Miquel Ballester Salvà

FAIRPHONE

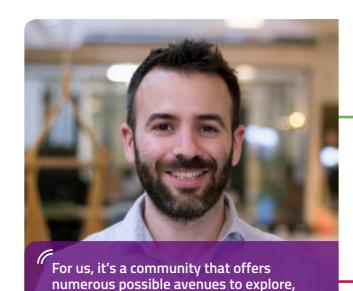
It's widely reported that the modern mobile phone has far more computing power than the Apollo spacecraft that took man to the moon, and the power and complexity of mobile devices grow each year. The staggering array of features and capabilities underline the tremendous complexity inherent in the construction of each device, both in the materials that go into it, and the story of those who help make it.

As the smartphone has taken off as a technology, however, concerns have been raised as to the environmental effects of that technology, especially in an age where consumers typically replace their device every few years. The mining of raw materials used in modern smartphones has been estimated to use as much energy as users consume by using and recharging their devices over a 10-year period.

In a market where devices seem to be getting ever bigger, more powerful and hungrier for energy, Dutch social enterprise Fairphone aims to do things differently. The company, created in 2013, aims to take a fundamentally different approach to smartphone manufacturing by minimizing both the social and environmental effect across the full lifecycle of the device.

The company strives to be sustainable across four main areas, all related to the production, sale and recycling of each product. These include:

- How the raw materials are obtained
- Working conditions across the supply chain
- The design of each device to ensure it lasts as long as possible
- A focus on the second life of the device to make it easy to recycle or repurpose



The company recently secured EUR 7 million in funding, building on an earlier crowdfunding investment of EUR 2.5 million and a further EUR 13 million in debt finance. This investment was obtained after the company had shipped over 125 000 Fairphones since 2013, with

around 100 000 devices saved from landfill so that the

raw materials could be extracted and reused.

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Cross-sector Work

The nature of the circular economy means that it is not possible to achieve this kind of growth without a strong and robust ecosystem of partners to work with.

'Most of our initiatives are with industry and we rarely operate in isolation,' Fairphone's Miquel Ballester Salvà says.

Working with the EIT Community is a natural way to tap into such an ecosystem. Fairphone began their collaboration with EIT RawMaterials as part of the 2018 Start-up and SME Booster Call, which allowed them to examine the value chain of tin in manufacturing in China. The project aims to explore every stage of the manufacturing process to better understand how tin is used and recycled, and how sustainable the process is.

Tin is a crucial component of the modern smartphone, with much of the world's supply mined in unsustainable ways. Research from groups such as Friends of the Earth have linked tin mining to wide ranging social and environmental destruction; Fairphone's work strives to bring more sustainable practices to the entire smartphone sector.

From this initial project, Fairphone hopes to work more closely with the entire EIT Community to utilise the pan-continental network of start-ups, government and industry to help create a more sustainable smartphone industry.

'It's a really thriving community and all of the covered topics are relevant to us,' Ballester Salvà says. 'For us, it's a community that offers numerous possible avenues to explore, especially in finding smaller, potentially more innovative recyclers to partner with.'

Collaborate to grow

The key to the company's growth thus far has been their openness to work with a wide range of stakeholders across the circular economy.

'It sounds a bit of a cliché to say we really need to collaborate, but it's so important to be able to work well with the whole ecosystem in the circular economy,' Ballester Salvà says. 'In the linear economy it might be possible to work with individual companies unilaterally, but in our case, everything has to be integrated. Therefore, partnerships and consortia are essential."



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There are a growing number of events and channels by which these connections can be made, both within the EIT Community and elsewhere, but the key is to be as targeted as possible so you have clear proposals in mind for each stakeholder.

'If conversations can be entered into with a clear goal in mind, then they're much more likely to deliver results,' Ballester Salvà explains. 'It's then through these partnerships that you can thrive as a business while also doing the right thing for society.'



