



Camera di Commercio
Molise



Sistema Nazionale
per la Protezione
dell'Ambiente



ARPAT
Agenzia regionale
per la protezione ambientale
della Toscana



SYMBI

Interreg Europe



European Union
European Regional
Development Fund

” How to stimulate secondary raw material markets”

**“Environmental labelling of products
to promote the circular economy”**

SIMONE RICOTTA

SNPA – ARPA Toscana/Italian Competent Body for Ecolabel EU

20/21 March 2018/ 3rd Interregional Workshop

The environmental labelling of products

The information on the characteristics of the products plays a fundamental role in making effective the ability of consumers (public and private) to direct the market towards products with better environmental performance.

Since the early 1980s, environmental labeling programs have proliferated.

The ISO technical standards distinguish three types of voluntary environmental labeling (ISO 14020 series):

- Type I environmental labelling (ISO 14024:2018)
- Self-declared environmental claims (Type II environmental labelling) (ISO 14021:2016)
- Type III environmental declarations (ISO 14025:2006)

The ISO 14020:2000 standard establishes the general principles.



Camera di Commercio
Molise



European Union
European Regional
Development Fund



Type I environmental labels

- they are of "**third party**" labels: verification required by a public or private body, national, regional or international, independent of the supplier, certifying compliance with certain **criteria**
- they are assigned to products that meet certain **environmental and performance criteria**



Camera di Commercio
Molise



European Union
European Regional
Development Fund



- the criteria are predetermined **for each product category** and are in the public domain;
- the criteria are defined considering the environmental aspects throughout the **product life cycle**, through an **open consultation** process with the interested parties.

The Type I environmental labeling programs have **the task of identifying** and promoting products of avant-garde environmental, for which the criteria are established on performances above the average level ("**excellent**" **products**).

Examples of ISO Type I labels:



Blauer Angel (Germany)



Nordic Swan (Denmark, Island, Finland, Sweden and Norway)



NF Environnement (France)



Umweltzeichen (Austria)



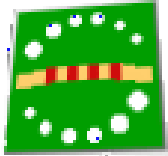
GOTS - Global Organic Textile Standard (international)



Camera di Commercio
Molise



European Union
European Regional
Development Fund



El Distintiu de garantia de qualitat ambiental
(Catalunya)



Milieukeur (The Netherlands)



Aenor Medio Ambiente (Spain)



EU Ecolabel (European Union)



TCO Certified



Camera di Commercio
Molise



European Union
European Regional
Development Fund



EU Ecolabel products and services:

Rinse-off cosmetic products
Absorbent hygiene products

All purpose cleaners and sanitary cleaners
Detergents for dishwashers
Industrial and institutional automatic dishwasher detergents
Hand dishwashing detergents
Laundry detergents
Industrial and institutional laundry detergents

Textile products
Footwear

Indoor and outdoor paints and varnishes





Camera di Commercio
Molise



European Union
European Regional
Development Fund



Imaging equipment
Personal, notebook and tablet computers
Televisions



Wooden floor coverings
Hard coverings

Furniture
Bed mattresses

Growing media, soil improvers and mulch

Heat pumps
Water-based heaters

Lubricants



Camera di Commercio
Molise



European Union
European Regional
Development Fund



Sanitary tapware
Flushing toilet and urinals

Converted paper
Copying and graphic
Newsprint paper
Printed Paper
Tissue paper

Campsite service
Tourist accommodation services



Commission Decision (EU) 2017/1217 of 23 June 2017 establishing the EU Ecolabel criteria for hard surface cleaning products

Criterion 5 – Packaging

(d) Design for recycling



Plastic packaging shall be designed to facilitate effective recycling by avoiding potential contaminants and incompatible materials that are known to impede separation or reprocessing or to reduce the quality of recyclate.

The label or sleeve, closure and, where applicable, barrier coatings shall not comprise, either singularly or in combination, the materials and components listed in Table 4.

Pump mechanisms (including sprays) are exempted from this requirement.

Packaging element	Excluded materials and components (*)
Label or sleeve	<ul style="list-style-type: none"> — PS label or sleeve in combination with a PET, PP or HDPE bottle — PVC label or sleeve in combination with a PET, PP or HDPE bottle — PETG label or sleeve in combination with a PET bottle — Any other plastic materials for sleeves/labels with a density $> 1 \text{ g/cm}^3$ used with a PET bottle — Any other plastic materials for sleeves/labels with a density $< 1 \text{ g/cm}^3$ used with a PP or HDPE bottle — Labels or sleeves that are metallised or are welded to a packaging body (in mould labelling)
Closure	<ul style="list-style-type: none"> — PS closure in combination a with a PET, HDPE or PP bottle — PVC closure in combination with a PET, PP or HDPE bottle — PETG closures or closure material with a density $> 1 \text{ g/cm}^3$ in combination with a PET bottle — Closures made of metal, glass or EVA which are not easily separable from the bottle — Closures made of silicone. Silicone closures with a density $< 1 \text{ g/cm}^3$ in combination with a PET bottle and silicone closures with a density $> 1 \text{ g/cm}^3$ in combination with PEHD or PP bottle are exempted. — Metallic foils or seals which remain fixed to the bottle or its closure after the product has been opened
Barrier coatings	Polyamide, functional polyolefins, metallised and light-blocking barriers

(*) EVA — Ethylene vinyl acetate, HDPE — High-density polyethylene, PET — Polyethylene terephthalate, PETG — Polyethylene terephthalate glycol-modified, PP — Polypropylene, PS — Polystyrene, PVC — Polyvinylchloride



Camera di Commercio
Molise



European Union
European Regional
Development Fund



Examples of Blauer Engel products criteria:

Recycled Paper

Recycled Paper (Stationery)

Recycled Cardboard (Stationery)

Fabrics from Recycled Plastics

Products made from Recycled Plastics



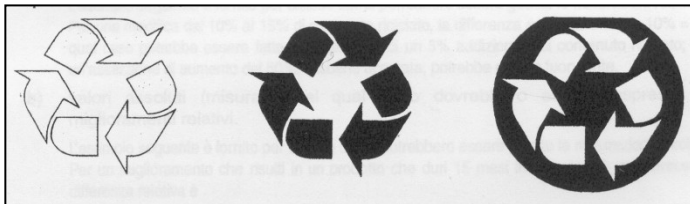
Self-declared environmental claims (Type II environmental labelling)

- they **should not be used vague statements** such as "safe for the environment", "friend of the environment", "friend of the earth", "non-polluting", "green", "friend of nature" and "friend of the ozone" should not be used not even claims to achieve "sustainability"
- they must be presented in such a way that they are understood to refer to the complete **product**, a component or **packaging**
- they must be proven and not **misleading**
- the content of the statement is the **responsibility of its user**, who must comply with **assessment and verification requirements**, and **must allow access to information** to all interested parties
- they **could be verified** by a third party verifier

The UNI EN ISO 14021 standard deals only with the use of a symbol:
the Mobius cycle

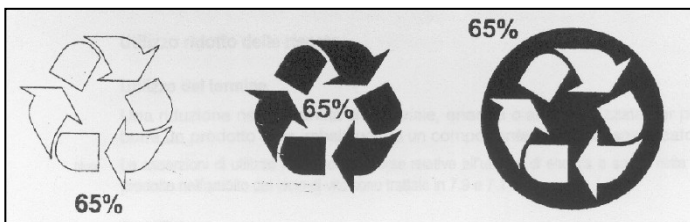
- ***recyclable***

if a symbol is used for recyclability claims, it must be the Mobius cycle (with no percentage value)



- ***recycled content***

if a symbol is used for an assertion of "recycled content", it must be the Mobius cycle accompanied by a percentage value referred to as "X%" where X expresses the ratio between the mass of recycled material and the mass of the product.





Camera di Commercio
Molise



European Union
European Regional
Development Fund



The terms selected by the UNI EN ISO 14021: 2001 standard and commonly used in ISO Type II labels:

Compostable

Degradable

Designed for disassembly

Product with extended life span

Energy recovered

Recyclable

Recycled content

Reduced energy consumption

Reduced use of resources

Reduced water consumption

Reusable and refillable

Waste reduction

For each of the terms the standard contains indications for the correct use of the term and the evaluation methodology



Type III environmental declarations

(called "Environmental Product Declaration", EPD)

- they are a **set of quantified information** related to the product life cycle, provided by the manufacturer of the product itself, using systematized and critically verified data, presented as a series of parameter categories
- provide information **based on an LCA study of the product** in order to allow a buyer to **compare the products**
- they are mainly addressed to the "**business to business**" market, but the use of such declarations for "business to consumer" is not precluded



Camera di Commercio
Molise



European Union
European Regional
Development Fund



- they are "**non-evaluative**" tools: the data and information contained are not subject to evaluation criteria or preferability
- they are **verified and validated** in order to guarantee the completeness, completeness and truthfulness of the information contained in them
- they can be developed **for all products** regardless of their use or positioning in the production chain



Camera di Commercio
Molise



European Union
European Regional
Development Fund



Examples of EPD programs:



International EPD System



Ecoleaf (Japan)



EDP (Korea)

epd-norge

EPD-Norge (Norway)

Sector environmental labels

Some environmental labels do not fall within the ISO 14020 series classification:



FSC (Forest Stewardship Council)



PEFC (Programme for the Endorsement of Forest Certification schemes)



Oeko-Tex

Some of these sector environmental labels regards recycled content of the products



FSC Recycled



PEFC Recycled

Environmental labelling programs related to the content of recycled materials of products



ReMade in Italy



Plastica Seconda Vita (PSV)



Recycled Claim Standard (RCS)



Global Recycled Standard (GRS)



Camera di Commercio
Molise



European Union
European Regional
Development Fund



ReMade in Italy

ReMade in Italy aims to **verify the recycled content in a product**, made with any material and also with mixed materials.

The **company** must put in place an **internal system** of organizational, documentary and process evidences such as to allow the **third certification body** to verify the process in all its phases and settle the exact quantity of **the % of recycled in the product / material**.

The certification establishes the **requirements for the traceability** of production phases and **material flows**, starting from the verification of the origin of incoming raw materials, up to the certified finished product.

L'ASSOCIAZIONE

IL GPP

LA CERTIFICAZIONE

IL CATALOGO REMADE

DOCUMENTI

NEWS & MEDIA

EDILIZIA

STRADE

ARREDO URBANO

ARREDO DI INTERNI

TESSILE

OLI MINERALI

IMBALLAGGI

ALTRI PRODOTTI

Altri prodotti



FOGLIO IN PET RICICLATO

[SU Alisea](#)

Con un materiale derivante dal riciclo delle bottiglie di plastica, Alisea realizza svariati oggetti per il mondo della Comunicazione.

[SCHEDA COMPLETA](#)

[CERTIFICATO](#)



CATEGORIE

EDILIZIA

STRADE

ARREDO

ARREDO

OLI M

TESSILE

The environmental label highlights the environmental benefits of recycled products:

- % content of recycled material
- traceability of recycled materials
- reduction of energy consumption
- containment of CO2 emissions
- other environmental information

*"One good practice is the **Remade in Italy** accredited certification scheme specifically aimed at the verification of recycled content in a product"*

(The EU Environmental Implementation Review . Country Report: Italy, 2017)

NOME PRODOTTO

Certificazione sul contenuto di materiale riciclato



AZIENDA
RII-MA0005-14

> 90%	A+	100%	A+
> 60% - 90%	A		
> 30% - 60%	B		
≥ 10% - 30%	C		

tipologia materiale riciclato	gomma
-------------------------------	-------



Dati non oggetto di certificazione
a cura di Remade in Italy

riduzione dei consumi energetici dal riciclo (kwh/kg)	----
riduzione delle emissioni climalteranti dal riciclo (gr co ₂ eq/kg)	----
altre certificazioni ambientali	

www.remadeinitaly.it

Plastica Seconda Vita (PSV)

It certifies the origin of the plastic materials used in the production of the certified product or the destination of the certified product



PSV from recycling: 30% - 100% of polymers derived from waste from separate waste or other circuits post-consumer



PSV from industrial waste: 30% - 100% of polymers derived from industrial waste



PSV eco mix: 30% - 100% of polymers derived from waste from separate waste and of industrial origin



PSV food: for products intended for contact with food, in which recycled plastic (30% - 100% plastic pre/consumption or post/consumption) is used behind a functional barrier



PSV bag: for "reusable" bags.
Minimum recycled content permitted:
≥ 35% bags for food distribution network
≥ 15% bags for non-food distribution network



Camera di Commercio
Molise



European Union
European Regional
Development Fund



Global Recycled Standard (GRS)

(Ownership: Textile Exchange)

The Global Recycled Standard (GRS) is an international, voluntary, full product standard that sets requirements for **third-party** certification of Recycled Content, **chain of custody, social and environmental practices, and chemical restrictions**. The goal of the GRS is to increase use of Recycled materials in products and reduce/eliminate the harm caused by its production.

The Global Recycled Standard is intended for use with any product that contains **at least 20% Recycled Material**. **Each stage of production is required to be certified, beginning at the recycling stage and ending at the last seller in the final business-to-business transaction**. Material Collection and Material Concentration sites are subject to self-declaration, document collection, and on-site visit.



Camera di Commercio
Molise



Recycled Claim Standard (RCS)

(Ownership: Textile Exchange)

The *Recycled Claim Standard* (RCS) is an international, voluntary standard that sets requirements for **third-party certification** of **Recycled input and chain of custody**. The goal of the RCS is to increase the use of Recycled materials.

The Recycled Claim Standard is intended for use with any product that contains **at least 5% Recycled Material**. **Each stage of production is required to be certified, beginning at the recycling stage and ending at the last seller in the final business-to-business transaction**. Material Collection and Material Concentration sites are subject to self-declaration, document collection, and on-site visits.



Examples of the use of environmental product labels in green public procurement practices

Italian “**Minimum Environmental Criteria**” (MEC) for **buildings** (Decree of the Minister of the Environment 12th October 2017)

2.4.1.2 Recovered or recycled material

*The content of **recovered material or recycled material** in the materials used for the building, even considering different percentages for each material must be **at least 15%** by weight estimated on the total of all the materials used. ... omissis*

Verification:** the designer must provide the **list of materials** made, even partially, of recovered or recycled materials and their weight due to the total weight of the materials used for the building. The percentage of recycled material must be **demonstrated by one** of the following **options:



Camera di Commercio
Molise



European Union
European Regional
Development Fund



- an **ISO Type III environmental product declaration III (EPD)**, in compliance with the UNI EN 15804 and ISO 14025 standards, as EPDIItaly or equivalent;
- a **product certification** issued by a conformity assessment body that certifies the recycled content through the explanation of the mass balance, such as **ReMade in Italy, Plastica Seconda Vita** or equivalent;
- a **product certification** issued by a conformity assessment body that certifies the recycled content through the mass balance statement consisting in the **verification of a self-declared environmental claims (ISO Type II)**, in compliance with the **ISO 14021** standard.



Conclusions

a) the environmental product labels are **moving towards** the integration of the **circular economy** among the awarding criteria: the market is doing its job.

b) the need for **environmental certification schemes for secondary raw materials**, ie business-to-business environmental certification schemes

c) **verified ISO Type II** self-declared environmental claims and **ISO Type III** environmental product declarations, as well as some specialized labels are, for now, the labelling systems that could be used for the development of the secondary raw material markets



Sistema Nazionale
per la Protezione
dell'Ambiente



ARPAT

Agenzia regionale
per la protezione ambientale
della Toscana



SYMBI

Interreg Europe



European Union
European Regional
Development Fund

Thanks for the attention

simone.ricotta@arpat.toscana.it
+39 055 3206336



Camera di Commercio
Molise

