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**PROSPERITY INDEX** 



SIXTEENTH EDITION

A tool for transformation

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# Introduction

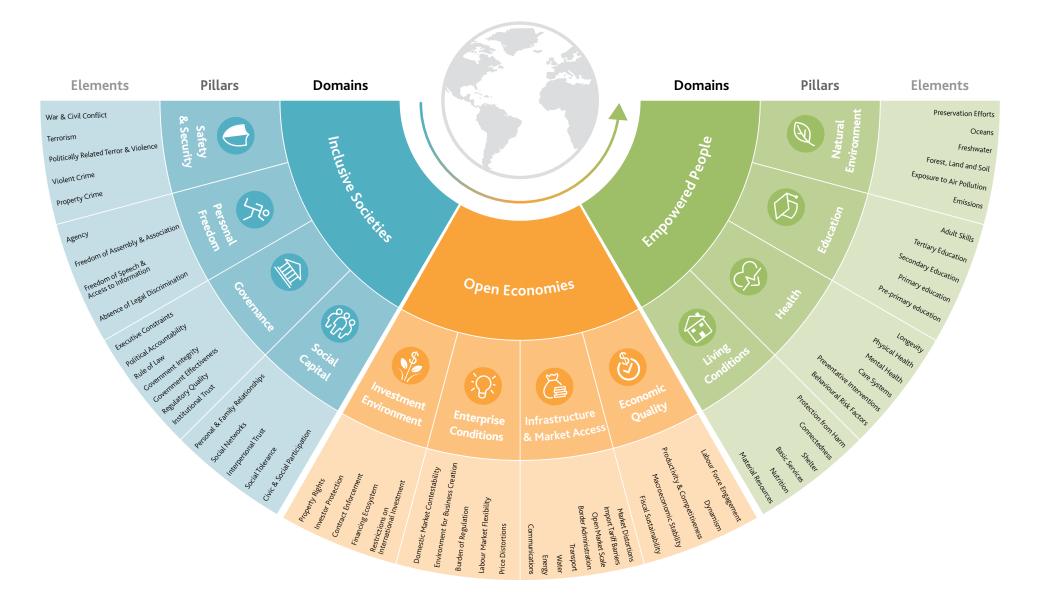
The 2023 Legatum Prosperity Index has incorporated the advice of more than 100 global experts to make it policy-focused to better assist national decision makers. Our intention is to keep stability within the Index, so that it can be more effectively used as a benchmarking and monitoring tool. This document provides a list of the sources and indicators used within the 2021 Index.

In producing this year's Prosperity Index, we have made corrections, improvements, and adjustments from the previous edition. These include correcting some anomalies in the 2020 Index, some refinement to the organisational structure of the Index, and replacing data that is no longer available. While the changes made have strengthened the Index, the overall measure of prosperity remains almost identical to previous years. It is also important to note, that we recalculate scores for all previous years and use this as the basis for our comparisons across time.

This document explains the changes we have made in more detail and assesses their overall impact on the results.

This is one of multiple documents supporting the Prosperity Index. For a full definition of what we mean by prosperity, please see the Defining prosperity document. For an explanation of how the Legatum Prosperity Index is constructed, please see the Measuring prosperity document. All documents are available for download at www.prosperity.com. If you have any further questions, please email info@li.com.

### The domains, pillars, and elements of prosperity



# **Inclusive Societies indicators**

### Safety and Security

### Indicators for War and Civil Conflict (weight = 20%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Two-sided conflict deaths <sup>†</sup>	The death rate from two-sided conflict (either between two nonstate actors, or the state and a non-state actor), averaged over the previous five years.	deaths /1,000,000 population*	2005-2021	2	0.5	Uppsala Conflict Data Program
Civil and ethnic war	A magnitude score of episode(s) of civil violence, civil warfare, ethnic warfare and ethnic violence involving that state in that year.	coding, 0-9	2004-2018	3	1	Center for Systemic Peace
Conflict-driven internal displacement	The rate of conflict or violence driven internal displacement	people /1,000,000 population*	2005-2021	2	1	Internal Displacement Monitoring Center
Refugees (origin country)	The proportion of the home country's population living abroad in refugee-like situations.	people /1,000,000 population*	2005-2021	2	1	United Nations High Commissioner for Refugees

† The underlying dataset for both conflict death indicators was the UCDP Georeferenced Event Dataset (GED) Global version 19.1, which captures deaths from both intrastate and external conflict.

### *Indicators for Terrorism (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Terrorism deaths	The death rate from terrorism, averaged over the previous five years.	deaths /1,000,000 population*	2004-2020	3	2	Global Terrorism Database
Terrorism injuries	The injury rate from terrorism, averaged over the previous five years.	injuries /1,000,000 population*	2004-2020	3	1	Global Terrorism Database
Terrorism incidents	The terrorism incident rate, averaged over the previous five years	incidents /1,000,000 population*	2004-2020	3	0.5	Global Terrorism Database
Property cost of terrorism	An estimate of the property cost of terrorism as a proportion of GDP, averaged over the previous five years.	US \$ /billion US 2010 \$*	2004-2020	3	1	Global Terrorism Database

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# *Indicators for Politically Related Terror and Violence (weight = 30%)*

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Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Political terror	A composite measure of state-sponsored political violence and repression within a country, taking into account disappearances, torture and political violence.	index, 1-5	2005-2021	2	2	Amnesty International & US State Department Political Terror Scale
Extrajudicial killings	A rating of the degree to which killings by government officials without due process of law have occurred within a country, over the previous year	coding, 0-2	2002-2017	3	1	CIRIGHTS Dataset
Use of torture	A rating of the degree to which the purposeful inflicting of extreme pain, either mental or physical, at the instigation of government officials has occurred within a country, over the previous year.	coding, 0-2	2002-2017	3	1	CIRIGHTS Dataset
Disappearance cases	A rating of the degree to which there have been cases of people disappearing, with likely political motivation and the victim remained unfound, within a country, over the previous year.	coding, 0-2	2002-2017	3	1	CIRIGHTS Dataset
Political imprisonment	A rating of the degree to which the imprisonment of people due to religious, political, or other beliefs has occurred within a country, over the previous year	coding, 0-2	2002-2017	3	0.5	CIRIGHTS Dataset
One-sided conflict deaths	The number of civilians killed by government forces, averaged over the previous five years	deaths /1,000,000 population*	2005-2021	2	0.5	Uppsala Conflict Data Program

### Indicators for Violent Crime (weight = 25%)<sup>†</sup>

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Intentional homicides	The rate of unlawful homicides purposely inflicted, as a result of domestic disputes, interpersonal violence, violent conflicts over land resources, inter-gang violence over turf or control, and predatory violence and killing by armed groups.	homicides /100,000 population*	2004-2020	3	2	World Bank World Development Indicators
Dispute settlement through violence	A composite measure of whether people do not resort to violence to redress personal grievances, either with neighbours, strangers, or government officials	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
Safety walking alone at night	The percentage of people who responded "Yes" to the survey question: "Do you feel safe walking alone at night in the city or area where you live?"	percentage	2006-2021	2	1	Gallup
Physical security of women	A composite measure of the physical security of women within a country, encompassing (a) the degree to which women are protected from domestic violence and rape, (b) the degree to which there are taboos or norms preventing these crimes being reported, and (c) the level to which honour killings and femicide occur.	index, 0-4	2007-2019	1	1	The WomanStats Project

† Our expert working group indicated the potential importance of including data on gang related crime within this element, but the lack of suitable data prevented us from doing so.

#### Indicators for Property Crime (weight = 10%)<sup>†</sup>

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Property stolen	The percentage of people who responded "Yes" to the survey question: "Within the last 12 months, have you had money or property stolen from you or another household member?"	percentage	2006-2021	2	2	Gallup
Business costs of crime and violence	"In your country, to what extent does the incidence of crime and violence impose costs on businesses?"	expert survey, 1-7	2007-2017	1	0.5	World Economic Forum Global Competitiveness Index
Business costs of organised crime <sup>‡</sup>	"In your country, to what extent does organized crime (mafia-oriented racketeering, extortion) impose costs on businesses?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index

<sup>†</sup> Our expert working group indicated the potential importance of including data on cyber-crime within this element, but the lack of suitable data prevented us from doing so.

It's worth noting that whilst WEF label this indicator as "Organized crime", the specific wording of the question asked discusses mafia-oriented racketeering and extortion, both of which are much narrower than the modern scope of organized crime.

### **Personal Freedom**

*Indicators for Agency (weight = 25%)* 

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Personal autonomy and individual rights	A rating of the degree to which individuals enjoy freedom of movement, are able to exercise the right to own property and establish private businesses without undue interference, enjoy personal social freedoms, enjoy equality of opportunity and freedom from economic exploitation.	coding, 0-16	2007-2022	1	1	Freedom House
Due process and rights	A composite measure of whether: (a) suspects are presumed innocent in court, (b) are treated fairly in arrest and pre-trial detention, (c) the use of torture or other abusive treatment, (d) the degree to which legal assistance is offered, and (e) whether jails in the country have adequate living conditions.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
Freedom of movement	A composite measure of the degree to which women experience agency, taking into account 11 different societal, cultural and prevalence variables.	coding, 0-4	2007-2017	3	1	CIRIGHTS Dataset
Women's agency⁺	A composite measure of 11 variables: prevalence of patrilocal marriage, inequality in family law and practice, age of marriage for girls in law and practice, polygyny in law and prevalence, bride price and dowry practices, physical security of women, culturally based exemption for femicide, property rights law and practice, cousin marriage legality and prevalence, son preference and sex ratio, and rape exemptions if there is an offer of marriage.	coding, 0-16	2017	1	1	The WomanStats Project
Freedom from arbitrary interference with privacy	A composite measure of (a) whether government agents are likely to intercept private communications of citizens without warrant, and (b) whether citizens may be arrested without warrant.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
Freedom from forced labour	A composite measure, assessing whether adult citizens are free from servitude and other kinds of forced labour.	index, 0-1	2007-2021	2	1	Varieties of Democracy

† This indicator is the "Patrilineality/Fraternity Syndrome Scale". More details about the variables considered by this indicator, and its calculation can be found on the Womanstats website (https://www.womanstats.org/new/codebook).

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Government response to slavery	A composite measure, assessing government progress towards achieving five milestones in preventing and tackling modern day slavery: (a) identifying and supporting survivors, (b) functioning of criminal justice mechanisms for prevention, (c) co-ordination and accountability between national and regional government, (d) addressing of risk factors, and (e) government and business avoidance of goods and services provided by forced labour.	index, -10-100	2014-2018	1	1	Global Slavery Index
Satisfaction with freedom	The percentage of people who responded "Yes" to the survey question: "Are you satisfied with your freedom to choose what you do with your life?"	percentage	2007-2022	1	1	Gallup

### Indicators for Freedom of Assembly and Association (weight = 25%)

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Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Right to associate and organise	A measure of the degree to which individuals enjoy associational and organizational rights, including (a) assembly, (b) nongovernmental organizations, particularly those that are engaged in human rights and governance-related work, and (c) trade unions and similar organizations.	coding, 0-12	2007-2022	1	1	Freedom House
Guarantee of assembly and association	A composite measure of whether people can (a) gather together in public and express opinions freely, (b) join community groups and associations, and (c) politically organize in any way they want.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
Autonomy from the state	A composite measure of the degree to which citizens experience a society that enjoys autonomy from the state and in which citizens freely and actively pursue their political and civic goals, however conceived.	index, 0-1	2007-2021	2	1	Varieties of Democracy

# Indicators for Freedom of Speech and Access to Information (weight = 25%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Press freedom from government censorship	A composite measure evaluating the legal environment for the media, political pressures that influence reporting, and economic factors that affect access to news and information.	index, 0-100	2007-2016	1	1	Freedom House
Press freedom from physical repression	A composite measure of press freedom, including (a) of the degree to which there is media pluralism, (b) media independence, (c) the media environment and level of self-censorship, (c) legislative framework, (d) transparency, and (e) the quality of the infrastructure that supports the production of news and information.	index, 0-100	2013-2021	1	1	Reporters Without Borders
Freedom of opinion and expression	A composite measure of the degree to which people can express political opinions, freedom of the media is respected, freedom of civil and political organization is respected.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
Government media censorship	A measure of the degree to which the government directly or indirectly attempt to censor the print or broadcast media.	coding, 0-4	2007-2021	2	0.5	Varieties of Democracy
Alternative sources of information	A composite measure of the degree to which the media are (a) un-biased in their coverage or lack of coverage of the opposition, (b) allowed to be critical of the regime, and (c) representative of a wide array of political perspectives.	index, 0-1	2007-2021	2	1	Varieties of Democracy
Political diversity of media perspectives	A measure of the degree to which the major print and broadcast media represent a wide range of political perspectives.	coding, 0-3	2007-2021	2	0.5	Varieties of Democracy

#### Indicators for Absence of Legal Discrimination (weight = 25%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Equal treatment and absence of discrimination	A composite measure of whether individuals are likely to be discriminated against in court, at jobs, by police or other institutions based upon their socio-economic status, ethnicity, sexuality, or resident status.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
Non-discriminatory civil justice	A composite measure of whether the civil justice system discriminates in practice based on socio-economic status, gender, ethnicity, religion, national origin, sexual orientation, or gender identity.	expert survey, 0-1	2015-2022	1	0.5	World Justice Project (Rule of Law Index)
Freedom from hiring and workplace discrimination	A composite measure of whether people are likely to be discriminated against in hiring because of socio-economic, ethnic or other immutable characteristics, and whether they experience discrimination at work.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
LGBT rights	A scale acting as a proxy for the legal status of LGBT individuals. (0=homosexuality is illegal, 1=legal, 2=civil unions between homosexual individuals are allowed, 3=marriage is legal)	coding, 0-3	2007-2020	2	1	International Lesbian, Gay, Bisexual, Trans and Intersex Association
Protection of women's workplace, education and family rights <sup>†</sup>	A composite measure of the degree to which women receive protections from discrimination in a society, encompassing numerous factors.	coding, 0-8	2007-2015	1	1	The WomanStats Project
Freedom of belief and religion	A composite measure of whether non-adherents to religions are required to submit to religious laws, and whether minorities can freely and publicly observe their holy days and religious events.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
Government religious intimidation and hostility <sup>‡</sup>	A composite measure of the degree to which there is government intimidation or violence motivated by religion, used several subcomponents of Pew's Government Restrictions Index.	index, 0-1	2007-2016	3	1	Pew Research Center

† This indicator is composed of three indicators provided by WomanStats — the "Inequity in Family Law/Practice Between Men and Women, the "Government Framework for Gender Equality", and "Property Rights in Law and Practice for Women". More details about the variables considered by this indicator and its calculation can be found on the WomanStats website (https://www.womanstats.org/new/codebook).

The following questions are used from Pew's Governments Restrictions Index, in an arithmetic mean, to create this variable: Q\_11, Q\_12, Q\_13, Q\_19, Q\_19\_Extent, Q\_19\_Property\_Damage, Q\_19\_Detentions, Q\_19\_Displacements, Q\_19\_Abuse, Q\_19\_Deaths.

### Governance

*Indicators for Executive Constraints (weight = 15%)* 

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Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Executive powers are effectively limited by the judiciary and legislature	A composite measure of whether executive powers are limited effectively by (a) the judiciary, and (b) the legislature, with twice the weighting given to limitation by the judiciary.	expert survey, 0-3	2015-2022	1	2	World Justice Project (Rule of Law Index)
Government powers are subject to independent and non- governmental checks	A composite measure of whether government powers are subject to (a) independent auditing and review, and (b) non-governmental checks, with twice the weighting given to independent auditing and review.	expert survey, 0-3	2015-2022	1	1	World Justice Project (Rule of Law Index)
Transition of power is subject to the law	A composite measure of whether (a) government officials are elected or appointed in accordance with the rules and procedures set forth in the constitution, and (b) integrity of the electoral process, including access to the ballot, the absence of intimidation, and public scrutiny of election results	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
Military involvement in rule of law and politics	A composite measure of the military's involvement in politics, which might stem from an external or internal threat, be symptomatic of underlying difficulties, or be a full-scale military takeover.	index, 0-10	2007-2020	3	0.5	Fraser Institute
Government officials are sanctioned for misconduct	A composite measure of whether government officials in the executive, legislature, judiciary, and the police are investigated, prosecuted, and punished for official misconduct and other violations.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)

# *Indicators for Political Accountability (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Consensus on democracy and a market economy as a goal	The extent to which major political actors agree on democracy and a market economy as strategic, long-term goals. A high score is awarded if all major political actors agree on establishing or consolidating democracy and a market economy as strategic, long-term goals of transformation. A low score is awarded if there are no major political actors who want to establish democracy or a market economy.	expert survey, 1-10	2008-2022	1	1	Bertelsmann Stiftung Transformation Index
Political participation and rights	A measure of the ability to participate in political processes, such as voting in legitimate elections, joining parties, running for office, etc.	coding, 1-7	2007-2022	1	0.5	Freedom House
Democracy level	A measure of the extent to which a society is autocratic or democratic, including (a) the competitiveness of executive recruitment, (b) constraints on chief executives, (c) regulation of political participation, and (d) competitiveness of political participation.	expert survey, -10-10	2007-2020	1	1	Center for Systemic Peace
Complaint mechanisms	A composite measure of whether individuals feel that they have effective complaint mechanisms regarding the government's performance.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)

### *Indicators for Rule of Law (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Judicial independence	"In your country, how independent is the judicial system from influences of the government, individuals, or companies, from not independent at all, to entirely independent?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index
Civil justice	A composite measure of the quality of civil justice, covering: (a) its affordability, (b) freedom from discrimination, (c) freedom from improper government influence, and (d) whether it is effectively enforced or subject to unreasonable delay.	expert survey, 0-6	2015-2022	1	3	World Justice Project (Rule of Law Index)
Integrity of the legal system	A composite measure of the strength and impartiality of the legal system, and the popular observance of the law. (based on the International Country Risk Guide Political Risk Component I for Law and Order.)	index, 0-10	2007-2020	3	2	Fraser Institute
Efficiency of dispute settlement	"In your country, how efficient are the legal and judicial systems for companies in settling disputes, from extremely inefficient, to extremely efficient?"	expert survey, 1-7	2009-2019	1	0.5	World Economic Forum Global Competitiveness Index

# *Indicators for Government Integrity (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Use of public office for private gain	A composite measure of the extent to which government officials in the judiciary, executive, police and military, and legislature use public office for private gain. Variables regarding officials in the executive and judicial branches were double weighted.	expert survey, 0-4	2015-2022	1	1	World Justice Project (Rule of Law Index)
Diversion of public funds	"In your country, how common is illegal diversion of public funds to companies, individuals, or groups, from very commonly occurs, to never occurs?"	expert survey, 1-7	2007-2017	1	1	World Economic Forum Global Competitiveness Index
Anti-corruption policy	A composite measure of the extent to which adequate institutional arrangements exist to implement an anti-corruption policy and whether they successfully contribute to an effective prosecution of corruption.	expert survey, 1-10	2008-2022	1	1	Bertelsmann Stiftung Transformation Index
Clientelism	A composite measure of the extent to which politics are based on clientelistic relationships?	index, 0-1	2007-2021	2	1	Varieties of Democracy
Legislative corruption	Do members of the legislature abuse their position for financial gain? From 0: "Commonly. Most legislators probably engage in these activities" to 4: "Never, or hardly ever".	coding, 0-4	2007-2021	2	0.5	Varieties of Democracy
Judicial corruption	A measure of the degree to which individuals or businesses make undocumented extra payments or bribes in order to speed up or delay the process or to obtain a favourable judicial decision?	coding, 0-4	2007-2021	2	0.5	Varieties of Democracy
Executive corruption	A composite measure capturing how routinely members of the executive, or their agents grant favours in exchange for bribes, kickbacks, or other material inducements, and how often they steal, embezzle, or misappropriate public funds or other state resources for personal or family use?	index, 0-1	2007-2021	2	0.5	Varieties of Democracy
Public sector corruption	A composite measure capturing the extent to which public sector employees grant favours in exchange for bribes, kickbacks, or other material inducements, and how often do they steal, embezzle, or misappropriate public funds or other state resources for personal or family use?	index, 0-1	2007-2021	2	0.5	Varieties of Democracy

# Indicators for Government Effectiveness (weight = 15%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Government quality and credibility	A composite measure of the perception of: (a) the quality of public services, (b) the quality of the civil service and the degree of its independence from political pressures, (c) the quality of policy formulation and implementation, and (d) the credibility of the government's commitment to such policies.	index, -2.5 - +2.5	2007-2020	3	2	Worldwide Governance Indicators
Prioritisation	The extent to which the government sets and maintains strategic priorities, maintains them over extended periods of time, has the capacity to prioritize and organize its policy measures accordingly, and does not rely on ad hoc measures.	expert survey, 1-10	2008-2022	1	1	Bertelsmann Stiftung Transformation Index
Efficiency of government spending	"In your country, how efficiently does the government spend public revenue, from extremely inefficient, to extremely efficient in providing goods and services."	expert survey, 1-7	2007-2017	1	0.5	World Economic Forum Global Competitiveness Index
Efficient use of assets	The extent to which the government makes efficient use of available human, financial and organizational resources.	expert survey, 1-10	2008-2022	1	1	Bertelsmann Stiftung Transformation Index
Implementation	The extent to which a government is effective at implementing its own policies.	expert survey, 1-10	2008-2022	1	1	Bertelsmann Stiftung Transformation Index
Policy learning	The extent to which a government demonstrates a pronounced ability of complex learning, and it acts flexibly and replaces failed policies with innovative ones.	expert survey, 1-10	2008-2022	1	1	Bertelsmann Stiftung Transformation Index
Policy coordination	The extent to which government coordinates conflicting objectives effectively and acts in a coherent manner and is not fragmented into rival fiefdoms that counteract each other.	expert survey, 1-10	2008-2022	1	1	Bertelsmann Stiftung Transformation Index

# *Indicators for Regulatory Quality (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Right to information	A composite measure of whether people have a right to government information that can be accessed reasonably, including: (a) whether requests for information held by a government agency are granted, (b) whether these requests are granted within a reasonable time period, (c) if the information provided is pertinent and complete, (d) if requests for information are granted at a reasonable cost and without having to pay a bribe, (e) whether people are aware of their right to information, and (f) whether relevant records are accessible to the public upon request.	expert survey, 0-1	2015-2022	1	0.5	World Justice Project (Rule of Law Index)
Publicised laws and government data	A composite measure of quality and accessibility of information published by the government in print or online; whether laws and information on legal rights are (a) publicly available, (b) presented in plain language, (c) made accessible in all languages; and whether administrative regulations, drafts of legislation, and high court decisions are made accessible to the public in a timely manner.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
Transparency of government policy	In your country, how easy is it for companies to obtain information about changes in government policies and regulations affecting their activities, from extremely difficult, to extremely easy?	expert survey, 1-7	2007-2017	1	0.5	World Economic Forum Global Competitiveness Index
Budget transparency	A composite measure of the amount and timeliness of budget information governments are making publicly available.	index, 0-100	2008-2021	2	0.5	International Budget Partnership
Regulatory quality	A composite measure of the perception of the ability of the government to formulate and implement sound policies and regulations that permit and promote private sector development.	index, -2.5 - +2.5	2007-2020	3	1	Worldwide Governance Indicators
Enforcement of regulations	A composite measure of whether government regulations, such as labour, environmental, public health, commercial, and consumer protection regulations, are effectively enforced.	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)
Efficiency of legal framework in challenging regulations	"In your country, to what extent can individuals, institutions (civil society), and businesses obtain justice through the judicial system against arbitrary government decisions, from not at all, to a great extent?"	expert survey, 1-7	2009-2019	1	1	World Economic Forum Global Competitiveness Index
Delay in administrative proceedings	A composite measure of whether administrative proceedings at the national and local levels are conducted without unreasonable delay	expert survey, 0-1	2015-2022	1	1	World Justice Project (Rule of Law Index)

# *Indicators for Institutional Trust (weight = 10%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Confidence in local police	The percentage of people responding "Yes" to the survey question: "Do you have confidence in the local police force?"	percentage	2007-2021	2	2	Gallup
Public trust in politicians	"In your country, how would you rate the ethical standards of politicians?"	expert survey, 1-7	2007-2017	1	2	World Economic Forum Global Competitiveness Index
Confidence in financial institutions and banks	The percentage of people responding "Yes" to the survey question: "Do you have confidence in financial institutions or banks?"	percentage	2007-2021	2	1	Gallup
Confidence in judicial system and courts	The percentage of people responding "Yes" to the survey question: "Do you have confidence in the judicial system and courts?"	percentage	2007-2021	2	1	Gallup
Confidence in national government	The percentage of people responding "Yes" to the survey question: "Do you have confidence in national government?"	percentage	2007-2021	2	1	Gallup
Confidence in military	The percentage of people responding "Yes" to the survey question: "Do you have confidence in the military?"	percentage	2007-2021	2	0.5	Gallup

# Social Capital

### *Indicators for Personal and Family Relationships (weight = 20%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Help from family and friends when in trouble	The percentage of people responding "Yes" to the survey question: "If you were in trouble, do you have relatives or friends you can count on to help?"	percentage	2006-2021	2	2	Gallup
Family give positive energy	The percentage of people responding "Strongly Agree/Agree" to the survey question: "Thinking about your life in general 'My family give me positive energy'"	percentage	2013-2015	1	1	Gallup

### *Indicators for Social Networks (weight = 20%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Respect	The percentage of people responding "Yes" to the survey question: "Were you treated with respect all day yesterday?"	percentage	2006-2021	2	2	Gallup
Opportunity to make friends	The percentage of people responding "Yes" to the survey question: "Are you satisfied with opportunities to meet people and make friends?"	percentage	2010-2021	2	1	Gallup
Helped another household	The percentage of people responding "Yes" to the survey question: "Has your household sent financial help to another household in last year?" (same country)	percentage	2011-2019	1	0.5	Gallup

#### *Indicators for Interpersonal Trust (weight = 20%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Generalised interpersonal trust	The percentage of people responding "Most people can be trusted" to the question "Generally speaking, would you say most people can be trusted, or you can't be too careful?" <sup>†</sup>	percentage	2006-2022	1	1	World Values Survey, European Values Survey, Global Barometer Surveys, Arab Barometer, Latinobarometro
Helped a stranger	The percentage of people responding "Yes" to the survey question: "Have you helped a stranger or someone you didn't know who needed help in past month?"	percentage	2006-2021	2	0.5	Gallup

#### Indicators for Civic and Social Participation (weight = 20%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Donated money to charity	The percentage of people responding "Yes" to the survey question: "Have you donated money to a charity in past month?"	percentage	2006-2021	2	1.5	Gallup
Voter turnout	Voter turnout (% of registered electors) x election occurred in last 7 years. If a country enforced compulsory voting, it is not scored on this indicator	percentage (adjusted)	2006-2022	1	1.5	International Institute for Democracy and Electoral Assistance
Volunteering	The percentage of people responding "Yes" to the survey question: "Have you volunteered time to an organisation in past month?"	percentage	2006-2020	1	1	Gallup
Voiced opinion to a public official	The percentage of people responding "Yes" to the survey question: "In the past month, have you voiced your opinion to a public official?"	percentage	2006-2021	2	0.5	Gallup

+ As the wording of the questions in each of these surveys was conceptually identical and the sample sizes are similar, the results for different surveys for the same country were combined in a single time series. If more than one survey covered a particular year for a particular country we have recorded the mean of the two data points, this was a rare occurrence.

# *Indicators for Social Tolerance (weight = 20%)*

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Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Perceived tolerance of ethnic minorities	Survey Question: "Is your city/area a good place to live for ethnic minorities?"	percentage	2006-2022	1	1	Gallup
Perceived tolerance of LGBT individuals	Survey Question: "Is your city/area a good place to live for gay/lesbian people?"	percentage	2006-2022	1	1	Gallup
Perceived tolerance of immigrants	Survey Question: "Is your city/area a good place to live for immigrants?"	percentage	2006-2022	1	1	Gallup

# **Open Economies indicators**

# Investment Environment

### Indicators for Property Rights (weight = 30%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Regulation of property possession and exchange	The extent to which government authorities ensure there are well- defined rights of private property and regulate the acquisition, benefits, use and sale of property.	expert survey, 10-1	2006-2022	1	1	Bertelsmann Stiftung Transformation Index
Lawful process for expropriation	Measure of whether the government: (a) respects the property rights of people and corporations, (b) refrains from the illegal seizure of private property, and (c) provides adequate compensation when property is legally expropriated.	expert survey, 0-1	2012-2022	1	1	World Justice Project (Rule of Law Index)
Protection of property rights	"In your country, to what extent are property rights, including financial assets, protected, from not at all, to a great extent?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index
Intellectual property protection	"In your country, to what extent is intellectual property protected, from not at all, to a great extent?"	expert survey, 1-7	2007-2019	1	2	World Economic Forum Global Competitiveness Index
Quality of land administration WEF	The quality of land administration index assesses five dimensions: reliability of infrastructure, transparency of information, geographic coverage, land dispute resolution, and equal access to property rights .	index, 0-30	2017-2019	1	1	World Economic Forum Global Competitiveness Index

# Indicators for Investor Protections (weight = 20%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Auditing and reporting standards	"In your country, how strong are financial auditing and reporting standards, from extremely weak, to extremely strong?"	expert survey, 1-7	2007-2019	1	2	World Economic Forum Global Competitiveness Index
Insolvency regulatory framework	0-16 index measuring the adequacy and integrity of the legal framework applicable to liquidation and reorganization proceedings.	index, 0-16	2017-2019	1	1	World Economic Forum Global Competitiveness Index
Recovery rate of insolvency	The cents on the dollar recovered by secured creditors through judicial reorganization, liquidation, or debt enforcement (foreclosure or receivership) proceedings.	percentage	2017-2019	1	1.5	World Economic Forum Global Competitiveness Index
Shareholder governance	A composite measure of the rights of shareholders in corporate governance: (a) shareholders' rights and role in major corporate decisions, (b) governance safeguards protecting shareholders from undue board control and entrenchment, and (c) transparency on ownership stakes, compensation, audits and financial prospects.	index, 0-10	2017-2019	1	1	World Economic Forum Global Competitiveness Index
Regulation of conflict of interest	A composite measure of the protection of shareholders against directors' misuse of corporate assets for personal gain: (a) transparency of related- party transactions, (b) shareholders' ability to sue and hold directors liable for self-dealing, and (c) access to evidence and allocation of legal expenses in shareholder litigation.	index, 1-7	2017-2019	1	1	World Economic Forum Global Competitiveness Index

# Indicators for Contract Enforcement (weight = 20%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Alternative dispute resolution mechanisms	A composite measure of whether alternative dispute resolution mechanisms are (a) accessible, (b) free from improper influence, (c) efficient (not subject to unreasonable delays), and (d) effectively enforced.	expert survey, 0-1	2012-2022	1	1	World Justice Project (Rule of Law Index)
Contract intensity	The Contract Intensity of National Economies (CINE) data gauge the institutionalization of asynchronous contract flows in countries. In economic norms theory the institutionalization of asynchronous contracting is a key force for state building, democracy, and an emerging world peace (Mousseau 2000; 2019).	index, 0-3	2003-2019	4	1	Harvard
Property rights and rule-based governance rating	Property rights and rule-based governance assess the extent to which private economic activity is facilitated by an effective legal system and rule-based governance structure in which property and contract rights are reliably respected and enforced.	index, 1-6	2005-2021	2	1	World Bank Group, CPIA database

# Indicators for Financing Ecosystem (weight = 20%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Quality of banking system and capital markets	The extent to which a solid banking system and a functioning capital market have been established.	expert survey, 1-10	2006-2022	1	1	Bertelsmann Stiftung Transformation Index
Venture capital availability	"In your country, how easy is it for start-up entrepreneurs with innovative but risky projects to obtain equity funding, from extremely difficult, to extremely easy?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index
Soundness of banks	"In your country, how do you assess the soundness of banks - from extremely low (banks may require recapitalization), to extremely high (banks are generally healthy with sound balance sheets)?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index
Financing of SMEs	"In your country, to what extent can small- and medium-sized enterprises (SMEs) access finance they need for their business operations through the financial sector, from not at all, to a great extent?"	expert survey, 1-7	2017-2019	1	1	World Economic Forum Global Competitiveness Index
Access to finance	The percentage of firms identifying access to, or cost of, finance as a "major" or "very severe" obstacle.	percentage	2005-2020	1	1	World Bank Enterprise Surveys
Commercial bank branches	The number of commercial bank branches (retail locations) per capita.	branches /100,000 adult population*	2004-2020	3	1	International Monetary Fund
Credit registry coverage	National credit bureau coverage reports the number of individuals or firms listed by a private credit bureau with current information on repayment history, unpaid debts, or credit outstanding. The number is expressed as a percentage of the adult population.	borrowers / 1,000 adults	2006-2019	1	0.5	World Bank World Development Indicators

# Indicators for Restrictions on International Investment (weight = 10%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Freedom to own foreign currency bank accounts	A composite measure of the extent to which foreign currency bank accounts are permitted, both domestically and abroad.	index, 0-10	2004-2020	3	1	Fraser Institute
Capital controls	The percentage of potential capital controls not levied.	percentage	2004-2020	3	1	Fraser Institute
Freedom of foreigners to visit	A composite measure based on the number of countries for which a country requires a visa from foreign visitors for tourist and short-term business purposes.	index, 0-10	2005-2020	3	1	Fraser Institute
Prevalence of foreign ownership of companies	"In your country, how prevalent is foreign ownership of companies, from extremely rare, to extremely prevalent?"	expert survey, 1-7	2007-2017	1	1	World Economic Forum Global Competitiveness Index
Business impact of rules on FDI	"In your country, how restrictive are rules and regulations on foreign direct investment (FDI), from extremely restrictive, to not restrictive at all?"	expert survey, 1-7	2007-2017	1	2	World Economic Forum Global Competitiveness Index
Restrictions on financial transactions	A composite measure of: (a) presence of multiple exchange rates, (b) restrictions on current account transactions, (c) restrictions on capital account transactions, and (d) requirement of the surrender of export proceeds.	index, 0-1	2003-2019	3	1	Chinn-Ito Index

# **Enterprise Conditions**

### *Indicators for Domestic Market Contestability (weight = 30%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Market-based competition	The extent to which (a) the fundamentals of market-based competition is consistently defined and implemented both macro-economically and micro-economically, (b) there are state-guaranteed rules for market competition with equal opportunities for all market participants, and (c) the informal sector is very small.	expert survey, 1-10	2006-2022	1	1	Bertelsmann Stiftung Transformation Index
Anti-monopoly policy	The extent to which safeguards (such as comprehensive competition laws) exist to prevent the development of economic monopolies and cartels, and the extent to which they are they enforced	expert survey, 1-10	2006-2022	1	1	Bertelsmann Stiftung Transformation Index
Extent of market dominance	"In your country, how do you characterize corporate activity, from dominated by a few business groups, to spread among many firms?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index
State ownership of the economy	State ownership of the economy is expert coded and defined and measured as the extent to which private ownership of economic activity exists in any given country	Index, -4-4	2005-2021	2	1	Varieties of Democracy

### Indicators for Environment for Business Creation (weight = 25%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Private companies are protected and permitted	The extent to which private companies are permitted are viewed institutionally as primary engines of economic production and are given appropriate legal safeguards, and the extent to which privatization processes are conducted in a manner consistent with market principles.	expert survey, 1-10	2006-2022	1	1	Bertelsmann Stiftung Transformation Index
Labour skill a business constraint	The percentage of firms identifying labour skill level as a major or very severe obstacle.	percentage	2005-2020	1	0.5	World Bank Enterprise Surveys
Availability of skilled workers	"In your country, to what extent can companies find people with the skills required to fill their vacancies, from not at all, to a great extent?"	expert survey, 1-7	2017-2019	1	0.5	World Economic Forum Global Competitiveness Index
State of cluster development	"In your country, how widespread are well-developed and deep clusters (geographic concentrations of firms, suppliers, producers of related products and services, and specialized institutions in a particular field), from non-existent, to widespread in many fields?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index

# Indicators for Burden of Regulation (weight = 25%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Taxes and bureaucracy	The extent to which public policies support entrepreneurship - taxes or regulations are either size-neutral or encourage new and SMEs.	index, 1-9	2005-2021	2	0.5	World Bank Alternative Indicator
Ease of paying taxes	The ranking is the simple average of the percentile rankings on the component indicators of the ease of paying taxes: payments (number per year); time (hours per year); profit tax (%); labour tax and contributions (%); other taxes (%); and total tax rate (% profit).	percentage	2013-2017	1	0.5	World Economic Forum Global Competitiveness Index
Time spent complying with regulations	The percentage of senior management's time, in a typical week, that is spent dealing with the requirements imposed by government regulations (e.g., taxes, customs, labour regulations, licensing and registration, including dealings with officials, and completing forms).	percentage*	2005-2020	1	1	World Bank Enterprise Surveys
Burden of government regulation	"In your country, how burdensome is it for companies to comply with public administration's requirements (e.g., permits, regulations, reporting), from extremely burdensome, to not burdensome at all?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index
Days to obtain a construction related permit	Number of days to obtain a construction related permit	days*	2006-2021	1	1	World Bank Alternative Indicator

# *Indicators for Labour Market Flexibility (weight = 10%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Cooperation in labour-employer relations	"In your country, how do you characterize Labour-employer relations, from generally confrontational, to generally cooperative?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index
Flexibility of hiring practices	"In your country, to what extent do regulations allow flexible hiring and firing of workers, from not at all, to a great extent?"	expert survey, 1-7	2007-2019	1	0.5	World Economic Forum Global Competitiveness Index
Flexibility of wage determination	"In your country, how are wages generally set, from by a centralized bargaining process, to by each individual company?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index
Redundancy costs	The cost of redundancy, measured in weeks of salary	weeks*	2007-2019	1	0.5	World Economic Forum Global Competitiveness Index
Flexibility of employment contracts	A composite measure of how flexible employment contracts are, based on: (a) maximum length of a single fixed term contract, (b) restrictions on overtime work, and (c) whether there are fixed term contracts prohibited for permanent tasks.	index, 0-1	2006-2020	1	1	World Bank Enterprise Surveys

### *Indicators for Price Distortions (weight = 10%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Distortive effect of taxes and subsidies	"In your country, to what extent do fiscal measures (subsidies, tax breaks, etc.) distort competition, from distort competition to a great extent, to do not distort competition at all?"	expert survey, 1-7	2017-2019	1	1	World Economic Forum Global Competitiveness Index
Energy subsidies	The scale of consumer and producer subsidies for energy.	percentage of GDP*	2011-2020	2	1	International Monetary Fund

# Infrastructure and Market Access

### Indicators for Communications (weight = 25%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
International internet bandwidth	The sum of used capacity of all internet exchanges (locations where internet traffic is exchanged) offering international bandwidth.	kilobits / second / capita	2014-2021	2	1	International Telecommunications Union
2G, 3G and 4G network coverage	A composite measure, based on the average of 2G, 3G and 4G network coverage.	index, 0-100	2014-2021	2	2	Groupe Spéciale Mobile Association
Fixed broadband subscriptions	Fixed residential and organisational subscriptions to high-speed access to the public Internet, at downstream speeds equal to or greater than, 256 kbit/s (including satellite broadband, fixed WiMAX and any other fixed wireless technologies, excluding connections via mobile-cellular networks).	number /100 population*	2004-2020	3	1	International Telecommunications Union
Internet usage	The percentage of the population who, in the last three months, have used the internet (via a computer, mobile phone, personal digital assistant, games machine, digital TV etc.)	percentage	2004-2020	3	1	International Telecommunications Union

# *Indicators for Energy (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Installed electric capacity	The total net installed capacity of electric power plants, including enterprises that produce electricity, but for whom the production is not their principal activity.	kilowatts / capita*	2004-2020	3	1.5	United Nations Energy Statistics Database
Number of electrical outages in a typical month	Power outages are the average number of power outages that establishments experience in a typical month.	number*	2006-2021	2	0.5	World Bank Enterprise Surveys
Average duration of a typical electrical outage	Average duration of power outages (hours).	hours*	2006-2021	2	0.5	World Bank Enterprise Surveys
Time to obtain an electrical connection upon application	The average wait, in days, experienced to obtain an electrical connection from the day an establishment applies for it to the day it receives the service.	days*	2006-2021	2	1	World Bank Enterprise Surveys

### *Indicators for Water (weight = 10%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Gross fixed water assets	The total gross fixed asset value of water production facilities.	US \$ / population served	2004-2018	1	1	"International Benchmarking Network for Water and Sanitation Utilities"
Water production	The total annual water supplied to the distribution system (including purchased water, if any), expressed by population served per day.	litres per capita per day	2004-2018	1	0.5	"International Benchmarking Network for Water and Sanitation Utilities"
Reliability of water supply	"In your country, how reliable is the water supply (lack of interruptions and flow fluctuations), ranging from extremely unreliable to extremely reliable?"	expert survey, 1-7	2017-2019	1	1	World Economic Forum Global Competitiveness Index

### *Indicators for Transport (weight = 25%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Logistics performance	A composite measure of: (a) quality of trade- and transport-related infrastructure, (b) ease of arranging competitively priced shipments, (c) quality of logistics services, (d) ability to track and trace consignments, and (e) frequency with which shipments reach the consignee within the scheduled time.	index, 1-5	2007-2018	1	1.5	World Bank Logistics Performance Index
Airport connectivity	A composite measure of the connectivity to the global air transport network available in each country. The score is based on the number of available seats on flights originating within the country, and weighted by the size (in terms of the number of passengers handled) of the destination airports, and normalized by the population of the origin country	index, 0-100*	2009-2019	2	2	World Economic Forum Global Competitiveness Index
Efficiency of seaport services	"In your country, how efficient (i.e., frequency, punctuality, speed, price) are seaport services (ferries, boats) (for landlocked countries: assess access to seaport services), from extremely inefficient - among the worst in the world, to extremely efficient - among the best in the world?"	expert survey, 1-7	2017-2019	1	2	World Economic Forum Global Competitiveness Index
Liner shipping connectivity	A composite measure capturing how well countries are connected to global shipping networks: (a) number of ships, (b) their container-carrying capacity, (c) maximum vessel size, (d) number of services, and (e) number of companies that deploy container ships in a country's ports.	index, rebased to 100 in 2004*	2005-2019	2	0.5	United Nations Trade Data
Quality of roads	"In your country, how is the quality (extensiveness and condition) of road infrastructure, from extremely poor - among the worst in the world, to extremely good - among the best in the world?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index
Road density <sup>†</sup>	The density of a country's road network, including motorways, highways, and main or national roads, secondary or regional roads, and all other roads.	km / 100 sq km of land area*	2000-2011	1	0.5	Food and Agriculture Organisation
Rail density	The density of a country's rail network based on length of railway route available for train service, irrespective of the number of parallel tracks.	km / sq km of land area*	2003-2019	3	0.5	International Union of Railways

+ Countries with low population density can be scored poorly for this indicator, due to concentration of roads in urban areas. In countries such as Australia, where the population is heavily concentrated in a very small area (relative to the size of the country), the functional density will be higher than these data suggest.

## Indicators for Border Administration (weight = 5%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Efficiency of customs clearance process	The efficiency of customs clearance processes, based on speed, simplicity and predictability of formalities.	survey, 1-5	2007-2018	1	1.5	World Bank Logistics Performance Index
Number of documents required to be filled out for exports	Number of documents required to be filled out for exports.	number	2012-2018	1	0.5	World Bank Logistics Performance Index
Number of documents required to be filled out for imports	Number of documents required to be filled out for imports.	number	2012-2018	1	0.5	World Bank Logistics Performance Index
Clearance time with physical inspection	Average number of days to clear goods exports through customs with physical inspection.	days*	2010-2018	1	0.5	World Bank Logistics Performance Index
Average time to clear exports through customs (days)	Average number of days to clear direct exports through customs.	days*	2005-2020	1	0.5	World Bank Enterprise Surveys

## *Indicators for Open Market Scale (weight = 5%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Domestic and international market access for goods	A composite measure of (a) the GDP of the economies with which a country has a free trade agreement for goods, and (b) GDP of the domestic economy, weighted double to take into account the ease of trading domestically compared with overseas markets. Expressed as a proportion of world GDP.	percentage of global GDP	2005-2021	2	1.5	World Trade Organisation
Domestic and international market access for services	A composite measure of (a) the GDP of the economies with which a country has a free trade agreement for services, and (b) GDP of the domestic economy, weighted double to take into account the ease of trading domestically compared with overseas markets. Expressed as a proportion of world GDP.	percentage of global GDP	2005-2021	2	2	World Trade Organisation
Trade-weighted average tariff faced in destination markets	The average of applied destination tariff rates levied on merchandise goods (including preferential rates that the rest of the world applies to each country), weighted by the trade patterns of the importing country's reference group.	percentage	2014-2016	2	0.5	World Economic Forum Global Competitiveness Index
Margin of preference in destination markets	A composite measure based on the average of: (a) trade-weighted average difference between the MFN tariff and the most advantageous preferential duty (advantage score), and (b) the ratio of the advantage score to the trade-weighted average MFN tariff level.	index, 1-100	2014-2016	2	0.5	World Economic Forum Global Competitiveness Index

## *Indicators for Import Tariff Barriers (weight = 5%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Share of imports free from tariff duties	The share of trade, excluding petroleum, that is imported free of tariff duties, taking into account MFN tariffs and preferential agreements	percentage	2014-2016	2	1.5	World Economic Forum Global Competitiveness Index
Average applied tariff rate	The trade-weighted average of all the applied tariff (custom duty) rates on imports of merchandise goods, including preferential rates that a country applies to the rest of the world.	percentage	2014-2016	2	2	World Economic Forum Global Competitiveness Index
Complexity of tariffs	A composite measure of: (a) tariff dispersion, (b) specific tariffs, and (c) number of distinct tariffs	index, 1-7	2014-2019	1	0.25	World Economic Forum Global Competitiveness Index

## *Indicators for Market Distortions (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Extent of liberalisation of foreign trade	The extent to which foreign trade has been liberalised, with uniform, low tariffs and few non-tariff barriers.	expert survey, 1-10	2006-2022	1	1	Bertelsmann Stiftung Transformation Index
Prevalence of non-tariff barriers	"In your country, to what extent do non-tariff barriers (e.g., health and product standards, technical and labelling requirements, etc.) limit the ability of imported goods to compete in the domestic market, from strongly limit, to do not limit at all?"	expert survey, 1-7	2007-2019	1	1	World Economic Forum Global Competitiveness Index
Non-tariff measures	The number of non-tariff measures that can potentially have an effect on international trade in goods, including sanitary and phytosanitary, technical barriers to trade, pre-shipment inspection, contingent trade protective measures, quantity control measures, price control measures, other measures, and export-related measures	number*	2018	1	0.25	United Nations Trade Data

## Economic Quality

*Indicators for Fiscal Sustainability (weight = 25%)* 

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Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Government budget balance	The government budget balance, as a percentage of GDP.	percentage	2006-2022	1	1	International Monetary Fund World Economic Outlook
Government debt	The gross government debt, (consisting of all liabilities that require payment or payments of interest and/or principal by the debtor to the creditor at a date or dates in the future), as a percentage of GDP.	percentage	2006-2022	1	1.5	International Monetary Fund World Economic Outlook
Country credit rating	An average of S&P, Moody's, Fitch and DBRS ratings of country credit ratings, standardised to a score out of 100.	score, 0-100	2019-2020	1	0.5	Trading Economics
Country risk premium	The additional return or premium demanded by investors to compensate them for the higher risk associated with investing in a country.	percentage	2007-2022	1	1.5	Aswath Damodaran
Gross savings	Gross national income less total consumption, plus net transfers, as a percentage of GDP.	percentage	2005-2021	1	1	World Bank World Development Indicators

#### Indicators for Macroeconomic Stability (weight = 10%)

In	ndicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
GI	DP per capita growth	Annual percentage growth rate of GDP per capita based on constant local currency, averaged (CAGR) over the previous five years.	percentage	2005-2021	2	1	World Bank World Development Indicators
Inf	tiation volatility	Standard deviation of the yearly percentage change in the end of period inflation rate over the previous five years.	percentage*	2005-2020	2	1	International Monetary Fund

#### Indicators for Productivity and Competitiveness (weight = 30%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Labour productivity <sup>†</sup>	The GDP output per worker in the workforce (population in employment).	2017 US \$ PPP*	2010-2021	2	1	International Labour Organisation
Economic complexity <sup>‡</sup>	A composite measure of the productive capabilities of large economic systems, based on both (a) the diversity of countries that are exported to, and (b) the ubiquity of products exported.	index, -3-3	2004-2020	3	1.5	Economic Complexity Index
Export quality	A composite measure estimating a country's export quality, based on both the (a) value, and (b) quantity, of bilateral trades.	index, 0-1.2	2003-2014	4	1	International Monetary Fund
High-tech manufactured exports	The value of manufactured exports with high R&D intensity, such as in aerospace, computers, pharmaceuticals, scientific instruments, and electrical machinery, expressed as a percentage of the value of all manufactured exports	percentage*	2007-2020	3	1	United Nations Trade Data

† Changed from 2011 PPP\$, not marked up in methodology PDF.

The ECI in its strict mathematical definition is defined in terms of an eigenvector of a matrix connecting countries to countries (based on whether one country exports to the other, and the ubiquity of those exports). A full definition of the computation of the ECI can be found at https://oec.world/en/resources/methodology/.

## *Indicators for Dynamism (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
New business density	The number of newly registered limited liability corporations per calendar year.	number /100 working age population*	2006-2020	3	1	World Bank Enterprise Surveys
Patent applications	The rate of applications for the exclusive rights to an invention, covering both products and processes as inventions.	applications /1,000,000 population*	2010-2021	2	0.5	World Intellectual Property Organisation
Capacity to attract talented people	"Does your country attract talented people from abroad?"	expert survey, 1-7	2013-2017	1	1	World Economic Forum Global Competitiveness Index

## Indicators for Labour Force Engagement (weight = 20%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Labour force participation	The percentage of the working-age population (aged 15-64) that are economically active, either by working, or looking for work.	percentage	2004-2019	3	1	International Labour Organisation
Female labour force participation	The percentage of the female working-age population (aged 15-64) that are economically active, either by working, or looking for work	percentage	2004-2019	3	0.5	International Labour Organisation
Waged and salaried workers	The percentage of the workforce (those working) who are in waged and salaried roles.	percentage	2004-2019	3	1.5	International Labour Organisation
Unemployment	The percentage of the labour force (those who are working or looking for work) that are not employed.	percentage*	2005-2021	2	1	International Labour Organisation
Youth unemployment	The percentage of the youth labour force (those aged 16-24 working or looking for work) that are not employed.	percentage*	2005-2021	2	0.5	International Labour Organisation

## **Empowered People indicators**

## **Living Conditions**

#### Indicators for Material Resources (weight = 20%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Poverty rate at national poverty lines†	The percentage of the population living below the national poverty lines.	percentage	2004-2020	3	0.5	World Bank World Development Indicators
Poverty rate at \$1.90 a day	The percentage of the population living on less than \$1.90 a day, at 2011 PPP international prices.	percentage	2004-2020	3	1	World Bank World Development Indicators
Poverty rate at \$3.20 a day	The percentage of the population living on less than \$3.20 a day, at 2011 PPP international prices.	percentage	2004-2020	3	1	World Bank World Development Indicators
Poverty rate at \$5.50 a day	The percentage of the population living on less than \$5.50 a day, at 2011 PPP international prices.	percentage	2004-2020	3	1	World Bank World Development Indicators
Households with a refrigerator	The percentage of households with a refrigerator.	percentage	2004-2020	3	1	Global Data Lab
Ability to source emergency funds	The percentage of respondents reporting that in the case of an emergency it is not possible for them to come up with 1/20 of gross national income per capita in local currency within the next month.	percentage	2014-2017	5	1	World Bank Global Financial Inclusion
Ability to live on household income <sup>‡</sup>	The percentage of people who responded "getting by on present income/ living comfortably" to the survey question: "Which phrase comes closest to your feelings about your household income?"	percentage	2006-2021	1	1	Gallup

+ National poverty rates differ between different countries, so this indicator has the trade-off between utilising a measure of relative poverty, and applying comparisons between different measurements.

The wording of the survey question appears here slightly altered from the original, and five responses ranging from "Living comfortably on present income" to "Finding it very difficult on present income" were offered as possible responses.

## *Indicators for Nutrition (weight = 20%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Availability of adequate food	The percentage of people who responded "Yes" to the survey question: "Have there been times in the past 12 months when you did not have enough money to buy food that you or your family needed?"	percentage	2006-2021	2	1	Gallup
Prevalence of undernourishment	The percentage of the population whose food intake is insufficient to meet dietary energy requirements continuously	percentage	2003-2019	4	1	Food and Agriculture Organisation
Prevalence of wasting in children under-5	The percentage of children under age 5 whose weight for height is more than two standard deviations below the median for the international reference population ages 0-59 months	percentage	2005-2021	2	1	World Bank World Development Indicators
Prevalence of stunting in children under-5	The percentage of children under age 5 whose height for age is more than two standard deviations below the median for the international reference population ages 0-59 months.	percentage	2005-2021	2	1	World Bank World Development Indicators

## *Indicators for Basic Services (weight = 10%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Access to electricity	The percentage of population with relatively simple and stable access to electricity.	percentage	2004-2020	3	1	World Bank World Development Indicators
Access to basic water services	The percentage of people using at least basic water services from an improved source, provided collection time is not more than 30 minutes for a round trip	percentage	2004-2020	3	1	WHO/UNICEF Joint Monitoring Programme for Water Supply and Sanitation
Access to piped water	The percentage of the population with a water service pipe connected with in-house plumbing to one or more taps or a piped water connection to a tap placed in the yard or plot outside the house.	percentage	2005-2020	2	1	WHO/UNICEF Joint Monitoring Programme for Water Supply and Sanitation
Access to basic sanitation services	The percentage of people using at least improved sanitation facilities that are not shared with other households.	percentage	2004-2020	3	1	WHO/UNICEF Joint Monitoring Programme for Water Supply and Sanitation
Unsafe water, sanitation or hygiene	The rate of age-standardized disability adjusted life years lost from unsafe water, sanitation, and hygiene	DALYs /100,000 population	2006-2019	1	1	Institute for Health Metrics and Evaluation

## *Indicators for Shelter (weight = 20%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Availability of adequate shelter	The percentage of people who responded "Yes" to the survey question: "Have there been times in the past 12 months when you did not have enough money to provide adequate shelter or housing for you and your family?"	percentage	2006-2021	2	1	Gallup
Housing deprivation	The percentage of households deprived in the quality of roofing, walls or flooring; if the household has no walls or if the wall is made of natural, rudimentary or other unidentified materials, if the household has no roof or if the roof is made of natural, rudimentary or other unidentified materials, or if there is a natural floor.	percentage	2006-2020	2	1	Oxford Poverty and Human Development Initiative
Access to clean fuels and technologies for cooking	The percentage of the total population primarily using clean cooking fuels and technologies for cooking.	percentage	2004-2020	3	1	World Bank World Development Indicators
Indoor air quality	The rate of age-standardized disability adjusted life years lost from indoor air pollution from household use of solid fuels	DALYs /100,000 population	2006-2019	1	1	Institute for Health Metrics and Evaluation

## Indicators for Connectedness (weight = 15%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Access to a bank account	The percentage of respondents (aged 15+) who reported having an account at a bank or another type of financial institution or reported personally using a mobile money service during the past 12 months	percentage	2011-2021	2	1	World Bank Global Financial Inclusion
Use of digital payments	The percentage of respondents (aged 15+) who reported using mobile money, a debit or credit card, or a mobile phone to make a payment, or using the internet to pay bills or to buy something online, during the past 12 months.	percentage	2014-2021	2	1	World Bank Global Financial Inclusion
Access to a cellphone	The percentage of households with a cellphone	percentage	2004-2020	3	1	Global Data Lab
Rural access to roads	The percentage of rural people who live within two kilometres of an all-season road. An "all-season road" is a road that is motorable all year round by the prevailing means of rural transport.	percentage	2003-2019	2	0.5	Rural Access Index
Satisfaction with public transportation	The percentage of people who responded "Satisfied" to the survey question: "In the city or area where you live, are you satisfied or dissatisfied with the public transportation systems?"	percentage	2006-2021	2	0.5	Gallup
Satisfaction with roads and highways	The percentage of people who responded "Satisfied" to the survey question: "In the city or area where you live, are you satisfied or dissatisfied with the roads and highways?"	percentage	2006-2021	2	0.5	Gallup

#### *Indicators for Protection from Harm (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Death and injury from road traffic accidents	The rate of age-standardized disability adjusted life years lost due to road injuries (pedestrian road injuries, cyclist road injuries, motorcyclist road injuries, motor vehicle road injuries and other road injuries).	DALYs /100,000 population	2006-2019	1	1	Institute for Health Metrics and Evaluation
Death and injury from forces of nature <sup>†</sup>	The rate of age-standardized disability adjusted life years lost due to forces of nature.	DALYs /100,000 population*	2006-2019	1	0.5	Institute for Health Metrics and Evaluation
Unintentional death and injury	The rate of age-standardized disability adjusted life years lost from unintentional injuries, excluding the adverse effects of medical treatment, and exposure to forces of nature.	DALYs /100,000 population	2006-2019	1	0.5	Institute for Health Metrics and Evaluation
Occupational mortality	The rate of fatal occupational accidents in the labour force.	deaths /100,000 labour force population	2010-2017	1	0.5	International Labour Organisation

<sup>†</sup> This indicator is not normalised by the total number of natural disasters and so captures both the extent of natural disasters in a country, and the infrastructure that protects the population from these events.

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## Health

## *Indicators for Behavioural Risk Factors (weight = 10%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Obesity	The percentage of the adult population who have obesity	percentage	2005-2016	2	1	World Health Organisation (Global Dementia Observatory)
Smoking	The percentage of the 15+ population who currently smoke any tobacco product on a regular basis	percentage	2004-2020	3	1	World Health Organisation
Substance use disorders	The age-standardized prevalence of adults with a substance use disorder, including alcohol, opioid, cocaine, amphetamine, cannabis and other drug use	number /100,000 population	2006-2019	1	1	Global Burden of Disease study

## Indicators for Preventative Interventions (weight = 15%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Diphtheria immunisation	The percentage of children aged 12-23 months who received DPT vaccinations before 12 months or at any time before the survey.	percentage	2004-2020	3	1	World Health Organisation
Measles immunisation	The percentage of children aged 12-23 months who received the measles vaccination before 12 months or at any time before the survey.	percentage	2004-2020	3	1	World Health Organisation
Hepatitis immunisation	The percentage of children aged 12-23 months who received hepatitis B vaccinations before 12 months, or at any time before the survey.	percentage	2005-2021	3	1	World Health Organisation
Contraceptive prevalence	The percentage of women who are practicing, or whose sexual partners are practicing, at least one modern method of contraception	percentage	2004-2020	3	1	United Nations International Children's Emergency Fund
Antenatal care coverage	The percentage of women aged 15-49 years who were attended to at least once during pregnancy by a skilled health personnel (doctor, nurse or midwife).	percentage	2004-2020	3	1	United Nations International Children's Emergency Fund
Existence of national screening programs	A composite measure of whether a country has a national screening program for cervix cancer, breast cancer and HbA1c testing.	index, 0-1	2013-2019	2	0.5	World Health Organisation

#### *Indicators for Care Systems (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Healthcare coverage	The percentage of population without healthcare coverage, either through private insurance, or state-provided coverage (regardless of whether they are able to effectively access healthcare through that coverage).	percentage	2001-2011	4	0.5	International Labour Organisation
Health facilities	A composite measure based on, (a) the density of hospitals, (b) density of mental hospitals, (c) hospital beds per capita and (d) density of mental outpatient facilities	index, 0-0.6	2006-2022	1	1	World Health Organisation
Health practitioners and staff	A composite measure based on, (a) the concentration of physicians, (b) concentration of dentists and (c) the concentration of nurses and midwives, amongst the adult population.	index, 0-1	2006-2022	1	1	World Health Organisation
Births attended by skilled health staff	The percentage of births attended by personnel trained to give the necessary supervision, care, and advice to women during pregnancy, labour, and the postpartum period.	percentage	2004-2020	3	1	United Nations International Children's Emergency Fund
Tuberculosis treatment coverage	The percentage of tuberculosis cases that are treated.	percentage	2004-2020	3	0.5	World Health Organisation
Antiretroviral HIV therapy	The percentage of adults and children on antiretroviral therapy among all adults and children living with HIV	percentage	2004-2020	3	1	Joint United Nations Programme on HIV and AIDS
Satisfaction with healthcare	The percentage of people who responded "Satisfied" to the survey question: "In the city or area where you live, are you satisfied or dissatisfied with the availability of quality healthcare?"	percentage	2006-2021	2	1	Gallup

## *Indicators for Mental Health (weight = 10%)*

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Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Emotional wellbeing	A composite measure, based on the percentages of people reporting that they (a) didn't experience sadness, (b) didn't experience stress, and (c) did experience enjoyment over the previous day.	index, 0-1	2006-2021	2	0.5	Gallup
Depressive disorders	The age-standardized rate of years lived with disability from depressive disorders.	years /100,000 population	2006-2019	1	1	Global Burden of Disease study
Suicide	The age-standardized death rate from suicide.	deaths /100,000 population	2004-2019	3	1	World Health Organisation

#### *Indicators for Physical Health (weight = 20%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Physical pain	The percentage of people who responded "Yes" to the survey question: "Did you experience the following feelings during a lot of the day yesterday? How about physical pain?"	percentage	2006-2021	2	0.5	Gallup
Health problems	The percentage of people who responded "Yes" to the survey question: "Do you have any health problems that prevent you from doing any things people your age normally can do?"	percentage	2006-2021	2	0.5	Gallup
Communicable diseases <sup>†</sup>	The age-standardized rate of years lived with disability from communicable diseases, excluding maternal and neonatal disorders, and nutritional deficiencies.	years /100,000 population	2006-2019	1	2	Global Burden of Disease study
Non-communicable diseases	The age-standardized rate of years lived with disability from non- communicable diseases, excluding mental disorders and substance use disorders	years /100,000 population	2006-2019	1	0.5	Global Burden of Disease study
Raised blood pressure*	The percentage of the 18+ population with raised blood pressure.	percentage	2003-2015	4	0.5	World Health Organisation

<sup>+</sup> Expert advisors felt it was worth noting that countries with effective health care systems are likely to report more accurate figures for prevalence of diseases (both communicable and non-communicable), whereas poorly functioning health systems may under-report prevalence figures.

<sup>‡</sup> It's worth noting that raised blood pressure is already counted under non-communicable diseases, but expert advice was that this was important enough in its own right to be included as a separate indicator.

## *Indicators for Longevity (weight = 30%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Maternal mortality	The rate of women who die from pregnancy-related causes while pregnant, or within 42 days of pregnancy termination per 100,000 live births.	deaths /100,000 live births	2004-2017	3	1	World Bank World Development Indicators
Under-5 mortality	An estimate of the proportion of current newborns who will not survive until age 5, based on the age-specific death rates for the age groups between 0 and 5.	number /1,000 under 5 years-old	2004-2020	3	1	World Bank World Development Indicators
5-14 mortality	An estimate of the proportion of current 5 year olds who will not survive until age 14, based on the age-specific death rates for the age groups between 5 and 14.	number /1,000 between 5-14 years-old	2004-2020	3	0.5	United Nations Inter-agency Group for Child Mortality Estimation
15-60 mortality	An estimate of the proportion of current 15 year olds who will not survive until age 60, based on the age-specific death rates for the age groups between 15 and 60	number /1,000 between 15-60 years-old	2004-2020	3	2	World Bank World Development Indicators
Life expectancy at 60	The average expected remaining years of life left at age 60, based on current mortality rates	years	2003-2019	3	1	World Health Organisation

#### **Education**

#### *Indicators for Pre-Primary Education (weight = 5%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Pre-primary enrolment	Total enrolment in pre-primary education regardless of age expressed as a percentage of the population of the official age for the respective level of education.	percentage	2005-2021	2	1	UNESCO Institute for Statistics

#### *Indicators for Primary Education (weight = 20%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Primary enrolment	The percentage of primary aged children enrolled in primary education	percentage	2004-2019	3	1	UNESCO Institute for Statistics
Primary completion <sup>†</sup>	Percentage of a cohort of children or young people aged 3-5 years above the intended age for the last grade of primary school who have completed that grade.	percentage	2004-2020	3	1	UNESCO Institute for Statistics
Primary education quality	The mean score of harmonised learning outcomes at the primary level for the years 1965-2015.	score, 0-625	2004-2017	5	0.5	Angrist et al.

† Individuals who graduate primary education in a specific year, but are not in the primary graduation age cohort are still counted in the total number of graduates.

#### Indicators for Secondary Education (weight = 30%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Secondary school enrolment	The percentage of secondary aged children enrolled in secondary education.	percentage	2004-2019	2	1	UNESCO Institute for Statistics
Lower-secondary completion <sup>†</sup>	Percentage of a cohort of children or young people aged 3-5 years above the intended age for the last grade of lower secondary school who have completed that grade.	percentage	2004-2020	3	1	UNESCO Institute for Statistics
Access to quality education	A measure of the degree to which high quality basic education is guaranteed to all, being sufficient to enable them to exercise their basic rights as adult citizens.	coding, 0-4	2005-2021	2	1	Varieties of Democracy
Secondary education quality	The mean score of harmonised learning outcomes at the secondary level across all available subjects.	score, 0-625	2006-2015	6	2	Angrist et al.

† Individuals who graduate lower-secondary education in a specific year, but are not in the lower-secondary graduation age cohort are still counted in the total number of graduates.

#### *Indicators for Tertiary Education (weight = 20%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Tertiary enrolment	The ratio of total tertiary enrolment, regardless of age, to the population of the official tertiary level age group.	percentage	2004-2020	3	1	UNESCO Institute for Statistics
Tertiary completion <sup>†</sup>	Gross graduation ratio from first degree programmes (ISCED 6 and 7) in tertiary education.	percentage	2005-2021	1	1	UNESCO Institute for Statistics
Average quality of higher education institutions <sup>‡</sup>	A composite measure, made from the score given to the top-1000 universities in the QS World University Rankings and TES Higher Education World University Rankings, normalised by number of higher education institutions in the country.	score, 0-8*	2012-2022	1	0.5	QS World University Rankings & TES University Rankings
Skillset of university graduates	"In your country, to what extent do graduating students from university possess the skills needed by businesses?"	expert survey, 1-7	2017-2019	1	1	World Economic Forum Global Competitiveness Index
Quality of vocational training	"In your country, how do you assess the quality of vocational training?"	expert survey, 1-7	2017-2019	1	1	World Economic Forum Global Competitiveness Index

† Individuals who graduate tertiary education in a specific year, but are not in the tertiary graduation age cohort are still counted in the total number of graduates.

\* A score of 0-4 is given to each university in the country (1-50 is given 4, 51-150 is given 3, 151-350 is given 2, 351-700 is given 1, 701-1000 is given 0.25), depending on that university's rank according to QS' Rankings, and TES' Rankings. Scores are totalled for the country and divided by the overall number of higher education institutions in that country.

## *Indicators for Adult Skills (weight = 25%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Adult literacy	The percentage of people ages 15 and above who can both read and write to such a degree that they are able to understand a short simple statement about their everyday life	percentage	2004-2020	3	1	UNESCO Institute for Statistics
Education level of adult population	A composite measure based on, (a) the percentage of the population without any education, (b) the proportion of workers with secondary education, and (c) the proportion of workers with tertiary education.	index, 0-1	2006-2018	1	1	Barro and Lee dataset
Women's average years in school	The average number of years of primary, secondary or tertiary education attended by women aged between 25 and 34 years old.	years	2004-2015	4	1	Institute for Health Metrics and Evaluation
Education inequality	The Gini coefficient of education distribution among 15+ population, accounting for average years of schooling among the population.	index, 0-1	2005-2010	3	0.5	Castello-Climent and Domenech
Digital skills among population	"In your country, to what extent does the active population possess sufficient digital skills (e.g. computer skills, basic coding, digital reading)?"	expert survey, 1-7	2017-2019	1	0.5	World Economic Forum Global Competitiveness Index

## Natural Environment

*Indicators for Emissions (weight = 15%)* 

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Black carbon emissions	A composite measure of the total level of black carbon emissions of a country, normalised by share of world GDP and population.	index, 0-1	2002-2018	5	1	Emissions Database for Global Atmospheric Research
CO2 emissions	A composite measure of the total level of CO2 emissions of a country, normalised by share of world GDP and population	index, 0-1	2004-2020	3	2	World Bank World Development Indicators
Methane emissions	A composite measure of the total level of methane emissions of a country, normalised by share of world GDP and population.	index, 0-1	2004-2019	3	1	Emissions Database for Global Atmospheric Research
NOx emissions	A composite measure of the total level of NOx emissions of a country, normalised by share of world GDP and population.	index, 0-1	2002-2018	5	1	Emissions Database for Global Atmospheric Research
SO2 emissions	A composite measure of the total level of SO2 emissions of a country, normalised by share of world GDP and population.	index, 0-1	2002-2018	5	1	Emissions Database for Global Atmospheric Research

#### Indicators for Exposure to Air Pollution (weight = 15%)

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Exposure to fine particulate matter	The percentage of the population whose exposure to PM2.5 is above the World Health Organization thresholds	percentage	2008-2015	4	2	"Yale and Columbia Universities (Environmental Performance Index)"
Health impact of air pollution	The rate of age standardised disability adjusted life years lost from exposure to PM2.5 pollution, excluding household air pollution.	DALYs /100,000 population	2005-2019	2	2	Institute for Health Metrics and Evaluation
Satisfaction with air quality	The percentage of people responding "Satisfied" to the survey question: "In the city or area where you live, are you satisfied or dissatisfied with the quality of air?"	percentage	2006-2021	1	0.5	Gallup

#### *Indicators for Forest, Land and Soil (weight = 20%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Flood occurrence	A composite measure based on the number of occurrences of floods within a country between 1985 and 2011.	index, 0-5	2011	4	1	World Resources Institute
Forest area	The percentage of total land area that is covered by forest.	percentage	2004-2020	3	1	Food and Agriculture Organisation
Sustainable nitrogen management	A composite measure assessing the sustainable nitrogen management of a country, based on two components: (a) Nitrogen Use Efficiency, and (b) Yield. The index considers how far a countries performance in these two components is from two "optimal" levels of performance. <sup>†</sup>	index, 0-√(2)	2001-2015	6	1	Yale and Columbia Universities (Environmental Performance Index)

† The SNMI uses ideal Nitrogen Use Efficiency (NUE) as 1, and ideal Yield as 90kg N/ha/yr, and is based on the Euclidean distance of a countries position in each component from these optimal thresholds.

## *Indicators for Freshwater (weight = 20%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Freshwater withdrawal	The domestic freshwater withdrawal, as a percentage of renewable resources	percentage	2002-2018	3	1	Food and Agriculture Organisation
Renewable water resources	The long-term average annual flow of rivers (surface water) and groundwater per capita.	m <sup>3</sup> per person	2002-2018	2	1	Food and Agriculture Organisation
Satisfaction with water quality	The percentage of people responding "Satisfied" to the survey question: "In the city or area where you live, are you satisfied or dissatisfied with the quality of water?"	percentage	2006-2021	1	1	Gallup
Wastewater treatment	The percentage of collected, generated, or produced wastewater that is treated.	percentage	2001-2017	6	1	"Yale and Columbia Universities (Environmental Performance Index)"

#### *Indicators for Oceans (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Overexploitation of fish stocks	The percentage of fish stocks overexploited and collapsed.	percentage	2002-2018	5	1	Yale and Columbia Universities (Environmental Performance Index)
Clean ocean water	A composite measure of the degree to which ocean regions are free of contaminants such as: (a) chemicals, (b) eutrophication, (c) human pathogens, and (d) trash.	index, 0-100	2012-2021	1	1	Ocean Health Index
Stability of marine biodiversity <sup>†</sup>	A composite measure of the overexploitation of fish stocks, and health of marine ecosystems, based on the change in the mean trophic level of fish caught by a country since 1950.	index, 0-100	2014	5	1	Yale and Columbia Universities (Environmental Performance Index)

t Using data presented in the EPI on stability of the Regional Marine Trophic Index over time.

## *Indicators for Preservation Efforts (weight = 15%)*

Indicator name	Description	Unit (* = Logged)	Years of coverage	Index year offset	Weighting	Source
Protection for biodiverse areas <sup>†</sup>	A composite measure based on the proportion of key biodiverse areas that are covered as protected areas, based on three types of biodiverse areas: (a) terrestrial, (b) freshwater, and (c) marine.	index, 0-1	2006-2022	1	1	United Nations sustainable development goals - UNSDG
Terrestrial protected areas	The percentage of total land area that is at least partially protected, designated by national authorities as scientific reserves with limited public access, national parks, natural monuments, nature reserves or wildlife sanctuaries, protected landscapes, and areas managed mainly for sustainable use.	percentage	2016-2021	1	1	World Database on Protected Areas
Marine protected areas <sup>‡</sup>	The percentage of territorial waters that have been reserved by law, or other effective means to protect part or all of the enclosed environment.	percentage	2016-2021	1	1	World Database on Protected Areas
Pesticide regulation	A composite measure of whether countries allow, restrict, or ban the 'Dirty Dozen' Persistent Organic Pollutants (POPs).	index, 0-25	2004-2012	3	1	Yale and Columbia Universities (Environmental Performance Index)
Long term management of forest areas	The percentage of forest area with a long-term management plan.	percentage	2004-2020	2	1	Food and Agriculture Organisation
Satisfaction with preservation efforts	The percentage of people responding "Satisfied" to the survey question: "Are you satisfied with efforts to preserve the environment?"	percentage	2006-2021	1	1	Gallup

† For landlocked countries, the average of terrestrial and freshwater protections were used instead.

‡ For landlocked countries, this indicator was excluded.

## Sources used in the 2023 Prosperity Index

Code	Source Full Name	Web Address
AD	Aswath Damodaran	http://pages.stern.nyu.edu/~adamodar/New_Home_Page/ data.html
AltAng&Pat	Angrist et al.	https://datacatalog.worldbank.org/search?q=harmo-nized%20 learning%20outcomes%20hlo%20database
BL	Barro and Lee dataset	http://www.barrolee.com/
BTI	Bertelsmann Stiftung Transformation Index	https://www.bti-project.org/en/home/
Cas&Dom	Castello-Climent and Domenech	https://ideas.repec.org/p/iei/wpaper/1201.html
Chinn-Ito	Chinn-Ito Index	http://web.pdx.edu/~ito/Chinn-Ito_website.htm
CIRIGHTS	CIRIGHTS Dataset	https://www.binghamton.edu/institutes/hri/researcher-re-sources. html
CSP	Center for Systemic Peace	https://www.systemicpeace.org/
CW	Climate Watch	https://www.climatewatchdata.org/ghg-emissions?end_ year=2019&start_year=1990
ECI	Economic Complexity Index	https://oec.world/en/rankings/country/eci/
EDGAR	Emissions Database for Global Atmospheric Research	https://www.eea.europa.eu/themes/air/links/data-sources/ emission-database-for-global-atmospheric
EPI	Yale and Columbia Universities (Environmental Performance Index)	https://epi.envirocenter.yale.edu/
FAO	Food and Agriculture Organisation	http://www.fao.org/home/en/
FH	Freedom House	https://freedomhouse.org/
FI	Fraser Institute	https://www.fraserinstitute.org/
Gallup	Gallup	https://www.gallup.com/home.aspx
GBD	Global Burden of Disease study	http://www.healthdata.org/gbd
GCB	Global Carbon Budget	https://www.icos-cp.eu/science-and-impact/global-carbon-budget
GDL	Global Data Lab	https://globaldatalab.org/
GSI	Global Slavery Index	https://www.globalslaveryindex.org/
GSMA	Groupe Spéciale Mobile Association	https://www.gsma.com/
GTD	Global Terrorism Database	https://www.start.umd.edu/gtd/
Harvard	Harvard database	https://dataverse.harvard.edu/dataset. xhtml?persistentId=doi:10.7910/DVN/8RPC9E
IBNET	International Benchmarking Network for Water and Sanitation Utilities	https://www.ib-net.org/
IBP	International Budget Partnership	https://www.internationalbudget.org/
IDEA	International Institute for Democracy and Electoral Assistance	https://www.idea.int/

## We obtain our data from the following sources:

Code	Source Full Name	Web Address
IDMC	Internal Displacement Monitoring Center	http://www.internal-displacement.org/
IEA	International Energy Agency	https://www.iea.org/
IHME	Institute for Health Metrics and Evaluation	http://www.healthdata.org/
ILGA	International Lesbian, Gay, Bisexual, Trans and Intersex Association	https://ilga.org/
ILO	International Labour Organisation	https://www.ilo.org/global/langen/index.htm
IMF	International Monetary Fund	https://www.imf.org/external/index.htm
IMF-FAS	International Monetary Fund Financial Access Survey	https://data.imf.org
IMF-WEO	International Monetary Fund World Economic Outlook	https://www.imf.org/external/pubs/ft/weo/2019/01/weodata/ index.aspx
IRENA	International Renewable Energy Agency	https://www.irena.org/
ITU	International Telecommunications Union	https://www.itu.int/en/Pages/default.aspx
JME	UNICEF/ WHO/World Bank: Joint child malnutrition estimates (JME)	https://www.who.int/news/item/06-05-2021-the-unicef-who- wb-joint-child-malnutrition-estimates-group-released-new-data- for-2021
JMP	WHO/UNICEF Joint Monitoring Programme for Water Supply and Sanitation	https://www.unwater.org/publication_categories/ whounicef-joint-monitoring-programme-for-water-sup-ply- sanitation-hygiene-jmp/
OECD	Organisation of Economic Co-operation and Development	https://www.oecd.org/
ОНІ	Ocean Health Index	http://www.oceanhealthindex.org/
OPHI	Oxford Poverty and Human Development Initiative	https://ophi.org.uk/
Pew	Pew Research Center	https://www.pewresearch.org/
PTS	Amnesty International & US State Department Political Terror Scale	http://www.politicalterrorscale.org/
QS	QS World University Rankings	https://www.topuniversities.com/qs-world-university-rankings
RAI	Rural Access Index	https://datacatalog.worldbank.org/dataset/rural-access-in-dex-rai
RsF	Reporters Without Borders	https://rsf.org/en
TE	Trading Economics	https://tradingeconomics.com/
TES	TES University Rankings	https://www.timeshighereducation.com/content/world-uni- versity-rankings
UCDP	Uppsala Conflict Data Program	https://ucdp.uu.se/
UIC	International Union of Railways	https://uic.org/
UNAIDS	Joint United Nations Programme on HIV and AIDS	https://www.unaids.org/en
UNCOM	United Nations Comtrade Database	https://comtrade.un.org/
UNCTAD	United Nations Trade Data	https://unstats.un.org/unsd/trade/default.asp
UNESCO	UNESCO Institute for Statistics	http://uis.unesco.org/
UNESD	United Nations Energy Statistics Database	https://unstats.un.org/unsd/energy/edbase.htm

Code	Source Full Name	Web Address
UNFPA	United Nations Population Fund	https://www.unfpa.org/
UNHCR	United Nations High Commissioner for Refugees	https://www.unhcr.org/en-us/
UNICEF	United Nations International Children's Emergency Fund	https://www.unicef.org/
UNIGME	United Nations Inter-agency Group for Child Mortality Estimation	https://childmortality.org/
UNPD	United Nations Population Division	https://www.un.org/development/desa/pd/
UNSD	United Nations Statistics Division	https://unstats.un.org/UNSDWebsite/
UNSDG	United Nations sustainable development goals - UNSDG	https://sdgs.un.org/goals
V-DEM	Varieties of Democracy	https://www.v-dem.net/en/
WB-ALT	World Bank Alternative Indicator	https://www.worldbank.org/en/programs/business-enabling- environment/alternative-existing-indicators#:~:text=These%20 alternative%20indicators%20correspond%20to,stages%20 (WBG%20Enterprise%20Surveys).
WB-CPIA	World Bank Group, CPIA database	https://datacatalog.worldbank.org/search/dataset/0038988
WB-DI	World Bank World Development Indicators	https://datacatalog.worldbank.org/dataset/world-develop-ment- indicators
WB-ES	World Bank Enterprise Surveys	https://www.enterprisesurveys.org/
WB-GED	World Bank Global Electrification Database	https://energydata.info/
WB-GFI	World Bank Global Financial Inclusion	https://globalfindex.worldbank.org/
WB-LPI	World Bank Logistics Performance Index	https://lpi.worldbank.org/
WDPA	World Database on Protected Areas	https://www.protectedplanet.net/
WEF	World Economic Forum Global Competitiveness Index	http://reports.weforum.org/global-competitiveness-re-port-2018/
WGI	Worldwide Governance Indicators	https://info.worldbank.org/governance/wgi/
WHO	World Health Organisation	https://www.who.int/
WHO-GDO	World Health Organisation (Global Dementia Observatory)	https://www.who.int/mental_health/neurology/dementia/ Global_Observatory/en/
WIPO	World Intellectual Property Organisation	https://www.wipo.int/portal/en/index.html
WJP	World Justice Project (Rule of Law Index)	https://worldjusticeproject.org/our-work/wjp-rule-law-index
WomStat	The WomanStats Project	http://www.womanstats.org/
WRI	World Resources Institute	https://www.wri.org/
WTO	World Trade Organisation	https://www.wto.org/
WVS	World Values Survey, European Values Survey, Global Barometer Surveys, Arab Barometer, Latinobarometro	https://www.worldvaluessurvey.org/wvs.jsp, https://europe- anvaluesstudy.eu, https://www.globalbarometer.net, https:// www.arabbarometer.org, https://www.latinobarometro.org/ latContents.jsp

# Appendix

#### Changes made to the Index

#### Structural changes:

The changes can be categorised under (1) structural changes, (2) data ingest changes, (3) indicator source change, and (4) model parameter review.

#### 1. Structural changes

We have made small adjustments to the framework of the Prosperity Index. These are outlined below.

- Relocating elements Two elements and their associated indicators have been moved from one
  pillar to another. The first is Social Tolerance, which has moved from Personal Freedom to Social
  Capital. This element contains three indicators (Perceived Tolerance of Ethnic Minorities, Perceived
  Tolerance of LGBT individuals and Perceived Tolerance of Immigrants). The second element is Institutional Trust, which has moved from Social Capital to Governance. This element contains six
  indicators (Confidence in Local Police, Public Trust in Politicians, Confidence in Financial Institutions and Banks, Confidence in Judicial Systems and Courts, Confidence in National Government,
  and Confidence in military)
- Adding new indicators The indicator "State ownership of the economy" was added to the Domestic Market Contestability of the Enterprise Conditions pillar. The new variable measures the extent to which private ownership of economic activity exists in any given country. The new indicator captures new information that wasn't included in previous editions of the Prosperity Index.

#### 2. Indicator source change

We have made changes to where we have sourced several indicators. The majority of changes are to the World Bank Doing Business indicators:

Removing and replacing World Bank Doing Business indicators – The World Bank decided to
discontinue the release of its Doing Business report, which resulted in the discontinuation of 20
indicators. This issue affected three pillars: Investment Environment (10 indicators), Enterprise
Conditions (6 indicators), and Infrastructure and Market Access (4 indicators). We replaced these
variables using multiple sources such as the World Economic Forum, Massachusetts Institute of
Technology, and the World Bank. The selection criteria rested on the coverage of years and countries of interest as well as the correlation between the new and old variables on the one hand, and
the new variables and their elements on the other hand.

Pillar	Element	Old indicator	New indicator
Investment environment	Property Rights	<ul> <li>Procedures to Register Property</li> <li>Quality land Administration</li> </ul>	• Quality of Land Administration (WEF).
	Investors Protections • Extent Connegulation • Extent Share Governand • Recovery For the strength for th		<ul> <li>Conflict of Interest Regulation (WEF).</li> <li>Shareholder Governance (WEF).</li> <li>Insolvency Recovery Rate (WEF).</li> <li>Insolvency Regulatory Framework (WEF).</li> </ul>
	Contract Enforcement	<ul> <li>Legal costs</li> <li>Judicial Administration Index</li> <li>Time to Resolve Commercial cases</li> </ul>	<ul> <li>Contract Intensity (MIT).</li> <li>Property Rights and Rule-Based Governance Rating (World Bank).</li> </ul>
	Financing Ecosystems	• Depth of Credit Information Index	<ul> <li>Private Credit Bureaus Coverage (World Bank).</li> <li>Public Credit Bureaus Coverage (World Bank).</li> </ul>
Enterprise Conditions	Environment for Business Creation	• Ease of Starting a Business	
	Burden of Regulation	<ul> <li>Time Spent Complying With Regulations</li> <li>Number of Tax Pay- ments</li> <li>Building Quality Control Index</li> <li>Burden of Obtaining a Building Permit</li> </ul>	<ul> <li>Days to Obtain a Construction Related Permit (World Bank).</li> <li>Taxes and Bureaucracy (World Bank).</li> <li>Ease of Paying Taxes (WEF).</li> </ul>
	Labour Market Flexibility	<ul> <li>Flexibility of Employment Contracts</li> </ul>	

Pillar	Element	Old indicator	New indicator
Infrastructure and Market Access	Energy	<ul> <li>Reliability of Electricity Connections</li> <li>Ease of Establishing an Electricity Connection</li> </ul>	<ul> <li>Number of Electrical Outages in a Typical Month (World Bank).</li> <li>Average Duration of a Typical Electrical Outage (World Bank).</li> <li>Time to Obtain an Electrical Connection Upon Application (World Bank).</li> </ul>
	Border Administration	<ul> <li>Cost to Comply with Border Regulations and Procedures</li> <li>Time to Comply with Border Regulations and Procedures</li> </ul>	<ul> <li>Number of Documents Required to be Filled Out for Exports (World Bank)</li> <li>Number of Documents Required to be Filled Out for Imports (World Bank)</li> <li>Clearance Time with Physical Inspection (World Bank)</li> <li>Average Time to Clear Exports Through Customs (days) (World Bank)</li> </ul>

• UNESCO education variables – Several UNESCO education indicators have stopped being updated and were replaced. This affected the following indicators: Pre-Primary Net Enrolment, Primary Completion Rate, Tertiary Completion Rate, Lower Secondary Completion Rate and Graduates from Tertiary Education. These indicators were replaced with Gross Enrolment Ratio (Pre-Primary), Completion Rate (Primary Education), Completion Rate (Lower Secondary Education), and Gross Graduation Ratio in Tertiary Education.

## Impact of changes on overall prosperity

In comparing the results of this year's Index with the previous edition we find that the overall results are very similar. Figure 1 shows the overall prosperity scores for the year 2021 from the 2023 Index compared with those from the 2021 Index. While the chart shows that there have been some minor changes to the scores of some countries due to the changes previously outlined, the strength of the relationship between this year's Index and last year's Index is very strong, indicated by the R<sup>2</sup> of 0.99.

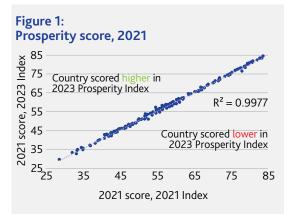
We also see from Figure 2 that global prosperity has followed a similar trend when viewed through the lens of each of the 2021 Index and the 2023 Index.

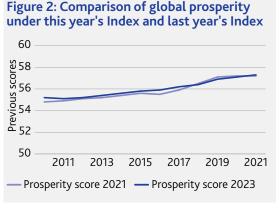
Some countries have been affected more than others by the changes — we can assess the impact by comparing the 2021 ranks of each country based on the 2021 Index and the 2023 Index. As we see in Figure 3, sixty-three countries are ranked the same for the year 2020 in both the 2020 Index and the 2021 Index. A further forty-four countries saw a rank change of +/- 1. All but seven countries changed by four ranks or fewer, with five countries increasing by more than four ranks, and two decreasing by more than four ranks.

#### Impact of changes at the pillar level

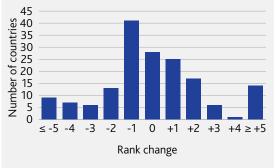
In order to understand the impact of the changes made at the pillar level, we compared country scores in the 2021 Index against the scores of the 2020 Index and identified and examined the outliers. The following Figures 4(a-l) show the results for each of the twelve pillars, displaying scatter plots of 2020 country scores in each Index.

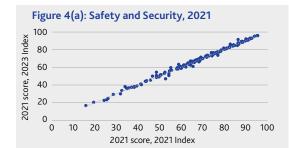
There is a strong relationship between the this year's scores and the previous edition. Note that Social Capital shows the most variation, as we removed one element and brought in another, resulting in some change between editions.





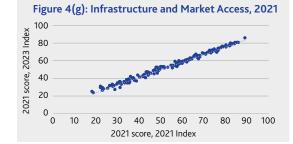




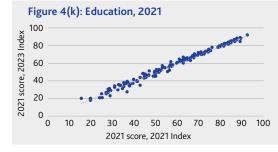
















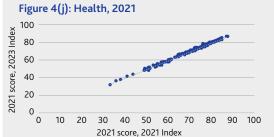


















LEGATUM INSTITUTE

11 Charles Street London W1J 5DW United Kingdom

t: +44 (0) 20 7148 5400 www.li.com

Twitter: @ProsperityIndex

www.prosperity.com

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