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## Enabling a 2040 climate-neutral EU A science-based 2040 EU climate target and how to reach it

This year, the European Union will add another fundamental brick in its climate architecture: a 2040 climate target. Setting a 2040 target is a legal obligation under the European Climate Law. But it also raises a crucial opportunity for the EU to go beyond its current level of ambition.

By aligning its 2040 ambition with the 1.5°C target of the Paris Agreement, the EU would:

- **Send a strong signal for the continuation of the European Green Deal**, in the next few years as well as beyond 2030. It would be a sign of continuity and investment predictability crucial for accelerating the EGD's implementation, but also for ramping up competitiveness, shaping a clean industrial transformation, and building energy and socio-economic security – including by phasing out fossil fuels, rolling out renewables and energy savings measures.
- **(Re)gain a leadership role in climate diplomacy**. At COP29, the first major countries put their new NDCs on the table. To regain a leadership position, the EU needs to do the same: it must do its fair share to reach the 1.5°C objective by adopting its 2035 and 2040 climate targets in line with its historical responsibility and capacity to act.
- **Avoid the costs of climate change and harness the gains of the transition**. While delaying climate action will imply dramatic costs for society and the economy, as highlighted by the European Climate Risk Assessment (EUCRA) and by the devastating climate impacts registered across Europe, acting timely and decisively will bring a wide range of benefits: following an ambitious decarbonisation pathway aligned with the 1.5°C temperature goal, the EU could [gain](#) at least €1 trillion already by 2030.

In the next sections, this policy options paper provides a brief overview of how the 2040 target should be set, taking into account Europe's historical responsibility and capacity to act. It also hints at some urgent policy steps constituting enabling conditions for its achievement.

### 1. SETTING THE 2040 CLIMATE TARGET

In February 2024, the Commission issued a [Communication](#) which proposes a target of **90% net greenhouse gas emission reductions by 2040** (compared to 1990 levels). While the legislative process and negotiations on the target are currently in the preliminary phases, it is already worth noting that such a target would lag the ambition level recommended by both the Commission's own [Impact Assessment](#) and the European Scientific Advisory Board on Climate Change ([ESABCC](#)), both of which indicate that higher ambition levels are most beneficial and better reflect equity principles. The ESABCC notably recommends that the EU should set a 2040 climate target of 90-95% net emission reductions, compared to 1990 levels, and highlights that pursuing the more ambitious end range improves the fairness of the EU's contribution. Several crucial stakeholders – coalitions of businesses, investor groups, local and regional authorities, trade unions and civil society groups – also consider such a 90% reduction as a bare minimum, and have jointly [called](#) for an 'at least 90%' net target by 2040.

To fulfill its commitment under the Paris Agreement, the EU should not only align with science – meeting the 1.5°C objective – but also with equity principles – that is, considering its historic responsibility for greenhouse gas emissions and weighing its financial capacity to act against the climate crisis. These concepts are enshrined in the fundamental UNFCCC principle of "common but differentiated responsibilities and respective capabilities" (CBDR-RC). To achieve such an objective the EU should, on the one hand, **achieve domestic net zero greenhouse gas emissions by 2040 at the latest**; on the other, complement its domestic action with significant additional support to **enable mitigation in Global South countries**, through climate finance and other means of implementation (technology transfer, technical assistance, capacity building), as also **stressed** by the ESABCC.

In achieving net zero greenhouse gas emissions by 2040, the reduction of gross emissions should remain the absolute priority. In this spirit, the EU should develop **three separate and distinct targets**, respectively for a) gross emissions reduction, b) net carbon dioxide sequestration in the land use (LULUCF) sector, and c) permanent industrial carbon dioxide removals based on a thorough assessment of their sustainable scale-up, taking into account risks, benefits and trade-offs.

A target of at least 92% gross emission reductions (compared to 1990 levels) should constitute the cornerstone of this three-target approach, backed up by much greater efforts to sustainably manage, protect, and restore the EU's forests, including through the implementation of the Nature Restoration Law, which would allow, despite adverse climate impacts, to achieve much stronger LULUCF targets than the EU currently foresees.

## 2. ENABLING CONDITIONS TO REACH THE 2040 TARGET

A target so ambitious requires a vast set of actions in the short-, medium- and long-term. Luckily, EU Member States *can* implement the necessary changes – and the time, if they start acting upon them now. Below we provide a list of enabling conditions for achieving the 2040 target. The general principle is simple: we need to start implementing all that has been agreed upon, and add much more on top of that.

The EU needs to fully and timely implement all legislation, policies and measures that have been laid out in the past five years – in the 'Fit for 55' package – in order to first get to and overshoot the current EU 2030 targets. This is a key pre-condition and notably revolves around an ambitious drafting and implementation of NECPs, some of which have more than 6 months of delay. Thus far, the plans are **insufficient** not only to align with the Paris Agreement commitments and even to meet current EU climate targets. The existence of such an ambition gap has been emphasized by the Commission's **State of the Energy Union**, the latest EEA 'Trends and Projections' **report** and by the **ESABCC**. This requires an immediate change of speed.

On top of implementing key legislation, the EU and its Member States must go further. They must ensure that more updated and better legislation is put in place; and that more money is made available for the transition; to create the economic conditions that would ensure competitiveness while protecting nature and without leaving anyone behind. We provide a few incremental ideas below, divided by policy category.

## Energy transition

- **Energy Efficiency** – Member States must, at minimum, correctly transpose the 2023 Energy Efficiency Directive into national law by October 2025 and surpass the 2030 energy efficiency target to align with the Paris Agreement. The gap to reach the EU energy efficiency contributions must be addressed through final NECP submissions and their future implementation.
- **Renewable Energy** – Timely and robust implementation of the Renewable Energy Directive (RED III) is crucial to achieve the updated 2030 renewable energy target of 42.5%, aiming for 45%. This requires accelerated deployment of renewable projects, focusing on wind and solar, while integrating co-benefits through people- and nature-inclusive approach. Efforts should enhance grids, increase storage and improve demand-side and system flexibility.
- **Buildings** – Member States must strengthen implementation of the Energy Performance of Buildings Directive, completing transposition by May 2026. Member States' commitment to overshooting targets in order to meet 2030 energy and climate goals will be crucial, given the flexible nature of EPBD provisions. Gaps and shortcomings in past National Long-term Renovation Strategies must be resolved through ambitious, equitable [National Building Renovation Plans](#). These plans must prioritise worst-performing buildings, use a set of regulatory tools like Minimum Energy Performance Standards, and design frameworks to triple deep renovation rates by 2030 and stabilise in the next decade. Alignment of renovation plans with Social Climate Plans will be crucial to support vulnerable and energy poor households during the EU-ETS2 rollout.
- **Fossil Fuel Phase-Out** – A socially just framework for phasing out fossil fuels, especially gas, is essential. Gas demand must [decline](#) steeply, guided by Council Regulation EU 2022/1369 and an Action Plan for gas phase-out [by 2035](#). Fossil infrastructure decommissioning should be planned; in that respect, Directive (EU) 2024/1788 requires to implement the Network Decommissioning Plans by August 2026. Additionally, stronger implementation of the EU Methane Regulation is critical, particularly on methane import standards. Cutting methane emissions in oil & gas operations is vital both for short-term action and achieving the 2040 target.
- **No EU Funds for Nuclear Energy** – New nuclear energy, including Small Modular Reactors (SMRs), is too [slow, expensive, and unreliable](#) to significantly aid decarbonization. Funds should prioritize cost-efficient technologies like renewables, grids, storage, and flexibility.

## LULUCF and Nature

The EU LULUCF sink is declining sharply and, as [noted](#) in the LULUCF regulation operation report, is off-track to meet the 2030 target (310 MtCO<sub>2</sub>e) due to [poor ecosystem management](#), particularly in [forests](#). The EU must:

- **Improve Forest Management** – Adopt close-to-nature forest management and strictly protect [old-growth forests](#) to reduce emissions and enhance the carbon sink.

- **Enhance Ecosystem Restoration** – [Leverage synergies](#) with the Nature Restoration Law to expand and restore forests and wetlands, scaling up ecosystem restoration efforts.
- **Align Agriculture and Biomass Policies** – Implement [ESABCC recommendations](#) to ensure EU policies on agriculture and biomass support climate and biodiversity goals, maintaining and expanding forests and wetlands.
- **Develop a Forest Monitoring Law (FML)** – [Establish](#) a FML to standardize forest data collection with clear definitions and consistent methodologies across the EU. This will provide reliable data to restore forest ecosystems and reverse the carbon sink decline.

## Industry, circularity, competitiveness

- **Center competitiveness around the Green Deal** – The EU's long-term competitiveness [depends](#) on a clean industrial strategy aligned with the European Green Deal. This strategy should drive net-zero technology production, end fossil fuel dependence, and lower energy and material demand. Europe's reliance on imported energy and raw materials in a turbulent geopolitical context creates economic and political dependencies and contributes to high energy prices.
- **Implement key secondary legislation** – Swiftly implement ambitious secondary legislation, including the Net Zero Industry Act and the Industrial Emissions Directive, to streamline industry decarbonisation and enable net-zero technologies. A swift implementation of the Ecodesign Regulation – notably of ecodesign requirements for intermediary products – is key to leverage product policy as an additional driver for industrial transformation. It would strengthen regulatory certainty and provide a long-term vision to unlock private investments.
- **Potential of circular economy measures** – Ensure new initiatives (e.g. Circular Economy Act and Clean Industrial Deal) harness the potential of circular economy measures by adhering to the waste treatment hierarchy: refuse, reduce, reuse, repair and then recycle. Focus should be on material efficiency and resource use measures, as well as on the creation of circular industries, such as secondary manufacturing. This will lower reliance on imported raw materials while supporting climate goals and competitiveness.
- **Strategic approach to industrial transformation** – Adopt a strategic approach to industrial transformation by (1) prioritising scalable, rapidly deployable technologies; (2) actively phase out fossil fuels to avoid technological lock-ins; and (3) focus on demand-side measures that reduce energy and raw material needs of breakthrough technologies.

## Finance

- **Increase EU Budget for Green Investments** – From the 2028–34 Multiannual Financial Framework (MFF), the EU budget should permanently rise to at least 2% of EU GDP, avoiding a funding gap after Next Generation EU ends in 2026. Half of the budget should finance a [European Social and Green Investment Plan](#) to (1) address additional public climate investment needs (1.7–2% of GDP up to 2040 according to the European Commission), (2) close the €19 billion annual biodiversity funding gap for 2021–2030, and (3) reinforce just transition finance to benefit workers, households, regions, and communities.

- **Raise New Taxation Resources** – Introduce EU-wide [progressive taxation](#) aligned with the “polluter pays principle” to expand the EU budget and mobilize further Member States’ resources to fill the climate spending gap. Delaying action [imposes](#) higher social and environmental costs than mobilizing resources now.
- **Phase out Fossil Fuel Subsidies** – Fully [phase out](#) fossil fuel subsidies in national budgets and exclude any support for fossil infrastructure under all EU funding streams, starting with the next 2028-34 MFF. CAN Europe has made 6 detailed [recommendations](#) for EU Member States to phase out fossil fuel subsidies in a socially just manner in line with the 2025 fossil fuel subsidy phaseout commitment.
- **Reform the European Semester** – The European Semester should be substantially improved by providing incentives for Member States to mobilise additional national expenditures for financing climate and the just transition – among others by adopting a green budgeting, eliminating fossil fuel and environmentally harmful subsidies, and raising resources through [progressive taxation](#).
- **Set environmental conditionalities for industrial policies** – Set harmonised environmental and social [conditionalities](#) for companies receiving any form of public finance (state aid, public procurement, EU funds, national subsidies and rigorously monitor compliance. Imposing such conditionalities is the only way to ensure that industrial policy delivers the goal of complete industry decarbonisation by 2040.

## Just transition

- **Include fairness in climate policy design** – Policies and investments to reach 2040 climate targets must be designed to ensure fair distribution of costs and benefits across individuals, households, communities, regions, and countries. This requires distributional impact assessments and participatory processes involving representatives of marginalized groups, people at risk of poverty, social justice organisations, etc. Limits on corporate lobbying are essential to prevent disproportionate influence on decision-making.
- **Adopt sectoral transition pathways** – Adopt robust sectoral pathways to meet 2040 climate targets, centering on social and civil dialogue. Combined with a [Just Transition Directive](#), these sectoral pathways will have to address the socio-economic impacts of the transition for workers and citizens. They will have to tackle inequality in access to housing, energy, mobility, and more while offering sustainable, affordable alternatives to polluting practices.
- **Strengthen current frameworks** – The European Semester should encourage investment in social protection systems and public services, which are vital to shield people from climate crisis disruptions and ensure no one is left behind. Additionally, fully implement and reinforce the European Pillar of Social Rights, making it binding, climate-proof, and future-ready.
- **Improve Policy Alignment and Governance** – Enhance consistency between climate, environmental, economic, and social policies through regular Council meetings between environment and social/employment configurations, as well as joint European Parliament committee meetings. Foster synergies and dialogue platforms among regions, cities, national governments, the EU, and stakeholders.



- **Alignment with UNFCCC timeframes** – The EU must align climate targets and policy planning with the 5-year time frames agreed at the UNFCCC level. This provides opportunities to review and increase ambition, avoiding lock-in to inadequate emission pathways and delays to needed emission cuts. Such alignment must include 5-year policy revision periods and the [establishment](#) of a 2035 climate target in the European Climate Law, meeting Article 4.7 requirements.
- **Separation of targets for emissions and removals** – To prioritize emission reductions and safeguard environmental integrity, the post-2030 climate policy must separate gross emission reductions, land-based net removals, and permanent industrial removals. This requires setting [three distinct targets](#) and dedicated policy instruments, with no flexibility across sectors covered by the Emissions Trading System (ETS) and Effort Sharing Regulation (ESR).
- **Maintain binding national targets** – National climate targets and compliance structures must remain binding, including in those sectors (ESR) where carbon pricing will be introduced. Carbon pricing is a key pillar of EU climate policy but should be complementary to and work in synergy with other climate, environmental and social policies.
- **Keep efficiency and renewables targets** – EU-level targets for energy savings and renewable energy must continue post-2030 to achieve the 2040 climate goal. Energy demand should be [halved](#), and 100% renewable energy [reached](#) by 2040.
- **Strengthen the Governance Regulation** – The Governance Regulation needs to continue providing a solid, actionable, and transparent framework for the achievement of the 2030 and 2040 climate and energy targets. Elements relating to reporting, transparency, compliance and public participation should be improved.



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