# COLLECTORS

## WASTE COLLECTION SYSTEMS ASSESSED AND GOOD PRACTICES IDENTIFIED

*INTRODUCTION*

Warsaw, June 26th 2019

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PNO Consultants

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# Copernic Conference Centre

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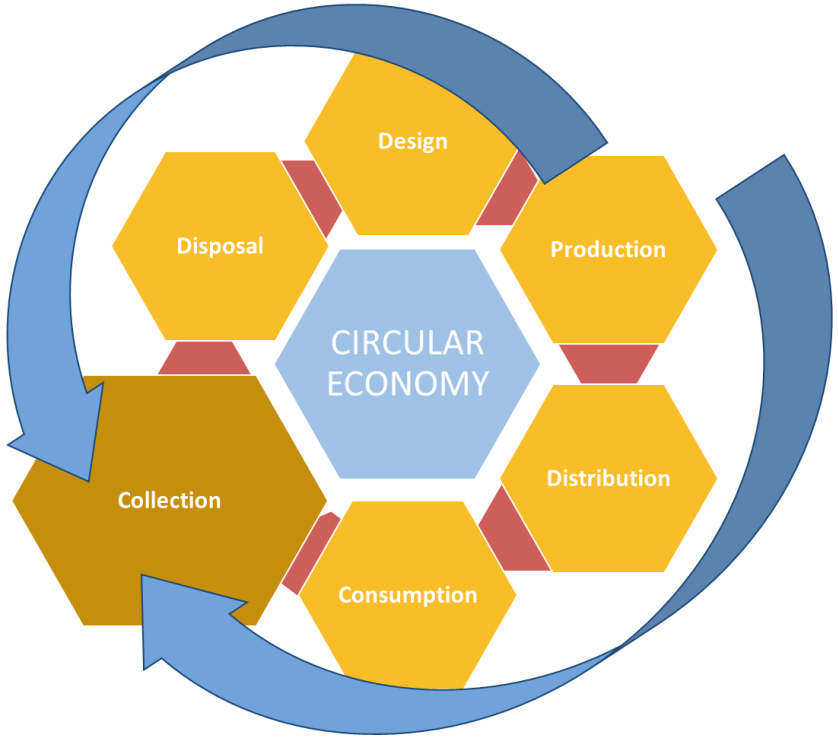
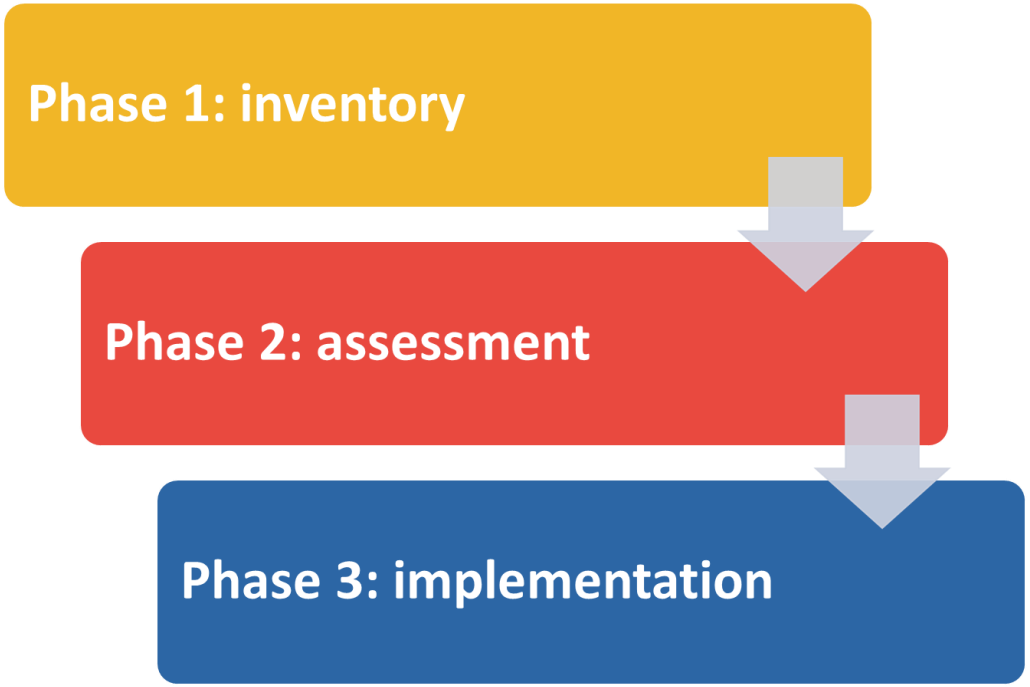


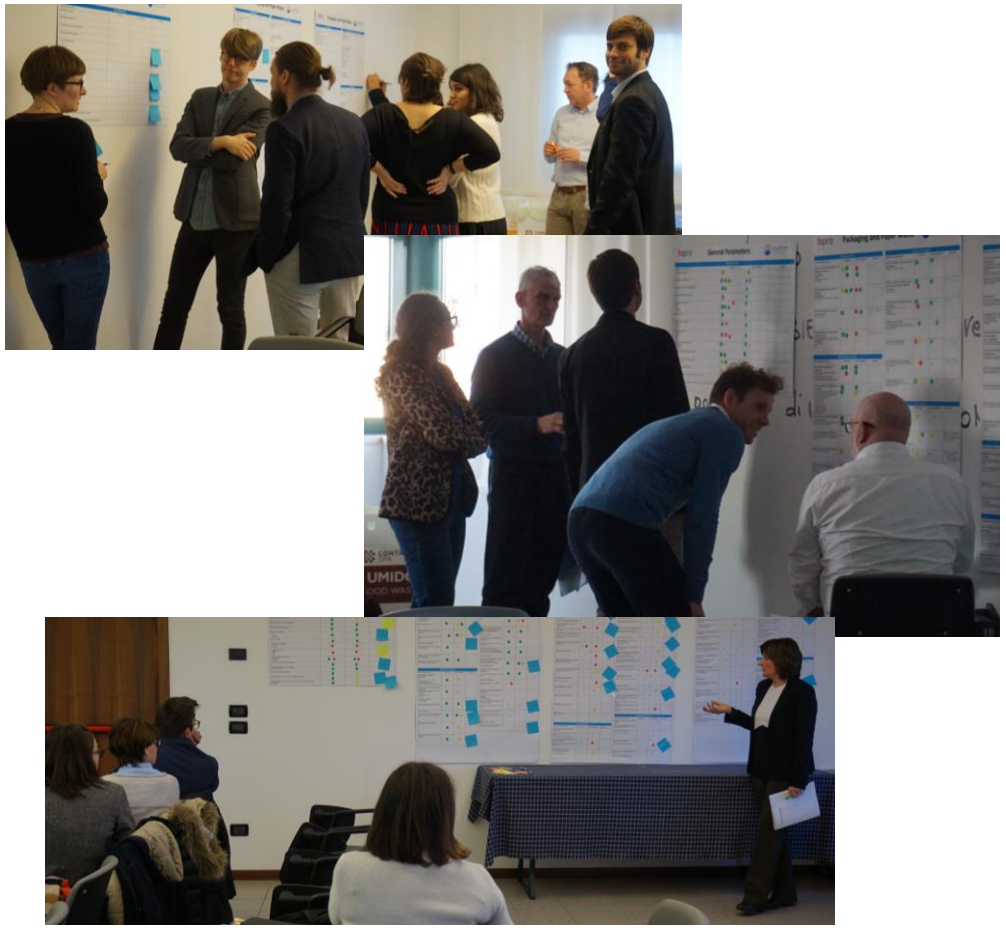
# COLLECTORS' ambition

"The COLLECTORS-consortium is convinced that good performing regions and cities have the potential to serve as good practice examples for **regions with similar local contexts**"



# COLLECTORS' inventory phase



Use the filter option to find sources with specific characteristics: specific language / country / waste stream / author / …

| Short ref. | Title | Date | Author/publishe | Country | Language | PPW | CDW | WEEE |
|---|---|---|---|---|---|---|---|---|
| 2015, Ministry Of Environment, SI National | Program Waste Management nand the years 2016 - 202( | 2015 | Ministry Of Environn | SI | English | x | x | x |
| 2015, Ministerium für Klimaschutz, DE NRW | Abfallwirtschaftsplan Nordrhein-Westfalen - Teilplan Siedl | 2015 | Ministerium für Klim | DE | German | x | x | x |
| 2015, Deloitte, BE CDW Factsheet | Screening template for Construction and Demolition Wast | 2015 | Deloitte | BE | English | -- | x | -- |
| 2015, BiPRO, UK London Capital factsheet | Capital factsheet on separate collection - London, UK | 2015 | BiPRO | UK | English | x | -- | -- |
| 2015, BiPRO, SK Bratislava Capital factsheet | Capital factsheet on separate collection - Bratislava, SK | 2015 | BiPRO | SK | English | x | -- | -- |

You can find the respective documents by looking at Short ref., which is the file name of the document, and the waste stream.

Here you can find the files, which are listed in the literature database

| Name | Uploaded By | Creation date |
|---|---|---|
| Literature for CDW waste stream | tber@ramboll.com | 17/05/2018 09:09:34 |
| Literature for PPW waste stream | tber@ramboll.com | 17/05/2018 09:09:49 |
| Literature for WEEE waste stream | mdr@ramboll.com | 16/05/2018 15:54:27 |
| Task 1.2 Literature Database.xlsx | mdr@ramboll.com | 16/05/2018 15:53:27 |

Literature Database – provides an overview of collected sources

# COLLECTORS' inventory phase

## CHARACTERISTIC OF THE REGION

Population

Density

GDP

Area characteristics

Please make a selection

Waste fraction

- PPW — Plastic packaging waste
- WEEE — Waste electrical and electronic equipment
- CDW — Construction and demolition waste

## AVAILABLE INFORMATION

only display waste collection systems with available data on

- Waste fee
- Information on the costs
- Quality of sorted material

SEARCH

71 waste collection systems found

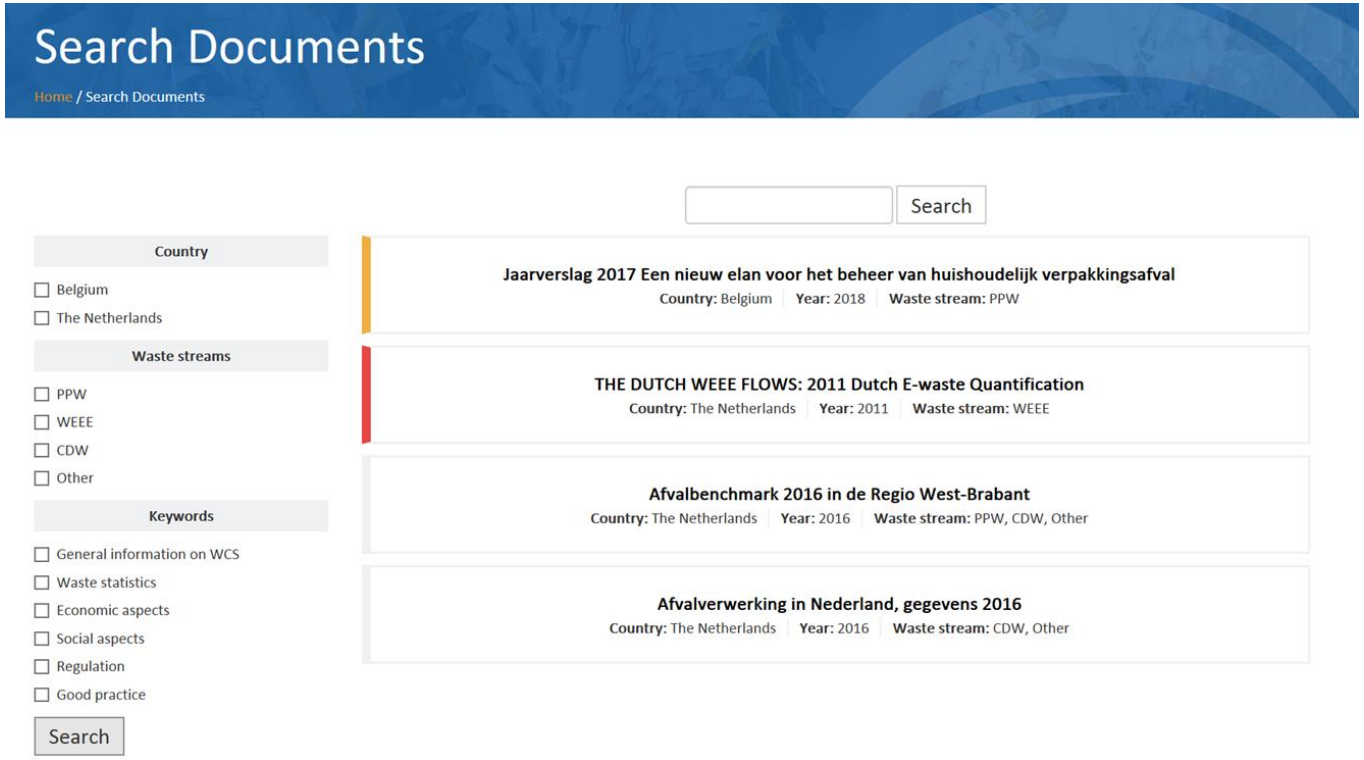

# COLLECTORS' inventory phase

**250+ information sources on waste collection, including reports on:**

- *Waste statistics.*
- *Economic aspects of waste collection.*
- *Social aspects of waste collection.*
- *Regulation.*
- *Good practice.*

**Reports covering:**

- *24 Member States.*
- *3 waste streams*

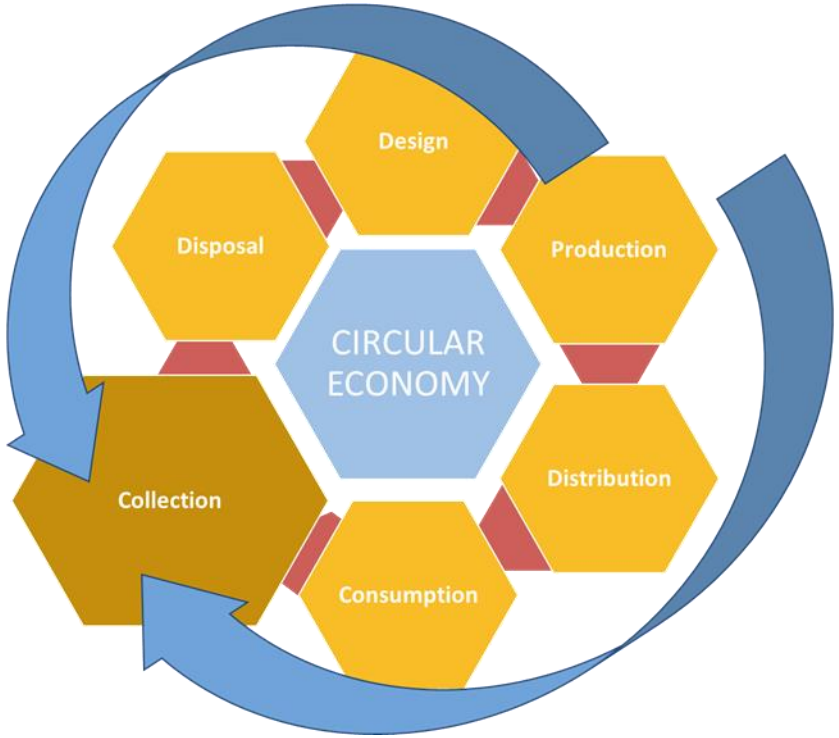


# COLLECTORS' inventory phase

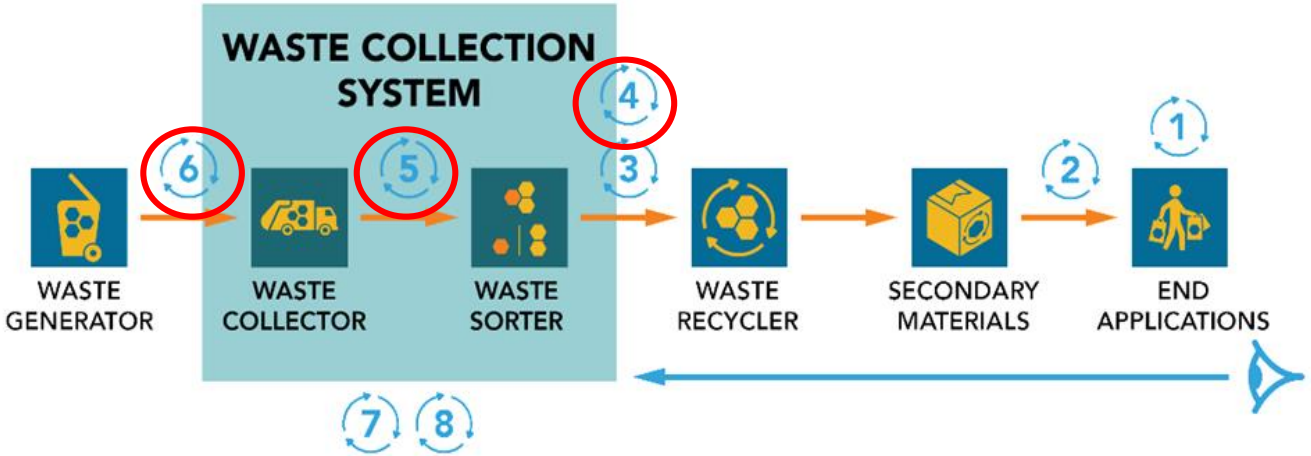
**Database on waste collection systems:**
https://www.collectors2020.eu/tools/wcs-database/

**Waste library:**
https://www.collectors2020.eu/waste-library/

# COLLECTORS' assessment phase



# COLLECTORS' assessment phase




1 MARKET/DEMAND
for secondary materials or for end applications

2 MANUFACTURING INFRASTRUCTURE
with feedstock flexibility to absorb/use sec. materials

3 SORTING AND RECYCLING INFRASTRUCTURE
availability of this infrastructure

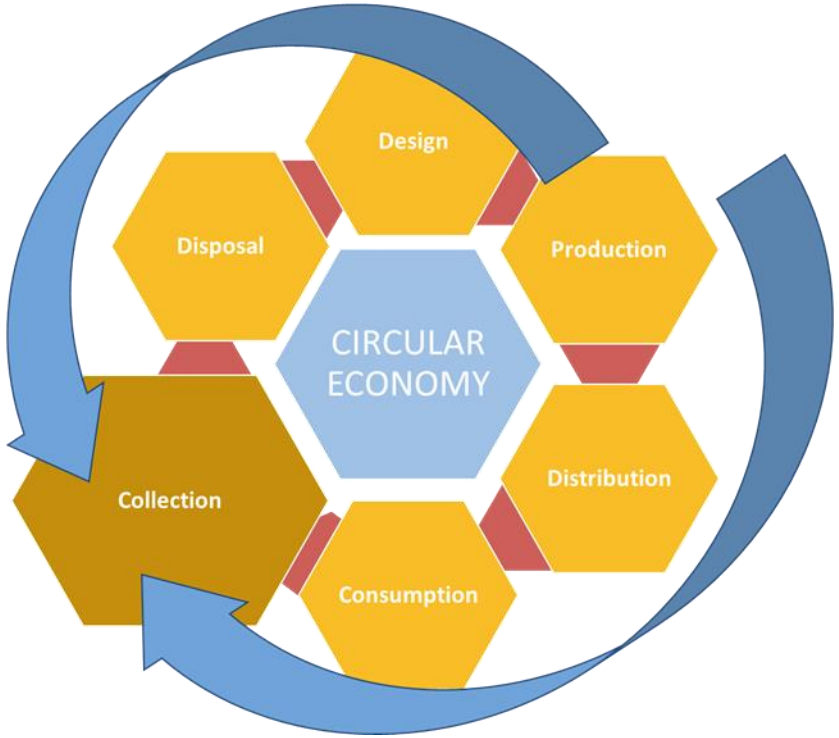
4 SUPPLY
minimum amount

5 QUALITY OF WASTE
quality requirements / uncertainty & stability

6 TRACEABILITY
proxy for quality

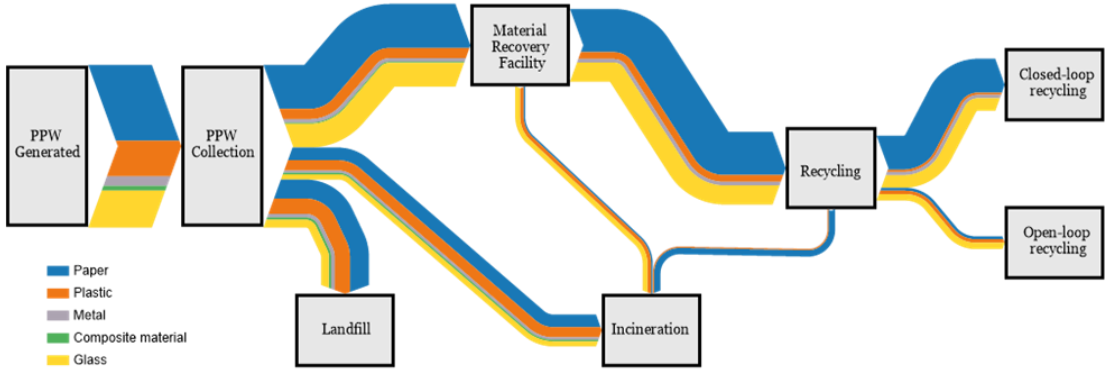
7 POLICY OBLIGATIONS
such as recycling targets

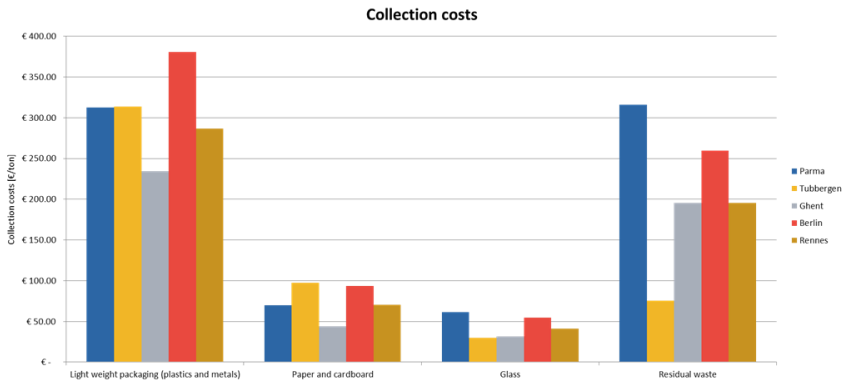
8 ECONOMICS
costs ≤ revenues for each link in the value chain




**Vanderreydt, et al (2019):**
"COLLECTORS Deliverable 2.2: Analysis of boundary conditions for waste collection systems"

# COLLECTORS' assessment phase




| Container glass waste | | | | |
|---|---|---|---|---|
| **Scope** | **Collection method** | **Collection output** | **Sorting output** | **Recycling output** |
| Transparant glass<br>Clear versus mixed colored glass<br>Clear versus green versus brown glass<br>Mixed glass | • CAS<br>• Bring point<br>• Door-to-door<br>• Bring points + CAS<br>• Road containers + CAS<br>• Door-to-door + bring points<br>• Bring points + CAS + other<br>• Door-to-door + bring points + CAS | • Clear container glass<br>• Coloured container glass<br>• Mixed container glass<br>• Mixed container glass co-mingled with other wastes | • Clear container glass cullet<br>• Brown container glass cullet<br>• Green container glass cullet<br>• Mixed container glass cullet | • Container glass (flint, brown, green)<br>• Insulation mineral wool (short glass fibre)<br>• Ceramic sanitary ware<br>• Fluxing agent in brick manufacture<br>• Sports turf and related applications<br>• Water filtration media<br>• Abrasive<br>• Aggregate in construction materials<br>• Reflective highway paint |

**Four perspectives applied on 12 case studies (clockwise):** (1) societal acceptance; (2) environmental performance; (3) circular economy perspective; (4) economic assessment

# COLLECTORS' implementation phase

**INTEGRATION:**

*Multi-criteria decision making and update web portal*

**IMPLEMENTATION:**

*Guidelines, policy briefs and project factsheets*

**CAPACITY BUILDING:**

*Training modules and workshops*

# Thank you!

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For more info about the project visit the COLLECTORS website at www.collectors2020.eu