Plastic Bottle Bill in New Jersey

Finding the facts as to why there is no bottle bill in the state of New Jersey, what a bottle bill is composed of, educate people on the effects of the plastic to the earth, and the benefits of a bottle bill.

Tag Words: plastic bottles; bottle bill; plastic; recycling; carbon; recycling laws

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Summary

In recent years recycling has become a growing issue. The environment has taken a huge hit with the way people are treating the earth. People have become increasingly less conscious about recycling and the amount of wastes they are producing. With carbon footprints growing larger everyday our group has decided to investigate the reasons behind this growing issue. We focused our concern in the state of New Jersey and it’s reasoning behind not having a bottle bill. The state has taken on rules for recycling, but implementing them has not had a great effort. We spoke with politician, Assemblywoman Valarie Vainieri Huttle, to get to the bottom of this epidemic, while also raising awareness to peers at the Rutgers University campus. What we found was that New Jersey is unsure of how to implement this bill, therefore it is constantly being introduced, but never passed.

Video Link

http://www.youtube.com/watch?v=tXjmrPMFJzU
The Issue: Plastic Bottles

Introduction
Currently there is no specialized plastic bottle recycling program in the state of NJ; however, it is a mandatory requirement to recycle plastic bottles upheld by NJ state law. Such legislation is depicted by the New Jersey Statewide Mandatory Source Separation and Recycling Act of 1987 and the New Jersey Recycling Enhancement Act of 2008.

The NJ Statewide Mandatory Source Separation and Recycling Act compelled all twenty-one counties to create recycling plans that decreed that at least three designated recyclable materials be recycled additionally to leaves. Municipalities were required to adopt an ordinance central to their county’s recycling plan. The Recycling Act mandated each county develop a strategy for collection, marketing, and relocation of specific recyclable materials. Overall reduction of municipal solid waste as depicted by percentage recycled rose from the original expectation of 15% in 1987 to 25% in 1988 to 50% to 60% by the remainder of 1995. A tax of $1.50 per ton on solid waste deposited into landfills and transport posts statewide strengthened the Recycling Act and revenues from this tax were credited to the State Recycling Fund wherein was allocated to various recycling related programs within the county. Designated funding source for said programs expired at the end of 1996. The remainder of the funds collected by the Recycling Tax was applied at the local level to maintain recycling coordinator positions (at the municipal and county levels), promotion and education campaigns, school and business recycling programs (master plan revisions to include new establishments) and enforcement functions (publication of recycling provisions every six months, establishment of new tax credit program towards purchasing new recycling equipment, revisions on specific recyclables like plastics and bimetal beverage containers), etc.

Insufficient funding has been deemed one of the chief reasons in the causation of New Jersey’s declining recycling rates. The Recycling Enhancement Act of 2008 signed into law by Governor Jon S. Corzine reestablished the influx of funding for recycling in New Jersey by instating a $3.00 per ton tax on solid waste received for disposal or relocation at in-state waste centers as well as waste traveling out of the state directly or by means of railroad, which replaced the $1.65 per ton tax declared by the Solid Waste Services Tax. The Act entails an eight million dollar subsidy from the General Fund to Recycling Fund used to disperse grants to counties and municipalities. Taxes collected from the Recycling fund will in time replenish the amount derived from the General Fund while in the meantime the allotted monetary pool made available by the Act aids in reinvigorating New Jersey’s programs as a short term cure to the state’s dilemma. Additional aspects of the Act include a required certification course through formal instruction for all municipal and county recycling coordinators, that 60% of the recycling tax fund be applied towards recycling tonnage grants to municipalities and counties, and an ordinance that municipalities must expend respective recycling funds only for its programs involving recycling. Preparation and implementation of solid waste management plans inclusive of employment of goals of the State Recycling Plan and domestic collection of hazardous wastes requires one-fourth the recycling fund. Recycling education and overall public information programs is granted five percent of the fund. NJDEP uses five percent of the recycling fund to issue grants to higher education institutions to conduct research in recycling. The remainder of the five percent is assigned to the Department to be used for recycling program administrative expenses and planning.

Plastic bottles are indeed recyclable in the state of New Jersey. The problem resides in the bottle cap. Caps are made from different plastics than the body of the bottle. Thus, when cap and bottle arrive at the recycling center jointly, recycling becomes complicated. Plastic bottles are produced from polyethylene terephthalate (PET) (plastic #1), 23% of all bottles, or high density polyethylene (HDPE) (plastic #2), 62% of all bottles especially accounting for bottled water. The caps are manufactured from a variety of compounds such as high density polyethylene (plastic #2), low density polyethylene (LDPE) (plastic #4) or polypropylene (PP) (plastic #5). Polyethylene caps are readily discernible, characterized by being easily deformed when squeezed or bent with one’s fingers. These caps are recyclable in local recycling centers essentially because they are composed of the same material as that of the body of the bottle. Caps that can not be recycled, polypropylene derived, are characterized by having a screw thread.
The polypropylene caps are inflexible and more rigid than polyethylene caps. Thus this difference in cap
directly hinders processes related to collection and decomposition of plastic bottles. Initiative has been
underway in combat of the cap dilemma by the formation of privately run recycling schemes specialized
in only recycling caps from said bottles; Aveda plastic cap recycling is an example of one of these
initiatives.

When recycled correctly these plastics give rise to many useful products. In high demand is
sanitized, recycled PET pellets and flakes necessary for spinning fiber for carpet yarns, manufacturing
gotextiles and fiberfill. Other items rendered from recycled PET include fleece jackets, tote bags, and
containers for food, beverages (bottles), and non-food items. Recycled HDPE is also used for non-food
items like antifreeze, liquid laundry detergent, motor oil, etc as well as for outdoor decking in plastic
lumber, picnic tables, fencing. Additionally, recycled HDPE can be used to produce pipe, floor tiles,
crates, flower pots, garden edging, recycling bins, etc. Garbage can liners, floor tile, paneling, furniture,
compost bins, trash cans, landscape timber, outdoor lumber, etc are rendered from recycled LDPE.
Lastly, recycled PP is manipulated to yield shipping pallets, bicycle racks, battery cables, signal lights and
battery cases for cars, etc.

Unfortunately, only 1 of 4 plastic bottles manage to reach the recycling center. The remaining
bottles clog our landfills unable to decompose for 700 years due to inhibitors added by retailers. New
Jersey must take action soon. The New Jersey Statewide Mandatory Separation and Recycling Act
evidently is not being observed adequately by the residents of this state. Furthermore, the New Jersey
Recycling Enhancement Act has made but a dent in curbing solid waste disposal. More is needed. An
incentive program such as a plastic bottle redemption scheme should be employed thereby encouraging
residents to recycle frequently and eventually daily. The 2010 NJ bottle bill has been introduced yet
faces much opposition. The New Jersey Smart Container Act essentially beckons a 10¢ and 20¢ deposit
on all personal beverage containers and institutes a redemption system for the state. This bill was molded
mainly after Michigan’s bill which employs the 10¢ application, yet also from other states. Two primary
provisions similar to that of Michigan’s bill include the following: 75% of the unclaimed deposits are to
be kept by the State, 25% would be redistributed proportionately to retailers and redemption centers by
the State Treasurer for management costs that is determined by the total number of beverage containers
redeemed as depicted in the certified monthly reports; unclaimed State deposits would be redirected for
deposit in an environmental fund to cover administration costs, public education and enforcement
programs, and issuance of grants for differential environmental projects inclusive of land preservation,
litter cleanup, and public area beautification events.

II. Facts About Bottle Bills

A bottle bill is also called a container deposit law. This is a law that requires a refundable deposit
on a container for a beverage to make sure that these containers are being recycled. This law provides
the minimum refund deposit on beer, soft drinks, and other beverage containers. This is to ensure that there is
a good amount of recycling and reusing being implemented (Bottle Bill).

The way a bottle bill works is a retailer will buy from a distributor. A deposit is then paid to the
distributor for each can or bottle that they purchase. When a consumer buy the bottle, they pay the deposit
to the retailer. When the consumer returns the container to the store, redemptions counter or a reverse
vending machine, the deposit is refunded to the retailer. The retailer get the deposit for the distributor and
the handling fee. This fee is usually anywhere from 1 to 3 cents. The fee covers the costs of the handling
containers. The cost of the distributors and bottlers is offset by the sale of scrap cans and short term
investments made by the deposits that are collected from the retailers. Also, distributors and bottlers
realize that there will be a windfall profit on the beverage containers that consumers do not return for the
refund. Here is a chart that explains this process (Bottle Bill):

In most states the unclaimed deposits are the property of the distributors and bottlers in most states, and amount to millions a year. However, Michigan and Massachusetts have passed a law that states these unclaimed deposits are “abandoned” by the public and belong to the state. They are then used for environmental programs in these states. In Hawaii and California the state collects the deposits not claimed and are used to administer a deposit system.

How can we benefit:

- Prevent litter
- Promote Recycling and Reduce waste
- Create jobs
- Receive widespread public support
- Encourage producer and consumer responsibility
- Create more opportunities to recycle
- Produce high-quality recyclable materials
- Complement curbside recycling
- Environmentally significant
- Provide financial incentives for recycling

III. Current Bottle Bills

Many states, including New Jersey, currently do not have any bottle bills. A bottle bill, also referred to as a container deposit law, institutes a refundable deposit on all beverage containers sold in an applicable state. The law is implemented in order to try and increase the amount of recycling and to try and encourage a high rate of recycling in that state. States with current bottle bills include California, Connecticut, Delaware, Hawaii, Iowa, Maine, Massachusetts, Michigan, New York, Oregon, and Vermont.

The first state to implement a container deposit law was Oregon and it went into effect in 1971 (Law Server). Since this time, only a few other states in the U.S. have followed along and implemented their own container deposit law. California implemented its own bill in 1986 that requires a 2.5- cent
deposit on bottles less than 24 ounces and a 5-cent deposit on all other bottles. Instead of returning these bottles to the retailers as is done in most other states to receive your refunded deposit, California residents must return their used bottles to redemption centers to collect their refund (SERC online). Any unclaimed deposits within the state are used to support additional recycling and its infrastructure (SERC online). Since the implementation of the bill, California’s recycling facilities have more than doubled from 375 to around 1,000 today (Bill 371). Connecticut established its container deposit law in 1980 and requires a 5-cent deposit on all beverage containers. Unlike California, used bottles may be redeemed for a deposit refund at retailers or distributors alike. Also, Connecticut does not use unclaimed deposits to fund recycling programs, but rather the beverage distributors keep the unclaimed funds (SERC online). Delaware enacted their version of a bottle bill in 1982 which requires a 5-cent deposit on all beverage containers with the exception of aluminum cans. Due to the fact that aluminum cans are not included in their bill, the state has not seen substantial declines in litter when compared to other states with similar laws. In 2002, Hawaii passed a beverage container law requiring a 5-cent deposit on all beverage containers. Any unclaimed deposits, which can be collected at retailers or redemption centers alike, are used to support their recycling infrastructure. In order to help fund the redemption centers, Hawaii requires that beverage distributors pay a fee between 1 to 1.5-cents per container (SERC online). Iowa enacted their deposit law in 1978 but expanded theirs to include wine and liquor bottles. In addition, the state provides a handling fee that is used to compensate retailers for the cost of redeeming and handling empty containers (SERC online). The state of Maine established its version of a bottle bill in 1976 but became the first state to include a deposit law on juices, teas, sports drinks and bottled water (SERC online). In 1989, Maine revised this law to include wine and liquor containers as well. In 1981, Massachusetts passed its bottle bill which required a 5-cent deposit on beverage containers. However, in 1983 a law was enacted to place a 10-cent deposit on containers 32 ounces or greater and a 5-cent deposit on containers that are less than 32 ounces (Bill 371). Massachusetts’s law differentiates itself from others by allowing the state to claim the funds of any unclaimed container deposits. Michigan enacted its bottle bill in 1976 that requires a 10-cent deposit on beverage containers. Although this deposit is high in comparison with other states with similar laws, Michigan has reported that litter from beverage containers has decreased drastically and has been virtually eliminated (SERC online). New York requires consumers to pay a 5-cent deposit on beverage containers. New York’s bottle bill was passed in 1983 but has recently been under discussion for revision. The revisions would include deposits on non-carbonated beverages and permit all unclaimed deposits to become property of the states Environmental Protection Fund (SERC online). The state of Oregon first enacted its bottle bill in 1971 and requires a 5-cent deposit on beverage containers. Vermont passed its version of a container deposit law in 1972 and was the first to include a handling fee for retailers. Originally the state enforced a handling fee of 20 percent of the deposits value but in 1990 it was changed to 3-cents per container. This handling fee has allowed the state to fund numerous redemption centers which make it convenient for consumers to redeem their empty beverage containers (SERC online).

Recycling of beverage containers by ton is higher among the states enforcing a container deposit law than of all other states combined (Bill 371). Recently, Congress has been discussing the impacts and benefits of instituting a national bottle bill but several concerns surround such an act (Bill 371). The costs associated with sorting, storing, and transporting these containers is slowing the implementation of such a bill as well as the fear of lost beverage sales and fraudulent redemptions (Bill 371).

States that do not currently have a bottle bill are hindered by the potential problems such a bill could posses. Lack of funds to support such a program is the main focus in many states including Kentucky, which has reviewed the idea of implementing a container deposit law. Potential problems would include additional disposal fees, cross border shipping, fraudulent redemption, handling fees, inconvenience of redemption, job loss, the market for recyclables, and a lack of infrastructure (Bill 371). In an interview conducted with Assemblywoman Valarie Vainieri Huttle, she states the reason New Jersey addressed a bill but is never passed is because:

"Unfortunately, while many legislators and others support the concept of the legislation, there is still concern over how best to implement a bottle bill. States that have similar laws have taken a
variety of approaches regarding where the bottles should be deposited and how much the refundable deposit should be. In states with lower refundable deposits, there is less incentive to return bottles and therefore a lower rate of recycling bottles. If the refundable deposit amount is made too high however, there is concern over the burden that might place on consumers.”

States such as Iowa and Massachusetts saw a drastic decline in the sale of containers requiring a deposit once the bill was enacted (Bill 371). Some distributors in these states were even forced to shut down due to the decline in sales (Bill 371). States view this as a major threat, fearing job loss and lost revenue. Although sales declined, within five years, sales were back to pre-bottle bill levels (Bill 371). These problems pose potential economic risks to an already cash strapped nation. However, if enacted properly, such a bill can have a positive impact not only on the environment but economically as well. Other states such as Michigan have reported a net gain of 4,888 new jobs due to the implementation of their bottle bill and roadside litter was reduced by 38% within 10 years (Bill 371). Additionally, Massachusetts reports that their programs environmental and economic benefits range from $47-$73 million each year (Bill 371). Farmers in Iowa have described increased environmental benefits from their states bottle bill by stating that there is less litter in their fields, which could potentially harm or break equipment (Bill 371).

Bottle bills or container deposit laws are achieved by placing refundable deposits on plastic bottles sold in state. A retail store must not only purchase the bottles but also pay a deposit for each bottle purchased. The retailer, in turn applies this fee to the consumer when purchased. When the consumer returns the bottle to the retailer, his or her deposit is refunded. The retailer then recovers the deposit from a distributor while also receiving a small handling fee, usually ranging from 1-3 cents (Law Server).

Unclaimed or unredeemed deposits amount to millions of dollars per year and generally remain with the distributor. States such as Michigan and Massachusetts have ruled that any unclaimed deposits become the property of the state because the public abandons them. These unclaimed funds are then used to fund various environmental programs conducted in the state. Hawaii and California also receive the unclaimed deposits and use them to fund the organization of a bottle deposit system. The deposits made on bottles are essentially a way to make the consumer responsible for his or her waste.

States that have implemented bottle bills have seen great success. These states have seen an increase in recycling along with a reduction in accumulated litter. Seven states reported a 70-83% decrease in beverage container litter and almost a 50% reduction in total litter. Connecticut alone has seen a 50%-85% reduction in litter since the bill was enacted (SERC online). Consumers cannot bring any bottle to a state that implements a bottle bill. A deposit must have been paid first and the bottle must have been purchased in that state in order to receive any refund. It is illegal to collect a refund on a bottle purchased in another state.

IV. Benefits of Recycling

Environmental problems have become so complex that many individuals feel they can have no effect on them. Problems like global warming, hazardous waste, loss of rain forests, endangered species, acid rain, the ozone layer, and the municipal waste crisis can feel out of our control. At the very least, these problems, require group and corporate action or government intervention.

It has become clear that the perceptions regarding recycling are changing. The data and statistics from various government sources reveal that a whopping $20 million could be saved every year if we all adopted the habit of recycling (Harrison). Essentially, the profits that most of us continue to reap are the result of those individuals that have decided to get behind the process of recycling.

Recycling assists in lowering the cost of manufacturing new products. Creating new products expends much more energy than using the materials that can be gathered from recycled
items. This means that the cost of waste collection, sorting and incineration is still much lower than starting from scratch.

However, the individual can control some things. Our waste reduction and recycling activities can make a difference. Most of the reasons we recycle are environmental, although some are economic. These include:

A: Too Much Garbage

One of the main reasons for recycling is to reduce the amount of garbage sent to landfills. Landfill usage peaked in the 1980s, when Americans sent almost 150 million tons (136.08 million metric tons) of garbage to landfills each year. Today, we still dump more than 100 million tons (90.719 million metric tons) of trash into landfills annually. Even though modern sanitary landfills are safer and less of a nuisance than the open dumps of the past, no one likes having a landfill around. In heavily populated areas, landfill space is scarce. Where space is plentiful, filling it with garbage is not a very good solution to the problem. Today, recycling efforts in the United States divert 32 percent of waste away from landfills. That prevents more than 60 million tons (54.432 million metric tons) of garbage from ending up in landfills every year (Grabianowski).

B: Pollution from Landfill Leachate

Landfills cause another problem in addition to taking up lots of space. The assortment of chemicals thrown into landfills, plus the chemicals that result when garbage breaks down and blends into a toxic soup known as leachate, creates huge amounts of pollution. Leachate can drain out of the landfill and contaminate groundwater supplies. Today, impermeable clay caps and plastic sheeting prevent much of this run off, making the landfills much safer than they were just a few decades ago. Still, any leachate is too much if it is draining into your neighborhood (Grabianowski).

C: New Goods Use Up Resources

Making a brand-new product without any recycled material causes natural resources to deplete in the manufacturing process. Paper uses wood pulp from trees, while the manufacture of plastics requires the use of fossil fuels like oil and natural gas. Producing goods from recycled materials results in using fewer natural resources (Grabianowski).

D: Recycling (Sometimes) Uses Less Energy

There is room for debate on this aspect of recycling, but many recycling processes require less energy than it would take to manufacture the same item brand-new. Manufacturing plastic is very inexpensive, and some plastic goods can be difficult to recycle efficiently. In those cases, the recycling process probably takes more energy. It can also be difficult to weigh all the energy costs along the entire chain of production. Recycling steel certainly uses less energy than the entire process of mining iron ore, refining it and forging new steel. Some contend that the fleet of recycling trucks collecting plastic and paper door to door every week in cities across the United States tips the balance of energy out of recycling favor. Energy use is a factor weighed on a case-by-case basis (Grabianowski).

E: Money
Recycling has a variety of economic impacts. For the companies that buy used goods, recycle them and resell new products, recycling is the source of all their income. For cities in densely populated areas that have to pay by the ton for their landfill usage, recycling can shave millions of dollars off municipal budgets. The recycling industry can have an even broader impact. Economic analysis shows that recycling can generate three times as much revenue per ton as landfill disposal and almost six times as many jobs. In the St. Louis area, recycling generates an estimated 16,000 jobs and well more than $4 billion in annual revenue (Grabianowski).

F: Benefits of Recycling at Rutgers University

The goal of the bottle water bill is to conserve scarce resources, and limit wastes from hurting the environment and people. The water bill specifically will help address the issues of bottle water use on campus. New Jersey requires it by law to recycle, but we are aiming to make it the same on campus. There are five main areas where recycling can be beneficial: Oil, greenhouse gas emissions, energy, reuse, and landfill space.

We can limit the use of oil by recycling. Oil is a commodity that is used in almost all facets of production in our world. We can even see how the rising price of oil affects us in our daily lives. Excess consumption of oil causes prices to rise. Oil is the cornerstone of any assembly line or production process. Companies derive the prices of the products or services they sell by the cost of production, thus the rise of oil will make the cost of production higher. This makes all consumer products whether they are necessities or simply wants more expensive. This includes items such as gas and food. We are able to see how our lives have changed when prices of goods or services have hiked in the past. People don't have the disposable income to purchase the same basket of goods because of rising prices. This can lead to less well-off individuals not being able to properly afford the necessities in life. This is an indirect effect of not recycling. Nearly 10 percent of U.S oil consumption, or roughly 2 million barrels a day are is used making plastics (Bloch 2010). We can see here how recycling plastics also means saving oil, which is through the production process and base materials. We are able to see the ill-effects of not recycling from the aspect of oil. These effects can all be mitigated by simply recycling our plastic.

Resources are finite on the earth's surface. Fossil fuels and metals can’t be replenished by nature anytime soon. This provides risk not for us, but rather the future generations. The more we extract now, the less we will leave for future generations. Conserving resources and making smarter decisions on how to use our resources will be paramount in preserving them. If we continue to recycle, there will be less of a need for raw materials, less need for physical land capital.

Recycling one plastic bottle, not only saves centuries of time in the landfill, but saves the environment from energy and emissions in producing new bottles, and the resources involved in that process. The manufacturing process, which includes extraction of materials from the earth, releases waste that pollutes the environment. For example, chemicals used in the production process can pollute the environment via the water used in the process, especially if its not treated properly before being released into the environment. During the disposal process, chances increase for chemicals to be released into the environment causing harm to both humans other living beings.

It can also reduce greenhouse emissions because it requires less energy to for new manufacturing recycled material. Recycling does not consume much energy, but provide a smart alternative choice to save energy. Recycling includes reuse into various other products besides plastic. Finally, it will save space in our landfills. One of the biggest problems we face today is landfill space. By expanding the awareness of recycling, every effort to recycle will save valuable land space room. Overall, the future benefits will include saving the environment from more harm, conserving energy, and wisely using our resources.

V. Recycling Benefits / The Economy:

In the United States alone, the recycling effort is responsible for almost 1.1 million jobs. That number is expected to rise since initiatives are in place to assist others in getting behind the recycling movement.
Further, recycling is reportedly creating $37 million in salaries annually. Both the private sector and the public sector continue creating more and more jobs in this field.

According to Reborn, an Australian blog dedicated to the problem of e-waste (old computers, appliances, cell phones, etc.):

"Environment Victoria [Australia] today released a report on the opportunities for green jobs in that state. The report includes five case studies on the potential for green job creation in different industry sectors. The recycling case study estimates that 2,310 new jobs can be created in resource recovery, including 210 as a result of improved e-waste recycling."

When you consider that Victoria represents only 24% of Australia, the numbers represented in this case study offer a lot of hope for the future (Harrison).

A: Recycling Benefits / Stats

Participating in the green movement will save 15 trees from being destroyed if we recycle only 1 ton of paper. Does 1 ton sound like a lot? Maybe, but not when you consider that approximately 1.5 million tons of construction products are made each year from paper, including insulation, gypsum wallboard, roofing paper, flooring, padding and sound-absorbing materials.

In the United States 56% of the paper used was recovered for recycling during the last year. This paper when recycled produces almost 74% less pollution than making new paper and almost 50% less water is required for this purpose. Almost 48% of the paper recycled from the offices is again used to produce tissues, raw material used for paperboard and for printing purpose. The more that individuals and businesses participate in recycling the more our planet will give to us. Some of the gifts that Mother Earth will bestow upon us are fresh water, clean air, healthy wildlife, litter-free shorelines, and a thriving and abundant plant life (Harrison).

VI. Rules and Regulations for Recycling in New Jersey and What we Can do to Help

According to Recycling NJ, there are mainly two different types of plastics that are used to make plastic bottles. First would be the thin, see through bottles that are used for water, soda, shampoo and some cooking oil bottles. This plastic is called polyethylene terephthalate. The other kind is tougher and is made for detergents and milks, made from high density polyethylene.

The actual act of recycling is more simple than we think. However there is a small pit of information that most people are unaware of that can cause their recycle to not get recycled. The culprit lies in the cap. To recycle the bottles you can put them in the recycle bins that are collected curbside. The different types of plastic do not need to be separated when in the bins either. To recycle the bottles you have to follow a few simple rules. First, you should rinse the bottles out and remove all caps. The caps are the tricky part of recycling. Each town has different restrictions as to which caps can and can not be added to the recycling wit the bottles. Each cap can be made from different types of plastic. It can be made from polyethylene 2 or 4, or polypropylene 5. If you include the cap it can contaminate recycled plastic if it is a different chemical than the bottle. The polyethylene caps are made to be bendable such as milk jug caps. The polypropylene cap, normally the screw on caps, are tough and not able to bend by hand. Normally, to recycle the caps there are locations for drop off in the state of New Jersey (Recycling NJ).

In an interview that was conducted with Assembly woman Valerie Vainieri Huttle the state of New Jersey could get people involved by contacting the state representatives and ask them to support the legislation and sign on as cosponsors. Assembly woman Huttle also states that you could send letters to Governor Christie asking for his support in the legislation because, “even if it passes both houses of legislature, the Governor still has the ability to veto the bill and his support is vital.”
The Service Project: Raising Awareness

As a group we decided it would be best to make education people about recycling and the effects of not recycling fun. We conducted a question answer game on College Ave in New Brunswick New Jersey. We had a table set up outside of Scott Hall and asked people walking by what they knew. A lot of people did not know what a Bottle Bill was, but we educated them. Also, we started a petition. We got about 120 signatures. We sent them the Assemblywoman Huttle and she said she would pass it on for us. We documented our experience and made a video.

References

"Assembly Woman Valerie Vainieri Huttle." E-mail interview. 16 Oct. 2010.


**Editorials**

**Bottle Bill in New Jersey**

By: Samantha Falcone

A bottle bill is the minimum refundable deposit on a soft drink, beer, and other beverage containers. The reason a bottle bill exists is because it increase the rate of recycling and reuse. The way a bottle bill works is a retailer buys the drinks from a distributor. At this time a deposit is paid to the distributor for each drink purchased. When a consumer returns the empty container to the retail store or redemption center, or even a reverse vending machine, the deposit initially made is refunded. The retailer gets the deposit, and an additional handling fee from the distributor which more than likely will cover the cost of handling the containers.

A lot of states have a Bottle Bill, unfortunately New Jersey does not. This, to me, makes no sense. The Bottle Bill could help with funding for states through unredeemed deposits, and would make consumers and producers be held responsible for their wastes. It also would prevent some litter, promote recycling and reduce waste, create more jobs, there would be financial incentives, and help the environment tremendously.

Some states that already participate in having a Bottle Bill benefit from it. The unredeemed deposits in California, Connecticut, Hawaii, Maine, Massachusetts, Michigan, and New York are sent to a tax assessor, and then go to a general fund for the state. These fund can help in other areas that the state needs financial support for.

It baffles me as to why New Jersey state does not have such a bill. It has been talked about for quite some times but just keeps getting put on the back burner. It has been brought up for the past couple years, bills drawn up and everything, but never processed. Why!? Especially now with these tough economic times, and the environment the way it is, why not pass this bill. It could create jobs, revenue, and also save our planet. What is New Jersey waiting for?

Sent to: The Asbury Park Press

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**Mountain of Waste**

By:
Mitesh Patel

Millions of people buy water bottles daily of which 20 percent of the bottles end up at landfills. Most people do not realize that the meager convenience they receive from consuming a one time use water bottle is putting an even greater inconvenience on the Earth. The average time for a plastic bottle to biodegrade fully is approximately 450 – 1000 years. At the rate we are consuming water bottles now, we will not find an equilibrium point for when water bottle consumption equals water bottle biodegradation. Therefore it is certain that we cannot continue storing plastic in landfills forever.
Then what can we do? Well, there are so many different options; reusable water bottles, water filters, etc. The question resides on whether we have enough character to find these alternatives and follow through. The ability to face hardships, inconvenience being a minimum hardship, defines the character of a human being. We have been given the intellect to decide whether to use disposable water bottles and harm the Earth or find a safer alternative. Are we just impulsive creatures whose goals are to fulfill every desire or can we use our intellect to decide what is better for humankind in the long run?

I believe it comes down to humankind to decide the fate of humankind. Currently, we have mountains of waste sitting on our beautiful planet. Does it seem logical to continue with our ways or should we change and care about each other and as a result the planet? The choice is in everyone’s hands. If not now, then when?

Sincerely,
Mitesh Patel

Bottle Up Your Plastic Use – Rutgers

Dear Editor (letters@nytimes.com),

Whether you’re sitting in class, on a crowded bus especially at peak hours, or just strolling down the Ave, you will notice people carrying these plastic items filled with one of life’s essentials. Yes, they are the convenient water bottles sold by many different providers Dasani, Aquafina, and Poland Spring to mention a few. It is ironic, that one of life’s essentials is sold in such a receptacle that may also cause us harm in the future because the negligence of students of recycling. People take a sort of short-term gain for a long-term hit. You can’t blame one for wanting to remain healthy and drink enough water, especially when stuck in one of the overcrowded Rutgers buses during rush hour. However, there needs to be some solution for the campus to move towards becoming more conservative and environmentally-friendly.

One solution can be to just cap the sales or availability of bottled water on campus. Once the contract for the school with Pepsi is finished, bottled water can be left out for the next contract. As an alternative, the school can provide water stations, where filtered water will be available free for all students. They just need to bring their own water reusable water bottles. This solution will provide a solution without taking much away from the students. It would just help the student body move towards a more conservative direction.

Sincerely,
Ankur Patel

Steve Siferski
11/2/2010
Gloucester County Times
NJ Water Bill

Despite environmental advantages and cost effective strategies, a bottle bill has yet to be implemented within the state of New Jersey. Efforts have been undertaken to promote recycling with the signing of the NJ Statewide Mandatory Source Separation and Recycling Act but the bill does not emphasize the recycling of plastic bottles. New Jersey does in fact recycle plastic bottles, however, there are certain stipulations concerning plastic bottle recycling. Plastic bottles are only
accepted if the bottle cap has been removed. The general public is vastly unaware of this stipulation because of the lack of information regarding this issue. A bottle bill or a container deposit law would circumvent this problem by requiring a refundable deposit on containers in hopes of encouraging a high rate of recycling. When the consumer returns the bottle to a manufacturer or retailer, he or she will be refunded the deposit cost. This will not only encourage consumers to recycle, because they are receiving cash for the bottles they would normally throw away, but also help fund environmental programs within the state. Unclaimed deposits that are deemed “abandoned” could be used by the state to fund environmentally friendly programs such as cleaning up litter or restoring parks.

There are many advantages to implementing such a bill. It would help reduce waste being deposited in landfills, prevent litter, promote recycling, create jobs, encourage producer and consumer responsibility, financial incentives, and provide an environmentally conscious society. In addition, it would not produce a financial burden on consumers due to the fact the deposit per bottle would be only 2-3 cents. If a bottle bill were to be established in the state of New Jersey, the state as a whole would benefit without any residual effect on the consumer.

Current Recycling Programs in NJ – NJ Bottle Bill
By Melanie Simon

Why is the state of New Jersey lacking an incentive program for recycling, specifically bottles? Bottles serve as pollutant when discarded; however, when reused or replaced by reusable bottles it saves our landfills and overall our Earth.

Currently there is no specialized plastic bottle recycling program in the state of NJ; however, it is a mandatory requirement to recycle plastic bottles upheld by NJ state law. Such legislation is depicted by the New Jersey Statewide Mandatory Source Separation and Recycling Act of 1987 and the New Jersey Recycling Enhancement Act of 2008.

The NJ Statewide Mandatory Source Separation and Recycling Act compelled all twenty-one counties to create recycling plans that decreed that at least three designated recyclable materials be recycled additionally to leaves. Municipalities were required to adopt an ordinance central to their county’s recycling plan. The Recycling Act mandated each county develop a strategy for collection, marketing, and relocation of specified recyclable materials. Overall reduction of municipal solid waste as depicted by percentage recycled rose from the original expectation of 15% in 1987 to 25% in 1988 to 50% to 60% by the remainder of 1995. A tax of $1.50 per ton on solid waste deposited into landfills and transport posts statewide strengthened the Recycling Act and revenues from this tax were credited to the State Recycling Fund wherein was allocated to various recycling related programs within the county. Designated funding source for said programs expired at the end of 1996. The remainder of the funds collected by the Recycling Tax was applied at the local level to maintain recycling coordinator positions (at the municipal and county levels), promotion and education campaigns, school and business recycling programs (master plan revisions to include new establishments) and enforcement functions (publication of recycling provisions every six months, establishment of new tax credit program towards purchasing new recycling equipment, revisions on specific recyclables like plastics and bimental beverage containers), etc.

Insufficient funding has been deemed one of the chief reasons in the causation of New Jersey’s declining recycling rates. The Recycling Enhancement Act of 2008 signed into law by Governor Jon S. Corzine reestablished the influx of funding for recycling in New Jersey by instating a $3.00 per ton tax on solid waste received for disposal or relocation in-state waste centers as well as waste traveling out of the state directly or by means of railroad, which replaced the $1.65 per ton tax declared by the Solid Waste Services Tax. The Act entails an eight million dollar subsidy from the General Fund to Recycling Fund used to disperse grants to counties and municipalities. Taxes collected from the Recycling fund will in time replenish the amount derived
from the General Fund while in the meantime the allotted monetary pool made available by the Act aids in reinvigorating New Jersey’s programs as a short term cure to the state’s dilemma. Preparation and implementation of solid waste management plans inclusive of employment of goals of the State Recycling Plan and domestic collection of hazardous wastes requires one-fourth the recycling fund. Recycling education and overall public information programs is granted five percent of the fund. NJDEP uses five percent of the recycling fund to issue grants to higher education institutions to conduct research in recycling. The remainder of the five percent is assigned to the Department to be used for recycling program administrative expenses and planning.

Plastic bottles are indeed recyclable in the state of New Jersey. The problem resides in the bottle cap. Caps are made from different plastics than the body of the bottle. Thus, when cap and bottle arrive at the recycling center jointly, recycling becomes complicated. Plastic bottles are produced from polyethylene terephthalate (PET) (plastic #1), 23% of all bottles, or high density polyethylene (HDPE) (plastic #2), 62% of all bottles especially accounting for bottled water. The caps are manufactured from a variety of compounds such as high density polyethylene (plastic #2), low density polyethylene (LDPE) (plastic #4) or polypropylene (PP) (plastic #5). Polyethylene caps are readily discernable, characterized by being easily deformed when squeezed or bent with one’s fingers. These caps are recyclable in local recycling centers essentially because they are comprised of the same material as that of the body of the bottle. Unrecyclable caps, polypropylene derived, are characterized by having a screw thread. The polypropylene caps are inflexible and more rigid than polyethylene caps. Thus this difference in cap directly hinders processes related to collection and decomposition of plastic bottles. Initiative has been underway in combat of the cap dilemma by the formation of privately run recycling schemes specialized in only recycling caps from said bottles; Aveda plastic cap recycling is an example of one of these initiatives.

Unfortunately, only 1 of 4 plastic bottles manage to reach the recycling center. The remaining bottles clog our landfills unable to decompose for 700 years due to inhibitors added by retailers. New Jersey must take action soon. The New Jersey Statewide Mandatory Separation and Recycling Act evidently is not being observed adequately by the residents of this state. Furthermore, the New Jersey Recycling Enhancement Act has made but a dent in curbing solid waste disposal. More is needed. An incentive program such as a plastic bottle redemption scheme should be employed thereby encouraging residents to recycle frequently and eventually daily. The 2010 NJ bottle bill has been introduced yet faces much opposition. The New Jersey Smart Container Act essentially beocks a 10¢ and 20¢ deposit on all personal beverage containers and institutes a redemption system for the state. This bill was molded mainly after Michigan’s bill which employs the 10¢ application, yet also from other states. Two primary provisions similar to that of Michigan’s bill include the following: 75% of the unclaimed deposits are to be kept by the State, 25% would be redistributed proportionately to retailers and redemption centers by the State Treasurer for management costs that is determined by the total number of beverage containers redeemed as depicted in the certified monthly reports; unclaimed State deposits would be redirected for deposit in an environmental fund to cover administration costs, public education and enforcement programs, and issuance of grants for differential environmental projects inclusive of land preservation, litter cleanup, and public area beautification events.

Support NJ in efforts of passage of this bottle bill! Recycling incentives via redemption centers shall increase public recycling in turn yielding countless economic and environmental benefits.