

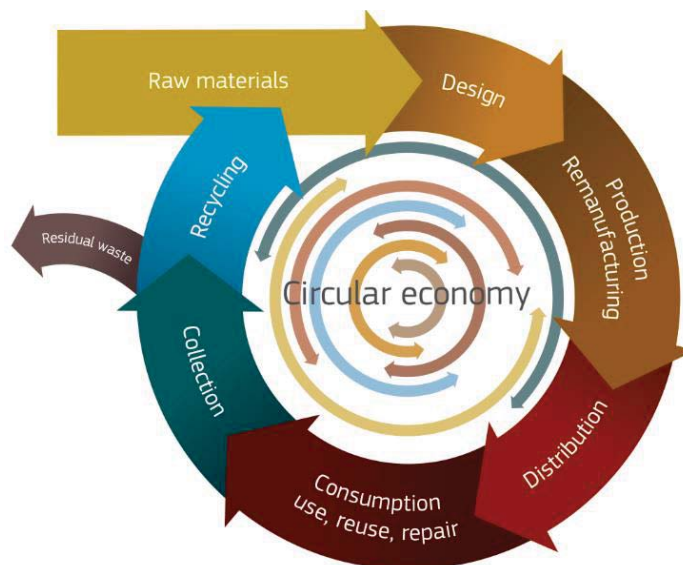


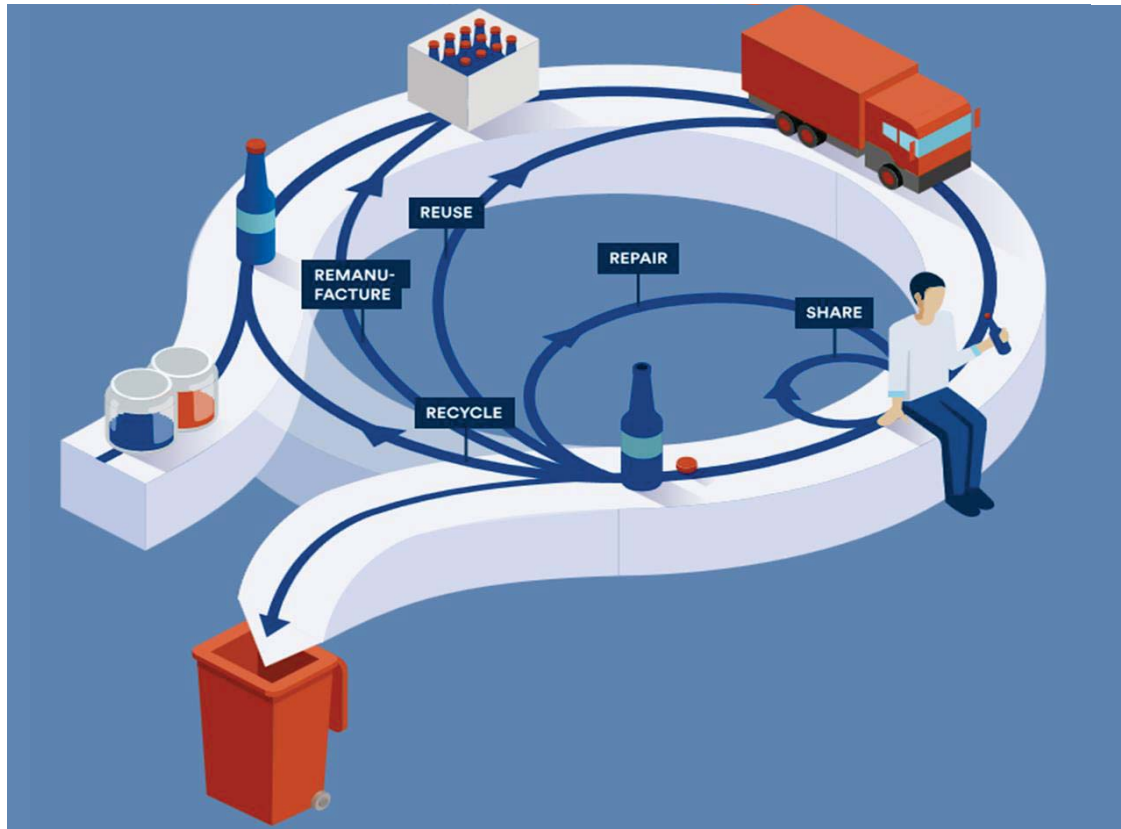
The Circular Economy Action Plan: engaging companies in the transition

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Consumption*



What is Circular Economy?





Why do we need a Circular Economy?

- Environment**

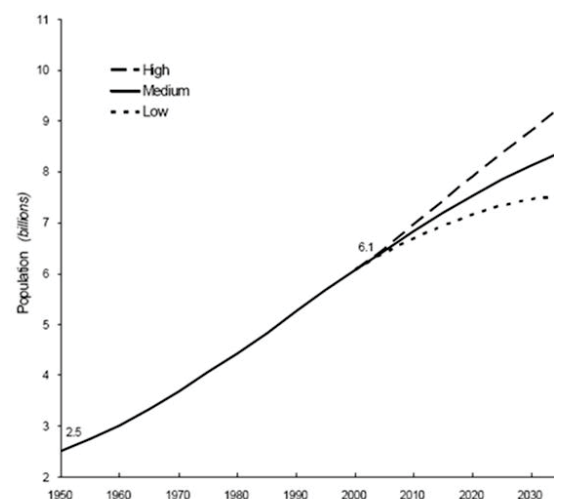
- inefficient use of resources
- greenhouse gas and other emissions
- depletion of resources
- impacts on landscape
- water pollution

- Access to raw materials**

- scarcity or depletion of resources
- future trends

- Societal pressures**

- global middle class = 5 billion by 2030



Estimated world population and projections



Circular Economy and Green Growth

- **Significant cost saving and job creation opportunities** for EU industry from circular economy approaches:

- ✓ Potential net benefits for businesses in the EU from improved resource efficiency (waste prevention and re-use, focus on eco-design and similar measures) = could bring net savings of €600 billion, or 8% of annual turnover, to EU businesses, while reducing greenhouse gas emissions by 2-4%
- ✓ Increasing resource productivity by 30% could create 2 million more jobs by 2030 than under a business as usual scenario.
- ✓ CO2 emissions could drop as much as 48% by 2030 (31% on the current development path) and 83% by 2050 (61% on the current development path), compared with 2012 levels



1 action plan 4 + 1 key areas 5 priority sectors 54 actions



Actions	Timetable
Production	
Emphasis on circular economy aspects in future product requirements under the Eco-design Directive	2018 onwards
Eco-design work plan 2016-2017 and request to European standardisation organisations to develop standards on material efficiency for setting future Eco-design requirements on durability, reparability and recyclability of products	December 2015
Proposal for an implementing regulation on televisions and displays	End 2015 or beginning 2016
Examine options and actions for a more coherent policy framework of the different strands of work of EU product policy in their contribution to the circular economy	2016 onwards
Include guidance on circular economy into Best Available Techniques reference documents (BATs) for several industrial sectors	2016 onwards
Guidance and promotion of best practices in the mining waste management plans	2016
Establishing an open, pan-European network of technological infrastructures for SMEs to integrate advanced manufacturing technologies into their production processes	2016 onwards
Examine how to improve the efficiency and uptake of the EU Eco-Management and Audit Scheme (EMAS) and the pilot programme on environmental technology verification (ETV)	2017
Develop an improved knowledge base and support to SMEs for the substitution of hazardous substances of very high concern	2018
Consumption	
Better enforcement of existing guarantees on tangible products, accompanied by a reflection on improvements concerning Commission proposal for online sales of goods, and Fitness Check of consumer legislation	2016-2017
Action on false green claims, including updated guidance on urban commercial practices	2016
Analysis of the possibility to provide technical requirements on repair information provision in the context of Eco-design	2016
REPF of Eco-label, to be followed by actions to enhance its effectiveness	2016
Assessment of the possibility of an independent testing programme on product obsolescence	2016
Subject to evaluation of the current ongoing pilots, explore the possible uses of the Product Environmental Footprint to measure and communicate environmental information	2016 onwards
Action on Green Public Procurement: enhanced integration of circular economy requirements, support to higher uptake including through training schemes, reinforcing its use in Commission procurement and EU funds	2016 onwards
Waste management	
Revised legislative proposal on waste	Q4 2016
Improved cooperation with Member States to better implementation of EU waste legislation, and control (illicit shipment of end-of-life vehicles)	2016 onwards
Shipping up enforcement of revised Waste Shipment regulation	2016 onwards
Promotion of industry-led voluntary certification of treatment facilities for key waste incineration streams	2016 onwards
Initiation on waste to energy in the framework of the Energy Union	2016
Identification and dissemination of good practices in waste collection systems	2016 onwards
Market for secondary raw materials	
Development of quality standards for secondary raw materials (in particular for plastics)	2016 onwards
Proposal for a revised fertilisers regulation	Early 2016
Proposed legislation setting minimum requirements for reused water for irrigation and groundwater recharge	2017
Promotion of safe and cost-effective water reuse, including guidance on the integration of water reuse in water planning and management, inclusion of best practices in relevant EPRs, and support to innovation (through the European Innovation Partnership and Horizon 2020) and investments	2016-2017

Analysis and policy options to address the interface between chemicals, products and waste legislation, including how to reduce the presence and improve the handling of chemicals of concern in products	2017
Measures to facilitate waste shipment across the EU, including electronic data exchange (and possibly other measures)	2016 onwards
Further development of the EU raw materials information system	2016 onwards
Sectoral action	
Plastics	
Strategy on plastics in the circular economy	2017
Specific action to reduce marine litter implementing the 2002 Sustainable Development Goals	2015 onwards
Food waste	
Development of a common methodology and indicators to measure food waste	2016
Stakeholders platform to examine how to achieve SDG goals on food waste, share best practice and evaluate progress	2016
Clearly relevant EU legislation related to waste, food and feed in order to facilitate food donation and utilisation of former foodstuffs for animal feed	2016
Explore options for more effective use and understanding of date marking on food	2017
Critical raw materials	
Report on critical raw materials and the circular economy	2017
Improve exchange of information between manufacturers and recyclers on electronic products	2016 onwards
European standards for material-efficient recycling of electronic waste, waste batteries and other relevant complex end-of-life products	2016 onwards
Sharing of best practice for the recovery of critical raw materials from mining waste and landfill	2017
Construction and demolition	
The circular economy assessment guidelines for the construction sector	2016
Voluntary industry-wide recycling protocol for construction and demolition waste	2016
Core indicators for the assessment of the lifecycle environmental performance of a building, and incentives for their use	2017 onwards
Biomass and bio-based materials	
Guidance and dissemination of best practices in the recycling use of biomass and support to innovation in this domain through Horizon 2020	2016-2019
Ensuring coherence and synergies with the circular economy when assessing the sustainability of bioenergy under the Energy Union	2016
Assessment of the contribution of the 2012 Bio-economy Strategy to the circular economy and possible review	2016
Innovation and investments	
Initiative 'Industry 2020 and the circular economy' under Horizon 2020	October 2015
Pilot project for 'innovation hubs' to address possible regulatory obstacles for innovation	2016
Targeted outreach to encourage applications for funding under EIP-FCI, and support the development of projects and investment platforms relevant to the circular economy	2016 onwards
Targeted outreach and communication activities to assist Member States and regions for the uptake of Cohesion Policy funds for the circular economy	2016 onwards
Support to Member States and regions to strengthen innovation for the circular economy through smart specialisation	2016 onwards
Assessment of the possibility of launching a platform together with the EPR and national banks to support the financing of the circular economy	2016
Engagement with stakeholders on the implementation of the action plan through existing forums in key actors	2016 onwards
Support to a range of stakeholders through actions on public-private partnerships, cooperation platforms, support to voluntary business approaches, and exchanges of best practices	2016 onwards
Monitoring	
Development of a monitoring framework for the circular economy	2017

Final package on Circular Economy

adopted 4 March 2019

- **Report on the implementation of the Circular Economy Action Plan**
- Staff working document with details and references for the 54 actions that were listed in the action plan
- SWD on Sustainable Products in a Circular Economy
- SWD on the Assessment of the voluntary pledges under Annex III of the Strategy on Plastics
- Summary Report of the Public Consultation on the main issues identified in the Commission's Communication on the interface between chemical, product and waste legislation
- Report on Horizon 2020 R&I projects supporting the transition to a Circular Economy
- Publication with Insights from research and innovation to inform policy and funding decisions
- Report on Improving access to finance for circular economy project
- Guidance and promotion of best practices in the mining waste management plans



Impacts



Employment in CE related activities:

- 4 million workers
- 2012-2016: + 6 %

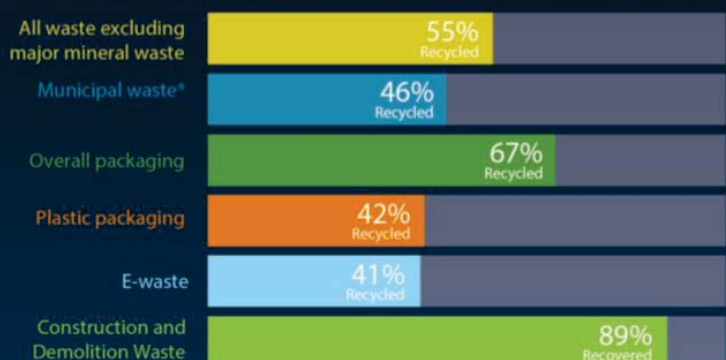


Repair, reuse, recycling:

- €147 billion value added
- €17,5 billion investments



Overview of recycling rates of different waste streams (EU, 2016)



Recycling and use of recycled materials = steadily growing

Recycled materials = 12 % of raw material demand

[More info](#)

Ingredients of success (1)



Systemic approach along entire value chains – full life cycle

In some cases, material-wide approach: plastics strategy

Single Use Plastic Items Directive & Circular Plastics Alliance

Strong Stakeholder Engagement

EU Circular Economy Stakeholder Platform

EU Platform on Food Losses and Food Waste

Circular Economy Finance Support Platform



Ingredients of success (2)

Investing in the transition:

More than €10 billion since 2016

€1.4 billion from Horizon 2020 until 2018

€7.1 billion from Cohesion Policy

€2.1 billion European Fund for Strategic Investments and Innovfin

€100 million at least invested through LIFE

Report on Improving access to finance for circular economy project

Circular Economy - a core priority in next MFF

European Regional Development Fund and Cohesion Fund

Horizon Europe programme

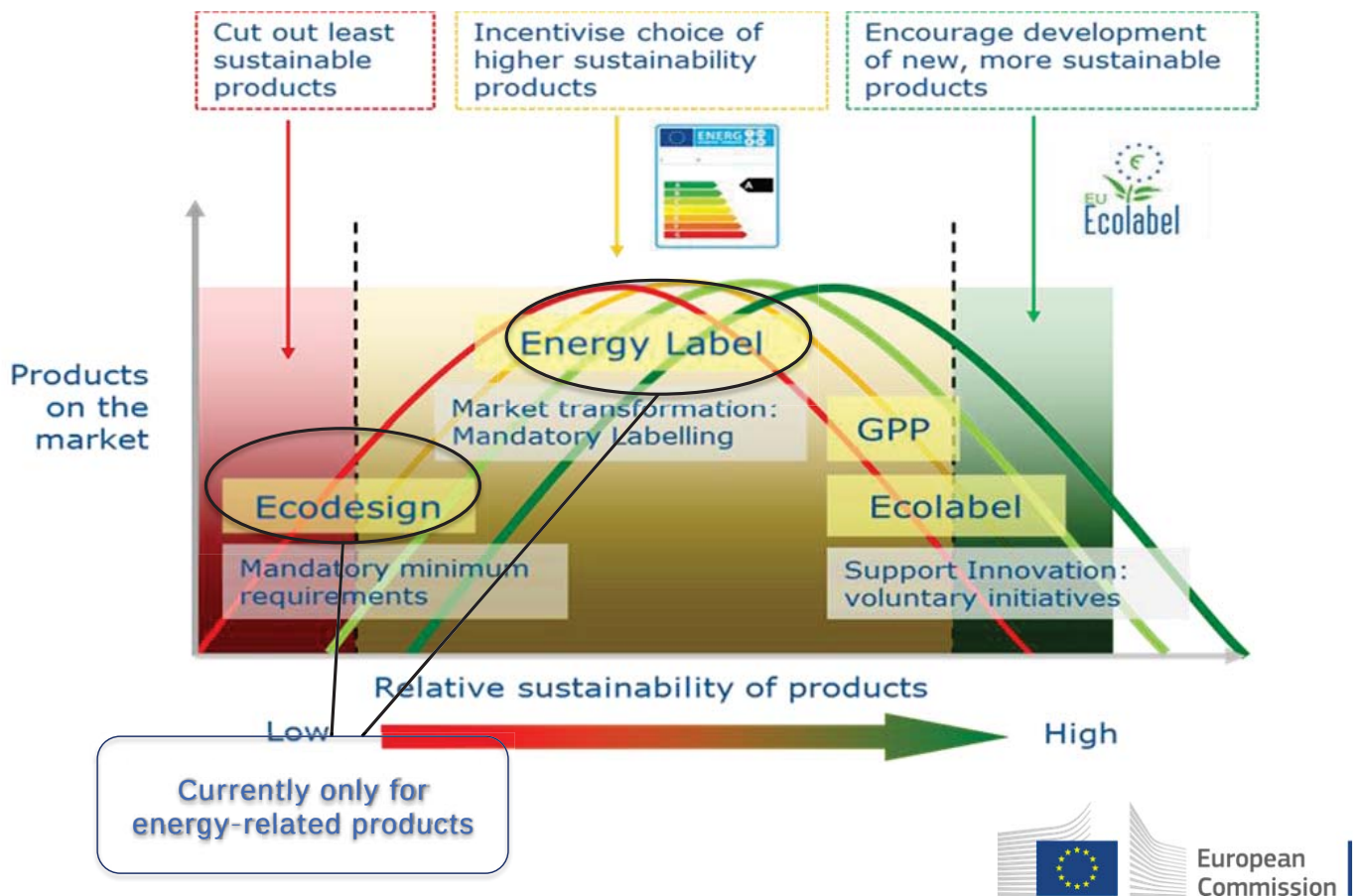
LIFE

Digital Europe

Invest EU



The EU Product Policy Framework



What is the EU Ecolabel?

- A **voluntary scheme** established in **1992** aiming at promoting products and services with a lower environmental impact
- The **official European Ecolabel** managed by the EC and Member State Competent Bodies
- The only **EU wide Type 1 Ecolabel** - provides businesses the opportunity to use one label for all their pan-European or global marketing
- Provides **consumers** an official environmental certification they can trust



EU Ecolabel product groups

	Rinse-off Cosmetic Products		Personal, Notebook and Tablet Computers
	Absorbent Hygiene Products		Televisions
	Hard Surface Cleaning Products		Wood-, cork- and bamboo-based floor coverings
	Detergents for Dishwashers		Hard Coverings
	Industrial and Institutional Automatic Dishwasher Detergents		Furniture
	Hand Dishwashing Detergents		Bed Mattresses
	Laundry Detergents		Growing Media, Soil Improvers and Mulch
	Industrial and Institutional Laundry Detergents		Lubricants
	Textiles		Converted Paper
	Footwear		Newsprint Paper
	Paints and Varnishes		Printed Paper
	Tissue Paper		Copying and Graphic Paper
	Indoor Cleaning Services		Tourist Accommodation

Why EF method?



BUT

Same product

Different methods

Different database

Different assumptions

Different calculation rules

Different scenarios

Different impact
assessment methods

(etc...)

=



Different results

What are those PEF/OEF methods?



16 Impact categories	Unit
Climate change	Kg CO ₂ eq
Ozone depletion	Kg CFC-11 eq
Particulate matter	Disease incidence
Ionising radiation, human health	kBq U ²³⁵ eq
Photochemical ozone formation, human health	Kg NMVOC eq
Acidification	Mol H ⁺ eq
Eutrophication, terrestrial	Mol N eq
Eutrophication, freshwater	Kg P eq
Eutrophication, marine	Kg N eq
Land use	Points
Human toxicity, cancer	CTUh
Human toxicity, non cancer	CTUh
Ecotoxicity, freshwater	CTUe
Water use	M ³ world eq
Resource use, fossils	MJ
Resource use, minerals and metals	Kg Sb eq



What is PEFCR and OEFSR?

Product Environmental Footprint Category Rules:

A guidance, build further on PEF, with **product group specific rules**.

Organisation Environmental Footprint Sector rules:

A guidance, build further on OEF, with **sector specific rules**.

Developed by a Technical Secretariat representing more than 51% of the EU market in terms of turnover in the EU



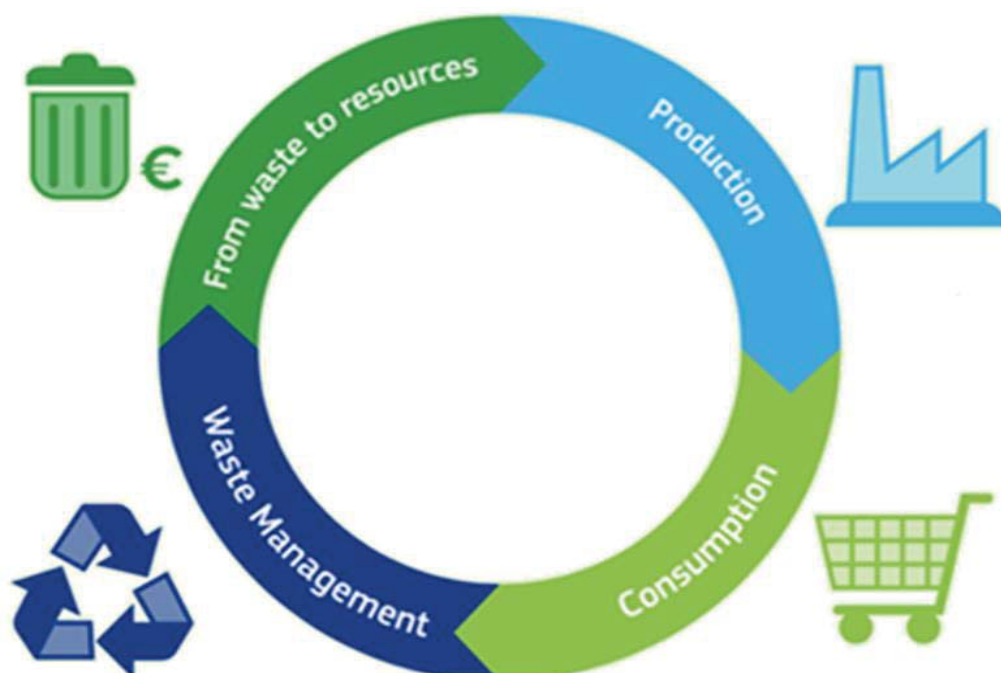
What is the EF pilot phase?

4 year pilot (2013 – 2018)

1. Test the **process** for the development of PEFCRs and OEFSRs
2. Test different approaches for **verification** systems
3. **Communication** vehicles

From 27 -> 23 final pilots

	Batteries and accumulators		Leather
	Decorative paints		Thermal insulation
	Hot & cold water pipe systems		Beer
	Liquid household detergents		Coffee
	IT equipment		Fish
	Metal sheets		Dairy products
	Non-leather shoes		Feed
	Photovoltaic electricity generation		Meat
	Stationary		Pet food
	Intermediate paper products		Olive oil
	T-shirts		Pasta
	Uninterrupted power supplies		Wine
	Retailer sector		Packed water
	Copper sector		





The Waste Package



The new rules will make the EU a global leader in recycling:

- By 2035, all EU countries should **recycle at least 65 % and landfill less than 10 % of municipal waste**
- By 2030, at least **70 % of all packaging waste** in each EU country should be recycled



There are also **recycling targets** for specific packaging materials:

- Paper and cardboard: 85 %
- Ferrous metals: 80 %
- Aluminium: 60 %
- Glass: 75 %
- Plastic: 55 %
- Wood: 30 %



Plastics Strategy



All plastic packaging will be **reusable or recyclable** (by 2030)

Stimulate design for circularity

→ **Boost the market** for recycled plastics



Actions on **single-use plastics and microplastics**





- **Strategic Research Innovation Agenda for Plastics**
- H2020 additional **€100 million investments** (up until 2020)
- Support the development of **alternative feedstocks**



- Call for **global action**
- Focus on **key regions**
- Support for **multilateral initiatives** on plastics
- Promote **international industry standards** development
- Development in **cooperation funding**



Key measures to drive investments and innovation towards circular solutions

National, regional and local authorities are encouraged to:

- make better use of economic instruments, especially to raise the cost of landfilling and incineration and promote plastic waste recycling and prevention
- make greater use of public procurement and funding to support plastic waste prevention and recycling of plastics

Industry is encouraged to:

- increase infrastructure and R&D investment in areas of direct relevance to achieving the strategy's objectives
- contribute to work on setting up a private investment fund to offset the environmental externalities of plastic production

Key measures to harness global action

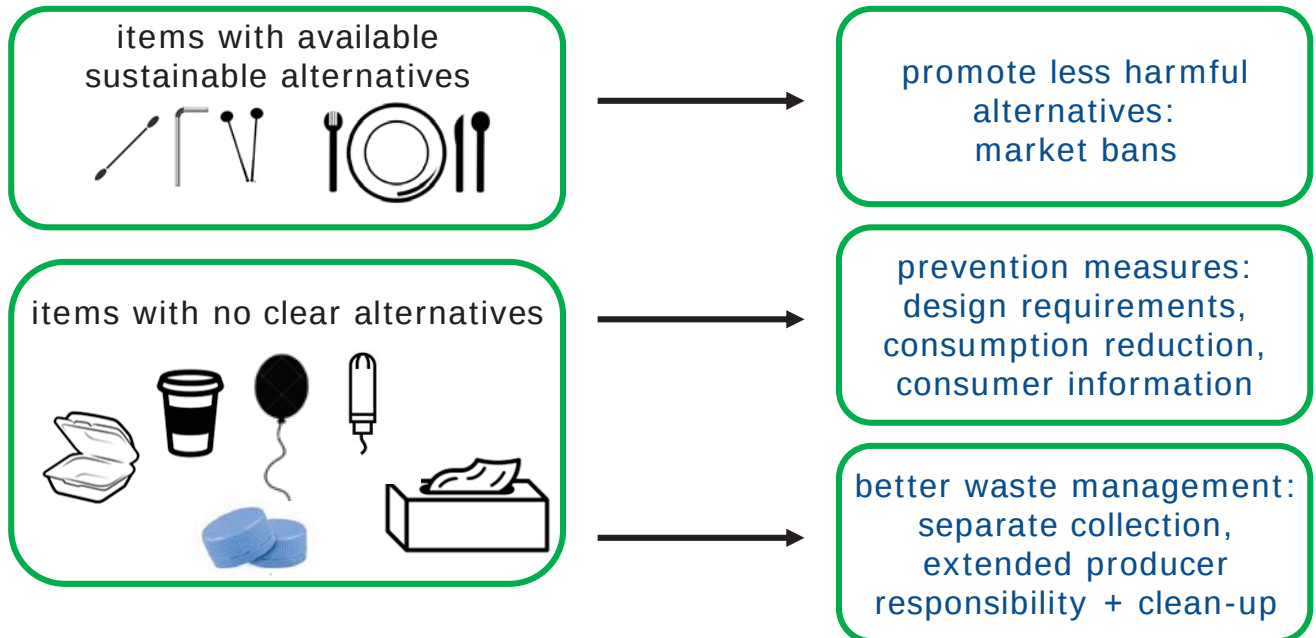
National and regional authorities, including in non-EU countries, are encouraged to:

- engage in international fora to develop a global response to the increase in marine litter
- take domestic action to reduce the leakage of plastics in the environment, prevent plastic waste and increase recycling

Industry is encouraged to:

- Play an active part in supporting an integrated, cross-border circular plastics economy, including through the development of a global protocol for plastics

Directive on the reduction of the impact of certain plastic products on the environment



#CEstakeholderEU

European Circular Economy Stakeholder Platform

A joint initiative by the European Commission and the European Economic and Social Committee

Home Good Practices Strategies Knowledge Policy & Commitments Dialogue Contribute! News & Events About

- **Advancing the circular economy concept on the ground**
- **Strengthening cooperation among stakeholders' networks**



representatives of networks of businesses, civil society and local, regional and national public authorities



Link to website: <http://circulareconomy.europa.eu/platform/>



- ✓ **Business case**
- ✓ **Comprehensive approach**
- ✓ **Involving stakeholders - Critical mass**
- ✓ **On top of the political agenda**



Open challenges (CEIR)

Follow up to the CEAP actions

- Circular products and services
- Empowering circular consumers
- Implementation of legislation
- Develop markets for secondary raw materials

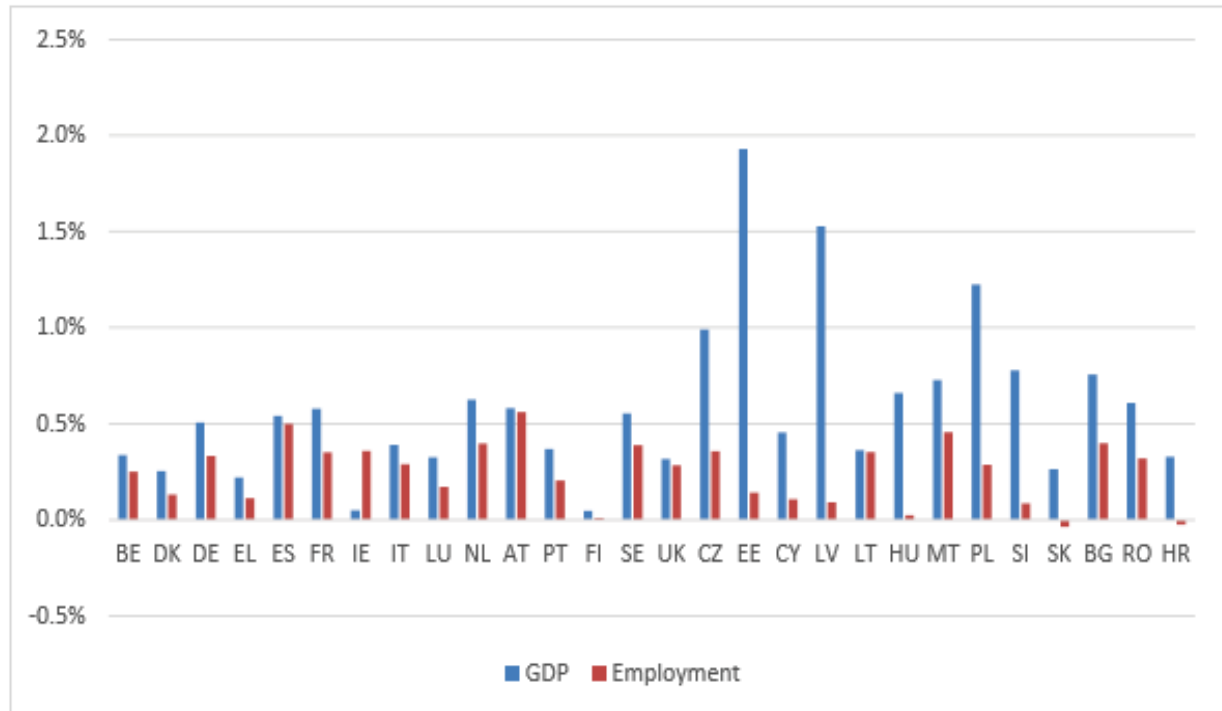
Pursuing together other systemic transformations

- Using biological resources in a circular way, respecting the ecological boundaries and contributing to halting biodiversity loss
- Exploiting the synergies with a climate neutral economy
- Integrating digital transformations (while recognizing other impacts)
- Reinforcing social and territorial cohesion and balanced distribution of jobs
- Fostering circular and sustainable finances

Circularity in other sectors

- IT, electronics, mobility, built environment, furniture, textile, food and drinks

Figure 5.3 Results by Member State in the Combined-Ambitious scenario (% from base)



A long term commitment



Jyrki Katainen @jyrkikatainen · 18 mag

I believe that #CircularEconomy is one of the biggest global megatrends. You can compare it e.g. to digitalisation & globalisation. The more we can create new business models and recycle raw materials, the more added value stays in Europe.



Retweeted 16 times



Frans Timmermans @TimmermansEU · Jun 15

We need to mainstream the #CircularEconomy in everything we do - energy, internal market, infrastructure, #EFSI, structural funds...



