## 2007 Update on DEC 's Solid Waste and Recycling Programs

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## Historical Perspective

|  | Data Collected from Planning Unit Surveys |  |  |  |  |  |  | Supplemental |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| YEAR | Paper | Glass | Metal | Plastic | C\&D | YW | Other | BUD | RCA | Total |
| 1999 | 1.43 | 0.09 | 0.86 | 0.06 | 6.74 | 0.90 | 1.53 | 2.17 | 0.22 | 14.00 |
| 2000 | 1.65 | 0.07 | 0.91 | 0.06 | 7.21 | 0.92 | 1.62 | 1.55 | 0.19 | 14.18 |
| 2001 | 1.59 | 0.07 | 0.90 | 0.03 | 8.20 | 0.93 | 1.63 | 1.87 | 0.20 | 15.42 |
| 2002 | 1.55 | 0.07 | 0.96 | 0.06 | 9.22 | 0.96 | 1.62 | 1.78 | 0.21 | 16.44 |
| 2003 | 1.85 | 0.05 | 0.97 | 0.07 | 8.63 | 0.83 | 1.54 | 1.52 | 0.21 | 15.66 |
| 2004 | 2.03 | 0.14 | 2.18 | 0.07 | 9.58 | 0.89 | 1.47 | 1.29 | 0.20 | 17.85 |

All figures are in Millions of tons, and are rounded C\&D is Construction and Demolition Debris YW is Yard Waste
BUD is materials used pursuant to a Beneficial Use Determination RCA is materials collected as part of the NYS Returnable Container Act

## NYS Recycling Rates 1987-2004



## Historical Perspective on Total Recycling



## Sample Metrics - per capita recycling

The Top 10 (and 2 relatively low) Planning Units in pounds per capita Metal Glass Paper \& Plastic recovery in 2004.

Population Lbs/person

TOMPKINS CO
ONONDAGA CO RRA
BROOME CO
SCHUYLER CO
ONEIDA-HERKIMER SWA
MONROE CO
OSWEGO CO
TIOGA CO
NEW YORK CITY
CHAUTAUQUA CO

M-O-S AUTHORITY
ST. LAWRENCE CO

96,500
1,765
451,013
200,536
19,224
316,000
735,343
123,495
51,784
8,008,278
139,000
143,000
95
111,000

## Sample Metrics - Enviro Benefits

1. New York recycling reduced greenhouse gas emissions by 5.2 million metric tons of carbon equivalents (MTCE) in 2004.
2. New York recycling saved 231 Trillion BTUs of energy, equivalent to 1.8 Billion gallons of gasoline.
3. By recycling 2.4 million tons of scrap metal and glass in 2004, New York's recycling efforts reduced the need for virgin materials, including
2.66 million tons of iron ore,
1.49 million tons of coal, 218,453 tons of sand,

191,317 tons of limestone, and
68,897 tons of soda ash.
4. Recycling 2 million tons of paper saved 6.7 million cubic yards of landfill space.

## Returnable Container Act HI STORI CAL I NFORMATI ON

SINCE 1983:
90.6 Billion Total Redeemed containers
\$6.1 Billion in Deposits Paid
\$1.4 Billion in Handling Fees Paid (2 cents per container)
Over 6 million tons recycled since 1983

- 4.2 Million Tons of Glass
- 840,000 Tons of Plastic
- 1.1 Million Tons of Aluminum

By recycling glass, aluminum and plastic.
We saved 2.3 million barrels of oil per year,
We saved 52.4 million barrels of oil since 1983 which reduced the need for 26 supertankers of oil.
By recycling the aluminum cans, we saved enough energy to run a TV for 175 billion hours!

## Bottle Bill Cumulative Deposits Initiated and Redeemed 1983-2004



Under the current Bottle Bill, $\$ 6.15$ Billion in Deposits have been initiated and collected from consumers since 1983. Of this amount, $\$ 1.62$ Billion remains as unclaimed deposits by consumers.

## Returnable Container Act

June 15, 2007 is the $25^{\text {th }}$ Anniversary of the enactment of the original Bottle Bill

- Commissioner Grannis and Department are participating in events around the State
- Initiated a campaign "25 Days for 25 Years" elementary school bottle drives
- Will promote the anniversary at the New York State Fair and other events throughout the year



## Bigger, Better Bottle Bill



- Expansion of definition to include water, tea, juice, sports drinks would add approximately 3 billion containers to the 5.4 billion container already initiated in NYS.
- Deposit initiators will be required to file quarterly reports and pay the unclaimed deposits to the NYS Department of Taxation and Finance.
- A conservative estimate of $\$ 100$ million in unclaimed deposits would be put into the Environmental Protection Fund.


## State Agency Recycling

- We are working with other State agencies to begin or improve their waste reduction and recycling programs

Examples:
Office of General Services - improve recycling at State offices and more procurement of green products
Dept. of Education. - increase recycling in Schools
Dept. of Transportation - use of tire chips in road construction
Thruway Authority - include recycling at rest stops
New Governor's Executive Order to require additional requirements


## Go Green I nitiative School Recycling

- NYSAR3 has been promoting the Go Green Initiative. We are considering working with them further on this effort.
- We were able to provide NYSAR3 with \$10,000 through an Environmental Benefit Fund from a penalty on a labeling violation of the Returnable Container Act.
- The Department is in the process of working with NYS Education Department to ensure they promote recycling in schools.


## Grants for Recycling \& HHW 1995-2007

| Type of grant | Number <br> of grants | Dollar value <br> Lifetime | Dollar value <br> this year to date |
| :---: | :---: | :---: | :---: |
| EPF - Recycling <br> (Both coordinator and capital) | 239 | $\$ 40.3$ million |  |
| EPF - HHW | 353 | $\$ 20.5$ million | $\$ 0.84$ million |
| Total EPF | 592 | $\$ 60.8$ million | $\$ 0.84$ million |
| CWCA Bond Act | 124 | $\$ 48.8$ million |  |
| Total EPF+CWCA | 716 | $\$ 109.6$ million | $\$ 0.84$ million |

The 2007 EPF included $\$ 9.875$ million for recycling/HHW. \$835,000 already awarded to 18 applicants for HHW collection projects.

We are also making a heightened effort to close out dormant projects from 1995-2002 in order to better Utilize funding from previous years.

## Grants for Recycling \& HHW

Three types of grants are provided under our Municipal Waste Reduction and Recycling Program (50\% match up to $\$ 2$ million)

1. Recycling Capital Projects - recycling trucks, wood chippers, processing equipment, and household blue bins.
Projects have included.
Materials Recycling Facilities in Rockland, Sullivan, Delaware, Fulton, Lewis and Ontario Counties. Cortland Co. MRF funding pending in 2007.
. Composting Facilities in the Town of Islip, Onondaga County and the Oneida/Herkimer SW Authority.
2. Recycling Coordinator Projects (added to EPF in 2000) - Recycling Coordinators newly hired in Dutchess, Chautauqua and Erie Counties. 24 other existing RC positions continued.
3. Household Hazardous Waste - funds permanent HHW facilities in

Brookhaven
Rockland County
Broome County
Tompkins County.

Huntington
Schenectady County
Monroe County
Oneida-Herkimer SW Authority as well as HHW Collection Day programs in 40-45 additional communities every year.

## Household Hazardous Wastes

EMC's can play an important role in awareness of HHW/toxics issues, safe collection/disposal and alternative products.

## SOME SAMPLE ISSUES

- Disposal of compact fluorescent (CFL) bulbs is an emerging issue due to aggressive promotion of these energy saving devices. Each bulb contains small amount (4mg) of mercury vapor, which is about 1/100th of the mercury in a home thermometer.
- Electronics recycling remains a challenge due to high costs and large numbers of discarded units
- Cell phones take back is now required by State Law (Chapter 703 of Laws of 2006).
- Disposal of Mercury-containing devices in regular waste is prohibited (Chapter 145 Laws of 2004).
- Sale of Architectural \& Industrial Maintenance (AIM) coatings is banned as of May 15, 2007 including certain high-VOC formulations of varnishes, oil-based paints, wood stains, etc. (DEC Div of Air regulation 6 NYCRR Part 205)


## New York Recycles

- We continue to promote New York Recycles, as part of the America Recycles. Stacy Merola, EMC Broome County services is on the steering committee.
- We completed the judging for the annual poster contest. Over 900 posters from 95 schools around the state. Posters will be featured in the calendar which is sent to schools, organizations and businesses around the state.
- We appreciate the EMC's financial support of the calendar in the past and we look forward to your continued support.


Special thanks to the
NYS ASSOCIATION OF ENVIRONMENTAL MANAGEMENT COUNCILS, INC.
sponsor of the month!
www.nysaemc.org

## Vehicle Dismantling Facilities Article 27 Title 23

Signed July 28, 2006 Chapter 180, Laws of 2006
Established operating, reporting, and recordkeeping requirements Applies to any person or entity engaged in the business of acquiring motor vehicles or trailers for the purpose of:

- Dismantling the same for parts, or
- Reselling such vehicles as scrap

Exempts facilities that both

- Receive no more than 25 EOL vehicles per year, and
- Store less than 50 EOLs on-site



## Article 27 Title 23 Operating Requirements

- All fluid draining/collection activities must take place on a concrete pad or equivalent surface.
- Fluids must be stored in closed, clearly marked, undamaged containers that are placed on a bermed surface of concrete or equivalent material.
- Lead acid batteries must not be stored on the ground and must be covered to prevent contact with water. Leaking batteries must be stored in leakproof containers.
- PCB capacitors and mercury containing devices must be stored in separate labeled containers for recycling or disposal.


## Article 27 Title 23 Operating Requirements

Fluids/Materials to be Removed prior to Crushing:

- Engine Oil
- Transmission Fluid
- Axle Fluids
- Antifreeze
- Power Steering Fluid
- Lead acid batteries
- Mercury devices
- PCB capacitors
- Refrigerants
- Air bags


## Article 27 Title 23 Annual Report

- Number of Vehicles Received
- Number of Vehicles Crushed \& Removed
- Number of Vehicles Stored at year's end
- Area used for vehicle storage
- Quantities of waste fluids \& components
- "Number and ...nature of any violations of all applicable rules and regulations of the state"


## NYS SOLID WASTE MGT.




## Additional Major Programs administered within the DSHM Solid Waste/ Recycling Bureau

- SWM Facility Permitting and regulations (Part 360)
- Organics and Biosolids Mgmt (360-4 and 360-5)
- Waste Transporter Permit Program (Part 364)
- Landfill Closure \& Landfill Gas Grants Programs
- Waste Tire Stockpile Abatement Program
- Local SWM Planning and Reporting Programs
- Beneficial Use Determination Program
- Regulated Medical Waste Program
- Mercury Reduction Program
- Executive Order 142 (State agency WR\&R) Reporting
- Public Education Efforts

> (518) 402-8705, 402-8706 \& 402-8707

