

Interview with European Commission (DG ENV)
Director-General **Florika Fink-Hooijer**

"Potential long-term gains in defence are undeniable"



What role does Circular Economy play in the European Green Deal?

The Commission's Circular Economy Action Plan is one of the flagship initiatives of the European Green Deal. Through this Action Plan we want to lead Europe towards a more resource efficient, clean and climate neutral economy. The circular economy is a new economic model for the EU. It proposes a change in the way we produce and consume to become more resilient, more innovative and more resource efficient – and partly more autonomous.

It is also a great opportunity for companies who will be more competitive by being more circular. On the one hand, because a more circular economy will help Europe to decouple economic growth from resource consumption. On the other, because the circular economy offers a key contribution to achieve a climate neutral Europe. The 2019 Ellen MacArthur Foundation/Material Economics Report tells us that greenhouse gas emissions are not falling quickly enough to achieve climate targets and switching to renewable energy can only cut them by 55% of what is needed to reach the 1.5 degrees target. The remaining 45% of emissions must come from how we make and use products, and how we produce food.

Why is it important to have the defence sector also included in the EU's Circular Economy?

The European defence industry generates a total turnover of €100 billion per year and 1.4 million highly skilled people are

directly or indirectly employed in the sector in Europe. Like any sector, there are still untapped opportunities to ensure a reduced environmental impact. The circular economy presents a clear business case for the defence sector to be more sustainable while keeping up the competitiveness of the defence industry.

To integrate circular economy models into the defence sector successfully means that the models must not only address resource consumption but also the priorities of the armed forces: namely capability, performance, security of material supply, efficiency and research and technology. Innovation and new business models brought by increased resource efficiency, development of new materials, promotion of secondary raw materials and more sustainable public procurement will in turn not only preserve the environment but also ensure security of supplies, create new jobs, reduce costs for SMEs and larger companies and make the most of public spending.

Can you already anticipate what impact the EU's Circular Economy policy might have on defence capabilities, procurement and industry?

The benefits for defence capabilities, procurement and industry lie in promoting the circular economy through the use of Green Public Procurement criteria, for instance, to foster circularity in uniforms and clothing, or supporting remanufacturing, reparability or reverse logistics. Moreover, a large part of the defence sector is composed of SMEs – which

would particularly benefit from net-savings. Setting up collaborations with the private sector can also establish a productive discussion and exchange of knowledge around the requirements, opportunities, limitations and barriers to the introduction of the circular economy in defence.

For example, in the Netherlands, the Dutch Ministry of Defence, uses circular principles to reduce waste and extend the service life of uniforms, helmets, and other personnel equipment for the navy, army, air force and military police. In Portugal, some pilot programmes have been set to integrate recovery and reuse of materials into the future maintenance of jets without affecting military efficiency and operational capacities. These and other actions throughout the product lifecycle and the value chain can reduce the environmental externalities of Defence, while ensuring efficient collaboration and cooperation within the community, which is a good way to support inclusive change. I understand that these efforts do not start from scratch, as the European Defence Agency (EDA) has already started exploring the topic with reports and individual projects aiming at improving the knowledge base, and also to measure impacts.

How can the Commission help the defence sector move towards Circular Economy? Is there EU funding available for this purpose?

The circular economy is one of the building blocks of the European Green Deal, Europe's strategy for sustainable growth. Funds are available to support all stages of

development of an innovation contributing to the circular economy. For the research phase in the development of new technologies through Horizon Europe, looking for example at research on electronic application for smart equipment. For the related testing through LIFE, which covers at the same time circular economy, natural resources, climate mitigation and adaptation.

For the implementation through the structural funds, at regional and local level for specific military sites or at national and transnational level for a large-scale application. It is important to keep an eye also on the adoption and implementation of the European Defence Fund. The potential long-term gains in technological advancement, capability,

performance, security of supply and efficiency in the defence sector are undeniable.

An EDA project dedicated to circular economy could be a good opportunity to reap the benefits of a more circular economy in the defence industry. We are working together to make this happen.

Three questions to...

Luxembourg's Defence Minister François Bausch



Luxembourg is a driving force behind the effort to integrate circular economy into defence, in particular through the new Incubation Forum for Circular Economy in European Defence. Why this particular interest and what are your objectives?

Our quest for sustainable development needs to include a closer look at the life cycle of the various objects and products that we use in our life. We may actually have to question our linear "buy → use → make waste" economic paradigm in favour of a circular approach, in which we design buildings, vehicles, machines and other objects and products in a way, that they can be better maintained, repaired and reused at the end of each 'value cycle', without becoming 'waste' and, if possible, without having to be altered structurally.

The implementation of this new concept of circularity involves a design that needs to anticipate and include the various maintenance, repair and reuse possibilities of objects and products as well as of their respective components and materials. These possibilities of maintenance, repair and reuse need moreover to be communicated and shared between producers and potential users. Hence, information and data sharing becomes key.

And which sector would be better suited than defence to start testing and rolling out this new concept in which anticipation and forward planning are inherent to the system? Moreover, the community of defence producers and users is often highly specialised and limited to the same sector and there is already an established culture of monitoring and sharing information.

All these arguments have motivated us to support EDA in establishing an Incubation Forum for Circular Economy in European Defence.

Do you see a potential and willingness for increased European cooperation in this domain?

As European defence cooperation is growing and some Member States have decided to jointly design and procure new capabilities, the potential is huge.

If implemented at an early stage of the research and technology phase, the mainstreaming of circularity principles into our defence supply chains can benefit European industry and economy significantly. Benefits may include: less pressure on the environment, more resource efficiency and a higher security of supply of raw materials, increased competitiveness, a boost for innovation and economic growth, additional jobs and support for the EU to maintain its leadership in setting international industrial standards.

We are aware of several interesting initiatives in various Member States. But, to our knowledge, none of these has reached a status of widespread implementation so far.

Do you already have topics or project ideas in mind, which could be brought to the Forum, in view of being shared and implemented with other participating Member States?

In our view, while taking on board all the experience gained in various pilot initiatives across Member States, it would be important to focus on enabling the operationalisation of circular material, component and product flows in European defence and to address potential barriers, which are often of regulatory, technical, organisational and financial nature, and may impede the implementation of circular economy principles.

Among the enablers, in particular, I see advantages that digitalisation could bring, e.g. helping to increase transparency and data sharing between producers and users of materials, components and products, in particular about how to use, maintain, repair, reuse and, if needed, remanufacture and recycle them after each value cycle.

In Luxembourg, a public-private partnership initiative has developed a "Product Circularity Data Sheet" which is precisely trying to bridge this data-sharing gap and which is currently tested in various industries.