

Plastic Bottle Recycling

There are about 50 different types of plastic, the most common and easily recycled being plastic bottles. In the near future it is hoped the UK will have comprehensive infrastructure for the collection, sorting and reprocessing of other types of plastic, such as trays, tubs and films.

The Recycling Journey

Stage 1:

You put your plastic bottles into the appropriate recycling container, or in bring banks, and these are then collected from your kerbside or local recycling centres/points.

Stage 2:

The plastic is then taken to a sorting facility where it is baled and taken to a processing facility.

Stage 3:

At the processing facility infra-red technology is used to sort the mixed bottle into their separate types – High Density Polyethylene (HDPE) or Polyethylene Terephthalate (PET) – and also their component colours.

Stage 4:

The bottles are then shredded into either plastic flakes (PET) or granules (HDPE) and density separation techniques are employed to clean the flakes/granules. They are then batched and made ready for further processing.

Stage 5:

Flakes and granules are then melted and processed with various techniques and returned to the manufacturers of plastic bottles who make new bottles before selling them to supermarkets, where you buy them and start the process again.

Did you know?

- One tonne of plastic is equivalent to 20,000 two-litre drinks bottles.
- The energy saved by recycling a single plastic bottle is enough to power a 60-watt bulb for six hours.
- It is estimated that 4% of the world's annual oil production is used for producing plastic.
- It takes only 25 two-litre plastic bottles to make an adult fleece jacket.

