Started R&D in 2017, completed in 2018. Has been running stably for 4 years so far.
- Help customers to successfully practice in the fields of big data analysis, artificial intelligence, fraud detection, etc.

Green data center

- Built in 2020, the world's largest immersion-cooled server cluster.
- Obtained the 5A certification from TGG (The Green Grid).
- H3C provides immersion cooling technology design and project management services.

Energy Efficiency Governance of a Financial Data Center



- Scale: around 10,000 square meters
- H3C provides consulting, design and verification services.
- Adopt high-efficiency power distribution structure and equipment, cold source equipment and energy-saving structure.
- Power Supply Effectiveness (PUE) reduced from 2.2 to 1.48.

**H3C will work with customers and partners,
to go digital and go smart.**

- Together, For a Digital Future -