Use of SDGs indicators for Green Deal, Ecological Transition and New National Strategy

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Measuring sustainability

The **economics, social, environmental, institutional** goals have to be developed considering an **integrated approach**, from global to local, **to leave no one behind**
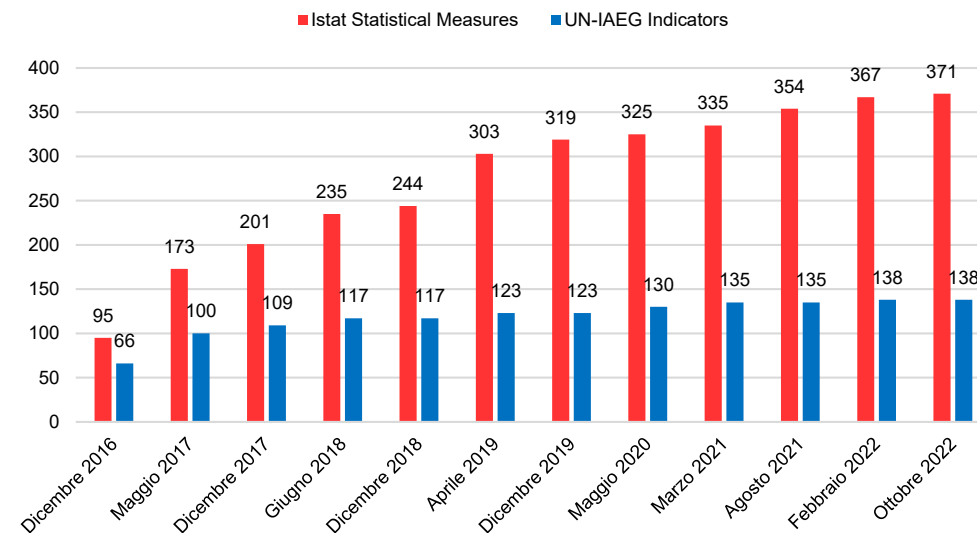
In concrete: **disaggregated and integrated statistical measures**

SDGs Sistan Istat System from 2016: together with other istitutions

Statistical measures used in National Sustainable Development Strategy, in Regional Strategy, in Urban strategy, in Ecological Transition Plan

Disseminated statistical measures are **371**

considering **138** UN-IAEG-SDGs indicators

Legend: ■ Istat Statistical Measures   ■ UN-IAEG Indicators

Month	Istat Statistical Measures	UN-IAEG Indicators
Dicembre 2016	95	66
Maggio 2017	173	100
Dicembre 2017	201	109
Giugno 2018	235	117
Dicembre 2018	244	117
Aprile 2019	303	123
Dicembre 2019	319	123
Maggio 2020	325	130
Marzo 2021	335	135
Agosto 2021	354	135
Febbraio 2022	367	138
Ottobre 2022	371	138

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SUSTAINABLE DEVELOPMENT G♢ALS

Measuring sustainability

Every year SDGs Statistical reports in Italian and in English

2022 English Report will be published shortly

Every six months update of indicators

ISTAT INDICATORS FOR SUSTAINABLE DEVELOPMENT GOALS

WELL BEING AND SUSTAINABILITY

THE MEASUREMENT OF WELL BEING

BES Report

Indicators

Bes in the Economic and Financial Document

Bes at local level

SUSTAINABLE DEVELOPMENT GOALS

SDGs Report

Istat indicators for sustainable development

Useful links

The United Nations Statistics Division entrusted Istat, like other NSOs, with the task of coordinating the production of indicators for measuring sustainable development and monitoring its objectives.

Periodically, Istat presents an update and an extension of breakdowns of the set of statistical measures for monitoring Sustainable Development Goals of 2030 Agenda. Istat publishes yearly the Report on SDGs.

Last update: 12th October 2022

The statistical measures are disseminated in four data files:

- Statistical measures for years 2004-2022 (xlsx)
- Statistical measures for years 1995-2003 (xlsx)
- Statistical measures for years 2004-2022 by gender (xlsx)
- Statistical measures for years 1995-2003 by gender (xlsx)

The statistical measures disseminated are 371 (of which 341 different) for 138 UN-IAEG-SDGs indicators. The last release updates 188 statistical measures respect to February 2022 and introduces 4 new measures.

Data are complemented with the metadata of the disseminated statistical measures included into an xlsx file.

A dashboard with data and charts is also available.

Last edit: **12 October 2022**

https://www.istat.it/it/archivio/275718

https://www.istat.it/it/files//2022/02/2021-SDGS-Report_Inglese.pdf
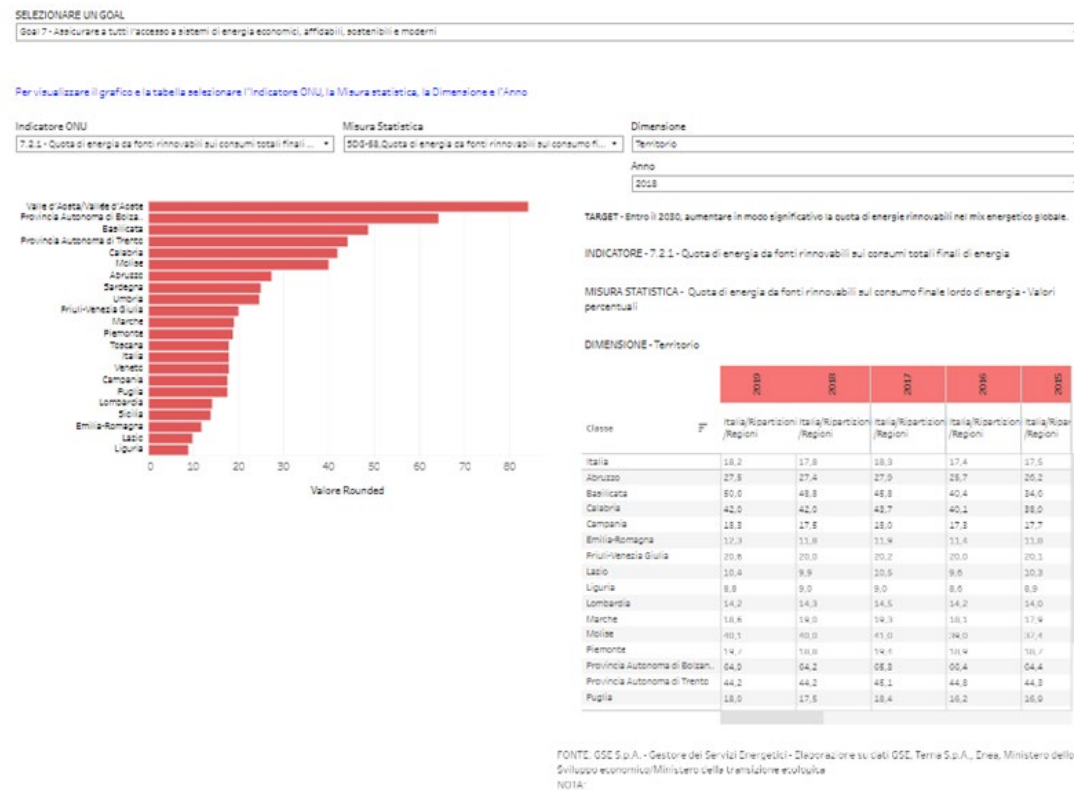
Measuring sustainability

A new dissemination system

Dashboard, indicators, dynamic graphs

ISTAT INDICATORS FOR SUSTAINABLE DEVELOPMENT

SDGS REPORT

INTERACTIVE CHARTS

USEFUL LINKS

https://www.istat.it/en/well-being-and-sustainability/sustainable-development-goals
https://www.istat.it/en/well-being-and-sustainability/sustainable-development-goals/istat-indicators-for-sustainable-development
https://public.tableau.com/app/profile/istat.istituto.nazionale.di.statistica/viz/SDGs_public_2022/SDGs

Measuring sustainability: integration and inclusion

An integrated approach among wellbeing and sustainability (WBS-BES) and disaggregation to leave no one behind

Dimension	Istat-SDGs Statistical Measures	Goal
Degree of urbanization / Municipality / Municipality Type	76	
Region	210	
Province	15	
Gender	123	
Age class	81	
Citizenship / Nationality	54	
Presence of disability	17	

BES		SDGs	
1. Health	4 indicators	4 in Goal 3	
2. Education and training	8 indicators	7 in Goal 4 1 in Goal 8	
3. Work and life balance	10 indicators	2 in Goal 5 8 in Goal 8	
4. Economic well-being (a)	7 indicators	5 in Goal 1 3 in Goal 10	
5. Social relationships			
6. Politics and Institutions (a)	8 indicators	4 in Goal 5 5 in Goal 16	
7. Security	3 indicators	1 in Goal 5 2 in Goal 16	
8. Subjective well-being			
9. Landscape and cultural heritage	2 indicators	1 in Goal 11 1 in Goal 13	
10. Environment (b)	11 indicators	1 in Goal 1 2 in Goal 6 1 in Goal 7 1 in Goal 8 3 in Goal 11 2 in Goal 12 2 in Goal 13 1 in Goal 14 2 in Goal 15	
11. Innovation, research and creativity	3 indicators	3 in Goal 9	
12. Quality of services (a)	8 indicators	2 in Goal 1 3 in Goal 3 1 in Goal 6 2 in Goal 11 1 in Goal 16	

(a) 1 indicator is in more than one goal

(b) 4 indicators are in more than one goal

National Sustainable Development Strategy(NSDS): Which statistical measures ?

**NSDS Istitutional Working Group (by Min of Ecological Transition-MiTE):**

- **Methodological approach to select** a subgroup of statistical measures chosen by the Istat-Sistan SDGs platform, according to the **criteria of Parsimony, Feasibility, Timeliness, Extension and frequency of time series, Sensitivity to public policies, Territorial dimension**
- Sub-set of **43 indicators (2018)** for monitoring the National Strategy of indicators and for the Regional Sustainable Development Strategies interconnected with ESW (BES)

Being updated for different reasons:
- the **Istat statistical measurement** platform has been significantly **enriched** from 2018 to today and the system of indicators was shared by MiTE with the **stakeholders**

- **Development of the National Sustainable Development Strategy 2022 presented to the VNR (July 2022)** at UN-HLPF

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SUSTAINABLE DEVELOPMENT GOALS

National Sustainable Development Strategy: Which statistical measures ?

A new version of the National Sustainable Development Strategy Subset of Indicators : 55 core indicators (2022) interrelated with Ecological Transition Plan indicators and Well-Being-Sustainable (WBS-BES) indicators
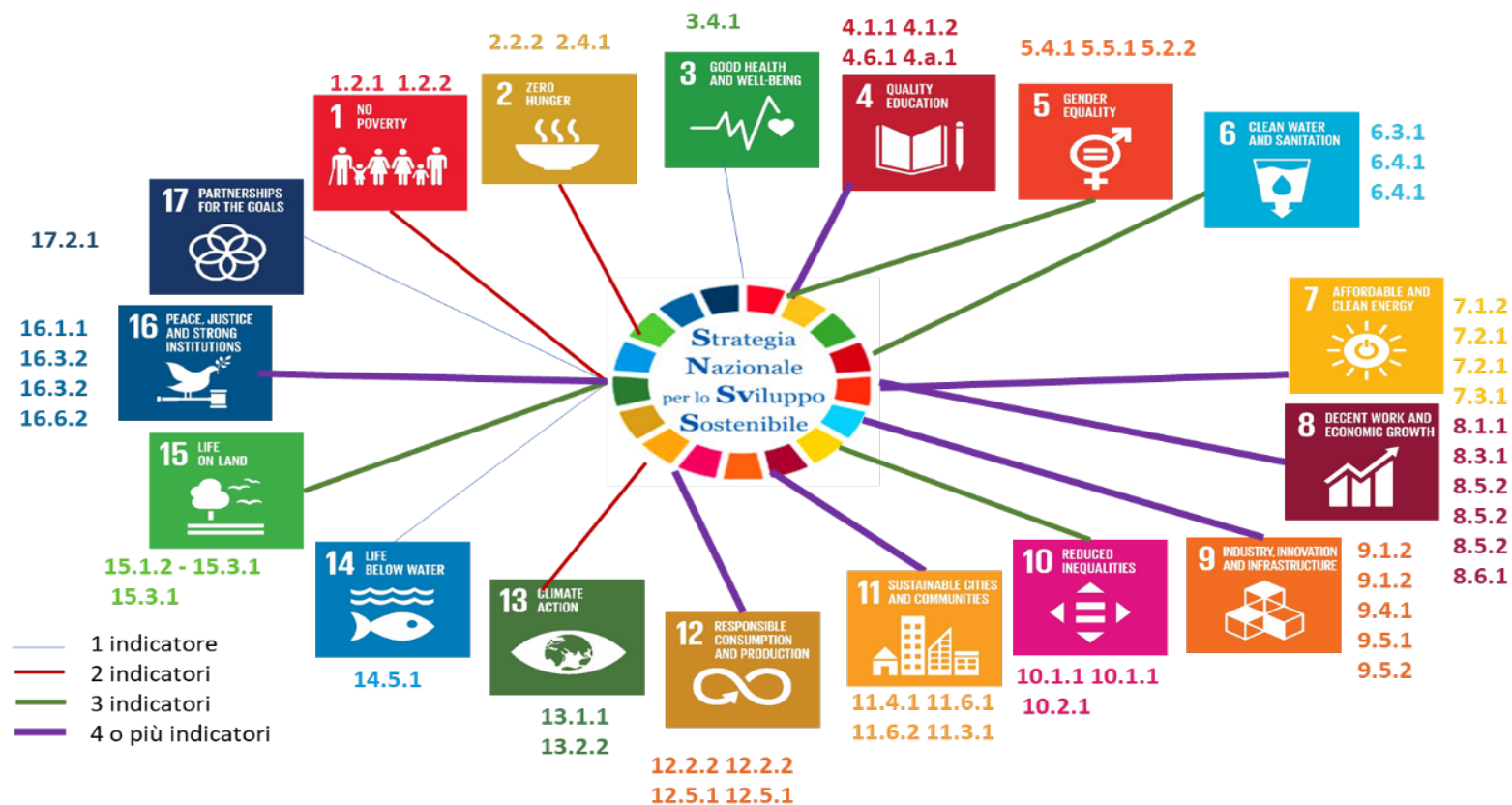
Ecological Transition Plan: Which statistical measures ?

Next Generation UE

Areas of intervention A1. Decarbonization A2. Sustainable mobility A3. Air quality A4. Soil sealing, land consumption and hydrogeological instability A5. Improvement of water resources and related infrastructures; A6. Biodiversity; A7. Sea Protection; A8. Circolar Economy, Bioeconomy and sustainable agriculture

Relevance of the quantitative dimension, which can be declined according also a system of indicators
Core indicators that represent the reference information base (most of them are SDG indicators):

GHG Emissions, GHG Road Trasport Emissions, SO2, Nox , NH3 , COVNM, PM2,5 (one indicator for each),
Population exposed to floods,
Population exposed to landslide risk
Leakage from municipal water mains,
Protected areas,
Marine protected areas,
Circular use rate of materials
Share of energy from renewable sources in gross final consumption,
Number of electric cars (BEVs) or hybrids cars

Ecological Transition Plan: Which statistical measures ?

The extension and complexity of the issues could make it **necessary** to build an **articulated framework of collateral indicators** to provide **additional** information to support the **analysis** of the progress of the PTE

Four dimensions of analysis are taken into account to choose collateral indicators (working progress):

Functions of the indicators: monitoring, analysis of climatic, environmental, social and economic scenarios, with a *territorial perspective* as well (*to leave no one behind*)

Areas of intervention

Transversal dimensions: macroeconomic, production, labor market, social

Criteria: certified quality of official statistics, sensitivity to public policies, feasibility, parsimony, timeliness, extension and frequency of territorial series, territorial dimension

86 indicators were chosen (also among SDGs indicators) interconnected with ESW (BES) indicators

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Green deal: which statistical measures

Eurostat proposed Green Deal Indicators
https://ec.europa.eu/eurostat/cache/egd-statistics/
**distinguished in three groups:**

- **Enabling a green and just transition**
- **Protecting our planet and health**
- **Reducing our Climate impact**

Indicators for Italy could be considered from SDGs indicators

Eu27 data from Eurostat,
Time series from 2009/2010 to 2020/2021

Trend evaluation for Italy and EU27 in medium period and the comparison Italia / Eu27 for the last disposable year

Trends in indicators for monitoring the EGD in Italy and the EU27, by macro-objectives. Years 2009-2010 and 2019-2021 (percentage values)
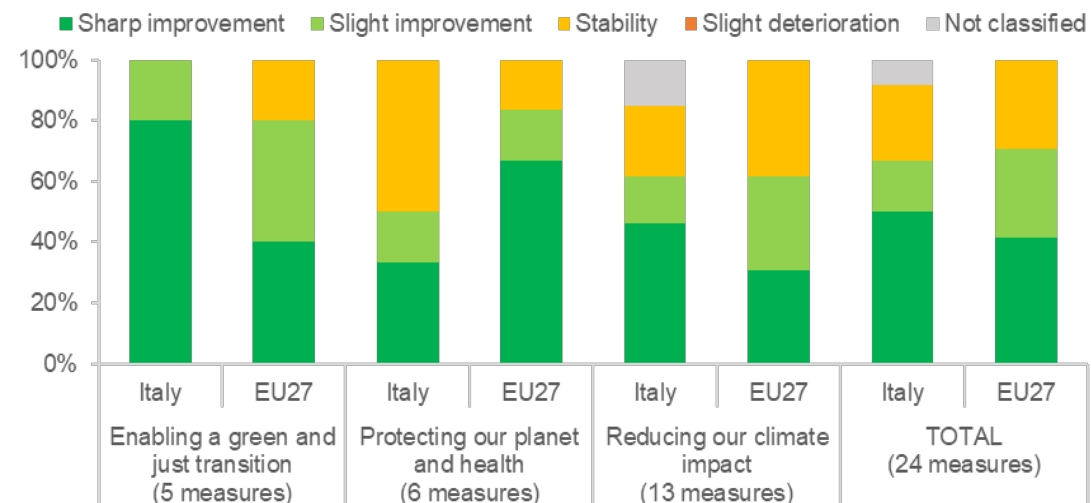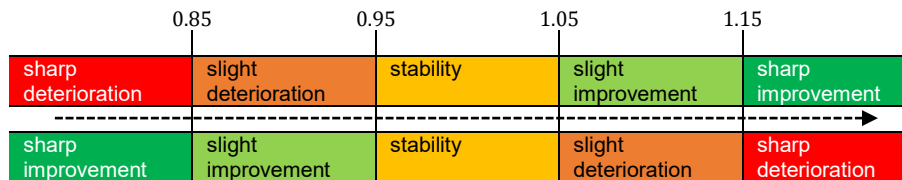
Enabling a green and just transition

Indicator (positive/negative)		Unit	MID-TERM TRENDS (avg. 2015-2021 / avg. 2009-2015)		Italy / EU27 (latest update available for both)
			Italy	**EU27**	
8.4.2	**Domestic material consumption per capita** (negative)	Tonne per inhabitant	sharp improvement	stability	0.57 (2020)
12.5.1	**Circular material use rate** (positive)	Percentage values	sharp improvement	slight improvement	1.69 (2020)
bes	**R&D intensity** (positive)	Percentage of GDP	slight improvement	slight improvement	0.66 (2020)
1.4.1 7.1.1	**Inability to keep home adequately warm** (negative)	Percentage values	sharp improvement	sharp improvement	1.12 (2020)
1.4.1 9.c.1 17.6.1	**Households with fixed and/or mobile broadband connection** (positive)	Percentage values	sharp improvement	sharp improvement	1.30 (2020)

Assessment of mid-term trends

Italy vs. Eu27 comparison

$$\frac{Avg.\,of\,available\,values\,(2015-21)}{Avg.\,of\,available\,values\,(2009-15)}$$

	0.85	0.95	1.05	1.15
POSITIVE INDICATORS (increase desirable)	sharp deterioration	slight deterioration	stability	slight improvement	sharp improvement
NEGATIVE INDICATORS (decrease desirable)	sharp improvement	slight improvement	stability	slight deterioration	sharp deterioration

$$\frac{Italy\,value\,(most\,recent\,available\,also\,for\,Eu27)}{Eu27\,value\,(most\,recent\,available\,also\,for\,Italy)}$$

	0.95	1.05
POSITIVE INDICATORS (increase desirable)	#.### (aaaa)	#.### (aaaa)	#.### (aaaa)
NEGATIVE INDICATORS (decrease desirable)	#.### (aaaa)	#.### (aaaa)	#.### (aaaa)

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SUSTAINABLE DEVELOPMENT GOALS
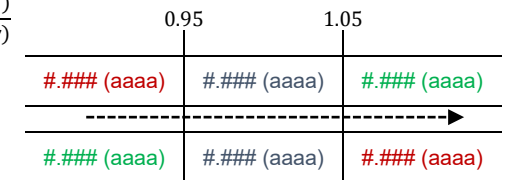
Protecting our planet and health

Indicator (positive/negative)	Unit	MID-TERM TRENDS (avg. 2015-2021 / avg. 2009-2015)		Italy / EU27 (latest update available for both)
		Italy	EU27	
15.1.1 Forest area index (positive)	Percentage values	stability	stability	0.88 (2018)
15.1.2 Protected natural areas [terrestrial] (positive)	Percentage values	stability	sharp improvement	0.89 (2017)
14.5.1 Marine protected areas EUAP (positive)	Km^2	stability	sharp improvement	-- (a)
2.4.1 Share of utilized agricultural land under organic farming (positive)	Percentage values	sharp improvement	sharp improvement	1.80 (2020)
11.6.2 $PM_{2.5}$ annual average concentration in the municipalities capital of the province/metropolitan cities	$\mu g/m^3$	sharp improvement	sharp improvement	1.20 (2019)
PM_{10} annual average concentration in the municipalities capital of the province/metropolitan cities	$\mu g/m^3$	slight improvement	slight improvement	1.24 (2019)

(a)   Not applicable

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Reducing our climate impact (1/2)

Indicator (positive/negative)		Unit	MID-TERM TRENDS (avg. 2015-2021 / avg. 2009-2015)		Italy / EU27 (latest update available for both)
			Italy	EU27	
13.2.2 GHG accounts totals generated by production activities (negative)	Total	Tonne CO_2 equivalent	slight improvement	slight improvement	-- (a)
	A (Agriculture, forestry and fishing)	Tonne CO_2 equivalent	stability	stability	-- (a)
	B + C (Mining and quarrying + Manufacturing)	Tonne CO_2 equivalent	sharp improvement	stability	-- (a)
	D (Electricity, gas, steam and air conditioning supply)	Tonne CO_2 equivalent	sharp improvement	slight improvement	-- (a)
	E (Water supply; sewerage, waste management and remediation activities)	Tonne CO_2 equivalent	stability	slight improvement	-- (a)
7.2.1 Renewable energy share in the gross final energy consumption (positive)	Total	Percentage values	sharp improvement	sharp improvement	0.92 (2020)
	Transport sector	Percentage values	sharp improvement	sharp improvement	1.05 (2020)
	Thermal sector	Percentage values	slight improvement	slight improvement	0.86 (2020)
Electricity from renewable sources (positive)		Percentage values	sharp improvement	sharp improvement	1.02 (2020)

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SUSTAINABLE DEVELOPMENT GOALS

Reducing our climate impact (2/2)

Indicator (positive/negative)		Unit	MID-TERM TRENDS (avg. 2015-2021 / avg. 2009-2015)		Italy / EU27 (latest update available for both)
			Italy	EU27	
7.3.1	Final energy consumption in households per capita (negative)	Kg of oil equivalent	stability	stability	1.50 (2020)
7.1.2	Electric or hybrid passenger cars	Percentage values (b)	sharp improvement	sharp improvement	0.42 (2020)
9.1.2	Freight volumes, by mode of transport — Rail transport (positive)	Percentage values (b)	(not available)	stability	0.79 (2020)
	Freight volumes, by mode of transport — Road transport (negative)	Percentage values (b)	(not available)	stability	1.10 (2020)

(a)   Not applicable, due to partial coverage of Eurostat indicators
(b)   SDG indicator is expressed in absolute values

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SUSTAINABLE DEVELOPMENT GOALS

Sustainability, Climate Change, Ecological Transition and Green Deal: statistics to leave no one behind are necessary

- **The 2030 Agenda focused on sustainability and the absolute need to consider the thematic interdependencies between the environmental, social, economic and institutional domains also in order not to "leave anyone behind» and by expanding developments in climate change**

- **The Green Deal in Europe, the Ecological Transition Plan and the Sustainable Develpoment Strategy in Italy constitute further elements of reference that are currently indispensable.**

Interlinkages SDG
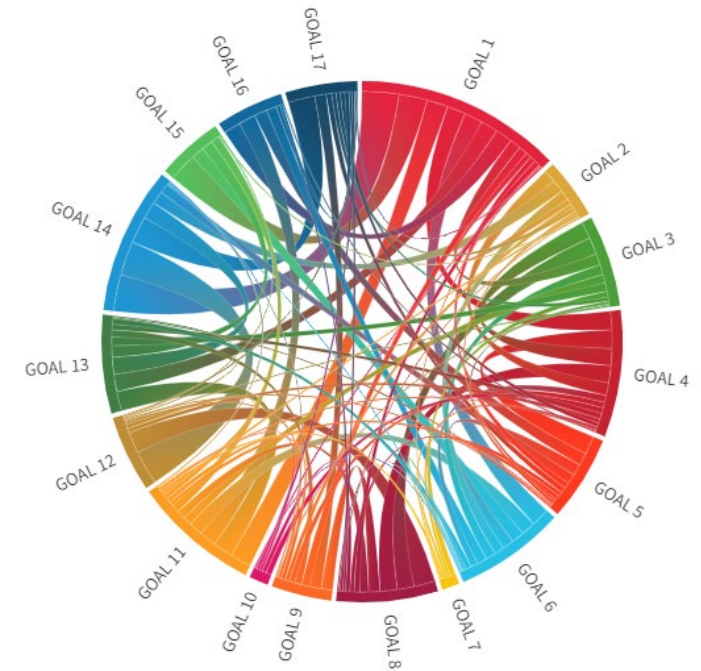
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SUSTAINABLE DEVELOPMENT GOALS

Sustainability, Climate Change, Ecological Transition and Green Deal: statistics to leave no one behind are necessary

- **An increasingly rich statistical information mosaic that integrates the different dimensions, promoting improvements in the production of statistical measures within the Sistan for international and national information demand**

- **From global to local: geostatistical analyzes are a factor of integration of economic, social and environmental statistical measures for sustainability**

- **In Istat the innovative Register of the Place (from archives) considers addresses, geographical microzones, administratives territorial data, buildings and dwellings and if integrated with censuses data and surveys data could be an essential tool to produce SDGs indicators at detailed territorial level**

Thank you

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