

**“The ‘Do No Significant Harm’ (DNSH) Principle in the European Taxonomy Regulation.
Its practical integration and application in the implementation of financed projects.
Challenges and Prospects.”**

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Introduction

The **European Green Deal** (2019) aims for climate neutrality by 2050, supported by €350 billion in annual sustainable investments. Central to this effort, the **EU Taxonomy Regulation** (2020/852) introduces the **Do No Significant Harm (DNSH)** principle to ensure activities avoid substantial environmental harm. This study examines DNSH's implementation across EU and national levels, its effectiveness and challenges, and proposes improvements to strengthen its role in the EU's green transition.

Methodology

Through a literature review of European case studies, this study records the contribution of the DNSH principle to sustainable finance, the challenges of its implementation, and recommendations for improvements to ensure more effective practical application.

CLIMATE - SUSTAINABILITY - GREEN TAXONOMY

Human-driven CO₂ emissions cause global warming, melting ice, rising seas, and extreme weather, endangering ecosystems and societies. The IPCC urges immediate emission reductions and sustainable action to build climate resilience.

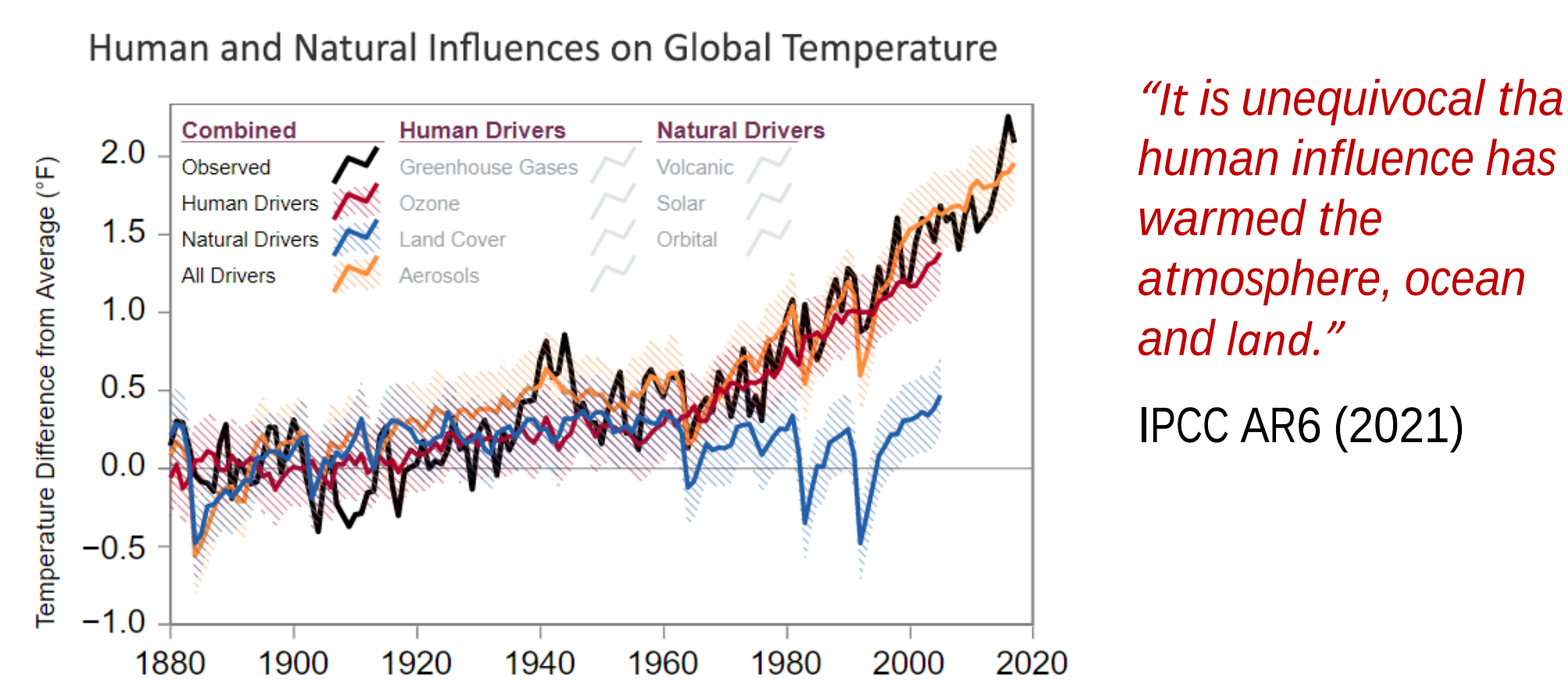


Figure 1. Natural and anthropogenic drivers of temperature rise

The climate crisis is systemic; it is not confined to a specific geographic region but has a planetary scope, destabilizing multiple subsystems simultaneously (markets, infrastructure, nature, etc.).

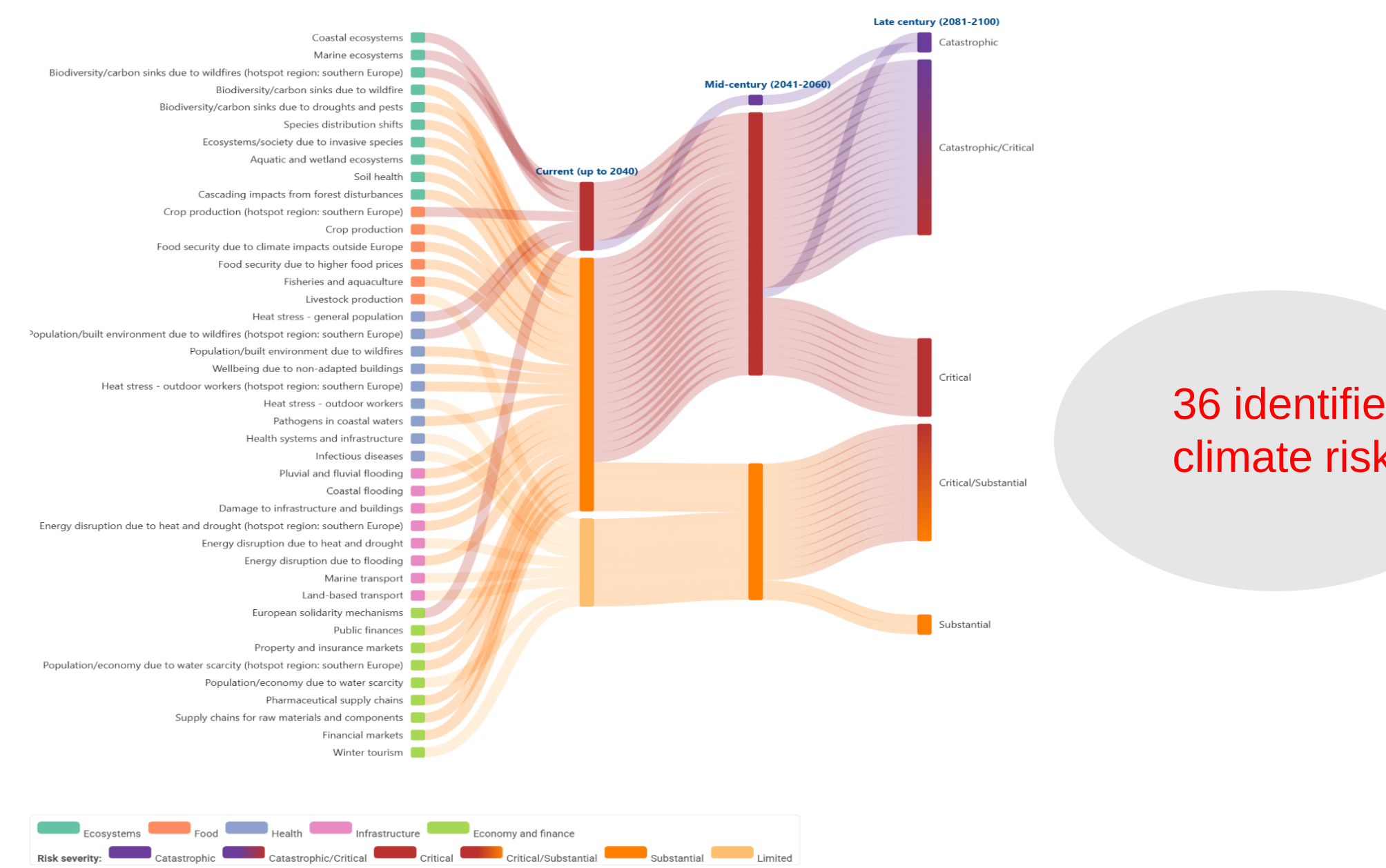


Figure 2. [European Climate Risk Assessment](#)



Figure 3. Sustainable Development, Triple-Bottom-Line

The Green Taxonomy defines criteria for classifying environmentally sustainable economic activities. It includes eligible actions, technical screening, and social safeguards, aiming for climate neutrality by 2050 through sustainable investments. The Regulation sets out six key environmental objectives.

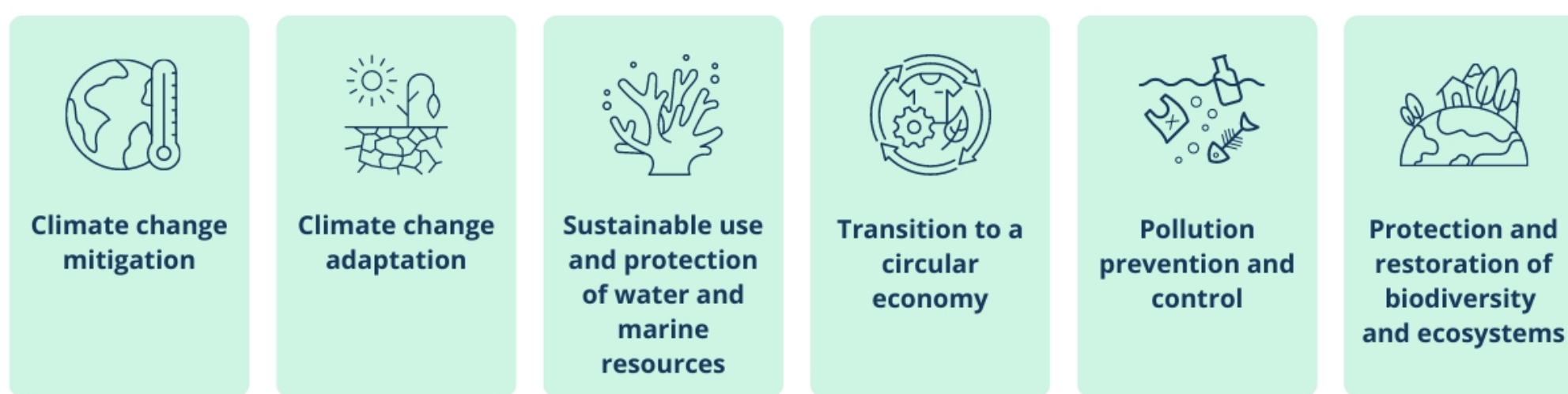
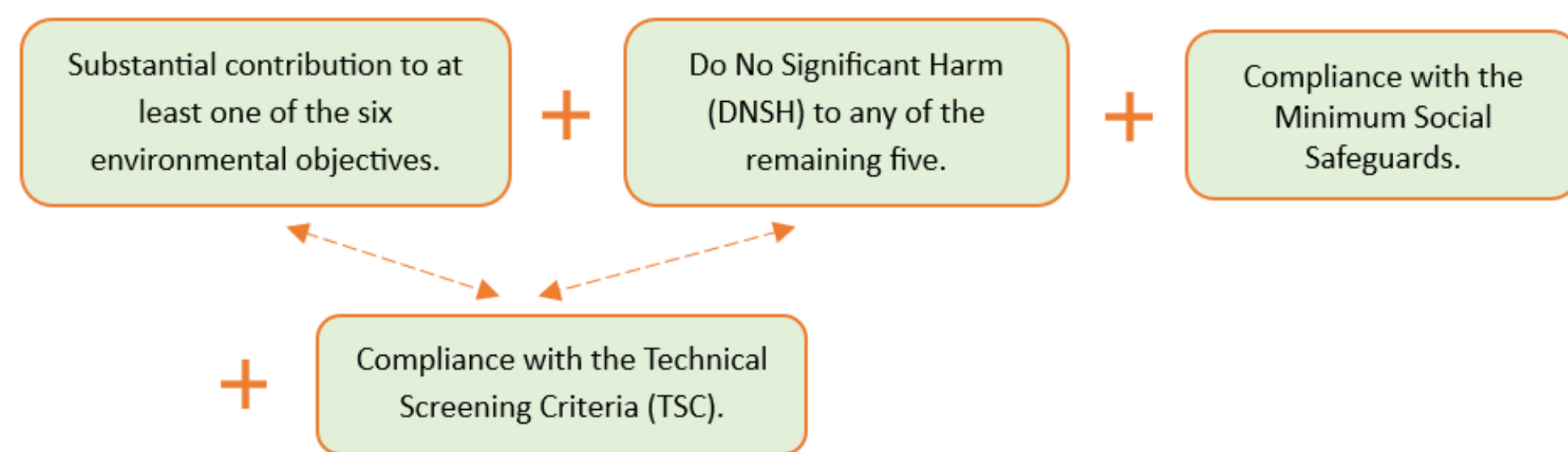


Figure 4. The six Environmental Objectives

An economic activity or investment may be classified as environmentally sustainable when it meets the **criteria** illustrated in the following figure:



ANALYSIS OF THE DNSH PRINCIPLE

DNSH: a thorough introspection

The DNSH principle ensures environmental goals are met without causing harm, using criteria updated with scientific progress.

The activity causes significant harm...	When...
climate change mitigation .	...leads to significant greenhouse gas emissions.
climate change adaptation .	...leads to an increased adverse impact of actual and anticipated climate conditions on the activity itself, or on people, natural resources, or assets.
the sustainable use and protection of water and marine resources .	...is detrimental to the good status or good ecological potential of water bodies, including surface and groundwater, or to the good environmental status of marine waters.
the circular economy , including waste prevention and recycling.	...leads to significant inefficiencies in the use of materials or in the direct or indirect use of natural resources, or if it substantially increases the generation, incineration, or disposal of waste, or if the long-term disposal of waste is likely to cause significant and long-lasting harm to the environment.
pollution prevention and control.	...leads to a significant increase in pollutant emissions into the air, water, or soil.
the protection and restoration of biodiversity and ecosystems.	...is significantly detrimental to the good condition and resilience of ecosystems, or is harmful to the conservation status of habitats and species, including those of Union interest.

Table 1. The concept of “significant harm”

The DNSH principle functions as a “negative-filter” which excludes unsustainable investments, prevents greenwashing, and directs capital to the green transition, becoming a key EU environmental standard.

DNSH in financing instruments

This study examines the institutional, regulatory, and operational dimensions of the DNSH principle within the framework of EU and Member States' financing and development policies. Its integration is analyzed in instruments such as the Recovery and Resilience Facility, the Partnership Agreement for the Development Framework (ESPA) programs, the new Development Law, and the Climate Law, where it functions as an exclusion mechanism for environmentally non-compliant investments

The DNSH principle must be applied in practice across the entire life cycle of infrastructure projects—from design and implementation through phase-out

<i>Project Phase</i>	<i>Response Strategy – DNSH approach</i>
<i>Planning</i>	During the initial design and study phase, the impact on the six Environmental Objectives must be taken into account both during the Construction phase and the Operation phase, so that appropriate mitigating and/or compensatory measures can be foreseen for each objective.
<i>Construction</i>	Adoption of measures to minimize environmental impacts during the implementation-construction phase of the project, e.g., pollutant emissions from machinery, waste management, and ecosystem disturbance.
<i>Operation</i>	It concerns the set of measures to be implemented during the operation phase of the project, e.g., pollutant emissions from operation, energy consumption, and waste management systems. Maintenance activities during the project's operation also constitute an integral part of this phase and the potential environmental burden they may cause should not be overlooked.
<i>Disposal</i>	This is perhaps the most underestimated phase in terms of management assessment. However, ideally, the environmental burden arising from the project's withdrawal and phase-out/dismantling should be taken into account. How demolition materials will be disposed of, as well as their potential reuse or recycling, are scenarios that must be considered already at the design stage.

Examples of DNSH application are examined in the study regarding infrastructure and renewable energy projects show that, despite the increased costs due to compensatory measures, resilience and sustainability are enhanced when such ***DNSH-measures*** are anticipated in a timely manner.

EVALUATION - REVIEW

Contribution of the principle :
The DNSH principle...

- ✓ integrates environmental criteria and life-cycle analysis into projects, prevents greenwashing,
- ✓ enhances transparency and comparability,
- ✓ directs investments towards green activities,
- ✓ promotes innovation,
- ✓ reduces environmental risks, and
- ✓ strengthens the coherence of European environmental policies.

Challenges in implementation

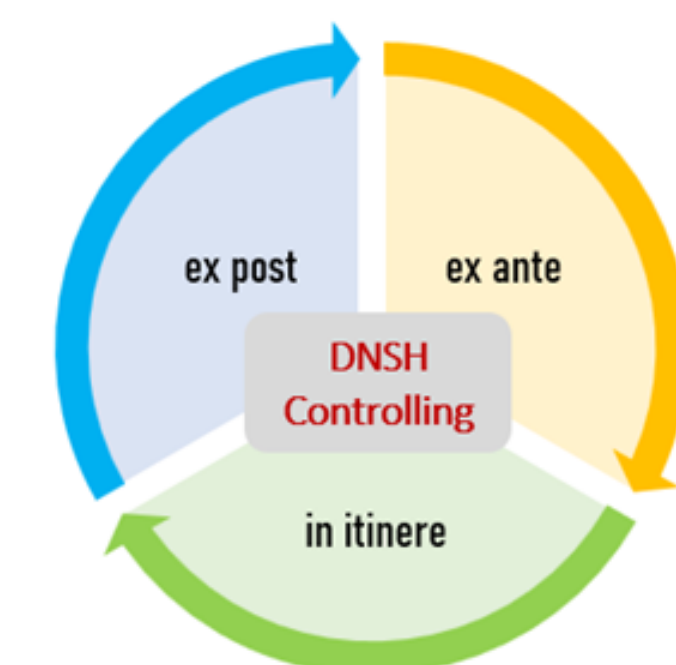
Three years on, the DNSH principle faces issues of complexity, cost, limited expertise, inconsistent application, and weak monitoring, raising greenwashing risks. Studies suggest clearer, standardized tools like traffic-light systems and scorecards to improve implementation.

IMPROVEMENT PROPOSALS

Improvement proposals for DNSH, as identified in the international literature, include:

- provision of technical assistance and training to implementing bodies
- harmonization of methodologies and criteria among Member States
- development of digital assessment tools and databases of best practices
- greater clarity in implementation guidelines
- stricter criteria with exclusion lists
- gradual extension of the principle to smaller-scale projects
- integration of DNSH into permitting procedures
- strengthening of monitoring and oversight mechanisms
- public disclosure of evaluation results
- use of quantifiable indicators to determine “significant harm”
- unification of tools across all financing instruments
- reduction of bureaucracy without compromising reliability.

DNHS is a key EU tool for the green transition, capable of advancing sustainability if implementation gaps are resolved and improvements ensure balance between protection, effectiveness, and practicality.



CONCLUSIONS

The DNSH principle, key to the EU Taxonomy and Green Deal, supports sustainable investments but faces implementation gaps. With evolving criteria, it requires ongoing adaptation. Targeted improvements can boost its rigor, usability, and global alignment, ensuring balanced, transparent, and effective application..

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