BASIC TECHNIQUES OF RECYCLING MATERIALS

Collecting

- container
- street
- other sources
- Germany:
  - 88% Container, 9% collecting on street, 3% other resources

Sorting

- By hand
- machine sorting:
  - are being researched but are not available in the foreseeable future

Recycling

- 2nd Hand
- Mechanical recycling
  - products are downgraded
- Chemical fibre separation
  - elaborate processes elaborate processes

Problems of recycling

- High material diversity
- Difficult to determine the composition of fibres
- Thus composites cannot be separated technologically or separation is not economical

Innovative recycling techniques

- new microcapsule system
- „designs for recycling“
- Enzymatic fibre recycling
- Viscose filament yarn from recycled cotton
- Hyperspectral NIR systems
- Wear2Wear