frontiers in Political Science

TYPE Original Research
PUBLISHED 21 August 2026
DOI 10.3389/fpos.2026.1927819

Check for updates

OPEN ACCESS

EDITED BY
Euel Elliott,
The University of Texas at Dallas, United States

REVIEWED BY
Fábio Shibao,
Guarulhos University, Brazil
Elsa Gabriel Morgado,
Polytechnic Institute of Bragança (IPB), Portugal

*CORRESPONDENCE
Maria Asensio
maria.asensio@ina.pt

RECEIVED 03 July 2026
REVISED 01 August 2026
ACCEPTED 03 August 2026
PUBLISHED 21 August 2026

CITATION
Asensio M, Ribeiro A and Dias R (2026) From SDG alignment to SDG-ready public administration: institutional capacity, collaborative governance, and trust in Portuguese sustainability governance.
Front. Polit. Sci. 8:1927819.
doi: 10.3389/fpos.2026.1927819

COPYRIGHT
© 2026 Asensio, Ribeiro and Dias. This is an open-access article distributed under the terms of the Creative Commons Attribution License (CC BY). The use, distribution or reproduction in other forums is permitted, provided the original author(s) and the copyright owner(s) are credited and that the original publication in this journal is cited, in accordance with accepted academic practice. No use, distribution or reproduction is permitted which does not comply with these terms.

From SDG alignment to SDG-ready public administration: institutional capacity, collaborative governance, and trust in Portuguese sustainability governance

Maria Asensio[1,2]*, Alexandra Ribeiro[1] and Ricardo Dias[1]

[1]National Institute for Administration (INA), Algés, Portugal, [2]Department of Political Science and Public Policy, ISCTE-University Institute of Lisbon, Lisbon, Portugal

The 2030 Agenda has transformed sustainability from a planning and reporting agenda into a demanding public-administration challenge. Governments are expected not only to align policies with the Sustainable Development Goals (SDGs), but also to coordinate across administrative silos, manage goal interactions and trade-offs, support local implementation, engage stakeholders, monitor progress, and sustain public trust in long-term transformation. This article asks under what conditions Portuguese sustainability governance can move from formal SDG alignment to transformative implementation. The article develops a theory-derived framework centred on five governance requirements: policy coherence, horizontal coordination, vertical coordination, collaborative participation and publicvalue protection, and monitoring-driven learning. Empirically, it adopts a theory-guided diagnostic case-study design combining a structured synthesis of secondary evidence on Portuguese SDG governance with comparative survey analysis using European Social Survey Round 11 (ESS-11) data. The survey component assesses institutional trust, democratic legitimacy, social trust, civic participation, and an author-constructed publicvalue/sustainability orientation index. The Portuguese case shows the development of relevant instruments for strategic planning, SDG reporting, coordination, and local mobilisation, but also reveals uneven implementation capacity across the five governance requirements. Weighted descriptive estimates from ESS-11 indicate that Portugal is close to the ESS-11 average in institutional trust and democratic legitimacy, lower in social trust and civic participation, and higher in the public-value/sustainability orientation index. These descriptive differences are not interpreted as statistically significant unless supported by inferential testing. The findings suggest that effective SDG implementation depends less on the proliferation of first-generation SDG planning and reporting instruments than on the institutional and social capacity to translate formal alignment into coordinated, accountable, participatory, learningoriented, and trusted administrative practice. The Portuguese case therefore illustrates a broader transition from SDG-aligned to SDG-ready public administration, in which transformative implementation depends on governance capacity as much as on formal commitment to the 2030 Agenda.

KEYWORDS
collaborative governance, Portugal, public administration, public value, sustainability governance, sustainable development goals

1 Introduction

The 2030 Agenda for Sustainable Development has changed the governance problem of sustainability. It no longer asks governments only to adopt environmental strategies, produce sustainability reports or monitor selected indicators. It asks public institutions to transform the way policy priorities are defined, coordinated, implemented, monitored and legitimised across sectors, territorial levels and social actors. The 17 SDGs and their 169 targets make sustainable development more concrete, but also more administratively demanding: they require integration, policy coherence, capacity building, partnerships, data, monitoring and accountability (Stafford-Smith et al., 2017; Meuleman, 2021).

This shift is central to current debates in SDG governance. The SDGs have been described as a form of governance through goals: they do not impose a single binding policy model, but seek to steer public, private and civil-society actors through shared objectives, indicators, comparison, mobilisation and voluntary commitment (Edwards and Romero, 2014; Joshi et al., 2015; Kanie and Biermann, 2017; Biermann et al., 2017). This governance form can mobilise attention and create a common vocabulary, but it can also produce symbolic alignment, selective prioritisation and weak institutional follow-through when global goals are not translated into domestic administrative routines (Forestier and Kim, 2020).

The SDGs are also a partnership agenda. SDG 17 explicitly recognises multistakeholder partnerships as a means of implementation, and the language of the 2030 Agenda encourages public, public-private and civil-society collaboration. Florini and Pauli (2018) show why this matters: governments alone cannot provide all the knowledge, resources and implementation capacity required by the SDGs, but partnerships are not automatically transformative. Cross-sector collaborations may mobilise expertise and resources, yet they need governance structures capable of aligning public, private and civic interests, preventing capture, protecting vulnerable stakeholders and maintaining accountability.

This article situates Portugal within this broader debate on the administrative and collaborative consequences of the 2030 Agenda. The SDGs are not only policy objectives or reporting categories. They operate as a governance framework that requires public institutions to coordinate across sectors, levels of government and societal actors. This makes SDG implementation a problem of public administration capacity: governments must translate global goals into domestic routines, manage interactions among goals, sustain collaborative arrangements and use monitoring for learning rather than symbolic alignment.

Portugal is a useful case for examining this problem. The country has formally supported the 2030 Agenda and has developed national, regional and local initiatives to integrate sustainability into public policy. Existing empirical work suggests that Portugal performs relatively well on several SDG indicators and has made visible progress towards selected targets, including a forecast of 57.50% achievement of assessed SDG targets in one indicator-based study (Firoiu et al., 2022). Yet other studies identify persistent governance weaknesses: uneven municipal sustainability reporting, limited SDG alignment in local reports, territorial asymmetries in local projects, and significant variation in local capacity (Almeida, 2022; Calazans et al., 2025).

This combination makes Portugal analytically interesting. It is not a case of SDG absence. Nor is it a case of fully institutionalised SDG implementation. It is a case of partial capacity: formal alignment and local mobilisation exist, but the translation of SDG commitments into routine administrative practice remains uneven. Such cases are important because they reveal the difference between adopting the language of the SDGs and building the governance capacities needed to implement them.

The article addresses two shortcomings in the current literature. First, studies on SDG achievement in Portugal have tended to focus either on indicators and forecasting (Firoiu et al., 2022), local initiatives (Almeida, 2022), municipal sustainability reporting (Calazans et al., 2025), or collaborative governance (Sobral et al., 2026). These contributions are valuable, but they remain fragmented. Second, much SDG governance research is still stronger in normative prescription than in public-administration theorisation: it calls for coherence, participation and integration, but less often explains how these requirements become institutional capacities within specific administrative systems (Glass and Newig, 2019; Meuleman, 2021).

This article therefore asks: under what conditions can Portuguese sustainability governance arrangements move from formal SDG alignment to transformative SDG implementation? The question is deliberately framed around the shift from alignment to implementation. Alignment refers to the adoption of SDG language, the mapping of existing policies against goals, and the production of formal alignment instruments. Implementation refers to the more demanding process through which institutions use those commitments to change policy priorities, coordinate across silos, manage trade-offs, involve stakeholders, protect public value and learn from monitoring results.

The article makes four contributions. First, it strengthens the theoretical dialogue between SDG governance and public administration by conceptualising SDG implementation as a capacity problem. Second, it develops a framework of five theory-derived governance requirements: policy coherence, horizontal coordination, vertical coordination, collaborative participation and public-value protection, and monitoring-driven learning. Third, it applies this framework to Portugal through a bounded synthesis of published empirical evidence, showing that the Portuguese challenge is less one of SDG commitment than of institutionalisation, coordination, collaborative governance and trust-building. Fourth, it adds a comparative ESS-11 survey layer to operationalise the social foundations of SDG-ready public administration: institutional trust, civic participation, social trust, democratic legitimacy and public-value/sustainability orientation. The ESS-11 evidence does not measure SDG implementation directly; rather, it assesses whether the social conditions for collaborative SDG governance are favourable or constraining. The article is therefore a theory-guided empirical diagnostic case study of Portuguese SDG governance, combining structured secondary evidence synthesis with comparative ESS-11 survey analysis.

2 Theoretical framework: SDG implementation as public-administration and collaborative capacity

2.1 From SDG alignment to implementation capacity

The SDGs have been described as governance through goals because they seek to steer policy systems through shared objectives, indicators, comparison and mobilisation rather than through a single legally binding implementation model (Kanie

and Biermann, 2017; Biermann et al., 2017). This governance form creates both opportunities and risks. On the one hand, the SDGs provide a common language for integrating economic, social and environmental priorities. On the other hand, their broad and non-binding character leaves substantial discretion to national governments, which may lead to selective implementation, goal prioritisation or symbolic alignment (Forestier and Kim, 2020).

For public administration, this means that SDG implementation depends on the capacity to convert broad goals into institutional routines. Formal alignment is only a first step. Implementation requires mechanisms that connect goals to budgeting, regulation, procurement, territorial planning, service delivery, stakeholder engagement and monitoring. Without such mechanisms, SDG language may become detached from everyday administrative practice.

Three strands of the literature are especially relevant. First, the literature on policy coherence and nexus governance stresses that the SDGs interact with one another. Progress on one goal can generate synergies or trade-offs for others, requiring administrations to identify interactions and avoid sectoral cherry-picking (Le Blanc, 2015; Nilsson et al., 2016; van Zanten and van Tulder, 2020). Second, the literature on collaborative and network governance emphasises that SDG implementation cannot be delivered by government alone. It requires partnerships among public authorities, municipalities, civil society, firms, universities and local communities (Bowen et al., 2017; Florini and Pauli, 2018; Kapucu and Beaudet, 2020). Third, the literature on adaptive governance shows that sustainable development is uncertain and dynamic. Monitoring must therefore be connected to learning, policy adjustment and institutional reflexivity (Xue et al., 2018; Monkelbaan, 2019).

This article builds on these debates by treating SDG implementation as a capacity problem. It asks whether Portuguese sustainability governance has moved beyond first-generation alignment instruments-plans, indicators, reports and public commitments-towards SDG-ready public administration. Such administration requires five governance capacities: policy coherence, horizontal coordination, vertical coordination, collaborative participation and public-value protection, and monitoring-driven learning.

2.2 Policy coherence and horizontal coordination

Policy coherence for sustainable development is one of the central governance requirements of the SDGs. It refers to the ability of governments to identify contradictions among policies, strengthen synergies among goals and avoid decisions in one sector undermining progress in another. This requirement is especially important because the SDGs interact across domains such as climate, energy, transport, housing, health, education, employment and territorial cohesion (de Jong and Vijge, 2021; Stafford-Smith et al., 2017; Glass and Newig, 2019).

In administrative terms, coherence depends on horizontal coordination. Public administrations are typically organised through specialised ministries, agencies, legal mandates and budgetary lines. Sustainability problems cut across these boundaries. Climate action cannot be implemented only by an environmental ministry; reducing inequality cannot be achieved only through social policy; sustainable cities cannot be pursued without transport, housing, land-use planning and fiscal instruments. If these sectors operate independently, SDG commitments risk remaining symbolic (Meuleman, 2021; Singh, 2024).

The literature therefore suggests that SDG implementation requires whole-of-government routines, interministerial coordination, strategic impact assessment, joint monitoring, cross-sector budgeting and mechanisms for resolving trade-offs (Meuleman and Niestroy, 2015; Meuleman, 2021; Monkelbaan, 2019). This leads to the first proposition: P1 - SDG implementation is more likely when formal SDG alignment is embedded in policy coherence mechanisms that reduce contradictions and strengthen synergies among goals.

A second proposition follows from the administrative logic of coherence. Horizontal coordination requires more than the existence of coordination bodies; it requires leadership, incentives and routines that make joint action administratively meaningful. P2-Horizontal coordination improves SDG implementation when public institutions possess routines and incentives for cross-sector decision-making, rather than relying solely on *ad hoc* cooperation.

2.3 Vertical coordination and territorial capacity

The 2030 Agenda is universal, but its implementation is territorial. Municipalities influence many SDG-relevant areas, including land use, mobility, waste, local social inclusion, housing, education partnerships, public procurement, community engagement and climate adaptation. This makes vertical coordination between central and local levels central to SDG implementation (Almeida, 2022; Bornemann and Christen, 2021).

However, SDG localisation is not simply a matter of decentralising responsibilities. Decentralisation without resources and support can reproduce territorial inequalities. Municipalities differ in population density, fiscal resources, technical expertise, data capacity and project ecosystems. Better-resourced municipalities may be able to generate local SDG initiatives and sustainability reports, while smaller or lower-density territories may struggle to convert SDG aspirations into practice (Almeida, 2022; Calazans et al., 2025).

This leads to the third proposition: P3-Vertical coordination strengthens SDG implementation when central and regional institutions help equalise local administrative and collaborative capacity, especially in municipalities with weaker resources, lower density or less developed sustainability ecosystems.

2.4 Collaborative participation, public value and trust

The SDGs require participatory governance, but participation is not the same as collaborative capacity. This distinction is consistent with studies showing that participation and collaboration require institutional arrangements that connect engagement to collective action and governance processes (Fox and Stoett, 2016; Schneider et al., 2019). Participation can broaden the knowledge base of decisions, increase legitimacy, reveal implementation barriers and build commitment to long-term transformation. Glass and Newig (2019) show that participation and democratic institutions are among the governance factors

associated with SDG achievement in high- and upper-middle-income countries. Yet participation may remain consultative, symbolic or dominated by organised actors if it is not connected to decision-making authority, feedback mechanisms and accountability.

Florini and Pauli (2018) add a crucial refinement. The SDGs have expanded the role of non-state actors, especially business and civil society organisations, in the provision of public goods and the management of externalities. Their analysis of cross-sector collaborations shows that partnerships can mobilise knowledge, technology and resources, but also create governance risks. When partnerships are driven by market incentives or organisational reputation, public value may be displaced by private or institutional interests unless the partnership has structures and processes capable of aligning interests, representing weaker stakeholders and sustaining accountability.

This perspective is important for SDG implementation in Portugal. Local SDG initiatives, municipal networks, universities, firms and civil society organisations can contribute to implementation, but the key issue is not simply whether multiple actors are present. The key issue is whether partnership arrangements are governed in ways that protect public value, include vulnerable or lower-capacity actors, generate shared knowledge and link participation to policy adjustment. Collaborative governance should therefore be treated as an institutional capability, not as a synonym for consultation.

Florini and Pauli also highlight the role of partnership platforms. Platforms can act as brokers that reduce transaction costs, convene actors, create safe spaces for dialogue, bring missing actors into the network, share knowledge and report progress. However, platforms also require governance: they need clear membership rules, funding arrangements, accountability mechanisms, continuity and procedures for preventing capture. This insight translates directly into an analytical question for Portugal: do SDG-related platforms and local initiatives function as learning-oriented governance infrastructures, or mainly as visibility mechanisms for existing projects?

Trust is the bridge between participation and implementation. Sustainability policies often involve long time horizons, uncertain benefits and visible short-term costs. Stakeholders are more likely to support such policies when they perceive public institutions as competent, fair and responsive. Conversely, low trust can transform sustainability policy into a contested technocratic exercise (Glass and Newig, 2019; Meuleman, 2021). This leads to the fourth proposition: P4-Collaborative participation contributes to SDG implementation when partnership arrangements align public, private and civic interests, protect public value, include weaker stakeholders and generate trust through accountability and responsiveness.

2.5 Monitoring, adaptive governance and learning capacity

The SDG framework is strongly indicator-based, but monitoring matters only when it feeds into learning. Monitoring and learning capacity refers to the ability of institutions to collect data, interpret performance, identify gaps, compare territorial outcomes and adjust policy accordingly. This is more demanding than compliance reporting. It requires feedback loops connecting indicators to priorities, budgets, administrative procedures and accountability mechanisms (Bornemann and Christen, 2021; Meuleman, 2021).

Adaptive governance is especially relevant because SDG implementation is uncertain, iterative and context-dependent. Xue et al. (2018) argue that implementation is more difficult than adopting the goals, partly because the SDGs are diverse, complex and interconnected. Adaptive governance responds to this problem by aligning high-level goals with local arrangements, recognising local knowledge, reviewing implementation and revising practices through learning. Monkelbaan (2019) similarly emphasises systems approaches, policy coherence and monitoring-to-adaptation loops for SDG governance.

Sustainability reporting is one visible expression of this capacity. Municipal reports, national dashboards and voluntary reviews can make sustainability action visible, but they may remain decoupled from implementation if they are not recurrent, comparable, externally scrutinised or linked to decision-making. Collaborative governance strengthens this argument because partnerships also require monitoring: without transparent information on activities, outputs, beneficiaries and trade-offs, it becomes difficult to determine whether multi-actor initiatives are creating public value or only documenting alignment.

This leads to the fifth proposition: P5-Monitoring and reporting contribute to SDG implementation when they generate policy learning, accountability and adjustment, rather than merely documenting formal alignment or partnership visibility.

2.6 Analytical framework

Table 1 summarises the revised theoretical framework. It links each proposition to a governance debate and to observable empirical implications for Portugal. The main adaptation is that participation is reframed as collaborative participation and public-value protection, drawing explicitly on the collaborative-governance argument developed by Florini and Pauli (2018).

3 Materials and methods

3.1 Research design

This article adopts a theory-guided empirical diagnostic case study design, combining structured secondary evidence synthesis with comparative survey analysis from the European Social Survey Round 11 (ESS-11). The article is empirical in the limited but specific sense that it uses ESS-11 survey data to analyse the social foundations of SDG-ready public administration in Portugal and combines this layer with a structured synthesis of published empirical evidence on SDG achievement, municipal sustainability reporting, local SDG initiatives and collaborative governance. It is not designed as a causal evaluation of Portuguese SDG implementation. Instead, it uses theory-derived diagnostic categories to assess whether the institutional and social conditions associated with transformative implementation are present, incomplete or constraining.

Portugal is selected as a revealing case. It combines formal SDG commitment, measurable progress on selected targets and visible local sustainability mobilisation with persistent challenges of administrative fragmentation, territorial inequality, uneven reporting and incomplete institutionalisation. This makes Portugal well suited to examine the transition from SDG alignment to SDG-ready public administration. The article does not claim to measure SDG implementation directly. Instead, it identifies the administrative and social conditions that make transformative implementation more or less plausible. The

TABLE 1 Analytical framework for assessing SDG-ready public administration.

Governance requirement	Theoretical basis	Proposition	Empirical implication for Portugal
Policy coherence	Integrated and indivisible SDGs; trade-offs and synergies; policy coherence for sustainable development.	P1: Formal SDG alignment is insufficient unless embedded in coherence mechanisms.	Assess whether SDGs shape cross-sector decisions and trade-off management, not only plans.
Horizontal coordination	Whole-of-government public administration, metagovernance and networked implementation.	P2: Coordination depends on leadership, routines and incentives for joint action.	Assess whether administrative silos are overcome through routine mechanisms.
Vertical coordination	SDG localization and territorial capacity.	P3: Local implementation requires capacity-equalizing support from central/regional institutions.	Assess territorial asymmetries in projects, reporting and access to collaborative platforms.
Collaborative participation and public value	Collaborative governance, SDG 17 partnerships, public/private value alignment, trust and accountability.	P4: Participation matters when partnership arrangements align public, private and civic interests while protecting public value and weaker stakeholders.	Assess whether partnerships influence decisions, include weaker actors, avoid capture and generate trust.
Monitoring and learning	Indicator-based governance, adaptive governance, reporting, accountability and institutional learning.	P5: Reporting contributes when it generates learning and policy adjustment.	Assess recurrence, comparability, external assurance and links to decisions and partnership accountability.

Source: Authors' elaboration.

institutional side of the diagnosis is assessed through structured secondary evidence synthesis. The social side is assessed through ESS-11 indicators on institutional trust, social trust, civic participation, democratic legitimacy and public-value/sustainability orientation.

3.2 Structured secondary evidence synthesis and PRISMA-informed search audit

The first empirical layer consists of a structured secondary evidence synthesis of published research and policy-relevant evidence on Portuguese SDG governance. The synthesis was designed as a bounded, theory-guided evidence mapping rather than a full systematic review. To improve transparency and replicability, the identification and deduplication stages are reported using PRISMA 2020-informed principles, while the qualitative synthesis is explicitly distinguished from a completed systematic-review selection process.

The review was designed as a bounded, theory-guided evidence mapping. Its purpose was to identify whether existing empirical findings provide diagnostic evidence relevant to, qualify or constrain the five governance requirements derived from the theoretical framework: policy coherence, horizontal coordination, vertical coordination, collaborative participation and public-value protection, and monitoring-driven learning. It therefore sought to construct a governance-capacity profile rather than to estimate pooled effects, formally test propositions or provide a comprehensive inventory of all SDG-related policies.

The documented search covered publications issued between January 2015 and June 2026 and was conducted between 1 April and 31 May 2026. The auditable record set is based on five ScienceDirect export files representing four distinct search-result sets; one downloaded file was an exact duplicate of a previously downloaded export. Scopus, Web of Science, Google Scholar and institutional sources were not included in the verified record counts because complete auditable exports or search logs were not available. Accordingly, the reported flow is a transparent ScienceDirect-based evidence map rather than an exhaustive multidisciplinary database search.

The core search string was:

("Sustainable Development Goals" OR "SDG*" OR "2030 Agenda") AND Portugal AND ("public administration" OR governance OR "policy coherence" OR coordination OR localisation OR municipality OR participation OR partnership OR monitoring OR reporting OR learning)

The search string reported above was used to structure the documented ScienceDirect search. Supplementary Table S1 identifies each export file, its record count and the deduplication procedure, thereby allowing the identification stage of the evidence map to be reproduced and audited.

Publications in English and Portuguese were considered. Spanish-language publications were also eligible when they contained empirical or comparative evidence directly relevant to Portuguese SDG governance. The review included peer-reviewed journal articles and relevant institutional literature, such as official reports, policy evaluations and research-based publications produced by public or international organisations. Peer-reviewed and institutional sources were classified separately in the evidence table to preserve transparency regarding their different evidentiary status.

Sources were included when they met all of the following criteria:

1. They addressed Portugal directly or included Portugal in a comparative analysis.
2. They examined SDG implementation, localization, sustainability governance or a closely related public-administration process.
3. They provided empirical findings, explicit conceptual benchmarks or documented institutional evidence relevant to at least one of the five analytical dimensions.
4. They contained sufficient methodological or documentary information to establish the basis of their claims.

The four distinct ScienceDirect result sets yielded $n = 400$ records. One additional downloaded export file was an exact duplicate of a previously downloaded file and was excluded at the file-audit stage. Cross-record deduplication by DOI and, where a DOI was unavailable, by normalised title and publication year then removed $n = 34$ duplicate records, leaving $n = 366$ unique records. Supplementary Table S1 documents the five source files and deduplication procedure, Supplementary Table S2 provides the complete deduplicated database, and Supplementary Figure S1 presents the verified identification flow. The 366-record database functions as an auditable search map rather than as a completed systematic-review screening pipeline; accordingly, the manuscript does not report an artificial count of screened or excluded records. The qualitative governance-capacity synthesis uses five purposively retained core sources reported individually in Table 2, complemented by comparative theoretical literature used to establish the analytical benchmarks. Evidence coding classified each core source by publication type, empirical focus, unit of analysis, methodological approach, principal findings and relevance to the five governance requirements. The evidence mapping and coding were conducted by the lead author and were not independently double-screened or double-coded; no inter-rater reliability statistic is therefore reported, and this is treated as a limitation.

Sources were excluded from the qualitative synthesis when they referred to the SDGs only in general terms, did not provide evidence relevant to Portugal, focused exclusively on substantive sustainability outcomes without examining governance or administrative capacity, duplicated evidence already reported in another publication, or lacked sufficient information to support the diagnostic analysis. Evidential weight was assessed qualitatively rather than through a formal risk-of-bias instrument. Firoiu et al. (2022) provides national indicator and forecasting evidence but only indirect evidence on administrative capacity; Calazans et al. (2025) provides broad municipal reporting coverage; Almeida (2022) provides observational evidence on local initiatives and territorial correlates; and Sobral et al. (2026) provides direct but small-N content-analytic evidence on collaborative governance. Florini and Pauli (2018) and the wider comparative literature are used as conceptual benchmarks rather than as Portuguese empirical evidence. The resulting claims are therefore diagnostic and illustrative, not confirmatory.

Each of the 366 unique records is documented in Supplementary Table S2 with its bibliographic information, DOI or publisher link, source membership and duplicate status. Supplementary Table S3 separately presents the eligibility criteria, exclusion categories and coding protocol. The five core sources retained for the article's qualitative synthesis are reported individually in Table 2 and were coded according to publication type, empirical focus, unit of analysis, methodological approach, principal findings and relevance to the five governance requirements.

The mapping procedure was deliberately conservative. Evidence was interpreted as diagnostically relevant to a governance requirement only when the source identified institutional routines, administrative mechanisms, stakeholder arrangements, territorial-capacity patterns or monitoring and learning practices. General declarations of commitment to the SDGs, references to the 2030 Agenda or the existence of planning and reporting instruments were treated as evidence of formal alignment, not as evidence of implementation capacity. This distinction reduces the risk of equating the adoption of SDG language with the existence of SDG-ready public administration.

3.3 ESS-11 survey analysis

The second empirical layer uses the European Social Survey Round 11 integrated file used for this study, downloaded on 22 June 2026 [European Social Survey European Research Infrastructure (ESS ERIC), 2026; DOI: 10.21338/ess11-2023], to examine the social foundations of SDG-ready public administration. Round 11 fieldwork

TABLE 2 Evidence base and analytical use.

Evidence source	Empirical or conceptual focus	Key evidence or argument used	Analytical use
Firoiu et al. (2022)	Portugal SDG achievement and forecasting	Portugal is forecast to achieve 57.50% of assessed SDG targets in an indicator-based model.	Provides the baseline of formal/indicator progress and raises the question of implementation capacity.
Calazans et al. (2025)	Municipal sustainability reporting	Only 28 of 308 Portuguese municipalities published a sustainability report; SDG alignment was limited among post-2015 reports.	Assesses institutionalisation of local reporting and monitoring-learning capacity.
Almeida (2022)	Local SDG initiatives and citizen/local agents	Local projects show territorial asymmetries and a positive association with population density and municipal GDP.	Assesses localisation, participation and capacity asymmetries.
Sobral et al. (2026)	Collaborative governance for SDG implementation in Portugal	Content analysis of four Portuguese initiatives found that only one fully met the authors' collaborative-governance criteria, indicating weak institutionalisation.	Assesses stakeholder participation, legitimacy, trust and the institutional limits of collaborative governance.
Florini and Pauli (2018)	Cross-sector collaborative governance for the SDGs	Partnerships can mobilise resources and knowledge, but require structures to align public and private value, avoid capture and protect weaker stakeholders.	Refines the participation dimension into collaborative participation, public-value protection and platform accountability.
Comparative SDG governance literature	Policy coherence, adaptive governance, network governance and capacity	Governance for the SDGs requires integration, adaptation, partnerships, democratic institutions and learning.	Provides theoretical benchmarks for evaluating the Portuguese case.

Source: Authors' elaboration based on cited literature.

across participating countries was conducted between 1 February 2023 and 24 October 2024, with country-specific fieldwork windows. Portugal contributes 1,373 respondents to the analytic file. Analyses were conducted in R using weighted descriptive means, country rankings and correlation-based sensitivity checks. The survey does not measure SDG implementation directly; it provides contextual evidence on whether trust, participation, democratic legitimacy and public-value orientations create favorable or constraining conditions for collaborative SDG governance in Portugal.

Five indices are constructed: institutional trust, social trust, civic participation, democratic legitimacy and public-value/sustainability orientation. Institutional trust, social trust and democratic legitimacy are based on standard ESS-11 items measured on 0–10 scales and averaged across valid responses. Civic participation is constructed as a count-style indicator of reported civic and political actions. The public-value/sustainability orientation index is constructed specifically for this article from three theoretically aligned ESS-11 items: importance of caring for nature/environment (impenv), equality orientation (impeq) and support for public responsibility in reducing income differences (gincdif).

This composite index is included because the article focuses on the social conditions of SDG-ready public administration rather than direct support for the SDGs. The three items capture orientations towards environmental responsibility, social equality and collective public responsibility, which together form a theoretically specified, formative public-value dimension of sustainability governance. Each component is recoded to a common 0–10 scale, with higher values indicating stronger public-value/sustainability orientation, and the index is calculated as the mean of valid components. ESS special missing codes ("do not know," refusal and no answer) were set to missing before index construction. Appendix A reports all item codes and recoding rules. Country-level estimates use the ESS post-stratification weight (pspwght); the pooled ESS-11 benchmark combines pspwght with the population-size weight (pweight). The R reproducibility file provides the construction syntax and weighting commands. The index is not interpreted as a direct measure of SDG support, sustainability behavior or implementation capacity.

Portugal is compared with Spain, France, Italy and Greece to situate the case within Southern and Western European institutional contexts, and with the Netherlands and Sweden as higher-trust Northern European benchmarks. The comparison countries were selected for analytical contrast and ESS-11 availability, not on the basis of their observed scores. The pooled ESS-11 average provides a broader population-weighted benchmark. All cross-country comparisons are descriptive and diagnostic: they rely on weighted point estimates and rankings, not design-based standard errors, confidence intervals or formal tests of mean differences. Accordingly, terms such as higher, lower, above or below refer to descriptive position only and do not imply statistical significance (see Table 3).

3.4 Robustness and reproducibility checks

Because the public-value/sustainability orientation index is author-constructed and formative in theoretical intent, robustness assessment focuses on transparency of item construction and on sensitivity to alternative external benchmarks rather than on treating internal consistency as proof of validity. Supplementary Table S4 documents item codes, recoding and weighting; Supplementary Table S5 reports the comparative country means; and Supplementary Table S6 presents the external-validity and nomological checks. The accompanying R script contains executable syntax for inter-item correlations, Cronbach's alpha, McDonald's omega and component-level diagnostics. Respondent-level reliability outputs are not used as scale-retention criteria and are not presented as validation of a reflective latent construct.

The article uses a mean index rather than factor scores for three reasons. First, the index is theoretically specified ex ante as a compact formative public-value/sustainability orientation measure, not discovered inductively. Second, the three components intentionally cover distinct but related normative dimensions - environmental concern, equality orientation and support for public responsibility - rather than interchangeable indicators of a single latent trait. Third, a mean index is transparent, reproducible and directly interpretable for a diagnostic case study. Internal-consistency coefficients, when computed from

TABLE 3 Survey indicators for the empirical extension.

Analytical dimension	Survey source	Indicative variables/questions	Use in the article
Institutional trust	ESS-11	Trust in parliament, politicians, political parties, legal system, police, European Parliament and United Nations.	Assesses whether public institutions have the legitimacy needed to coordinate long-term SDG reforms.
Social trust	ESS-11	Most people can be trusted; most people try to be fair; most people try to be helpful.	Assesses the social capital conditions for collaborative governance and cross-sector cooperation.
Civic and political participation	ESS-11	Voting, contacting politicians, working for parties or organisations, wearing/displaying a campaign badge, signing petitions, demonstrations, boycotts and posting or sharing political content online.	Assesses whether citizens are likely to engage beyond consultation and support participatory SDG governance.
Public-value/sustainability orientation	ESS-11	Importance of caring for nature/environment, equality orientation and support for public responsibility in reducing income differences.	Assesses public support for sustainability trade-offs and long-term collective action.
Democratic legitimacy and responsiveness	ESS-11	Satisfaction with democracy and satisfaction with national government.	Links trust to responsiveness and accountability, reinforcing the collaborative-governance argument.

Source: Authors' elaboration.

respondent-level data, are therefore treated as descriptive sensitivity diagnostics rather than as criteria that determine whether the construct is valid.

The robustness checks are therefore interpreted cautiously. If reliability is modest, this does not invalidate the index, because the measure is formative in theoretical intent: it combines complementary public-value orientations relevant to SDG-ready governance. However, component-level reporting is necessary to prevent over interpreting the composite as a direct measure of SDG support or sustainability behavior.

3.4.1 External validity and nomological assessment

To assess whether the author-constructed public-value/sustainability orientation index displays convergence with external country-level measures, we correlated country means from the ESS-11 index with the corresponding scores from the SDG Index and the Environmental Performance Index. Because the number of overlapping countries is limited and the variables may not satisfy normality assumptions, Spearman rank correlations are reported as the primary estimates, with Pearson correlations used as a sensitivity check. These tests are not interpreted as evidence that public attitudes cause national SDG performance. Their narrower purpose is to assess whether countries displaying stronger sustainability-related public-value orientations also tend to perform better on conceptually related external indicators.

Country-level means of the sustainability-related public-value orientation index were compared with the 2024 SDG Index and the 2024 Environmental Performance Index for the seven European benchmark countries included in the main analysis. Given the very small number of benchmark countries, these correlations are exploratory and should not be interpreted as a definitive validity assessment. The analyses provide discriminant and nomological clarification rather than evidence of convergent validation. The index was moderately and negatively correlated with both the SDG Index (Spearman's $\rho = -0.464$, $p = 0.294$) and the EPI ($\rho = -0.464$, $p = 0.294$), although neither association was statistically significant.

A complementary nomological check identified a strong negative relationship with ESS-11 institutional trust ($\rho = -0.821$, $p = 0.023$). These findings indicate that the index should not be interpreted as a citizen-level proxy for national SDG or environmental performance. Instead, it captures a distinct normative orientation towards environmental responsibility, equality and public intervention. The inverse association with institutional trust suggests that strong demand for collective responsibility may coexist with limited confidence in the institutions responsible for delivering it.

3.5 Treatment of WVS and EVS

The quantitative results reported in this article are based only on the ESS-11 analytic file. WVS Wave 7 was examined as a possible complementary source, but the available cross-national file used for this project did not include Portugal and was therefore excluded from the Portuguese empirical analysis. EVS is also not incorporated into the final quantitative results. WVS and EVS are mentioned only as possible sources for future longitudinal triangulation on values, democratic legitimacy, environmental priorities and public responsibility. This clarification is important because the survey analysis below should be read as ESS-11 evidence only.

3.6 Scope and limitations

The article provides a diagnostic and theory-building analysis rather than a full causal evaluation of Portuguese SDG implementation. Its strength lies in combining a public-administration framework with structured evidence synthesis, comparative ESS-11 survey analysis and reproducibility materials. Its limitations are also clear: it does not include original interviews, newly coded administrative documents or direct measurement of SDG policy outputs. Future research should extend this design through systematic document coding of national and municipal SDG instruments, interviews with public officials and stakeholders, longitudinal triangulation with EVS, WVS or other survey sources that include Portugal, and direct analysis of whether specific governance mechanisms improve implementation outcomes.

The external-validity assessment was limited to seven benchmark countries and should therefore be regarded as exploratory. Future research should replicate the analysis using all countries shared by the ESS-11, the SDG Index and the Environmental Performance Index.

4 Results: Portugal's SDG governance capacity profile

4.1 National SDG alignment

Portugal has developed a visible SDG alignment infrastructure. It has formal commitment to the 2030 Agenda, national priorities connected to education, equality, innovation, inequality reduction, climate action and oceans, and indicator-based monitoring of progress. Firoiu et al. (2022) estimate that Portugal may achieve 57.50% of the assessed SDG targets, placing the country among EU countries with relatively high performance in sustainable development and transition towards a low-carbon economy.

This finding is important, but it should not be over interpreted. Indicator achievement is not equivalent to governance capacity. A country can perform well on selected indicators due to prior policy trajectories, sectoral investments or socioeconomic conditions, while still lacking strong mechanisms for coherence, participation and learning. Conversely, weak performance on some goals may reflect the difficulty of managing trade-offs across goals rather than simple policy failure.

The Portuguese evidence provides partial diagnostic evidence relevant to P1. Formal SDG alignment exists, and indicator progress is visible, but the available evidence does not demonstrate that trade-offs and synergies are systematically embedded in routine cross-sector decision-making. The implementation challenge is to convert alignment into institutionalized coherence mechanisms.

4.2 Horizontal coordination

The 2030 Agenda requires horizontal coordination because sustainability problems cross administrative boundaries. In Portugal, the literature indicates commitment to SDG priorities, but also suggests that sustainability governance remains unevenly embedded in ordinary administrative routines. The core problem is not the absence of sustainability language, but the uncertain capacity of the administrative system to make sustainability a cross-sector decision rule.

This evidence is consistent with broader public administration and SDG governance literature. Meuleman (2021) argues that public administration and governance reform are central to SDG readiness, particularly because policy coherence requires moving beyond political, institutional and mental silos. Singh (2024) likewise highlights how institutional structures shape public management reform trajectories and implementation capacity. Network governance literature adds that implementation also depends on the capacity to coordinate organisations and actors around shared objectives rather than relying on isolated institutional mandates (Kapucu and Beaudet, 2020).

For Portugal, the implication is that horizontal coordination should be assessed through mechanisms such as interministerial coordination, shared indicators, budgetary alignment, cross-sector impact assessment and conflict-resolution procedures. The available evidence suggests that these mechanisms need strengthening if SDGs are to influence routine policy decisions. This pattern is consistent with P2: coordination requires institutional routines, not only strategic declarations.

4.3 Vertical coordination

SDG implementation in Portugal is strongly territorial. Local initiatives, municipal strategies and civil society projects are central to translating the SDGs into concrete practice. Almeida (2022) shows that local agents and citizens contribute to SDG implementation through projects that involve collaborative work, social inclusion and environmental education. However, the distribution of these projects is uneven. The number of local projects is associated with population density and municipal GDP, indicating that SDG localisation is conditioned by territorial capacity.

This finding provides diagnostic evidence relevant to P3. Local mobilisation is not enough if it reproduces existing asymmetries. More densely populated and economically stronger municipalities are better positioned to generate, report and sustain SDG projects. Lower-resource territories may remain less visible in SDG platforms and less able to institutionalise sustainability practices.

Vertical coordination should therefore be understood as a capacity-equalising function. Central government and national public administration institutions should support municipalities through technical assistance, standardised reporting tools, data infrastructures, training, peer learning and funding mechanisms targeted at lower-capacity territories. The collaborative-governance perspective adds that local capacity is not only financial or technical; it also concerns the ability to convene actors, structure partnerships, manage conflicts and convert stakeholder knowledge into public decisions.

4.4 Municipal sustainability reporting

Municipal sustainability reporting provides a concrete measure of local institutionalisation. Calazans et al. (2025) find that only 28 of 308 Portuguese municipalities had published a sustainability report online. Among these reports, only a subset used GRI standards, some were single publications, social information was less developed than environmental and economic information, and SDG alignment was limited among post-2015 reports.

These findings provide diagnostic evidence relevant to P5. Reporting exists, but it is not yet an institutionalised learning system. The limited diffusion of municipal reports suggests that sustainability reporting remains voluntary and uneven. Limited standardisation reduces comparability. The absence of external assurance or robust review weakens accountability. Weak SDG alignment reduces the ability of reporting to connect local action to the 2030 Agenda.

For reporting to become governance capacity, it must be recurrent, comparable, audited or peer-reviewed, linked to municipal planning, and connected to policy adjustment. In its current form, Portuguese municipal reporting appears stronger as a transparency signal than as a learning system. From a collaborative-governance perspective, reporting should also document how partnerships are selected, who participates, how decisions are made, what benefits are produced, and whether vulnerable or lower-capacity groups are represented.

4.5 Collaborative participation and trust

Participation is visible in Portugal through local projects, ODS-related platforms and collaborative initiatives. Almeida (2022) shows that local agents and citizens contribute to SDG implementation, while Sobral et al. (2026) emphasise that collaborative governance can support SDG implementation when multi-actor arrangements move beyond consultation towards joint decision-making. However, the available evidence suggests that collaborative governance remains unevenly institutionalized.

Florini and Pauli (2018) help sharpen the diagnosis. Their argument implies that the central question is not only whether Portugal has multi-actor SDG initiatives, but whether these initiatives possess governance arrangements capable of aligning interests, protecting public value and ensuring accountability. This distinction matters because SDG partnerships can become symbolic if they are limited to project visibility, stakeholder consultation or reputational alignment. They become governance capacity only when they have rules, roles, leadership, accountability mechanisms, monitoring and feedback loops.

The Portuguese evidence is consistent with P4, with an important qualification. Local initiatives show mobilisation, but territorial asymmetries and incomplete feedback loops limit the capacity of participation to become transformative governance. More specifically, Portugal's SDG partnership ecosystem should be assessed through five questions: who is included, who is missing, how interests are aligned, how public value is protected, and how stakeholder knowledge changes policy or implementation.

This has implications for trust. Trust is not produced simply by inviting actors into platforms or listing projects under the SDGs. It is strengthened when stakeholders see that participation has consequences, that weaker actors are represented, that trade-offs are explained, and that public institutions are responsive. For Portugal, collaborative SDG governance would therefore require more robust partnership platforms, clear rules for participation, mechanisms to include lower-capacity municipalities and vulnerable groups, and feedback loops linking stakeholder knowledge to policy revision.

4.6 ESS-11 survey evidence

The ESS-11 evidence adds a social-attitudinal layer to the Portuguese diagnosis. The survey indicators do not measure SDG implementation directly. They measure enabling or constraining conditions for collaborative SDG governance: trust in institutions, interpersonal trust, civic participation, democratic legitimacy and

public-value/sustainability orientation. The results are therefore interpreted as contextual evidence about the social foundations of SDG-ready public administration.

Table 4 compares Portugal with selected European benchmarks and with the ESS-11 average. Portugal scores 4.04 in institutional trust, slightly below the ESS-11 average of 4.22. It also scores below the average in social trust (4.56 compared with 5.13), civic participation (0.81 compared with 1.45) and democratic legitimacy (4.06 compared with 4.32). By contrast, Portugal scores substantially above the ESS-11 average in public-value/sustainability orientation: 7.26 compared with 6.40.

Because the public-value/sustainability orientation indicator is author-constructed, the result should be read as evidence about the specific composite index used here. It does not imply that Portugal ranks first in direct SDG support or in sustainability behavior. Rather, it indicates that, on the selected ESS-11 items combining environmental care, equality orientation and support for public responsibility, Portugal scores higher than the other countries in the analytic file.

This descriptive pattern is theoretically informative, but it should not be read as an inferential comparison. Portugal records a higher weighted point estimate on the public-value/sustainability orientation index than the ESS-11 benchmark, while its weighted point estimates for social trust and civic participation are lower and those for institutional trust and democratic legitimacy are only slightly lower. The interpretation concerns the configuration of indicators, not statistically established country differences.

Table 5 shows Portugal's descriptive position among the 30 ESS-11 countries available in the analytic file. Portugal ranks 21st in institutional trust, 22nd in social trust, 27th in civic participation and 22nd in democratic legitimacy, but 1st in public-value/sustainability orientation. These ranks are descriptive and sensitive to sampling uncertainty; they are not statistically tested league-table positions. Their analytical use is to characterize the configuration of the Portuguese case rather than to establish precise cross-national ordering.

Figure 1 expresses each Portuguese indicator relative to its corresponding population-weighted ESS-11 benchmark, set to 100. This common descriptive metric avoids plotting the count-style civic participation index on the same raw scale as the 0–10 measures. Values above or below 100 indicate relative weighted point estimates only; they do not indicate statistically significant differences. The figure therefore visualizes the configuration of the Portuguese profile without implying raw-scale comparability across indicators.

4.7 Summary of findings

Table 6 summarizes the resulting SDG governance capacity profile. The table should be read as a diagnostic synthesis of available evidence, not as a definitive ranking of Portuguese implementation capacity.

TABLE 4 ESS-11 survey indicators: Portugal and selected European benchmarks.

Country	N	Institutional trust	Social trust	Civic participation	Democratic legitimacy	Public-value orientation
Portugal	1,373	4.04	4.56	0.81	4.06	7.26
Spain	1,844	4.09	5.18	1.61	4.27	6.43
France	1,771	4.24	5.05	1.82	3.97	6.45
Italy	2,865	4.28	4.38	0.87	4.53	6.77
Greece	2,757	3.73	4.49	0.96	3.89	6.94
Netherlands	1,695	5.46	6.14	1.42	5.28	5.99
Sweden	1,230	5.73	6.27	2.27	5.45	5.98
ESS-11 average (all countries, population-weighted)	50,116	4.22	5.13	1.45	4.32	6.40

Source: Authors' elaboration based on ESS-11 analytic file. Indicators are weighted descriptive means from the ESS-11 analytic file. Country estimates use the ESS post-stratification weight; the pooled ESS-11 average uses the post-stratification weight multiplied by the population-size weight. No design-based standard errors or confidence intervals are reported for these country comparisons, so differences from the benchmark should not be interpreted as statistically significant. Trust, legitimacy and public-value orientation are on 0–10 scales; civic participation is a count-style index. The public-value orientation label abbreviates the author-constructed public-value/sustainability orientation index and is not a direct measure of SDG support or sustainability behavior.

TABLE 5 Portugal's position in the ESS-11 survey indicators.

Index	Portugal mean	ESS-11 average	Difference	Portugal rank	Highest country	Lowest country
Institutional trust	4.04	4.22	−0.18	21/30	Norway (6.21)	Ukraine (2.67)
Social trust	4.56	5.13	−0.57	22/30	Finland (6.72)	Bulgaria (3.92)
Civic participation	0.81	1.45	−0.65	27/30	Iceland (2.87)	Hungary (0.44)
Democratic legitimacy	4.06	4.32	−0.26	22/30	Switzerland (7.05)	Ukraine (2.76)
Public-value orientation	7.26	6.40	0.85	1/30	Portugal (7.26)	Estonia (5.37)

Source: Authors' elaboration based on ESS-11 analytic file. Rankings are ordered from the highest weighted point estimate to the lowest among 30 countries in the ESS-11 analytic file. Portugal's rank is descriptive, sensitive to sampling uncertainty and not interpreted as a statistically established or causal ranking of SDG implementation capacity. The public-value orientation label abbreviates the author-constructed public-value/sustainability orientation index.

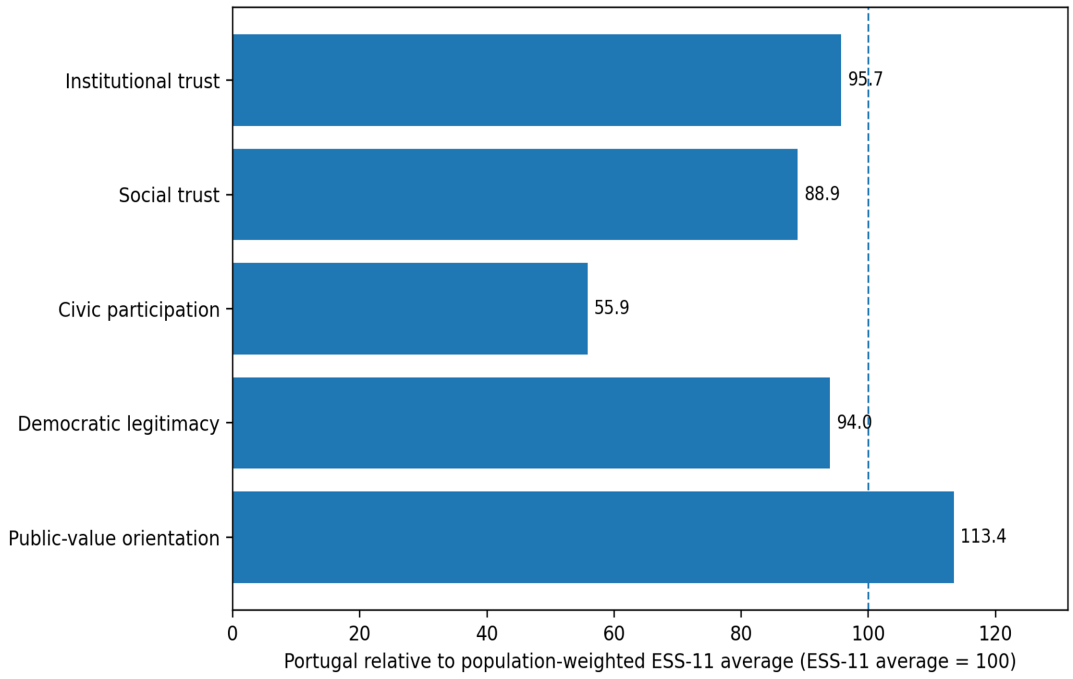


FIGURE 1
Portugal relative to the ESS-11 benchmark across survey indicators (ESS-11 average = 100). Source: Authors' elaboration based on ESS-11 analytic file. Each value is expressed as Portugal's weighted mean divided by the corresponding population-weighted ESS-11 mean × 100. This transformation places indicators with different original scales on a common descriptive benchmark metric. The figure does not display sampling uncertainty and should not be interpreted as an inferential test.

TABLE 6 Portugal's SDG governance capacity profile.

Governance requirement	Evidence from Portugal	Assessment	Implication
Policy coherence	Formal SDG alignment and indicator progress exist; evidence of routine trade-off management remains limited.	Moderate capacity	Move from strategic alignment to institutionalised coherence checks.
Horizontal coordination	Sustainability requires cross-sector administration; silos remain a concern in SDG governance.	Partially developed	Strengthen whole-of-government routines and cross-sector incentives.
Vertical coordination	Local projects exist but show territorial asymmetries linked to municipal capacity.	Uneven capacity	Support low-density and lower-resource municipalities through technical, financial and data infrastructures.
Collaborative participation and public value	Local agents and platforms matter, but collaborative governance must align interests, include weaker actors and protect public value.	Promising but uneven	Move from consultation and project visibility to accountable partnership platforms and feedback obligations.
Monitoring and learning	Municipal reporting is scarce; SDG alignment and comparability remain limited.	Weak to moderate capacity	Build recurrent, comparable and externally reviewed learning systems linked to policy and partnership accountability.

Source: Authors' elaboration.

5 Discussion

5.1 Beyond plans, indicators and partnership narratives

The findings contribute to SDG governance debates by treating plans, indicators, reports and partnerships as governance entry points rather than as self-evident evidence of implementation. The relevant question is whether these instruments become embedded in administrative routines, territorial support mechanisms, accountable partnership structures and learning processes.

The Portuguese case illustrates this issue in a cautious but analytically useful way. Visible commitment and selected indicator progress coexist with uneven municipal reporting, territorial asymmetries, weakly institutionalised collaborative governance and a social profile that is supportive in values but thinner in participation and trust. This is a capacity diagnosis, not a claim that any single governance deficit explains SDG performance.

The collaborative-governance literature helps interpret this pattern. Multi-actor initiatives strengthen implementation only when they define participation rules, align interests, protect weaker actors, monitor results and feed stakeholder knowledge back into public decisions. Without these features, partnerships risk functioning mainly as visibility devices.

5.2 Capacity-oriented and collaborative SDG governance

The article's theoretical contribution is the concept of capacity-oriented SDG governance. This concept refers to governance arrangements that embed global goals in public-administration capabilities: policy coherence, horizontal coordination, capacity-equalising vertical support, collaborative participation with public-value protection, and monitoring connected to learning.

This approach shifts attention from the presence of instruments to their operational effects. It asks whether sustainability strategies influence decisions, whether coordination mechanisms alter cross-sector action, whether local support reduces territorial asymmetries, whether participation affects choices, and whether monitoring generates adjustment. Participation, partnerships and reporting are therefore treated as institutional functions rather than symbolic markers.

By linking public administration and collaborative governance, the framework responds to the criticism that SDG implementation research can remain under-theorized. It explains how coordination, trust and participation become capacities within administrative systems rather than presenting them as general normative requirements.

The ESS-11 evidence adds the social dimension of this capacity problem. Portugal's comparatively strong public-value and sustainability orientation is a resource for public action, but weaker social trust and civic participation indicate that institutions and SDG platforms must actively build channels for engagement, feedback and accountability.

5.3 Portugal in comparative perspective: Mediterranean and Nordic configurations

Portugal's profile in Table 7 becomes more analytically informative when compared with the other European countries included in the ESS-11 analysis. The comparison does not support a simple distinction between a uniformly weak Mediterranean cluster and a uniformly strong Nordic cluster. Instead, it reveals different combinations of public-value orientation, institutional trust and participatory capacity.

Portugal and Spain display similar levels of institutional trust, but Spain records substantially higher social trust and civic participation. This suggests that geographical and institutional proximity does not necessarily generate equivalent collaborative capacity. Portugal's distinctive feature is therefore not an absence of sustainability-related values, but a sharper gap between strong public-value orientation and weaker participatory mobilization.

Italy and Greece also illustrate heterogeneity within Southern Europe. Italy records comparatively low social trust but somewhat stronger democratic legitimacy, while Greece combines relatively low institutional trust with a high public-value/sustainability orientation. These profiles indicate that Mediterranean countries should not be treated as a single governance model. Similar normative support for public responsibility may coexist with different institutional and participatory constraints.

The contrast with Sweden and the Netherlands is more pronounced. Both countries display substantially stronger institutional and social trust, while Sweden also records markedly higher civic participation. Their public-value/sustainability index scores are lower than Portugal's, however. This apparent paradox reinforces the article's central argument: favorable sustainability-related values are not sufficient to produce SDG-ready public administration. Their conversion into collaborative implementation capacity depends on institutions, participation channels, accountability arrangements and recurrent feedback.

Portugal can therefore be characterized as a case of high normative readiness but limited relational and participatory conversion capacity. Nordic cases display a more institutionally embedded configuration in which trust and civic engagement provide stronger infrastructures for collaboration. The comparison supports analytical, rather than statistical, generalization: countries may reach similar levels of formal SDG alignment through different combinations of values, trust, participation and administrative capacity.

5.4 What the ESS-11 evidence adds: social foundations of SDG-ready public administration

The ESS-11 evidence adds a social-attitudinal layer to the article's argument. Portugal is close to the ESS-11 average in institutional trust and democratic legitimacy, suggesting that the basic legitimacy conditions for public-led sustainability governance are not absent.

The weaker points are social trust and civic participation. This matters because collaborative SDG governance depends not only on platforms or consultation mechanisms, but also on the willingness and capacity of citizens and stakeholders to engage with one another and with public institutions. Lower scores in these areas may limit the depth of co-production, shared learning and accountability.

At the same time, Portugal performs strongly on the public-value/sustainability orientation index. This suggests receptiveness to sustainability-oriented public action, while also showing that favourable values require credible institutional channels if they are to support implementation.

These findings reinforce the collaborative-governance dimension of the framework. Where civic participation and social trust are comparatively weak, partnerships cannot rely on spontaneous mobilisation or informal trust alone. They require transparent procedures, representative platforms, feedback obligations and mechanisms to include lower-capacity or less organized groups.

Overall, the survey evidence permits a more precise diagnostic interpretation of the Portuguese case. The observed indicator configuration is consistent with comparatively favorable sustainability-related public-value orientations alongside weaker participatory and relational conditions, but the descriptive design does not establish statistically significant country differences or causal effects.

5.5 Limitations and future research

This article has limitations. The Portuguese evidence synthesis is based on a small and methodologically heterogeneous empirical literature, and study selection and coding were not independently duplicated. The ESS-11 extension is contextual and descriptive: it does not estimate causal effects, does not directly measure SDG implementation, and does not report design-based standard errors or confidence intervals for the country comparisons. Accordingly, the propositions are used as diagnostic organizing devices rather than formally tested hypotheses.

The public-value/sustainability orientation index is also author-constructed. It combines three ESS-11 items - impenv, impeq, and gincdif - and should therefore be interpreted as an index-specific indicator of sustainability-relevant public-value orientation, not as a direct measure of SDG support or sustainability behavior. Supplementary Materials S1 and S2 strengthen transparency by

reporting the recoding procedure, component-level checks and robustness diagnostics, but the index remains descriptive and diagnostic.

Future research should extend this design through systematic document coding of national SDG strategies, voluntary national reviews, municipal reports, ODS local project records and partnership-platform materials. Interviews with central administration officials, municipal representatives, civil society actors, private-sector partners and SDG platform coordinators would help test how the diagnostic capacities identified here operate in practice. Comparative municipal analysis could also examine whether stronger partnership governance is associated with stronger implementation outcomes.

6 Conclusion

This article examined the conditions under which Portuguese sustainability governance can develop into SDG-ready public administration. Its diagnostic answer is that Portugal has meaningful foundations for SDG governance, but these foundations require stronger institutionalisation through coherence mechanisms, horizontal coordination routines, capacity-equalising vertical support, accountable collaborative platforms and monitoring systems connected to learning.

The article contributes to SDG governance scholarship by reframing implementation as a public-administration and collaborative-capacity problem. Its purpose is not to rank Portugal's SDG performance, but to show how a country with formal commitment and favorable sustainability-oriented values can still face constraints in the relational, participatory and institutional conditions needed for transformative governance.

For Portugal and similar cases, the next generation of SDG governance should examine whether planning, reporting and partnership platforms alter decisions, coordinate sectors, support weaker territories, include less powerful actors and generate accountable learning. The ESS-11 profile strengthens this conclusion: strong public-value and sustainability orientations are an asset, but they must be connected to participation, trust-building and visible policy feedback if they are to become implementation capacity.

TABLE 7 Portugal in comparative perspective: Mediterranean and Nordic configurations.

Configuration	Countries	Main features	Governance implication
High normative orientation, weaker participation	Portugal, Greece	Strong public-value orientation; weaker civic/social trust	Need institutional conversion mechanisms
Intermediate mixed profile	Spain, Italy, France	Mixed trust, legitimacy and participation	Selective collaborative capacity
High relational-institutional capacity	Sweden, Netherlands	High institutional/social trust; stronger participation	More favourable collaborative infrastructure

Source: Authors' elaboration. The configurations are heuristic analytical groupings derived from the descriptive ESS-11 profiles; they do not represent statistically estimated clusters.

TABLE 8 Linking SDG-ready governance capacities to process indicators, implementation outputs and potential SDG outcomes.

Governance capacity	Process indicator	Implementation output	Potential SDG outcome
Policy coherence	Systematic assessments of SDG synergies, trade-offs and cross-sector policy effects	Policy proposals, regulations and budgets revised to address identified contradictions and reinforce cross-sector synergies	More coherent progress across interconnected SDGs and fewer negative spillovers between economic, social and environmental objectives
Horizontal coordination	Interministerial decisions that are formally adopted, assigned to responsible bodies, implemented and monitored	Integrated programmes, shared budgets, joint implementation arrangements and common performance indicators across ministries	More effective responses to cross-cutting challenges and improved delivery of SDG targets requiring whole-of-government action
Vertical coordination	Municipal coverage of SDG instruments, technical assistance, data support and capacity-building mechanisms	Wider adoption of local SDG plans and reporting systems, stronger municipal implementation capacity and more consistent central–local coordination	Reduced territorial disparities in access to services, institutional capacity and progress towards locally relevant SDG targets
Collaborative participation and public-value protection	Diversity and inclusion of participants, representation of weaker stakeholders, transparency of partnership rules and traceability of stakeholder contributions	Documented modifications to policies, programmers or implementation arrangements resulting from stakeholder input, together with stronger accountability safeguards	More legitimate, inclusive and context-sensitive implementation, particularly for groups and territories at risk of exclusion
Monitoring and learning	Monitoring reports explicitly connected to decision-making, review procedures, accountability mechanisms and feedback loops	Budgetary, regulatory, organizational or programme adjustments based on monitoring evidence and evaluation findings	Faster correction of implementation gaps, more adaptive public policies and sustained improvement in SDG performance over time

Source: Authors' elaboration. Implementation outputs refer to the immediate institutional or policy changes generated by governance capacities, whereas potential SDG outcomes refer to broader social, economic, environmental or territorial effects. The table identifies theoretically plausible links and does not imply that these outcomes are directly measured in the present study.

To move from a diagnostic framework to a testable research agenda, the five governance capacities should be connected to observable process indicators and implementation outcomes. Table 8 identifies an initial set of metrics through which future research could assess whether SDG-ready public administration is not only institutionally present, but also consequential for policy implementation.

These indicators distinguish the existence of governance arrangements from their actual consequences. The presence of a coordination body, a participation platform or a monitoring report is not, by itself, evidence of implementation capacity. What matters is whether these arrangements influence decisions, reduce policy contradictions, support weaker territories, incorporate stakeholder knowledge and generate visible policy adjustment. Future research should therefore combine process indicators with longitudinal measures of SDG outputs and outcomes. In this sense, the concept of SDG-ready public administration offers not only a diagnostic framework, but also a basis for comparative and longitudinal research on the administrative conditions under which formal SDG commitments become measurable implementation results.

Data availability statement

The original contributions presented in the study are included in the article/Supplementary material, further inquiries can be directed to the corresponding author.

Author contributions

MA: Conceptualization, Formal analysis, Investigation, Methodology, Supervision, Validation, Writing – original draft, Writing – review & editing, Data curation. AR: Supervision, Writing – review & editing. RD: Supervision, Writing – review & editing.

Funding

The author(s) declared that financial support was not received for this work and/or its publication.

Acknowledgments

The authors acknowledge the institutional context of the National Institute for Administration (INA), Portugal, and the colleagues who provided feedback on earlier versions of the manuscript. Any remaining errors are the responsibility of the authors.

Conflict of interest

The author(s) declared that this work was conducted in the absence of any commercial or financial relationships that could be construed as a potential conflict of interest.

Generative AI statement

The author(s) declared that Generative AI was used in the creation of this manuscript. During manuscript revision, the authors used OpenAI ChatGPT (GPT-5.6 Thinking, OpenAI) for language editing and editorial assistance. The authors reviewed all AI-assisted edits and take full responsibility for the final content.

Any alternative text (alt text) provided alongside figures in this article has been generated by Frontiers with the support of artificial intelligence and reasonable efforts have been made to ensure accuracy, including review by the authors wherever possible. If you identify any issues, please contact us.

Publisher's note

All claims expressed in this article are solely those of the authors and do not necessarily represent those of their affiliated organizations, or those of the publisher, the editors and the reviewers. Any product that may be evaluated in this article, or claim that may be made by its manufacturer, is not guaranteed or endorsed by the publisher.

Supplementary material

The Supplementary material for this article can be found online at: https://www.frontiersin.org/articles/10.3389/fpos.2026.1927819/full#supplementary-material.

References

Almeida, F. (2022). The contribution of local agents and citizens to sustainable development: the Portuguese experience. *Sustainability* 14:12696. doi: 10.3390/su141912696

Biermann, F., Kanie, N., and Kim, R. E. (2017). Global governance by goal-setting: the novel approach of the UN sustainable development goals. *Curr. Opin. Environ. Sustain.* 26–27, 26–31. doi: 10.1016/j.cosust.2017.01.010

Bornemann, B., and Christen, M. (2021). A new generation of sustainability governance: potentials for 2030 agenda implementation in Swiss cantons. *Polit. Gov.* 9, 187–199. doi: 10.17645/pag.v9i1.3682

Bowen, K. J., Cradock-Henry, N. A., Koch, F., Patterson, J., Hayha, T., Vogt, J., et al. (2017). Implementing the sustainable development goals: towards addressing three key governance challenges: collective action, trade-offs, and accountability. *Curr. Opin. Environ. Sustain.* 26-27, 90–96. doi: 10.1016/j.cosust.2017.05.002

Calazans, N., Marques, T., Eugénio, T., and Gomes, J. F. S. (2025). Sustainability report of Portuguese municipalities: the three pillars of sustainable development. *Public Organ. Rev.* 25, 169–191. doi: 10.1007/s11115-024-00782-0

de Jong, E., and Vijge, M. J. (2021). From millennium to sustainable development goals: evolving discourses and their reflection in policy coherence for development. *Earth Syst. Gov.* 7:100087. doi: 10.1016/j.esg.2020.100087

Edwards, M. S., and Romero, S. (2014). Governance and the sustainable development goals: changing the game or more of the same? *SAIS Rev. Int. Aff.* 34, 141–150. doi: 10.1353/sais.2014.0028

European Social Survey European Research Infrastructure (ESS ERIC) (2026) ESS11 - Integrated file Sikt - Norwegian Agency for Shared Services in Education and Research. Available online at: https://ess.sikt.no/en/

Firoiu, D., Ionescu, G. H., Pirvu, R., Badircea, R., and Patrichi, I. C. (2022). Achievement of the sustainable development goals (SDG) in Portugal and forecast of key indicators until 2030. *Technol. Econ. Dev. Econ.* 28, 1649–1683. doi: 10.3846/tede.2022.17645

Florini, A., and Pauli, M. (2018). Collaborative governance for the sustainable development goals. *Asia Pac. Policy Stud.* 5, 583–598. doi: 10.1002/app5.252

Forestier, O., and Kim, R. E. (2020). Cherry-picking the sustainable development goals: goal prioritization by national governments and implications for global governance. *Sustain. Dev.* 28, 1269–1278. doi: 10.1002/sd.2082

Fox, O., and Stoett, P. (2016). Citizen participation in the UN sustainable development goals consultation process: toward global democratic governance? *Glob. Gov.* 22, 555–574. doi: 10.1163/19426720-02204007

Glass, L.-M., and Newig, J. (2019). Governance for achieving the sustainable development goals: how important are participation, policy coherence, reflexivity, adaptation and democratic institutions? *Earth Syst. Gov.* 2:100031. doi: 10.1016/j.esg.2019.100031

Joshi, D. K., Hughes, B. B., and Sisk, T. D. (2015). Improving governance for the post-2015 sustainable development goals: scenario forecasting the next 50 years. *World Dev.* 70, 286–302. doi: 10.1016/j.worlddev.2015.01.013

eds. N. Kanie and F. Biermann (2017). *Governing through Goals: Sustainable Development Goals as Governance Innovation*. Cambridge, MA: MIT Press.

Kapucu, N., and Beaudet, S. (2020). Network governance for collective action in implementing United Nations sustainable development goals. *Adm. Sci.* 10:100. doi: 10.3390/admsci10040100

Le Blanc, D. (2015). Towards integration at last? The sustainable development goals as a network of targets. *Sustain. Dev.* 23, 176–187. doi: 10.1002/sd.1582

Meuleman, L. (2021). Public administration and governance for the SDGs: navigating between change and stability. *Sustainability* 13:5914. doi: 10.3390/su13115914

Meuleman, L., and Niestroy, I. (2015). Common but differentiated governance: a meta-governance approach to make the SDGs work. *Sustainability* 7, 12295–12321. doi: 10.3390/su70912295

Monkelbaan, J. (2019). *Governance for the Sustainable Development Goals: Exploring an Integrative Framework of Theories, Tools, and Competencies*. Singapore: Springer.

Nilsson, M., Griggs, D., and Visbeck, M. (2016). Map the interactions between sustainable development goals. *Nature* 534, 320–322. doi: 10.1038/534320a

Schneider, H., Zulu, J. M., Mathias, K., Cloete, K., and Hurtig, A.-K. (2019). The governance of local health systems in the era of sustainable development goals: reflections on collaborative action to address complex health needs in four country contexts. *BMJ Glob. Health* 4:e001645. doi: 10.1136/bmjgh-2019-001645

Singh, V. (2024). Role of institutions in public management: developing case studies for divergent policy systems. *Front. Polit. Sci.* 6:1258811. doi: 10.3389/fpos.2024.1258811

Sobral, S., Catarino, J. R., and Nunes, A. M. (2026). Exploring the criteria and processes of collaborative governance for SDG implementation in Portugal. *Highlights of Sustainability* 5, 70–83. doi: 10.54175/hsustain5010006

Stafford-Smith, M., Griggs, D., Gaffney, O., Ullah, F., Reyers, B., Kanie, N., et al. (2017). Integration: the key to implementing the sustainable development goals. *Sustain. Sci.* 12, 911–919. doi: 10.1007/s11625-016-0383-3

Van Zanten, J. A., and van Tulder, R. (2020). Towards nexus-based governance: defining interactions between economic activities and sustainable development goals. *Int. J. Sustain. Dev. World Ecol.* 28, 210–226. doi: 10.1080/13504509.2020.1768452

Xue, L., Weng, L., and Yu, H. (2018). Addressing policy challenges in implementing sustainable development goals through an adaptive governance approach: a view from transitional China. *Sustain. Dev.* 26, 150–158. doi: 10.1002/sd.1726