

Role of Government in AI : Korea's AI Policy and Strategy

Taewon Kim, Director
AI Policy Research Team

NIA NATIONAL INFORMATION
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AI



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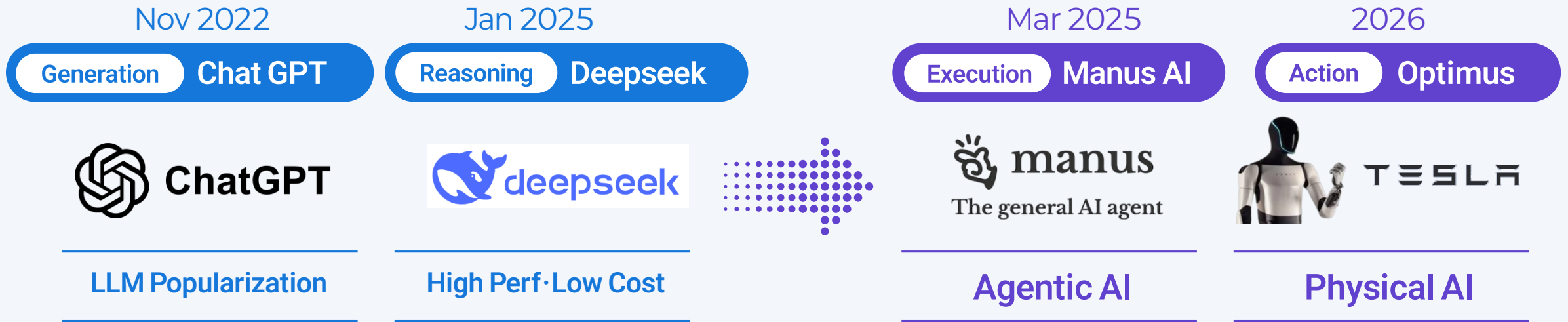
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AI

1 AI : The Opportunity to Transform Society

Beyond Generative AI → Agentic AI (Execution) → Physical AI (Action)

AI as Fundamental Infrastructure for Daily Life, Economy & Society



✓ AI adoption could boost global GDP by **+ 15% by 2035** - a growth impact comparable to the Industrial Revolution (PWC, Apr 2025)

AI as a Key Tool to Address Complex Crises-
Low Growth, Declining Birth Rates, and Aging Society
AI as a Core Driver of Genuine, Technology-Led Economic Growth

Global AI Competitiveness Assessment

Among the world's **top 3** in AI capabilities



Korea's Strengths in AI

Large Scale AI Models

14 large-scale AI models

* 3rd following the China & U.S. (Epoch AI)

AI patents

Generative AI Patents Ranked 3rd (4,155 patents)

* 1st China, 2nd U.S. (2024 WIPO)

DRAM

No. 1 in Memory Semiconductor Competitiveness (SK Hynix (36%, Q1 2025))

Robust Manufacturing



Home Appliances & Smartphones

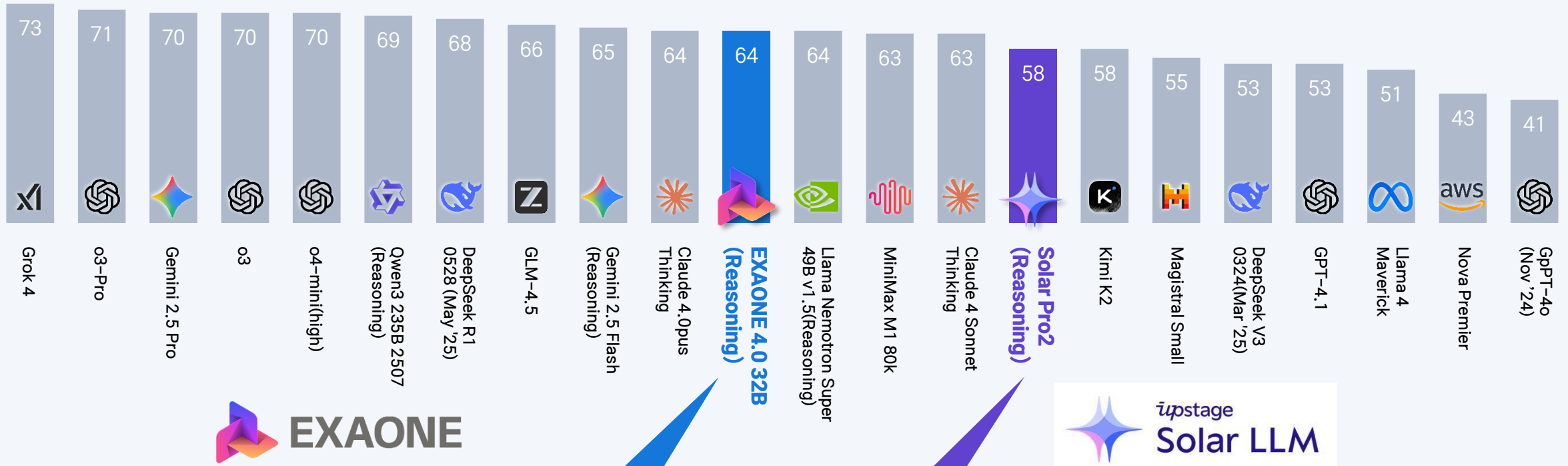
AI Policy & Governance

Government-driven AI strategy and execution

2 AI Status in Korea (2/3)

While the U.S. and China dominate top-tier AI models, Korea's AI models are also gaining competitiveness

Global AI performance benchmarks

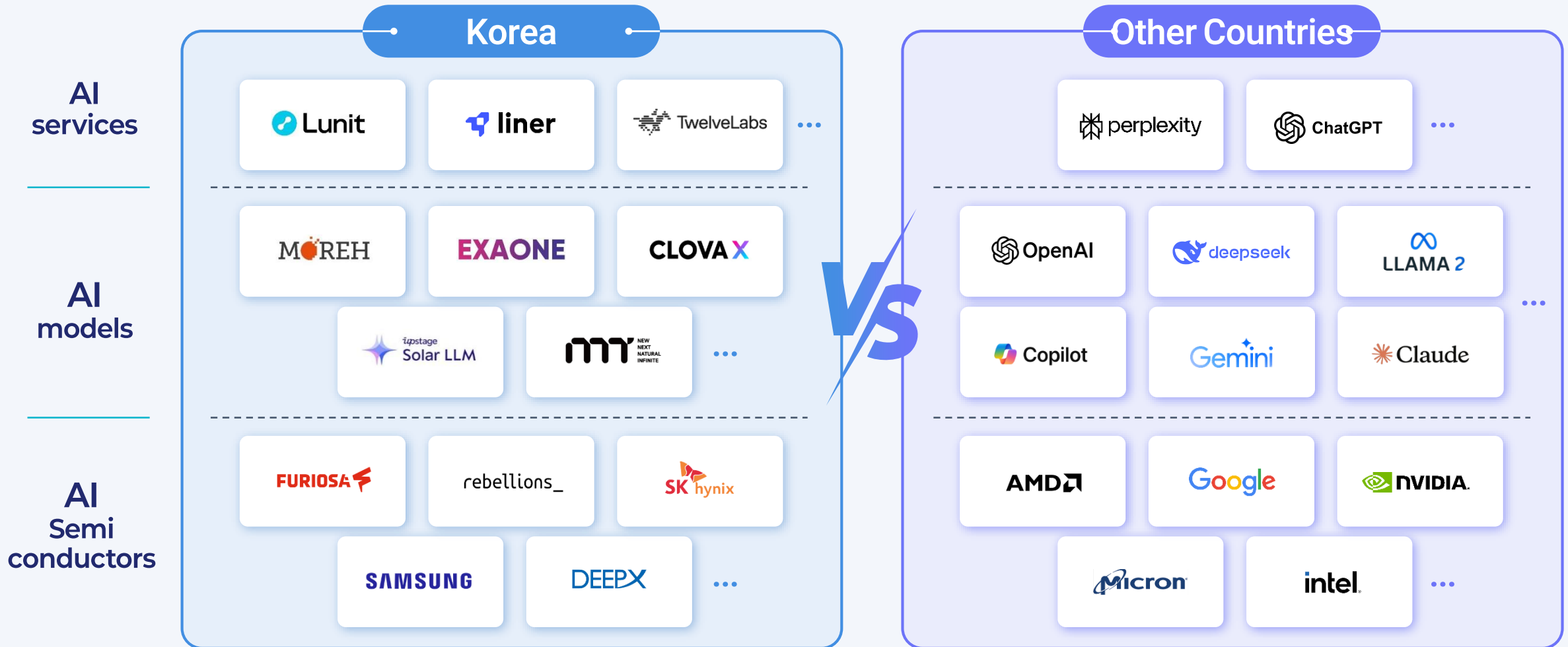


EXAONE 4.0 32B ranked in **11th**

Upstage Solar Pro2 ranked in **14th**

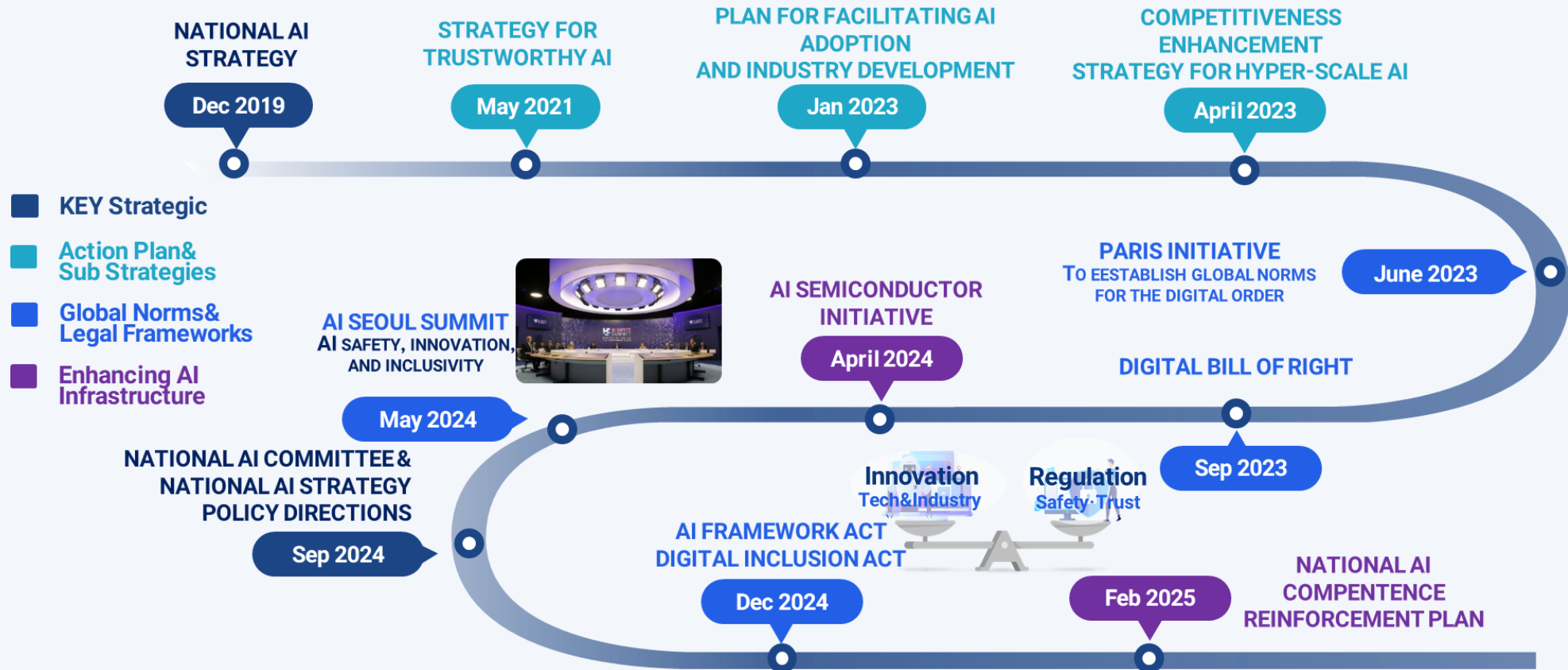
2 AI Status in Korea (3/3)

Possessing independent capabilities across the AI value chain
(semiconductors – models – services)

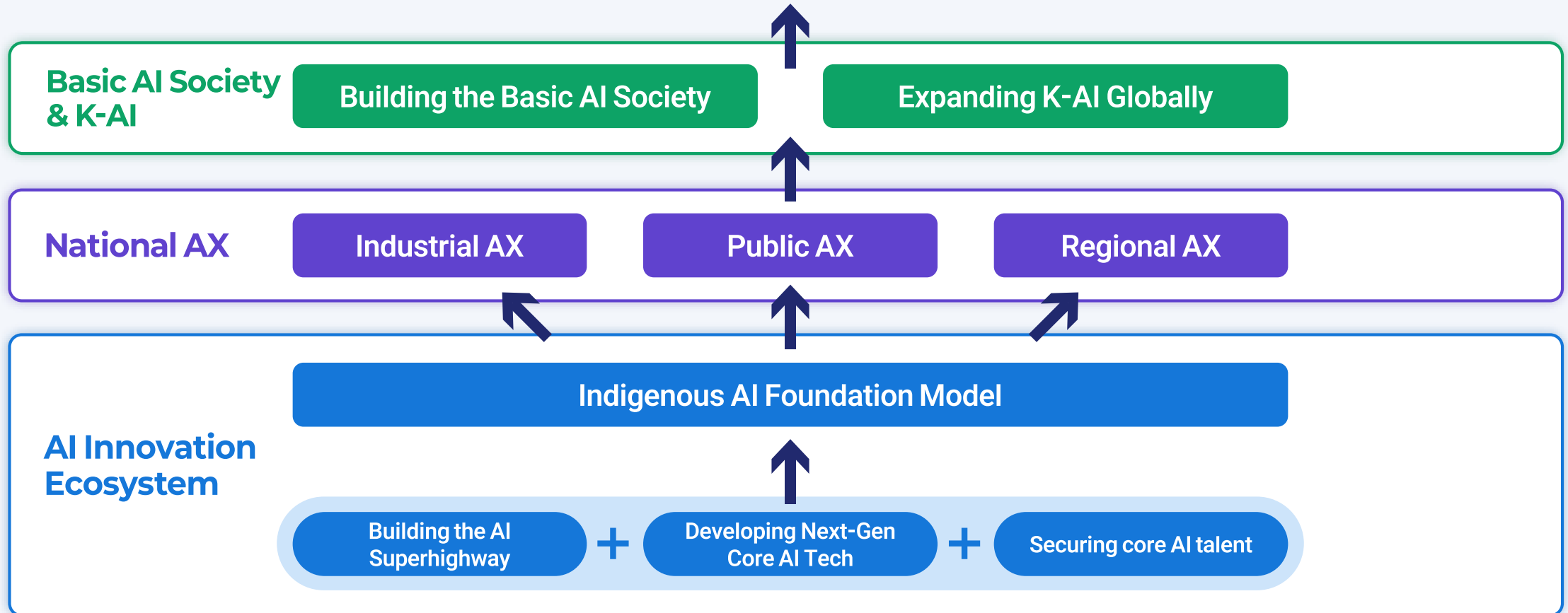


3 Progress of Korea's AI Policy

Progress of Korea's AI Policy



Leap into the global AI top 3



Building a National AI Superhighway where Computing Infrastructure and Data are Organically Connected through Networks

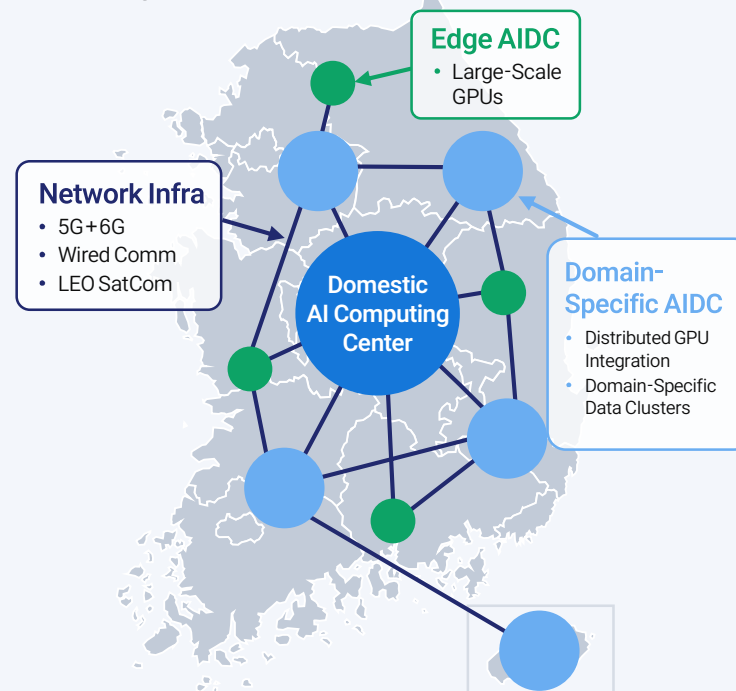
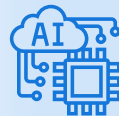
1 Building AI Computing Infrastructure

Building Compute Capacity for Indigenous and Specialized AI Models

Expansion of National AI Computing Infrastructure
(~30 PFLOPS, 58,000+ GPUs)



Activation of Private AIDCs
(AI Data Centers)



2 Expanding Use of Public-Private Data

Building, Opening & Systematizing Data for AI Innovation



National-Level Data Standardization Framework



Domain-Specific Data Spaces



Data Across Secure Networks

3

Building the Ultra-Intelligent Network

Enhancing AI Networks to Enable AI Everywhere



Launching AI-Native 6G Services ('30)



Securing Leadership in High-Performance, Low-Latency "AI Networks"

Securing Next-Generation AI Leading Technologies

To Lead Global AI Capabilities: NEXT AI – AGI, Physical AI, Domestic NPU

AI Core Fundamental Technology Development



AGI R&D



National AI Research Institutes

Promoting large-scale AGI R&D

AI Frontier R&D



Agentic AI



Brain-Inspired AI



Energy-Efficient AI

Physical AI Technology Development



Development of 3 Core Technologies



Foundation Models



World Models



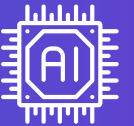
Device Platforms

Development of Leading Physical AI Technologies Specialized in Regional AX Manufacturing

Collaborative Intelligent AI Factory SW Platforms

Ultra-Precision Physical AI Large Action Models (LAM)

Domestic AI Semiconductor Technology Development & Validation



AI Semiconductor R&D

Next-Gen NPUs & Chips (PIM, Neuromorphic, by '29)

Core HW·SW for Cloud AI (by '30)

AI Semiconductor Validation

Public AX NPU Expansion

NPU Testbeds & Model Validation

Securing Core AI Talent to Lead National AI Innovation, While Creating an **Attractive AI Research & Growth Environment**

Attracting Overseas AI Talent



Top Overseas AI Talent Recruitment

Special Visa for AI Experts



Nurturing Frontier Researchers



AI Graduate Schools (10)

Top Young AI Researchers (AI Star Fellowship, 27 programs)



Training Domain-Specific AX Convergence Talent



Transition from SW-Centered Univ. to AI-Centered Univ. (10)

Establishing 10 Industry–Academia Collaborative AX Graduate Schools



Attractive Research & Growth Environment for AI Talent

Abundant Research Infrastructure

Collaborative Peer Environment

Ambitious and Breakthrough National Projects

Large-Scale Public–Private Funding → AI Startup Development



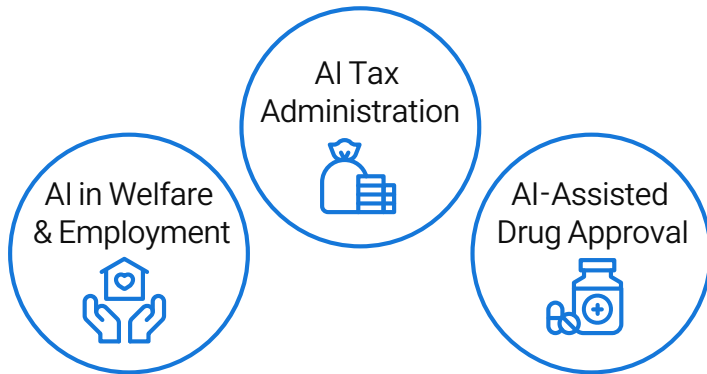
Driving an **Indigenous AI Foundation Model Project** that Combines Public–Private Strengths to Achieve Global Competitiveness and Broad Applicability



Expanding Nationwide AX through Inter-Ministerial Collaboration

Public AX

3 Leading Projects



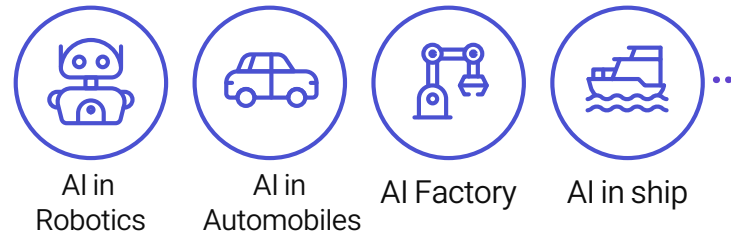
Creating Public Demand

Innovation product pilot procurement

Expanding AI Voucher Supply

Industrial AX

7 Leading Manufacturing Projects

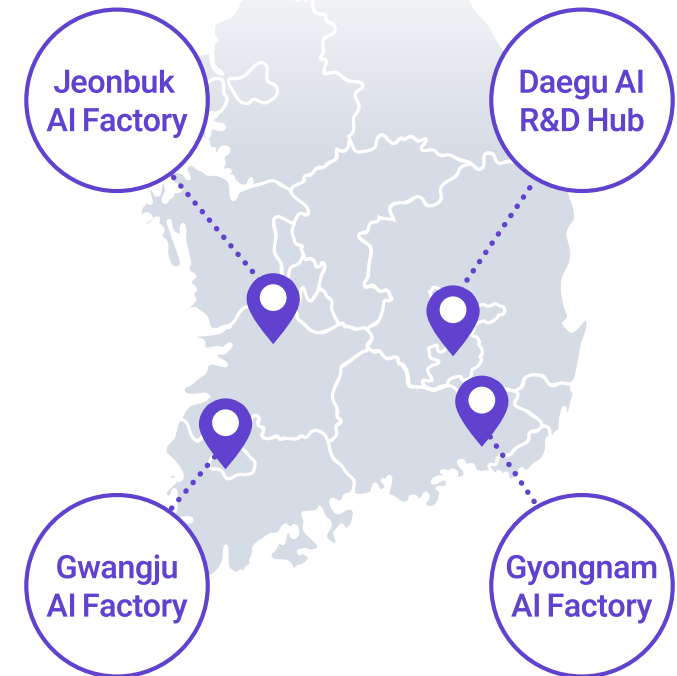


R&D, Pilot Support, Deregulation, Market & Finance Package

AX-Sprint 300

AX for 300 Everyday Products

Regional AX



Making AI Easy and Convenient for Everyone to Use, Protecting People's Lives with AI, and Ensuring Basic Everyday Life

AI for Small Businesses & Daily Life

- Automated Receipt Accounting
- AI Callbot for Small Businesses

Building AI Testbed Korea

- Online**
Providing an Environment for Developing Citizen-Oriented, Social Problem-Solving AI Services (GPUs, Data, Development Tools, etc.)
- Offline**
AI Lounge (tentative)
 - 1 Discussion & Exchange on AI Ideas/Technologies
 - 2 AI Solutions for Real-Life Problems

Project for a Zero-Risk AI Society

A Project to Analyze Risks in Finance, Employment, Food, and Disasters through AI, in Order to Protect Citizens' Lives from Social Problems and Crises

- Finance
- Food
- Disasters

Basic AI Society

Securing Safe, Trustworthy & Secure AI

- AI Safety & Trust R&D
- AI Safety & Trust Guidelines
- AI-Era Security System Reform

Expanding K-AI Globally & Leading AI Norms

K-AI Expansion

- ASEAN & Middle East Partnerships (Non-English-Speaking Regions)
- Joint AI Funds for Local Adoption
- K-AI + Local Culture & Language → Global Diffusion



First Export of Domestic AI to Thailand (Apr. 2025)



MOU with Vietnam's Viettel to Support AX with KT Technology (KRW 130B, May 2025)



MOU with Saudi Data & AI Authority for Developing an Arabic LLM (Sep. 2024)

AI Special Zone (AI Hub of Asia-Pacific)

- APAC Talent & Startups → AI Unicorns & Breakthroughs
- Package Support : Data · Regulatory Sandbox · etc.

1 Regulatory Free Zone

2 Priority Access: GPU & Data

3 Startup & Living Space

4 Tax Incentives & VC Attraction

5 Visa-Free Program

Leading Global AI Norms

Active in AI Summits & Global Forums

Global Mutual Recognition for AI Safety

Leading International AI Standards

National AI Strategy Committee as AI Control Tower

Status

Korea's Highest-Level Strategic Body on AI Policy

Government and private sector as One Team
Driving innovation with combined strengths

National AI vision & strategies
Policy coordination & performance management

Establishment of the Council of Chief AI Officers (CAIO)
under the Committee
Supporting a national AI-driven transformation through policy
execution and cross-ministerial coordination



Thank you

Taewon Kim, Director
AI Policy Research Team
ego@nia.or.kr

