Benefits Using of Communal Waste Bins vs. Individual Waste Bins

Increased waste diversion can be achieved through the following initiatives:

• Removing full size waste receptacles and replacing them with mini trash bins at individual work stations. The mini trash bin should be accompanied by a regular size recycling receptacle.
• Canceling custodial desk-to-desk pick-up from individual locations.
• Best results were achieved when desk-to-desk custodial pickup is canceled and individuals are made responsible for emptying their mini trash and recycling bins into centralized locations.

How these initiatives work:

• The mini trash-can acts as a “yield” sign, allowing office workers to pause and think about what they throw away. By making it a little inconvenient to throw away trash, people are provoked into paying more attention and thinking more about what they are throwing away and about what can be recycled.
• The system achieves high recycling levels because it fundamentally changes the way individuals deal with their office discards.
• Individuals become more conscious of the waste they are throwing out, realizing that many items they would have previously thrown into the waste receptacle can actually be recycled.
• **NOTE:** Success has been limited in settings where desks are shared by various shift workers because no one person has responsibility for emptying the containers. However, scenarios where there is a common space have had better success in using centralized collection containers in place of desk side setups.

Benefits:

• Reduced solid waste, and increased waste diversion significantly.
• Reduces overall solid waste management costs.
• Lower trash tonnage, resulting in reduced hauling and tipping fees.
• Custodial staff no longer are no longer going desk to desk, resulting in reduced custodial costs in many instances, or alternatively they are freed up to perform other duties.
  
  o Max Green (Prov. Of Ontario) estimated a $50 per person per year savings in custodial costs (1990s).
• Investment costs into the new program (new desk bins, & central bins) is recovered within the first year.
• In some instances, increased revenues can be obtained through increased sales of recycled material. This fluctuates with commodity rates.

Case Studies:

This waste reduction program was first implemented by the Ontario Provincial government in the 1990s under the Max Green program. The results were so successful in increasing waste diversion that is has now been replicated by governments
institutions and private industry across North America. All of the case studies below implement mini trash receptacle and canceled individual waste pick up. Employees were made responsible for emptying the waste/recycling they generate in a central waste collection station.

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| Ontario Government, Canada (Maximum Green)        | • Program was established in 1991 (Green Workplace Program) and reached reductions targets (50% in 5-years) well before expected.  
• The three Ontario government buildings that piloted the program saw total diversion rates of 80-88%.  
• In 1998, Max Green was implemented in 52 Ontario government buildings (24,000 employees). The program has reduced waste in the buildings from 75-95%. Saving nearly $1 million on annual waste disposal costs  
• As of March 2000, the comprehensive program is in place in most of the provincial buildings in downtown Toronto and diverts over 70% of all waste from disposal.  
• Payback period on investments into the program was less than one year.  
• An estimated savings of **$50 per person** per year in custodial costs  
• In one Toronto building, custodial staff saved 1/3 of their time on a floor of 100 tenants.  
• In the Mowat Block (Toronto), saved $48,000 in custodial costs, representing a savings of $64 per employee (750 employees).  
• St. Catherines Courthouse saved, $12,000, or $67 for each of its 178 employees. |
• Increase in waste diversion:                                                                                                                                                                                                                                              |
|                                                   | **Program Stage (Year)** | **Recycling Diversion** | **Waste Landfilled** |
|                                                   | Before (1994)             | 51%                     | 49%                  |
|                                                   | After (1995)              | 72%                     | 28%                  |
|                                                   | Current (1998)            | 82%                     | 18%                  |
City of San Jose (Recycle@Work)  |  • Began in May 1997 and in July 2002 included 72 buildings/facilities spread out across the city.  
|  • One central trash area for every 10-15 employees.  
|  • Four recycling streams that employees had to divide recyclables into. (Much easier at YorkU - only two).  
|  • Custodial costs remain constant, but have freed custodians to undertake other duties.  
|  • Reduced garbage service by 50% at its two largest administrative facilities. Garbage decreased from 60 cubic yards per week, saving $11,000 a year on garbage collection at these two locations alone.  
|  • Savings were modest as the city previously had collection fees and did not pay for waste disposal prior to the program being implemented.

Other Governments/Companies that have implemented similar programs
- City of Toronto, Ontario
- City of Oakland, California
- City of San Jose, California (above)
- City of Austin, Texas
- City of Seattle, Washington
- City of Valparaiso, Indiana
- Porter County, Indiana, Board of Commissioners and the Porter County Solid Waste Management District
  - Solid waste costs reduced by 1/3.
- Kalamazoo County government buildings, Michigan
- Bank of Nova Scotia (Scotia Bank), Canada
  - Achieving 80% waste diversion.
- Brewer Science (Rolla, Missouri) (locations around the globe)
  - Previously had 34% of recyclables ending up in the waste stream, with the implementation of a similar program it has dropped to 11%.
  - Within the first three year 2002-2004, annual disposal costs per employee dropped by an average of 12%.
- Journal Democrat, Rockport Indiana (small 11 person office)
  - 40% reduction in trash costs.
- Infineon Technologies (San Jose, California)
- Del Mar Fairgrounds (Del Mar, California)
- Southern California Edison Company
- North Illinois University (Deklab, Illinois) (http://www.niu.edu/recycling/)