

Update on Australian plastics flows and trends

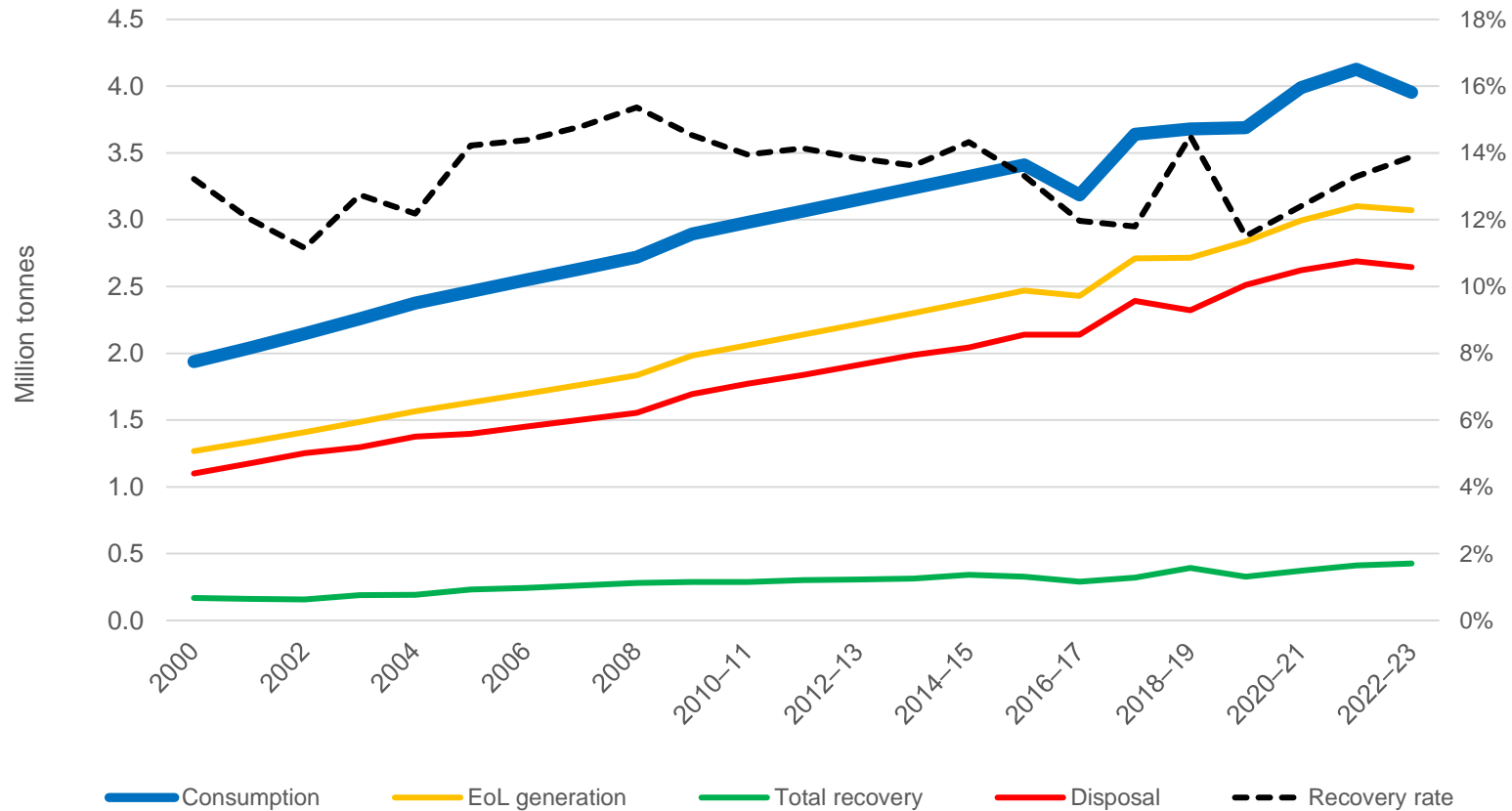
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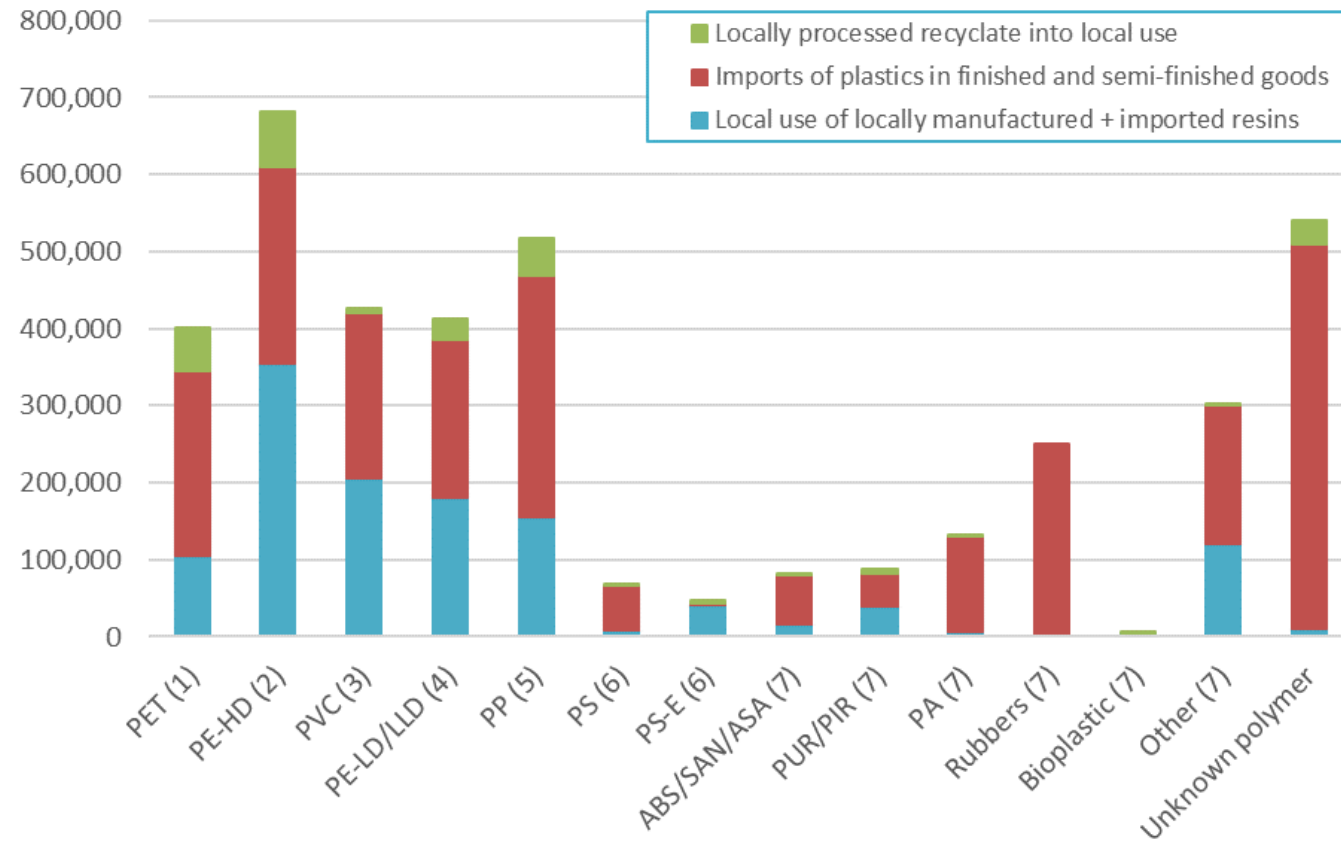


Australian plastics consumption and recovery 2000 to 2022–23



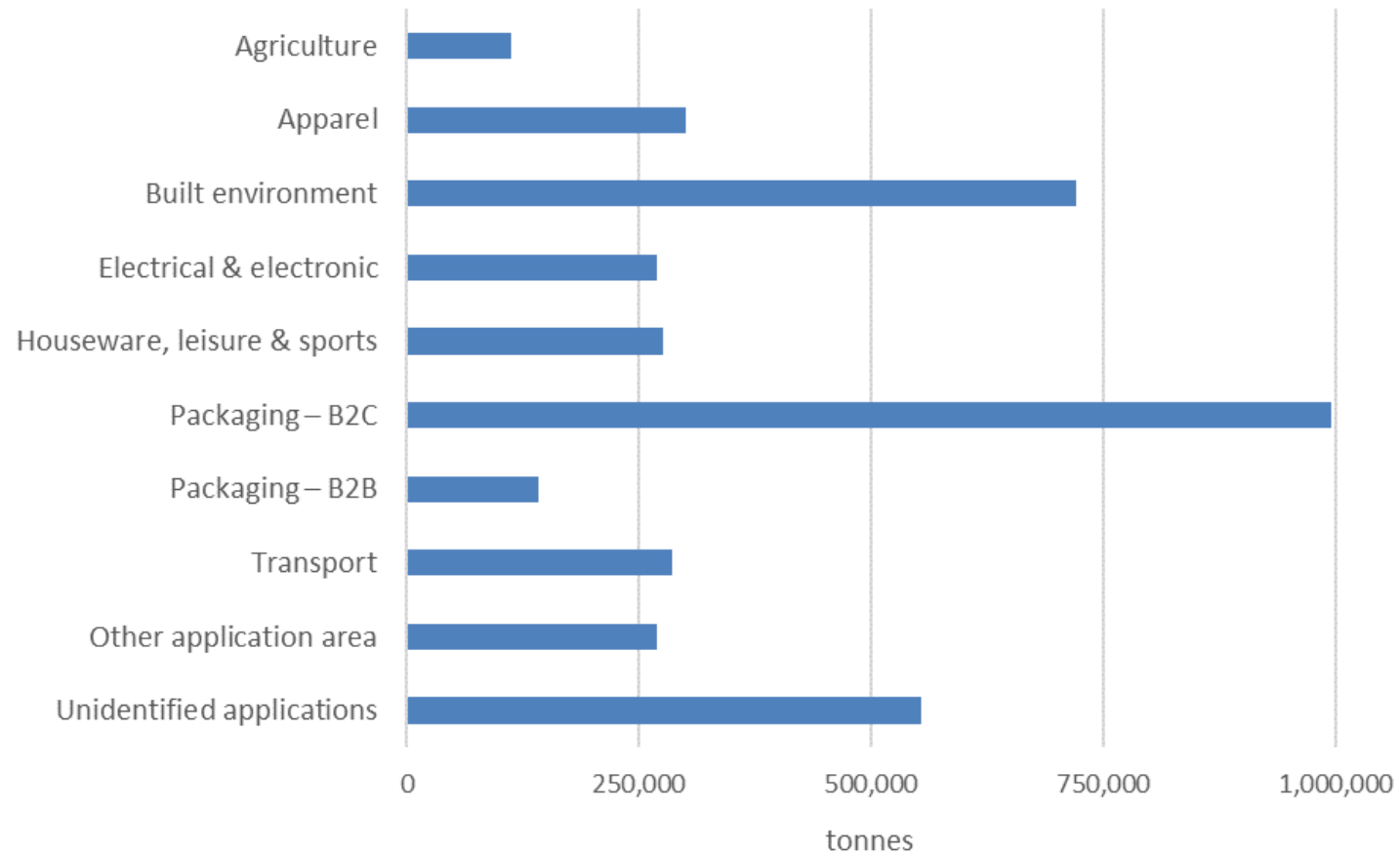
- In 2000 – 1.9 million tonnes consumption with 13% recovery rate.
- In 2023 – 4.0 million tonnes consumption with 14% recovery rate.
- Since 2017–18 – 2.5% 5-yr CAGR growth rate for EoL generation / 5.9% for recovery.

Plastics consumption by polymer type and source in 2022–23



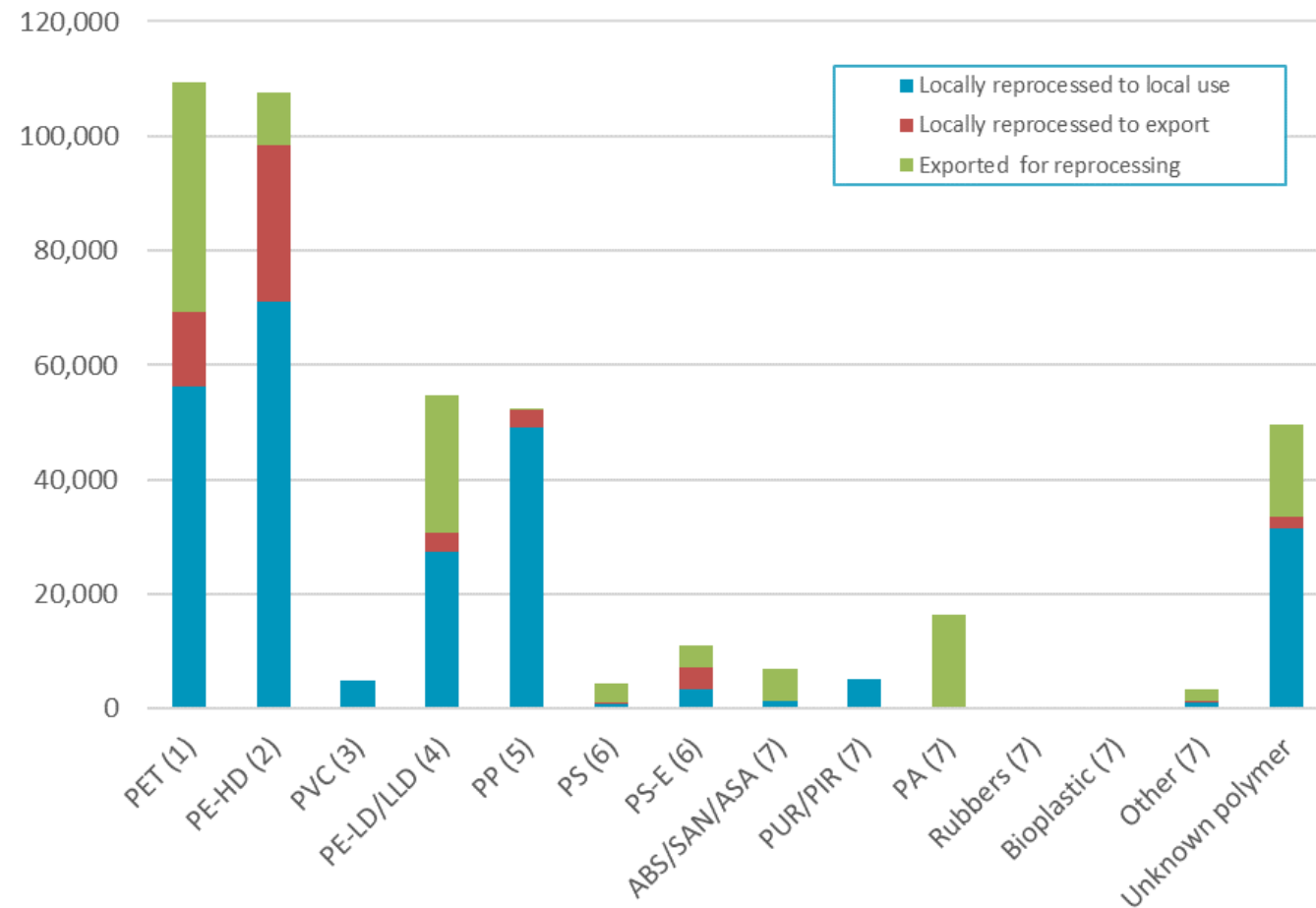
- 17% HDPE | 11% LDPE | 13% PP (total polyolefins 41%). Slowly growing share.
- 11% PVC | 10% PET | 3% PS.
- 38% locally manufactured | 62% imported in finished or semi-finished goods.

Plastics consumption by application area in 2022–23



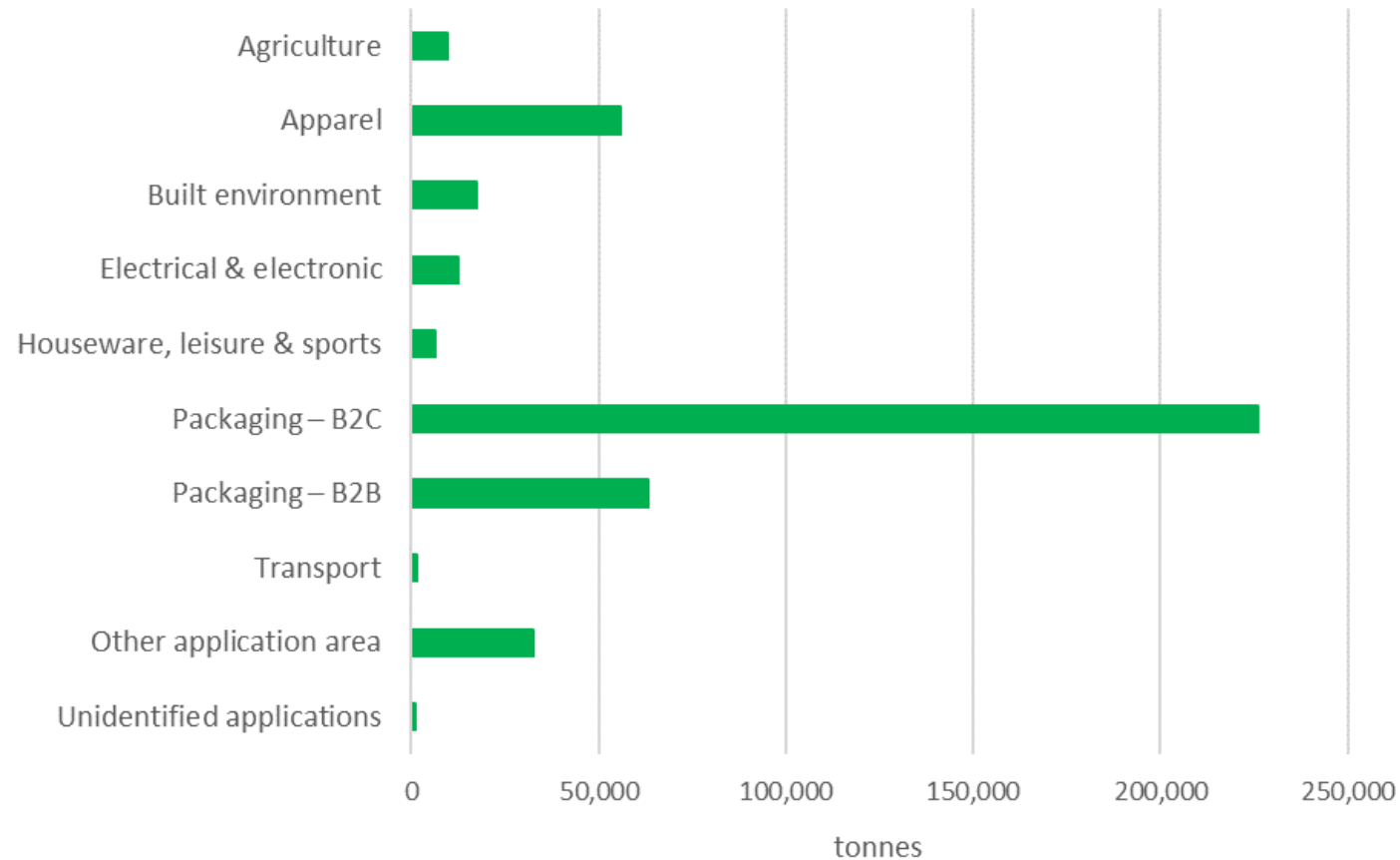
- 25% B2C and 4% B2B packaging (total 29%).
- 18% built environment.
- 8% into apparel.

Plastics recovery by polymer type and destination in 2022–23



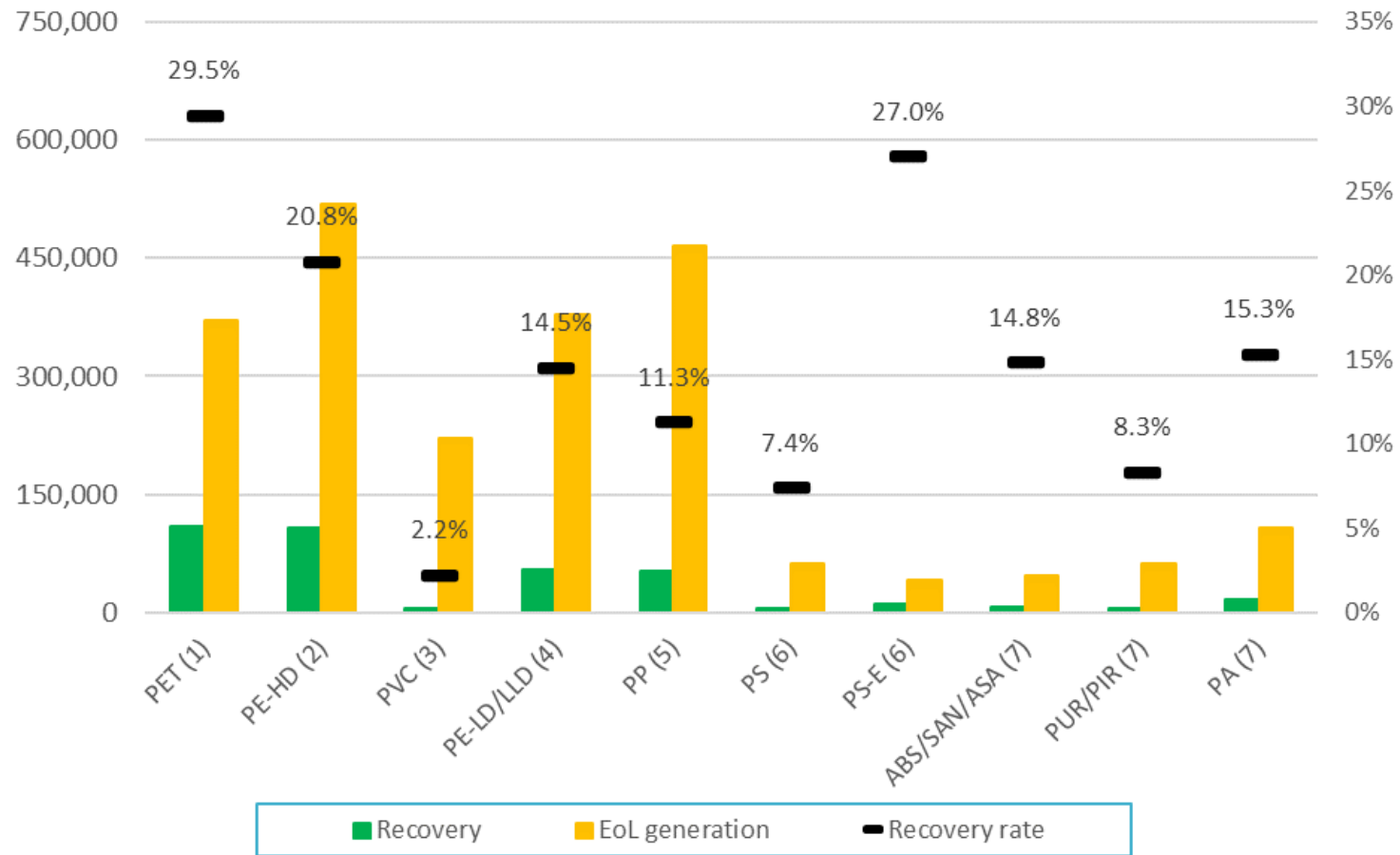
- 25% HPDE | 13% LDPE | 13% PP (total polyolefins 50%).
- 26% PET | 4% PS.
- 72% locally reprocessed | 28% exported for reprocessing or reuse (clothing).

Plastics recovery by application area in 2022–23



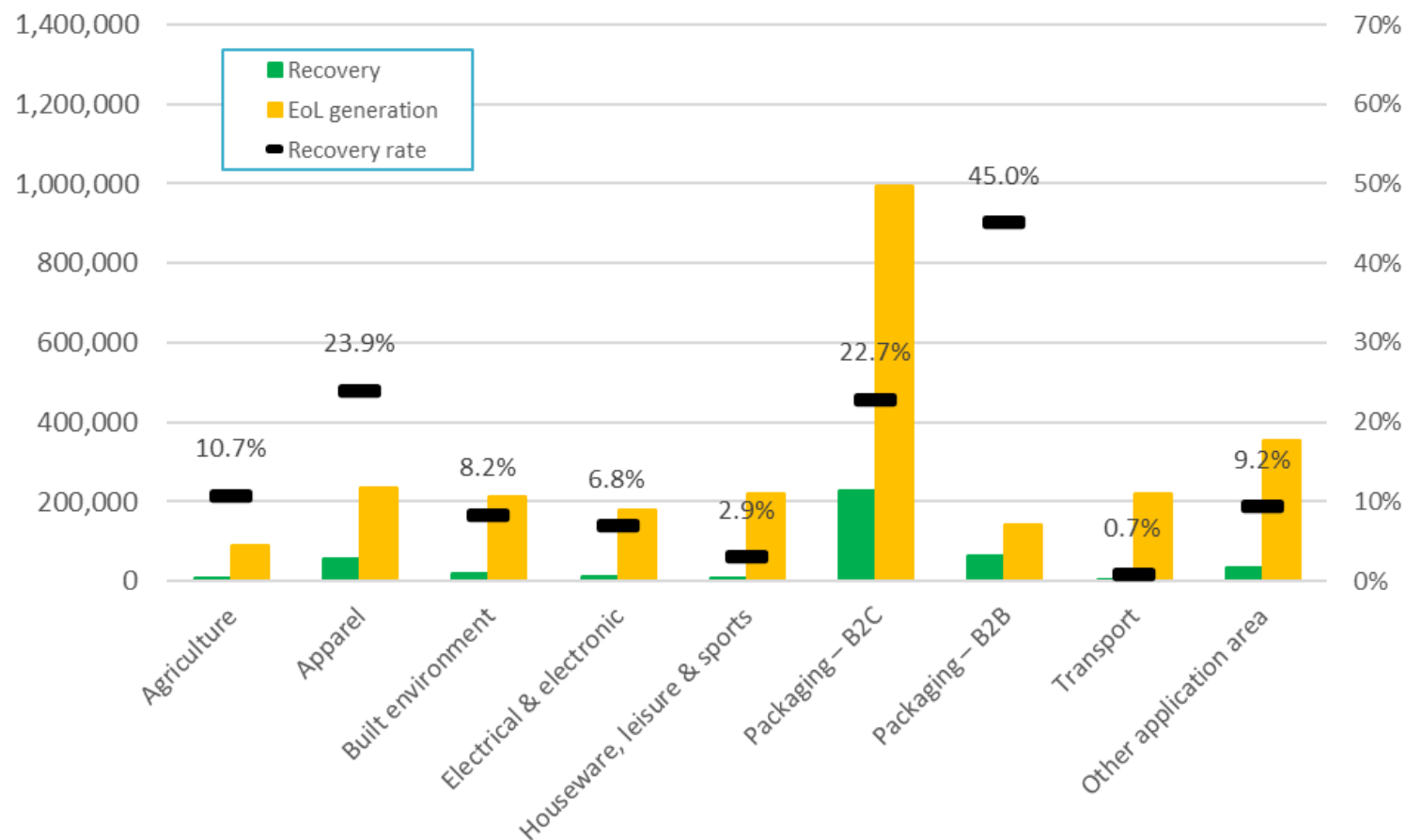
- Recovery is 53% B2C and 15% B2B packaging (total 68%).
- 13% apparel (which includes reuse overseas).
- Only 19% of recovery is from all other applications.

Plastics recovery rates by polymer type in 2022–23



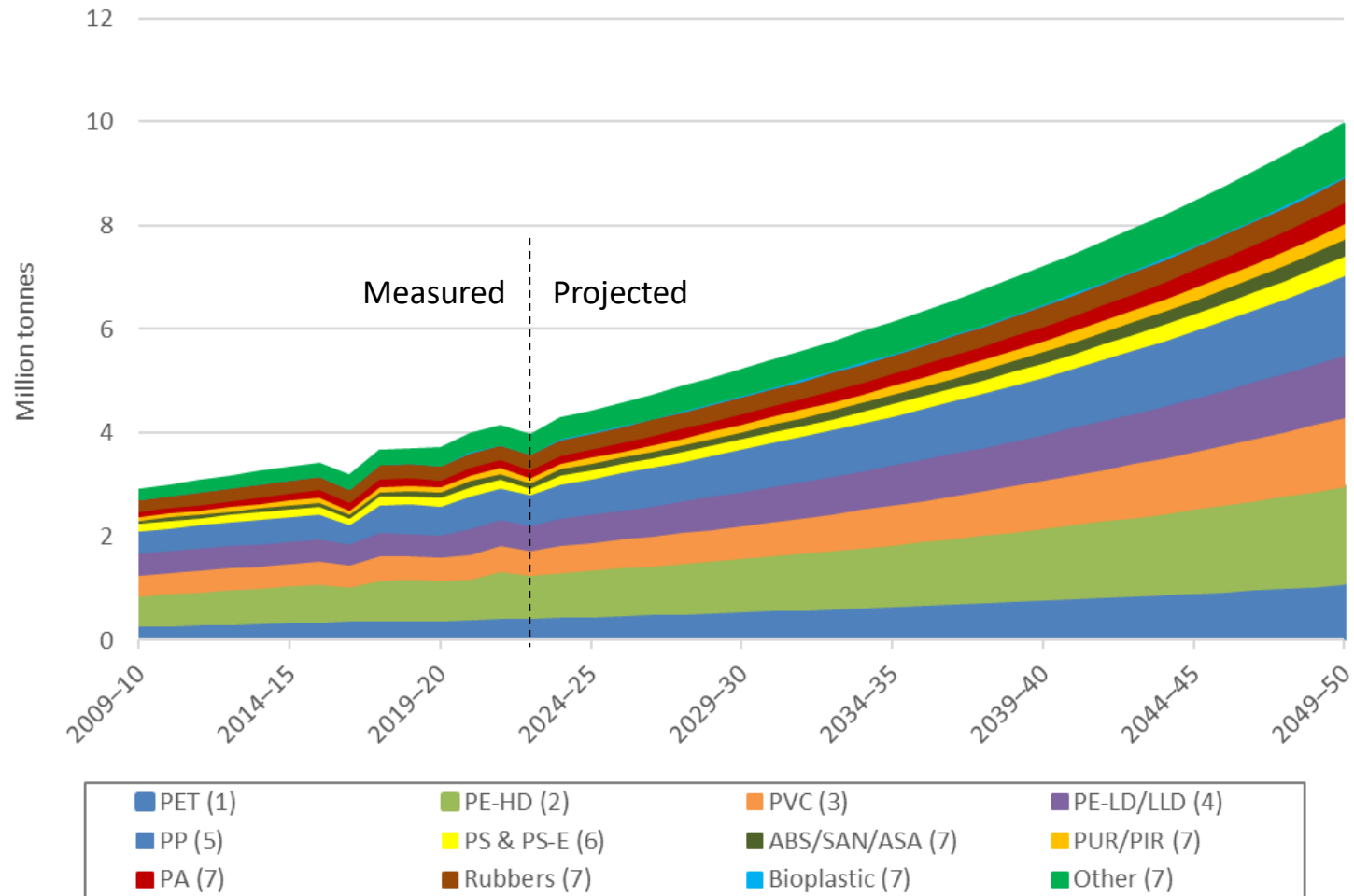
- Highest recovery rates for PET at 30% | HDPE at 21% | LDPE at 15%.
- Lowest recovery rates for PVC at 2% | PS at 7% | 'Other' at 2% (not shown).

Plastics recovery rates by application in 2022–23



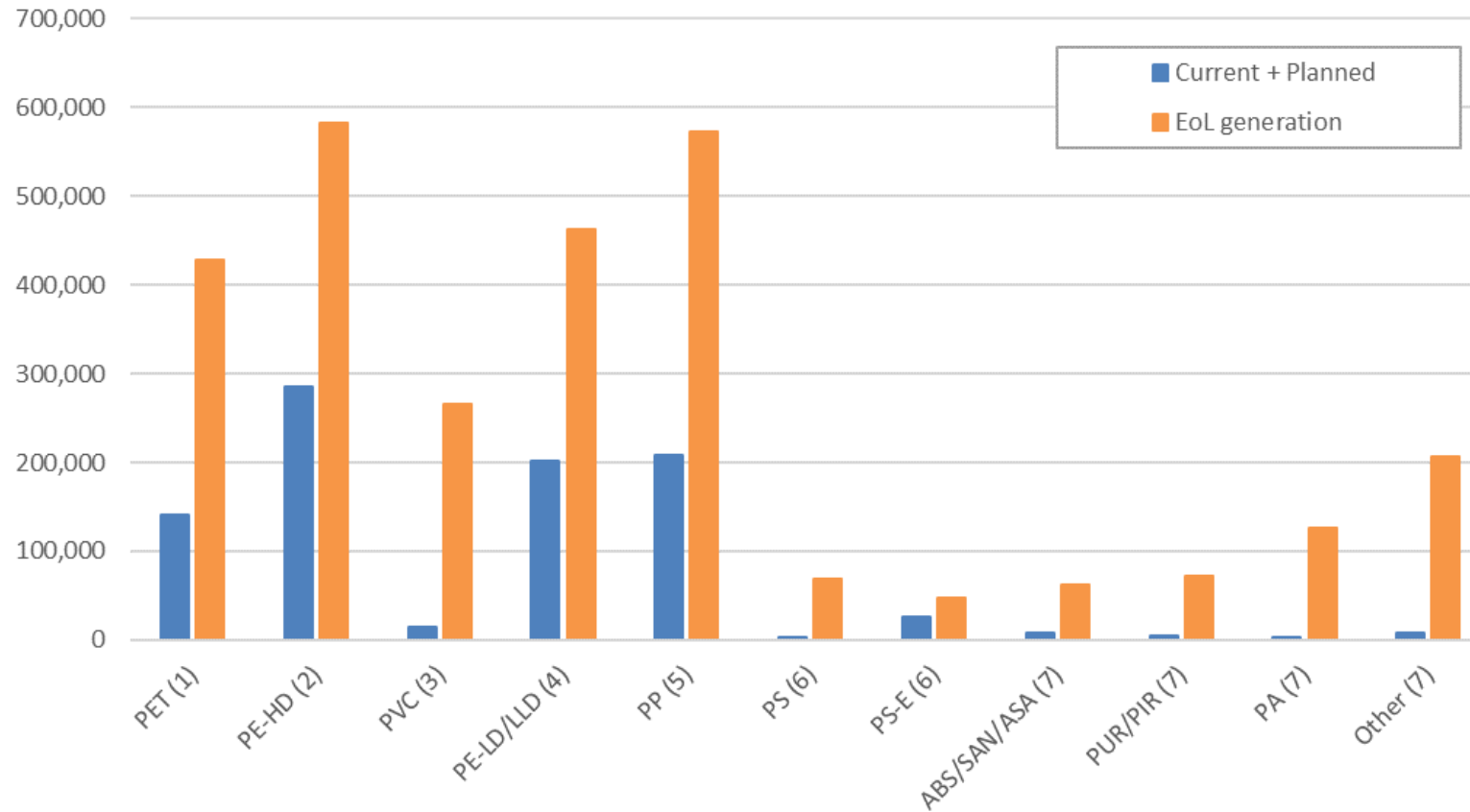
- The packaging recovery rate (B2C and B2B) is 26% (27% in 2021–22).
- The non-packaging recovery rate is 7% (6% in 2021–22).

Plastics consumption to 2049–50 by polymer type



- Projected consumption in 2049–50 of 10.0 million tonnes (150% increase).
- Per capita consumption in 2009–10, 2022–23 and 2049–50 of 131 kg, 148 kg and 285 kg respectively.

Reprocessing capacity relative to EoL generation by 2028



- Total current + planned recycling capacity of ~1.0 Mt/yr by 2028.
- New capacity to 2028 is around 400 kt/yr, an increase of 70–80% from end 2023 CY.
- Total EoL generation of 3.7 million tonnes in 2028.

Final comments

- The recovery rate of plastics in Australia has been slowly trending up over the last few years.
- Over the next 4–5 years this trend will possibly continue – but will mostly be driven by packaging plastics recovery.
- Growth in the EoL generation of plastics is approximately 600–700 kt every 5 years out to 2050.
- 1 million tonnes of new reprocessing capacity is required every 5 years, to approximately equal EoL generation by 2050 (assuming consumption growth remains steady).

