CIRCULAR ECONOMY DAY | 18 NOVEMBER 2020

A report by the AIJA Environmental & Energy Law Commission

Based on members’ questionnaire and their respective jurisdictions

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About the AIJA Environmental & Energy Law Commission

Founded in 1994, our Commission addresses practical and scientific issues related to national and international environmental and energy law. We also focus on the impact of environmental law on legal and business matters in general. In cooperation with other AIJA Commissions, our Commission covers a wide range of practice areas such as Oil and Gas policy, air, water and soil protection law, law on waste and waste water, transport of hazardous materials, environmental management systems, legal compliance, environmental due diligence, protection of nature and cultural environment, renewable energy, health and industrial safety law as well as law related to chemicals and foodstuffs.

For our Circular Economy Day we asked our members for a contribution regarding the current state of the ‘circular economy’ in their respective jurisdictions and we bundled the received answers. All answers are purely informative and cannot be seen as a legal advice whatsoever. Kindly feel free to contact authors of each given section of this report for further advice.
<table>
<thead>
<tr>
<th>Circular economy in Country</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Belgium</td>
<td>4</td>
</tr>
<tr>
<td>Brazil</td>
<td>8</td>
</tr>
<tr>
<td>the EU</td>
<td>11</td>
</tr>
<tr>
<td>Finland</td>
<td>15</td>
</tr>
<tr>
<td>France</td>
<td>18</td>
</tr>
<tr>
<td>Germany</td>
<td>21</td>
</tr>
<tr>
<td>India</td>
<td>23</td>
</tr>
<tr>
<td>Ireland</td>
<td>28</td>
</tr>
<tr>
<td>Italy</td>
<td>32</td>
</tr>
<tr>
<td>Mexico</td>
<td>36</td>
</tr>
<tr>
<td>Slovenia</td>
<td>39</td>
</tr>
<tr>
<td>Sweden</td>
<td>41</td>
</tr>
</tbody>
</table>
Circular economy in Belgium

1 General Remarks

Stimulating the transition towards a circular economy is considered an important challenge in Belgium. The goal of achieving a circular economy is well included in different government programs and policy vision documents. The legal roadmap however is not that clear. The current constitutional framework of Belgium has led to a fragmentation of legislative competences. Implementing entirely new circular concepts in different sectors such as the food industry, waste industry and construction and building industry is a difficult legislative chore. Needless to say the legal challenge becomes even greater when competences are fragmented. For reasons of brevity and clarity this contribution will solely mention Federal and Flemish initiatives. The selection is by no means exhaustive.

In the coalition agreement the incumbent federal government De Croo (since October 2020) formulated several circular economic policy goals. The federal government wants to reduce the material footprint of the country. All legal and financial barriers need to be alleviated to enhance the full potential of the circular economy. Furthermore, the federal government wants to implement a federal action plan in order to stimulate the circular economy. The action plan needs to be implemented in close alignment with the regional and community governments of Flanders, Wallonia and Brussels. The federal government formally acclaims to be a solid partner in delivering the European Green Deal.

Other circular objectives are included in the coalition agreement of the Flemish government Jambon (since October 2019). Primo, the Flemish government stated that all economic actors needed to adjust their activities and grasp the opportunity of implementing the principle of circularity in their business models. Secundo, the region of Flanders wants to remain a leader in the European waste policy. Flanders is ahead in recycling targets. 70% of all waste already gets recycled. The policy target for 2030 is a recycling percentage of 77.5%. The Flemish government will phase out the use of waste incinerators. Tertio, together with the building and construction industry the Flemish government will draw a roadmap to implement innovative circular concepts in the sector. The technological evolution towards modular buildings is perceived as one with strategic importance for the region.
Following, some examples of the Belgian and Flemish legislative measures that are considered essential in stimulating the circular economy.

2 Legislation

In Belgium there is no single act of legislation regarding just the circular economy. However, as the above-mentioned examples illustrate, the objectives of circular economy are taken into consideration within different subfields that are impacted by government policy goals.

Federal legislation

Consumption

For the federal government it is crucial to extend the life cycles of products in our economy. A sustainable economy needs sustainable products, it is stated. Noteworthy is the recent ambition to qualify the industrial design practice of ‘planned obsolescence’ as an unfair business-to-consumer commercial practice. The Unfair Commercial Practices Directive of 11 May 2005 is transposed into national law and codified in the Belgian Code of Economic Law. The Directive is conceived as secondary EU-legislation with maximum harmonisation requirements, except for financial services and real estate transactions. In the case of maximum harmonisation EU countries may not introduce rules that are stricter than those set in the directive. In this sense the federal legislator might be too expeditious.

Product standards

Belgium will transpose the Ecodesign Directive, which will be widened in scope, into national law quickly. The federal government will actively participate in the European debate considering the electronic product passport that could provide information on a product’s origin, composition, repair, dismantling possibilities and end of life handling.

Public procurement

Belgium wants to lead by example by incorporating sustainability criteria in public procurement legislation. The idea is that public authorities can use circular principles and requirements in public tender documents more easily to purchase goods, services and works with reduced environmental impact.

Contract and property law

The circular economy also leads to different forms of contracts. ‘Product as service agreements’ may be a legal stepping stone to a circular economy. The *sui generis* character of product as service agreements leads to new questions considering contract and property law. The recodification and modernisation of the Belgian civil code might improve the use of these agreements, although some legal obstacles remain un-tackled. Especially the question considering the retention of ownership remains unanswered. New legal and financial techniques need to be designed if ‘product as service
agreements’ have to become a common practice in business standard agreements.

Flemish legislation

Waste
The Materials Decree of 2011 and the Government Decree considering the Sustainable Use of Material Loops and Waste of 2012 sparked the circular economic policy. One of the basic principles of the Material Decree is the priority logic of waste policy: (1) prevent, (2) reuse, (3) recycle, (4) utilize alternatively and (5) remove. It has to be said that the waste management practice is far more complex than this prioritization suggest. The past few years a legal bottleneck has arisen and slowed the process of circular innovation. For practitioners it became unclear whether or not ‘materials’ needed to be qualified as ‘resources’ or as ‘waste’. As a result business are confronted with legal uncertainty. Despite some legislative efforts this problem remains unsolved. The Material Decree also enforced the concept of ‘Extended Producer Responsibility’ (EPR). This is in environmental protection measure by making the manufacturer of the product responsible for the entire life-cycle of the product and especially for the take-back, recycling and final disposal.

Industry and Energy
Circular economy asks for innovative initiatives whereas legislation does not deliver flexible solutions for experimentation. This became very clear especially in the context of industrial symbiosis, the process by which wastes or by-products of an industry or industrial process become the raw material or energy source for another. The Flemish government therefore designed the concept of low regulation zones. In these low regulation zones the aim is to locally produce as much renewable energy as possible and exchange surpluses efficiently. Within the current regulatory framework an exchange between building is not permitted, but in the low regulation zone it is tested in practice for a certain period of time. The experimental legal framework in the low regulation zones gets adjusted and evaluated before it becomes generally applicable. This type of legal experimenting is seen as an important step in the transition towards Local Energy Communities (LEC) and more industrial symbiosis.

3 Soft Law, Guidelines and Voluntary Measures

Vision 2050 - Circular Flanders
In ‘Vision 2050 – A long term strategy for Flanders’ the Flemish government has seven transition priorities: circular economy transition, smart living, industry 4.0, lifelong learning transition, caring and living together transition, mobility transition and energy transition. The Flemish government pointed the OVAM (the Public Waste Agency of
Flanders) as the initiator of Circular Flanders. This is not a traditional government agency, but a partnership of governments, companies, civil society and the knowledge community that will take action together. Circular Flanders invests in circular initiatives with subsidies and closing green deals.

**Green deals**
Green deals are voluntary agreements between the Flemish government and municipalities or businesses with the idea of the parties discovering circular solutions and other sustainability goals. The objectives in the green deal are more ambitious than the ones set out in legislation. As a consequence, the green deals complement the existing legal framework. Two green deals are successfully closed: Green Deal Circular Procurement and the Green Deal Circular Construction and Building

**Smart Symbiose Platform**
Circular Flanders also invested in the Smart Symbiose Platform. Researchers investigate how material flow from one company can be used as a high-quality raw material in another company. Through the online Flemish symbiosis platform, companies can contact other companies and search together for opportunities for symbiosis through the exchange of supply and demand. Through this partnership, companies can close material cycles, thus avoiding the exploitation of primary raw materials.

**Totem**
In order to help the Belgian construction sector to objectify and reduce the environmental impact of buildings, the region of Flanders, Wallonia and Brussels have developed the TOTEM tool (Tool to Optimise the Total Environmental impact of Materials). TOTEM enables different actors in the Belgian construction sector (architects, design offices, contractors, owners, promoters, public authorities, etc.) to identify and limit the potential environmental impacts of buildings from the earliest stages of the design process. It is used on a voluntary basis.
Law number 12,305 of August 2, 2010, instituted the “National Solid Waste Policy” in Brazil, amending Law number 9,605 of February 12, 1998, known as the “Environment Law”. The main goals of the Solid Waste Policy are (i) non-generation, reduction, reuse, recycling and treatment of solid waste; (ii) adoption of sustainable patterns of production and consumption of goods and services; (iii) improvement of clean technologies; (iv) life cycle assessment of products; (v) encouragement of sustainable consumption.

The Policy establishes shared responsibility for the life cycle of products, involving manufacturers, importers, distributors, retailers, consumers and those responsible for public urban cleaning services.

The Management Plan established by the government imposes several obligations on the economic agents involved. The law attributes to manufacturers, importers, distributors and traders the responsibility of (i) investing in the development of products suitable for reuse, recycling or other environmentally appropriate destination; (ii) manufacturing products that generate the least amount of solid waste possible; (iii) disseminating information on ways to avoid, recycle and dispose of solid waste; (iv) using reusable or recyclable packaging.

In the case of some industrial activities, the law imposes reverse logistics, obliging manufacturers to collect the remaining products and waste after use in order to give them an environmentally adequate final destination, preferably reuse or recycling.

Before the Solid Waste Policy, Brazil was a traditional recipient of hazardous waste. With the law, the import of hazardous solid waste and tailings, as well as of solid waste harmful to the environment and to human, animal and plant health is now prohibited, even if it is for treatment, reform, reuse, reutilization, or recovery.

Finally, an aspect of great importance in the Brazilian reality is the encouragement to use cooperatives or other forms of association of low-income individuals who collect reusable and recyclable materials. It is estimated that about 800 thousand people, mostly women, work as waste pickers, contributing to recycling.
2 What kind of soft law is currently used in your country + short summary?

Commitment to environmentally sound and sustainable policies for the reduction and proper destination of waste has been increasingly required in intercorporate relations. In view of the government’s omission, in some sectors, companies are taking the initiative of demanding respect for the environment and ecological awareness from their trading partners through the presentation of certifications from recognized institutions.

The advance of Brazil towards circular economy has been primarily the result of private rather than public initiatives.

For example, the Industrial Symbiosis Program brought together 760 companies in a resource and waste sharing and negotiation network. As a result of the first 10 years of the program, 200 thousand tons of raw materials were saved. One of the projects within this program is the use of Pepsico’s food waste, previously discarded, by animal feed manufacturers which, in turn, replace natural resources with this option and produce healthier and more nutritious animal feed.

In agribusiness, one of the pillars of the Brazilian economy, there are two outstanding experiences. During the production of orange juice, in which Brazil is the world leader, most of the fruit was underused. As a result of the increased awareness of the importance of circular economy, now 100% of the fruit is used: the pulp is used for animal feed, replacing corn; the peel generates oil for the food, pharmaceutical and chemical industries; and the alcohol resulting from its fermentation is used as fuel and in the production of beverages.

In the production of sugarcane, another economically relevant activity, biomass started to be used more intensively to generate energy, to the point that the energy produced exceeds the need of the consumer market. In addition, sugar cane leftovers resulting from sugar production began to be utilized for conversion to ethanol, known as second generation ethanol.

There is still a long path ahead in terms of public incentive and campaigns. Unfortunately, the government seems to be moving in the opposite direction, imposing higher taxation on the use of waste than on the acquisition of raw materials.

3 Any further specific remarks

The Institute for Applied Economic Research, in collaboration with the Ministry of Economy, estimates that only 2.4% of urban waste is made available for selective collection, and only 13% is recycled.

In the same vein, a recent survey by the National Confederation of Industry involv-
ing 1291 industries from different sectors showed that 70% of the respondents never heard the expression “circular economy”.

If, on the one hand, this shows how behind we are, on the other hand it shows that there is still much room to explore in this direction.
1 General Remarks

The European Green Deal, Europe’s new agenda for sustainable growth, consists of multiple thematic sustainability blocks. One of these blocks is the circular economy. The European Commission adopted a new ‘Circular Economy Action Plan for a Cleaner and More Competitive Europe’. The new Action Plan announces initiatives along the entire life cycle of products, targeting for example their design, promoting circular economy processes, fostering sustainable consumption, and aiming to ensure that the resources used are kept in the EU economy for as long as possible. It introduces legislative and non-legislative measures targeting areas where action at the EU level is useful.

The new Circular Economy Action Plan present six types of measures: (1) create a sustainable product policy framework, (2) focus on target sectors that use most resources and where the potential for circularity is high such as: electronics and ICT; batteries and vehicles; packaging; plastics; textiles; construction and buildings; food; water and nutrients, (3) ensure less waste, (4) making circularity work for people, regions and cities, (5) empower consumers and public buyers and (6) lead global efforts on circular economy.

A few examples of measurements the European Commission will take concerning the targeted sectors.

Electronics and ICT
The Action Plan proposes setting up a ‘Circular Electronics Initiative’ to promote longer product lifetimes through reusability and reparability as well as upgradeability of components and software to avoid premature obsolescence.

Plastics
The Action Plan builds on the 2018 Plastics strategy, and focuses on increasing recycled plastic content. Mandatory requirements on recycled content will be suggested in
areas such as packaging, construction materials and vehicles. On microplastics, the Commission will restrict the intentional adding of microplastics.

**Construction and Buildings**

The building sector consumes about 50% of all extracted material and is responsible for more than 35% of the Union’s total waste generation. The Commission will propose to revise the Construction Product Regulation, which may include recycled content requirements for certain construction products.

2 **Legislation**

**Waste**

In July 2014 the Barosso Commission II launched a legislative circular economy package, but the Commission Juncker withdrew the proposal on waste intended to make a new, more ambitious package. The CE package was presented in December 2015 and consisted of four legislative proposals on waste, revising six pieces of EU legislation: Waste Framework Directive (WFD), Packaging and Packaging Waste Directive (PPWD), Landfill Directive and Directives on end-of-life vehicles, batteries and accumulators, and waste electrical and electronic equipment (WEEE). The overall goal is to improve EU waste management. The package of four directives were adopted by the European Parliament on 18 April 2018 and are currently transposed by the member states.

**Chemicals**

The interaction between product, waste and chemicals legislation is crucial in the transition towards a circular economy. Once something becomes waste it is exempted from the European REACH chemicals law. Instead, EU waste legislation controls who is responsible for the waste material, who can deal with it and how it should be processed. If waste is to re-enter the economy, as the circular principle prescribes, it needs to be ensured that it has been processed in such a way as to create a safe product. It is only once a material is no longer considered as waste that REACH chemicals law will apply. This can be established through an end of waste process. Reaching end of waste status requires compliance with chemical legislation. For companies this a demanding process, because a lot of legal, technical and scientific knowledge is acquired.

**Sustainable products**

The Commission is working on a sustainable product legislative initiative. This initiative will have at its core a proposal to widen the Ecodesign Directive beyond energy-related products. The approach is to make the Ecodesign framework applicable to the broadest possible range of products and make it deliver on circularity.
The Commission will strengthen the reparability of products. The aim is to embed a “right to repair” in the EU consumer and product policies by 2021. The Plan incorporates actions to give consumers more reliable information about products at the point of sale, including on their lifespan and other environmental performance. The aim is to reduce greenwashing and diminish practices such as planned obsolescence.

3 Soft Law, Guidelines and Voluntary Measures

Public procurement
The Europe Commission stimulates government authorities to buy goods and services with a lower environmental impact. Green Public Procurement (GPP) is defined by the Commission as “a process whereby public authorities seek to procure goods, services and works with a reduced environmental impact throughout their life-cycle when compared to goods, services and works with the same primary function that would otherwise be procured”. The ‘Buying Green Handbook’ is a guidance document for public purchasers to integrate sustainability criteria in tender documents without violating the principles of the Directive 2014/24/EU on public procurement.

Food
An estimated 20% of the total food produced is lost or wasted in the European Union. The Commission will propose a target on food waste reduction as part of the EU Farm-to-Fork Strategy. That Strategy will address the entire food value chain to ensure the sustainability of the sector. The Commission will analyse current legislation in order to determine the scope of a legislative initiative on reuse to replace single-use food packaging, tableware and cutlery by reusable products in food services.

Sustainable products and consumption
The current market offers a big variety of environmental labels leading to confusion and mistrust in environmental performance information. On the other hand, producers of green products need to apply methods that are authorised in these countries. Therefore, the European Commission has adopted in 2013 two harmonised methods to quantify the environmental footprint of products and organisations. These methods are based on life cycle assessment and recognises the importance of addressing environmental impacts throughout the entire supply chain of product/organisation in an integrated way. The life-cycle perspective of the PEF and OEF reflect the essence of the Circular Economy.

Technology
The EU Environmental Technology Verification (ETV) tool is developed by the European Commission to stimulate technological eco-innovation. Claims about the performance of innovative environmental technologies can be verified by qualified third parties called “Verification Bodies”. The “Statement of Verification” delivered at the end of
the ETV process can be used as evidence that the claims made about the innovation are both credible and scientifically sound. The EU-ETV Pilot Programme initiated by the European Commission targeted environmental technologies whose value cannot be proved through existing standards or certification schemes.

**Waste management**
The Eco-Management and Audit Scheme (EMAS) is the official European environmental management instrument that helps organisations improve their environmental performance and demonstrate their efforts to implement sustainable waste management practices. Organisations that use EMAS can quantify their resource use, develop plans to improve their environmental performance, reach environmental goals, while coming up with new, more efficient management processes. The tool is often-used by environmental managers and consultants.

**Raw Materials**
At least 30 million jobs in the EU depend on the availability of raw materials Securing reliable and unhindered access to raw materials is of strategic importance. The European Commission’s actions to ensure a sustainable supply of these materials can be divided into 2 interlinked parts: the raw materials initiative (RMI) and the European innovation partnership on raw materials (EIP). The RMI sets out a strategy for tackling the issue of access to raw materials in the EU. The stakeholder platform ‘European innovation partnership on raw materials’ brings together representatives from industry, public services, academia and NGOs. Its mission is to provide high-level guidance to the European Commission, EU countries and private actors on innovative approaches to the challenges related to raw materials.

**Retail**
The multi-stakeholder platform ‘Retail Forum’ is set up in order to exchange best practices on sustainability in the European retail sector and to identify opportunities and barriers that may further or hinder the achievement of sustainable consumption and production.
Circular economy in Finland

1 General Remarks
Achieving a circular economy is considered very important in Finland. The objective of a circular economy is closely related to Finland’s carbon neutrality objective for year 2035, and both are included in the current government programme. With respect to the circular economy, the government programme sets out an objective to strengthen Finland’s role as a pioneer in the field of circular economy. Additionally, as Finland is a member state of the European Union, EU legislation also has a significant impact on the legislative and other measures adopted promoting the circular economy.

Finnish studies and reports show that in the context of circular economy, legislative measures are only useful to a certain extent. It has been highlighted that much more robust measures are required to advance the circular economy, as markets and customer behaviour cannot be changed solely by legislative means. The Finnish vision of implementing the circular economy is, therefore, strongly based on voluntary means, and especially the importance of sufficient information, necessary re-education, expert knowledge and teamwork is underlined. Naturally, the objective to move towards a circular economy is also always considered in drafting new legislation – as part of the legislative measures, not only new or stricter legislation is being introduced, but also hindrances and inflexibilities which obstruct the transition within the existing legislation are being repealed.

At the core of the Finnish transit to the circular economy is the aim to include all players of the society, from the citizens to the government, in the process of moving towards a circular economy. The idea is that the state and the municipalities take the lead by introducing new environment-friendly solutions. The waste of materials has been identified as one of the main problems from an economic and environmental perspective, and increasing the lifetime of materials (e.g. by recycling, reusing and repairing) is a good example of a societal change, which requires everyone’s input.

Following, some examples of the Finnish legislative and voluntary measures, which in Finland are considered essential in promoting the circular economy, are presented. The list is by no means exhaustive.

2 Legislation
In Finland, legislation related to the circular economy has not been examined as a sing-
gle entity, and Finland has not adopted nor does it currently plan on adopting specific act(s) regarding just the circular economy. However, the objectives of the circular economy and their promotion is very much taken into consideration when drafting all new legislation. For example, in the ongoing reform of the Land Use and Building Act, the circular economy is weighed in the preparation of e.g. the sections regarding buildings’ demolition permits and the requirements of the land use plans. Likewise, the circular economy plays a central role in the preparation of any amendments to the Waste Act, since one of the objectives is to increase recycling and reuse of materials and consequently decrease the amount of waste produced.

As a further example, in order to promote recovery of waste, use of certain waste types in construction has already for several years been facilitated by a government decree, the scope of which is constantly widening. Another legislative measure, which aims to decrease the amount of waste disposed of, is the tax imposed on several types of waste disposed of at the landfills.

Finland has also recognised the importance of granting state aid for state-of-art projects promoting the circular economy. For example, there is a government decree on grants for innovative investments, investment-related surveys and networks promoting the circular economy. The Finnish government has also issued a fixed-term decree on grants for projects promoting the nutrient recycling and the energy efficiency of wastewater management.

The above-mentioned examples are only a few to be mentioned, and it should be noted that additional legislative measures are constantly assessed and implemented.

Summary: Voluntary means that e.g. increase knowledge of the circular economy and change attitudes related thereto have been the primary approach in Finland, and Finland has not adopted nor does it currently plan on adopting specific acts regarding the circular economy. However, the circular economy is in many ways recognized and promoted throughout the Finnish legislation, e.g. in laws regarding land use planning, construction, waste, and taxation.

3 Soft Law, Guidelines and Voluntary Measures

The Circular Economy Strategic Programme

A Circular Economy Strategic Programme is being prepared in Finland as a collaborative effort between ministries, research institutes, the Finnish Innovation Fund Sitra, Business Finland, and several companies and municipalities. The programme will be submitted for approval by the Finnish government during 2020, and its aim is to transform the economy into one that is based on the principles of circular economy by 2035. The programme points out objectives and indicators, specific measures and necessary resources essential for promoting the circular economy and achieving systemic change in Finland. It consists of four thematic groups; real estate and construction, municipalities and regions, energy and material intensive industry, and emerging tech-
nologies and new business models.

The Circular Economy Road Map
The Finnish Innovation Fund Sitra is an independent fund, which aims to probe the future and promote qualitative and quantitative economic growth. In 2016, Sitra guided the creation of the world’s first circular economy road map (since updated in 2019). The circular economy road map describes specific measures and essential changes and actions required for the transition to the circular economy. In other words, it maps out Finland’s way to the circular economy by 2025. The road map comprises four strategic objectives; the renewal of the foundations of competitiveness and vitality, transfer to low-carbon energy, approach of natural resources as scarcities, and use of everyday decisions as incentive for change. The road map provides different sectors of the society with information on measures that can be taken to promote a circular economy. One significant milestone achieved with the help of the road map is the topic of circular economy being integrated into all levels of education in Finland.

The List of the Most Interesting Companies in the Circular Economy
Companies have a fundamental role in achieving a circular economy, as its implementation requires many changes in the existing business models. To make the transition more desirable and provide examples, Sitra has compiled and updates a list to showcase Finland’s most inspiring examples of the circular economy. The list includes various companies with very different solutions. For example, energy company Fortum Plc is listed for recycling, sorting and processing used plastic into a recycled raw material, whereas Gold & Green Foods Ltd is included in the list for developing sustainable plant protein from oats and legumes.

Green Deal Agreements on the Circular Economy
Green deals are voluntary agreements between the state of Finland and the municipal sector or business associations with the idea of the parties discovering together solutions to promote the circular economy and other sustainability goals. The parties may agree on stricter and more ambitious objectives than the ones set out under the legislation or objectives that are not regulated, and as a consequence, the green deal agreements complement the existing legislation. Subject of the green deal agreement vary, as well as the objectives and the measures to achieving these. The outcomes are monitored and publicly reported. Even though companies cannot become a party to a green deal agreement, they are undertaking measures and aiming for the objectives under the agreements. Companies can commit to the objectives of a green deal agreement at sitoumus2050.fi website, and the commitment is then approved by the relevant ministry.

Summary: In Finland, several soft law guidelines and voluntary means to promote the circular economy, including e.g. different programmes and voluntary commitments, have already been introduced by different entities. The voluntary means are strongly based on promoting innovations and knowledge sharing.
Circular economy in France

1 Legislation

1.1 The law on ecological transition and green growth of August, 17th 2015

In France, the transition to a circular economy represents one of the main objectives of the energy and ecological transition. The notion of circular economy was first officially recognized by the law in 2015 which introduced its definition in the French environmental Code:

“the transition to a circular economy aims to go beyond the linear economic model of extracting, manufacturing, consuming and discarding by calling for a sober and responsible consumption of natural resources and primary raw materials and, in order of priority, for the prevention of waste production, in particular by reusing products and, following the hierarchy of waste treatment methods, reusing, recycling or, failing that, recovering waste (...).”

The Law on ecological transition and green growth of July 2015 mainly provided for medium-term objectives, such as:

- the reduction of natural resource use related to French consumption (30% reduction in resource consumption in relation to GDP between 2010 and 2030)

- a 50% reduction in the amount of non-hazardous waste landfilled by 2025 (compared to 2010)

- 100% of plastics recycled by 2025

- the reduction greenhouse gas emissions and avoid the emission of 8 million additional tons of CO2 each year thanks to plastic recycling

- the creation of 300,000 additional jobs, including new professions.

Three years later, the Government published the “Circular Economy Roadmap” (in...
French : “la feuille de route pour l’économie circulaire”) in order to encourage compa-
nies and other economic actors to change their business model in a more sustainable way (see point 2.1 below).

1.2 The anti-waste law for the circular economy of February 10th, 2020

More recently, the law on “the fight against waste and the circular economy” of Feb-
ruary, 10th 2020 transposed into French law several European directives contained
in the “Circular Economic Package” of May 30, 2018, as well as the directive of June
5th, 2019 on the reduction of the impact of certain plastic products on the environment.

This new law inserts binding provisions in the French environmental Code and the
French consumption Code, with the aim of achieving a profound and irreversible tran-
sition in production methods and consumption patterns.

It particularly modifies the legal regime of the “extended responsibility of waste produc-
ers” (in French: “régime de responsabilité élargie des producteurs de déchets”) and
imposes new objectives, such as:

- the end of disposable plastic in 2040
- a better information of the consumers, including the harmonization of waste
  sorting instructions and a better information on the environmental characteristics of
  products,
- fighting against waste, and more particularly by prohibiting the disposal of unsold
  non-food items and increasing the applicable penalties in case of food waste
- acting against planned obsolescence, including the creation of a reparation index for electrical and electronic products
  and by encouraging the reutilization of spare parts
- a better production, involving a transformation of the polluter-pays principle and
  encouraging more environmentally friendly products (bonus-malus system).

The entry into force of most of the above-mentioned provisions is planned between
January 1st, 2021 and January 1st, 2025 and is subordinated to the publication of
decrees implementing the law. It also should be noted that the draft decree containing
various provisions regarding extended responsibility of waste producers is currently
being submitted for public consultation.

1 https://www.ecologie.gouv.fr/leconomie-circulaire
2 Law n° 2015-992 of August 17, 2015 on ecological transition and green growth
3 This article was recently modified by the law of February, 10th 2020 which changed the
expression “aims to go beyond” by “aims to reach” the linear economic model.
4 Law n°2020-105 of February 10, 2020 called anti-waste law for the circular economy
2 Voluntary measures

2.1 The Circular Economy Roadmap
As stated above, the “Circular Economy Roadmap” was published in 2018 to propose 50 concrete measures to achieve the objectives set by the 2015 law on ecological transition.

The roadmap has no binding value but aims to offer solutions to make the transition from a linear “make, consume, throw away” economic model to a circular model that will integrate the entire life cycle of products, from their eco-design to waste management, including their consumption while limiting waste.

2.2 Green Growth commitments
The French Government also set up an innovative scheme called “green growth commitments” (in French : ”engagements pour la croissance verte”), inspired by the Dutch “Green deals”, to encourage manufacturers and economic players to develop new models based on the circular economy.

In this context, industrials and economic players propose to the public authorities to implement new measures, for a specific sector or activity, in order to accelerate the transition to the circular economy.

This engagement leads to a contractual agreement between the private sector and the public authorities.

2.3 The CSR policy
The promotion of a “corporate social and environmental responsibility (CSR policy)” can also be considered as a soft law mechanism in favor of the circular economy.

The CSR policy allows the companies to implement “good practices” to reach the objectives of the circular economy. As an example, for small companies, good practices may take the form of choosing a renewable energy supplier or reducing paper consumption. For larger companies, for which it is mandatory to have social and environmental reports “verified” by an independent third-party organization, these CSR policies can lead to big changes in the way of producing and consuming. For example, the Renault group’s CSR policy fully integrates the circular economy through the implementation of a wide range of measures, such as the upcycling of materials, the reuse of spare-parts and batteries and the objective of 100% recycled plastic by 2025.

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6 Law n°2010-788 of July 12, 2010 on national commitment to the environment
7 https://group.renault.com/nos-engagements/respect-de-lenvironnement/economie-circulaire/
Circular economy in Germany

1 Introduction
The primary goals of existing circular economy policies in Germany are to minimize waste and emissions, as well as consumption of resources and energy. Circular economy policies in Germany may be understood as economic as well as environmental policies.

The legal instruments currently in place in Germany span the entire value chain. However, there is no singular, explicit institutional framework specifically targeting the circular economy, but a rather fragmented body of (mainly federal) legislation.

Also, there is still a long way to go to transition the German economy to full circularity, especially in the areas of waste avoidance, product durability, and recycling-friendly product design. Further steps will most likely have to feature more binding regulations, as opposed to soft law, and include significant economic incentives. The corresponding political debates are ongoing.

2 Waste Management
Germany has been a pioneer in the area of gearing its waste management towards a circular economy.

The cornerstone of German waste management legislation is the Circular Economy Act (Kreislaufwirtschaftsgesetz).

It should be noted that the Circular Economy Act, which now also serves to implement the EU Waste Framework Directive, uses a rather narrow concept of the circular economy, and mainly regulates waste management.

At the core of the Circular Economy Act is the so-called waste hierarchy, which prioritizes in descending order prevention, preparation for reuse, recycling, recovery (including energy recovery, i.e., incineration), and finally disposal of waste materials.

In the area of waste avoidance, bans on the sale of certain products containing plastic are being put in place. It has to be noted that regulation in this area appears to be hard
to agree on politically. Germany’s total waste generation has recently increased, after it had dropped for some time, and is among the highest per capita in the EU.

An important area of focus of the Act is to ensure that waste is identified and sorted in order to recycle materials. Germany has a highly developed collection infrastructure and differentiated value recovery system. Nevertheless, there is still a high percentage of waste materials that goes to incineration, rather than reuse, recycling, or mechanical recovery.

Germany has one of Europe’s highest recycling rates, with almost no municipal waste going to landfills anymore.

In addition, the Circular Economy Act is accompanied by a large number of regulations targeting specific details of waste recovery, such as the Landfill Ordinance (Deponieverordnung), or waste stream specific regulations such as the Packaging Act (Verpackungsgesetz), the Battery Ordinance (Batterieverordnung), and the Electrical and Electronic Equipment Act (Elektro- und Elektronikgerätegesetz). Most of these are connected with EU Directives.

3 Product Design
In the area of product design, the main piece of German legislation currently in force is the Energy-related Products Act (Energieverbrauchsrelevante-Produkte-Gesetz), which serves to implement the EU Ecodesign Directive. Its goal is to mitigate the environmental impact of energy-related products over their entire lifetime.

Adjustments this piece of legislation are foreseen to be made in the areas of resource efficiency, durability, and reparability of electrical appliances.

4 Soft Law
Germany has a large number of initiatives, guidelines, strategies and other voluntary measures, relating to circular economy principles. These can be found on all levels of government, from the municipal and state levels to the federal level, as well as in the private sector. However, there is no overall coherent soft law strategy aimed at facilitating the transition to a circular economy.
Circular economy in India

There are no binding laws present in the country related to the concept of circular economy. However, there are certain rules/regulations/policy guidelines paving the way towards successful implementation of key features of circular economy, i.e., 3-R approach of:

**Reduce** (minimum use of raw materials),  
**Reuse** (maximum reuse of products and components) and  
**Recycle** (high quality reuse of raw materials). Few significant rules and regulations in this regard are as follows:

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<th>RULES/REGULATION/GUIDELINES</th>
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| 1 Plastic Waste Management Rules, 2016 | • The minimum thickness of plastic carry bags has been increased from 40 microns to 50 microns to reduce free distribution by retailers and facilitate collection as well as recycling.  
• The operation of this law has been extended to rural areas which was earlier limited to municipal districts.  
• The responsibility of waste generators has been introduced. Individual and bulk generators like offices, commercial establishments, industries are required to segregate the plastic waste at source, handover segregated waste, pay user fee as per bye-laws of the local bodies.  
• Provisions have been introduced to ensure the collection of plastic waste and its |
2 Plastic Waste Management (Amendment) Rules, 2018 [Notified on 27th March 2018 by the Ministry of Environment, Forest & Climate Change]

- The amended Rules lay down that the phasing out of Multilayered Plastic (MLP) is now applicable to MLP, which are “non-recyclable, or non-energy recoverable, or with no alternate use.”

- It prescribes a central registration system for the registration of the producer/importer/brand owner to be evolved by Central Pollution Control Board (CPCB).

- Such system should be automated considering the ease of business.

- While a national registry has been prescribed for producers with presence in more than two states, a state-level registration has been prescribed for smaller producers/brand owners operating within one or two states.

3 E-Waste Management Rules, 2016 [Notified on 23rd March 2016 by the Ministry of Environment, Forest & Climate Change]

- The rules lay the responsibility of collection and recycling of e-waste generated during manufacture of any electrical/electronic equipment on the manufacturer.

- The responsibility of producers is extended through an EPR to collect end-of-life E-waste and properly store, transport and treat it before recycling or disposal.

- Consumers are required to properly segregate and dispose the e-waste generated by them.
4 Construction & Demolition Waste Management Rules 2016

- These rules require local bodies to utilize 10-20% material from construction and demolition waste in municipal and government contracts.

- These rules suggest administrative and other logistic supports from the State Governments to the business in the C&D Waste Management Sector.

5 Solid Waste Management Rules, 2016

- These rules are now applicable beyond Municipal areas extending up to urban agglomerations, census towns, notified industrial townships, areas under the control of Indian Railways, airports, airbase, Port and harbour, defence establishments, special economic zones, State and Central government organizations, places of pilgrims, religious & historical importance.

- The source segregation of waste has been mandated to channelize the waste to wealth by recovery, reuse and recycle.

- Responsibilities of Generators have been introduced to segregate waste into three streams, Wet (Biodegradable), Dry (Plastic, Paper, metal, wood, etc.) and domestic hazardous wastes (diapers, napkins, empty containers of cleaning agents, mosquito repellents, etc.) and handover segregated wastes to authorized rag-pickers or waste collectors or local bodies.

- Integration of waste pickers/rag pickers and waste dealers in the formal system should be done by State Governments, and Self Help Group, or any other group to be formed.
These rules emphasize that the biodegradable waste should be processed, treated and disposed of through composting or bio-methanation within the premises as far as possible.

New townships and Group Housing Societies have been made responsible to develop inhouse waste handling, and processing arrangements for bio-degradable waste.

The developers of Special Economic Zone, industrial estate, industrial park to earmark at least 5% of the total area of the plot or minimum 5 plots/ sheds for recovery and recycling facility.

All such brand owners who sale or market their products in such packaging material which are non-biodegradable should put in place a system to collect back the packaging waste generated due to their production.

These rules further provides that highcalorific wastes shall be used for coprocessing in cement or thermal power plants.


The manufacture and use of multi-layered plastic which is non-recyclable or non-energy recoverable or with no alternate use should be phased out in Two years’ time. (As amended vide Notification dated 27th March, 2018)

The Framework is based on the premise that producers are required to provide financial incentive to the collection systems, processing facilities and the recycling industry to collect and process plastic waste in order to meet the targets set out by the
Government.

- It will be based on creation of national registration and database repository through which all the registration of various stakeholders will be done online. Further, the stakeholders need to timely update the requisite information in the database for proper functioning.

What kind of soft law is currently used in India?
Bodies like the Central Pollution Control Board and the National Capital Protocol Circular have laid down the importance of the concept in detail.

SPECIFIC REMARKS:
When it comes to India we should always keep in mind significant share of informal sector in circular economy of the country. Only people are the driving force in circular economy. The better communication on the part of Government is the key so that people can change their consumption pattern and can reconnect with their traditional roots/practices.

On 23rd July 2019 the Government of India released the Draft National Resource Efficiency Policy so as to provide an overarching collaborative framework for resource efficiency across all sectors in the country, covering both biotic and abiotic resources and life cycle stages. This policy aspires for cross-sectoral stakeholder partnerships for the cause of resource efficiency for sustainable development. The mission statement of this policy says, “Nature protects if She is protected.” The father of nation Mahatma Gandhi always used to say, Nature has enough for our need but not for greed.

On 2nd March 2020 the Ministry of Finance constituted a Task Force Task Force on Sustainable Public Procurement (SPP) with following Terms of Reference (ToR):

(i) Review international best practices in the area of Sustainable Public Procurement
(ii) Inventorise the current status of SPP in India across Government organizations
(iii) Prepare a draft Sustainable Procurement Action Plan
(iv) Recommend an initial set of product / service categories (along with their specifications) where SPP can be implemented.

It is believed that the above steps at the policy level will be proved to be a milestone towards achieving the goal of circular economy.
Circular economy in Ireland

1 What legislation is available?

Current legislation:


  To that end, these Regulations lay down measures aimed, as a first priority, at preventing the production of packaging waste and, as additional fundamental principles, at reusing packaging, at recycling and other forms of recovering packaging waste and, therefore, at reducing the final disposal of such waste in order to contribute to the transition towards a circular economy.

The purposes for which these Regulations are made include the purpose of giving effect to provisions of the Waste Directive and partial effect to the Batteries, ELV, WEEE, Packaging and Landfill Directive(s). The Regulations set out additional measures to protect the environment and human health by preventing or reducing the generation of waste, the adverse impacts of the generation and management of waste and by reducing overall impacts of resource use and improving the efficiency of such use, which are crucial for the transition to a circular economy and long-term competitiveness.

Planned legislation:

• Circular Economy Legislative Package;

• A new Waste Management (Circular Economy) Bill; and

• Single Use Plastics Directive (EU directive to be transposed into Irish law).

2 What soft law is currently used?

• Waste Action Plan for a Circular Economy (the “Action Plan”), published 4 September 2020:

The Action Plan will act as a foundational document. The policy objectives and actions set down will act as a springboard for wider economic and societal developments in the circular economy. It will be followed later this year by an All Government Circular Economy Strategy.

The Action Plan will sit at the top of the hierarchy of statutory plans and programmes for the waste area which also includes Waste Management Plan(s), the National Waste Prevention Programme and the National Hazardous Waste Management Plan. The plan will inform future versions of those plans and provide a coherent framework in which sectoral policies, targets and objectives can be realised.

The Action Plan shifts focus away from waste disposal and moves it back up the production chain. It contains over 200 measures across various waste areas including circular economy, municipal waste, consumer protection and citizen engagement, plastics and packaging, construction and demolition, green public procurement, and waste enforcement.
The Action Plan echoes many of the ambitions committed to in the European Commission’s ‘European Green Deal’ particularly the goals of the Circular Economy Action Plan and the Farm to Fork Strategy. It is a proactive approach with ambitions to pioneer national targets for reuse and repair ahead of EU requirements.

The overarching objectives for the Action Plan are to:

- shift the focus away from waste disposal and treatment to ensure that materials and products remain in productive use for longer thereby preventing waste and supporting reuse through a policy framework that discourages the wasting of resources and rewards circularity;

- make producers who manufacture and sell disposable goods for profit environmentally accountable for the products they place on the market;

- ensure that measures support sustainable economic models (for example by supporting the use of recycled over virgin materials);

- harness the reach and influence of all sectors including the voluntary sector, R&D, producers / manufacturers, regulatory bodies, civic society; and

- support clear and robust institutional arrangements for the waste sector, including through a strengthened role for local authorities.

A Waste Management Advisory Group will be established to harness the potential and capacity of a broad range of sectors (public, business, environmental, and social) to guide strategic thinking and decision-making in the preparation of the next iteration of national waste policy.

3 Any further specific remarks:

- The All Government Circular Economy Strategy will follow the Waste Action plan for a circular economy and will be published later this year.

- On a broad level, the Irish Government plans to put in place the following measures to help achieve optimum results in the development of the circular economy going forward:

  - establish a circular economy unit within the Department of the Environment, Climate and Communications with a mandate to ensure a whole of government approach to the circular economy;

  - reconfigure the existing National Waste Prevention Programme to make it Ireland’s Circular Economy Programme (led by the EPA – Environmental Protection Agency);
- establish an interdepartmental Circular Economy Working Group with priority government departments;
- develop circular economy sectoral roadmaps that include priority waste prevention targets;
- ensure Ireland can maximise supports that are available from the EU, including under the proposed Recovery and Resilience Fund, for circular economy projects for priority sectoral material streams;
- support an environmentally ambitious approach at EU level in negotiations on future revisions of waste directives and circular economy initiatives;
- develop and implement a sustainable procurement model that seeks to minimise the environmental impact and optimise the public benefit of products and services procured;
- review objectives and practices of Extended Producer Responsibility (EPR) schemes for capitalising on circularity potential;
- raise awareness amongst policy makers and elected representatives as to how circular economy developments can support regional development and jobs;
- provide opportunities for the commercial sector to participate in the transition to circularity for example using sectoral pledges for sustainable products and practices;
- amend legislation in relation to end-of-waste and by-products to remove barriers to circular economy developments;
- develop a communications strategy around promoting the meaning and potential of a transition to a circular economy;
- seek to ensure skills for a circular economy such as design, repair and refurbishment are included in national future skills and Just Transition planning;
- advocate for the inclusion of reused and repaired goods in publicly funded initiatives;
- expand reuse, repair and sharing supports through the new Circular Economy Programme and other public programmes;
- expand public sector and public bodies’ role in reuse via Green Public Procurement and Circular Public Procurement setting a minimum target for procurement of used goods;
- investigate a national reuse target and press for new EU targets; and
- explore the role that Ireland’s digital sector can play in accelerating our transition to a circular economy.
Circular economy in Italy

What kind of legislation is available?

The EU Circular Economy Action Plan, issued by the European Commission in March 2020, is one of the main pillars of the European Green Deal. The Plan aims at making sustainable products the norm in the European Union (EU) and puts Europe at the forefront of the global efforts to adopt a Circular Economy model. The development of increasingly circular supply chains in strategic sectors, such as renewables, electric mobility, storage and manufacturing, would foster synergies among actors and sectors (e.g. electricity, transport) accelerating the economic growth and the environmental sustainability of the entire continent.

The EU Circular Economy Action Plan is the natural continuation of a deep-rooted European legacy, which is particularly strong in some Member States. Italy, for example, has been capable of turning its lack of natural resources into a virtue through a strong focus on innovation and design, making it one of the world leaders in manufacturing in the most resource efficient way.

Circular Economy has reached the centre stage of European policy debate, but many European countries still lack a national strategic roadmap to implement Circular Economy as a competitive advantage.

The world is facing major challenges. The profound and fast-paced economic, climatic and technological changes are molding society and lifestyles, opening areas of uncertainty and stimulating new needs, with environmental protection and social equality at the centre of the debate. Science and innovation are increasingly enabling an historic convergence of de-carbonization and competitiveness. Within this context, Circular Economy is a system-oriented approach capable of developing a positive vision of the future of the European Union. It has the potential to become a “catalyst for the common good” around which developing a “grand vision” for the European future. The recent European Green Deal and the related New Circular Economy Action Plan issued in March 2020 by the European Commission set new and more challenging objectives.
for Europe with regard to the transition to Circular Economy models. However, the Circular Economy development across the EU countries is far from being homogeneous. Many European countries still lack a national strategic roadmap to turn Circular Economy into a transition driver at national level, considering Circular Economy as a game changer and not just an environmental issue.

**Italy: Declaration of Intent with Italian Green New Deal**

Italy has not yet issued a proper Circular Economy roadmap, although some attempts have been made in recent years. In 2017, the Italian Ministry of Environment, together with the Ministry of Economic Development, issued a declaration of intent related to the Circular Economy (“Verso un modello di Economia Circolare per l’Italia”) aimed at providing a strategic Circular Economy framework for Italy. This initial effort was followed in 2018 by a more operational document (“Economia Circolare ed Uso Efficiente delle Risorse. Indicatori per la misurazione dell’Economia Circolare”) that outlined the importance of mapping and measuring Circular Economy initiatives to achieve concrete results. Moreover, the 2020 Italian Budget Law contains the first measures to implement the “European Green Deal” at the national level. Among the measures, the law establishes a €4.24 billion fund designed to finance highly-innovative and environmentally-sustainable projects over the 2020-2030 period.

**What kind of soft law is currently used in your country?**

Notwithstanding the above and the absence of a specific roadmap, in Italy we have evidence during the years of soft regulation helping specific and sectoral fields and markets.

In this respect summarized below some of the relevants:

- Legislative Decree February 5, 1997 no.22 (“Decreto Ronchi”) focus on the regulation of the waste matter and subsequently repealed by article 264 c.1 lit i) of the legislative decree no. 152/2006;

- Legislative Decree no. 152/2006 (“Environmental Test”- TU ambiente”) regulating the entire regulation of the Environmental matter;

- Law no. 221 dated December 28, 2015 entered into force on February 2, 2016 (“Legge di stabilità”); “Collegato Ambientale”

- Law Scheme of ratification of COP 21 “Paris Agreement”;

- Italian positioning in connection with the UN 17 Sustainable Goals issued by the Ministry of the Environment in 2017;

- Proposal for the National Strategy for a sustainable development released by the Ministry of the Environment on 2018;
The Circular Economy package relating to no. 4 European Directive dated May 30, 2018 and adopted through:

(i) Legislative Decree no.116 dated September 3, 2020 adopting 2018/851/EU amending 2008/98/CE relating to waste;

(ii) Legislative Decree no. 118 dated September 3, 2020 adopting article 2 and 3 of 2018/849/EU amending 2006/66/CE relating to batteries and relevant waste("accumulatori) and 2012/19/UE relating waste of electric and electronic equipments;

(iii) Legislative Decree no. 119 dated September 3, 2020 adopting article 1 of the 2018/849/EU amending 2000/53/CE focus on end-of-life vehicles;

(iv) Legislative Decree no. 121 dated September 3, 2020 adopting 2018/850/EU-amending 1999/31/CE relating to dumps;

Italy has in terms of Circular Economy among others new goals to be achieved:
- within 2025: recycling at least a percentage equal to 55% of the urban waste;
- within 2030: recycling at least a percentage equal to 60% of the urban waste;
- within 2035: recycling at least a percentage equal to 65% of the urban waste;
- waste disposal a maximum of 10% within 2035;
- packages to be recycled at least for a percentage equal to 65% within 2025;
- packages to be recycled at least for a percentage equal to 70% within 2030;
- textile waste and dangerous waste to be recycled separately by 2025;
- bio-waste to be recycled separately or at home trough compost;

In addition, based on a Report issued by Enel Italian Leading Company in the field of Renewables together with Ambrosetti, we have evidence that Circular Economy is still evolving in the European Union and in Italy. Its operational modes have only been internalized to a limited extent, especially if a system-wide comprehensive approach is adopted as a reference: defining and monitoring the operational aspect of Circular Economy is of absolutely importance in order to find the best way to par- amount importance, as a premise to find the best ways to maximize the benefits for the industrial value chains involved, the environment and society as a whole. For this reason, to assess the state-of-the-art of Circular Economy in Europe, the dimensions relevant for the introduction of circular models have been analysed, identifying quantitative met-
rics comparable for 27 European Union countries and United Kingdom, with a specific focus on three countries of interest (Italy, Romania and Spain). To assess the level of development of each European country, 23 Key Performance Indicators (KPI’s) have been selected, among which a subset of 10 indicators has been identified using the principal components analysis method, along four pillars:

- **Sustainable inputs**, which captures the use of renewable energy and of recyclable, recycled and biodegradable materials to manufacture goods and provide services in consecutive life cycles.

- **End-of-life**, which describes ways of recovering end-of-life value of asset, products and materials through reuse, re-manufacturing and recycling.

- **Extension of useful life**, which reflects the capability of increasing the duration of the useful life, with respect to usual end-of-life of a product or its components.

- **Increase of the intensity of use**, which rates the increase of the load factor of a single item (for example with product as a service or sharing services models). It measures the increase of the benefit obtainable with each unit of input (material and energy) used.

Analysing the current performance of the three countries of interest, it emerges that:

**Italy** belongs to the cluster of best performers for **End-of-life**, while it belongs to the intermediate-high clusters for **Sustainable inputs** and for **Extension of useful life**, while much more effort is needed to improve the performance on the **Increase of the intensity of use** of products/services.
Circular economy in Mexico

1 General Remarks

Environmental policy, including circular economy, has not taken a relevant place in the current Federal Government’s agenda. While it is true that there have been some efforts related to circular economy, much attention has been focused only to the national waste management policy. Thus, from a compliance point of view, circular economy has been narrowly conceived as a waste solution, especially in the industrial sector, and not as a holistic approach for production, eco-design, energy/natural resources management and its regeneration/loop closing potential.

In order to fully embrace an integral Circular Economy policy, relevant and precise legislation must be promoted enabling legal certainty to companies, social stakeholders and authorities. In addition, beyond a proper legal framework, circular economy must be enhanced with the creation of incentives and measures to break a predominantly linear economy trend.

As a manufacturer jurisdiction for the north American region (due to USMCA commercial treaty, formerly known as NAFTA), the country has the potential to flourish a prosperous recycling industry. Also, since Mexico has great challenges in waste management, emphasis should be placed in avoiding waste generation and adopt circular strategies over traditional solutions, such as de-materialization, services approach (rather than product ownership), and industrial symbiosis.

2 Legislation

In Mexico, no framework legislation on circular economy has been adopted so far. Yet, there is a General Circular Economy Law project, in the Mexican Senate, attempting to delineate a circular economy policy, with a predominantly waste management approach. This project has been widely criticized as it is perceived as a form of over-regulating waste management, instead of promoting an integral and complete circular economy policy. Despite this, it has some interesting features, such as including the first mandatory recycling rate for the building industry. This requires estate and infrastructure developers to take back and reuse at least 50% of the material disposed for a given project.
Locally, we have a case of circular economy legislation in the state of Quintana Roo (a province known for its world-famous touristic destinations, such as Cancun and Tulum). The Prevention, Management and Circular Economy for Waste Act of the State of Quintana Roo has been a notable effort to incorporate well-defined circular economy strategies not only in waste management, but also in product manufacturing. The main purpose of this legislation is to regulate waste management with a focus on circular economy and life-cycle of products, as well as shared and extended responsibilities for different sectors.

This law implements the obligation to have a traceability of waste materials and to present an extended responsibility plan registered before the government. This plan must be submitted by producers and sellers of products that, after being used and discarded, become waste. Similarly, this law establishes a circular economy information program of waste (periodically updated and useful for improving local environmental policy), as well as tax incentives for acquisition of technology that complies with circular economy principles.

Finally, the State of Mexico (the most populated Mexican province, comprising municipalities surrounding Mexico City’s metropolitan area) is also incorporating notions of circular economy in its environmental policy. Laws establishing municipal and state entities powers, were amended to incorporate mandates on circular economy for their waste management programs and budgets. The legal adjustments intend to foster green/circular procurement. This province has an array of industrial sectors (from maquilas to agri-businesses) that could benefit from a sound transition of current linear practices into more circular approaches, such as compost, waste to energy, reuse and recycle of materials.

These examples are only a few to be mentioned, and it is expected that further circular economy legislation will be nationally and locally implemented.

Summary: There is still no legal framework on circular economy in Mexico. However, there is a law project that aims to promote the adoption of circular economy on waste management and certain local legislation that promotes wider "circular" strategies.

3 Soft Law, Guidelines and Voluntary Measures

National Agreement for the New Plastic Economy in Mexico

This document was executed by the plastic producers’ sector in Mexico, civil organizations, and the Mexican Senate on December 5, 2019. On general terms, plastic sector seeks to comply with the Sustainable Development Goals by using plastic waste (in different rates, depending on the plastic streams and types) for the manufacture of new packaging.
The document also proposes the elimination of single-use plastic containers and other forms of packaging by 2030, adopting for this the redesign of products and rethinking manufacture from a consumption point of view, with the aim that all packaging and containers will be 100% reusable, recyclable and compostable.

“Zero Waste” Action Plan of Mexico City for a Circular Economy
The Government of Mexico City presented in 2019 the Action Plan for a Circular Economy, through which it is intended that Mexico City will become a sustainable and climate change-resilient city. This plan establishes investments to generate infrastructure allowing the use of wastes as raw materials in manufacturing and an overall adoption of a circular economy approach through reduction, reuse, recycling, and recovery strategies. Through this plan Mexico City government aims to triple the amount of recycled waste and reduce waste going to landfills in the order of 70% by 2024.

Summary: In Mexico there are few soft law instruments, guides, or voluntary measures to promote and adopt a circular economy. For now, some programs have been proposed by the government of the Mexican capital and those adopted by plastic producers and other key stakeholders, which surely will help in enhancing a sound adoption of this relatively new policy.
Circular economy in Slovenia

**Slovenia has defined the transition to circular economy as one of its strategic development priorities.** However, a general legislative framework which would define and set the way for such transition has so far not been implemented and the existing basis are mostly laid down in general non-binding official acts. Nonetheless, there are some positive examples of circular economy in Slovenia.

The most relevant official document dealing with transition to circular economy is the Roadmap towards the Circular Economy in Slovenia which was adopted by the Slovenian Government in May 2018. The Roadmap sets the path for Slovenia to become a circular economy front runner in the region. Designed through an inclusive, multi-stakeholder approach, it identifies four priority sectors: (i) **nutrition system**; (ii) **forest value chains**; (iii) **processing activities**; and (iv) **mobility**. The Roadmap also introduces the so-called Circular Triangle, a model which unites three interdependent and inseparable elements required for a systemic change from a linear to a circular economy in Slovenia: (i) Circular Economy (business models should move from linear to circular); (ii) Circular Change (comprehensive government policies to support transition to circular economy); and (iii) Circular Culture (adaptation of citizens’ values). Currently the Ministry of the Environment and Spatial Planning is preparing the Comprehensive Strategic Project for Decarbonisation of Slovenia Through Transition to Circular Economy.

Although specific framework legislation which would support the country’s transition to circular economy does not exist, some policies aim to facilitate the transmission. One such example are the recent amendments of the Waste Directive which entered into force in September 2020 and include specific rules to promote further use of materials which were before defined as waste and thus became useless. Also the Decree on Green Public Procurement which has been in place since beginning of 2018 requires that public procurement for certain goods and services is carried out in a way to reduce the negative impact on the environment by procurement of environmentally less taxing goods, services and constructions, aims to improve environmental characteristics of existing offerings, encourage the development of environmental innovation and circular economy and provide good examples for the private sector and the consumers.
Given the lack of general regulation, the development and progress of circular economy is mostly driven by individual initiatives of different organizations and businesses. Two biggest municipalities in Slovenia – Ljubljana and Maribor – have successfully implemented several sustainable initiatives (e.g., bike sharing, recycling, efficient use of energy, etc.). Municipalities have also been very successful in waste collection whereby 67% of all municipal fractions are sorted. However, there is room for improvement in recycling as the next phase in circular economy since only 54% of the collected waste is recycled. Another very positive example is the Slovenian steel industry which achieves a recycling rate of almost 100%.
Circular economy in Sweden

Introduction
The concept of circular economy is highly topical issue in Sweden and has gained the attention in policy and business since the mid-2010s. However, already in 1990s, Sweden adopted a concept similar to a circular economy (eco-cycle), which has also influenced the Swedish environmental legislation since then.

The idea of circular economy is nowadays broadly addressed from different angles of the society – by companies, authorities, institutes and organisations, and not at least by the Government and Parliament. For several years the political and legislative initiatives in Sweden have strived towards enhanced frameworks for a better protection of the environment and natural resources, as well as more efficient use of energy, materials and waste handling. The Swedish goal is to be fossil free by 204 and the Government has identified a circular, bio-based economy as one of the keys to achieve this goal. Although majority of new laws relating to environment derive from the EU, there is a large general consciousness and interest in the overall society for climate, environment and sustainability – and as a result of this – also a growing development of policies for circular economy.

Legislation on circular economy
Sweden has no coherent legislation on circular economy. Instead, different legislations aim to achieve the objectives of circular economy. Since the central focus of circular economy is to prevent waste and minimise use of resources, the most relevant legislation naturally regards waste management.

The Swedish legislation on waste management (mainly in the Environmental Code and ancillary regulations) is based on the EU waste legislation and is a comprehensive and detailed legal framework. The fundamental principle for waste management is the so-called waste hierarchy, where preventing of the creation of waste is the top step in this hierarchy. The priorities for the waste legislation are to promote reuse, material recycling and biological treatment and other recycling, e.g. energy recovery. First as a final step in the hierarchy, when waste cannot be reused or recycled, it is subject to disposal.

Producer responsibility obligations have been well-established in Sweden for dec-
ades, with well-regulated recycling systems in place. Sweden has adopted the extended producer responsibility according to the EU Waste Directive 2008/98/EC and has a regulatory framework that governs producer’s responsibility consisting of e.g. the Environmental Code, the Waste Ordinance (2011:927), and regulations on producer responsibility for packaging and on producer responsibility for waste paper. This framework stipulates a duty of producers to ensure that waste is collected, removed, recycled, reused or removed in a manner that satisfies the requirements for acceptable waste management in terms of health and the environment. The Environmental Code further provides an obligation upon the local municipalities to collect and dispose of waste, and prevent the creation of waste.

The implementation of EU’s Waste Framework Directive is currently about to lead to several major changes of the Swedish waste law, which to a great extent relates to the goal of obtaining a circular economy. As a part of this implementation, several new rules on waste management have been adopted in 2020, for instance on new mandatory rules on producer responsibility, an increased obligation for local municipalities to strive for waste reduction, new requirements for collecting hazardous waste, textiles, biowaste, and handling of construction and demolition waste.

Legislation on taxation, environmental protection, research and innovation are other examples of legislative frameworks which found the arena for a circular economy. For instance, since 2017, the tax legislation provides tax reductions for repair and maintenance of consumer products and lower tax for repair services (e.g. of clothes, shoes, bicycles) in order to facilitate cheaper repairs on used items. There are law proposals on how to promote car sharing business.

**What kind of soft law is currently used?**

Sweden has a National Waste Plan and a Waste Prevention Program which provide an overview of the targets, instruments and measures introduced in Sweden to prevent waste and to achieve a more resource efficient and non-toxic waste management in accordance with the waste hierarchy. The Plan and the Program is part of the Government’s objective to enhance the circular economy. New targets were adopted in June 2020, with the goal to achieve for example that at least 65 percent of all household waste shall be reused or recycled by 2035, that there shall be a reduction of food waste with at least 20 percent per capita from 2020 to 2025, and that the amount recyclable new packaging shall increase to at least 30 percent in 2030.

In July 2020, the Swedish Government decided on a national strategy for circular economy, which sets out the directions and ambitions for a long term and sustainable change of the society. The strategy is held to be an instrument in order for Sweden to become the first fossil free welfare state in the world.
It is stressed in the strategy that the work on the switch-over to a circular economy needs to speed up in order to meet the environmental and climate targets and the global sustainability goals of Agenda 2030. The strategy points out four focus areas for the national work and where measures are especially required for promoting circular economy:

• Circular economy by sustainable production and product design, by for instance steering towards products being designed for a long lifetime

• Circular economy by sustainable ways to consume and use materials, products and services, by for instance inform consumers on how to make sustainable and circular choices in the everyday life and to make it easier for businesses and individuals to share, repair and reuse products.

• Circular economy through non-toxic and circular cycles, by for instance promote the development of Sweden’s bio-economy in order for bio-based renewable and sustainable produced raw material can replace fossil-based raw material in products and processes

• Circular economy as an incentive for businesses by measures promoting innovation and circular business models, by for instance promoting research, innovation and technical development regarding material recycling and digitalisation.

The strategy points out that steering tools should be adopted that contribute to a greater supply and demand of circular products, services, reuses and recycled material. The types of material that are prioritised in the work for a circular economy (and which needs to be better recycled and handled) are plastic, textile, renewable and bio-based raw material, food, building material and metals and minerals that are critical for innovation.

The strategy is not binging but points out the intended direction of the work of the Government, as a foundation for coming legislation.