

Case Study

Waste Management

Austin Health (Australia)

GGHH Agenda Goals

- Waste

Hospital Goals

- Safe treatment and disposal of waste
- Diverting waste from landfill and increasing recycling levels
- Reducing waste volumes in all streams (general, clinical, food)

Progress Achieved

- Reduced volumes of general waste
- Diverted 3.5 tonnes food waste from landfill
- Reduced emissions
- Cut food waste disposal costs
- Increased staff engagement with recycling and waste issues

The Issue

Like most tertiary hospitals, Austin Health faces significant challenges in attempting to reduce the volume of waste generated at its three major hospitals. This case study outlines some of Austin's efforts to reduce waste across all departments.

Sustainability Strategy Implemented

A range of waste management initiatives form part of Austin Health's waste management strategy.

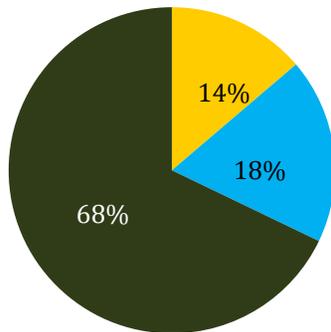
These include:

- Annual audits of waste by weight and physical sort at three main sites
- Undertaking a food waste trial
- Reducing paper waste in administration through transition to electronic payslip system
- Recycling printer and toner cartridges
- Conducting education programs to highlight benefits of recycling
- Online stationary list to reduce unnecessary spending on new stationary

Implementation process

Austin Health has been participating in a benchmarking project through the Victorian Green Health Round Table (in which a number of Victorian healthcare service providers share information – including waste data), which has allowed Austin Health to compare waste management results with similar hospitals.

Waste treatment and disposal by weight*



- General waste is disposed of in landfills.
 - Clinical waste, depending on its type, is typically shredded and sterilised to be disposed of in a landfill or incinerated.
 - Commingled recycling is sorted at a materials recovery facility, sent to a recycler for further processing and made into new products.
- *This graph represents the total weight of solid waste generated at all Austin Health sites during 2012-13.

An annual audit of waste allows an assessment of progress across timeframes, revealing results on correct segregation practices of general waste, clinical waste and commingled recycling waste streams.

A trial program to divert food waste from landfill has commenced within the food services department. An organics composting machine has been installed which uses heat, physical agitation and microbes to break down food waste and producing compost within 24 hours. The trial of this technology was not successful and Austin Health is exploring other food waste treatment options.

The Human Resources team is implementing an electronic payslips system that should see 50% of employees using an online system, reducing the number of payslips printed annually by half.

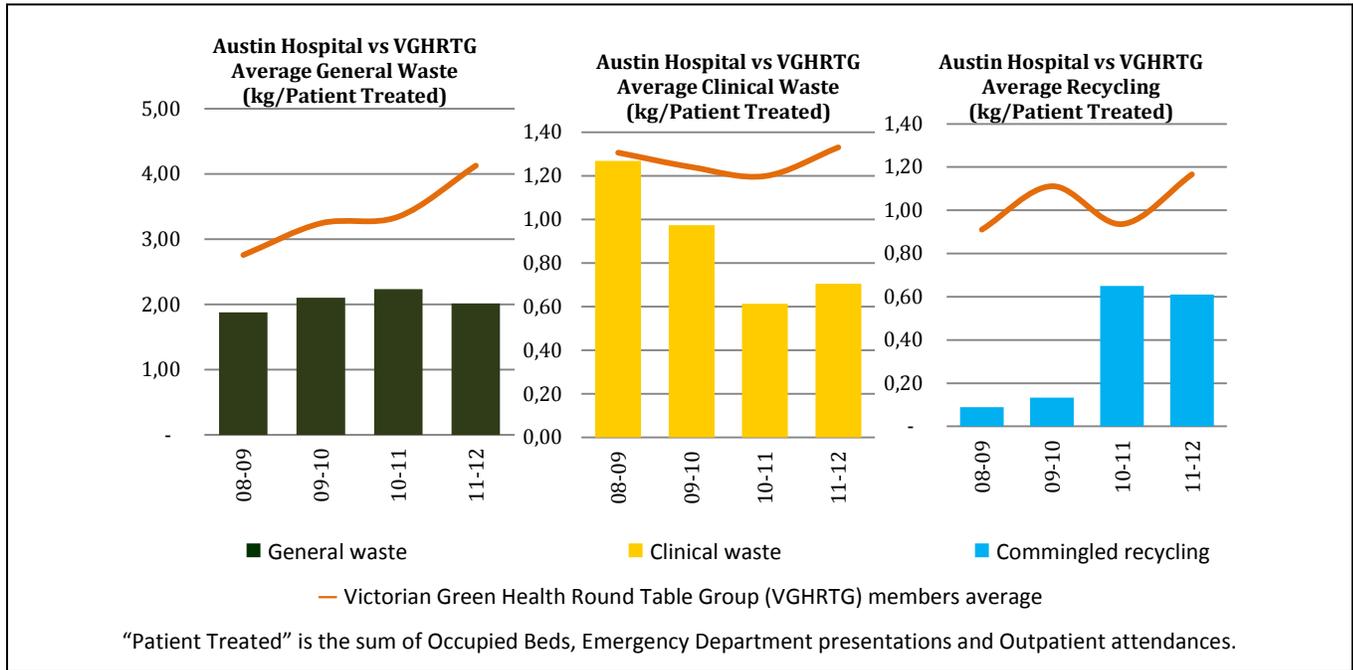
A roving display and themed activities were used to encourage conversations about waste and recycling among staff, visitors and patients.

A printer cartridge and toner recycling program sent 100 cartridges and 50 toners for plastic recycling.

Tracking Progress

In 2012-13, the treatment of a single patient averaged less than five kilograms of waste per day. The amount of general waste has decreased along with a reduction in clinical waste, and an increase in recycling. More than 18 per cent of all waste generated in 2012-13 was recycled.

The benchmarking process comparing waste has revealed Austin has either come close to, or bettered, the waste reduction results of 'like' organisations.



Challenges and lessons learned

An education program is essential to establishing and implementing a successful recycling program. The education program at Austin Health focuses on correct segregation practices to ensure diversion of waste from landfill. The program is evaluated by an annual organisational wide waste audit; in addition to spot audits in areas that generate large waste volumes.

When investigating additional recycling streams, an end-use for the recycled product needs to exist for the waste industry to support a recycling initiative. Many medical consumable items can be recycled if segregated correctly however; these items are often required to be segregated separately from other recycling streams. Many healthcare facilities identify space as a challenge, including Austin Health when space is required for numerous waste receptacles. This issue also highlights the importance of healthcare facility design to maximize the opportunity to establish best practice waste management techniques.

Next Steps

This strategy is ongoing and we will continue to report our progress annually.

Demographic information

Austin Health operates 984 beds across acute, sub-acute and mental health, with a 2012/13 annual operating budget of \$702 million. In 2012/13, 93,001 inpatients and 95,958 outpatients were treated.

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