

Testimony of:
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before

The Assembly Committee on Environmental Safety and Toxic Materials
Honorable Bob Wieckowski, Chair

**Oversight Hearing on the Safer Consumer Products Draft Regulations and the
Implementation of the California Green Chemistry Initiative**
December 8, 2011 – Room 4202, State Capitol Building, Sacramento, CA

Chair Wieckowski, Vice- Chair Miller, Committee member and staff, thank you for the opportunity to speak to you today on the topic of the Safer Consumer Product (Green Chemistry) Informal Regulations.

My name is Ann Blake, Founder and Principal of Environmental & Public Health Consulting. I am a scientist by training and a regulator by experience. I have a Ph.D. in molecular genetics and neural development and I am a former DTSC RCRA hazardous waste inspector, working in the DTSC Surveillance & Enforcement division from 1993 to 2002. My last position at DTSC was as Northern California Pollution Prevention Coordinator.

For the last nine years I have been an independent consultant working on toxics reduction strategies, creating drivers to safer alternatives through environmentally preferable purchasing (EPP), product standards and ratings systems development, and drafting chemicals policy with a broad range of stakeholders, including state and local government, health and environmental NGO coalitions locally and internationally, as well as businesses and academia. My product sectors of expertise include many of the consumer product sectors subject to AB 1879. I also create and teach curriculum on chemicals policy and alternatives analysis for the University of California at Berkeley's Extension Green Chemistry Certificate Program.

Comments on DTSC Utilization of the Green Ribbon Science Panel (GRSP) under Governor Brown's Administration

As my GRSP colleagues have stated, we have seen a much improved utilization of the Green Ribbon Science Panel under Governor Brown's administration, starting with a DTSC and GRSP co-chair initiated conversation early in 2011, prior to Debbie Raphael's appointment as Director of DTSC when she was still serving as one of the co-chairs of the GRSP.

I have particularly appreciated the targeted use of the GRSP around specific questions of concern within the regulations. The use of subcommittees on specific questions around chemical and product prioritization, de minimis, and the alternatives analysis process allowed more detailed input and highlighted the areas of both disagreement and common ground

among different stakeholders. As my colleagues have mentioned, we found more common ground than we had expected on many of these issues. The subcommittees and targeted questions have allowed the GRSP to provide more concrete and substantive input to DTSC staff, which they have clearly put to good use in the current informal draft of the regulations.

Comments on the Current Informal Draft of the Safer Consumer Product Regulations

The current informal draft of the Safer Consumer Product Regulations are a vast improvement over the November 2010 draft as my colleagues on the GRSP have already described in this hearing. This draft has provided greater clarity, internal consistency, clear scientific basis for decision-making, and meets the goals of being practical, meaningful and legally defensible per Director Raphael's framing.

DTSC has clearly has not started from scratch, but has instead taken all the input from the last three years and shaped it into a pragmatic approach to the challenging problem of shifting the proof of safety to manufacturers of products in the current context where we have a backlog of chemicals in use with, at best, incomplete safety information. DTSC has elegantly navigated tricky territory in a way that provides some regulatory certainty while allowing flexibility; this is a good handling of program within the constraints of AB 1879.

Suggested Changes/Additions to the Informal Draft Regulations

I would like to add my support and agreement to my various colleagues' comments on the strengths of the current draft informal regulations, and highlight three specific areas upon which I will be providing more substantive input and ideas to DTSC.

Areas that have been greatly improved in the current informal regulations include:

- Starting with a broad list of Chemicals of Concern as a partial mitigation of regrettable substitutions;
- The consideration of aggregate and cumulative exposures;
- The inclusion of a flexible approach to *de minimis*, while calling out key hazard traits for which a lower *de minimis* level is applicable.

There are three specific areas that should be strengthened in the regulations in order to make them more meaningful: worker exposure, criteria for regulatory response action, and decision models with clear decision rules.

Wider Inclusion of Worker Exposure Considerations

I will be providing specific suggestions to DTSC for wider inclusion of worker exposure considerations throughout the language of the regulations. In addition the definition of

“worker” should be broad enough to include service worker populations who are often subject to downstream impacts of higher exposures to consumer products via higher usage than the average consumer. These populations are disproportionately women, and often women of color, including Latina housecleaners, Vietnamese nail salon workers, and others.

Clearer criteria for regulatory response

The regulations implementing AB 1879 will create a new program well beyond the historical authority of DTSC. DTSC implementing staff will benefit from more specific guidance and decision-making criteria, particularly in the area of regulatory response. The current regulations lay out the various options in AB 1879 for regulatory response action, but do not list criteria under which DTSC will take these specific actions. DTSC should start to think about likely scenarios under which each regulatory response action will be taken, and articulate criteria for action.

Decision-Making Models and Clear Decision Rules

Models for transparent decision-making exist and can be readily incorporated into the Safer Consumer Product regulations. I have worked with UCLA’s Sustainable Technology & Policy Program (STPP) to test the feasibility of a transparent decision-making model. We have submitted detailed comments to DTSC staff and will continue to work with DTSC and with other stakeholders to see where various decision-making approaches interact and how their use might play out under AB 1879 implementation.

Clear decision tools will provide regulatory certainty and consistency across alternatives analyses for different chemical and product of concern combinations. Our UCLA STPP feasibility study¹ showed that stakeholders from industry, environmental NGOs, and regulatory agencies do not demonstrate huge variance in their weighting of decision-making criteria. More significantly, our study showed that even when human and environmental health criteria were weighted in an alternatives analysis, they did not necessarily drive the final decision.

It is entirely appropriate, if not imperative, for an agency within Cal/EPA, whose mission is to protect the public health and environment of California, to create decision rules that weight human health and environmental criteria more heavily in decision-making.

The Safer Consumer Product Regulations will not solve all high priority chemical exposure problems in the short term.

While the timelines for review in the current regulations are shorter than in the previous draft, in combination with the severe limitations of DTSC’s resources, it is clear that we will have another three or more years during which many known bad actor chemicals will not be

addressed. The Committee should expect to continue to see single chemical or chemical class restrictions on chemicals that are causing immediate and continuing harm to California's communities and the environment while the Safer Consumer Product Regulations are being ramped up.

Concerns and Opportunities in the Implementation of the Safer Consumer Product Regulations

While these regulations are a vast improvement over the November 2010 draft regulations there are several issues that could impact their implementation that are beyond the scope of DTSC, and belong squarely with the Legislature.

Limitations of DTSC Authority Under AB 1879

As my colleague Tim Malloy has outlined in some detail, two key authorities that DTSC does not feel it has under AB 1879 are the ability to require that companies fill information data gaps and the ability to charge fees for the program. I strongly agree that these two constraints within the language of AB 1879 severely limit the ability of DTSC to implement a program that lives up to the vision laid out by the Green Chemistry Initiative.

In my work encouraging markets for safer alternatives in both institutional and consumer products, I have encountered situations in these areas that are relevant for AB 1879 implementation:

- Broad confidential business information (CBI) claims for key ingredients limit the ability to assess hazard and impacts on downstream users. A conversation around the bounds of CBI in order to provide key hazard information while protecting business IP is essential.
- Sector-wide non-disclosure of ingredients in consumer products, for example, in cleaning products (now somewhat mitigated by a "voluntary" effort under consumer pressure) severely impacts the ability to assess hazard

Externalized Costs of Chemical Exposure Are High

AB 1879 is groundbreaking legislation that shifts chemical regulation towards a more hazard-based approach; these draft informal regulations combine that hazard analysis with a pragmatic evaluation of exposure. AB 1879 and the informal draft regulations also lay out for first time in regulatory language a process for evaluating safer alternatives. Creating a program to implement these regulations and then not supporting it with sufficient resources would be waste of a key window of opportunity.

It is not news that California is in economic difficulties, as is the entire world economy. We can no longer afford the externalized costs of environmental exposures to chemicals, many of which have been highlighted as contributing factors in the top public health concerns of our time, including obesity, heart disease, infertility, and childhood developmental and problems among others.

While it is challenging to gather data on the costs of environmental exposures, particularly those from consumer products used in homes, schools, workplaces, we do have some numbers. These are, if anything, conservative estimates of disease burden and costs based on a handful of diseases with clear linkages to environmental exposures.

- The World Health Organization estimates that globally 44% of asthma, 16% of cardiovascular disease, and 19% of all cancers can be attributed to environmental exposures². While not all exposures result from chemicals in consumer products, in November 2011, California's Department of Public Health highlighted recent research that links exposure to cleaning products with asthma, and other literature clearly links asthma and other diseases to consumer product exposure³.
- Incidence of childhood cancers increased by 28% from 1974 to 1998, a span of 25 years, especially acute lymphoblastic leukemia, central nervous system tumors, and non-Hodgkin's lymphoma⁴.
- The childhood prevalence of asthma more than doubled from 1980 to 1996, from 3.6% to 7.5%⁵.
- In 2008 estimated annual costs were \$76.6 billion for lead poisoning, prenatal methyl mercury exposure, childhood cancer, asthma, intellectual disability, autism and attention deficit hyperactivity disorder⁶.
- Overall estimated costs of exposure to toxic substances in 2001: \$568 billion to \$793 billion per year for Canada and the United States combined⁷. I would emphasize once again that all these numbers are vast underestimates and remind us all that California accounts for 10-15 % of the US economy.

Health, Safety and Environmental Regulations are a Good Investment

- The Federal OMB in 2011 submitted a regular report to Congress and estimated that investment in regulations has resulted in an ROI of 300-700%; costs of health, safety and environmental regulations in the last decade were in the \$44 to 63 billion range and benefits at federal, state, local and tribal levels between \$132-655 billion⁸.
- The summary of the OMB report highlighted two themes which are relevant here:
 - ...regulation (including protection of public health, welfare, safety, and our environment) [should be] undertaken in a way that promotes the goals of economic growth, innovation, competitiveness, and job creation

- importance of ensuring that regulation is evidence-based and data-driven, and hence based on the best available work in both science and social science (with full respect for scientific integrity)

Providing a Sustainable Economic Engine for California

If these regulations are adequately supported, they have the ability to send a clear signal to the market that there is a huge potential market in green chemistry in California. I have worked with small innovative companies that are challenged to get their safer alternative products to market because *existing regulations do not ask if a potentially hazardous chemical is necessary in a consumer product or if there's a better way to achieve the required performance.*

In October 2011 Governor Brown signed B or benefit corporation legislation. B Corps are a new type of corporation which uses the power of business to solve social and environmental problems⁹. Founding members of the B Corp community are leading the growth of California's green economy. Many other companies providing green, sustainable products and services will now have the opportunity to become B corporations in the biggest economy in the country and the 8th largest economy in the world. There is economic opportunity here. In order to maximize the potential for economic growth in this sector, the Legislature must provide a combination of regulatory drivers and incentives within the Green Chemistry Initiative and beyond.

Thank you.

¹ UCLA Sustainable Technology & Policy Program, *Developing Regulatory Alternatives Analysis Methodologies for the California Green Chemistry Initiative*, T. Malloy, P. Sinsheimer, A. Blake & I. Linkov, October 2011

² Pruss-Ustun, A. and Corvalan, C. (2006) *Preventing disease through healthy environments. Towards an estimate of the environmental burden of disease*. World Health Organization.

³ *Cleaning Products Can Cause Asthma*, Occupational Health Watch, November 2011, California Department of Public Health Occupational Health Branch; Women's Voices for the Earth, *Household Hazards*, July 2007

⁴ Woodruff, TJ et al. *Trends in Environmentally Related Childhood Illnesses*, Pediatrics Vol. 113 No. Supplement 3 April 1, 2004 pp. 1133 -1140

⁵ Akinbami, LJ, *The State of Childhood Asthma, United States: 1980-2005*, U.S. Centers for Disease Control, Office of Analysis and Epidemiology, Advance Data from Vital and Health Statistics, No. 381, December 2006

⁶ Trasande L and Liu Y (2011) Reducing the Staggering Costs of Environmental Disease in Children, Estimated at \$76.6 Billion in 2008. *Health Affairs*; 30(5);863-870.

⁷ Muir T, Zegarac M. *Societal costs of exposure to toxic substances: economic and health costs of four case studies that are candidates for environmental causation*. Environ Health Perspect. 2001 Dec;109 Suppl. 6:885-903.

⁸ U.S. Office of Management and Budget, Office of Information and Regulatory Affairs *2011 Report to Congress on the Benefits and Costs of Federal Regulations and Unfunded Mandates on State, Local, and Tribal Entities*

⁹ Benefit Corp legislation: <http://www.bcorporation.net/publicpolicy>