Participating Towns & Parks

**Allenhurst Asbury Park Atlantic Highlands Atlantic City** Avalon Avon-By-the-Sea **Barnegat Bay Head** Beachwood **Belmar Bradley Beach Brick Brigantine** Cape May **Corbin City** Deal **Del Haven** Elberon **Forsythe Wildlife** Refuge Glen Ridge **Harvey Cedars Higbee Beach** Ideal Beach Island Beach St. Park Keansburg Keyport Lakewood Lavallette Leonardo **Loch Arbour Long Branch** Longport Manasquan **Mantoloking** Margate **Monmouth Beach Normandy Beach Ocean City Ocean Gate Ocean Grove Ortley Beach Port Monmouth** Pt. Pleasant Pt. Pleasant Beach **Raritan Bay Waterfront Park** Sandy Hook **Sea Bright** Sea Girt **Sea Isle City Seaside Heights** Seaside Park Seven Presidents



## 2008 Annual Report

#### Sweeping Toward a Clean Ocean

Clean Ocean Action (COA) is a coalition of 125 organizations working to improve and protect the waters off the New Jersey and New York coasts. In 1985, COA launched the region's first Beach Sweeps program to rid beaches of unsightly and harmful debris. The program is one of the longest running cleanups of its kind in the United States and has grown from 75 people at one site in 1985, to 5,163 volunteers at 115 sites in 2008.

COA hosted the 23<sup>nd</sup> Annual Spring and Fall Beach Sweeps in 2008 in New Jersey. Volunteers gathered from Raritan to Delaware Bays and along the ocean to clean beaches and waterways. They joined as groups (community, school, business, and organization), families, and individuals. Participants collected and recorded valuable data about debris, which is presented in this report and is used to advance federal, state, and local programs to reduce litter.



Volunteers collect data, an integral part of the Beach Sweeps Event.

#### Litter is Harmful, Unsightly, & Costly

Fish, whales, birds, and other animals often mistake litter for food or become victim to drifting debris. As a result, animals eat items, such as plastic bags, cigarette filters, and/or become ensnared by fishing line or nets, with deadly results. For example, cigarette filters mimic fish and have been found in the stomachs of birds and larger fish, blocking and affecting their digestion. Also, the filters are made of plastic fibers and trap carcinogenic (cancer-causing) chemicals that are introduced into animals' bloodstreams.

Moreover, plastic litter takes a few years to several hundred years to break down into smaller pieces, threatening wildlife for decades. Litter in waterways can also foul boat motors and propellers, resulting in costly repairs.

Finally, littered beaches can ruin a day at the beach. Garbage slicks and wash-ups close beaches to swimming and are detrimental to tourism and the coastal economy.

#### You are the Solution

The goal of the Beach Sweeps is to help reduce and eliminate sources of litter. The Beach Sweeps events are more than people picking-up trash from beaches. This program builds community support for solutions, as well as raises awareness about the negative impacts of litter on wildlife and the ocean. Citizens learn about the types and quantities of debris found along the coast and the shorelines of rivers, lakes, and streams.

#### 2008 Spring & Fall Beach Sweeps Totals

- 5,163 volunteers at 115 sites
- 2,860 bags of trash removed
- 289,976 items collected
- 36,041 pounds of debris removed

#### A Legacy for Action

Most importantly, the data collected during the Beach Sweeps turns a one-day event into a legacy of information to combat litter and other sources of pollution by identifying and monitoring trends. The information helps find solutions to keep beaches clean and healthy for citizens and marine life. Indeed, the data has been used to help create federal, state, and local programs and laws to reduce litter in the environment.

Finally, the data from the COA Fall Beach Sweeps is submitted to the Ocean Conservancy in Washington, DC, as part of its international database on marine debris and global campaigns against ocean pollution. For more information and to learn how to be the solution to ocean pollution, go to www.CleanOceanAction.org.

#### WHAT'S INSIDE:

- Sponsors & Highlights (pg. 2)
- NJ's Dirty Dozen &
  - Roster of the Ridiculous (pg. 3)
- Data & Trash That Lasts (pg. 4-5)
- "Flip Your Lids" Plastic Cap Recycling Campaign (pg. 6)

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So

## **Sponsors**

### **Site Sponsors**

Adventure Aquarium - Ventnor
Claremont Care Center - Point Pleasant
J. Knipper & Co. - Seaside Heights
Enterprise Rent-A-Car - Sea Bright
Keyport Business Alliance - Keyport
Lower Cape May Regional Education
Association - Cape May
Monmouth County Association of
Realtors - Sea Bright
Panasonic - Sandy Hook
Surfrider Foundation Jersey Shore
Chapter, in memory of Daniel

"Many of our members and employees spend their summers at the Jersey Shore, so they understand and appreciate the benefits of clean beaches."
-United Teletech Financial, Sponsor

Clune - Point Pleasant Beach

## **Statewide Lead Sponsors**















New World Foundation

## **Support Provided By**

Divers Two, Inc. ~ Dunkin' Donuts ~ Gateway National Recreation Area, Sandy Hook Unit ~ International House of Pancakes ~ Island Beach State Park ~ Jenkinson's Aquarium ~ Jersey Printing ~ Jersey Shore Coffee Roasters ~ Larabar ~ Lower Cape May Regional H.S. ~ Marine Academy of Science & Technology ~ NJ Community Water Watch ~ Ocean Conservancy ~ Rain Forest Cafe ~ Soverign Avenue Elementary School ~ Starbucks Coffee Company ~ Turning Point Cafe ~



In 2008, more than 300 Comcast volunteers participated in the Beach Sweeps.

## Highlights

## Monmouth/Middlesex

#### **SPRING:**

Belmar – Students from Marlboro, Neptune, Allentown, Howell, and Freehold Township High Schools, along with Girl Scout Troop #1674 and the Young Professionals Group picked-up 1,000 pounds of trash.

**Sandy Hook** – 421 people collected nearly 2,500 pounds of trash.

South Amboy – The Church of Latter Day Saints-Scotch Plains, Middlesex County Conservation Corps, Middlesex County 4H EcoManiacs, and the Jersey Barons Baseball Club cleaned one mile of the Raritan Bay shorelines, collecting nearly 2,250 pounds of debris!

#### FALL:

Asbury Park – Volunteers found a bunch of baby crabs caught in a plastic bag.

Sea Bright – At four sites, 306 volunteers collected 1,893 cigarette filters, 1,838 plastic caps, 1,293 plastic bags/food wrappers, and a live kitten!

### **Ocean County**



Maxon Avenue Point Pleasant Volunteers

### **SPRING:**

**Point Pleasant Beach** – A volunteer found a 1977 Bradley Beach Badge.

Ocean Gate – Volunteers from the Borough and the Beach and Boardwalk Committee collected 1,911 of the total 41,900 cigarette filters collected at the Beach Sweeps.

#### **FALL:**

**Barnegat** – Volunteers observed a dead bird entangled in string.

**Normandy** – Boy Scouts and volunteers from Labrador Lounge collected 39 rubber ballons.

**Seaside Park** – 90 volunteers collected 141 pieces of lumber at five sites.

### **South Jersey**

#### **SPRING:**

**Cape May Point** – Volunteers found a sofa and a reclining chair.

Ocean City – 136 volunteers swept five miles of the beach and removed 860 pounds of debris.

Ventnor – Students from St. James School and Chelsea Heights School and the Boardwalk Brawlers Roller Derby Team removed 500 plastic bags from the beach.

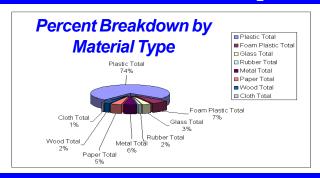


#### FALL:

Oceanville – 250 volunteers from the Forsythe Wildlife Refuge collected 1,250 pounds of garbage.

**Higbee Beach** – Volunteers experienced the negative impacts of marine debris on wildlife when they saw a dead seagull entangled in netting.

# **Snapshot of Results**



## lt's a bird, It's a plane... No...It's a Plastic Bagl

It is evident that plastic bags have become a dreadful and imposing threat to our environment and our ocean. Every year, many marine animals including whales, dolphins, seabirds, and turtles suffer painful injuries and deaths from entanglement or ingestion of plastic bags. Countries such as Australia, Bangladesh, Ireland, Italy, South Africa, Taiwan, India, and China have taken action to ban or reduce the use of plastic bags.

On March 27, 2007, San Francisco became the first city in America to ban non-compostable plastic bags. Other municipal efforts include promoting plastic bag recycling. Of course the best solution is to bring your own bags-- especally reuseable bags-- to the store.

Write to your town's mayor and council today and urge them to adopt a plastic bag ordinance to reduce plastic pollution and to save resources!

Remember, "Plastic Bags Blow." Visit Reusablebags.com for actions to reduce plastic bags.

## **New Jersey's Dirty Dozen**

	Item	2008 Ranking	2007 Ranking	2006 Ranking
41,900	Cigarette Filters	1	1	3
33,282	Plastic Caps & Lids	2	2	1
31,145	Plastic Food Wrappers/Bags	3	3	2
19,616	Plastic Pieces	4	4	5
17,957	Plastic Straws & Stirrers	5	5	6
12,416	Foam Plastic Pieces	6	6	7
11,474	Plastic Beverage/Soda Bottles	7	7	4
6,679	Plastic Cigar Tips	8	8	12
5,757	Paper Pieces	9	11	*
5,523	Plastic Store/Shopping Bags	10	*	8
4,867	Beverage Cans	11	*	*
4,675	Plastic Cap Rings (from bottles	3) 12	12	10
195,291	Total 67% of Total Item	s Colle	cted	

\*Did not qualify for "Dirty Dozen"

The "Dirty Dozen" are the top 12 items most frequently collected and recorded. These items accounted for 67 percent of the debris collected. Overall, plastic items top the list, and cigarette filters hold strong as the #1 piece of garbage found -- 3,881 more than 2007.

"Beach Sweeps are no more complex than having to clean my room. Plus it is a super fun opportunity to help clean and protect a place that I love so much...the ocean." -Leland Kohere, Rumson Fair-Haven High School student

# Roster of the Ridiculous

While all the debris collected from our beaches should be considered unusual or unnatural, the items below are some items that were specifically listed by volunteers as the most unusual found on the beach:

Tool Box Comforter and Sheet Bar of Soap Plastic Crate of Broken Toys 1977 Beach Badge-Bradley Beach **Chritmas Tree Lights** 30 Feet of Construction Fence Refrigerator Door Exxon Drum/Barrel Easter Basket with Plastic Eggs Large Noose Gas Fume Mask Inhaler Jumpsuit Deer Leg

Canoe

2 Sewage Cakes Plastic Truck-Bed Liner **Bottle of Holy Water** American Flag 20 Bags of Dog Poop Vacuum **Bowling Ball** E-Z Chair 500 Pounds of Lumber Containers from Asia Whole Jar of Mayonnaise \$1 & \$20 Bills Ballerina Tutu Beer Keg Packaging from Scotland Ship Brace from Old Ship

High Chair



A collection of ridiculous items found in Sea Bright.

"The Beach Sweeps keep New Jersey's parks clean and accessible and is an integral part of providing a great park experience to the public." -Rick Lear, Beach Captain, Raritan Bay Waterfront Park

## Clean Ocean Action's 2008 Beach Sweeps Results & Data\*



Fall

**Total** 

Percent

**Spring** 

				of Total
6-Pack Holders	234	130	364	0.13%
Food Wrappers/Bags	21,688	9,457	31,145	10.7%
Store/Shopping Bags	3,347	2,176	5,523	1.90%
Trash Bags	1,394	765	2,159	0.74%
Other Bags	2,274	1,406	3,680	1.27%
Beverage/Soda Bottles	7,354	4,120	11,474	3.96%
Bleach/Cleaner Bottles	331	100	431	0.15%
Milk/Water Bottles	945	389	1,334	0.46%
Motor Oil/Lube Bottles	244	79	323	0.11%
Tan Oil/Lotion Bottles	284	193	477	0.16%
Other Bottles	759	666	1,425	0.49%
Buckets/Crates/Bins	280	198	478	0.16%
Caps/Lids	15,418	17,864	33,282	11.5%
Cap Rings	3,134	1,541	4,675	1.61%
Cigarette Filters	19,781	22,119	41,900	14.4%
Cigarette Lighters	626	441	1,067	0.37%
Cigarette Packaging	864	509	1,373	0.47%
Cigar Tips	3,203	3,476	6,679	2.30%
Cups	3,031	1,331	4,362	1.50%
Diapers	93	36	129	0.04%
Fish Bait Bags/Cont.	286	173	459	0.16%
Fishing Line	471	239	710	0.24%
Fishing Lures, Floats	208	229	437	0.15%
Fishing Nets (small)	110	55	165	0.06%
Fishing Nets (large)	9	6	15	0.01%
Fork, Knives, Spoons	2,727	1,683	4,410	1.52%
Light Sticks	148	231	379	0.13%
Pieces of Plastic	11,703	7,913	19,616	6.76%
Ribbon/Tape (no balloon)	1,056	694	1,750	0.60%
Rope (short)	810	353	1,163	0.40%
Rope (long)	178	35	213	0.07%
Sheeting & Tarps	99	21	120	0.04%
Shotgun Shells	362	303	665	0.23%

616

87

10,654

1,981

2,190

119,949

888

82

296

78

7,303

1,338

2,085

90,868

806

31

912

165

3,319

1,694

4,275

210,817

113

17,957

0.31%

6.19% 0.06%

1.14%

0.58%

0.04%

1.47%

72.7%

Strapping Bands

Straws & Stirrers

Vegetable Sacks

**PLASTIC TOTAL** 

Other Plastic

**Tampon Applicators** 

Syringes

Toys

F				
	Spring	Fall	Total	Percent
Building Materials	463	317	780	of Total 0.27%
Buoys & Floats	240	196	436	0.27 %
Cups	2,394	1,635	4,029	1.39%
Egg Cartons	88	29	117	0.04%
Fast Food Containers	643	380	1,023	0.35%
Meat Trays	230	89	319	0.11%
Packaging Material	1,268	460	1,728	0.60%
Pieces of Foam Plastic	8,041	4,375	12,416	4.28%
Plates	334	206	540	0.19%
Other Foam Plastic	1,700	1,012	2,712	0.94%
FOAM TOTAL	15,401	8,699	24,100	8.31%
	MET	ΓAL		
	Spring	Fall	Total	Percent
				of Total
Appliances	9	2	11	0.00%
Batteries (car)	7	1	8	0.00%
Batteries (other)	69	60	129	0.04%
Bottle Caps	2,162	1,751	3,913	1.35%
Cans - Aerosol	164	205	369	0.13%
Cans - Beverage	2,690	2,177	4,867	1.68%
Cans - Food	206	112	318	0.11%
Cans - Other Car Parts	121 62	67 23	188 85	0.06% 0.03%
Cal Faits Crab/Fish Traps	21	6	27	0.03 %
55 Gallon Drums (old)	2	4	6	0.00%
55 Gallon Drums (new)	2	0	2	0.00%
Fishing Hooks	59	34	93	0.03%
Fishing Sinkers	29	20	49	0.02%
Foil	446	311	757	0.26%
Nails	702	1,225	1,927	0.66%
Pieces of Metal	277	169	446	0.15%
Pull & Pop Tabs	204	162	366	0.13%
Wire	323	247	570	0.20%
Other Metal	304	196	500	0.17%
METAL TOTAL	7,859	6,772	14,631	5.05%
	RUB	RFR		
:	Spring	Fall	Total	Percent
	-			of Total
Mylar Balloons (only)	571	305	876	0.30%
Mylar Balloons (w/string)	391	206	597	0.21%
Rubber Balloons (only)	960	372	1,332	0.46%
Rubber Balloons (w/string		279	1,212	0.42%
Condoms	504	152	656	0.23%
Gloves	240	168	408	0.14%
Tires (part)	90	56	146	0.05%
Tires (whole)	28	5	33	0.01%
Other Rubber	366	346	712	0.25%
RUBBER TOTAL	4,083	1,889	5,972	2.06%

## Clean Ocean Action's 2008 Beach Sweeps Results & Data\*

GLASS				
	Spring	Fall	Total	Percent of Total
Beverage Bottles	2,496	1,852	4,348	1.50%
Food Jars	165	64	229	0.08%
Light Bulbs	33	25	58	0.02%
Light Tubes - Fluores	cent 24	3	27	0.01%
Pieces of Glass	1,836	1,952	3,788	1.31%
Pieces of Tile & Cera	mic 365	69	434	0.15%
Other Glass	199	113	312	0.11%
GLASS TOTAL	5,540	4,275	9,815	3.38%

Beach Sweeping in action, "Plastic cap, straw and cigarette butt." One person collects data while the others collect trash.



**PAPER** 

	Spring	Fall	Iotai	Percent
				of Total
Bags	540	458	998	0.34%
Cardboard	583	344	927	0.32%
Cartons/Boxes	351	183	534	0.18%
Cups	1,005	742	1,747	0.60%
Newspapers/Magazin	es 934	620	1,554	0.54%
Pieces of Paper	3,328	2,429	5,757	1.99%
Plates	273	174	447	0.15%
Other Paper	775	650	1,425	0.49%
PAPER TOTAL	7,789	5,600	13,389	<b>4.62</b> %

WOOD

	<b>Spring</b>	Fall	Total	Percent
				of Total
Crab/Lobster Traps	27	12	39	0.01%
Crates & Baskets	34	18	52	0.02%
Ice Cream Spoons/St	icks 548	427	975	0.34%
Lumber Pieces	2,826	1,783	4,609	1.59%
Pallets	42	40	82	0.03%
Other Wood	892	525	1,417	0.49%
WOOD TOTAL	4,369	2,805	7,174	2.47%

CLOTH

pring	Fall	iotai	Percent
			of Total
179	109	288	0.10%
461	295	756	0.26%
247	297	544	0.19%
873	479	1,352	0.47%
884	254	1,138	0.39%
2,644	1,434	4,078	1.41%
	179 461 247 873 884	179 109 461 295 247 297 873 479 884 254	179 109 288 461 295 756 247 297 544 873 479 1,352 884 254 1,138

GRAND TOTALS						
	Spring	Fall	Total			
Items	167,634	122,342	289,976			
Volunteers	2,681	2,482	5,163			
Items Collected						
Per Person	63	49	112			
<b>Pounds of Debris</b>						
Removed	23,681	12,360	36,041			

\*Additional volunteers picked-up debris without completing and returning COA's data cards. Therefore, the numbers in this report are considered conservative.

"It isn't just getting people out for a day to pick up trashcitizens are getting involved in the scientific process, collecting important information, and making people think about the kinds and quantity of debris and where it comes from," Cara Muscio, Beach Captain, Ortley Beach

### TRASH THAT LASTS...

It takes weeks, decades, and generations for litter to break-down in the ocean, harming marine life and polluting our oceans and beaches. Plastics never disappear, but break down into smaller pieces.



Newspaper: 6 weeks



Plastic bag: 10-20 years



Cigarette filter: 1-5 years



Foam plastic cup: 50 years



Aluminum can: 80-200 years



Disposable diaper: 450 years



Plastic bottle: 450 years



Fishing line: 600 years

Source: Pocket Guide to Marine Debris, The Ocean Conservancy © 2003.

Visit COA at www.CleanOceanAction.org



## Citizens "Flip Their Lids" to Improve the Planet

Did you know that most plastic bottle caps are not recycled? Plastic bottle caps are tossed away, filling landfills or becoming litter that often ends-up on beaches and in waterways. Clean Ocean Action (COA) and Aveda, a global leader in environmental sustainability, have launched a simple and easy program, called "Flip Your Lids:" a plastic cap recycling campaign, to engage schools, groups, businesses, families, and individuals to help reduce pollution by collecting plastic caps to be recycled. From these, Aveda creates new 100% post-consumer caps for their products.

AVEDA
the art and science of pure flower and plant essences

Why caps? They may be small...but their numbers add up. For instance - in just six hours during COA's 2008 Beach Sweeps, volunteers removed 33,282 plastic caps and lids from the beaches of NJ. It makes caps the #2 beach litter problem in

2008! Birds and other marine life mistake them for food with tragic consequences.

In the past, COA had no other option but to send the massive amount of plastic cap debris to the landfill, but with the innovative Aveda program the caps are now recycled and reused.

The program also educates citizens about pollution and inspires them to reduce litter, engage in recycling initiatives, and advocates the need to reduce plastic use.

For information about the program, please contact: (732) 872-0111 or citizens@cleanoceanaction.org.



Students from Marine Academy of Science and Technology display their collection of plastic bottle caps from COA's 2008 Fall Beach Sweeps.

#### **WAVES OF THANKS IN 2008 TO:**

\*Beach Sweeps Sponsors and Contributors

\*Nearly 70 Beach Sweeps Captains

\*60 New Jersey Towns and Parks

\*Thousands of Dedicated Volunteers