



SUSTAINABILITY THAT PAYS BACK

RecyClass certification schemes for
recyclability, recycling process and
recycled content traceability

EUROPEAN REGULATION



- **PPWR** - packaging and packaging waste regulation, which intends to replace **PPWD** - current Packaging and Packaging Waste Directive
- A directive to reduce the impact of certain plastic products on the environment, known as the **SUP Directive**, restricts single-use plastics
- **Green Claims Directive** - aims to prevent companies making unclear or unsubstantiated environmental claims, known as greenwashing
- **CSRD** - requires companies to disclose a broad range of data relating to their environmental, social, and governance practices according to the ESRS technical standards.
- EN 15343:2007 and ISO 22095:2020 standards for recycled plastics

GREENWASHING DIRECTIVE:

- Requires reliable, comparable and verifiable information for buyers
- Establishes solid and harmonized calculation methods covering the full value chain
- Limits the proliferation of labels and misleading claims on the Single Market
- Claims without reference to an independent monitoring system will be considered false





SEIMAS APPROVED THE AMENDMENTS IN SEPTEMBER 2023

what will change?

Contribution from the country's budget

Lithuania used to pay a contribution to the EU for non-recycled plastic packaging, ~13 million. EUR annually. The legislative changes will ensure that non-recycled plastic is paid for by those who put the packaging on the market.

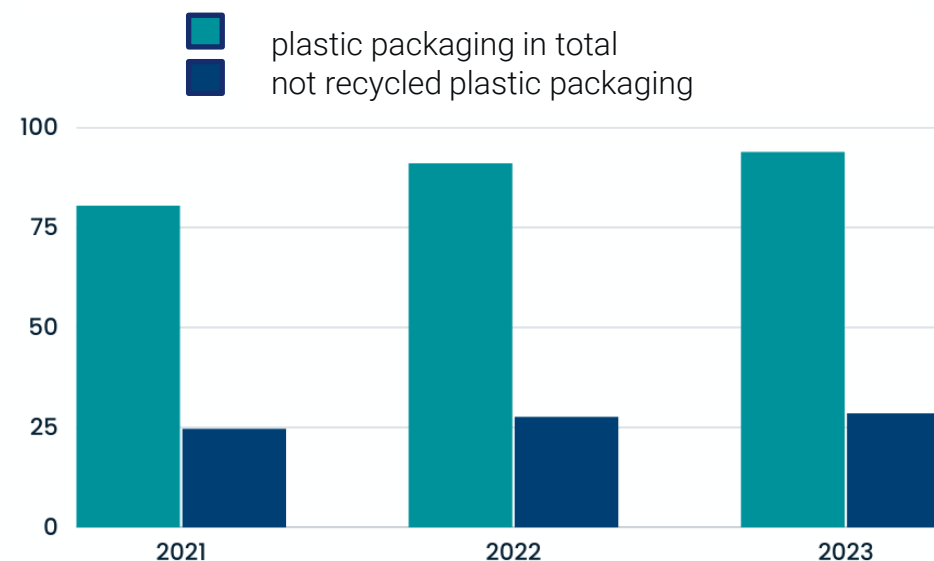
Burn less, recycle more

Today, a lot of packaging that can be recycled is incinerated. The tax change will create strong incentives to recycle plastic.

Development of plastic recycling processes

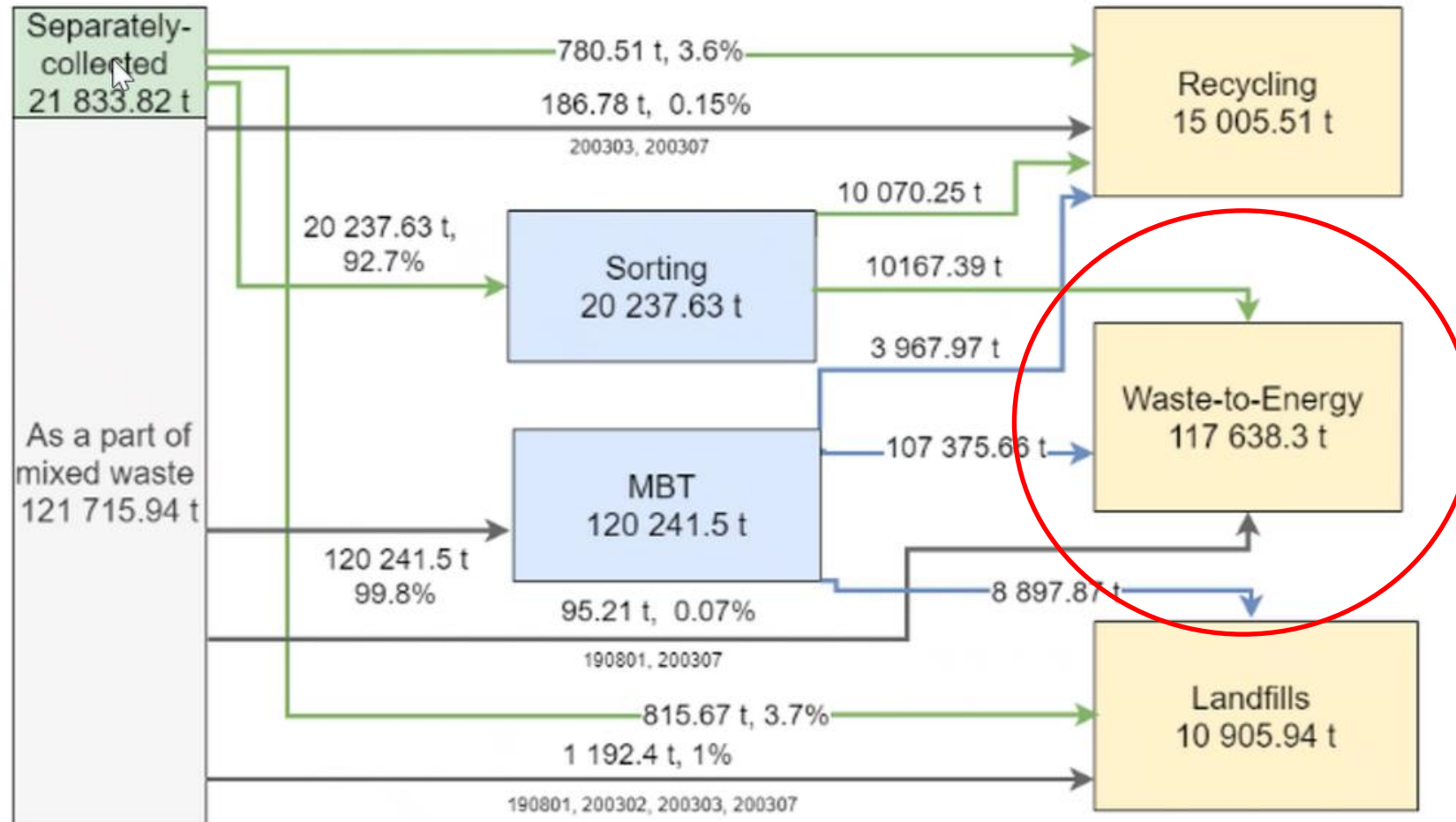
Manufacturers and/or importers will be encouraged to produce and/or import more sustainable packaging, the composition and design of which are adapted to recycling.

Amount of plastic packaging waste accumulated in Lithuania, thousands of tons



MUNICIPAL PLASTIC WASTE FLOW IN LITHUANIA

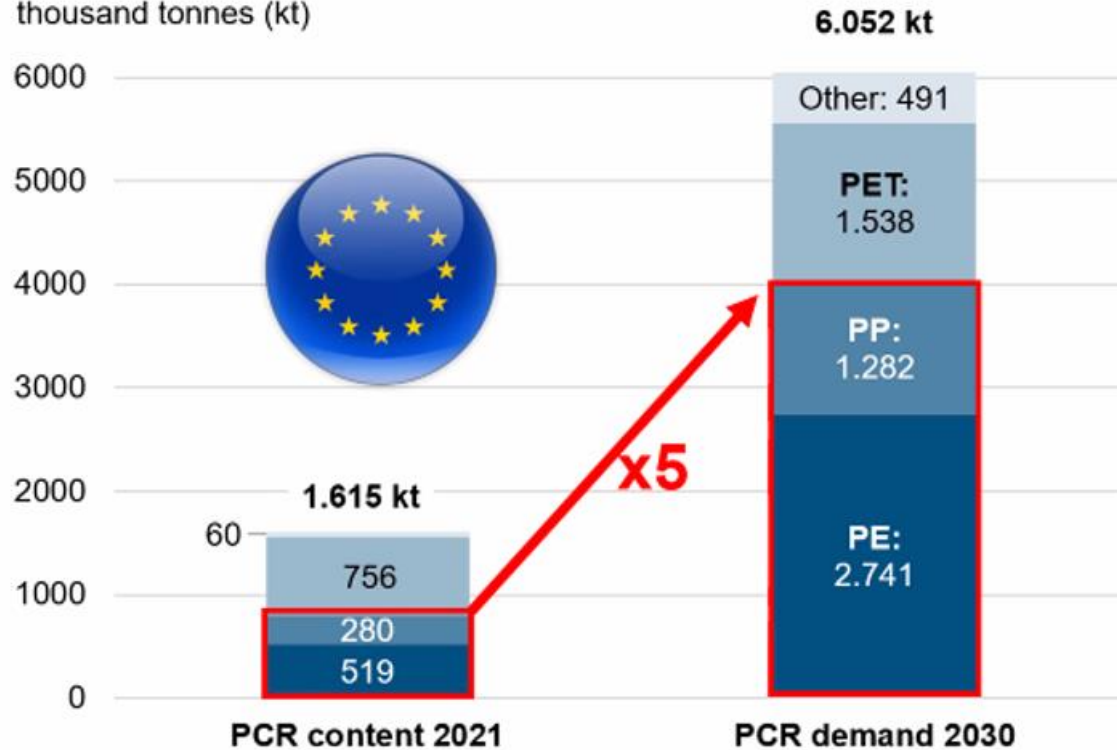
(2021)



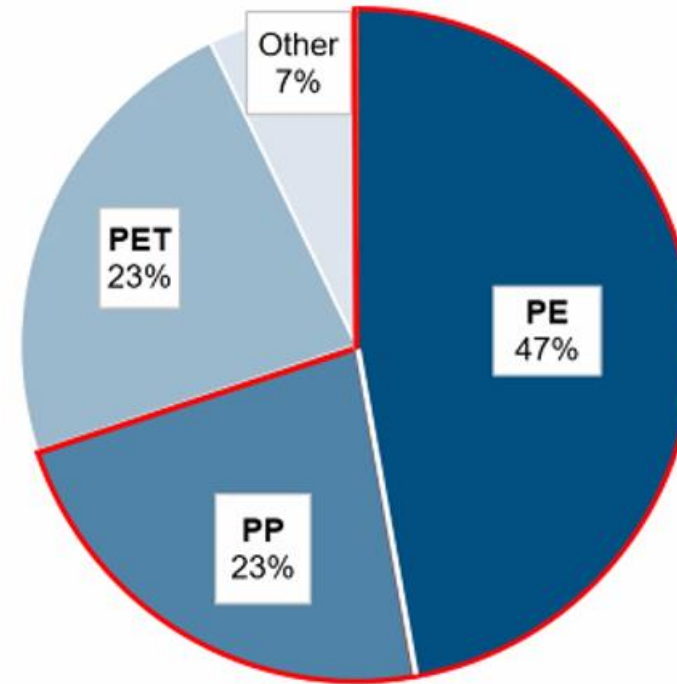
Amount of recycled polyolefins (PE, PP) would have to increase FIVEFOLD to meet the proposed 2030 recycled content quotas

Post-consumer recyclates (PCR) in packaging:

thousand tonnes (kt)



Polyolefins (PE, PP) are the most important polymers for packaging (polymer shares in packaging market 2021):



Source: Conversio Market & Strategy GmbH (2023). PCR demand 2030 is based on Commission's PPWR proposal for quotas.

Simplifying assumptions: 50% of total packaging volume are contact-sensitive packaging and no company uses more than required by quotas.

RECYCLASS: a European value chain initiative dedicated to enhancing the recyclability of plastic packaging

Self-assessment

Utilize the complimentary RecyClass online tool to evaluate the recyclability of plastic packaging

Guidelines

Gain insights into the compatibility of packaging elements with specific recycling streams through the RecyClass Design for Recycling guidelines.

Certifications

RecyClass has introduced a unified European certification methodology for assessing the recyclability, processes and traceability of recycled plastic packaging.



TARGET GROUPS OF RECYCLASS AUDITS



RECYCLABILITY

RECYCLED PLASTIC

RECYCLING PROCESS

RECYCLED PLASTICS TRACEABILITY

BRAND OWNERS
MANUFACTURERS OF FINAL
PRODUCT

CONVERTERS
RAW MATERIAL PRODUCERS

CONVERTERS
MANUFACTURERS OF
PACKAGING

RecyClass

MEMBERS AND SUPPORTERS

BRANDS



CONVERTERS



RAW MATERIAL PRODUCERS

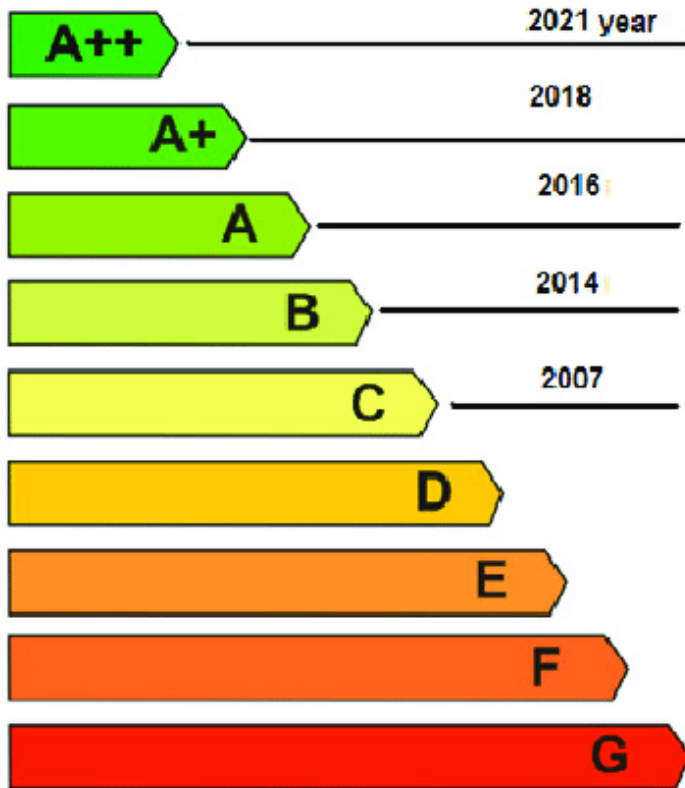


SUPPORTERS





RECYCABILITY CLASS EXAMPLE



Buildings



Appliances

A legend for plastic packaging recyclability classes. Each class is represented by a circular icon with a letter and a recycling symbol, followed by a description. The classes are: CLASS A (green), CLASS B (light green), CLASS C (yellow-green), CLASS D (orange), CLASS E (red-orange), and CLASS F (red).

- CLASS A**
The packaging does not pose any recyclability issues and the recycled plastics can potentially feed a closed-loop scheme to be used in the same quality application.
- CLASS B**
The packaging has some minor recyclability issues that slightly affect the quality of the recycled plastic generated. However, majority of recycled plastics from this packaging can still potentially feed a closed loop.
- CLASS C**
The packaging presents some recyclability issues that affect the quality of the recycled plastics or lead to material losses during recycling. In the first case the recycled plastic could be used in a cascade open-loop scheme, whereas in the latter case the plastic could potentially feed a closed loop scheme.
- CLASS D**
The packaging has significant design issues that highly affect its recyclability or imply large material losses. In both cases the recycled plastic can only be fed into low-value applications (i.e. the packaging will be downcycled).
- CLASS E**
The packaging has major design issues that jeopardize its recyclability or imply severe material losses. The packaging is not considered recyclable and can only be used in incineration with energy recovery.
- CLASS F**
The package is not recyclable at all, either because of fundamental design issues or a lack of specific infrastructure for collection, sorting and recycling in EU28+2.

Plastic packaging



DESIGN FOR RECYCLING GUIDELINES



Full compliance.



Limited compliance.




Low compliance



	Description
Criterion 1	Suitability
Criterion 2	PRE stream availability
Criterion 2a	Local collection
Criterion 2c	Local sorting/recycling infrastructures availability
Criterion 3	Recyclable plastic content
Criterion 4	<u>Sortability</u>
Criterion 5a	<u>DfR incompatibilities</u> (removable)
Criterion 5b	<u>DfR incompatibilities</u> (non-removable)
Criterion 6	Easy to Empty index
Criterion 7	REACH compliance
FINAL RESULT	



FINAL RESULTS = CLASS A AND 96,7%



96,7%

ABCDEF



DESIGN FOR RECYCLING GUIDELINES



Full compliance.



Limited compliance.



Low compliance



	Description
Criterion 1	Suitability
Criterion 2	PRE stream availability
Criterion 2a	Local collection
Criterion 2c	Local sorting/recycling infrastructures availability
Criterion 3	Recyclable plastic content
Criterion 4	<u>Sortability</u>
Criterion 5a	<u>DfR</u> incompatibilities (removable)
Criterion 5b	<u>DfR</u> incompatibilities (non-removable)
Criterion 6	Easy to Empty index
Criterion 7	REACH compliance
FINAL RESULT	



RecyClass

DESIGN FOR RECYCLING GUIDELINES

FULL COMPATIBILITY

Green column gathers the preferred design features, that guarantee the best recyclability and quality of the recycle.

Class A - B

LIMITED COMPATIBILITY

Yellow column lists the second choices for each packaging features, that have been tested, known, or supposed to slightly impact the recycling and/or the quality of the recycle.

Class B - C

LOW COMPATIBILITY

Red column classifies the detrimental and disqualifying features that should be avoided when designing a packaging, as strongly impacting the recycling and/or the quality of the recycle.

Class D - E - F



PET bottles (clear/light blue and colored)



PE films (colored and natural)



Clear PET trays



PP films (colored and natural)



HDPE containers & tubes (colored and transparent)



PS colored containers



PP containers & tubes (colored and transparent)



Crates and Pallets



EPS fish boxes



EPS white goods



TARGET GROUPS OF RECYCLASS AUDITS



RECYCLABILITY

RECYCLED PLASTIC

RECYCLING PROCESS

RECYCLED PLASTICS TRACEABILITY

BRAND OWNERS
MANUFACTURERS OF FINAL
PRODUCT

CONVERTERS
RAW MATERIAL PRODUCERS

CONVERTERS
MANUFACTURERS OF
PACKAGING

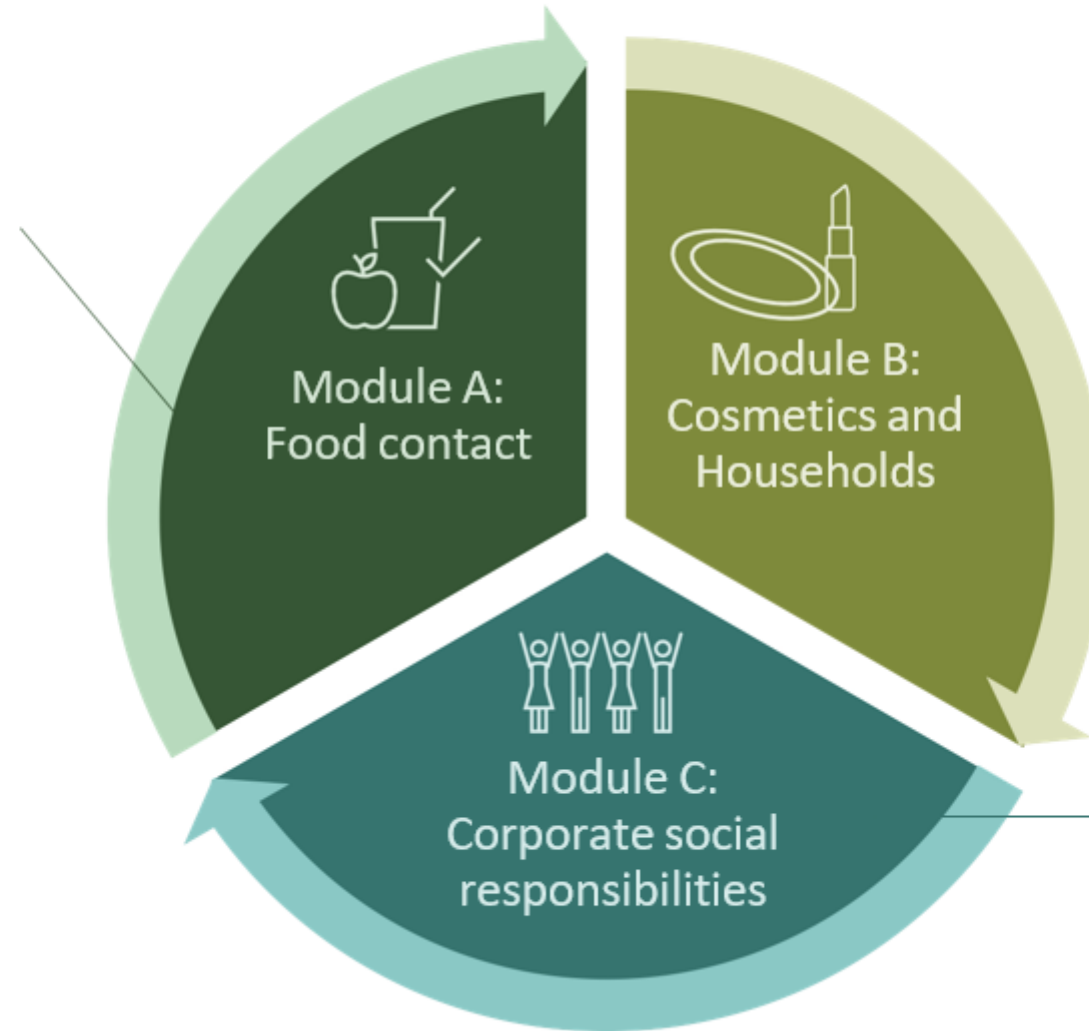
RecyClass

RECYCLED PLASTIC CERTIFICATIONS



ALIGNED WITH COMMISSION REGULATION (EU) 2022/1616:

- **Module A1** Pre-processing activities to make a suitable Plastic input for the Decontamination process.
- **Module A2** Decontamination from Plastic Input in order to make it suitable for contact with food.



Mandatory
for recyclers
outside EU

- Traceability according to **EN 15343:2007** - Plastics recycling **traceability** and assessment of conformity and recycled content.
- **Pre-consumer and post-consumer waste definitions** aligned with ISO 14021:2018.
- Scheme based on **segregation/controlled blending chain of custody** model described in **ISO 22095:2020**.
- Procedures aligned with **conformity assessment** as described in **ISO 17065**.





TARGET GROUPS OF RECYCLASS AUDITS



RECYCLABILITY

RECYCLED PLASTIC

RECYCLING PROCESS

RECYCLED PLASTICS TRACEABILITY

BRAND OWNERS
MANUFACTURERS OF FINAL
PRODUCT

CONVERTERS
RAW MATERIAL PRODUCERS

CONVERTERS
MANUFACTURERS OF
PACKAGING

RecyClass | AUDIT FOCUS



SECTION 1 - QUALITY SYSTEM REQUIREMENTS

Business registration, ISO 14000, ISO 9001, training of personnel, register of complaints, records system.



SECTION 2 - SUPPLIER EVALUATION

Identification of suppliers (batches can be linked to suppliers), input records during material procurement.



SECTION 3 - INPUT REQUIREMENTS

Purchase specifications, weights and dates of delivery are recorded.



SECTION 4 - STOCK MANAGEMENT

Stock identification, storage conditions, stock management system that records movement of stocks, stock checks (inspections at least once a year).



SECTION 5 - PRODUCTION PROCESS

Production statistics, records of input and output material, metrology of test equipment, mass balance calculation, production process records, traceability.



SECTION 6 - OUTPUT COMPOSITION

Output specifications, calculation of recycled content, plausibility check.



SECTION 7 - OUTPUT REQUIREMENTS

Output specifications, records of sales.





SECTION 8 - SUBCONTRACTING

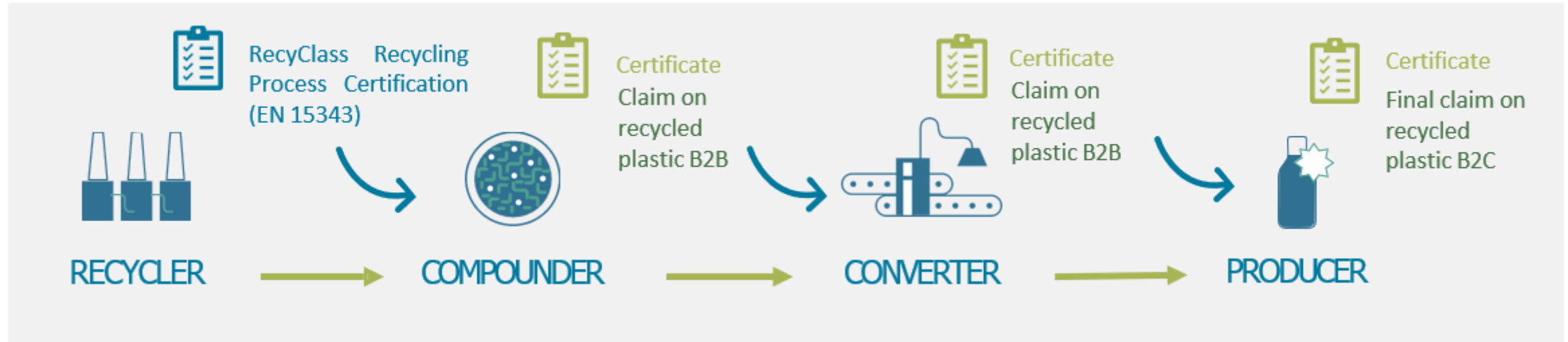
Control of subcontracted processing, subcontractor's certification, record of volumes.

RecyClass

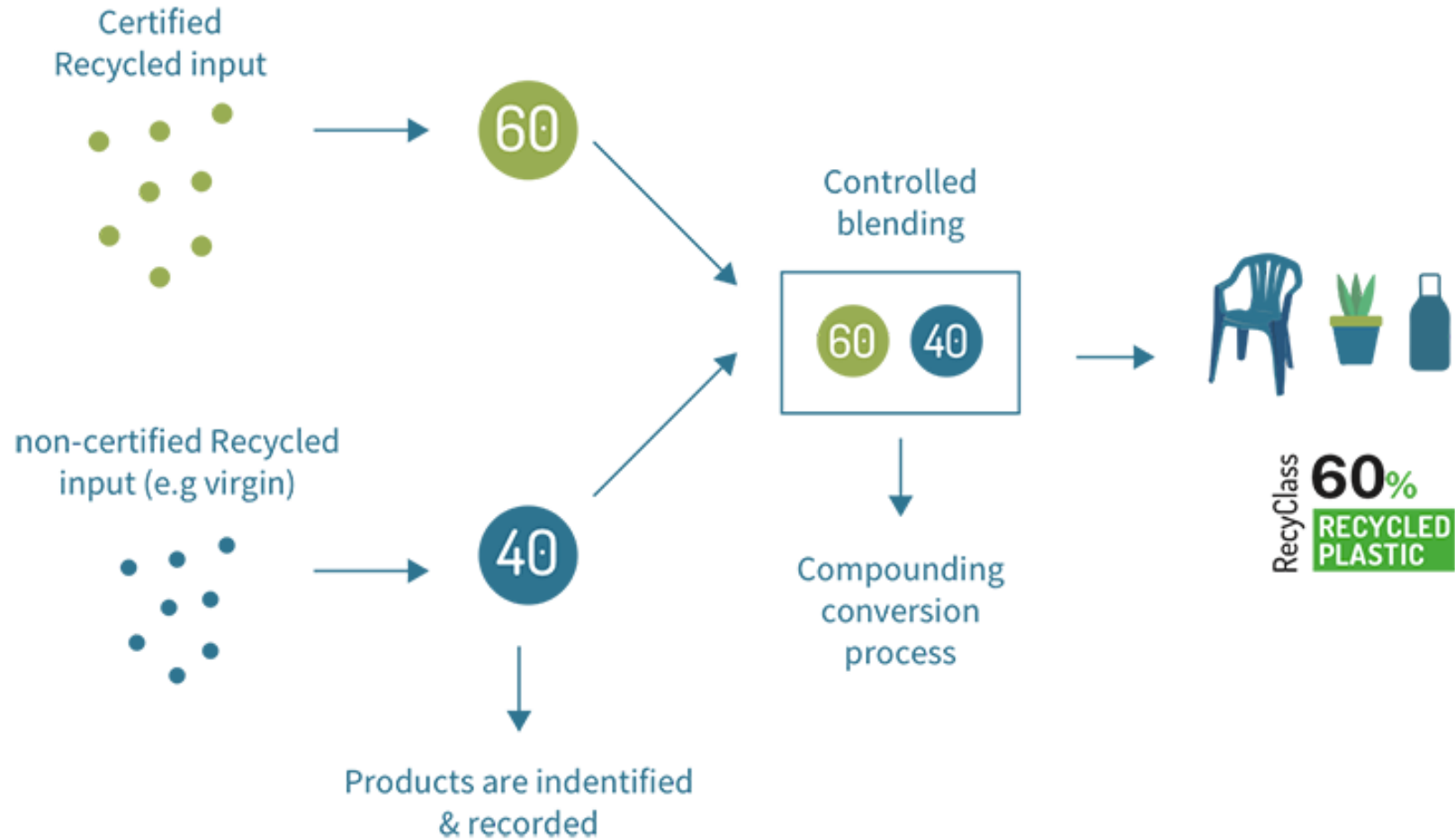
RECYCLASS RECYCLED PLASTICS TRACEABILITY CERTIFICATION



-  Focus on physical traceability. No free allocation of recycled content in products.
-  Focus on avoiding self-declaration of origin of waste.



RECYCLED CONTENT TRACEABILITY



WHY TO GET CERTIFIED?

- Taxonomy
- D , E , F classes eliminated by 2030
- Recycled material mandatory content comes with PPWD
- Transparency of process
- Possible restriction by retailers without certification
- Only 5 auditors for Baltic countries
- Get certified only by accredited companies



RECYCLABILITY ASSESSMENTS



- Recyclability Self-Assessment with the RecyClass **Online Tool**
- RecyClass Team support
- **Recyclability Certification**

RecyClass

BENEFITS & RESULTS

RECYCLING PROCESS CERTIFICATION

RecyClass
RECYCLING PROCESS CERTIFICATE

Name of the recycler: Name of the recycler

Address: Country: Registration office address: Address: Country:

The applicant recycling process and associated manufacturing systems have met the requirements of Recycling Process Audit Scheme version 1.0 (EN 15343:2007) and has the required procedures in place in order to ensure the traceability of recycled plastics produced from the plants of this certificate.

Certification compliant with EN 15343:2007.

Certification includes: e.g. general, for all types of waste; e.g. monitoring of recycled content; e.g. traceability levels 1, 2 or 3.

Process operations: e.g. sorting, liquid plastic waste; e.g. PET bottles.

Type and extent of audit: e.g. on-site, remote, final audit.

Recycled content: e.g. 100%.

Pre-consumer waste: separate by: 100%.

EN 15343:2007

ENAC

RecyClass
LIST OF CERTIFIED RECYCLED OUTPUTS

Recycled output	Recycled content by type (minimum)	Recycled content by brand (minimum)	Origin

EN 15343:2007

ENAC



BENEFITS

- Process/Product certification → Covers groups of products under 1 certificate;
- Reliability of traceability and origin of recycled plastics endorsed by RecyClass;
- Claims of % of recycled plastics in products;
- Exposure on the RecyClass website as a certified company.

RECYCLED PLASTICS TRACEABILITY CERTIFICATION

RecyClass
RECYCLED CONTENT TRACEABILITY CERTIFICATE

ENTER COMPANY

CERTIFY ADDRESS

The recycler is certified in accordance with the Audit Scheme 1.0 in the EN 15343:2007 and has the required procedures in place in order to ensure the traceability of recycled plastics incorporated in products listed in the attached Annex.

Type of products: Type of processes: operations.

EN 15343:2007

ENAC

RecyClass
LIST OF CERTIFIED PRODUCTS

Name of product/brand	Reference	Recycled Content (min/maximum)	Recycled Content (cert/estimated)
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%
Name of product/brand	Reference	% / %	%

EN 15343:2007

ENAC



15 CERTIFICATION BODIES

2 of them in Lithuania



RecyClass

RECYCLABILITY RATE CERTIFICATE

THIS CERTIFIES THAT
ZETA 600

PE/PP film packaging
RECYCLASS

LEGAL COMPANY NAME AND COMPANY ADDRESS

The product and equivalent products listed in Annex I were assessed and certified according to RecyClass Recyclability Methodology (version 2.1) and Design for Recycling Guidelines (Jan. 2022), hereby obtaining the following recyclability rate and class:

60

RECYCLABILITY

The value represents the proportion of material in the packaging that is recoverable and valuable for the recycling stream.



The certificate and its result are valid for:

Audit Report and Certificate Registration Code:
122-TEST-002

Date of issue of Certificate:
04/2023

Date of expiration of Certificate:
04/2026

*Validity conditions and terms of use may be found in the Audit Scheme documents.



CERTIFIED BY:

RIMANTAS DAMANSKIS

Title the auditor

INTECHCENTRAS

Arkija street 4, Vilnius

<https://recyclclass.eu/get-certified/recyclability/certification-bodies/>



THANK YOU!

Rimantas Damanskis

„RecyClass“ Auditor / Board Member of LINPRA
rimantas@damanskis.com