

# MATERIAL INDICATOR FOR CIRCULAR ECONOMY

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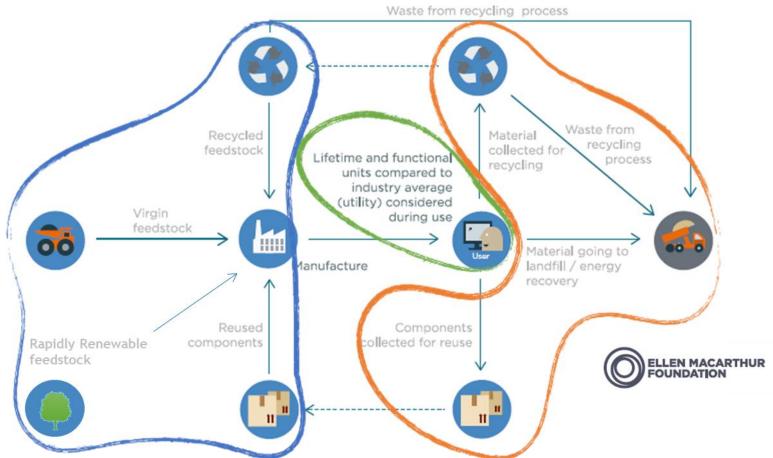








#### **Material Circularity Indicator**



#### 1) Input in the production process:

How much input comes from virgin & recycled materials and reused components?

2) Utility during use phase: How long / intensely is the product used compared to an industry average product of similar type?

3) Destination after use: How much material goes into landfill (or energy recovery), how much is collected for recycling, which components are collected for reuse?



#### Houseful activities

#### What

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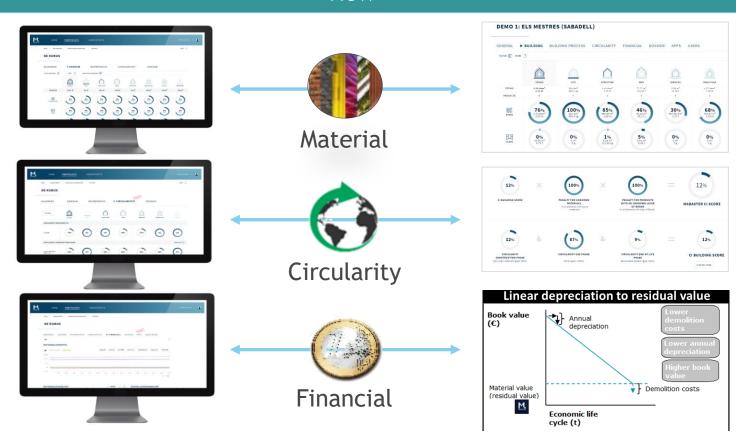






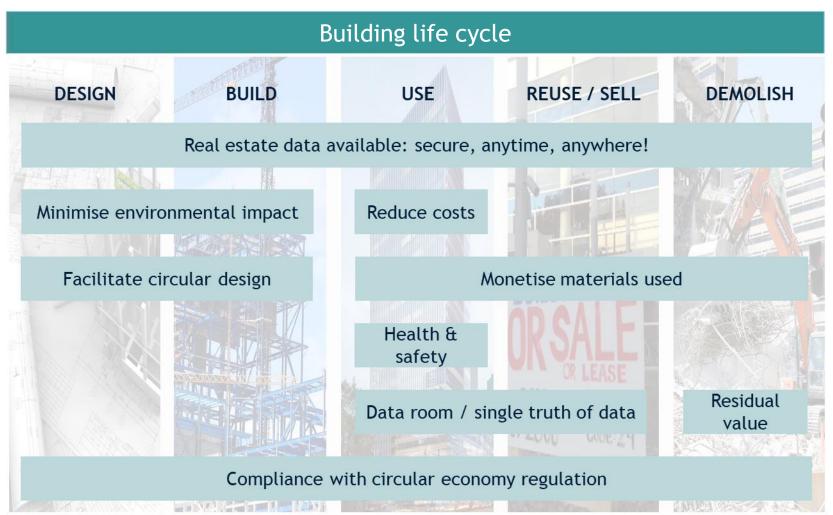
## Why is this important?

#### How





#### Additional opportunities





# **A**BQ

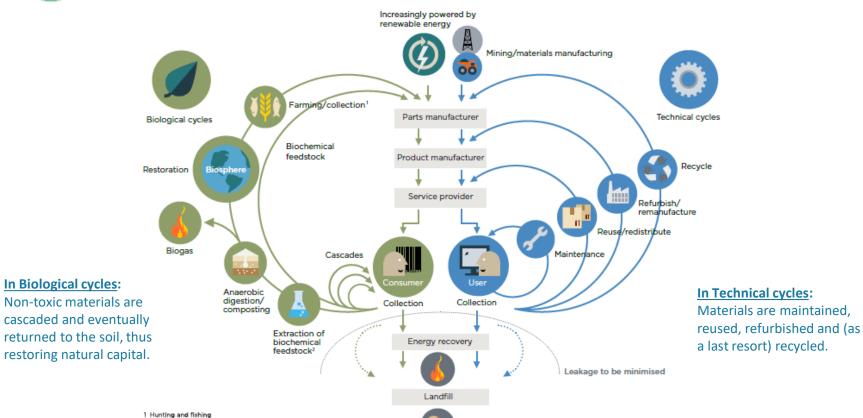




In Biological cycles:

## Material Pilar (Turntoo)





The tighter the cycle the more economic value is retained.

2 Can take both post-harvest and post-consumer waste as an input

Adapted from the Cradle to Cradle Design Protocol by Braungart & McDonough

SOURCE: Ellen MacArthur Foundation -



#### Madaster Circularity Index

The **Madaster Circularity Indicator** assesses the level of circularity of each building between 0 and 100% based on the user's uploaded information to the Madaster platform. The Madaster CI assesses a buildings and products on three phases within the building's lifetime:



#### 1) Construction phase:

What is the proportion of 'virgin materials' compared to 'recycled, reused or rapidly renewable materials'?

2) Use phase: how long are products and materials used compared to average lifetimes of similar products?

3) End of Life phase: what is the destination of the materials or products of a building at the end of the lifetime? Will they be reused, recycled or wasted?



## Madaster platform process

