

Crosswalk between ISO/IEC 42001:2023 and Singapore's AI Verify Testing Framework

AI Verify testing framework aims to help companies be more transparent about their AI systems, building trust through standardised tests and strengthening organisational processes.

“ISO/IEC 42001:2023 is a first of its kind international standards designed to ensure broad responsible adoption of AI. The novel approach, in conjunction with the family of standards that ISO/IEC JTC 1/SC 42 is developing, provides a portfolio of international standards that countries and regions can rely on to enable trustworthy and transparent AI.

This mapping between AI Verify Framework and ISO/IEC 42001 demonstrates Singapore's strong support in advancing global harmonisation in a practical way. It also shows the growing number of countries that are leveraging ISO/IEC 42001 to enable trustworthy AI adoption.”

– Wael William Diab, Chair, ISO/IEC JTC1 / SC42 on AI standards

Both frameworks share a common goal in enabling organisations to strengthen their AI governance implementation. This crosswalk shows how the controls in ISO/IEC 42001:2023 are mapped to the process checks in AI Verify testing framework. Organisations can use AI Verify toolkit to strengthen their AI governance and practically demonstrate alignment with ISO/IEC 42001:2023, without onerous cost.

ISO/IEC 42001:2023	AI Verify Testing Framework
A.2 Policies related to AI A.2.2 AI Policy A.2.3 Alignment with other organizational policies A.2.4 Review of the AI Policy	Accountability 9.1.1
A.3 Internal organization A.3.2 AI roles and responsibilities A.3.3 Reporting of concerns	Transparency 1.6.1 Accountability 9.5.4, 9.7.1 Human Agency & Oversight 10.3.1
A.4 Resources for AI systems A.4.2 Resource documentation A.4.3 Data resources A.4.4 Tooling resources A.4.5 System and computing resources A.4.6 Human resources	Reproducibility 3.2.1 Data Governance 8.2.1 Accountability 9.4.1, 9.12.1
A.5 Assessing impacts of AI systems A.5.2 AI system impact assessment process A.5.3 Documentation of AI system impact assessments	Safety 4.1.1, 4.2.1, 4.3.1, 4.3.2, 4.4.1, 4.8.1, 4.9.1 Robustness 6.5.1, 6.6.2, 6.6.3 Fairness 7.3.1

A.5.4 Assessing AI system impact on individuals and groups of individuals A.5.5 Assessing societal impacts of AI systems	Inclusive Growth, Societal and Environmental Well-being 11.2.1
A.6 AI system life cycle A.6.1 Management guidance for AI system development A.6.1.2 Objectives for responsible development of AI system A.6.1.3 Processes for trustworthy AI system design and development	Safety 4.3.1, 4.3.2, 4.4.1, 4.8.1, 4.9.1, 4.9.2 Accountability 9.1.1, 9.2.1, 9.3.1 Human Agency & Oversight 10.4.1
A.6 AI system life cycle A.6.2.2 AI system requirements and specification A.6.2.3 Documentation of AI system design and development A.6.2.4 AI system verification and validation A.6.2.5 AI system deployment A.6.2.6 AI system operation and monitoring A.6.2.7 AI system technical documentation A.6.2.8 AI system recording of event logs	Transparency 1.7.2 Reproducibility 3.1., 3.4.1 Safety 4.1.1, 4.3.1, 4.3.2, 4.4.1, 4.5.1, 4.5.2, 4.6.1, 4.7.1, 4.10.1, 4.10.2 Security 5.2.1, 5.10.1, 5.11.1 Robustness 6.5.1, 6.7.1, 6.7.2 Fairness 7.3.1 Accountability 9.5.1 Human agency & Oversight 10.2.1, 10.4.1
A.7 Data for AI systems A.7.2 Data for development and enhancement of AI system A.7.3 Acquisition of data A.7.4 Quality of data for AI systems A.7.5 Data provenance A.7.6 Data preparation	Safety 4.9.1 Data Governance 8.1.1, 8.2.1, 8.3.1, 8.5.1
A.8 Information for interested parties of AI systems A.8.2 System documentation and information for users A.8.3 External reporting A.8.4 Communication of incidents A.8.5 Information for interested parties	Transparency 1.1.1, 1.1.2, 1.1.3, 1.1.4, 1.1.6, 1.2.1, 1.3.1, 1.4.1, 1.5.1, 1.6.1, 1.7.1, 1.7.2 Safety 4.1.1 Security 5.8.1 Data Governance 8.3.1 Accountability 9.2.1, 9.5.4 Human agency & Oversight 10.2.1
A.9 Use of AI systems A.9.2 Processes for responsible use of AI systems	Accountability 9.1.1, 9.2.1, 9.3.1, 9.4.1

A.9.3 Objectives for responsible use of AI systems A.9.4 Intended use of the AI system	
A.10 Third-party and customer relationships A.10.2 Allocating responsibilities A.10.3 Suppliers A.10.4 Customers	Accountability 9.1.1, 9.3.1, 9.7.1