# Japan's AI Policy Framework

Previous Basic Strategies "Principles for a Human-Centered AI Society (2019.3)", "AI Strategy 2022"

## Changes in technologies such as generative AI

Innovation and benefit contributing to Society 5.0

**!** Risks related to AI are more imminent

### **International Discussions**

G7 leaders agreed on the comprehensive policy frameworkincluding international guiding principles. (Hiroshima AI Process)55 countries and regions agree with the policy framework.

## AI Strategic Council [experts], AI Strategy Promotion Taskforce [relevant ministries]

"Tentative Discussion Points on AI" (May 26, 2023, compiled by AI Strategic Council) Integrated Innovation Strategy (June 4, 2024, Cabinet Decision)

### **Mitigating Risks**

Al in Specific domains (critical infrastructure, product safety) Compliance with existing business laws, product safety laws. ex. medical devices (MHLW), automated driving (MLIT)

### **General AI**

Application of existing laws and guidelines.

- Reminder by PPC (Personal Information Protection Commission)
- Clarification of interpretation on Copyright Law (MEXT)
- Study on AI and intellectual property (CAO)
- Amendment of Internet Service Provider Act (Information Platform Law) and comprehensive study to ensure proper information distribution (MIC)
- Guidelines for educational institutions (MEXT)
- Al guidelines for business (MIC, METI)
- Al Safety Institute (relevant ministries)
- R&D against risks (MEXT, MIC, METI, etc.)

### Government

- Agreement on handling generative Al at central ministries and agencies, pilot use in government (Digital Agency, etc.)
  - Guidelines for government procurement and use (under consideration, Digital Agency)
- Promotion of the data linkage and data quality management (Digital Agency, etc.)
- Skills and literacy education for a wide range of generations (MIC, MEXT)
- Consideration on new law (AI Act) (CAO)

## **Optimal use of AI and R&D**

- Securing computational resource and communication infrastructure (METI, MIC)
- Developing training data (MIC, etc.)
- Support for model development (METI)
- Development of energy-saving semiconductors (METI)
- Fundamental research (MEXT)
- Human resource development, attracting environment (MEXT)
- Promotion of startup (METI, MEXT, etc.)
- International collaborative R&D (MIC, METI, MEXT, etc.)

## Outline of the Bill on Promotion of R&D and Use of AI Technology (the Bill of the AI Act)

Necessity of a new law	Japan is lagging behind in AI development and use.		Many citizens are concerned about AI.	
	Along with existing laws and business acts, a new law is needed to promote innovation while mitigating risks.			
Outline of the bill	Purpose	Improving <b>people's lives</b> , and developing <b>the n</b>	ational economy	
	Basic Philosophies	<ul> <li>Importance for economic society and national security → Keeping R&amp;D capabilities, and enhancing international competitiveness</li> <li>Comprehensive and planned promotion from basic research to use</li> <li>Ensuring transparency, etc. for proper R&amp;D and use</li> <li>A leadership role in the international cooperation</li> </ul>		
	AI Strategic Headquarters	Chairman : the Prime Minister, Members : All cabinet ministers — Requesting the necessary cooperation from the relevant administrative agencies		
	AI Basic Plan	Basic policy on measures that the government sl	nould take for the promotion of <mark>R&amp;</mark> D and Use	
	Basic Measures	<ul> <li>Promotion of R&amp;D, and expansion and share of facilities (data center, etc.) and data</li> <li>Ensuring human resources, and promoting education</li> <li>Participating in the development of international norms</li> <li>Establishing guidelines in accordance with the international norms</li> <li>Collecting information, investigating cases where human rights and interests are violated</li> <li>Guidance, advice and announcement to business operators and citizens</li> </ul>		
	Responsibilities	<ul> <li>Responsibilities of the government, the local government, R&amp;D institutions, business operators and citizens, and strengthening affiliation among stakeholders</li> <li>Business operators shall cooperate with measures implemented by the government, etc.</li> </ul>		
	Supplementary Provisions	Reviewing provisions (necessary measures as	required)	

Establishing a legal system<br/>aiming to be a global model• In accordance with international norms, promoting innovation while mitigating risks<br/>• Aiming to be the friendliest country to develop and use AI

# **AI Safety Institute**

Japanese AI Safety Institute was established at IPA (Information-technology Promotion Agency) in cooperation with related ministries and national laboratories.

Current tasks are study on AI safety issue (AI safety evaluation, disinformation, etc.), preparation of standards, consideration on evaluation method, and international AISI collaboration with AISI in other countries, etc.



## Executive Director Akiko Murakami

Executive Officer, Chief Digital Officer, Sompo Japan Insurance, Inc. Former researcher of IBM Japan.

# **Relevant ministries :**

Cabinet Office (Secretariat for Science, Technology and Innovation) Cabinet Cyber Security Center (NISC) Digital Agency Ministry of Foreign Affairs Ministry of Economy, Trade and Industry National Security Bureau National Police Agency Ministry of Internal Affairs and Communications Ministry of Education, Culture, Sports, Science and Technology Ministry of Defense

## **Related organizations :**

National Institute of Information and Communications Technology (NICT) RIKEN National Institute of Informatics National Institute of Advanced Industrial Science and Technology (AIST)

## **Major AI-related Budgets**

#### Draft budget for FY2025 : USD 1.3 billion Supplemental budget for FY2024 : USD 1.1 billion

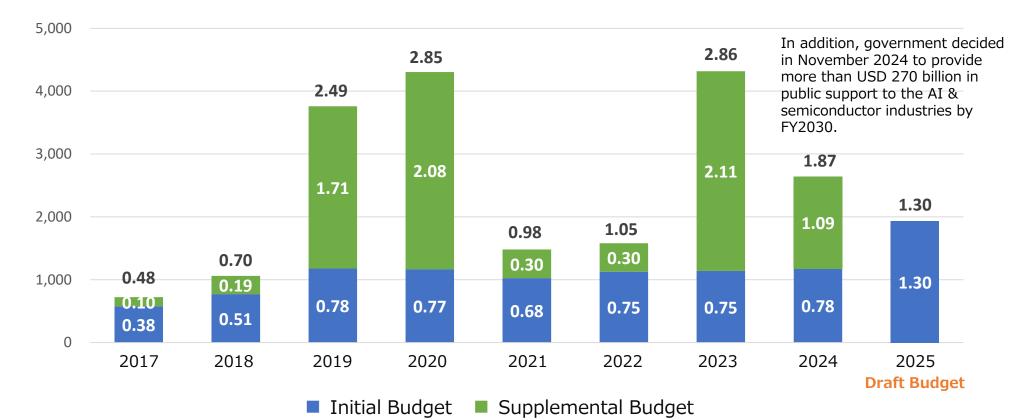
Major AI-related measures have been compiled, with a focus on "Innovation of AI and Innovation by AI", "Ensuring AI Safety & Security" and "International Collaboration & Cooperation".

Ensuring AI Safety & Security	4.0 million dollar [124 million dollar]	International Collaboration & Cooperation 2.0 million dollar[18	3 million dollar]
Ensuring AI Safety		International Collaboration, etc.	
	ication related to ensuring the safety of generative AI.	<ul> <li>Project to strengthen collaboration on data circulation in multilateral frameworks a part of</li> </ul>	of 2.0 million dollar
[New]	[93 million dollar]	<ul> <li>DX promotion for international cooperation</li> </ul>	
Strengthening cybersecurity measures using get		(Digital Public infrastructure program) [New]	[6.2 million dollar]
		(Comprehensive AI for development program) [New]	[5.8 million dollar]
Countermeasures to Dis-/Mis-information			[5.0 million dollar]
Promotion of comprehensive measures against		Support for the Enhancement of International AI Governance [New]	[1.3 million dollar]
Duranting of literative income the for a wide w	0.3 million dollar [15 million dollar]	Support for the Emilancement of International At Governance [New]	
Promotion of literacy improvement for a wide rate	1.0 million dollar	Promotion of AI Utilization	
Voluntary Governance and Institutional		Functional improvements of the RS system for visualization of review sheets, etc [New]	
•			of 2.6 million dollar]
, , , , , , , , , , , , , , , , , , , ,	onding to sophistication of AI [New] 0.3 million dollar		of 0.2 million dollar
Intellectual Property Rights, etc.			of 0.6 million dollar]
AI-based Detection and Analysis Demonstration	Project for Pirate Sites [New] [2.0 million dollar]	• Survey and research on measures to prevent consumer damage using AI [New]	0.1 million dollar
Innovation of AI and Innovation by AI	1.2 billion dollar [0.0 billion dollar]		of 55 million dollar]
Innovation of AI and Innovation by AI	1.2 billion dollar [0.9 billion dollar]		of 6.6 million dollar
Strengthening R&D Capabilities (Include)		Technical verification and environment development for generative AI in government use	
Cross-ministerial Strategic Innovation Promotion		• Research and study on AI and Web 3.0 [New]	0.5 million dollar
between R&D and the Ideal society (society5.0)	and Generating Economic and social value (BRIDGE)	<ul> <li>Formulation of guidelines for government's generative AI procurement &amp; utilization [New]</li> <li>SynthWave [New]</li> </ul>	0.2 million dollar
	0.3 billion dollar	<ul> <li>Solving educational challenges and accelerating education DX through the use of generative</li> </ul>	
	on for strengthening the development capabilities of		[3.9 million dollar]
large-scale language models (LLM) in Japan	[79 million dollar]	English education enhancement project through the use of AI	[4.1 million dollar]
R&D of optimized AI technology through secure		• Establishing of drug discovery target and patient-return-type real-time information platform	
	the High Performance Computing Infrastructure (HPCI)	0.3 million dollar	[3.4 million dollar]
/ Development and introduction of a new flagsh		Development of novel therapeutics for treating cancer and intractable disease using general	
► AIP: Advanced Integrated Intelligence Platform	70 million dollar		[1.5 million dollar]
▶ R&D Hub Aimed at Ensuring Transparency and		Identification of disease-related genes using generative AI and whole-genome analysis of p	
	5.4 million dollar [28 million dollar]	Comprehensive measures to promote the use of smart agricultural technology [New]a part	[0.9 million dollar]
Artificial General Intelligence for Science of Tran		<ul> <li>Project to support the development and demonstration of autonomous driving services for r</li> </ul>	
(TRIP-AGIS)	16 million dollar [13 million dollar]		of 46 million dollar]
Project Promoting Support for Drug Discovery –	- Development of AIPF for drug target prediction and	Project to support demonstration & response for CASE, such as autonomous driving a part	
seed exploration through industry-academia coll		Project to promote the development of advanced technology-based solutions for social chal	
<ul> <li>Smart agriculture technology development and</li> </ul>		of prevention and health promotion [New]	[9.3 million dollar]
Research and Development Project of the Enhar		Smart City Implementation Support Project	1.6 million dollar
Communication Systems (robotics AI Foundation			of 2.0 million dollar
Research and Development Project of the Enhar	on model development) [New] a part of 1.1 billion dollar	Survey and research on the feasibility of AI utilization in human resource management of n	
Research and Development Project of the Enhar		employees [New]	[0.3 million dollar]
	tware infrastructure for the robotics field) [New]	Infrastructure Advancement	
	[68 million dollar]	Promotion of R&D for the realization of Beyond 5G, etc     0.1 billion dollar	r [0.2 billion dollar]
<ul> <li>Digital and robotic system technology infrastruc</li> </ul>		Strategic Basic Research Programs Cutting-edge Research and Development on Information	n & -
<ul> <li>Development, utilization, and sharing of 3D city</li> </ul>		Communication Sciences (CRONOS)	8.6 million dollar
	a part of 15 million dollar [a part of 3.3 million dollar]	<ul> <li>Post-5G information and communication system infrastructure enhancement R&amp;D project (I</li> </ul>	
	UAVs with outstanding decision-making capabilities	computing resources) [New] a part	of 1.1 billion dollar
powered by AI	66 million dollar	Project to support technology development for energy-efficient AI semiconductors & system     Support for inportion almost at the early commercialization of products using inportion	
Development and Securing of Human Re		<ul> <li>Support for innovation aimed at the early commercialization of products using innovative management</li> </ul>	of 25 million dollar
Nationwide Promotion of Mathematics, Data Scie			
	nd AI education in private universities 4.7 million dollar	(Note 1) This document mainly describes initiatives targeting generative AI. [ ] indicates the supplementary budget for FY 2024. The total budget and the aggregate amounts of major items listed above include the entire AI-related budget, not limited (Note 2) Measures which is difficult to extract the AI-related budget amount, such as part of the project costs, are not included in	to concrativo AT
· Project for Designing Graduate Programs Empha	asizing Digital Literacy across Diverse Fields ; X Program 3.0 million dollar	(Note 2) Measures which is difficult to extract the AI-related budget amount, such as part of the project costs, are not included in	the total budget.
Regional digital human resources development a		(Note 3) In addition to the above, 0.12 billion dollar [0.09 billion dollar] is budgeted for infrastructure maintenance & other measu (Note 4) ▶ symbol above indicates initiatives related to ensuring AI safety.	res to support AI R&D.
		(note if a symbol above maladed initiatives related to chouning At safety.	

# **Trends in AI-related Budgets**

- Draft budget for FY2025 is around USD 1.3 billion.
- Budget for FY2024 is around USD 0.8 billion.

## Trends in AI-related Government Budgets (USD billion)



(100 million yen)