

currENT welcomes the European Commission's proposal for a regulation on measures for strengthening Europe's net-zero technology products manufacturing ecosystem (Net Zero Industry Act).

As a representative of innovative breakthrough technologies, vital for reaching Europe's climate and energy independence objectives, currENT finds it absolutely vital that the European Union framework conditions for developing, demonstrating and commercialising clean energy technologies are dramatically improved.

We find it absolutely crucial that the Commission's proposal maintains its focus on the eight technologies proposed in Annex 1. Some of the proposals put forward by the European Parliament rapporteur risk diluting the attention from the core purpose of the NZIA to "establish the framework of measures for innovating and scaling up the manufacturing capacity of net-zero technologies in the Union", in order to provide an adequate response to the US Inflation Reduction Act.

We strongly believe the eight strategic Net Zero technologies, as outlined in the European Commission proposed Annex, should remain the priority focus of the NZIA targets and provisions. Leaving the door open to "any technology" or expanding the scope of the NZIA to include the chemicals or buildings industry, under the rationale that these materials are used in clean tech, will seriously weaken the Commission's NZIA proposal. At a time when European clean tech manufacturers and technology developers such as currENT's members are being tempted by increasingly attractive framework conditions, not least in the United States, preserving the focus of the NZIA is essential for its ability to maintain European clean technology leadership.

All pathways to meet Europe's agreed 2050 decarbonisation target, would imply a 2040 energy system largely dependent on a fully decarbonised electricity supply, predominantly based on variable wind power and intermittent solar power. For such an energy system to materialise, Europe must start planning, demonstrating and deploying innovative grid enhancing technologies and advanced power cable technology, including superconducting cable systems, capable of moving, massive amounts of electricity at no losses and with minimal use of critical raw materials.

The International Energy Agency has already established that "almost half of the 2050 reductions in greenhouse gasses must come from technologies that are currently at the demonstration or prototype phase." It would be prudent of Europe to provide rapid and meaningful support to those innovative technologies. Therefore, it is very positive

that transmission grids are included as one of eight strategic technologies in the Commission's proposal.

Moreover, it is very important that the proposal's Article 26 on 'Innovative net-zero technologies' and 'Regulatory Sandboxes' is maintained. Diluting these technologies by including all SET-plan technologies, as suggested by some European Parliamentarian would dilute the proposal and decrease efficiency and focus.

Likewise, the Commission's proposed Article 3, which defines 'innovative net-zero technologies' must be maintained. Defining Innovative Technologies According to the SET-plan would dramatically widen the scope for these innovative technologies as well. currENT recommends that a new article (**for example New Article 26 (3) bis**) is introduced to ensure that transmission and distribution system operators ensure that provisions are made for testing new, innovative grid technologies:

"For net-Zero regulatory sandboxes established for Innovative net-zero Electricity grid technologies, Member States must ensure participation of relevant national TSOs and DSOs in overcoming any technical or administrative barriers to establishing the net-zero sandbox."

Justification for this new Article 26 (3) bis is:

- Sandboxes will be needed to bring ensure that safe and reliable technology can be proven. Specifically for Innovative Grid Technologies, a mechanism is needed to secure positive engagement from TSOs and DSOs;
- There needs to be a transparent and non-discriminatory process whereby TSOs and DSOs are required to respond to requests for a sandbox project and engage in their successful implementation.
- Unlike renewable generation or supply side technology, grid technology does not aim to just connect with the grid - it aims to be part of the grid. To move power rather than to make or consume power. Therefore, innovative grid technology requires special attention;