

Summary of Collection Cost Research

Municipalities were selected to be included in the collection cost research based on:

- Availability of packaging and printed paper (PPP) collection cost data separate from PPP processing costs and from other collection services such as garbage and/or organics; and
- Securing cost data points for curbside and depot collection reflecting a range of household densities.

Information on the following costs was compiled during the research process:

- Payments to PPP collection contractors;
- Amortized cost of PPP collection containers where provided by local governments;
- Where collection service is delivered by local government staff:
 - Amortized cost of collection equipment, allocated as required to represent the portion of equipment capacity and utilization dedicated to PPP collection;
 - PPP collection operating costs including:
 - Salary, overhead and payroll burden associated with foremen and supervisors;
 - Salary, overhead and payroll burden associated with drivers;
 - Staff training
 - Equipment leases, repairs, maintenance, fuel, licenses, permits, insurance; and
 - Materials and supplies.

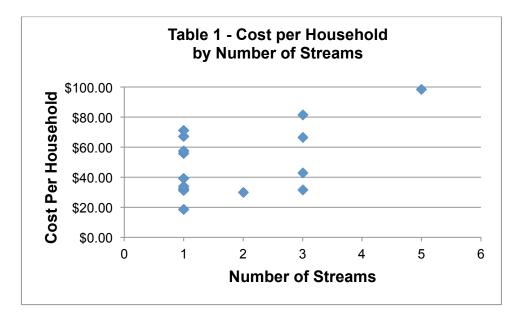
Twenty-three of 27 local governments (LGs) that were contacted chose to co-operate with MMBC's accountant to provide collection cost data. These 23 LGs yielded curbside collection costs for 13 programs, multi-family collection costs for 8 programs and depot collection costs for 17 programs. Resident education costs and service administration costs were compiled from all 23 LGs.

In addition, MMBC, in co-operation with the BC Apartment Owners & Managers Association, the BC Non Profit Housing Association and the Professional Association of Managing Agents, distributed surveys to approximately 2,500 owners and operators of multi-family buildings and received 107 completed surveys.

Curbside collection programs studied included weekly and bi-weekly service, one, two, three or five collection streams, Blue Boxes, Yellow and Blue Bags, single use bags and cart based programs.

Recovery ranged from 48.3 kg to 269.5 kg per household with a mean of 176.3 kg and a median of 190.7 kg.

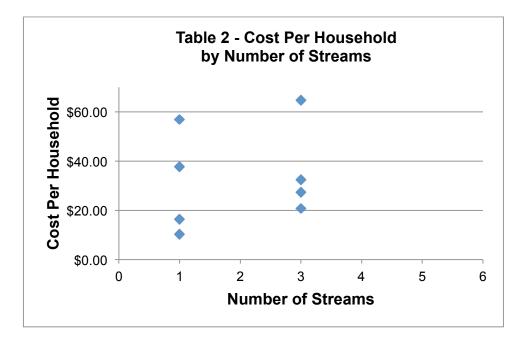
Cost per household ranged from \$18.66 to \$98.43 with a mean of \$50.53 and a median of \$42.92. Cost per tonne ranged from \$125.70 to \$1,969.39 with a mean of \$420.91 and a median of \$225.14.



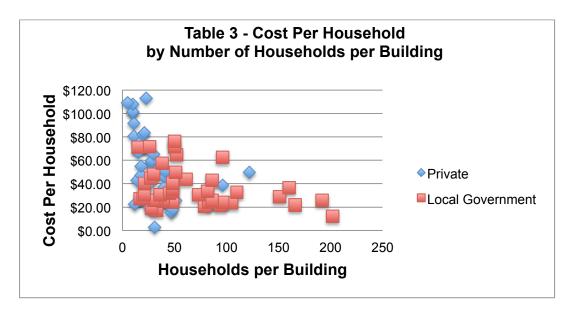
Multi-family building collection programs studied included one and three collection streams.

Recovery ranged from 73 kg to 136.3 kg per household with a mean of 101.1 kg and a median of 101 kg.

Cost per household ranged from \$10.39 to \$64.69 with a mean of \$33.33 and a median of \$29.91. Cost per tonne ranged from \$118.85 to \$483.57 with a mean of \$319.59 and a median of \$319.34.



Of the 80 multi-family building surveys that provided annual costs for PPP collection services, the annual cost ranged from \$2.90 to \$113.04 per household for private sector services (with a mean of \$42.46 and a median of \$50.60) and \$12.28 to \$76.30 per household for municipal services (with a mean of \$32.67 and a median of \$30.56).

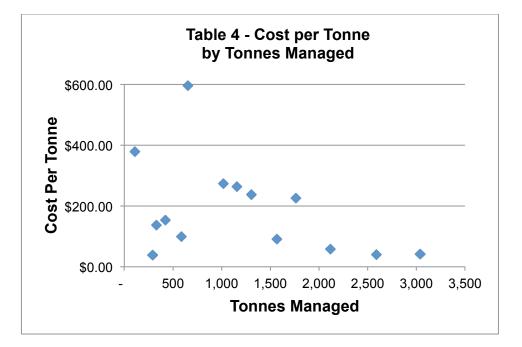


Depot collection recovery and costs varied widely.

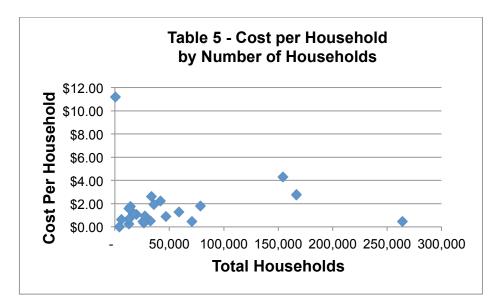
Recovery ranged from 1.5 kg to 222.78¹ kg per household with a mean of 57.5 kg and a median of 62.4kg.

¹ In a resort community with a high seasonal population.

Costs on a per tonne basis ranged from \$37.35 to \$595.42 with a mean of \$180.88 and a median of \$136.99.



Resident education costs varied widely. Cost per household ranged from \$0.24 to \$11.18 with a mean of \$1.71 and a median of \$1.05.



Service administration costs varied widely. Cost per household ranged from \$0.91 to \$25.27 with a mean of \$5.05 and a median of \$2.99.

