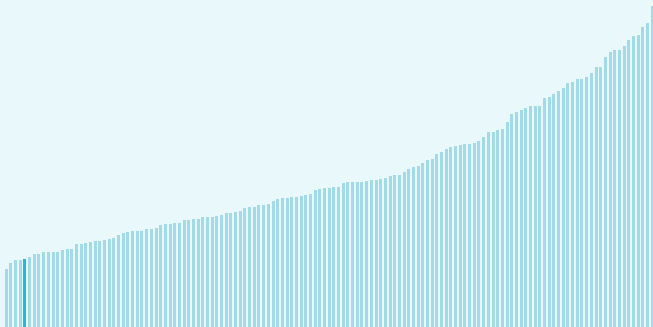




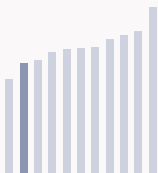
## Mali ranking in the Global Innovation Index 2025

Mali ranks **135th** among the 139 economies featured in the GII 2025.

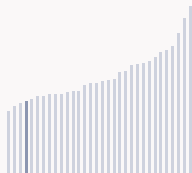
The Global Innovation Index (GII) ranks world economies according to their innovation capabilities. Consisting of roughly 80 indicators, grouped into innovation inputs and outputs, the GII aims to capture the multi-dimensional facets of innovation.



Mali ranks 10th among the 11 Low-income group economies.



Mali ranks 29th among the 32 economies in Sub-Saharan Africa.



### > Mali GII Ranking (2020-2025)

The table shows the rankings of Mali over the past six years. Data availability and changes to the GII model framework influence year-on-year comparisons of the GII rankings. The statistical confidence interval for the ranking of Mali in the GII 2025 is between ranks 130 and 138.

Year	GII Position	Innovation Inputs	Innovation Outputs
2020	123rd	126th	116th
2021	124th	126th	114th
2022	126th	128th	121st
2023	129th	129th	126th
2024	131st	126th	132nd
2025	135th	128th	138th

Mali performs worse in innovation outputs than innovation inputs in 2025.

This year Mali ranks 128th in innovation inputs. This position is lower than last year.

Mali ranks 138th in innovation outputs. This position is lower than last year.

Mali has no clusters in the world's top innovation clusters of the Global Innovation Index.

# Global Innovation Index 2025



## > Global Innovation Tracker

The Global Innovation Tracker 2025 shows what is the current state of innovation in Mali, how rapidly is technology being embraced and what are the resulting societal impacts.



For Mali, 6 indicators have improved in the short-term and 2 indicators have worsened.

### Science and innovation investment

	Scientific publications	R&D investments	Venture capital deal numbers	International patent filings
Short term	▲ 2.5 % 2023 - 2024	▲ 5.9 % 2019 - 2021	▼ -66.7 % 2022 - 2023	n/a
Long term (annual growth)	▲ 6.3 % 2014 - 2024	▼ -7.2 % 2010 - 2021	n/a	n/a

### Technology adoption

	Safe sanitation	Connectivity		Robots	Electric vehicles
		Fixed broadband	5G		
Short term	▲ 2.4% 2023 - 2024	▲ 23.1% 2021 - 2022	n/a	n/a	n/a
Long term (annual growth)	▲ 2.8% 2014 - 2024	▲ 45.1% 2012 - 2022	n/a	n/a	n/a
Penetration	20 per 100 inhabitants in 2024	0.8 per 100 inhabitants in 2022	n/a	n/a	n/a

### Socioeconomic impact

	Labor productivity	Life expectancy	Temperature change
Short term	▲ 0.3 % 2023 - 2024	▲ 0.7 % 2022 - 2023	+ 1.7 °C 2024
Long term (annual growth)	▲ 0.9 % 2014 - 2024	▲ 0.6 % 2013 - 2023	+ 0.9 °C 2014
Level	7,673.9 USD in 2024	60.4 years in 2023	n/a

Notes: Not all indicators of the Global Innovation Tracker are used to calculate the Global Innovation Index. Long-term annual growth refers to the compound annual growth rate (CAGR) over the indicated period. For each variable, a one-year growth rate is set for the short run, and ten-year CAGR is set for the long run; time windows might differ when gaps exist in data availability. The end period corresponds to the most recent available observation, which may differ among countries. Temperature change is an exception: it indicates the change in degrees Celsius with respect to the average temperature in the countries. from 1951–1980. Figures are rounded.

# Global Innovation Index 2025



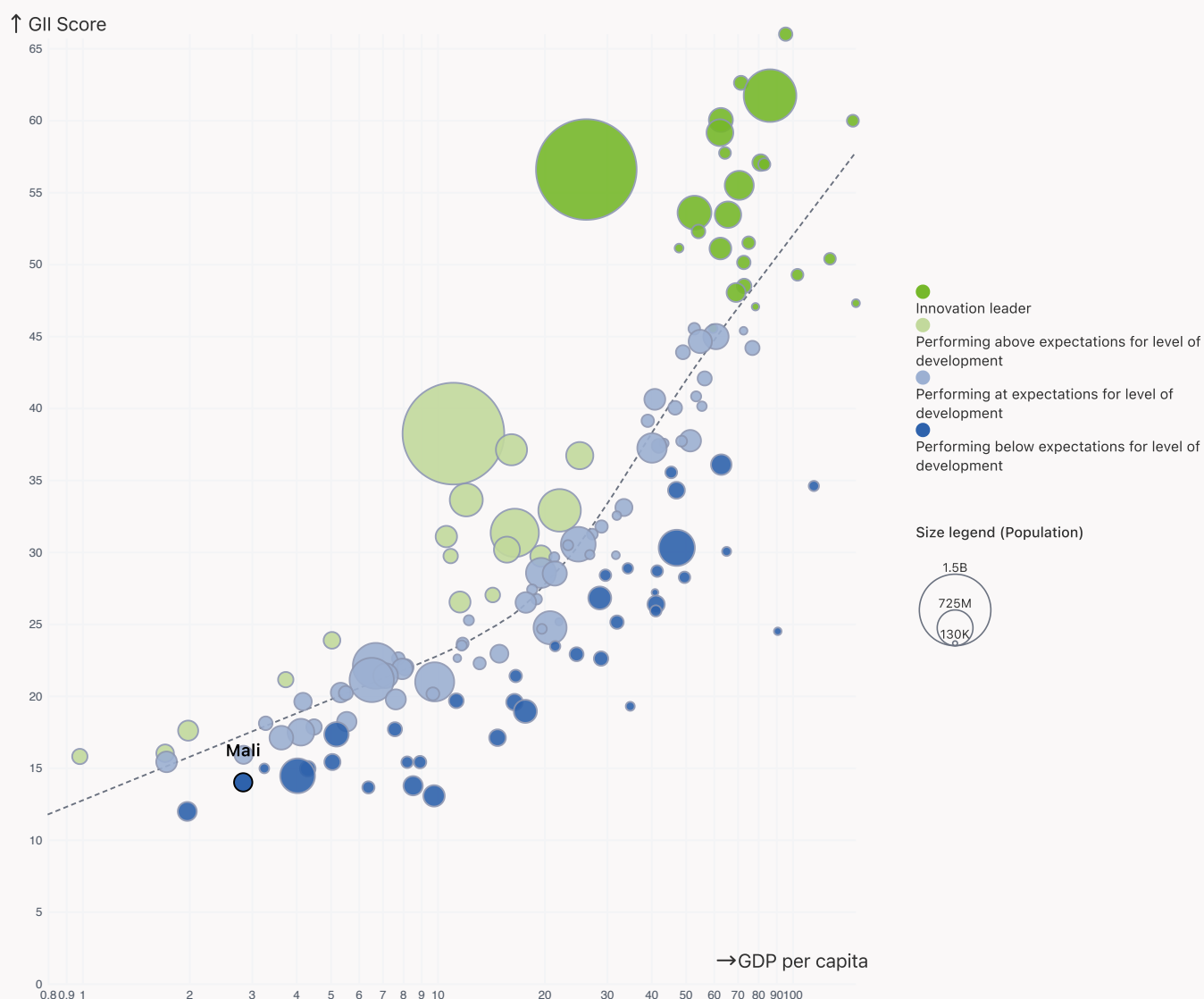
## Expected vs. Observed Innovation Performance

The bubble chart below shows the relationship between income levels (GDP per capita) and innovation performance (GII score). The trend line gives an indication of the expected innovation performance according to income level. Economies appearing above the trend line are performing better than expected and those below are performing below expectations.



Relative to GDP Mali performs below expectations for its level of development.

### > Innovation overperformers relative to their economic development



# Global Innovation Index 2025



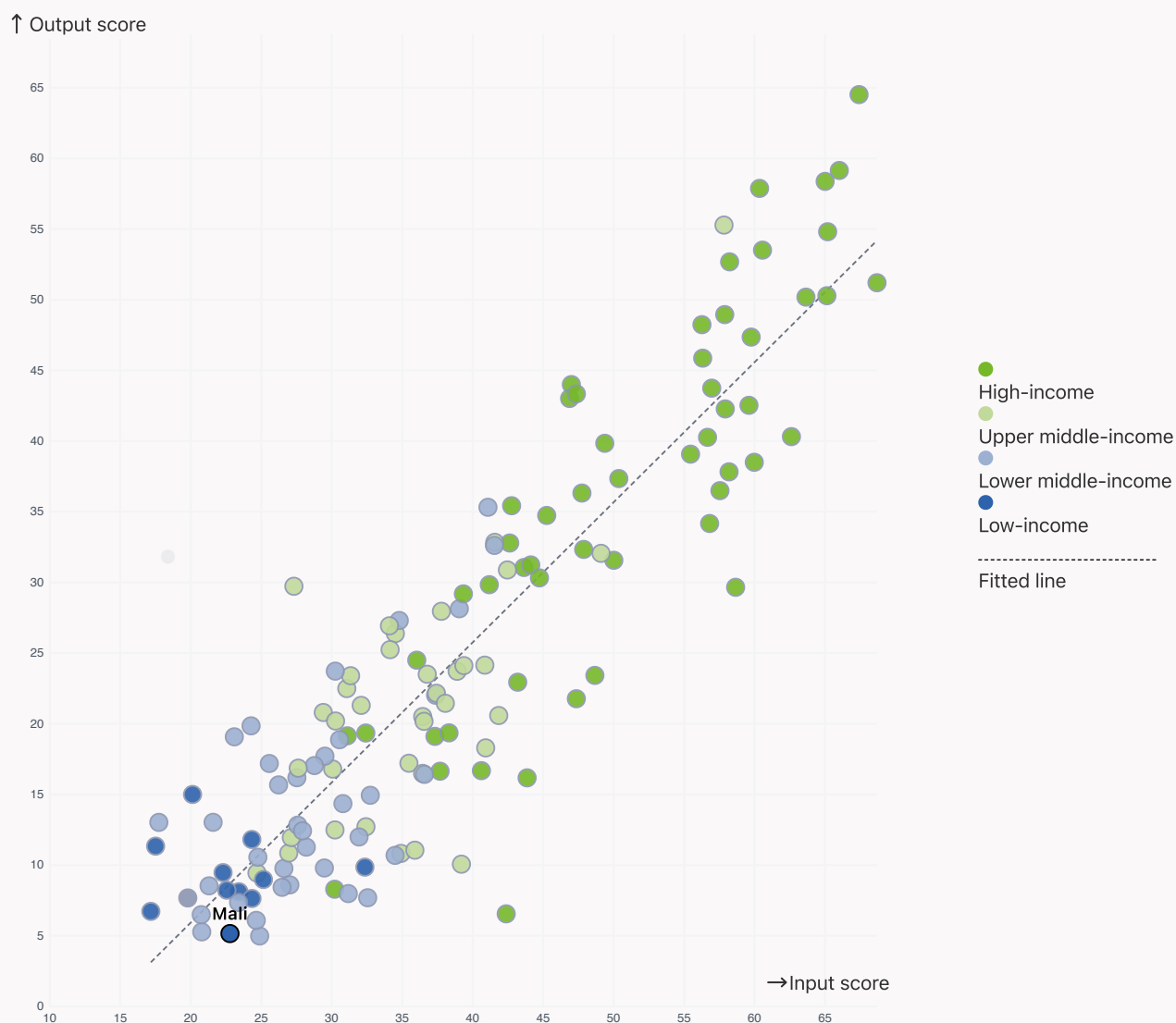
## Effectively translating innovation investments into innovation outputs

The chart below shows the relationship between innovation inputs and innovation outputs. Economies above the line are effectively translating costly innovation investments into more and higher-quality outputs.



Mali produces less innovation outputs relative to its level of innovation investments.

### > Relationship between innovation inputs and outputs

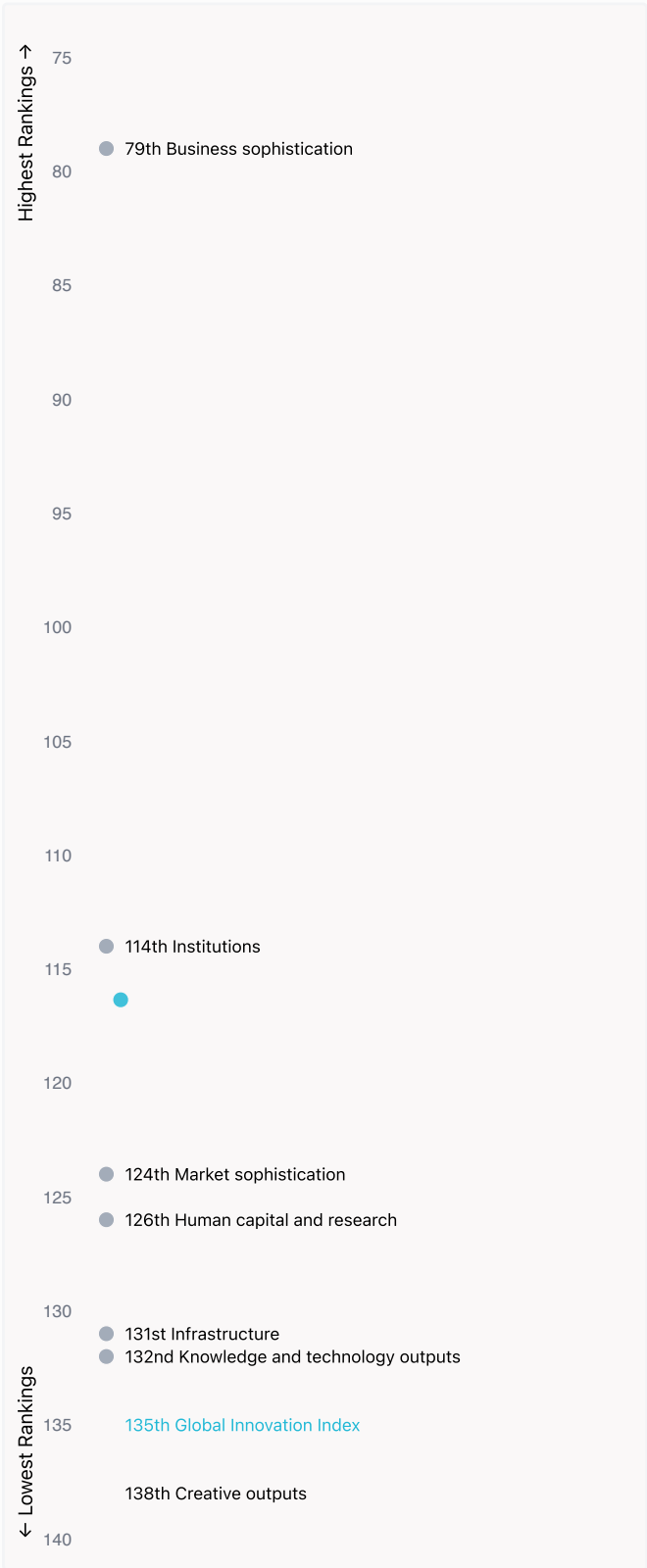


# Global Innovation Index 2025



## Overview of Mali's rankings in the seven areas of the GII in 2025

The chart shows the ranking for each of the seven areas that the GII comprises. The strongest areas for Mali are those that rank above the GII (shown in blue) and the weakest are those that rank below.



### Highest Rankings

Mali ranks highest in Business sophistication (79th), Institutions (114th), Market sophistication (124th) and Human capital and research (126th).



### Lowest Rankings

Mali ranks lowest in Creative outputs (138th), Knowledge and technology outputs (132nd) and Infrastructure (131st).



The full WIPO Intellectual Property Statistics profile for Mali can be found on <https://www.wipo.int/edocs/statistics-country-profile/en/ml.pdf>

# Global Innovation Index 2025



## Benchmark of Mali against other economy groupings for each of the seven areas of the GII Index

The charts shows the relative position of Mali (blue bar) against other economy groupings (grey bars)



### Low-income economies

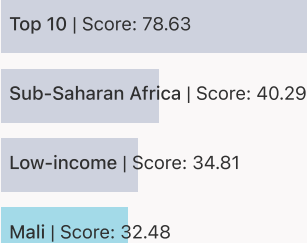
Mali performs above the Low-income group average in Business sophistication.



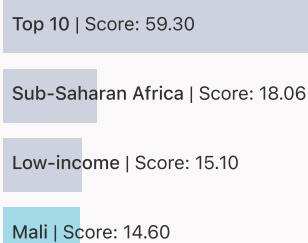
### Sub-Saharan Africa

Mali performs above the regional average in Business sophistication.

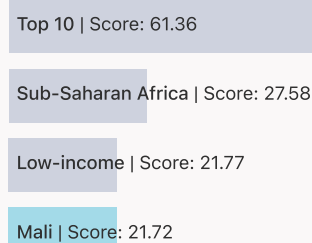
#### Institutions



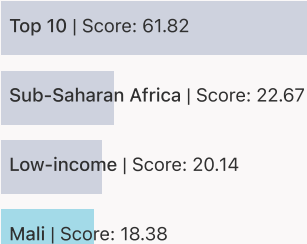
#### Human capital and research



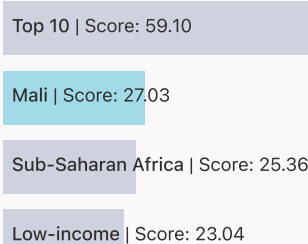
#### Infrastructure



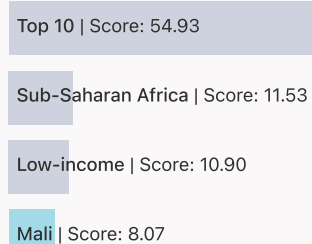
#### Market sophistication



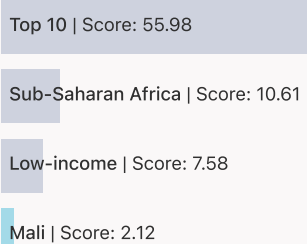
#### Business sophistication



#### Knowledge and technology outputs



#### Creative outputs



# Global Innovation Index 2025



## Innovation strengths and weaknesses in Mali

The table below gives an overview of the indicator strengths and weaknesses of Mali in the GII 2025.



Mali's best-ranked innovation strengths are **Youth demographic dividend, %** (rank 2), **Government funding/pupil, secondary, % GDP/cap** (rank 14) and **Loans from microfinance institutions, % GDP** (rank 22).

### Strengths

Rank	Code	Indicator name
2	5.1.3	Youth demographic dividend, %
14	2.1.2	Government funding/pupil, secondary, % GDP/cap
22	4.1.3	Loans from microfinance institutions, % GDP
42	5.3.3	ICT services imports, % total trade
48	5.3.4	FDI net inflows, % GDP
49	6.3.4	ICT services exports, % total trade
61	1.3.1	Policy stability for doing business <sup>†</sup>
66	5.2.4	State of cluster development <sup>†</sup>
68	2.1.1	Expenditure on education, % GDP
72	3.3.2	Low-carbon energy use, %

### Weaknesses

Rank	Code	Indicator name
135	7.3.2	GitHub commits/mn pop. 15–69
131	2.2.1	Tertiary enrolment, % gross
131	5.3.1	Intellectual property payments, % total trade
119	5.1.1	Knowledge-intensive employment, %
81	7.1.3	Global brand value, top 5,000, % GDP
80	2.3.4	QS university ranking, top 3*
75	6.1.3	Utility models by origin/bn PPP\$ GDP
53	6.2.2	Unicorn valuation, % GDP
44	2.3.3	Global corporate R&D investors, top 3, mn USD

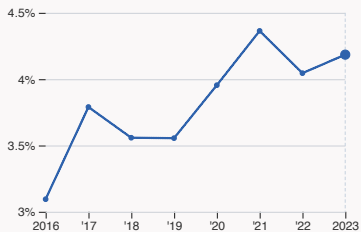
# Global Innovation Index 2025



## Mali's innovation system

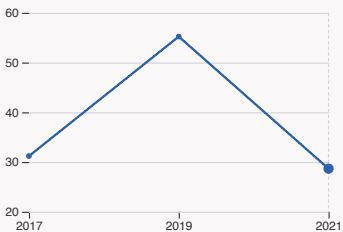
As far as practicable, the plots below present unscaled indicator data.

### > Innovation inputs in Mali



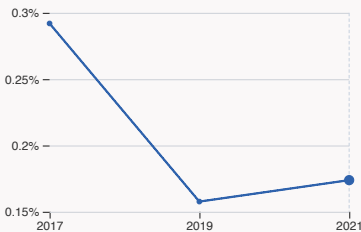
#### 2.1.1 Expenditure on education

was equal to 4.18 % GDP in 2023, up by 0.14 percentage points from the year prior – and equivalent to an indicator rank of 68.



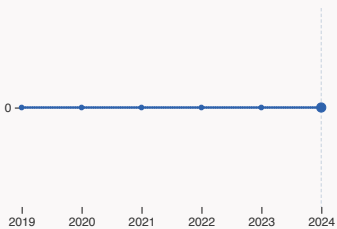
#### 2.3.1 Researchers

was equal to 28.67 FTE per million population in 2021, down by 48.09% from the year prior – and equivalent to an indicator rank of 101.



#### 2.3.2 Gross expenditure on R&D

was equal to 0.17 % GDP in 2021, up by 0.02 percentage points from the year prior – and equivalent to an indicator rank of 91.



#### 2.3.4 QS university ranking

The country does not have any universities in the QS world universities ranking in 2024.



#### 4.3.2 Domestic industry diversification

was equal to an index score of 0.46 in 2019, down by 5.58% from the year prior – and equivalent to an indicator rank of 110.



#### 5.1.1 Knowledge-intensive employment

was equal to 3.88 % in 2022, up by 0.32 percentage points from the year prior – and equivalent to an indicator rank of 119.



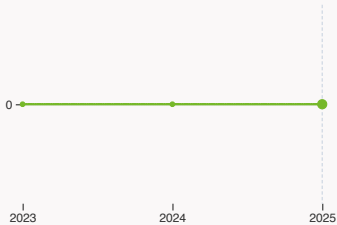
# Global Innovation Index 2025



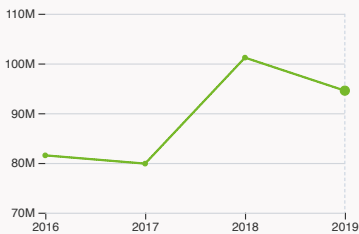
## > Innovation outputs in Mali



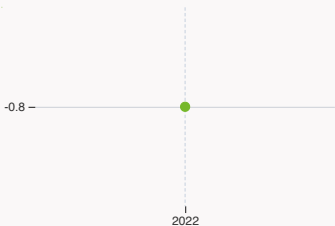
**6.1.1 Patents by origin**  
was equal to 9 patents in 2023, up by 200% from the year prior – and equivalent to an indicator rank of 106.



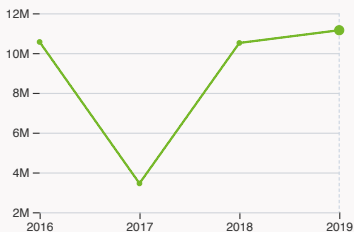
**6.2.2 Unicorn valuation**  
The country does not have unicorns in 2025.



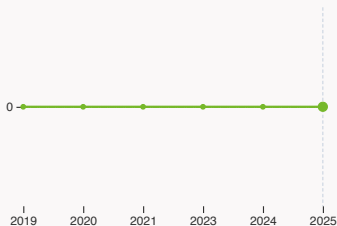
**6.2.4 High-tech manufacturing**  
was equal to 94,54 high-tech manufacturing output in million USD in 2019, down by 6.56% from the year prior – and equivalent to an indicator rank of 98.



**6.3.2 Production and export complexity**  
was equal to a score of -0.8 in 2022 – and equivalent to an indicator rank of 107.



**6.3.3 High-tech exports**  
was equal to 11.15 million USD in 2019, up by 6.09% from the year prior – and equivalent to an indicator rank of 113.



**7.1.3 Global brand value, top 5,000**  
The country does not have any brands that make the top 5,000 ranking in 2025.

Output rank	Input rank	Income	Region	Population (mn)	GDP, PPP\$ (bn)	GDP per capita, PPP\$
138	128	Low	Sub-Saharan Africa	24.5	68.5	2,843.3
Score / Value Rank				Score / Value Rank		
Institutions				Business sophistication		
1.1 Institutional environment				5.1 Knowledge workers		
1.1.1 Operational stability for businesses*				5.1.1 Knowledge-intensive employment, %		
1.1.2 Government effectiveness*				5.1.2 Females employed w/advanced degrees, %		
1.2 Regulatory environment				5.1.3 Youth demographic dividend, %		
1.2.1 Regulatory quality*				5.1.4 GERD performed by business, % GDP		
1.2.2 Rule of law*				5.1.5 GERD financed by business, %		
1.3 Business environment				5.2 Innovation linkages		
1.3.1 Policy stability for doing business†				5.2.1 Public research–industry co-publications, %		
1.3.2 Entrepreneurship policies and culture†				5.2.2 University–industry R&D collaboration†		
Human capital and research				5.2.3 University industry & international engagement, top 5*		
2.1 Education				5.2.4 State of cluster development†		
2.1.1 Expenditure on education, % GDP				5.2.5 Patent families/bn PPP\$ GDP		
2.1.2 Government funding/pupil, secondary, % GDP/cap				5.3 Knowledge absorption		
2.1.3 School life expectancy, years				5.3.1 Intellectual property payments, % total trade		
2.1.4 PISA scales in reading, maths and science				5.3.2 High-tech imports, % total trade		
2.1.5 Pupil–teacher ratio, secondary				5.3.3 ICT services imports, % total trade		
2.2 Tertiary education				5.3.4 FDI net inflows, % GDP		
2.2.1 Tertiary enrolment, % gross				5.3.5 Research talent, % in businesses		
2.2.2 Graduates in science and engineering, %				Knowledge and technology outputs		
2.2.3 Tertiary inbound mobility, %				6.1 Knowledge creation		
2.3 Research and development (R&D)				6.1.1 Patents by origin/bn PPP\$ GDP		
2.3.1 Researchers, FTE/mn pop.				6.1.2 PCT patents by inventor origin/bn PPP\$ GDP		
2.3.2 Gross expenditure on R&D, % GDP				6.1.3 Utility models by origin/bn PPP\$ GDP		
2.3.3 Global corporate R&D investors, top 3, mn USD				6.1.4 Scientific and technical articles/bn PPP\$ GDP		
2.3.4 QS university ranking, top 3*				6.1.5 Citable documents H-index		
Infrastructure				6.2 Knowledge impact		
3.1 Information and communication technologies (ICTs)				6.2.1 Labor productivity growth, %		
3.1.1 ICT access*				6.2.2 Unicorn valuation, % GDP		
3.1.2 ICT use*				6.2.3 Software spending, % GDP		
3.1.3 Government's online service*				6.2.4 High-tech manufacturing		
3.2 General infrastructure				6.3 Knowledge diffusion		
3.2.1 Electricity output, GWh/mn pop.				6.3.1 Intellectual property receipts, % total trade		
3.2.2 Logistics performance*				6.3.2 Production and export complexity		
3.2.3 Gross capital formation, % GDP				6.3.3 High-tech exports, % total trade		
3.3 Ecological sustainability				6.3.4 ICT services exports, % total trade		
3.3.1 GDP/unit of energy use				6.3.5 ISO 9001 quality/bn PPP\$ GDP		
3.3.2 Low-carbon energy use, %				Creative outputs		
3.3.3 ISO 14001 environment/bn PPP\$ GDP				7.1 Intangible assets		
Market sophistication				7.1.1 Intangible asset intensity, top 15, %		
4.1 Credit				7.1.2 Trademarks by origin/bn PPP\$ GDP		
4.1.1 Finance for startups and scaleups†				7.1.3 Global brand value, top 5,000, % GDP		
4.1.2 Domestic credit to private sector, % GDP				7.1.4 Industrial designs by origin/bn PPP\$ GDP		
4.1.3 Loans from microfinance institutions, % GDP				7.2 Creative goods and services		
4.2 Investment				7.2.1 Cultural and creative services exports, % total trade		
4.2.1 Market capitalization, % GDP				7.2.2 National feature films/mn pop. 15–69		
4.2.2 Venture capital (VC) received, deal count/bn PPP\$ GDP				7.2.3 Entertainment and media market/th pop. 15–69		
4.2.3 Late-stage VC deal count, % global VC				7.2.4 Creative goods exports, % total trade		
4.2.4 VC investors, deal count/bn PPP\$ GDP				7.3 Online creativity		
4.2.5 VC investor co-participation/bn PPP\$ GDP				7.3.1 Top-level domains (TLDs)/th pop. 15–69		
4.3 Trade, diversification and market scale				7.3.2 GitHub commits/mn pop. 15–69		
4.3.1 Applied tariff rate, weighted avg., %				7.3.3 Mobile app creation/bn PPP\$ GDP		
4.3.2 Domestic industry diversification						
4.3.3 Domestic market scale, bn PPP\$						

NOTES: ● indicates a strength ○ a weakness ♦ an income group strength ◇ an income group weakness \* an index † a survey question ● that the economy's data is outdated. Square brackets [ ] indicate the data minimum coverage (DMC) requirements were not met at the sub-pillar or pillar level, n/a represents missing values, a dash - indicates an indicator which is not relevant to this economy and thus not considered for DMC thresholds.

# Global Innovation Index 2025



## Data Availability

The following tables list indicators that are either missing or outdated for Mali.



Mali has missing data for eighteen indicators and outdated data for twenty three indicators.

## Missing data for Mali

Code	Indicator name	Economy year	Model year	Source
1.3.2	Entrepreneurship policies and culture <sup>+</sup>	n/a	2024	Global Entrepreneurship Monitor
2.1.4	PISA scales in reading, maths and science	n/a	2022	OECD, PISA
2.2.2	Graduates in science and engineering, %	n/a	2022	UNESCO Institute for Statistics; Eurostat; OECD
3.1.2	ICT use*	n/a	2023	World Intellectual Property Organization; based on International Telecommunication Union (ITU)
3.2.1	Electricity output, GWh/mn pop.	n/a	2023	International Energy Agency
3.3.1	GDP/unit of energy use	n/a	2022	International Energy Agency
4.1.1	Finance for startups and scaleups <sup>+</sup>	n/a	2024	Global Entrepreneurship Monitor
4.2.1	Market capitalization, % GDP	n/a	2022	World Federation of Exchanges; World Bank
4.2.3	Late-stage VC deal count, % global VC	n/a	2024	PitchBook Data, Inc.
4.2.4	VC investors, deal count/bn PPP\$ GDP	n/a	2024	PitchBook Data, Inc.; International Monetary Fund
4.2.5	VC investor co-participation/bn PPP\$ GDP	n/a	2024	PitchBook Data, Inc.; International Monetary Fund
5.1.4	GERD performed by business, % GDP	n/a	2023	UNESCO Institute for Statistics; Eurostat; OECD; RICYT
5.2.3	University industry & international engagement, top 5*	n/a	2025	Times Higher Education, World University Rankings 2025
5.2.5	Patent families/bn PPP\$ GDP	n/a	2021	World Intellectual Property Organization; International Monetary Fund
7.1.1	Intangible asset intensity, top 15, %	n/a	2024	Brand Finance
7.2.2	National feature films/mn pop. 15–69	n/a	2023	OMDIA; United Nations, World Population Prospects
7.2.3	Entertainment and media market/th pop. 15–69	n/a	2024	PwC, GEMO; United Nations, World Population Prospects; International Monetary Fund
7.3.3	Mobile app creation/bn PPP\$ GDP	n/a	2024	data.ia (a Sensor Tower Company); International Monetary Fund

# Global Innovation Index 2025



## Outdated data for Mali

Code	Indicator name	Economy year	Model year	Source
2.1.2	Government funding/pupil, secondary, % GDP/cap	2017	2021	UNESCO Institute for Statistics
2.1.3	School life expectancy, years	2017	2023	UNESCO Institute for Statistics
2.2.1	Tertiary enrolment, % gross	2019	2023	UNESCO Institute for Statistics
2.2.3	Tertiary inbound mobility, %	2015	2023	UNESCO Institute for Statistics
2.3.1	Researchers, FTE/mn pop.	2021	2023	UNESCO Institute for Statistics; Eurostat; OECD; RICYT
2.3.2	Gross expenditure on R&D, % GDP	2021	2023	UNESCO Institute for Statistics; Eurostat; OECD; RICYT
4.2.2	Venture capital (VC) received, deal count/bn PPP\$ GDP	2023	2024	PitchBook Data, Inc.; International Monetary Fund
4.3.1	Applied tariff rate, weighted avg., %	2019	2023	World Trade Organization
4.3.2	Domestic industry diversification	2019	2022	United Nations Industrial Development Organization (UNIDO)
5.1.1	Knowledge-intensive employment, %	2022	2024	International Labour Organization
5.1.2	Females employed w/advanced degrees, %	2022	2024	International Labour Organization
5.1.5	GERD financed by business, %	2017	2022	UNESCO Institute for Statistics; Eurostat; OECD; RICYT
5.3.1	Intellectual property payments, % total trade	2022	2023	World Trade Organization, Organisation for Economic Co-operation and Development; United Nations Conference on Trade and Development
5.3.2	High-tech imports, % total trade	2019	2023	United Nations Comtrade Database; World Trade Organization and United Nations Conference on Trade and Development
5.3.3	ICT services imports, % total trade	2022	2023	World Trade Organization and United Nations Conference on Trade and Development
5.3.5	Research talent, % in businesses	2017	2023	UNESCO Institute for Statistics; Eurostat; OECD; RICYT
6.1.3	Utility models by origin/bn PPP\$ GDP	2021	2023	World Intellectual Property Organization; International Monetary Fund
6.2.4	High-tech manufacturing	2019	2022	United Nations Industrial Development Organization (UNIDO)
6.3.1	Intellectual property receipts, % total trade	2022	2023	World Trade Organization, Organisation for Economic Co-operation and Development; United Nations Conference on Trade and Development
6.3.3	High-tech exports, % total trade	2019	2023	United Nations Comtrade Database; World Trade Organization and United Nations Conference on Trade and Development; Trade Data Monitor.
6.3.4	ICT services exports, % total trade	2022	2023	World Trade Organization and United Nations Conference on Trade and Development

# Global Innovation Index 2025



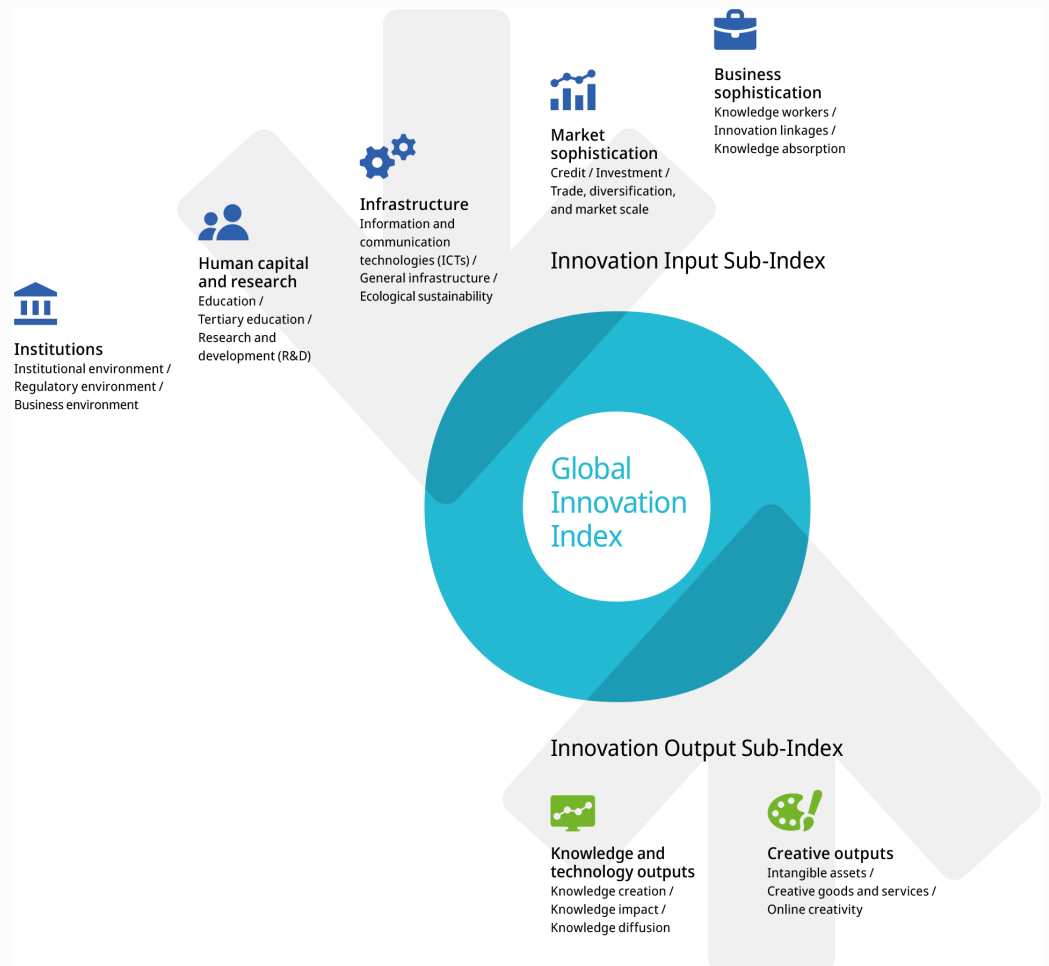
Code	Indicator name	Economy year	Model year	Source
7.2.1	Cultural and creative services exports, % total trade	2022	2023	World Trade Organization, Organisation for Economic Co-operation and Development; United Nations Conference on Trade and Development
7.2.4	Creative goods exports, % total trade	2019	2023	United Nations Comtrade Database; World Trade Organization and United Nations Conference on Trade and Development

# Global Innovation Index 2025



## About the Global Innovation Index

- The Global Innovation Index (GII) is published by the World Intellectual Property Organization (WIPO), a specialized agency of the United Nations.
- Recognizing that innovation is a key driver of economic development, the GII aims to provide an innovation ranking and rich analysis referencing around 140 economies. Over the last decade, the GII has established itself as both a leading reference on innovation and a “tool for action” for economies that incorporate the GII into their innovation agendas.



The Index is a ranking of the innovation capabilities and results of world economies. It measures innovation based on criteria that include institutions, human capital and research infrastructure, credit, investment, linkages, the creation, absorption and diffusion of knowledge and creative outputs.

The GII has two sub-indices: the Innovation Input Sub-Index and the Innovation Output Sub-Index, and seven pillars, each consisting of three sub-pillars.