

# Hospitals Medical/Dental Offices

AN ICI WASTE REDUCTION STRATEGY HANDOUT

## Waste reduction saves time, money, and the environment!

As these case studies show, hospitals throughout North America are undertaking successful waste management programs that provide many benefits while protecting the environment.

### Staten Island University Hospital

In 1997, the Staten Island University Hospital embarked on a large-scale waste prevention program. Using 1995 activity as a baseline, the hospital estimated its annual waste management costs at \$1.2 million. In 1998, waste prevention efforts drove waste management costs from \$1.2 million to about \$700,000, decreased waste volumes by 32 percent, and reduced RMW (regulated medical waste) from 16 percent to 6 percent of the total waste generated.



The primary waste prevention strategies involved the Patient Support Services Department and the Clinical and Administrative Departments. The following strategies were successfully implemented.

### Patient Support Services

- A. Waste Management Program Implementation**
- Conduct in-service training and education
  - Minimize red bag locations
  - Improve waste segregation
  - Conduct a continuing waste audit
  - Control plastic bag usage
  - Collect sharps in reusable containers
- B. Durable Housekeeping Supplies Strategies**
- Use durable mops, dust mops, rags
  - Use refillable chemical dispensers

### Clinical and Administrative Departments

- A. Disposable Linen Reduction Strategies**
- Consider reusable isolation gowns
  - Consider reusable diapers
  - Consider reusable protective equipment
  - Use durable patient pillows and gowns
  - Switch to reusable underpads
  - Use durable O.R. gowns
- B. Medical/Surgical Reduction Strategies**
- Use refillable lotion containers
  - Refurbish patient beds
  - Reduce admission kit components
- C. CSS Waste Prevention Strategies**
- Reprocess O.R. bowls and instruments



- Use rigid sterilization containers
  - Implement trace cart program
- D. Pharmacy Waste Prevention and Management Programs**
- Use returnable totes
  - Recycle paper and glass
  - Empty IV containers
  - Implement hazardous materials return distribution program
  - Reduce admixtures waste
  - Reduce supply hoarding
- E. Dietary Service Waste Prevention Program**
- Use durable trays and covers
  - Use durable retherm ware for hot entrees
  - Install microwaves in visitors pantry for reheating food
- F. Surgery Waste Reduction Programs**
- Standardize O.R. packs
  - Reduce number of items used per procedure
  - Improve quality and reduce quantity of O.R. drapes
  - Reduce number of brushes used per procedure
  - Install refillable soap dispensers
  - Drain IV bags
  - Recycle unused O.R. supplies
- G. Administrative Initiatives**
- Reduce paper and carbon forms
  - Consolidate and reduce frequency of Policy Manual distribution



## B.C.'s Vancouver General Hospital

A proactive waste reduction program at Vancouver General Hospital has increased the number of diverted tonnes from 159 in 1995 to 440 in 1999. Accounting for about 25 percent of the total waste stream, this diverted waste includes office paper (including confidential records), waste grade paper (including newspapers and magazines), cardboard, and some plastics.

While the hospital makes no money by recycling these products, it benefits in other ways. "In addition to saving valuable landfill space," says Maggie Sinclair, the hospital's facilities Environmental Coordinator, "we present a good corporate image to the public and avoid fines through compliance."

Sinclair says major challenges to establishing a diversion program include: 1) the perceived hazards of hospital wastes, and 2) collection costs. "People are nervous about taking hospital wastes. You have to work to overcome that in your negotiations with collection companies." She adds that, "Materials must be collected in a way that maximizes transportation pick-up costs. We use a compactor to prepare recyclable waste for collection, which saves a lot over the long-term."

For information, contact Maggie Sinclair at (604) 875-4615 or [msinclair@vanhosp.bc.ca](mailto:msinclair@vanhosp.bc.ca)

## Another Success Story!

During the first four years of its waste prevention program, the Jacobi Medical Center in New York reduced waste volumes ten percent and annual waste management operating costs by 31 percent, primarily through the implementation of 14 operation changes.

Key among them were:

- Reducing the use of single-use waste disposal supplies (e.g. clear and red plastic bags and disposable sharps containers);
- Implementing a reusable sharps container service;
- Eliminating on-site autoclaving and autoclave bags; and
- Continuing in-service training about recyclables and waste classification and segregation practices.

Continuing efforts over the next few years reduced waste a further 25 percent and cut waste management costs by an additional 18 percent.

For more information about these American success stories, visit [www.nycwasteless.com/Casestudies](http://www.nycwasteless.com/Casestudies)

# The Paper Chase!

While 75 percent of organizations recycle paper and cardboard to some extent, these products still account for the biggest portion of business waste. Therefore, the most important things you can do to divert waste are to reduce, reuse, or recycle all paper products.

## Reducing Packaging and Paper Waste

- Set up a purchasing system which enables all doctors/dentists/departments in a building to buy "common" materials in bulk (e.g. alcohol, cotton swabs);
- Eliminate individual packaging components, or eliminate packaging entirely;
- Reduce the size of packaging by making it smaller, thinner, or lighter;
- Use e-mail, post messages on a central board, or circulate single copies for internal communication;
- Save documents on disc rather than making hard copies;
- Proof documents on screen before printing;
- Ensure all employees know how to operate printers and photocopiers;
- Photocopy on both sides of paper;
- Eliminate unnecessary forms;
- Circulate same draft of report for corrections by several people;
- Use self-sticking fax memo notes instead of fax cover sheets;
- Circulate reports and publications rather than making individual copies; and
- Revise mailing lists to avoid unnecessary mailings.

## Reusing Packaging and Paper Products

- Use shredded patient records as packing materials;
- Reuse incoming packing materials (e.g. boxes/foam peanuts/bubble wrap) for outgoing packages;
- Use reusable boxes and mailbags for shipping to branch offices or warehouses.
- Return, reuse, or repair wooden pallets and spools;
- Introduce reusable shipping containers;
- Use paper printed only on one side for scrap or for printing drafts; and
- Relabel file folders, etc.

## Recycling Paper Products

An effective paper recycling program includes:

- Policies that promote the purchase of materials that contain recycled content;
- Active involvement of business and property managers;
- Suitable equipment (e.g. deskside containers, large bins for areas of high paper generation);
- Ongoing promotion and recognition;
- Regular pick-up service; and
- Continual monitoring, reporting, and refinement.

## Reducing and Reusing Other Office Wastes

- Encourage employees to bring "litterless" lunches (e.g. reusable lunch bags and dishware);
- Provide mugs and silverware rather than disposable alternatives;
- Order lunch room supplies in bulk;

- Compost food waste;
- Optimize office and operational processes to eliminate waste;
- Institute maintenance practices that prolong the lives of photocopiers, computers, etc.;
- Advertise surplus and reusable waste items through BC Materials Exchange (1-800-667-4321);
- Set up an area for employees to exchange used items; and
- Use a mulching lawn mower or "grasscycle" by leaving grass clippings on the lawn.

## Waste Reduction Benefits

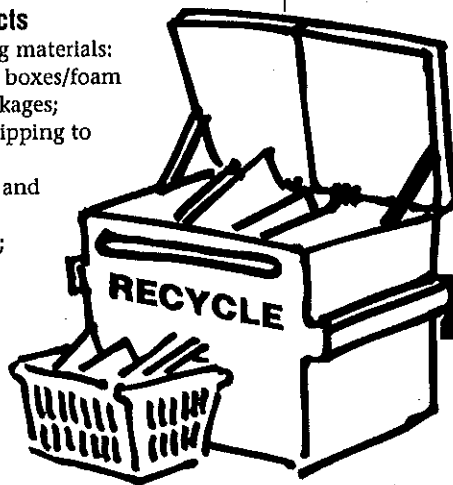
**Financial Benefits** include waste management and treatment costs, reduced overhead and administrative or health and safety costs, increased productivity and/or improved product quality, and/or reduced expenses in raw materials.

**Regulatory Benefits** may include fewer compliance requirements, decreased risk of violating regulations, and reduced time and frustration associated with reporting, permit applications, etc.

**Public Image and Marketing Benefits** can be realized by promoting your environmentally-conscious practices, which could lead to free media exposure and increased sales.

**Liability Risks** can be minimized, particularly if hazardous waste generation is reduced or eliminated.

**Ecological Benefits** include extending the lives of non-renewable resources, decreasing the volume of waste for disposal, and reducing the future potential of damaging or polluting the environment.



## Contact Information:

B.C. Green Economy Initiative [www.gov.bc.ca/ges/](http://www.gov.bc.ca/ges/)

B.C. Materials Exchange 1-800-667-4321

B.C. Recycling Hotline 1-800-667-4321

Recycling Council of B.C. (604) 683-6009  
[www.rcbc.bc.ca](http://www.rcbc.bc.ca)

Regional District of North Okanagan (250) 545-5368  
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