

DESIGN FOR RECYCLING GUIDELINES FOR PET THERMOFORMED TRAYS CLEAR TRANSPARENT TO BE RECYCLED EVEN IN FOOD APPLICATIONS				
	YES	CONDITIONAL	NO	ASSESSING PROTOCOLS
	Full compatibility – materials that passed the testing protocols with no negative impact OR materials that have not been tested (yet), but are known to be acceptable in PET recycling	Limited compatibility – materials that passed the testing protocols if certain conditions are met OR materials that have not been tested (yet), but pose a low risk of interfering with PET recycling	Low compatibility – materials that failed the testing protocols OR materials that have not been tested (yet), but pose a high risk of interfering with PET recycling	All packaging should be tested according to the Petcore Europe Guidelines and PET trays Recycling protocol, evaluated by RECYCLASS.
Packaging	PET		PLA; PVC; PS; PETG; Other opaque and color material; any PET based multi-layer material (PET/PE, PET/PETG); Expanded PET	
Size				
Colors	transparent clear; transparent light blue		Metallic	
Barrier	None ; PET based oxygen Barriers or Scavenger with no yellowness effects after EPBP oven test.	PET based oxygen Barriers or Scavenger with limited yellowness effects after EPBP oven test	EVOH; PA; any other barrier; any other oxygen scavenger	EPBP oven test
Additives	Silicone surface coating (on coating area); Antiblocking masterbatch; None of them should affect clarity	Any other additive (UV stabilisers; AA blockers; optical brighteners; antiblocking; anti-stat agents; anti-fogging (on coating area)) With Limited effect on clarity to be measured	Bio/Oxo/Photodegradable additives; Nanocomposites	
UNPRINTED Lidding films - Closure systems (with glue not harming the recycling process)	PET; OR Floating combination of plastics with density < 0,95 g/cm ³ ; NO glue residuals; If no PET, no lidding film residual on the tray. SiOx, AluOx plasma for barrier.		any other sinking film with density > 1 g/cm ³ (to be proven with sink/float test)	EPBP sink/float test. EPBP glue removal test. EPBP oven test
PRINTED Lidding films - Closure systems (with glue not harming the recycling process)	NO PRINTING PREFERRED. OR plastics/combination of floating plastics with density < 0,95 g/cm ³ ; NO glue residuals; foamed PET based films where foamed structure is not getting destroyed @ 90°C; If no PET, no lidding film residual on the tray. SiOx and AluOx plasma for barrier		any other film	EPBP sink/float test EPBP glue removal test EPBP oven test
Labels (with adhesive not harming the recycling process - see labels adhesive section)	NO LABEL PREFERRED. Plastic labels where label has a density < 1 g/cm ³ in the more heavily printed and adhesive area	BPA-Free Paper labels not loosing fibers (pulping) and floating	Plastic labels where label has a density > 1 g/cm ³ in the more heavily printed and adhesive area - Paper labels loosing fibers (pulping) - Paper containing BPA - non floating paper labels	EPBP sink/float test
Labels Adhesive	adhesives with 100% removing ratio and no adhesive residuals on flakes @ 70°C testing temperature	adhesives with 100% removing ratio and no adhesive residuals on flakes @ 85°C testing temperature	all other adhesives	Petcore Europe - PET thermoforms WG - adhesive removal on trays protocol
Adhesives on parts different than lidding films and labels	Water or alkali soluble in 60-80°C.		any other adhesive	EPBP glue removal test
Inks	Non toxic, follow EUPIA Guidelines		Inks that bleed; toxic or hazardous inks	
Direct Printing	Laser marked for trazability (production or expiry date)		Any other direct printing	
Other Components	NO other components Preferred	Inserts in HDPE / LDPE / PP, Soaker pads, bubble pads and paper & carboard - all inserts should be completely removable and leave no traces	PVC / PS / EPS / PU / PA (Nylon); PC / PMMA Thermoset plastics / metals; non compliant soaker pads	

This work is published by PETCORE Europe with experts in the plastics packaging and recycling industry. The information contained in this document is **for general guidance only**. Any details given are intended as a general recommendation based on the best of our knowledge at the time of publication. It does not necessarily guarantee compliance with the different recycling schemes. This is by no means an exhaustive list. Users are therefore advised to make their own enquiries with Petcore Europe - Thermoforms Working Group, local recyclers or recycling organisations to check for specific and up-to-date information.

It is important to note that this is a **living or dynamic document** which will be continually edited, updated and expanded by our panel of experts as more information becomes available. This means that a certain product and/or material classification may change in future. Users are therefore advised to check the website for the latest information.

We value your **feedback** because it will help us to develop this publication even more and to make it a useful tool for you and other actors in the PET value chain. We appreciate you taking the time to let us know what you think about Design for Recycling Guidelines for PET Thermoforming Trays, so please send your comments and/or additional information to Petcore Europe (www.petcore-europe.org).

In addition to the clear transparent tray guidelines, Petcore Europe is elaborating guidelines for coloured and multi-layer trays:

1. For coloured trays the DJR guidelines are being elaborated and will be ready by October 2020.
2. For multi-layer trays our objective is to have the DJR guidelines ready by January 2021.