

# **REACH, RoHS, TSCA, CPSC – What's next?**

**John A. Ciba Jr.**

Brady Corporation

[john\\_ciba@bradycorp.com](mailto:john_ciba@bradycorp.com)

IPC Midwest Conference 2009

## **Executive Summary**

Restrictions on the use of chemicals in began 30 years ago in the US with the passage of the Toxic Substances Control Act. Over the last five years we have seen a logarithmic increase in product and substance legislation globally with China, the EU, Korea, Argentina, Australia, Canada, and Mexico to name a few. These regulations ban the use of chemicals in everything from baby bottles and batteries to electronics, children's toys and medical devices.

During the next 2 to 5 years, the chemical industry, consumer product companies and manufacturers will face increasing regulatory pressures and burdens globally, as more substances will be restricted, banned or otherwise regulated. Increased substance regulation is coming; the only real question remaining is how fast. Green products will not offer a marketing advantage as much as being table stakes to remaining the game.

The successful organization will see this as a strategic opportunity by investing the time in developing the expertise, people and systems that result in a full suite of compliant products that anticipate the next change.

Successful individuals will see this as an opportunity to get involved in the standards setting process and regulatory process adding another skill in their portfolio to bring added value to the organization and the customer.

# REACH, RoHS TSCA, CPSC – What's next?

A strategic look at what's ahead for substance regulations

# The Brady Corporation

Global Presence in 21 countries

Regulated by REACH, ROHS, Packaging, Substance bans, Battery regulations, and indirectly by consumer product regulations



## Americas

- Brazil
- Canada
- Mexico
- US



## Europe

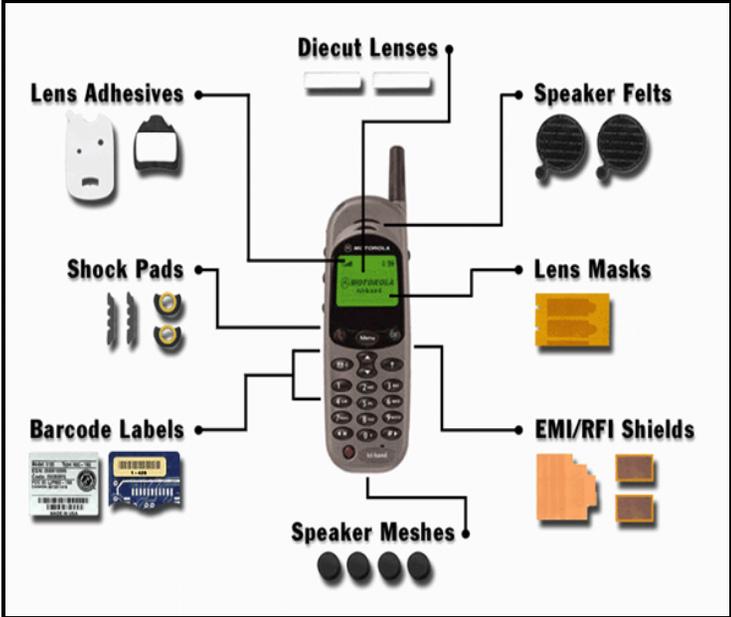
- Belgium
- England
- France
- Germany
- Italy
- Spain
- Sweden



## Asia-Pacific/

- Australia
- Singapore
- S. Korea
- Taiwan
- Malaysia
- Philippines
- China
- Hong Kong
- India
- Japan

We play a part in just about every electrical device that requires high performance materials for B2B and consumer applications.



# 30 years of Technology and innovation have increased our awareness and concern

- 2008 Discovery of lead in imported children's toys
  - Many shocked that there is no Federal legislation
- Early 2000- Plasticizers linked to mimicry of Female Hormones
  - Linked to reproductive hazards in women
  - Linked to breast and ovarian cancers
  - Blood levels identified in children
  - Rise in pediatric cancers
  - EU bans plasticizers in baby pacifiers, bottles and nipples
- Late 90s – Mercury discovered in children's shoes for lighting effects
  - Lead identified at high levels in paints and playground soils
  - Metals linked to behavioral disorders and learning disabilities
  - Many US State bans put in place



# The use of harmful substances - a global concern

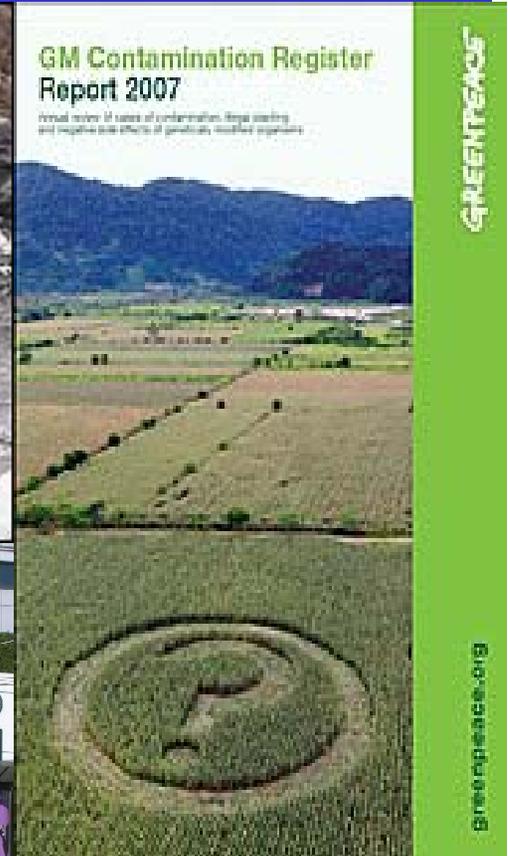
**Mattel Will Pay \$12M to Settle Toxic Toys Lawsuit**



What's in the toy box?



# NGOs Sound the alarm



# The global regulatory community reacts

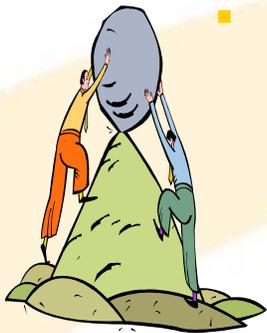


- **2006- The EU enacts the REACH legislation**
  - Applies to all chemicals and all uses
  - Driven by the need to shift proof of safety to producers and to consolidate the 300 plus regulations on the books
  - Restricted Substance list to be updated annually
  - Requires registration and authorization of all substances in all product sold or distributed
  - Sets up a EU chemical agency and safety data sharing protocol
- **2003 -The EU enacts the WEEE & RoHS regulations**
  - Mainly driven by the electronic device waste problems
  - Essentially bans 4 metals and flame retardants from electronics
  - China, Korea, Canada, Japan several states and other countries follow suit
- **1976-2003 The EU enacts directives on batteries, electrical power supplies, vehicles and 5,000 substances restrictions in specific product uses**

# The Supply Chain Reacts



- Customers push substance control/elimination and liability down the supply chain
  - **Major investments in data systems & process**
    - Analytical and certification requests increase dramatically- IPC and others are working on numerous standards
    - Within 24 hours of the announcement of the REACH substances companies began requesting analytical reports and certifications
  - **Warranty and guaranty statements are added to certification requests.**
    - Reach an all time high in terms of absolute accountability regardless if current technology or science can back it up.
    - You must contractually commit to customers that you are in compliance with applicable environmental laws
      - You must agree to indemnify customers for a breach of this promise.
      - You must agree to notify customers of changes in composition.



Distributors and contract manufactures have taken the top drawer requirements and added to them

- **Longer lists, higher bars for warranty & testing**

# US regulators begin to react



- 2009 -TSCA amendment proposed to enact US RoHS
  - After July 1, 2010, electronic-industry manufacturers cannot produce any product that contains the EU RoHS metals and flame retardants as measured in any homogeneous material the product contains
- 2009 – 2<sup>nd</sup> year running OMB highlights EPA shortfall
  - “EPA does not have sufficient chemical assessment information to determine whether it should establish controls to limit public exposure to many chemicals that may pose substantial health risks.”
  - “Only 540 health assessments are completed versus the 80,000 industrial chemicals in use”
- 2009 - Consumer Product Safety Commission (CPSC) Bans Lead and Phthalates in children's toys
  - NY District court affirms that the chemical bans on phthalates and lead applied to existing inventories as well as new production
- 2008 – CPSC is granted wider regulatory authority
  - Targets chemical substances in children’s toys
  - Allowed for more general bans where they were necessary to protect public health.



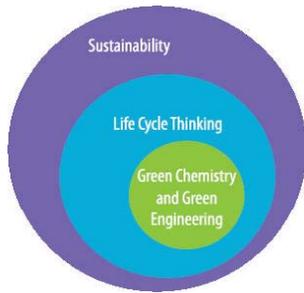
# NGOs Step up the tempo



## New Players and Opportunities = New influence

- **National Resource Defense Council challenged the CPSC on the application of the CPSC lead and phthalate bans to existing stocks**
  - Very successful as the NY court held for the NRDC
- **Chemsec Europe formed as a coalition of European NGOs**
  - Low key approach earned them a stakeholder role in the writing of REACH taking environmental lobbying to a new level
  - Published a “SIN” list of 260 priority chemicals for regulation
  - Sponsors grass roots training on influencing regulators and the news media
  - Funded through governmental stakeholder grants and donations
- **Greenpeace remains a factor**
  - Focused campaigns to target companies such as IBM, Apple, Hp, Intel
  - CSR data and environmental reports are being used to rate companies and showcase “green washing”
  - Member of Chemsec Europe.





# California Reacts

- **2009 AB 147 & AB 218 Propose to partially close the EU/Ca RoHS gaps**
  - Combined these bills require a certification of EU RoHS compliance and to phase out all non EU ROHS “consumer products”
- **2008 California Governor signs “Green Chemistry” or “California REACH” bills** *Assembly Bill 1879 (“AB 1879”) and Senate Bill 509 (“SB 509”)*
  - **Mandates an internet-based “Toxic Information Clearinghouse” for the collection and dissemination of the chemical hazard information**
  - **Mandates the development and adoption of chemical regulations by January 1, 2011**
  - **Requires the agency to consider all current state, federal and country laws and regulations**
- **2007 California implements “California RoHS”**
  - Intention is to regulate all products currently covered but EU RoHS
  - Falls short of it’s title as only DTSC designated “covered electronic devices” are regulated
- **2006 California Bans Brominated Flame Retardants**
  - Illinois, Hawaii, Washington State & Oregon follow suit



# A look into the future



- **Most experts believe that the California legislation will likely have a dramatic impact on the substances that can be used in products and in turn product liability**
  - This will impact the size of inventory as a function of the speed of regulation
- **Most experts believe that the California legislation will be the model for Federal regulation in the future**
  - To avoid major disruption the current regulatory authority of the Federal agencies regulating chemicals and consumer products will need to be rationalized and may slow any change
  - At best these regulations are likely to be the model regulations for other States
- **California Green Chemistry is coming but what will it bring?**
  - The big picture focuses on six broad based policy recommendations identified by the Green Ribbon Science Panel final report of 12-08
  - The immediate straw man proposed a wide chemical net for regulation over a broad spectrum of products
  - If you have not read the straw man, you need to!  
[http://www.dtsc.ca.gov/PollutionPrevention/GreenChemistryInitiative/upload/Safer\\_Alt\\_Regs\\_Straw.pdf](http://www.dtsc.ca.gov/PollutionPrevention/GreenChemistryInitiative/upload/Safer_Alt_Regs_Straw.pdf)



# A look into the future – Chemical lists



- Candidate list references as cited in the Ca. straw proposal
  - 1 <http://www.sinlist.org/>
  - 2 <http://ww2.cdph.ca.gov/programs/Biomonitoring/Pages/default.aspx>
  - 3 <http://www.cdc.gov/nchs/nhanes.htm>
  - 4 <http://www.oehha.org/prop65.html>
  - 5 <http://monographs.iarc.fr/ENG/Classification/index.php>
  - 6 [http://frwebgate.access.gpo.gov/cgi-bin/getdoc.cgi?dbname=1999\\_register&docid=99-28888-filed.pdf](http://frwebgate.access.gpo.gov/cgi-bin/getdoc.cgi?dbname=1999_register&docid=99-28888-filed.pdf)
  - 7 [http://www.epa.gov/tri/trichemicals/pbt%20chemicals/pbt\\_chem\\_list.htm](http://www.epa.gov/tri/trichemicals/pbt%20chemicals/pbt_chem_list.htm)
  - 8 <http://www.mass.gov/legis/laws/mgl/21i-9.htm>
  - 9 <http://www.ecy.wa.gov/programs/swfa/pbt/list.html>
  - 10 [http://ec.europa.eu/environment/chemicals/reach/reach\\_intro.htm](http://ec.europa.eu/environment/chemicals/reach/reach_intro.htm)
  - 11 [http://ec.europa.eu/environment/endocrine/strategy/short\\_en.htm](http://ec.europa.eu/environment/endocrine/strategy/short_en.htm)
  - 12 [http://ec.europa.eu/environment/chemicals/dansub/consolidated\\_en.htm](http://ec.europa.eu/environment/chemicals/dansub/consolidated_en.htm)
- The straw proposal is only 16 pages, but.....



# The Future is never out of REACH



## Changes to REACH Annex XVII

- This Annex contains the restrictions on the manufacture, placing on the market and use of certain dangerous substances, as such, or in preparations, mixtures and articles.
  - As of 1 June 2009, Annex XVII replaced chemical restrictions that were applicable under Directive 76/769/EEC by amendment that provides updated chemical restrictions, including all chemical restrictions adopted up to December 2008 under Directive 76/769/EEC.
  - Article 67 of the REACH Regulation provides that substances, mixtures or articles may not be manufactured, placed on the market or used unless they comply with the conditions of any restrictions in Annex XVII.



- **Experts predict 20 new chemicals per year will be added to the SVHC candidate list**

- 5 new substances have been proposed as of August

# A look into the future – Likely Outcomes



- **2009 – EU Directive actions – REACH, & RoHS**
  - The EU REACH chemical database will become the top source of substance data
  - The first REACH substance restrictions will result in substance bans, authorizations will be very limited
  - EU RoHS chemical list update will be resolved
- **Late 2009, California will publish first draft of CA-REACH**
  - DTSC will likely adopt a consumer product-based approach to the identification and prioritization of chemicals of concern
- **Mid 2010- US Federal rulemaking will be introduced**
  - This will spur debate on what agency handles, EPA, CPSC, NIH, OSHA or a new agency
- **Late 2010 - Final regulations will be published in California**
  - First chemical bans will be announced in early 2011
  - New York, Washington State, Minnesota and Illinois will likely follow shortly after.
  - The reaction of companies will become more swift and absolute as California REACH is implemented.
  - US product liability laws will result in an elevated business threat
- **Late 2010-early 2011 Federal regulations likely will be proposed in late to significantly boost the EPA and CPSC**
  - Unclear if regulations will follow the shift for substance data from the government to industry
- **Early 2011 – China RoHS will be updated**
  - Products in scope, any exemptions, substance restrictions (option for even more than the EU six) compliance dates and testing and certification requirements.





# The next move is yours

- The Strategic play is informed involvement
  - Substance concerns and regulations are global and here to stay
  - There are no “silver bullets”, no Kryptonite, no “get out of jail free” cards -You need to get involved!
  - Professional Societies, Trade associations, Send individual comments to the DTSC, Educate your organization, Educate yourself!
  - Open your mind – NGOs, Trade Groups, Suppliers all have something to say
  - Participate in standards setting organizations **IPC**, ASTM, JEDEC, etc.
    - **IPC J709, IPC 1751 & 1752**
    - You will learn more from your peers, customers and others in these meetings than you will in most update seminars





## Wrap up

- Expansive Chemical regulation will hit US shores within the next two years
  - As these regulations hit US shores our liability will increase
    - Litigation will drive higher standards
  - As these regulations hit US shores our customers will demand more
    - Supply chain and inventory risk will drive higher standards
- Systems must be in place to ensure compliance that can be traced and audited
- Companies will need to choose whether we treat the regulatory landscape as a costly task, or a strategic opportunity.
  - *If you are not part of the solution, that just may be the problem*

