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Testimony of Marla G. Simpson, City Chief Procurement Officer and Director of Citywide Environmental Purchasing, Before the City Council Committees on Sanitation and Solid Waste Management and Contracts: Compliance with Environmentally Preferable Purchasing Laws

January 27, 2012

Good morning Chair James, Chair Mealy and members of the Sanitation and Solid Waste Management and Contracts Committees. I am Marla G. Simpson, Director of the Mayor's Office of Contract Services (MOCS). By designation of Mayor Michael R. Bloomberg, I also serve as the City's Director of Environmental Purchasing, so I am pleased to be here to discuss our ongoing implementation of the City's environmentally preferable purchasing (EPP) standards. This program was set forth, as you know, in a series of five local laws adopted by the City Council in 2005:

- Local Law 118 established the Director position, as well as the categories of standards and reporting requirements.
- Local Law 119 addressed energy and water efficiency standards.
- Local Law 120 addressed the issues of hazardous content of various products.
- Local Law 121 established standards for recycled and recovered materials content of certain types of goods, and also addressed the use of printers and copiers.
- Local Law 123 addressed the use of green cleaning products.

This Administration shares the goals of environmental sustainability embodied in the EPP laws. Indeed, one of the main challenges in administering the EPP program has been, as I will illustrate, the fact that these laws apply to only a relatively small proportion of our overall procurement volume. The overwhelming majority of the City's construction portfolio falls under the Green Buildings regulations, and most of our goods purchases relate to product types – such as food, fuel, vehicles and heavy industrial equipment – to which the EPP laws also do not apply. Thus, the contracts to which EPP does apply are few and far between.

Nevertheless, working with the agencies whose missions require them to purchase and use the products covered by the EPP laws, MOCS has implemented the EPP program and is now poised to expand these regulations in a number of key areas, which I will highlight. In this testimony, I will catalog the areas where we have made progress, and will also identify the areas where we are currently seeking to address the remaining EPP mandates.

Under Local Law 118, all City agencies have appointed an environmental purchasing officer (EPO), who is typically the Agency Chief Procurement Officer (ACCO) or a deputy. EPOs work with MOCS to ensure compliance with the EPP standards. Attached to this testimony is a list of the City's EPOs. MOCS has established an EPP-related training curriculum for EPOs and other agency procurement staff, offered through the Procurement Training Institute. The Environmentally Preferable Purchasing and Green Buildings class is a well-attended, day-long training course that provides class participants an overview of the EPP standards, exemptions and reporting provisions as they relate to design and construction projects. Some of the topics include how these standards are to be incorporated into both Requests for Proposals and competitive sealed bid packages.

Also under Local Law 118, MOCS reviews the EPP regulatory landscape each year, publishing citywide data as part of the annual procurement indicators report, which is used both to ensure compliance by the agencies and to consider any potential modifications or additions to the standards. Taking Fiscal Year 2011 as an example, the report describes the specific types of commodities that are subject to the EPP standards. Most of these goods fall within the purview of DCAS, which under the City Charter is mandated to purchase commodities on a centralized basis. For detailed information concerning the products subject to EPP standards that were purchased During Fiscal Year 2011, I have attached to this testimony copies of the report's EPP appendix.

However, even that list of products does not begin to tell the story of the City's EPP track record for the year, as DCAS purchased quite literally hundreds of millions of dollars worth of other types of products – not governed by any of the types of standards listed in the EPP laws – that also furthered New York City's greater, greener agenda. During Fiscal Year 2011, DCAS also registered over $100 million worth of contracts for such goods as hybrid vehicles, biodiesel fuel, healthy food products and various types of equipment to enable the Department of Environmental Protection (DEP) to protect the City's water supply, to name but a few.

Before I turn to some of the specific categories of EPP standards, I would like to note that Local Law 118 also allows the City a significant amount of discretion to waive the applicability of the EPP standards and/or to declare substantial dollar volumes of purchases to be categorically exempt. We have applied the various legally-mandated exemptions contained in the bill, meaning that EPP standards are not applied to emergency purchases, small purchases or purchases off of state and federal contracts. But we have not formally issued any waivers or taken any of the categorical exemptions to the EPP standards that are permitted under the law.

The City initially implemented the energy efficiency and water use standards that are specified in Local Law 119 for our direct goods purchases, incorporating the EPP requirements in bid specifications for all covered procurements. Since the enactment of Local Law 119, MOCS, together with DCAS and the Office of the Deputy Mayor for Operations, has also directed agencies to minimize the power usage of all electronic equipment, and DCAS has included in its bid specifications for such products the ability to facilitate compliance with this goal.

As I indicated earlier, MOCS is now finalizing amendments to the City's EPP rules (Chapter 11 of Title 43 of the Rules of the City of New York). These draft rules are in the final stages of the Local Law 46 review at the Office of Operations and the Law Department in advance of the City Administrative Procedure Act (CAPA) process to begin soon. These new rules apply the Local Law 119 standards to cover products purchased by our construction contractors, as well as the City's direct purchases, and will also add a few additional products covered by the federal energy management program that fall into categories purchased by the City in any substantial quantity.

Meanwhile, we are moving beyond the EPP energy efficiency standards, seeking additional tools to lessen energy usage. One example is DCAS' current solicitation for an "Enterprise Print Management" (EPM) contract, an all-inclusive printing system whereby a contractor would be responsible for devices, consumables and maintenance and the City would pay on a per impression basis, with all costs included in that rate. All such equipment would be required to comply with EPP standards. Under EPM, we expect to realize savings by reducing the number of print devices; to improve knowledge of the location, utilization and associated costs of such devices; to apply leading print management strategies aimed at changing employees' printing behavior; and to reduce the City's carbon footprint and electrical consumption by using fewer and more efficient print devices.

Turning to Local Law 120, MOCS originally promulgated regulations governing hazardous content in such directly-purchased products as electronic devices, carpets, paints and lighting products. The new rules that we are about to put into CAPA will also extend those standards to products obtained in the construction arena, as well as direct goods purchases. In addition, the new rules contain EPP standards designed to reduce the City's direct purchase of building products containing added urea-formaldehyde resins. These proposed amendments would apply to certain composite wood and agrifiber products. While these standards are coming into play somewhat later than we had hoped, significant work has gone into the consideration of what steps to take.

Meanwhile, DCAS and MOCS have also met with Staples, the vendor that holds the requirements contracts for all City office supplies, in order to increase the sale of non-toxic and PVC-free products. While the City may purchase very small quantities of other types of products that contain PVC, we have targeted office supplies as the area where our purchasing quantities, though small relative to the market, are more than negligible. The Staples contract is a requirement contract, meaning that it encompasses all of the City's office supply needs and we do not purchase such products through other means. It pre-dates the adoption of the EPP laws. But already, based on the usage information that we have collected from Staples, we have been able to move City agencies toward the purchase of PVC-free and other environmentally-preferable products. DCAS and Staples are working to establish more detailed shopping lists to guide agency users. Once these are finalized, the City will conduct additional educational efforts to inform buyers on their use, and how to ensure that they select the environmentally-friendly options.

But PVC content is not the only area in which we are making incremental progress, as Local Law 120 provided, toward the reduction in purchases of products for which combustion poses a risk of dioxin release. The combustion of paper products containing chloride or chloride derivatives is a very large contributor of dioxin into the atmosphere, and we believe is the single major such product that the City purchases in any substantial quantity for which such risks can occur. DCAS paper specifications now require that the products be at least elemental chlorine-free. Elemental chlorine-free (ECF) refers to paper that is made from pulp bleached with chlorine dioxide or other chlorine derivatives but not elemental chlorine. DCAS has encouraged its vendors to use a process chlorine-free operation. Process chlorine-free (PCF) paper that has at least 30% post-consumer recycled

content that has had no new chlorine or chlorine derivatives introduced during the paper making process, along with any virgin material portion of the paper being totally chlorine-free. The new rules that we are about to launch into CAPA will set a process chlorine-free purchasing standard for the City's direct purchases of paper, and we will work to try to ensure that City bids for such paper products succeed in the marketplace.

Local Law 120 also required a plan for the reuse or recycling of any covered electronic device purchased or leased by the City. The "Agency Safe Handling of Universal Electronics Waste Program" took effect in December of 2010. DSNY let a citywide contract that is available to all city agencies for the removal and disposal of electronic waste. The contractor offers the labor, equipment, material and support necessary for the proper removal, transportation, recycling and/or disposal of universal and electronic waste pursuant to all relevant standards. Once an agency properly determines that a piece of electronic equipment has exhausted its useful life and requires disposal, it then uses an online ordering system to arrange for the disposal.

The City's efforts to comply with Local Law 121's mandate for recycled materials standards have been robust. All of the paper used in City printers and copiers is purchased through a DCAS requirement contract and conforms to the 30% minimum recycled content required by the law. Additionally, DCAS has a requirement contract for bond paper with 30% recycled content. DCAS sought bids for paper with more than 30% recycled content and vendors did offer 100% recycled content, although no vendor offered paper with less than 100% but more than 30% such content. However, the price differential for the 100% recycled content paper exceeded the statutory benchmark and agencies determined that they could not afford the increased cost of such products.

All of the City's competitive procurement solicitations require vendors to print their responses double-sided, using paper with 30% recycled content. All printing services for documents or graphic materials are produced on paper with 30% recycled content, per the specifications in those contracts. Additionally, City agencies have been instructed to require that any printing services they procure from outside vendors be done on a double-sided basis and bear the recycling logo.

Our new rules package also supplements the requirements in this area, both by adding a number of new categories for goods covered by the EPA's the Comprehensive Procurement Guidelines (CPG) for Products

Containing Recovered Materials, and by applying both the new standards and the original standards from Local Law 121 to products purchased under construction contracts, as well as direct purchases.

Local Law 123 governs Green Cleaning products. Since the Council's last EPP hearing, the City concluded its Green Cleaning Pilot Program and issued its report and recommendations. DCAS has made an initial list of green cleaning products available to agencies under DCAS requirement contracts from the Central Storehouse, after the adoption of the new rules, agencies will have access to a much wider range of green cleaning products from which to buy. Many of these products will be accessed through the DCAS requirement contracts with the State's preferred source vendors – New York State Industries for the Disabled, Industries for the Blind of New York State and Corcraft – each of which is very active in the green cleaning product market. The new rules implement minimum standards for the purchase and use of certain categories of green cleaning products that were successfully tested during the City's Green Cleaning Pilot Program, as mandated by Local Law 123. These standards would apply to bathroom cleaners, degreasers, general purpose cleaners, glass cleaners and/or sanitizers for products purchased by City agencies.

In conclusion, for purposes of perspective, I will summarize the relevant data from Fiscal Year 2011. During that year, the City purchased about $1.2 billion worth of goods. More than $1.1 billion of that value was used for purchases of goods that have no connection at all to the categories that are covered by the EPP laws. In addition, approximately $69 million was compliant with the EPP standards that were then in effect, and another $108 million in purchases were otherwise covered by environmentally-friendly specifications voluntarily imposed by the agencies. A small amount of that $108 million falls into the categories for which our new rules will mandate such specifications, but most of that total falls entirely outside the purview of the EPP laws. All told, at the end of the day, we registered a little over $6 million worth of contracts citywide – for the entire fiscal year – in areas that would have been covered by the EPP standards that have not yet been adopted. Put differently, there were only $6 million worth of contracts would have been covered by the upcoming EPP expansion rules.

I want to assure the Committees that we remain committed to the EPP program, and to the sustainability goals it embodies. Implementation of some provisions has been a challenge for a variety of reasons. In some

areas, we learned that the City does not make significant purchases of EPP-covered products, at least not through procurements to which we can legally apply EPP standards. Issues have also arisen regarding the impact of some potential new rules on existing competition or costs. And the State competitive bidding laws continue to pose some obstacles, although we are optimistic that the new "Best Value" legislation slated to take effect this spring, will allow us more flexibility to consider both long-term costs as well as initial prices in our award process.

Precisely because the laws that govern our contracting process are so complex, it is important that EPP enforcement remain fully integrated within the procurement oversight system, so that MOCS may apply EPP rules to specific procurements and ensure agency compliance. I recognize and share the disappointment in the fact that we did not achieve all of the initial timelines anticipated in these laws for the development of new or expanded standards. I am accountable to you, and to the Mayor, for the decisions that we made along the way, and I assure you that we have never lost sight of our EPP mission or its importance as a piece of New York City's environmental strategy for the 21st Century. I am available to answer any questions you may have at this time.

Agency Environmental Purchasing Officers

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DOB	Karan, Benjamin	ACCO	(212) 566-4173	(212) 566-4090	bkaran@buildings.nyc.gov
DOC	Walker, Ava	ACCO	718-546-0690	718-278-6205	ava.walker@doc.nyc.gov
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DYCD	Schiff, Erik	Purchasing Agent	212-676-6082		eschiff@dycd.nyc.gov
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Total People in List: 31

Environmentally Preferable Purchasing Goods Solicitation (DCAS)				
Description	**EPP Minimum Standard Indicated?**	**Contract Value**	**Contract Start/End Dates**	**Registration Date**
Fascimile machines and maintenance	Yes - Hazardous content standard	$1,601,925	12/1/2010 - 11/30/13	10/07/10
Sign blanks, aluminum	Yes - 53% Recycled Content, 22.65% Post Consumer, 30.49% Secondary	$4,984,220	1/1/2011 - 12/31/15	11/24/10
Envelopes, double window (w-79 for hra)	Yes - 30% Post Consumer	$76,850	1/1/2011 - 12/31/15	12/15/10
Digital mail systems	N/A	$7,368,425	12/16/2010 - 12/15/15	12/29/10
Bathroom partitions and accessories	No	$162,007	1/1/2011 - 12/31/15	02/01/11
Sign post, steel (re-ad)	Yes - 100% Recycled Content Post Consumer	$919,642	3/29/2011 - 3/28/14	03/25/11
Plumbing supplies: misc. Fixture, fitting and trim	Yes - Energy Star Program	$362,945	3/1/2011 - 2/29/16	03/31/11
Napkins: table, paper	Yes - 30% Recycled Content Post Consumer	$251,125	5/1/2011 - 4/30/16	04/19/11
Calendars, diaries, planners and journals (re-ad)	Yes - 30% Recycled Content Post Consumer	$283,229	3/29/2011 - 4/30/16	04/19/11
Cans, ash and garbage, with covers (re-ad)	Yes - 45% Recycled Content Post Consumer	$2,610	6/1/2011 - 5/31/14	05/19/11
Paper, bond and offset (citywide)	Yes - 30% Recycled Content Post Consumer	N/A	N/A	No contract awarded
Liners, polyethylene, heavy duty	Yes - 10% - 30% Recycled Content Post Consumer	N/A	N/A	No contract awarded
Floor mats for building entraces	N/A	N/A	N/A	Bid Cancelled
Floor mats for building entrances (re-ad)	N/A	N/A	N/A	Bid Cancelled
Envelopes, commercial, plain, window and color	Yes - 30% Recycled Content Post Consumer	N/A	N/A	Bid Cancelled
Paint, enamel, fume proof, white (re-ad)	No	N/A	N/A	No contract awarded
Calendars, diaries, planners and journals	Yes - 30% Recycled Content Post Consumer	N/A	N/A	Bid Cancelled

Hand geometry biometric reader (brand specific)	Yes- Hazardous content standard	N/A	N/A	Bid Cancelled

Environmentally Preferable Purchasing Construction Contract Solicitation					
Agency	**Contract Description**	**Registration Date**	**Value**	**EPP Product Type(s)**	**Product Met EPP Minimum Standards? (Y/N)**
DCAS	General construction requirements contract for work in Brooklyn, Queens & Staten Island	8/11/2010	$10,000,000	Carpet, architectural coatings	Yes
DCAS	General construction work for 18 Richmond Terrace, electrical & facade upgrade	9/15/2010	$121,188	Architectural coatings	Yes
DCAS	Electrical upgrade at 120 Schermerhorn Street	9/21/2010	$5,874,317	Lighting products	Yes
DCAS	Electrical upgrade project, emergency generator at 215 E 161st Street	6/9/2011	$15,794,000	Energy Star products, lighting products, architectural coatings	Yes
DEP	Job order contract for east region - general	7/14/2010	$9,000,000	Energy Star products, plumbing fixtures, lighting products, carpet, carpet cushions, carpet adhesives, architectural coatings	Yes
DEP	Job order contract for the Catskill District	8/3/2010	$3,000,000	Energy Star products, plumbing fixtures, lighting products, carpet, carpet cushions, carpet adhesives, architectural coatings	Yes
DEP	PR-130-L electrical system upgrade at the Port Richmond WPCP	8/16/2010	$1,023,401	Lighting products	Yes
DEP	JOC-10-L (NH) job order contract for north regions - HVAC	9/22/2010	$2,000,000	Energy Star products, plumbing fixtures, lighting products, carpet, carpet cushions, carpet adhesives, architectural coatings	Yes
DEP	Shellbank Basin destratification facility - electrical	9/23/2010	$253,918	Lighting products, architectural coatings	Yes
DEP	Job order contract for the east region - electrical	12/1/2010	$5,000,000	Energy Star products, plumbing fixtures, lighting products, carpet, carpet cushions, carpet adhesives, architectural coatings	Yes
DEP	Job order contract for the north region - electrical	3/22/2011	$7,000,000	Energy Star products, lighting products	Yes
DEP	Job Order Contract for the south region - electrical	4/20/2011	$7,000,000	Energy Star products, lighting products	Yes

DEP	Job order contract for the east region - plumbing	5/6/2011	$9,000,000	Energy Star products, plumbing fixtures	Yes
DOC	Plumbing construction work on as needed at DOC facilities	8/5/2010	$2,500,000	Plumbing fixtures	Yes
DOC	Fire life safety at Anna M. Kross Center	12/9/2010	$20,580,000	Energy Star products	Yes
DOC	Mechanical construction work for A/C and ventilation upgrade	1/10/2011	$3,180,000	Energy Star products	Yes
DPR	Reconstruction of comfort stations & facilities at various DPR locations	7/2/2010	$1,500,000	Energy Star products, plumbing fixtures, lighting products, architectural coatings	Yes
DPR	Construction of pedestrian and vehicular access, parking and miscellaneous site work at Flushing Meadows Park	7/7/2010	$799,082	Energy Star products, plumbing fixtures, lighting products, architectural coatings	Yes
DPR	Construction: parks, buidlings, features at Rockaway Beach, 28th & B. 32nd Street	7/9/2010	$10,707,216	Energy Star products, plumbing fixtures, lighting products, architectural coatings	Yes
DPR	Construction of portions of Poe Cottage, including windows, doors and interior and exterior finishes	7/9/2010	$344,552	Architectural coatings	Yes
DPR	Construction of a Seaglass Carousel, Battery Park	7/14/2010	$8,931,797	Lighting products	Yes
DPR	Plumbing work in connection with construction of a district	7/16/2010	$465,000	Energy Star products, plumbing fixtures, lighting products, architectural coatings	Yes
DPR	District headquarters at Bushwick Inlet Park	7/19/2010	$2,135,000	Lighting products	Yes
DPR	Electrical work for the construction of the carousel, Battery Park	8/30/2010	$293,989	Lighting products	Yes
DPR	Reconstruction of the greenhouse in Forest Park	10/12/2010	$2,359,989	Plumbing fixtures, lighting products, architectural coatings	Yes
DPR	Construction of a pre fab comfort station in Brooklyn	3/23/2011	$1,281,879	Energy Star products, plumbing fixtures, lighting products, architectural coatings	Yes
DPR	Construction of the HVAC system at the Kingsbridge Community Center, Bronx	3/24/2011	$866,528	Energy Star products	Yes

DPR	Q492-209M For the comfort station in Gas Tank Park, Queens	4/15/2011	$1,574,094	Energy Star products, plumbing fixtures, lighting products, architectural coatings	Yes
DPR	Plumbing work in conjunction with construction of a comfort station	5/9/2011	$129,691	Energy Star products, plumbing fixtures, lighting products, architectural coatings	Yes
DPR	HVAC work at Owl Hollow	5/16/2011	$234,530	Energy Star products	Yes
DPR	Reconstruction of comfort station PFC Norton, Brooklyn	6/7/2011	$627,100	Energy Star products, plumbing fixtures, lighting products, architectural coatings	Yes
DPR	Reconstruction of the HVAC system at Louis Armstrong Recreational Center, Queens	6/16/2011	$2,300,000	Energy Star products, architectural coatings	Yes
DPR	Reconstruction of drainage system in Herman A. McNeil Park	6/16/2011	$523,134	Energy Star products, plumbing fixtures, lighting products, architectural coatings	Yes
DPR	Construction of comfort station at Owl Hollow, Staten Island	6/21/2011	$3,700,411	Energy Star products, plumbing fixtures, lighting products, architectural coatings	Yes
DPR	Reconstruction of plumbing work (in ground) at various DPR facilities	6/29/2011	$390,000	Energy Star products, plumbing fixtures, architectural coatings	Yes
NYPD	Upgrade air conditioning system at the 108 Precinct	3/24/2011	$164,695	Energy Star products	Yes
NYPD	Auditorium at Police laboratory, Forensic Investigation Division	4/26/2011	$1,106,288	Architectural coatings	Yes
NYPD	Removal & replacement of roofing system at the 102 Precinct	6/2/2011	$451,000	Lighting products, architectural coatings	Yes

Center for Health, Environment & Justice (CHEJ)

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Business, Health, Labor and Environmental Groups Call on NYC to Comply with Green Purchasing Laws to Reduce Dioxin Releases, One of the Most Toxic Chemicals Known to Science

Organizations Urge City to Reduce Purchase of Toxic PVC Plastic Products, a Major Source of Dioxin

(New York, NY) Leaders of business, health, labor, environmental and community organizations today urged the Bloomberg Administration to comply with existing laws, and phase out the purchase of products that create dioxin, which needlessly endanger the environment and public health. Testifying before the NY City Council's Committees on Contracts and Sanitation and Solid Waste Management, group leaders cited the City's failure to implement Local Law 120 of 2005, one of a series of laws to "green" NYC purchasing that was signed into law by Mayor Bloomberg. The law requires the City to reduce the purchase of products like toxic PVC plastic, which release dioxin, one of the most toxic chemicals on the planet. The dioxin-free purchasing rules were due by January 1, 2008, however the Mayor's Office of Contract Services has yet to issue them.

Mike Schade, Markets Campaign Coordinator for the Center for Health, Environment & Justice, said, "Dioxin is a known 'human carcinogen'. Learning disabilities, birth defects, endometriosis, and diabetes have all been linked to dioxin exposure. PVC is a plastic associated with more dioxin formation than any other single product purchased by NYC agencies, when its entire lifecycle is considered." Schade noted that "NYC agencies purchase many PVC products, such as computers and building materials, when safer, cost-effective alternatives are readily available. Leading businesses such as Wal-Mart, Target, HP, Apple and others have policies to reduce or phase out the purchase of PVC."

David Levine, Executive Director of the American Sustainable Business Council, said, "By implementing the Dioxin PVC-Free Environmentally Preferable Purchasing Law, NYC can lead the way and create the economy of tomorrow — today: an economy where safer chemicals can be used to create safer products, which spur innovation and create new business opportunities and jobs, and in which everyone can rest assured that the only choice is a healthy one."

Peter Syrett, Associate Principal of the architectural firm Perkins & Will, said, "Based upon the known health impacts, and in keeping with the precautionary principle, Perkins & Will seeks out alternatives for PVC for our projects. We believe that New York City should do the same."

Penelope Jagessar Chaffer, Director of the film "Toxic Baby™", said, "Babies are being born polluted with phthalates and dioxins in their umbilical cord blood, donated by their mothers. I

don't live next to a power plant or a chemical waste dump – I live in Brooklyn! Yet I have a significant amount of dioxin in my blood. NYC needs to phase out the purchase of PVC plastic. That action would significantly reduce our exposure to dioxin and phthalates."

Stephen Boese, Executive Director of the Learning Disabilities Association of NYS, said, "The incidence of learning disabilities and related neurological impairments is accelerating at an alarming rate. Environmental toxins, such as dioxin, are a major contributor to the development of acquired and preventable learning disabilities. It is absolutely necessary for policy makers to address this threat to our children's well-being with the utmost urgency. We therefore join with our colleagues today to urge NYC to comply with the law and restrict purchases of PVC, a major source of dioxin."

Ellen Weininger, Educational Outreach Coordinator for Grassroots Environmental Education, said, "The best way to avoid the negative human health and environmental impacts and economic burden of toxic exposures is to minimize the production and purchase of toxic products. Children and their parents rely on government officials to provide the protections they need for their health and safety. The stakes are too high to deliver anything less than the full implementation of a PVC-free procurement plan for New York City."

Ansje Miller, Eastern States Director of the Center for Environmental Health, said, "New York City took a bold step to protect public health with this green purchasing law, both for its residents and for its power to change the market. Now it's important for the City to close the deal in phasing out PVC and its contribution to one of the most toxic chemicals, dioxin. There are safer, affordable options readily available."

New York City agencies spend billions of dollars in procurement every year, which can have a major impact on public health and the environment. In 2010, NYC agencies procured almost $17 billion worth of supplies, services and construction. Local Law 120 of 2005 states, "By January 1, 2008, the director shall promulgate rules to reduce the city's purchase or lease of materials whose combustion may lead to the formation of dioxin or dioxin-like compounds." Unfortunately, the City missed the deadline to develop the dioxin-free purchasing rules as required by the legislation.

The 2005 New York City Council Committee Voting Report for the law discusses the relationship between dioxin combustion and PVC products (pages 10-12) and clearly demonstrates that reducing the purchase of PVC to avoid dioxin was the intent of the legislation. In May 2011, a broad coalition of groups sent a letter to MOCS expressing concern about the dioxin purchasing regulations. Signed by over 20 local, state, and national environmental, health, labor, and community environmental justice groups, including UFT, CSEA, NYCOSH, Make the Road NY, WE ACT, Mother's on the Move, Learning Disabilities Association of NYS, NRDC, NYPIRG, NY Lawyers for the Public Interest, CHEJ, and others, the groups urged MOCS to include PVC-free purchasing goals and provisions in the rules, to adequately implement Local Law 120 of 2005.

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NATURAL RESOURCES DEFENSE COUNCIL

STATEMENT OF THE NATURAL RESOURCES DEFENSE COUNCIL
BEFORE THE NEW YORK CITY COUNCIL'S
COMMITTEE ON SANITATION AND SOLID WASTE
RE: ENVIRONMENTALLY PREFERABLE PROCUREMENT

January 27, 2012

Good morning, Chairperson James and members of the Committee. My name is Eric A. Goldstein and I am a senior attorney at the Natural Resources Defense Council ("NRDC"). As you know, NRDC is a national non-profit legal and scientific organization that has been active for more than 40 years on a wide range of environmental and public health issues. Although much of our program is national and international in scope, we have long had a special interest in the urban environment in general and New York City in particular.

We are pleased to be here today to testify regarding the implementation of New York City's program to boost its procurement of environmental preferable products. NRDC strongly supported the five Environmentally Preferable Procurement ("EPP") laws that were enacted by the City Council in 2005. At that time, we demonstrated how the City could use its vast purchasing power to achieve lasting benefits for New Yorkers and for the environment.

We have followed the implementation of these five statutes with great interests and commissioned former New York City Sanitation Commissioner and waste expert Brendan Sexton to undertake an independent study of the implementation of these laws.

As you are about to hear or have heard from his testimony today, former Commissioner Sexton has concluded that the City has made significant progress in implementing these five laws and the actions of the city agencies have grown more effective every year. Among other things, the Sexton report found that in FY 2010, $144 million -- about one fifth of the City's total direct purchases of goods and services -- were expended on Environmentally Preferable Products. In addition, in the construction area, contracts valued at more than $453 million had some element of environmentally preferable procurement as part of their purchases.

Based upon the Sexton Report, NRDC recommends that the Council consider developing legislation to further enhance the EPP program and build upon the initial successes it has achieved. In short, we recommend additional action in four areas:

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1) End the division of authority among city agencies and select one – DCAS in our view – to serve as the City's Green Procurement Headquarters and have all major responsibilities associated with implementing the EPP program.
2) Broaden DCAS's EPP mandate to extend the program's reach, by directing DCAS to research and recommend new initiatives to bring the city into a position of national leadership in the area of environmental procurement. Among other things, this legislation should direct the establishment of certain green requirements (purchasing of Energy Star appliances exclusively, increasing the percentage of recycled content in paper products procured, etc).

3) Amend Local Law 86, the Green Construction Law, to require that contractors provide for the City simple but accurate data that tracks the amount of Environmentally Preferable Procurement spending they undertake in their city contracts.

4) Work with City Hall to insure the implementation of the environmental procurement measures set forth in the April 2011 edition of PlaNYC, including developing best practices for environmental procurement and incorporating them into EPP rules; improving agency accountability for the solid waste impacts of the products they purchase and creating incentives for vendors to recover and reuse products they sell to New York City.

We thank you for holding this hearing and look forward to working with you and the Bloomberg Administration to take additional steps so that New York City can become a national leader in environmentally preferable procurement.

Testimony of Russell Unger
Executive Director, Urban Green Council

Before the New York City Council Committee on Contracts and Committee on Sanitation & Solid Waste Management

June 27, 2012

Good morning Chairperson James, Chairperson Mealy, and members of the committees, my name is Russell Unger and I am the Executive Director of Urban Green Council, the U.S. Green Building Council of New York. I am intimately familiar with the topic of today's oversight hearing, having been the lead drafter and negotiator of the laws while working at the City Council and subsequently spending a year implementing the laws as Assistant Director for Environmental Procurement in the Mayor's Office of Contracts (MOCS).

As you know, MOCS is the hub through which the city's billions of dollars of contracts flow. The office is responsible for ensuring contracting is public and transparent, follows city and state laws, and that practices are consistent from agency to agency. MOCS is often brought in during contracting emergencies, some of which may be front-page news. I say all this as background because my testimony should not be taken as criticism of the core responsibilities of MOCS or its hard-working staff. My comments should also not be interpreted as a criticism of Mayor Bloomberg's environmental stewardship, which surpasses that of any large city mayor in the country.

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That being said, the city's implementation of the Environmentally Preferable Purchasing (EPP) laws falls short of the requirements and intent of the laws. The EPP laws creating an office of environmental procurement to both implement specified procurement standards and update those standards as products and environmental purchasing standards evolve. In 2007, MOCS implemented all the specific standards in the EPP laws and created procedures to ensure agencies include necessary environmental provisions in their contracts. However, none of the standards have been updated since the first environmental procurement manual was created five years ago, based on standards selected six years ago. Meanwhile, PlaNYC came along, upending sustainability across the country, and was since reissued – all without any changes to the EPP program.

Numerous requirements in the laws have not been implemented:

- Section 6-306(b) of the Administrative Code states that city procurement of a range of energy-using products must conform to the standards in the Federal Energy Management Program. They did conform in 2007. Five years later, the federal standards have become stricter but the city's have not followed suit.
- Local Law 120 required the city to develop rules by January 1, 2008 on products that form dioxin on combustion and to report on the city's use of

de-icing products. Those rules were never created and I do not believe the report was ever issued.

- Section 6-306(d) on energy efficiency requires the city to determine by January 1, 2008 if its energy efficiency standards should be extended to products not specifically identified in the legislation. Section 6-308(b) requires the city to regularly review the federal government's recycled content standards and adjust its own as appropriate. Since the city's procurement standards have not been amended since 2007, it seems unlikely that these reviews occurred.

I could list many other specific examples but the big point here is that through specific requirements and in intent, the EPP laws created a dynamic office with standards that should expand and be updated regularly. In practice, the office of environmental procurement has been static, stuck in 2007 and never coming close to fulfilling its real mandate.

In retrospect, it may have been a mistake to house a function that requires ongoing environmental research and policy within an office often dealing with emergencies that are always going to take precedence over longer-term responsibilities. Bearing no ill will towards MOCS, it may be that the Office of Environmental

procurement would be better off within another office of the Mayor or an agency with environmental focus.

Thank you for your consideration and the Council's leadership on environmental issues. I am available to answer any questions you may have.

DOES NEW YORK CITY BUY GREEN?

NYC'S PROGRAM OF ENVIRONMENTALLY PREFERABLE PROCUREMENT

A Report to the Natural Resources Defense Council

From Brendan Sexton

January 2012

I. EXECUTIVE SUMMARY

The city of New York buys goods and services, including construction, valued at almost $20 billion each year (in FY 2010, the total was $17 billion). This much buying power can have a beneficial impact on the market if environmental concerns are included in the specifications. "Environmentally Preferable Products" include those that have reduced or no toxic content, are sourced responsibly, contain a higher percentage of post-consumer recycled material, do less to contribute to climate change and generate less pollution in their manufacture, during their use and on disposal.

Beginning as early as the 1990s, the city began to focus on the issue of greener products. At that time, the focus was on products with recycled content, in support of and to some extent as a result of the launching of the City's curbside recycling program. In 2005, the City adopted the more ambitious Local Laws 118, 119, 120 and 121 – the "Green Procurement" laws dealing with direct purchases of goods by the city. At the same time, it also adopted Local Law 86 – the "Green Building" or "Green Construction" law, covering capital contracts. Implementation of these statutes has led to a steady increase in purchases of goods and services and engineering each year. By FY 2010 the purchase of Environmental Preferable Products had grown to $144 million, about one fifth of the total of all direct City purchases.

Major construction and similar capital budget contracts require a great deal of purchasing by the builders or other contractors, but this is counted separately from the direct procurement by City agencies as just described. In FY 2010, "contracts valued at more than $453 million . . . included at least one of 14 applicable EPP specifications." (This does not mean, however, that over $450 million was spent buying EPP products, but rather that contracts of that overall value contained provisions specifying the use of at least one of more "green" products.)

This review concludes that New York City's overall program to purchase Environmentally Preferable Products is encouraging, is still developing and is growing more effective each year. EPP is changing the way the City of New York does business and this in turn is changing the business ways of major vendors and business partners. There are, however, notable opportunities for improvement, detailed in the recommendation section, later in this report.

The most important of these recommendations are:

1. **The EPP program's public face and internal authorities should be consolidated and clarified,** especially for vendors and the public. City law should be amended, if necessary, to **make DCAS its "Green Procurement Headquarters"** and **make the DCAS Commissioner the City's "Chief Environmental Procurement Officer."** In addition, **the environmental research function and unit,** now funded through the SWMP, **should be institutionalized as a mandated function of DCAS,** again either through local law or executive order. Also, **a unified and simple Green Portal on the City's website** ,or a micro-site on the DCAS home page for vendors and entrepreneurs who want to engage the City in a "green" venture, **should be established.**

2. Either by amending the relevant local law, or through Executive Order, the City should **mandate that DCAS extend the reach and depth and thoroughness of the EPP program,** by **directing DCAS to** research and **recommend new initiatives** that can bring the City to a position of national leadership on governmental EPP efforts. **Certain green requirements** in groups of classes of products **should be established.** For example, specifying **Energy Star** as a default minimum criterion for any energy-using appliance or machinery, specifying **Water Sense** plumbing products; and requiring **FSC** certification for wood and paper products.

3. Local Law 86 **(the "Green Construction" law) should** be amended to **require consistent reporting of EPP actions by contractors, reported electronically and directly** for easier retrieval of information in a format similar to purchases of goods.

4. City Hall should take steps to **implement the environmental procurement revisions recommended in the 2011 version of PlaNYC,** which include: **developing best practices** for procurement and incorporating them into EPP rules; **improving agency accountability for the solid waste impacts of products they purchase;** and creating **incentives for vendors to recover and reuse products.**

5. **NRDC and other solid waste and environmental advocates should take up the challenge of assisting New York City** in removing external constraints, whether industrial or political, that are impediments to making New York City a national leader in environmental procurement practices.

II. BACKGROUND

The City of New York has enormous purchasing power—buying some $17 billion in million of goods and services (including capital construction) in Fiscal year 2010. The lion's share of this amount is spent on construction contracts and for professional services such as IT or architecture and engineering consultants. Of the total, almost a billion dollars each year is spent on goods and services like those any other business would purchase—pencils, paper, plumbing, food, vehicles, and the like. In Fiscal 2010 the City bought approximately $800 million in goods and services through the central purchasing authority of the Department of Citywide Administrative Services (DCAS), or more precisely, the DCAS's Division of Municipal Supply Services—the City's chief buyer.

The City's billion-dollar buying power can have a beneficial impact on the market if environmental concerns are included in purchase specifications. If specs are well drawn and vendor outreach is energetic, the expectation is that establishing an Environmentally Preferable Purchasing program will –especially over time--improve the variety of the products and services manufactured or offered to include 'greener' options. The City's actions as buyer, in other words, may affect stocking or even manufacturing decisions by suppliers and may help make some 'green' products more generally available to the general universe of commercial and institutional buyers beyond city government.

Beginning as early as the 1990's, the City began to take this challenge seriously, becoming an early large buyer to explore the issue of greener products. At that time the focus was on products with recycled content in support of and to some extent a result of the launch of the City's curbside recycling program. For one very early example, the posters and flyers for Sanitation's curbside program during the late '80s were printed on paper stock that was purchased with the City's first-ever specification requiring recycled content. The professional buyers at DCAS/DMSS, then, became the City's first 'green purchasers' and still bear most responsibility for researching new or improved products, developing new sources, maintaining relationships and effecting deals with vendors—whether 'green' or other. DCAS purchases most goods (valued at above $100,000) on behalf of all City agencies, while agencies purchase most types of services directly. The DCAS citywide contracts are what are most directly targeted by the City's primary green purchasing laws, **Local Laws 118--121 of 2005** which by and large set up the rules for sustainability specifications. **LL 118** nominated the Director of the Mayor's Office of Contract Services (MOCS) as the Citywide Environmental Purchasing Director and **LLs 119, 120, and 121 of 2005** named some of the key priorities of EPP—hazardous materials reduction, increased recycled content and copiers that produce two sided copies to reduce paper use, etc.

By **Fiscal 2009** City contract awards for **EPP products had grown to $65.5 million.** This impressive total was helped by a five year contract for dual-purpose paper (office copier and printer paper) for $39.6 million. And by **Fiscal 2010 the EPP total has grown to $144million,** about **one fifth of the total of all direct City purchases.** For vendors or manufacturers who are tracking market trends, this kind of multi-million dollar activity should send a clear trend that there is money to be made in supplying 'green' products.

In addition to these purchases for direct use by City agencies, the Green Building Standards (and allied policies for capital projects) cover purchases by contractors and sub-contractors in the course of building or rehabbing City properties. Certain construction projects—which have great impact on green procurement-- are governed by a separate, companion law, **Local Law 86 of 2005,** described below. This law sets its own environmental demands but then exempts these contracts from LL118's requirements, and therefore these expenditures are only *in*directly included in the City's Environmentally Preferable Purchasing program (EPP).

As oversight and coordination, the environmental purchasing laws designated the Mayor's Office of Contract Services (MOCS) to monitor report on, and oversee multi-agency policy affecting all sustainability contracting (goods, services, construction, etc.). MOCS performs an invaluable service for the 'civilian' trying to monitor these complications by reporting the major issues and achievements in its annual "Agency Procurement Indicators" report. So, although MOCS does not directly purchase, nor does it directly manage construction contracts, it does report on all, so that the public and the Mayor or other parties can understand and track the City's progress.

III. EPP IN PRACTICE

The City's First 'Green' Purchases:

As mentioned, in the early 1990's, the City began to focus on the issue of products with recycled content. This was in support of and to some extent a result of the launch of the City's curbside recycling program. The posters and flyers for Sanitation's curbside program during the late '80s were printed on paper stock that was purchased with the City's first-ever specification requiring recycled content. Then, in **1997-8** the city's purchasing department (now part of DCAS) ran a test of printing and copying paper at 20% post consumer content recycled fiber—the USEPA standard at that time. Bids were solicited with and without the recycled content provision and samples were submitted. The result of this test was that the

samples, blind-tested by several paper buyers and City office employees, were indistinguishable from each other. The low bidder turned out to provide the same cost for either paper—with or without recycled fiber. The decision was made to purchase only the post-consumer recycled paper for all such uses from then on (an enormous buy) and after the first few years the specification was increased to 30%.

Broader Commitment:

In **2001** Science Applications International (SAIC) produced for the Department of Sanitation a binder of procedures and specifications for Environmentally Preferable Purchasing, emphasizing recycled content and recyclability, and this binder was adopted by DCAS and promulgated to their buyers and product researchers. As the first wide-ranging, even ambitious review of green purchasing practices and methods in a governmental context, this SAIC report and its enthusiastic adoption by DCAS should be considered the real launch of New York City's comprehensive program. It might be kept in mind that although the USEPA and others had begun searching for and specifying some 'greener' products, truly comprehensive green purchasing programs were still quite rare whether in the public or private sector. It is beyond the scope of this paper to determine who was the absolute first public body to move so comprehensively in this direction but the City can certainly claim 'early adopter' status.

Over the decade since the SAIC work, the City has moved further to use its substantial buying power to help advance sustainability goals by establishing rules and procedures and forming these into a comprehensive Environmentally Preferable Procurement (EPP) program. The EPP program is operated by DCAS and overseen and reported on by the Mayor's Office of Contract Services. The statutes and City policy designate MOCS as the Environmentally Preferable Purchasing Officer for the City, and so reporting and oversight reside there. But most product research, and actual specifying, buying, and vendor relations for goods purchases are handled by DCAS.

Funded through the Solid Waste Management Plan, DCAS created a two-person **Environmental Purchasing Research** unit to seek out and evaluate 'greener' products and companies, and has awarded dozens of requirements contracts for green products, allowing multiple agencies to buy these products without needing to identify, evaluate, specify, price, advertise or award contracts themselves. This unit has produced dozens of short memos or longer reports over the last two years ranging from evaluating particular products represented as greener alternatives such as renewable bio-diesel, through summaries of environmental issues affecting a class of product such as bisphenol A in plastic goods, to large scale reviews of broad market

sectors or industry developments such as reviewing the EU's Green Procurement Guide or the CARB program to reduce air emissions.

IV. THE EPP LAWS

After considerable discussion in both the Mayor's Office of Contract Services and the City Council, the 'green' purchasing concept was codified in a set of new policies and laws establishing for the first time that the City would mandate a change in how it spends its money—specifying not just cost and quality, but also environmental impact. **The laws were ambitious, innovative, detailed and thorough. They have also proved effective once past a 'ramp up' period.**

One of the first of these laws to gain support at the time set a new approach to buying and using **Green Cleaning Products: Local Law 123 of 2005**. LL123 required the testing of non-toxic and non-polluting chemicals for window, wall, carpet and floor cleaning products, recognizing that there were employee and customer health issues as well as general environmental issues consequent on introducing chemicals into City facilities. This law and the pilot were seen to be useful, identifying good green products but also noting where there was improvement needed.

In retrospect from the standpoint of 2011 it may seem hard to understand that many City executives and lawyers were concerned about whether green purchasing criteria might run afoul of the State's General Municipal Law and the City's own Administrative Code—which govern City procurements and set competitive bidding and similar requirements. It was never the case that these laws required simplistic 'low bidder wins all' processes, but the legal framework—and traditional caution--certainly discouraged creativity and there had been no tested model of laws or procedures that inserted an environmental screen between speccs and bid or between bid and award. [A simple answer for how green concerns can conform to the 'low bidder' constraints is to control the specifications creatively. The agencies can ask for prices for copy paper, or can ask for prices for copy paper *containing at least 30% post consumer recycled fiber.* And so on. The City must be alert, however, to the risk of limiting competition. This is one of the reasons product research and vendor outreach can be such an important part of a credible, useful, EPP program.]

On the broad front, **in 2005** the City adopted the more ambitious **Local Laws 118, 119, 120, and 121,--the 'Green Procurement" laws,** and **Local Law 86, the "Green Building or Green Construction" law.** These are significant advances, and this report finds considerable achievement followed the passing of these laws. But they also set up separate regimens for general purchases of goods and services on the one hand, and for construction or capital projects on the other. The general purchases of

goods and services—those covered by Local Laws 118--121 are what is usually meant when the City uses the phrase Environmentally Preferable Procurement. LL86 explicitly exempts LEED-certified capital work from the other Local Laws thereby ensuring that the two types of expenditures would be managed differently. This turns out to create difficulties trying to account for the overall City effort.

The EPP program covers virtually all the supplies bought by or for City agencies other than those purchased during or for construction projects. These procurements are managed by the Department of Citywide Administrative Services, which by and large has been an active and increasingly sophisticated 'green' purchaser, going beyond the strict requirements of law. EPP requires that the City include environmentally friendly specifications in the bid documents or Requests for Proposals for **any products that use energy or water, contain potentially hazardous substances, or which may emit hazardous chemicals or greenhouse gases such as solvents, paints or glues, or** (in a particularly progressive clause) **which can be made from recycled or recovered materials.** As this review discovered, there has been gradual implementation with annual improvement is shown in the data on 'green' purchases covered by the City's EPP laws (see below).

Local Law 86 of the same year, the **'green construction"** law covers most of the City's capital construction work. This captures spending of City money by contractors and sub-contractors as they purchase the goods and work that go into any major construction project. New construction or substantial rehab projects costing over $2 million must now meet LEED Silver certification, and projects costing $12 million or more must meet additional energy conservation targets. Even for non-LEED capital construction work (for example, replacing systems in an existing building), there are also energy saving minimums set for larger scale lighting or HVAC projects, and water saving goals for major plumbing projects. (For each of these types of work covered by LL86 there is a different monetary threshold above which the EPP rules apply.)

The capital projects covered by LL86 are performed by contractors or sub-contractors who purchase and use many 'green' goods and services in order to meet the requirements for LEED Silver certification, or to meet the energy and water saving targets elsewhere in the law. These goods and services may often be the same as or equivalent to those purchased directly by City agencies acting according to LL118. But they may bring new or different products or suppliers into the mix as well-- and this seems appropriate and a way to discover and support additional green suppliers or goods that for whatever reason do not contract directly with City agencies. But for the purposes of this report, and indeed for any City management purpose, the data on these transactions are much less complete. Construction contracts are typically

awarded as lump sum deals and the contractors are not ordinarily required to report EPP actions or expenditures to the Mayor's Office of Contract Services, as is the case with direct purchases by Mayoral agencies.

The lack of an equivalent, detailed EPP reporting requirement for the City's contractors makes the information uneven, but the MOCS Environmental Procurement Officer has tried to capture this information for its annual report on "Procurement Indicators." As per the EPP laws' requirement, MOCS collects some more specific EPP purchasing data every four years, directly from contractors. This report has thus far been produced once, in 2008, when MOCS secured voluntary reports from these contractors and reported the survey results to the Council. Agencies' detailed responses to the annual efforts by MOCS to collect EPP data are also not entirely complete, but have improved each year and now cover tens of millions in purchases.

V. RESULTS

A one sentence summary of EPP policies and actions by the City and its contractors is that there was a slow start but EPP has grown into a substantial and growing, success. There are suggestions given below for added effectiveness going forward, but the overall story is of an impressive step forward by the City, with concrete and measurable impacts. MOCS' yearly Procurement Indicator reports—the source for most of the numbers used here—show a steady and marked increase year to year in green purchases. And the DCAS Environmental Purchasing Research unit and enthusiastic adoption of green principles throughout the DCAS procurement executives and professional staff mean that continued advances are being achieved. The program has achieved that precious goal: "buy-in" by the product researchers, buyers and others who make the actual procurement process go.

a. Goods and Services:

The City began compiling and reporting on EPP contracts and their dollar value in Fiscal 2007 but DCAS had not yet awarded its first EPP requirements contract until the next year. **MOCS reported the first contract awards for the EPP program in FY2008,** and that year was able to document **$5.7million in green product** contracts awarded—mostly paper (about $5 million in paper with at least 30% post consumer recycled fiber content.) For some businesses this would be a substantial achievement, but it was small in relation to the $16.5 billion purchased that year. That year's **construction contracts reported only just over $1 million in green purchases** pursuant to Local Law 86)—a very modest beginning.

Still, it was a beginning, and this provided a strong signal to the marketplace of City suppliers and to the City's own buyers and managers that something new was developing. This becomes apparent in the subsequent years' figures. In **Fiscal 2009** the City awarded contracts for **$65.6 million in EPP products.** This impressive total was helped by a five year contract for dual-purpose paper (office copier and printer paper) for $39.6 million. It is worth noting that this is exactly the kind of contract award that environmental advocates and the City Council were hoping for from the City: it was large, it was multi-year, it set a standard simultaneously symbolizing and implementing the City's green procurement program, and since it was a five-year deal, it provided exactly the business predictability vendors and recyclers or manufacturers need to make real investment in green production.

By **Fiscal 2010 the EPP total has grown to $144million,** about **one fifth of the total of all direct City purchases of goods or services.** For vendors or manufacturers who are tracking market trends, this kind of multi-million dollar activity should send a clear trend that there is money to be made in supplying 'green' products.

b. Capital Projects:

For major capital contracts (construction and rehabilitation of roads, bridges and buildings, landscaping and parks construction or major repair, and similar), there is a more complicated picture. Technically speaking, construction projects are considered in their own category covered by Local Law 86, not as part of LL118's EPP definitions or usual program. For the most obvious distinction, DCAS does not buy these products—the contractor does. **Local Law 86** is progressive, comprehensive, and covers a huge volume of City dollar outlays. Nonetheless, this aspect of the City's greening efforts is complex, hard to follow, and is reported on only partially.

The Law requires that projects administered directly by City agencies must include water and energy conservation specifications and must control for hazardous emissions from paints, solvents, carpet and glues, and so on, but requirements vary according to complicated rules of inclusion or coverage, including a very important exemption for projects that meet LEED requirements.

Here for instance, is the City's description of the process in its "Procurement Indicators" report for 2010:

> Most of the City's largest capital projects are governed for purposes of "green construction" standards not by the EPP laws, but by the more

> comprehensive Green Buildings Law, Local Law 86 of 2005 (LL 86). Where Local Law 86 applies to a City capital project, the specific requirements for green construction, energy cost reduction and water conservation are determined by the project type, occupancy group and overall construction costs. While projects subject to the Leadership in Energy and Environmental Design (LEED) provisions of Local Law 86 are exempt from EPP reporting requirements, these large projects do, in fact, use substantial quantities of EPP products. *

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*To make plain how complicated the rules are, here is the City's footnote 'explaining' the requirements of the law:

Projects that cost $2 million or more and entail new buildings, additions to existing buildings and/or substantial reconstruction, must achieve Leadership in Energy and Environmental Design (LEED®) Silver certification from the United States Green Building Council (USGBC). Projects costing $12 million or more must also meet energy cost reduction targets. Installation and replacement of boilers and HVAC comfort controls costing $2 million or more, and the installation or replacement of lighting systems costing $1 million or more must meet energy cost reduction targets. Plumbing system projects costing $500,000 or more must meet water use reduction targets....etc.

These fairly confusing rules do not provide for easy or detailed reporting. So that, for example, for FY 2010, the City reports:

> In Fiscal 2010, nearly $2 billion worth of LL 86 projects resulted in registered contracts. Each of these projects resulted in contracts for which one or more types of EPP products were incorporated into the construction.

To dig into the EPP actualities beneath these overall, summary statements, the Mayor's Office of Contract Services (MOCS) works diligently to collect data from the mayoral agencies and was able to compile reports from City agency data that in **FY2010, "contracts valued at more than $453 million... ...included at least one of 14 applicable EPP specifications."** It is important to keep in mind, however, that this does *not* mean that over $453 million was spent buying EPP products--the current reporting requirements for construction projects do not allow for that kind of specificity.

The MOCS surveys do provide some additional detail, for example that more than $115 million of this total described contracts that included specification for Energy Star products. Data at this level of generality--lacking LL118's listings by contract and by product and amount, etc.--represent an important start but are of limited use. To stay with the Energy Star example, we certainly want to know not just the size ($ value) of the overall project, but how much of the $115 million in those contracts was actually and specifically spent on Energy Star products: $1 million, or all $115? As a result of the general and indirect reporting, there is that wide a gap in our knowledge.

This reporting process may have been necessary to get the law passed and the system started, but now that the City and its contractors are more practiced in these matters, better information can be demanded. In the future we will either need a change in the law's reporting requirements so that the contractors must report as DCAS does, or additional resources should be provided for MOCS to dig into these contracts and sub-contracts for these data. In response to this point MOCS stated that accurate reporting by and about vendor green purchasing will depend on the City creating an active and effective electronic portal for vendor information. This does not now exist, and MOCS is probably right that only an interactive vendor system will allow for prompt and complete vendor reports of 'green' contracting, and allow for efficient City auditing or analysis of the data. In the meantime, we report on the data as they exist, gathered by the MOCS labor-intensive surveys.

While there is every reason to think that LL86 and EPP rules and requirements have meant a major advance for green procurement, as of this time we (and the City) cannot be entirely sure of just how much of what has been achieved on the construction side. also It should be examined whether the laws might be amended, or the City's contract language redrawn, to provide for a more complete and simpler reporting regime for capital procurements.

Seeking a change in law even for a technical matter like reporting requirements is always an unpredictable thing in NYC, or perhaps anywhere. But in this case the law itself calls for a review after four years, and it therefore may be possible to seek this change in data management at that time—next year. (This would mean, realistically, starting to work on language and concepts now).

The alternative to changing the legal requirements seems to be that either the development of electronic vendor reporting must be accelerated or the resources assigned to MOCS for Environmental Procurement have to be increased—modestly, perhaps by one position--to allow a truer tracking and reporting practice. Better tracking and reporting, and checking and analyzing the information that comes in will be very labor intensive, an iterative process, with repeated calls to contractors and subcontractors, and to the agencies as well. Given the recent budget environment, it seems improbable that staff would be added. Therefore the electronic solution should be accelerated.

Without proposing too grand a re-organization, it is still noted that the current reporting and management responsibilities for green procurement are in fact divided between DCAS and MOCS, and the requirement to report back to the Council might be a good moment to open discussion on whether there are ways to further coordinate or consolidate the programs. For example, DCAS, where much of the

pioneering work on EPP has been done, has no authority over construction work. There may be excellent reasons for the current state of the system, but the requirement to report back to the Council might nonetheless serve as an occasion to open a conversation on the subject.

VI. CONCLUSIONS AND RECOMMENDATIONS

Overall it is encouraging to conclude that **EPP in New York City is proof that quite complicated and innovative changes can be made in large bureaucratic systems when the goal—environmental improvement—is clear and is embraced across the board,** from the top down and bottom up. The City is a different business partner than was true only a few years ago, and this is continuing to evolve as we write.

We do have some recommendations for the program. It is important to note that these are largely drawn from observations or suggestions of the City personnel in the EPP program. By and large we found them not only effective, but directly and personally involved in thinking through ways the program was and was not working, and looking for improvements constantly.

The recommendations are grouped into four general ideas:

- Reasonably good information is available on 'normal' expense budget purchases of goods and services, and this has allowed us to conclude that there are many strengths developing in this part of the basic EPP. But, the huge expenditures through the capital budget (for construction and similar purposes) are reported differently and indirectly, conclusions there are less certain, and management intervention cannot be immediate or direct. We recommend changes that would allow the public to know how this very substantial procurement activity is or is not conforming to environmental purposes.
- Second, the current organizational responsibility for environmental contracting and purchasing is split and somewhat confusing even to City managers. We recommend that the program's internal organization and public face be simplified and clarified, that the Department of Citywide Administrative Services be designated the City's 'Green Procurement HQ,' that a unified and simple 'Green Portal' be established to allow the public, vendors, manufacturers and others access to the information and persons needed to do 'green business' with the City.

- We recommend several steps to expand and deepen the program and to extend products' environmental specifications that will be considered essential to sell to the City.
- The City has come so far in its efforts that it may now benefit greatly from support from NRDC or other environmental advocates in dealing with some manufacturers' or sellers' reluctance to shift industry practices further in a green direction. Examples are given, including the rather startling report that some copier and printer manufacturers are objecting to the concept of going beyond 30 % recycled fiber in office papers. This sort of concern exceeds the City buyers' scope but might well yield in the face of third-party inquiry or advocacy.

A. Direct Procurement by City agencies:

As stated earlier in this report, a one sentence summary of EPP policies and actions by the City and its contractors is that EPP has been, so far, a real and growing success. At this point there can be little doubt that **the EPP program is providing opportunities and incentives to manufacturers, distributors, and local retail sellers or installers of 'green' products and services.** This is exactly what was intended by the original rationale for these measures, and that was hoped for when Local Laws 86 and 118 were enacted.

The City has made important changes in its procurement policies and practices to achieve environmentally friendly goals, and the magnitude of effect is growing each year. **Over the previous four fiscal years, EPP buys have gone from $5.7 million to $144million**—nearly 20% of the City's purchases of $800 million in goods and services. (About $110 million of the $800 are purchases of under $100,000 and these are exempt from LL118 requirements. Nonetheless, an unknown fraction of these smaller purchases may also be of the same 'green' products DCAS has identified as acceptable for City use.)

B. Green Construction:

For capital (construction) projects, the figures are less precise—as noted above, but the MOCS Procurement Indicator Report for Fiscal 2010 was able to report that: **"During Fiscal 2010 City agencies entered into** [construction] **contracts valued at more than $453 million that included at least one of 14 applicable EPP specifications.** This total includes more than $115 million in contracts with specifications for Energy Star products,47 nearly $110 million in contracts with

specifications for EPP lighting products and more than $107 million with specifications limiting the hazardous content of architectural coatings."

Without challenging the City's desired conclusion that EPP is penetrating deeply into the capital contracts as with direct purchasing, it has to be stated that with less clear data—as in this case—it is also possible that important problems or 'misses' will be overlooked. Or, conversely, that the City cannot yet claim all the success it would like to since the data on capital projects are simply not all clear and all accessible in one place.

Recommendation 1: Local Law 86 (the "Green Construction" law) should be amended, or new legislation introduced, to **require consistent reporting of EPP actions by contractors, reported electronically and directly** for easy public reporting, and to allow more certain Mayoral authority over this program.

C. Program Clarity:

Although the overall picture is positive and moving in the right direction, there are some issues as would be expected in any young program of such sweep and ambition. First, **it is not clear that there is *one* NYC EPP program**, with one champion. There are multiple agencies with a role to play: the two major actors—MOCS and DCAS—coordinate their work but this division does not facilitate a coherent, citywide, easy-to-read green procurement office, with a recognizable green agenda. The Mayor's Office of Operations includes the Office of Long Term Planning and Sustainability and it certainly plays a role in these matters, especially on a policy level. The differences in reporting, discussed above, only increase this sense of a non-unified program.

It is not clear how an enterprising vendor should make his or her list of 'new' green products (or better prices for existing green products) known or whom to ask for a trial run. DCAS is the right answer, but an outsider to the City's world would not necessarily know this. [A vendor of 'green' products told this reviewer some months past that he was going to try to interest the Mayor's Office of Long Term Planning and Sustainability—in some unusual cases, this could be the right approach, but green procurement is not their mission.]

Establishing a clear, prominent public face, with appropriate web and print PR to make it known, will help to simplify and coordinate the process, and will make internal and external messaging clearer and more effective. Even if the internal organizational divisions must persist for reasons beyond the scope of this review, the

City should still establish a single and simple green 'face' to the commercial world (and the media and citizenry) which presents a coordinated, simple green portal for vendors or innovators to enter into, and for the public to get reports out of, the city's EPP program.

Recommendation 2: The EPP program's public face and internal authorities should be consolidated or clarified, especially for the public.

a. Make **DCAS the 'Chief Environmental Procurement Officer"** may take an amendment to local law. But it is not practical to expect a non-operating agency such as MOCS to take on the functions of vendor and product research and outreach, contract specification creation or modification, etc.

b. It is recommended that the City **publicize DCAS as its "Green Procurement Headquarters"** and consider lending—out-placing-- the MCOS personnel working in this area to DCAS *while* seeking change in the law. There is no question that MCOS has been working well even with the challenges the current structure poses. The personnel there obviously enjoy this work and have done well, but it is no criticism of their performance to recommend clarifying structure and information flow.

c. A unified and simple **Green Portal** on the City's website for vendors or entrepreneurs who want to engage the City in a 'green' venture should be established. (This is a key recommendation from the MOCS personnel just mentioned above.) The 311 service, the Office of Sustainability, and the other agencies likely to get such inquiries should all be instructed to refer parties to this Green Portal, and the Portal should, in turn, connect directly to DCAS managers for any query beyond the routine.

D. Extending or expanding green procurement:

DCAS professional buyers seem to have taken seriously the goal of extending the City's list of green products or green vendors, but it is not clear that they have a *mandate* to change or expand City policy. For example, it is not clear how the City could examine whether the time has come to try to move the % recycled content specification from 30% post consumer fiber to 40%, or 50%, or perhaps add the requirement that the paper be processed without chlorine, or that it must carry the FSC seal or similar. There would have to be analysis for each such consideration of this how this would affect performance and pricing and supply or delivery criteria.

There would be similar issues for other products—e.g., should the city be specifying 5%, 20% or 100% biodiesel for certain transportation equipment or heating purposes, and if so, for which? Should any of the biodiesel be sourced from recycled cooking oils or similar renewable sources? Should the City specify that delivery of most or any products must come in low-emission vehicles? Should packaging reductions or packaging recyclability be figured into product specs? Should the City be buying only Energy Star appliances or machines or Water Sense plumbing products in *every* category where these are applicable, even if there is a price difference? How much of a price premium would be acceptable? On a broader but interesting scale, should the City be employing Life Cycle Analysis for major product or service procurements, and if so how can this be codified so as to be clear and fair to potential suppliers?

And so on—the list of additional issues or products to explore is long. It is true that the DCAS Environmental Research Unit can examine whether any such green specs or practices can be met by industry, so therefore DCAS could move the City in this direction, but it is not at all clear that any unit or office *has the mandate to* advance or broaden the EPP agenda.

Recommendation 3:

a. Either by amending the relevant local laws, or through Executive Order, **the City should mandate that DCAS extend the reach and depth and thoroughness of the EPP program**, exploring new products, new and 'greener' specifications for existing products and services, enhancing vendor and manufacturer outreach, and other initiatives that can bring the City to the absolute lead of governmental EPP efforts.

b.The Environmental Research function and unit, now funded through the SWMP, should be institutionalized as a mandate function of DCAS, again through either law or Executive Order

Because DCAS's buyers are usually monitoring what other governments are doing, it may be that NYC might always expect to catch up whenever there are important new products or services. But this does not seem the best approach for a city that wants to *lead.* And, it inherently gives up the hometown advantage that green entrepreneurs here in NYC should have with their own City government. A mandate to be out in front, to be actively researching and initiating and even experimenting, to be looking for and encouraging new greener producers or vendors, could change this.

c. Certain green requirements in groups or classes of products are well enough researched and widely available so that they **can be required minimums. Either by law or Executive Order** the City should:

> **Specify Energy Star** as a *default minimum* criterion for any appliance or machine using electricity up to a price premium of X percent.
> Ditto for **Water Sense** plumbing products.
> The City should **require FSC** certification for wood and paper products
> Paper, no matter its percent of recycled fiber, must be **Chlorine Free**

The Environmental Research unit may well have its own list of general, broad criteria or specification authorities that could, similarly, become standardized minimum specs for City purchases.

d. Mandate Durability or life cycle analysis—including lifetime climate impact—as part of the City's environmental purchasing mission, at least for products whose replacement cost would be above some minimum (either individually or in the aggregate). This is where 'sustainability' is reified. If we are to avoid the perils of the disposable society it will require building the markets for durable, fixable, modifiable, 'update-able' products. These considerations may sometimes overwhelm more specific price differentials, but this will not always be clear to buyers or users without life cycle cost analysis. [For some product types there are useful proxies such as 'mean time between breakdowns,' or 'mean time to failure' or similar measures accepted by operators or by technical societies or similar professional groups.] This entire area of product life and serviceability, and how it affects the overall sustainability of the procured items and the City's operations would present a rich field for applied, directly useful research by the Environmental Research unit or other analysts in the procurement division of DCAS.

E. Pushing the envelope:

It is gratifying to note that in spite of the mentioned lack of explicit mandate, the City's professionals seem to be doing a competent job of installing and nurturing Environmentally Preferable Purchasing as an increasingly progressive factor, using the City's buying power to advance environmental purposes. The program has come far enough that some external constraints are possibly operating. For example, earlier we mentioned the issue of moving to a higher percentage of post consumer fiber content in the most common paper grades. DCAS, in exploring this issue, was told that the copier and printer manufacturers are reluctant to warrantee their leased machines for heavy use of papers with more than 30% post consumer content. This is an opportunity, perhaps, for environmental advocates to work with the manufacturers on

industry policies and practices. Such an issue is too national for a single city (even Gotham) to sway the major players. But an outside body such as a group of advocates, or an alliance of public purchasers and environmental advocates known to HP, Xerox, etc., could possibly bring the major players together—perhaps with the USEPA as well—and probe for ways to break what seems to be a logjam.

Recommendation 4: NRDC and other **environmental advocates should take up the challenge of assisting with external constraints** whether industrial, political, or simply matters of awareness, and form alliance with the City in pushing the boundaries of the EPP envelope. In some cases the City may be butting up against the limits of an industry's willingness to cooperate (as with the copier warranty discussion), and some advocacy on a broader scope might be of help in specific cases.

Only a year or two ago it would have seemed improbable that New York City would have pushed 'green' specifications up to the limit of what various industries could supply, but this does appear to be happening at least for certain products. The next few years will be a real test of creativity and resourcefulness as the green procurement drive pushes further into what will be—for some items at least—unknown territory.

Testimony of Maya Shetreat-Klein, MD
Pediatric Neurologist
Assistant Clinical Professor at Albert Einstein College of Medicine
1/27/12

I am coming to you from the front lines of children's health. As a pediatric neurologist who treats children with ADHD, seizures, autism, brain cancers and learning disabilities, I have an interest in the underlying risk factors in these disorders. Today, I want to give you a mini-crash course in toxicology and show how chemical exposure can relate to chronic disease in adults and particularly children.

Since World War II, more than 85,000 new synthetic chemicals have been released into the environment. Fewer than 50% have been tested for potential toxicity in adults, and almost none have been tested for safety in children. The Environmental Working Group conducts biomonitoring tests which have detected up to 493 industrial chemicals, pesticides and pollutants in nearly 200 people. In a 2007 landmark study of chemicals in newborns, cord blood taken at birth showed nearly 200 chemicals on average in the babies tested.[1] This means that infants are born already exposed to a chemical soup including neurotoxins, carcinogens, endocrine disruptors and mutagens. I would like to take a moment to discuss a category of chemicals: PVCs.

PVC and associated pthalates and dioxins pose severe health effects in both children and adults through its production, use and disposal. The production of PVC creates toxic chlorine gas as well as significant releases of mercury by chlor-alkali processing facilities.[2] Workers in such plants have higher risk of multiple cancer as well as many other diseases. There is constant contamination of communities located near PVC facilities with vinyl chloride, a known carcinogen. Endocrine-disrupting chemicals from PVC plasticizers, such as phthalates, cause DNA damage in human sperm even at background levels. Gaseous emissions from vinyl materials in home and offices definitively causes respiratory symptoms in workers and asthmatic symptoms in children. Finally, no known methods of disposal (incineration, landfilling, recycling) safely and inexpensively manage PVC waste. Incineration in particular gives rise to dioxins. TCDD, one form of dioxin, has been found to have toxic health impacts at one trillionth of a gram, and causes endocrine disruption, neurological damage, cancer, infertility, and gene mutations.

As testing for environmental chemicals has become more widely available, I've learned through direct clinical experiences how toxins impact my patients. Jeremy, a 5 year old boy, suddenly experienced a significant exacerbation of seizures and new-onset, disabling obsessive-compulsive symptoms. We discovered that Jeremy's levels of phthalates were sky high. Within two weeks of eliminating sources of phthalate exposure and without medication, his symptoms of obsessive-compulsive disorder disappeared and his seizures quieted. I could tell you hundreds of similar

stories relating to elevated levels of these and other toxins that I measure in my patients.

Anecdotes are nice, but what about the scientific literature? The accumulating studies are uniformly disturbing and have given rise to a new field of science called epigenetics. We have learned that beyond their direct neurotoxic, carcinogenic or endocrine effects,[345] dioxins and phthalates alter our actual genetic expression.[6] Rather than causing a mutation in the actual DNA, they change the labels on our DNA that indicate to proteins where transcription begins or ends. These changes in labeling can have profound effects in every single organ system, including brain development. Most worrisome, these effects are heritable. Studies show that the effects of a phthalate exposure in your baby can be transmitted and expressed for several generations, so you would continue to see this effect in your grandchildren and great-grandchildren. With toxic exposures, it is not a question of simply being exposed to x chemical and you immediately see y result. Epigenetic research illustrates that chemical impact is tremendously complex and that the effects are far-reaching in ways we never imagined.

If children are exposed to hundreds of different compounds beginning from conception, we have to understand some issues related to toxicology, beginning with the idea of total load, also known as the exposome.[7] In this model, our internal sinks fill with all of these chemicals. In many, the drain cannot keep up and the basin will overflow. That overflow is the expression of a variety of clinical symptoms.

Toxins affect different individuals differently. In short, certain subpopulations are particularly vulnerable because they have polymorphisms in some or many enzymes that facilitate detoxification, like cytochrome p450 enzymes in the liver or cellular mechanisms of eliminating toxins. These children may have been fine with a small exposure to one or two chemicals, but these days they are awash in chemicals, some of which inhibit the very enzymes necessary to detoxify. As the saying goes: genes load the gun; environment pulls the trigger.

Many toxins have synergistic effects. For example, cigarette smoking increases the risk of lung cancer by 10 fold. Asbestos exposure increases the risk of lung cancer by 5 fold. But smoking and asbestos exposure together increase the risk of lung cancer 55 fold. In this way, the cumulative effect of exposures is more than additive or multiplicative. In another study, exposures to a toxic metal had no effect alone, but administration of a no response level (LD1) of a mercury salt with $1/20^{th}$ of a no-response level of lead salt killed all the animals. Again we see that the sum of combined exposures are greater than the parts.[8]

Toxic effects are cumulative. In the lab we may test for the effects of one chemical, but in life, they are never exposed to just one chemical. We store many of these toxins in our organs and in our fat cells. They become very difficult to release because they are trapped in our lipids. In order to be excreted, they must become

water soluble. So, we accumulate chemicals over time. (Note: Though it is difficult for men to clear toxins like dioxins, women have two additional ways to clear these fat soluble toxins in two major ways: through the placenta in pregnancy, and through the breastmilk during breastfeeding).[9]

The EPA has gotten held up in releasing its report, 15 years in the making, on the health effects of dioxins. A tremendous amount of literature shows that dioxins are harmful. So what is controversial? The EPA says that there is no safe amount of dioxin. The National Academy of Science says that perhaps there is some tiny amount that is safe. What is not in dispute is that it is harmful.

Why are children uniquely vulnerable to chemicals?

(1) Children have greater exposures. Compared with an adult, a 6-month-old formula-fed infant drinks 7× more water and has 3–4× more caloric intake. The air intake per pound of a resting infant is 2× higher than that of an adult. Children have a larger surface-to-volume ratio, which leads to higher dermal absorption. Children's hand to-mouth behavior and their play close to the ground further magnify their exposures. The consequence is that children have proportionately greater intake of toxic chemicals.

(2) Children have immature metabolic pathways. The ability of children to metabolize and excrete toxic chemicals is different from that of adults. Infants and young children are often more vulnerable because they cannot convert chemicals to the inactive forms that are able to be excreted from the body. An additional source of vulnerability in fetuses and young children is that the gut barrier and blood-brain barrier are not fully developed, and therefore toxic chemicals may more easily enter the bloodstream and the central nervous system.

(3) Developmental processes are easily disrupted. Rapid, complex, and highly choreographed growth and development take place in embryonic and fetal life, as well as in the first years after birth. The brain contains billions of cells that move to their assigned positions and establish precise connections with one another. Development of the endocrine and reproductive organs is guided by a complex and precisely timed sequence of chemical messages that is shaped by maternal as well as fetal hormones.

   a. "Windows of vulnerability" are critical stages in early rapid development when exposures to even tiny doses of toxic chemicals can disrupt organogenesis to cause devastating injury. Dr Philip Landrigan, an expert in environmental exposures at Mount Sinai School of Medicine, has stated that based on the scientific evidence,"there appears to be no safe threshold exposure levels in early development below which toxic chemicals exert no harmful effects. These windows of vulnerability have no counterpart in adult life."[10]

(4) Children have more time to accumulate toxic exposures. We now know that many diseases are triggered by toxic chemicals and evolve through multistage, multiyear processes. Because children have more future years of

life, they are at greater risk of developing disease in later life, such as malignancy and neurodegenerative disease, that may result from early exposures.

What we know about PVC, dioxins and phthalates is terribly worrisome. And we must factor in gene-environment interactions, multiple exposures, billions of mixtures, windows of vulnerability, and long latency effects.[11] Europe has long been ahead of the United States in the public health domain, employing the "precautionary principle" to any application of chemicals. This principle states that when an activity raises *threats of harm* to human health or the environment, precautionary measures should be taken even if some cause and effect relationships have not been fully established.

However, we are past wondering whether PVCs, dioxins and phthalates cause devastating health effects. At this point, we know definitively that they do, cumulatively, beginning in utero. My profession offers me the possibility of treating vulnerable children and adults who are suffering from the effects of these compounds. I treat Tiffany, an 11 year-old girl with cancer; Theo, a 3 year-old boy with autism; Aidan, a 6 year boy with intractable seizures, and thousands of other children like them. These children are uniquely vulnerable to toxins in the environment, and they need responsible adults to prevent them from being exposed to even one trillionth of another gram of PVC, phthalates or dioxins. Unfortunately, I don't have the power to directly change New York City's purchasing practices. But fortunately, you do. Please include PVC-free purchasing goals and provisions and meet the intent of Local Law 120.

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[1] http://www.ewg.org/minoritycordblood/home

[2] J Johnson, "Where Goes the Missing Mercury," Chemical & Engineering News 82(March 15 2004): 31-32.

[3] Neurodevelopmental low-dose bisphenol A exposure leads to early life-stage hyperactivity and learning deficits in adult zebrafish. Toxicology. 2011 Nov 15.

[4] Impact of early-life bisphenol a exposure on behavior and executive function in children. Pediatrics. 2011 Nov;128(5):873-82.

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[6] Gene expression is altered after Bisphenol A exposure in human fetal oocytes in vitro. Mol Hum Reprod. 2011 Nov 25.

[7] Journal of Exposure Science and Environmental Epidemiology (2011) 21, 5–9.

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[9] Wittsiepe J, Fürst P, Schrey P, Lemm F, Kraft M, Eberwein G, Winneke G, Wilhelm M. PCDD/F and dioxin-like PCB in human blood and milk from German mothers. Chemosphere. 2007 Apr;67(9):S286-94.

[10] Mt Sinai J Med. 2011 Jan-Feb; 78(1): 1-10.

[11] Lancet. 1998; 352(9124):251.

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Testimony of Ansje Miller
Eastern States Director
Center for Environmental Health

Public Oversight Hearing: Examining the City's Compliance with Environmentally Preferable Purchasing Laws

January 27, 2012

Good afternoon. Thank you for the opportunity to speak about this great opportunity that the city has to reduce the public health threat of dioxin through its environmentally preferable purchasing laws.

In our lifetimes we have all watched the steady climb in rates of cancer, developmental disabilities, hormonal illnesses, infertility, autism, birth defects, asthma, obesity, diabetes, and a long list of other serious diseases.

Whose friends and family have not been touched by these illnesses? Why are the rates of devastating sicknesses skyrocketing?

The answer is becoming clear: Industrial chemicals surround us.

My name is Ansje Miller and I am the Eastern States Director for the Center for Environmental Health. For over 15 years, CEH has been working to protect people from those toxic chemicals and promotes business products and practices that are safe for public health and the environment.

Now New York City has the opportunity to protect people from one of the most toxic chemicals known to science: dioxin. Dioxin is among the 12 "dirty dozen" chemicals banned by the United Nations Persistent Organic Pollutants (POPs) treaty because they can cause "serious health effects including certain cancers, birth defects, dysfunctional immune and reproductive systems, greater susceptibility to disease and even diminished intelligence."[1]

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[1] Clean Production Action. "Green Chemistry Makes Computing Safer for the Environment." Web Page accessed January 26, 2012 www.**cleanproduction**.org/library/CPA_Apple**greenchem**_Jan09.pdf

Local Law 120 of 2005 required the Mayor's Office of Contract Services "to promulgate rules to reduce the city's purchase or lease of materials whose combustion may lead to the formation of dioxin or dioxin-like compounds." The deadline was four years ago, yet we still don't have a rule.

One example of how the City could move Local Law 120 forward is to avoid electronics made with PVC. Because of its high chlorine content, PVC is a major source of chlorinated dioxin. Since technology changes so quickly, electronics have a relatively short lifecycle, making end of life concerns more pressing. The plastic components of electronics are usually burned at the end of life to recover the precious metals inside, leading to the release of dioxins.

Recognizing the health threat that PVC poses, Kaiser Permanente, the largest managed care organization in the United States adopted a Specific Environmental Criteria for all Purchasing Decisions: and that is, to avoid products containing PVC.

Promulgating a rule to phase out PVC, including for electronics, would go a long way to reducing dioxin exposure in New York and around the planet and is relatively low hanging fruit. There are safer, readily available alternatives. CEH created a Shopping Guide for Finding Greener Electronics. It provides an overview of companies that are offering consumer electronics that are free of PVC as well as another highly toxic class of chemicals, Brominated Flame Retardants. This Guide and other tools for purchasing greener electronics can be found on our website, www.ceh.org/electronics.

The Greener Electronics Guide was designed for consumers, but many of the same products are used in commercial settings as well. In fact, CEH has worked major purchasers including large healthcare and financial institutions (including Kaiser and one of the nation's largest brokerage firms) in their efforts by providing them with tools and information to help identify greener electronics during their RFP and RFI process, including PVC-free products. We could do the same for NYC.

New York City took a bold step to protect public health with this green purchasing law, both for its residents and for its power to change the market. Now it's important for the City to close the deal in phasing out PVC and it's contribution to one of the most toxic chemicals, dioxin. There are safer, affordable options readily available. CEH encourages and offers to support MOCS in swiftly promulgating a rule on dioxin that would include PVC-free purchasing to implement Local Law 120 of 2005.

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New York City Council
Committee on Contracts
Committee on Sanitation and Solid Waste Management

Hearing on "Examining the City's Compliance with Environmentally Preferable Purchasing Laws"

Michael Schade, Campaign Coordinator
Center for Health, Environment & Justice (CHEJ)

January 27, 2012

Good afternoon, Chairwoman James, Chairwoman Mealy, and members of the committee. Thank you for the opportunity to testify today.

My name is Mike Schade and I am a Campaign Coordinator with the Center for Health, Environment & Justice, a national environmental health organization that works to prevent harm from toxic chemicals. We have worked in NY State for almost 30 years, starting with the work of our Founder Lois Gibbs who led the successful campaign to relocate over 900 families away from the infamous Love Canal toxic waste dump. Over the years, we have worked on numerous green procurement efforts in New York State and nationally.

Our testimony today will specifically focus on the implementation of NYC Local Law 120 of 2005.

We worked closely with members of the City Council back in 2005 when this and the other green procurement bills were developed and were moving through the legislative process. We reviewed and commented on the legislation, submitted suggestions on ways they could be improved, testified at a City Council Hearing, and worked with leadership on the NYC Council to ensure its passage. We worked with a broad coalition of organizations who also submitted letters and testimony in support of this initative. A number of these organizations are with me here today.

We were ecstatic when this legislation was enacted. It was a tremendous accomplishment. Unfortunately, we are extremely disappointed by the lack of implementation of the dioxin purchasing law since then.

This law states *"By January 1, 2008, the director shall promulgate rules to reduce the city's purchase or lease of materials whose combustion may lead to the formation of dioxin or dioxin-like compounds."*

It has been over six years since the law was enacted, and over four years since the City was supposed to develop regulations to implement it. No regulations have been developed. It's clear the City is not in compliance with this critically important law.

This legislation focused on the city's purchase of products that form dioxin because dioxin is one of the most toxic chemicals on the planet. Dioxin is more commonly recognized as the toxic contaminant that was found in Agent Orange in Vietnam. Scientists across the globe have recognized that exposure

to dioxin is a global health threat. **Dioxin is classified as a chemical known to cause cancer in humans.** Dioxin exposure is also associated with:

- Endometriosis;
- Diabetes
- Decreased fertility;
- Miscarriages;
- Lowered testosterone levels;
- Decreased sperm counts;
- Decreases testis size;
- Birth defects;
- Learning disabilities ;
- IQ deficits;
- Effects on the immune system;

The list go's on and on. Because of these health concerns, over 170 nations across the world have signed a global treaty to phase it out.

That's why the NYC Council enacted this legislation over 6 years ago. That's why we're here today.

Where does dioxin come from? How can NYC finally implement this green procurement policy?

A plastic known as polyvinyl chloride, which stands for PVC or vinyl, is one of the largest sources of dioxin in America. When its entire lifecycle is considered, the production and disposal of polyvinyl chloride (PVC or vinyl) appears to be associated with more dioxin formation than any other single product purchased by NYC agencies. Dioxin is released when the plastic is manufactured, and especially when it's burned in incinerators, landfills, and even accidental building fires. As we know, much of NYC's waste, including PVC waste, ends up in incinerators and landfills. In fact, NYS is #2 in the country for burning PVC in incinerators. Just a few weeks ago, the EPA announced the number one facility in America that reported releasing dioxin is a PVC plant in Kentucky that makes PVC building and consumer products. The very same types of PVC products that NYC governmental agencies purchase.

This impacts all of us because when PVC is burned and releases dioxin into the atmosphere, dioxin then settles on crops. Cows and other animals then eat the dioxin-contaminated crops, we eat those animals and drink milk, and then we're exposed to dioxin from the food we eat. The chemical then builds up in our bodies. In fact, virtually every single resident of NYC has dioxin in their bodies.

NYC agencies purchase and use many products made out of PVC plastic. This includes office supplies such as 3-ring binders, paper clips, computers, laptops, report covers, and other products. This also includes building materials such as carpeting, flooring, furniture, wall coverings, windows, roofing, playground equipment, siding, and many others.

When the City Council enacted this legislation back in 2005, City Council staff put together a report that explained why the city wanted to tackle dioxin. In this very report, the City Council staff discussed the the relationship between dioxin and PVC. This report clearly demonstrates that reducing the purchase of PVC to avoid dioxin was the intent of the legislation. There's no question about it. I have attached those pages to my testimony.

After the legislation was signed into law by Mayor Bloomberg, an aide to City Council Speaker Gifford Miller was quoted in a plastics industry trade journal. The aide to the City Council Speaker said, *"It's fairly obvious they will get to PVC because it is one of the most widely purchased chlorinated products."* Yet, here we are today, over six years later.

Thankfully, it's not all gloom and doom. Safer, cost-effective alternatives to PVC products are readily available for NYC agencies to purchase. A number of other cities around the U.S. and world have enacted policies to reduce the purchase of PVC. The U.S. Green Building Council's LEED program provides incentives to avoid building materials such as PVC that release dioxin. Scores of major corporations like Staples, Wal-Mart, Apple, HP, Procter & Gamble, and many others are phasing out the purchase of PVC.

Staples in particular has been transitioning away from PVC office supplies in recent years and now offers safer PVC-free products that NYC agencies can purchase. We've surveyed their stores, and have identified dozens of products they used to sell that would contain toxic PVC. Thankfully they have transitioned to safer PVC-free materials that NYC agencies can now purchase. Here is an example of a PVC-free binder made by Avery that I purchased at Staples, just a few blocks from here on Broadway recently. You'll see on its cover it's labeled "PVC-free."

Here in New York, the state Office of General Services has developed a list of 85 hazardous chemicals of concern to avoid purchasing, which includes dioxin, phthalates and other chemicals that are all uniquely associated with PVC products. To implement this chemical avoidance list, the state recently developed PVC-free purchasing specifications for state carpeting contracts. We believe there are opportunities for NYC and NYS governments to collaborate to implement this dioxin procurement initiative together.

We would also like to work with the Bloomberg Administration and the city Council to finally implement this important law.

This past May, we and a coalition of over 20 local, state and national organizations sent a letter to the NYC Mayor's Office of Contract Services (MOCS) expressing deep concern about this very issue. The letter was signed by environmental, health, labor, and community environmental justice groups including UFT, CSEA, NYCOSH, Make the Road NY, WE ACT, Mother's on the Move, NRDC, NYPIRG, NY Lawyers for the Public Interest, and others.

In our letter, and today, we and our coalition partners strongly recommend that the Mayor's Office of Contract Services finally draft the dioxin regulations, and specifically include polyvinyl chloride (PVC)-free purchasing goals and provisions in the rules to implement Local Law 120 of 2005, as the law was clearly intended to do.

We would welcome the opportunity to, and hope to work with the Bloomberg Administration and City Council to finally do so.

Thank you for the opportunity to testify before you today.

American
Sustainable
Business
Council

Testimony from: David Levine, Cofounder, American Sustainable Business Council
dlevine@asbcouncil.org 917-359-9623.

Hello my name is David Levine. I am cofounder and Executive Director of The American Sustainable Business Council, based here in NYC. The Council is a growing network of business organizations and businesses committed to advancing a new vision, framework and policies that support a vibrant and sustainable economy. Today, the organizations that have joined in this partnership represent over 100,000 businesses and more than 200,000 entrepreneurs, owners, executives, investors and business professionals.

I am here today to testify as to the importance of the NYC Environmentally Preferable Purchasing Laws to our businesses and the economy of NYC, particularly implementing the dioxin procurement ordinance signed into law back in 2005.

The uncertainty surrounding the safety of chemicals like dioxin is eroding consumer confidence in a wide range of products and companies. Implementation of the dioxin procurement law would enable NYC government to lead by example and help restore that confidence.

More and more companies are highly motivated to identify and use safer alternatives to toxic chemicals such as dioxin and PVC and produce safer healthier products. They recognize that not only do safer chemicals protect human and environmental health but also they cut the costs of regulation, hazardous waste storage and disposal, worker protection, and future liabilities. In other words it makes good economic sense to produce safer products. If NYC implements its EPP dioxin procurement program it will create a clearer set of criteria, definitions and therefore a more trusted marketplace and greater incentives for all businesses to move to meet this market demand.

Some of the benefits of green purchasing include:

• Increasing trust among consumers, employees, communities, and investors, leading to a more positive business environment.

• Expanding markets for safer and greener products.

• Reducing the costs and risks, especially product liability associated with managing toxic chemicals.

• Lowering expenses from chemically induced employee illness and enhancing productivity from improved employee health.

• Creating a more competitive, innovative, and economically profitable economy for NYC.

In a study by Deloitte in 2009 95%of consumers said they "would buy green/safer products". In the Green Gauge Survey of Consumers 65% say "the government should set higher standards for environmental label on products. The Shelton Group study says "A top consumers reason for buying green: Limit exposure to toxins & chemicals. " All these would validate the need to have greener PVC-free products.

When we hear from businesses and purchasers that argue against regulations of chemicals, saying that it cannot be done, and it is a job killer, then we look to the recent market shift away from PVC plastic in recent years due to concerns about dioxin. Companies including Wal-Mart, Sears Holdings, Nike, Apple, Microsoft and many others have taken significant steps to reduce or phase out PVC. For example Target has been eliminating over 5.5 million pounds of PVC per year. Google has announced they are committed to eliminating the use of PVC plastic in new office spaces. Over 100 hospitals and healthcare providers have pledged to reduce or phase out PVC and/or phthalates. Just this week, the Washington Post reported that healthcare giant, Kaiser Permanente, is eliminating the use of PVC in their medical devices. This conversion affects nearly 100 tons of medical equipment and also is expected to save them close to $5 million a year. In October, the largest healthcare purchasers in America, with a purchasing power of over $135 billion, announced they will be asking suppliers whether or not their products contain PVC plastic to drive markets away from this hazardous plastic. This upheaval in the marketplace proves the capacity of American business to adapt, innovate and create success.

David Levine American Sustainable Business Council dlevine@asbcouncil.org

NYC can help continue to spur this market movement by utilizing its purchasing power to drive the marketplace away from harmful materials like PVC that form dioxin.

According to the Ethical Markets Media's research as shown in their Green Transition Scoreboard's there were $2.4 trillion in private sector investments in growing the green economy worldwide with that number climbing.

By implementing the dioxin PVC-free Environmentally Preferable Purchasing Law, NYC can lead the way and create the economy of tomorrow – today – an economy where safer chemicals can be used to create safer products, which spur innovation and grow existing and create new business opportunities and jobs and in which everyone can rest assured that the only choice is a healthy one.

Thank you very much for holding this hearing, and for giving me the opportunity to speak.

David Levine American Sustainable Business Council dlevine@asbcouncil.org

January 27, 2012
Testimony of the Brooklyn Solid Waste Advisory Board by Ken Diamondstone

Good morning Councilmember Gennaro, Councilmember James and members of your respective committees. I'm grateful for the opportunity to testify on this important issue.

My name is Ken Diamondstone. I'm here representing the Brooklyn Solid Waste Advisory Board established under local law 19 of 1989.

We have over many years beginning when Councilmember Stanley Michaels and then Councilmember Michael McMahon chaired the Sanitation and Solid Waste Committee, been calling on the City to purchase far more Environmentally Preferable Products in the belief that with it's enormous 15 or 16 billion dollars in purchasing power, New York City could single handedly sustain the vendors who produce of many Environmentally Preferable Products through repeated and consistent purchases. Imagine how this might result in vendors trying to move closer to their New York City market, perhaps purchase or lease an industrial property, invest capital for construction, hire a work force and then pay taxes. Truly a win for the producer and for New York City.

Because of our intense interest in this subject we are particularly disappointed by the current annual reporting of Environmentally Preferable Product purchases under local law 118-123 of 2005 and local law 86. Our view is that they lack sufficient detail to determine whether the City is in fact in compliance with Environmentally Preferable Products purchasing laws or not but the very lack of detail probably places the City out of compliance. It amazes us for example that a product such as biodiesel fuel made from reprocessed animal and vegetable oils are not among the list of Environmentally Preferable Products.

The older 2001 Environmentally Preferable Purchasing guide referred to the practice of specifying products with attributes such as reusability, reduced packaging, energy efficiency, recycled content, were rebuilt or remanufactured, eliminated single use items, were less toxic or reduced waste through extended product warranties, or were leased rather than purchased.

In the current annual reports, little or no mention is made of several of these categories except for toxicity, recycled content and Energy Star products. Even the Energy Star category makes no distinction between tier I, II or III in Energy Star ratings which are considerable.

How useful for example is a report which after having read about a multimillion dollar furniture purchases from the Herman Miller Company, we don't have a clue whether the furniture is new or remanufactured.

Neither do we learn whether the City uses new oil filters, antifreeze or engine oil for its fleets or do they recycle them after thoroughly cleaning these items. Do we use new tires or retreads assuming that the specifications qualify all these items (and they do).

What about waste prevention products such as those with reduced packaging, or those food products produced locally which reduce both packaging and fossil fuel emissions by eliminating long distance shipping?

They are not identified anywhere in these reports.

And are higher dollar values for year over year purchases the result of increased units of Environmentally Preferable Products or from the increased price of a unit? No specifications given.

A basic premise of Environmentally Preferable Products reporting was that a baseline be set for each agency's purchases and that annual increases or decreases in types and quantity of Environmentally Preferable Products be measured. This is not occurring or at least not being reported.

Sadly, in 2011 the total reported Environmentally Preferable Products purchased by New York City amounted to a mere $16,871,716 in addition to $357,000,000 of Environmentally Preferable Products identified in construction contracts, out of over $13 billion in New York City purchases.

We strongly urge that local law 118-123 and local law 86 of 2005 be extensively revised to include a more expansive and comprehensive set of categories for Environmentally Preferable Products, more specific itemizations of Environmentally Preferable Products, more comparisons of year to year purchases, more accountability by each mayoral agency for Environmentally Preferable Products and require a greater commitment to and a deeper understanding of the significance of environmentally preferable purchases and their implications for a sustainable New York in the 21st century.

The Brooklyn Solid Waste Advisory Board would welcome an opportunity to join with you and other environmental groups in the revision of these important laws.

Finally and totally related to the purpose of this hearing, I urge you to take note of the City of Surry in Canada's British Columbia, population ½ million. In a much overlooked area of Environmentally Preferable purchasing by New York City (i.e. bio methane), the City of Surry will by 2015 convert all curbside organic Municipal solid waste through anaerobic digestion into a bio methane chemical replica of fossil fuel natural gas and use it to power its entire sanitation fleet thus dramatically cutting emissions, tipping fees and fuel cost with a rich soil supplement as a by product to boot.

Thank you.

New York City Hearing on
Compliance with Environmentally Preferable Purchasing Laws
Testimony Submitted on January 27, 2012

Chairmen of the Committee on Contracts and the Committee on Sanitation and Solid Waste Management, members of the New York City Council, and other concerned citizens of New York City:

Thank you for convening this hearing on a matter that is of utmost urgency to all New Yorkers. Grassroots Environmental Education is an environmental health non-profit focused on the relationship between environmental toxins and human health. We are particularly concerned about children's unique vulnerability to toxic exposures due to their immature organs and developing bodies making it more difficult for them to eliminate certain toxins. Due to their size, children receive proportionally greater doses of chemical contaminants found in air, water and food. Even a small exposure occurring during a critical window of a child's development could result in permanent adverse health outcomes. Children regularly engage in hand to mouth behaviors and spend a great deal of time on the floor and ground putting them in close contact with toxins that may be ingested.

Recently the ***President's Cancer Panel*** in its annual report recommendations to government, industry, and health care professionals stated, "Opportunities for eliminating or minimizing cancer-causing and cancer-promoting environmental exposures must be acted upon to protect all Americans, but especially children. They are at special risk due to their smaller body mass and rapid physical development, both of which magnify their vulnerability to known or suspected carcinogens,.... Numerous environmental contaminants can cross the placental barrier; to a disturbing extent, babies are born 'pre-polluted.' Children also can be harmed by genetic or other damage resulting from environmental exposures sustained by the mother and in some cases, the father.."

A recent analysis by Dr. Leo Trasande, published in the journal ***Health Affairs*** updated and expanded a previous analysis of the annual costs of environmentally mediated diseases in children in the United States. The study found that the costs of childhood cancer, asthma, and neurological disorders had escalated from $54.9 billion in the 2002 analysis to $76.6 billion in 2008. Dr. Trasande states that the analysis re-emphasizes for policy makers the implications of failing to prevent toxic chemical exposures not only for the health of children but also for the health of the economy.

We applaud members of the New York City Council for recognizing the increasing human health and environmental threats posed by persistent bioaccumulative toxic chemicals found in many products and the passage of legislation in 2005 that will reduce the purchase of such products. The dioxin-free purchasing section of the legislation was primarily intended to target New York City's purchase of polyvinyl chloride products (PVC) which is a major, yet preventable source of dioxin.

Formation of dioxins take place throughout the PVC lifecycle and has been well documented in the production of chlorine, synthesis of ethylene dichloride and vinyl chloride monomer, hazardous wastes from the production cycle, incineration of PVC products and burning of PVC products in structural and landfill fires. Among the most toxic chemicals known to exist, dioxins are a class of several hundred chemicals that are unintentionally created from the manufacture and disposal of PVC products. The International Agency for Research on Cancer (IARC),

U.S. Department of Health and Human Services, and the National Toxicology Program all recognize dioxin as a known human carcinogen. In an EPA draft report, the contribution of PVC to dioxin formation is emphasized and is of particular concern in structural fires during which PVC-containing building materials and furnishings are primary sources of chlorine. Overall, PVC's production, additives, use, waste disposal and incineration pose serious risks to the general public and especially to children.

PVC can cause cancer through inhalation and ingestion. It is known to cause liver, brain, and central nervous system cancers and is also associated with lung cancer, leukemia and lymphoma. It has also been linked to circulatory changes and various symptoms from acute exposures including dizziness, lightheadedness, headaches, nausea and abdominal pain. There are many hazardous substances that are added to PVC products that are harmful to human health. One example is phthalates, a group of chemicals used primarily to make plastics more flexible and resistant to breakage and are used in PVC products including flooring, furnishings and office supplies which can contribute to poor indoor air quality in the offgassing process. Phthalates are toxic to humans and are known endocrine disruptors that may be linked to early onset puberty in girls which carries an increased breast cancer risk. Phthalates have also been shown to negatively impact development of male reproductive systems, including structural abnormalities and low sperm counts. The Center for Disease Control (CDC) has also reported a link between phthalates and liver cancer. Several recent studies have also linked phthalates with increased risk of miscarriage, variations in infant behavior and reflexes, negative impacts on thyroid hormonal levels and children's neurodevelopment. Significant links have also been reported between PVC flooring, asthma and autism spectrum disorders. Furthermore, an association was also found between concentration of phthalates in indoor dust and wheezing among pre-school children.

Thankfully, safer, cost-effective alternatives to PVC products are readily available in the marketplace for NYC procurement. Many major corporations, medical institutions and government agencies nationwide have enacted policies to reduce the purchase of PVC products and other products made from hazardous substances. The New York State Advisory Panel on Green Procurement recently voted to approve a guidance policy requiring all New York State agencies to consider avoiding 85 chemicals of concern in products purchased by the State. The Chemicals of Concern list includes dioxin, ethylene dichloride, phthalates, vinyl chloride and all hazardous substances associated with PVC products. This provides a critical opportunity for New York City to collaborate with New York State on state PVC-free contracts.

The best way to avoid the negative human health and environmental impacts and economic burden of toxic exposures is to minimize the production and purchase of toxic products. Children and their parents rely on government officials to provide the protections they need for their health and safety. The stakes are too high to deliver anything less than the full implementation of a PVC-free procurement plan for New York City.

We urge the New York City Office of Contract Services to include PVC-free procurement specifications in the rules to implement Local Law 120 of 2005.

Respectfully submitted by,

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http://www.epa.gov/wastes/partnerships/npep/success/sylvin.htm
Last updated on August 4, 2011

Wastes - Partnerships - National Partnership for Environmental Priorities (NPEP)

NPEP Success Story: Sylvin Technologies

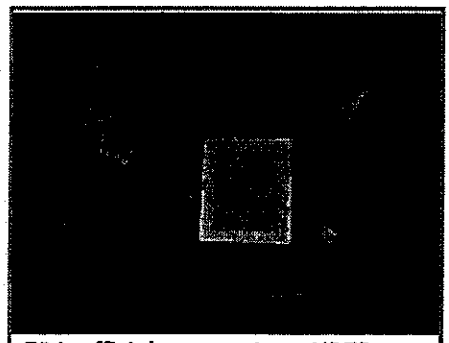
Sylvin Technologies, Inc. Eliminates Over 475,000 Pounds of Lead; Now A Lead-Free Facility

Disclaimer Note

The success stories provided on this website were obtained from NPEP partners. EPA edited the descriptions for space, stylistic consistency, and clarity, but they were not written or officially endorsed by EPA. Reference herein to any specific company or commercial products, process, or service by trade name, trademark, manufacturer, or otherwise, does not necessarily constitute or imply its endorsement, recommendation, or favoring by the United States Government.

National Partnership for Environmental Priorities

Sylvin Technologies, Inc. was founded in 1978 in Denver, Pennsylvania. Sylvin's initial focus was to design and manufacture custom PVC compounds primarily for the electrical wire, cable and power supply cord markets. Since then, Sylvin has successfully diversified its product portfolio to include supplying applications in the building and construction, automotive, furniture, and appliance markets. All of Sylvin's materials are specially formulated to meet customer physical property and processing specifications. Each PVC compound includes a proprietary mixture of PVC resin, plasticizer, heat stabilizers, lubricants, fillers, and pigments. Compounds are produced by mixing raw materials in high-intensity batch mixers, processing the resulting powder blend through an extrusion fusion system that ultimately produces a PVC pellet. Sylvin has three production lines with an annual capacity in excess of 36 million pounds.



EPA officials present an NPEP Achievement Award to John Schlitzer of Sylvin Technologies, Inc. on October 25, 2005.

Sylvin's NPEP Goals

Sylvin set two NPEP goals to reduce lead by asking its customers to switch to its newly developed lead-free versions of their old compounds. In 2003, Sylvin used 225,244 pounds of lead and for 2004, its goal was to decrease the need for lead to 100,000 pounds. Sylvin also committed to eliminating another 99,508 pounds of lead by the end of 2006 and becoming lead-free.

NPEP Project Implementation

One of the primary heat stabilizers used in the manufacture of PVC compounds is lead. Lead, being a hazardous chemical, posed potential health issues to Sylvin employees and required regulatory reporting by Sylvin and its customers. Sylvin management concluded in early 2000 that it would be in the best interest of all Sylvin associates and customers to develop a lead reduction plan.

From that point, the Research and Development (R&D) team established an initial goal of monitoring

lead usage and developing lead-free alternatives for customers. The R&D team also committed to ending all new product development projects that utilized lead. This was a major commitment because, at the time, there were several product applications that could only be pursued using lead-based materials. Limiting the product development activities to include only lead-free products firmly illustrated management commitment to the program.

Hurdles Faced

From a technical and commercial standpoint, the challenge with this initiative was to ensure that the alternative materials met existing material performance requirements, processed as well as those containing lead, and were not more expensive. In most cases the development team was successful in this endeavor.

One significant challenge that had to be worked through was the fact that some customers face significant internal or external costs in approving any alternative materials. The Sylvin team addressed this issue by educating customers on the value of going lead-free while developing seamless alternative materials. Sylvin's technical staff performed significant materials comparison tests and attended sample process trials. These efforts have proven to be very successful as Sylvin is well on the way to reaching its ultimate goal of being lead-free. In fact, in 2004 these efforts resulted in reaching the goal for the year.

Waste Minimization Results

When the waste minimization program started in 2003, Sylvin processed 475,657 pounds of lead. By the end of 2003, Sylvin was able to reduce the amount of lead processed to 225,244 pounds. In early 2004, the program was achieving such outstanding results that more aggressive goals were established. The target levels then became less than 100,000 pounds in 2004, no more than 50,000 pounds in 2005, and zero lead usage by the end of 2006. As of August 31, Sylvin Technologies has achieved its ultimate goal of no longer processing lead in their facility.

Lessons Learned

One valuable lesson learned through this project is that it is best to involve your customers early in the process. Allow enough time to work through potential solutions. In addition, gaining top management commitment to the program, establishing visible goals, and assigning a team to the goal are all critical to success.

Statement of
Stephen Boese
Executive Director
Learning Disabilities Association of New York State

To the

New York City Council
Committee on Contracts
Committee on Sanitation and Solid Waste Management

"Examining the City's Compliance with Environmentally Preferable Purchasing Laws."

250 Broadway
Friday, January 27, 2012

The Learning Disabilities Association of New York State, founded in 1958, is the nation's oldest advocacy organization on behalf of persons with learning disabilities, their families, and the professionals and programs that serve them. We are the New York State Affiliate of the LDA America and we are further represented by eight regional affiliates throughout the state, including the LDA of New York City, which provide wide-ranging services for children and adults with learning disabilities and related neurological impairments.

A learning disability is a life-long neurobiological disorder that affects the manner in which individuals select, retain and express information. In many cases, learning disabilities interfere with the development and use of language and the ability to speak, read, write, spell or perform math calculations. Learning disabilities affect an individual's self-esteem, education, vocation, socialization and daily living activities. Learning and developmental disabilities present lifelong challenges to affected individuals and their families. Learning disabilities are "hidden" disabilities meaning you cannot look at a person and "see" that they have a disability. Often learning disabilities result in a lack of competitive employment and/or successful independent living. Deficits in basic reading skills are the most common and often the most debilitating forms of learning disabilities. Learning disabilities are life-long. They are not outgrown and they do not disappear when a child becomes an adult or leaves school. There is no "cure" for learning disabilities and learning disabilities cannot be treated with medication.

According to the U.S. Centers for Disease Control and Prevention (CDC), the number of U.S. children with learning and developmental disabilities has been climbing over the past decade, reaching nearly one in six by 2008. The increasing prevalence of autism and attention deficit hyperactivity disorder accounts for most of this change.[1] The National Academy of Sciences estimates that combinations of environmental factors, including toxic chemicals, along with genetic susceptibility, cause or contribute to at least a quarter of learning and developmental disabilities in American children. [2] Intellectual disability (ID, formerly referred to as mental retardation) impacts approximately 1.4 million children. Attention deficit hyperactivity disorder (ADHD) is

conservatively estimated to occur in approximately 2 million, children. Almost 1% of 8-year-old children are diagnosed with autism spectrum disorder, a 10-fold increase over just a 15-year period.[3 4 5]

Because of this growing epidemic of neurological impairments and intellectual disabilities in our children, and because of the growing recognition that a substantial part of this increased incidence is attributable to environmental exposures, the Learning Disabilities Association of New York State strongly supports legislative and regulatory initiatives to better regulate chemicals in everyday consumer products that cities like NYC purchase, and to better inform individuals and families of the chemical exposure risks. We therefore urge *NYC to comply with the law and reduce the purchase of toxic PVC plastic, a major source of dioxin in the environment.*

In recent decades, many scientists have begun to focus on the effects of chemicals on the brain during fetal development and childhood. Extensive evidence has accumulated showing that neurotoxic chemicals can have a profound effect on the developing brain at levels that were once thought to be safe When chemicals inhibit or otherwise alter or interfere with a developmental process, the damage is likely permanent.

Dioxin, a chemical released by PVC, is one of the chemicals linked with the development of learning and developmental disabilities. (Other chemical by products of PVC linked to neurological impairments in children include lead and mercury) PVC is also currently extremely common component of products that NYC purchases, not to mention homes, schools, consumer products and elsewhere in our environment. This proliferation of PVC results in a subsequent proliferation of dioxin. Chemical body burden studies consistently show levels of dioxin within individuals studied. Today babies are being born pre-polluted with potentially harmful levels of Dioxins that may possibly cause lifelong health problems. Dioxins build up in our bodies over our lifetime and can remain there for many years. The levels of dioxins in our bodies are at or near the levels known to cause harm. The half-life of dioxin in people ranges from seven to eleven years.

The impact of learning disability and related neurological impairment on federal, state and local budgets is enormous. The impact on the affected individuals, their families and communities are incalculable. The scope of the problem is experienced in a number of ways:[6]

- On average, it costs twice as much to educate a child who has learning or developmental disabilities as to educate a child who does not.
- Children with learning disabilities or attention deficit hyperactivity disorder (ADHD) compose between 10% - 15% of the school-age population and represent over half the children who receive special education services in the United States.
- 35% of children with learning disabilities drop out of high school. This is twice the rate of students without LD.
- Only 13% of students with learning disabilities (compared to 53% of students in general population) have attended a 4-year post-secondary school program within two years of leaving high school.
- According to the CDC individuals with autism spectrum disorder have average medical expenditures that exceed those without the disorder by $4,110–$6,200 per year.[7] [8] Recent studies have estimated that the lifetime cost to care for an individual with an ASD is $3.2 million. A 2006 study reported that the economic costs associated with autism in the U.S. are approximately $35 billion dollars per year.[9]
- Up to 60% of adolescents in treatment for substance abuse have learning disabilities.
- 62% of students with learning disabilities were unemployed one year after graduating.
- 48% of all persons with learning disabilities are out of the workforce or unemployed.
- 50% of females with learning disabilities will be mothers (most of them single) within 3-5 years of leaving high school.
- 44 percent of the TANF (welfare) population were found to have a learning disability.

- Learning disabilities and substance abuse are the most common impediments to keeping welfare clients from becoming and remaining employed.
- 31% of students with learning disabilities will be arrested 3-5 years out of high school.
- 50% or more of juvenile delinquents tested were found to have learning disabilities, while nearly half of the inmates in adult correctional facilities have learning disabilities.

There are now many pathways of exposure to products comprised of chemicals that potentially cause harm, such as PVC and dioxin. Children are uniquely vulnerable to these chemical exposures, and the steadily increasing use of chemicals in consumer products correlates with an increasing incidence of neurological impairment. The cost for society is huge. The impact on the individuals themselves and their families are incalculable.

It has been often said that our children will be the first American generation to be less healthy and live fewer years then their parents. What an awful legacy. Personally, as a father of a son who lived many years with severe disability, it is beyond alarming to see such a dramatic increase in preventable neurological impairments in children, and to see so little being done to look at the root cause and promote effective policies to prevent further occurrence. We are in the midst of a most tragic epidemic. It is incumbent upon all policymakers to look at this directly and with determination to do all that can be done to prevent further disability where possible. Control of toxic chemicals is one very important part of this effort.

We therefore urge NYC to comply with Local Law 120 of 2005 and restrict the purchase of PVC as one tangible step towards reducing toxic exposures to chemicals like dioxin that cause learning disabilities and related neurological impairments.

Much of the material in this testimony is from a background paper on chemicals and learning disabilities prepared by Maureen Swanson, Director of the LDA of America's Healthy Children's Project. A special thank you to Ms. Swanson for sharing this with us.

Much of the information specifically concerning PVC and dioxin comes from various sources published by CHEJ. We also thank them for sharing this information with us.

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[1] Coleen A. Boyle, et al. "Trends in the Prevalence of Developmental Disabilities in US Children, 1997–2008," *Pediatrics*, 127 (6) (June 2011): 1034-1042.

[2] National Academy of Sciences Committee on Developmental Toxicology. Scientific Frontiers in Developmental Toxicology and Risk Assessment. Washington, DC: National Academy Press, 2000.

[3] Steven G. Gilbert, "The Scientific Consensus Statement on Environmental Agents Affiliated with Neurodevelopmental Disorders," (Bolinas, CA: Collaborative on Health and the Environment, 2008), abstracted in *Neurotoxicology and Teratology*, 31, no 4, (July–August 2009): 241–2., 31, no 4, (July–August 2009): 241–2.)

[4] National Institute of Mental Health, "NIMH's Response to New Autism Prevalence Estimate," http://www.nimh.nih.gov/about/director/updates/2009/nimhsresponse-to-new-autism-prevalenceestimate.shtml (November 4, 2009).

[5] Catherine Rice, "Prevalence of autism spectrum disorders — Autism and Developmental Disabilities Monitoring Network, United States, 2006, National Center on Birth Defects and Developmental Disabilities," *MMWR Surveillance Summaries*, 58, no. SS10 (December 18, 2009): 1-20. http://www.cdc.gov/mmwr/preview/mmwrhtml/ss5810a1.htm.)

[6] Assembled data from various sources available from LDANYS

[7] Tom T. Shimabukuro, Scott D. Grosse SD, and Catherine Rice, "Medical Expenditures for Children with an Autism Spectrum Disorder in a Privately Insured Population," *Journal of Autism and Developmental Disorders*, 38, no. 3 (March 2008): 546–52.

[8] Centers for Disease Control and Prevention, "CDC Statement on Autism Data," http://www.cdc.gov/ncbddd/autism/data.html (accessed October 10, 2009).

[9] M.L. Ganz, "The Costs of Autism," *Understanding Autism: From Basic Neuroscience to Treatment*, First Edition, Steven O. Molden, ed, and John Rubenstein, ed, (Boca Raton, Florida: CRC Press, 2006): 475–502.

STATEMENT OF PENELOPE JAGESSAR CHAFFER

January 27th, 2012

New York City Council Hearing on

"Examining the City's Compliance with Environmentally Preferable Purchasing Laws."

Chairwoman James, Chairwoman Mealy, and fellow New York City Council members.

My name is Penelope Jagessar Chaffer and I am grateful for this opportunity to address you today. I am here to support the Regulation of Dioxin to Local Law 120, which I believe to be a crucial piece of legislation, that could be instrumental in improving the health and welfare of New York City's youngest and most vulnerable citizens.
I sit before you as a mother of two young children, this is Oceana, my daughter who is 1 and I also have a son, Zephyr who is 6 years old. I also come before you today in my professional capacity as a filmmaker. For the past six years I have been making the feature documentary film "Toxic Baby," which looks at how chemicals like dioxin in our environment affect the health and development of babies and young children.

I have interviewed dozens of leading scientists from Europe and the US about the implications of chemical exposure and I was horrified by what they had to say. Chemicals like dioxin, routinely found in our day to day environments, are poisoning our children.What was particularly heartbreaking is that the routes for these exposures come primarily from what their mothers have been exposed to. Chemicals like dioxin that a mother is exposed to can cross the placenta and enter the baby. Then when our children are born, they eat, breathe and absorb chemicals both from the products we expose them to and from the manufacture and disposal of the products found in our lives.

And this is not a theoretical concern. I was stunned to find out that phthalates and dioxins, the two chemical groups of concern associated with this legislation, had been found in the umbilical cord blood of new born babies. The only way these chemicals could be present is from those babies' mothers. American babies are being born, already polluted with dioxin, phthalates and other harmful chemicals.

I found it hard to believe that I could have these chemicals in my blood and in my body. Clearly I don't live anywhere near somewhere like Love Canal. I don't live next to a chemical factory or chemical waste site. I live in Brooklyn! I'm having the same experience, breathing the same air and living the same life as millions of other New Yorkers. So as part of the film, I had my blood tested. I was convinced that, at the most, I might have the odd chemical here or there but nothing of any consequence. Well, I was deeply horrified, scared and overwhelmed by what was found. I had more dioxins and dioxin like chemicals than any other group. This is what the doctor who

gave me my results said to me:

"If we look at the health effects you see with dioxins, the list is exorbitant. We see everything from birth defects, to the disruption of hormonal processes, decreased lung function, reduced production of blood platelets, immune effects, increased rates of cancer and indeed increased cancer risks, influence on your thyroid, liver damage, dental problems, behavioral problems, retardation of brain development and cognitive development and a retardation of sexual development. The list is ongoing, dioxins have an effect on almost every organ in your body."

Can you imagine what it is like to have someone tell you, face to face, that this is what you have in your body and this is potentially what could be in store for your children as a result of you carrying these chemicals?

The tragedy for me and my children was that there was even more. Phthalates are chemicals used to soften PVC plastic – over 90% of which are used in PVC. So it's not just the dioxin we're exposed to from this plastic. In the film we show two disorders linked to the phthalate group of chemicals. In fact I saw pictures of newborn boys with deformed penises, which required extensive surgery to correct and we show the pictures of these penises being opened and then sewn up. We also show images of two and three year old girls with breasts and pubic hair, some of whom also had started getting their periods. Two and three year old girls. And guess what? I had significant amounts of the same phthalate chemicals in my blood. The same phthalates found in PVC plastic purchased by NYC agencies. In some cases I had even higher levels. Remember, I live in Brooklyn, going about my daily life and this is what is turning up in my blood.

Just over a year after getting these results, I became pregnant. That baby had a birth defect that is on the rise and he died while still in the womb. The guilt and grief that I felt was overwhelming. Was this because of the chemicals in my body? Probably...but we will never know for sure. When Oceana was born, I was desperate with worry. Would she have some horrible condition? Would she be deformed in any way? Thank God, she seems fine, but I spend every waking day checking to see if my kids have any symptoms of cancer or any other disease linked to the chemical exposures.
Our children are sicker than any other generation, in the history of our planet. We have more asthma, more childhood cancer, more developmental disabilities like autism and ADHD. We have more birth defects. All of these conditions linked to the thousands of chemicals that we have been exposed to all of our lives. Dioxin and phthalates, chemicals released by PVC plastic that NYC purchases, are among the worst of the worst chemicals. And it's not just me. Almost every single NYC resident has measurable levels of these chemicals in their bodies. Every single person in this room. Every single member of the NYC Council. Even Mayor Bloomberg. Where do they come from? PVC plastic, like the PVC plastic products that NYC agencies purchase. We need to change the way we do things, make things, buy things. NYC can help change this, and utilize its purchasing power to shift the market away from this toxic plastic. After all, it's the law that the City has not been following.

We have to protect women of childbearing age, mothers, their unborn infants and their young children. We now know that exposure to toxic chemicals like dioxin and phthalates at this stage of life is making our children horrendously ill and this not only affects them it could affect our children's children as well.

New York City has the opportunity to finally implement this dioxin procurement measure, and significantly reduce the city's purchase of toxic PVC plastic, not only to tangibly affect the lives of babies and children who live here. As the greatest city on earth, New York also has the opportunity to stand as a beacon of municipal responsibility to the rest of the country and the world. Thank you for the opportunity to testify today.

uncommon goods

Brooklyn Army Terminal
140 58th Street, Building B, Suite 5A
Brooklyn, New York 11220
www.uncommongoods.com
p: 718 210 1200
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To Whom It May Concern:

As the founder and CEO of UncommonGoods, LLC, a New York City-based business, I strongly encourage the Council to support green procurement and develop regulations to implement the law that would reduce this government's purchase of environmentally harmful products.

As a registered B Corp, UncommonGoods places a high value on environmental sustainability. We don't sell products that contain harmful materials like PVC or melamine, and take extra steps to make sure our products are manufactured without the use of cadmium, lead, or mercury. We do this not only because it's the right thing to do for our customers, but it's the right thing to do to preserve the future of our planet.

It's important the NYC City Council implement the green procurement laws already on the books. I hope you will set an example for all New York businesses by using your budget to invest in more sustainably made products. By developing these laws, the Council can level the playing field for businesses that make it a priority to protect the health of New Yorkers and abstain from using dangerous chemicals.

Sincerely,

Dave Bolotsky
CEO & Founder
UncommonGoods, LLC

NEW YORK COMMITTEE FOR OCCUPATIONAL SAFETY AND HEALTH
116 John Street, Suite 604, New York, NY 10038-3331
(212) 227-6440 *fax* (212) 227-9854
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Testimony of
The New York Committee for Occupational Safety and Health
Before the New York City Council
Committees on Contracts, jointly with the Committee on Sanitation and Solid Waste Management
Friday, January 27, 2012
Joel Shufro, Executive Director

Thank you for the opportunity to testify today. We want to thank the members of these two committees for holding this critically important oversight hearing.

My name is Joel Shufro, and I am here in my capacity as the Executive Director of the New York Committee for Occupational Safety and Health. NYCOSH also builds coalitions of organizations concerned with safety and health in New York City and Long Island. Our membership is comprised of workers and their unions, grassroots activists, public health professionals, scientists, occupational health physicians, immigrant advocates, injured workers and other concerned citizens.

NYCOSH is here today to testify in regards to Local Law 120 of 2005, which calls on NYC agencies to phase out the purchase of products that form dioxin. We believe this is an extremely important procurement initiative that will protect the health and safety of workers not just in NYC, but across the country.

We are extremely disappointed that the Mayor's Office of Contract Services has not developed the regulations to implement this green procurement initiative, as they are required by law to do. It has been over six years since this legislation has passed, and over four years since the city was supposed to develop this law.

NYCOSH has been concerned about the hazards of dioxin exposure for decades. Dioxin is widely considered to be one of the most toxic chemicals known to science. Dioxin is a known cause of cancer. Learning disabilities, birth defects, endometriosis, and diabetes have all been linked to dioxin exposure. Dioxin weakens the human immune system and decreases the level of the male hormone testosterone.

Research has found that the production and disposal of polyvinyl chloride (PVC) plastic, a plastic used in many common products purchased by NYC agencies, is one of the largest sources of dioxin in the United States. PVC is the major contributor of chlorine to four combustion sources – municipal solid waste incinerators, backyard burn barrels, medical waste incinerators, and secondary copper smelters – that account for an estimated 80% of dioxin air emissions (USEPA). Workers are exposed to dioxin from both PVC production in chemical plants, as well as disposal in incinerators, landfills, and even accidental building fires. An average of 8,400 landfill fires are reported every year in the U.S., which according to the US EPA is one of the largest sources of dioxin in America. That's why the International Brotherhood of Teamsters, who represents waste workers, has supported efforts to phase out the use of PVC in products and packaging.

In addition to dioxin, workers in PVC plastic chemical plants are exposed to hazardous chemicals harmful to worker health including the known carcinogen vinyl chloride, the probable human carcinogen ethylene dichloride, and endocrine disrupting phthalates. Studies have documented links between working in PVC facilities and the increased likelihood of developing diseases including angiosarcoma, a rare form of liver cancer, brain cancer, lung and liver cancer, lymphomas, leukemia, and liver cirrhosis.

Here in the United States, we first learned about the dangers of PVC in the 1960's and 1970's when chemical industry executives kept workers and government health officials in the dark about the debilitating and sometimes fatal consequences of working with the primary chemical used to make the plastic, vinyl chloride. As evidence emerged over a 20 year period that vinyl chloride caused signature injuries such as disintegration of the bones in the fingers and then fatal liver cancer, the chemical industry engaged in an

increasingly complex and coordinated plot to keep anyone from knowing the chemical's true hazards. Over a 15-year period: workers were exposed to levels of vinyl chloride that were known to cause injury and not told; scientists were pressured to rewrite publications; information was withheld from government health officials; health exams were given under false pretense to keep workers in the dark about what was happening to them; studies were terminated to avoid producing damaging evidence; and pacts of silence were agreed to and executed. This has been extensively documented in the book Deceit and Denial, published by scholars from Columbia University and the Graduate Center, City University of New York.

Since then, we've continued to learn more about the dangers manufacturing and disposing PVC poses to workers.

Firefighters and other "first responders" face disproportionately high exposures to dioxin, hydrochloric acid and other hazardous substances from building fires that contain PVC building materials. Because of its majority chlorine content, when PVC burns in fires numerous hazardous substances are formed which present acute and chronic hazards to fire fighters, building occupants and the surrounding community. These are hydrogen chloride gas, benzene, vinyl chloride and dioxin. Hydrogen chloride gas is a corrosive, highly toxic gas that can cause skin burns and when it comes into contact with the mucous lining of the respiratory tract creates hydrochloric acid, which can cause severe respiratory damage. Exposure to a single PVC fire can cause permanent respiratory disease. Dioxin is an unintentional by-product of PVC combustion, and would most likely be left behind in ash and debris from a PVC fire.

Exposure to PVC gases is believed to be responsible for the alarming cancer rates among NY firefighters who fought the infamous 1975 five-alarm NY Telephone Co. fire. More than 100 tons of PVC insulated phone wire burned for over 16 hours. Many firefighters who responded to that fire developed cancer and other health problems that they believe were attributable to the burning of PVC. New York City Firefighter Dan Noonan of Ladder 3 told the *Daily News*, "Virtually every firefighter who responded to

the phone fire's first two alarms has cancer." A 1997 fire in a plastics plant in Hamilton, Ontario consumed 400 tons of PVC, triggered the evacuation of 700 residents, and generated so much hydrochloric acid that the metal on nearby fire trucks melted. More than 200 firefighters who fought that blaze later filed claims that it destroyed their health. More recently, according to an independent peer reviewed study published in Environmental Health Perspectives Journal, "The extensive use of polyvinyl chloride (PVC) plastics within the WTC made possible the generation of dioxins during the fires." (Landrigan et al, "Health and Environmental Consequences of the World Trade Center Disaster", Environmental Health Perspectives, May 2004)

In addition to vinyl chloride and dioxin concerns, PVC products contribute to poor indoor air quality in buildings as they off-gas phthalates and volatile organic compounds (VOC's) that are harmful to worker health. Testing has found that women and children have the highest levels of phthalates in their bodies. Scientific studies have found a correlation between phthalates emitted from PVC building products like flooring and asthma in both adults and children. In New York City, asthma is a health and safety issue for teachers and janitorial staff, is a leading cause of school absenteeism among children and is the most common cause of hospitalization for children 14 years and younger. Janitorial staff responsible for cleaning PVC flooring in schools are also exposed to a toxic cocktail of cleaning product chemicals linked to respiratory, reproductive, and other diseases.

Due to these intrinsic hazards, we support efforts to identify and use alternative building materials that do not pose the risk as does PVC to workers, fire fighters, building occupants or our communities here in NYC.

In summary, we request that the Mayor's Office of Contract Services include polyvinyl chloride (PVC)-free purchasing goals and provisions in the rules to implement Local Law 120 of 2005. When its entire lifecycle is considered, PVC appears to be associated with more dioxin formation than any other single product.

We've already waited six years, and for the sake of the health of workers, we can not wait any longer.

Testimony before the

New York City Council

Committees on Contracts and

Sanitation & Solid Waste Management

January 27, 2012

Arthur Klock
Director of Trade Education
UA Plumbers and Gasfitters Local Union No. 1

Good Morning Chair James, Chair Mealy, and Members of the Committees on Contracts and Sanitation and Solid Waste Management. My name is Arthur Klock, and I am the Director of Trade Education of Plumbers and Gasfitters Local Union Number 1. Thank you for holding this important hearing and allowing me the opportunity to submit testimony. On behalf of the approximately 6,000 members of Local 1, I am appearing before you today to express our strong support of this body's oversight of the administration's failure to implement Local Law 120 of 2005. As you are aware, that legislation directed the administration to promulgate rules relating to, among other things, the reduction of the City's purchasing or leasing of "materials whose combustion may lead to the formation of dioxin or dioxin-like compounds" by January 1, 2008. Some four years later, I appear before you as the administration is finally beginning the process of promulgating those rules.

While we support a rulemaking that would implement Local Law 120 of 2005, I am concerned that those rules will fail to include goals for the reduction of the City's purchasing or leasing of specific types of products that are major sources of dioxin—polyvinylchloride ("PVC") building materials. Based on communications between the Mayors's Office of Contracts Services and some of the environmental groups testifying here today, it has become apparent that the administration has no intention of promulgating rules that would curtail the use of PVC by City government. Not only is this unwise, since PVC plastic appears to be associated with more dioxin production than any other single product purchased by New York City agencies, but it also completely disregards the legislative intent of Local Law 120.

After Introduction 544 of 2005 ("Intro. 544") was first introduced, the City Council's Committees on Environmental Protection and Contracts conducted a total of three hearings to

consider the legislation. Those Committees considered testimony from various stakeholders and the research of its own staff, all of which documented the toxicity of PVC. Indeed, in the Committee Report of the December 20, 2005 meeting of the Committee on Contracts, at which meeting Intro. 544 was reported out of committee, an entire section is devoted to the relationship of dioxins and PVC. The Committee Report, in summarizing Intro. 544, states that "[t]he bill would require the Director of Environmental Purchasing, in consultation with the Mayor's Office of Environmental Coordination, to develop regulations to phase our [*sic*] the City's purchase of polyvinyl chloride." Despite this clearly expressed legislative intent and after years of complete disregard for the January 1, 2008 deadline imposed for the promulgation of such rules, the administration is now choosing to promulgate rules that will not affect the City's purchase of PVC products.

The health risks associated with PVC products and the dioxin they contain are well-documented, notwithstanding the assertions to the contrary of the plastics manufacturing industry. You have heard from advocates in the past and will hear again today about those risks. To name just a few, dioxin has been acknowledged both to be a "human carcinogen" and to cause a wide range of non-cancer health risks, including reproductive, developmental, and immunological complications in animals and humans. Although all New York City residents have levels of dioxin in their bodies, those levels are affected by exposure and will increase over time. That is why any effort to eliminate sources of exposure is our goal.

While rules alone could not eliminate the production of PVC products and their associated hazards, as a consumer of approximately $17 billion in supplies, services, and construction in just Fiscal Year 2010 alone, New York City has a tremendous opportunity to use

its spending power to not only eliminate the health hazards associated with the products now in use that contain PVC, but also to encourage the widespread use of non-PVC products.

As a representative of nearly 6,000 men and women who handle plumbing products on a daily basis, Plumbers Local 1 has been a leading opponent of the use of PVC piping materials in the construction industry. The PVC pipe that becomes the infrastructure of a building and the scrap pipe pose significant health risks to our citizens. The release of harmful chemicals from PVC products is magnified by combustion and incineration. In the event of a structural fire, those chemicals create harmful exposure to both firefighters and occupants. Additionally, when PVC pipe is used for the transportation of drinking water, there is the potential for leakage of hazardous chemicals known as "phthalates", which have been shown in experimental laboratory animal studies to damage the liver and reproductive organs.

In recent years the New York City Council has passed numerous pieces of legislation intended to increase our use of sustainable materials and practices in the construction industry. Throughout this period of rising awareness of "Green" and sustainable building, we in the plumbing industry have continued to explain that piping materials such as cast iron, steel, and copper are excellent examples of "Green" materials which can be safely recycled and re-used over and over again. As for PVC plastic, the Association of Post Consumer Plastics Recyclers declared efforts to recycle PVC a failure and labeled it a "contaminant" in 1998. PVC is not "Green" and it has no future in our homes, places of business, or community.

Given these risks, documented detrimental health effects, and the great many safe alternatives to PVC products, it should be abundantly apparent that the City ought to reduce, if not eliminate entirely, its use of PVC products. Thank you again for your leadership on this issue and this opportunity to testify.

SIERRA CLUB
FOUNDED 1892

1350 Broadway, Suite 201
New York, NY 10018
www.nyc.sierraclub.org

Testimony Re: Oversight: Examining the City's Compliance with Environmentally Preferable Purchasing Laws
January 27, 2012

My name is Irene Van Slyke, I am the Vice Chair of the Sierra Club NYC Group. The Sierra club has 11,000 members in NYC, and more than 36,000 in NYS.

The Sierra club commends the City Council on its decision to hold an oversight hearing on the City's implementation of purchasing laws. This comes at a critical time since President Obama last December signed new standards limiting emissions of toxic chemicals such as mercury, dioxin and other dangerous pollutants.

The Sierra Club was one of the organizations that pushed for EPA standards by filing a petition requesting a schedule for the EPA to promulgate regulations. The Sierra Club's position is that localities should follow EPA regulations, and require stringent levels of control, including the elimination of the use of the toxic substance and /or the substitution of a less toxic substance.

We commend the City Council's foresight when in 2005 it passed three laws calling on the City to purchase products that are more energy efficient, with a higher recycled content, and reduce the purchase of products with toxic chemicals. There now is awareness of the danger of these chemicals and there is widespread public support to address the problem of toxic pollution in products we use every day, and that are present in the public buildings we visit and work in.

The Sierra Club supports the testimony of the Center for Health, Environment and Justice and other groups before you today to implement the dioxin procurement ordinance by adopting regulations to reduce the purchase of PVC by NYC agencies. Many PVC products contain toxic additives such phthalates, lead, cadmium and organotins, which pose unnecessary hazards to NYC residents and workers. PVC is widely considered to be a major source or dioxin, dangerous to human health. A fire in a structure containing products with PVCs will release toxic and deadly gases endangering residents and firefighters alike. We have supported efforts to phase out products like PVC that form dioxin for many years, going back to 1994. We have even sued the EPA for failing to protect environmental justice communities from vinyl chloride, dioxin and other toxic pollutants released by PVC chemical factories.

To be sure the most toxic chemicals are the ones that are slow to disintegrate (such as PVCs), accumulate in our bodies and affect our brains and nervous system (such as mercury) or change to dangerous gases (such as PVCs) that can be inhaled when burned or improperly disposed of. Children who have small bodies are especially vulnerable when exposed to these chemicals.

We urge the City Council to do its utmost to get the City to include PVC free purchasing language in the dioxin regulations as the law requires. It is a shame that the City has not implemented this law as it was required to do by the legislation signed in 2005.

There are plenty of alternative products without PVCs. The National Partnership for Environmental Priorities (NPEP) is a partnership program focused on reducing the use of potentially hazardous chemicals from products and processes. NPEP challenges manufacturers to eliminate toxic chemicals. There are literally scores of manufacturers who have drastically reduced or eliminated PVCs and/or lead (an additive to PVC) from their products and packaging.

For a city of the size of New York City to require safer products will create a much- needed domestic market for those safer products.

Reports from successful efforts by manufacturers to reduce or eliminate dangerous substances from products are: setting goals, prepare a plan with a schedule and include education and good communication with clients and consumers.

The Sierra Club urges the City Council to push for the strongest possible program to reduce or eliminate these dangerous chemicals.

Thank you .

THE COUNCIL
THE CITY OF NEW YORK

Appearance Card

I intend to appear and speak on Int. No. _____ Res. No. _____

☐ in favor ☐ in opposition

Date: _____

(PLEASE PRINT)

Name: Ken Diamondstone

Address: 200 Clinton St

I represent: Bklyn Solid Waste Advisory Board

Address: _____

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THE CITY OF NEW YORK

Appearance Card

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☐ in favor ☐ in opposition 11/27/13

Date: _____

(PLEASE PRINT)

Name: ERICA GOLDSTEIN

Address: Liaisons to the Council

I represent: NATURAL RESOURCES DEFENSE COUNCIL

Address: 40 W. 20ST NY, NY

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☐ in favor ☐ in opposition

Date: _____

(PLEASE PRINT)

Name: Lt. Eddie Boles

Address: _____

I represent: Uniformed Fire officers Association

Address: _____

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THE CITY OF NEW YORK

Appearance Card

I intend to appear and speak on Int. No. 120 Res. No. _____

☒ in favor ☐ in opposition

Date: _____

(PLEASE PRINT)

Name: Joel Shufro

Address: 116 John St

I represent: NJ/COSH New York Committee for Occupational Safety & Health

Address: 116 John St NY

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THE CITY OF NEW YORK

Appearance Card

I intend to appear and speak on Int. No. _____ Res. No. _____

☐ in favor ☐ in opposition

Date: 1/27/12

(PLEASE PRINT)

Name: Maria Simpson

Address: Mayor's Office of Contract

I represent: Director

Address: _____

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THE CITY OF NEW YORK

Appearance Card

I intend to appear and speak on Int. No. _____ Res. No. _____

☐ in favor ☐ in opposition

Date: 01/27/2012

(PLEASE PRINT)

Name: PENELOPE JAGESSAR CHAFFER

Address: 150 CLERMONT AVE APT. 4D BROOKLYN, NEW YORK.

I represent: MYSELF

Address: _____

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THE CITY OF NEW YORK

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☐ in favor ☐ in opposition

Date: 1/27/2012

(PLEASE PRINT)

Name: ANSJE MILLER

Address: 40 EAST 39TH ST., SUITE 1201, NY, NY 10016

I represent: CENTER FOR ENVIRONMENTAL HEALTH

Address:

THE COUNCIL
THE CITY OF NEW YORK

Appearance Card

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☐ in favor ☐ in opposition

Date: JAN 27, 2012

(PLEASE PRINT)

Name: PETER CYRETT

Address: 250 PARK AVE SOUTH, 4TH FLR, NYC

I represent: PERKINS + WILL

Address: (ABOVE)

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THE CITY OF NEW YORK

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☐ in favor ☐ in opposition

Date: 1/27/12

(PLEASE PRINT)

Name: Ellen Weininger

Address: 24 Prescott Ave White Plains, NY 10606

I represent: Grassroots Environmental Education

Address: 52 Main Street Port Washington, NY 11050

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THE CITY OF NEW YORK

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☐ in favor ☐ in opposition

Date: 11/27/12

(PLEASE PRINT)

Name: Brendan Sexton

Address: 134 Sullivan St.

I represent: NRDC

Address: _____

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THE CITY OF NEW YORK

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☑ in favor ☐ in opposition

Date: _____

(PLEASE PRINT)

Name: STEPHEN BOESE

Address: 1190 TROY-SCHENECTADY ROAD LATHAM

I represent: NY 12110 LOANYS

Address: _____

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THE CITY OF NEW YORK

Appearance Card

I intend to appear and speak on Int. No. _____ Res. No. _____

☐ in favor ☐ in opposition

Date: 11/27/2012

(PLEASE PRINT)

Name: Irene Van Slyke

Address: 206 Bergen St. Brklyn NY

I represent: Sierra Club

Address: 1350 Broadway NY NY.

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☑ in favor ☐ in opposition

LOCAL LAW 120 2005 *Date:* 1/27/12

(PLEASE PRINT)

Name: ARTHUR KLOCK

Address: _____

I represent: PLUMBERS LOCAL 1

Address: _____

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THE CITY OF NEW YORK

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☑ in favor ☐ in opposition

Date: _____

(PLEASE PRINT)

Name: Maya Shetreat-Klein, MD

Address: 6003 Riverdale Ave Bronx NY 10471

I represent: _____

Address: _____

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THE CITY OF NEW YORK

Appearance Card

I intend to appear and speak on Int. No. _____ Res. No. _____

☐ in favor ☐ in opposition

Date: 1/27/12

(PLEASE PRINT)

Name: MICHAEL SCHADE

Address: _____

I represent: CENTER FOR HEALTH, ENVIRONMENT & JUSTICE (CHEJ)

Address: 394 BROADWAY, 5TH FL NY NY 10013

Please complete this card and return to the Sergeant-at-Arms

THE COUNCIL
THE CITY OF NEW YORK

Appearance Card

I intend to appear and speak on Int. No. _____ Res. No. 120

☒ in favor ☐ in opposition

Date: 1/27/12

(PLEASE PRINT)

Name: DAVID LEVINE

Address: 14 Wooster St

I represent: American Sustainable Business Council

Address: 14 Wooster

Please complete this card and return to the Sergeant-at-Arms

THE COUNCIL
THE CITY OF NEW YORK

Appearance Card

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☐ in favor ☐ in opposition

Date: _____

(PLEASE PRINT)

Name: Russell Unger

Address: 40 Fulton St. NY NY

I represent: Urban Green Council

Address: _____

Please complete this card and return to the Sergeant-at-Arms