

13. Waste

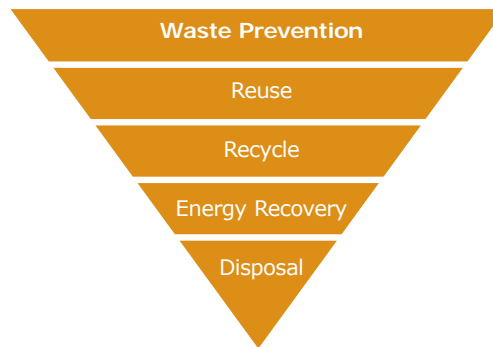
13.1 Background information on the current situation in Leeds

13.2 Sustainable waste management is concerned with producing less waste, and dealing with waste that is produced in a more sustainable manner. The waste hierarchy provides a framework for sustainable waste management.

1. **Reduction:** By minimisation of waste generation and use of natural resources
2. **Reuse or repair:** Reusing discarded items
3. **Recycling:** Separating waste into materials which can then be incorporated into new products
4. **Recovery:** Of energy and materials.
5. **Disposal:** This is the least desirable option.

13.3 A total of 30.2 million tonnes of household waste is produced annually in the UK (Department for Environment, Food and Rural Affairs 2004). Currently in the UK around 75% of total household waste is still sent to landfill, even though the vast majority is reusable. In 2008/9, Leeds residents produced about 345,000 tonnes of waste and rising levels of recycling and composting means that the proportion sent to landfill was about 69%. By comparison, Germany recycles 57% of its waste and the Netherlands recycles 64%. The European Community Directive 99/31

The Waste Hierarchy



sets a target of reducing biodegradable municipal waste sent to landfill to 75% of 1995 levels by 2010 and to 35% of 1995 levels by 2020.

13.4 Policy outlined in The National Waste Strategy 2007 (Department for Environment, Food and Rural Affairs 2007) is recognised through new targets to reduce the amount of household waste not reused, recycled or composted from over 22.2 million tonnes in 2000. The strategy aims to reduce this figure by 29% to 15.8 million tonnes in 2010, with an aspiration to reduce it to 12.2 million tonnes by 2020 – a reduction of 45%. This is equivalent to a fall of 50% per person (from 450 kg per person in 2000 to 225 kg in 2020). Nationally, energy from waste is expected to account for 25% of municipal waste treatment by 2020, compared to 10% today, which is less than the 34% by 2015 anticipated in 2000 (Department for Environment, Food and Rural Affairs 2007).

13.5 The Integrated Waste Strategy for Leeds, 2005-2035 (Leeds City Council 2005) sets a recycling target of 40% by 2020 and more importantly a desire to eliminate annual growth in municipal waste to zero by 2020. The recycling target was increased further in 2007 to plus 50% by 2020. The strategy sets out a clear aspiration for Leeds' future: *"our vision is of a zero waste city, where we reduce, reuse, recycle and recover value from all waste, and where waste becomes a resource."*

13.6 The analysis of the evidence in the Natural Resources and Waste DPD Resource Flow Analysis (Leeds City Council 2008d) and Natural Resources and Waste DPD Policy Position Report (Leeds City Council 2010) draws the following conclusions:

- Waste generation in Leeds is slightly less than the national average for 2004, the most recent available national data. This reflects positively upon Leeds as the national waste arising trend has been upward in recent years; hence Leeds appears to bucking the national trend. However the amount of waste is still projected to grow in the future;
- The current recycling rate for household waste in Leeds is 30%;



Reducing waste to landfill sites

Leeds City Council is committing to a national scheme to cut down the amount of construction waste sent to landfill sites. Between 80% to 90% of all construction waste is recyclable, for example, soil can be used for top soil in gardens or garden centres, wood is re-chipped and reused, rubble is crushed in hardcore and used for road building, plastics are washed, chipped and reused and cardboard re-pulped. Each year in the UK over 120 million tonnes of construction and excavation

waste is produced and nearly a quarter of this is sent straight to landfill. Currently Leeds is only the second local authority in England to sign up to the 2012 Construction Commitment, Halving Waste to Landfill. By signing up to this scheme, the council is committed to setting waste reduction targets for any construction contractors that the council uses and makes sure that waste is kept to a minimum when any new construction contracts are awarded.



13.7 The CSH includes three issues in this category whose aims are:

Storage of non-recyclable waste and recyclable household waste	To recognise and reward the provision of adequate indoor and outdoor storage space for non-recyclable waste and recyclable household waste
Construction site waste management	To promote reduction and effective management of construction related waste by improving on performance which meets the Site Waste Management Plan (SWMP) regulations
Composting	To encourage developers to provide the facilities to compost household waste, reducing the amount of household waste sent to landfill

- Construction and demolition waste is the largest proportion of the waste stream, followed by commercial and industrial and then municipal waste;
- An emphasis should be placed upon reduction, reuse and recycling of waste in an attempt to treat waste as a by-product and the landfilling of waste should only occur as a last resort;
- Energy from waste would provide a way to address many of the issues whilst reducing reliance on fossil fuels for energy generation and reducing the potential burden of increasing landfill tax;
- Waste arising in the Leeds area would be well suited for use in biomass and CHP energy production and investigation of this potential is recommended.

13.8 Storage of non-recyclable waste and recyclable waste

13.9 It is vital that developers make early contact with Leeds City Council's Environmental Services to understand existing collection arrangements and likely future developments of the waste and recycling collection system and the related waste storage provision requirements.

13.10 Measures need to be incorporated into all developments, ideally at an early stage of design development, to ensure the provision of adequate indoor and outdoor storage space for non-recyclable waste and recyclable materials for all residents and include:

- ✓ For houses and flats provide: **internal storage** capacity appropriate for maximum use of the available recycling

opportunities. Residents require at least 60 litres per dwelling for storage of recyclable materials prior to transfer to outdoor collection containers. Sufficient **external storage** for up to three 240 litre containers (to be consistent with Leeds City Council's current mixed dry recycling, garden waste and residual waste collections), **composting** containers (large enough to compost 25% of household waste) and a **separate container for the storage of food waste** (not all food waste can be composted). Food waste collections are currently being undertaken in some areas of Leeds and are likely to increase.



13.11 Construction site waste management plans

13.12 Measures that can be taken to promote reduction and effective management of construction related waste by improving on performance which meets the Site Waste Management Plan (SWMP) regulations include:

- ✓ Maximise the reuse of existing buildings and structures on site where existing buildings cannot be reused, utilise the materials as part of the new development or other developments nearby. Materials such as stone, slates, tiles, timber, paving and bricks are generally suitable for reuse;
- ✓ Excess material arising from construction should not be disposed of on site;
- ✓ Minimise, monitor, measure and report non-hazardous waste production;
- ✓ Sorting and separating materials on site for reuse and recycling and aim for at least 50% by weight or volume diversion from landfill;
- ✓ Identify any hazardous materials (eg asbestos), monitor, measure and report hazardous materials and arrange for containment and disposal by a licensed operator;

- ✓ Design that makes use of prefabricated units or whole units of construction materials;
- ✓ Provide on site storage of materials to minimise losses to damp or rain and that facilitates reuse on site or recycling;
- ✓ If reuse of salvaged materials is not possible within your trade, consider registering with a waste exchange organisation such as WhyWaste or NISP (National Industrial Symbiosis Programme) as other businesses or community groups may be able to make use of materials that may otherwise be disposed of.

13.13 Composting

13.14 Measures that can be taken to encourage developers to provide the facilities to compost waste include:

- ✓ For individual houses provide a composting container (large enough to compost 25% of household waste) per dwelling together with an information leaflet explaining why composting is important, materials that can be composted and troubleshooting advice;
- ✓ For flats or developments where composting would be inappropriate, the requirement for a composting container may be removed;
- ✓ Composting toilets and reed bed systems for the treatment of foul water should be considered where appropriate.

13.15 Further information

- Wastewatch is an environmental charity promoting sustainable resource use www.wastewatch.org.uk

- WRAP (Waste & Resources Action Programme) works to help businesses and individuals reap the benefits of reducing waste, develop sustainable products and use resources in an efficient way. Envirowise offers free, independent support to organisations to help them become more resource efficient and save money: <http://envirowise.wrap.org.uk>
- Building Regulations, Approved Document H provides guidance on the arrangements for separate storage of waste for recycling: <http://www.planningportal.gov.uk/buildingregulations/approveddocuments>
- BS 5906: 2005 Waste Management in Buildings – Code of Practice: http://shop.bsigroup.com/en/ProductDetail/?p_id=000000000030050097
- 'Non-statutory guidance for site waste management plans': www.defra.gov.uk/environment/waste/topics/construction/pdf/swmp-guidance.pdf
- WRAP, guidance on site waste management and the Demolition Protocol. Available: <http://www.wrap.org.uk/construction>
- For information on the council's approach to waste management see www.leeds.gov.uk
- The Business Waste Handbook has been produced to help businesses in Leeds to manage their waste and save money. See www.leeds.gov.uk
- For information about recycling and composting see www.recyclenow.com
- www.whywaste.org.uk is a free online waste exchange service for businesses in Yorkshire and Humber.