

Attachment to the Economic and Fiscal Impact Statement (Std. Form 399) Safer Consumer Products Regulations

This document supplements the Form 399 for the Safer Consumer Products (SCP) regulations by providing additional information for some of the questions on the Form 399. If the answer is complete on the Form 399, the response is not repeated in this attachment.

ECONOMIC IMPACT STATEMENT

Attachment 2 to the Form 399, “Economic Analysis of California’s Green Chemistry Regulations for Safer Consumer Products”, is a report containing a detailed discussion of the Economic Impacts of the Safer Consumer Products regulations.

A. Estimated Private Sector Cost Impacts

The attached “Economic Analysis of California’s Green Chemistry Regulations for Safer Consumer Products” does not include an estimate of the number of businesses impacted by the SCP regulations or the total costs to the private sector. This is because it is not possible, due to the nature of the SCP regulations, to make those estimates until implementation is under way. See information below under A.2.

A.2. Total number and types of businesses impacted and the number or percentage of total businesses impacted that are small businesses

As explained below, the Department of Toxic Substances Control (DTSC) cannot estimate the total number of businesses impacted.

The businesses or entities responsible for complying with the requirements set forth in the regulations include:

1. The manufacturer of a listed consumer product, including the business that controls the specifications and design of, or use of materials in, a product.
2. The importer of the consumer product.
3. The retailer of the consumer product.

The SCP regulations place the primary responsibility for complying with the regulations on the manufacturer. If the manufacturer of the consumer product does not comply, the importer of the consumer product is required to comply. Retailers of the consumer product are only required to comply if the manufacturer or importer of the consumer product fails to comply and DTSC notifies the retailers of the manufacturers’ and importers’ failure to comply.

The SCP regulations place requirements on these businesses in three major ways which are described below:

- (i) DTSC is allowed to request data and other information concerning chemicals and consumer products from businesses. While businesses are not required to

provide the chemical and/or consumer product information, if they fail to provide the information, DTSC will post the businesses' names on a Response Status List on DTSC's website.

- (ii) The SCP regulations require that once DTSC has identified a consumer product as a Priority Product, the responsible businesses must conduct an alternatives analysis for the product to identify and evaluate potential alternatives, which could be product redesign or reformulation or substituting a different product for the existing product. The initial list of Priority Products will be limited to no more than five (5) Priority Products. However, even with a small initial list of Priority Products, DTSC cannot determine how many businesses will be impacted until the list is released and manufacturers of those products submit Priority Product Notifications to DTSC. Only then will DTSC know how many businesses may produce the Priority Products. Once the list is released, the businesses will need to decide if they will conduct an Alternatives Analysis or stop using the chemical of concern. The draft regulations require DTSC to review and revise, as appropriate, the Priority Products List every three years.
- (iii) Following completion of the Alternatives Analysis and a decision to retain or replace or redesign the Priority Product, the manufacturer of the product may be required to comply with a regulatory response specified by DTSC. Consistent with the statute, the SCP regulations identify a range of regulatory responses that DTSC may require. At this time, it is not possible for DTSC to estimate which or how many manufacturers would be subject to a particular type of regulatory responses. Again, that cannot be known until the list of Priority Products is published, the alternatives analyses performed and reported to DTSC, and DTSC imposes one or more regulatory responses.

In Section "4.2. Regulation's impact on existing California employment", of the Economic Analysis of California's Green Chemistry Regulations for Safer Consumer Products (Attachment 2), the author discusses the impacts to the California chemical industry from these regulations.

The businesses impacted by the SCP regulations would include businesses located outside of California that are involved in the supply chain for products sold in California. Since DTSC cannot estimate the total number of businesses impacted, DTSC cannot estimate the percentage of businesses that would be small businesses.

A.3. Number of businesses created or eliminated

A.5. Number of jobs created or eliminated and the types of jobs or occupations impacted

DTSC cannot estimate the number of businesses or jobs created or eliminated by the SCP regulations for the same reasons that it cannot estimate the number of businesses impacted. See information above under A.2. Since the majority of product manufacturing takes place outside of California, the "Economic Analysis of California's Green Chemistry Regulations of Safer Consumer Products" Report expects that the

short-run impacts to California businesses to be minimal. (See Attachment 2, Executive Summary.)

Beginning two years after the adoption of the regulations, Alternatives Analyses must be performed by, and Preliminary and Final Alternative Analysis Reports must be prepared by, certified assessors. The certified assessors must receive their certifications from Accreditation Bodies designated by DTSC. These provisions of the SCP regulations have a likely, but unknown, potential to increase the number of businesses and jobs in California, as well as in other states and possibly other countries. The “Economic Analysis of California’s Green Chemistry Regulations for Safer Consumer Products” Report contains a discussion on why these requirements would increase the demand for life cycle analysis firms and practitioners. (See Section 3.4 ‘Costs of Alternatives Analysis’, “Economic Analysis of California’s Green Chemistry Regulations for Safer Consumer Products”, Attachment 2.)

Section 4.2 “Regulations’ impact on existing California employment” and Section 4.3 “The Economic Incidence of the Regulations” of the “Economic Analysis of California’s Green Chemistry Regulations for Safer Consumer Products” Report discusses potential positive and negative impacts to jobs in California. (See Attachment 2.)

DTSC cannot estimate all the types of jobs or occupations impacted. Jobs in manufacturing have the potential to be impacted. Also, these regulations have the potential to increase the demand for individuals trained in alternatives analysis.

A.4. Geographic extent of impacts

The SCP regulations impact the entire State. However, impacts to businesses extend beyond California, since the SCP regulations address consumer products placed into the stream of commerce in California regardless of where the product is manufactured.

A.6. Will the regulation affect the ability of California businesses to compete with other states by making it more costly to produce goods or services here?

The SCP regulations impact both California and non-California businesses producing goods for sale in California. Attachment 2 provides some factors on why California businesses may be more competitive than non-California businesses. (See Section 4.5 “Regulations’ impact on future job creation” of the “Economic Analysis of California’s Green Chemistry Regulations for Safer Consumer Products”, Attachment 2.)

B. Estimated Costs

B.1. What are the total statewide dollar costs that businesses and individuals may incur to comply with this regulation over its lifetime?

B.2. If multiple industries are impacted, what is the share for each industry?

Attachment 2, “Economic Analysis of California’s Green Chemistry Regulations for Safer Consumer Products”, does not include an estimate of the costs of the SCP regulations. Attachment 2 describes factors that could increase or decrease a business’s cost of compliance. For the same reasons described under A.2. of this

attachment, it is not possible to estimate the costs to businesses and individuals until implementation is under way. As the SCP regulations are focused on consumer products, multiple industries will be impacted. However, DTSC cannot estimate the share for each industry. Pursuant to the statute, these regulations will not impact: dangerous drugs or dangerous devices, dental restorative materials, additional [medical] devices, food, pesticides, or the packaging associated with the pharmaceutical or medical and dental devices. (All of these terms have specific meanings set out in the authorizing statute.)

Due to the time allowed for firms to adapt to the proposed SCP regulations, the economic analysis states that the average firm has the opportunity to lower compliance costs. (See the “Executive Summary” and Section 5. “The Dynamics of a Firm’s Regulatory Compliance Costs” of the “Economic Analysis of California’s Green Chemistry Regulations for Safer Consumer Products”, Attachment 2.)

Section 3 “Direct Costs of this Regulation” (Attachment 2) discusses factors impacting the cost of testing chemicals of concern, the cost of testing and reporting for priority products, costs of alternatives analysis, and the costs of regulatory responses required by DTSC.

Section 4.1 “Effects on Consumers” (Attachment 2) discusses potential impacts to consumers of the SCP regulations.

Section 5.4 “Market share shifts: transfers vs. costs” (Attachment 2) includes a discussion of short run and long run impacts of the regulations on product manufacturers and consumers.

For the reasons discussed above under A.2. of this attachment, DTSC is unable to estimate the costs to businesses and individuals until implementation is under way. However, many of the elements contained in an Alternatives Analysis (the major requirement of this regulation) are typically already undertaken by the manufacturers of products as part of research and development of new products or improvements to existing products.

The cost to perform an Alternatives Analysis to comply with the SCP regulations will depend on what and how many alternatives and chemicals a responsible entity elects to consider, the scope and comprehensiveness of the analysis, and the extensiveness of the testing necessary to demonstrate whether an alternative is functionally acceptable. After completing an Alternatives Analysis, the responsible entity can choose to retain, replace or redesign the existing Priority Product.

DTSC has received information from Alternatives Analysis practitioners that the costs of conducting an Alternatives Analysis would vary widely based on the scope of the Alternatives Analysis that is undertaken. A simple “single” chemical hazard analysis to look for a substitute chemical could cost as little as \$2,000 to \$3,000. A more comprehensive Alternatives Analysis involving the review of existing data without testing

could cost in the tens of thousands of dollars. (For example, the Toxics Use Reduction Institute (TURI) of Massachusetts performed an Alternatives Analysis for 5 chemicals: Lead, Formaldehyde, Perchloroethylene (PCE), Hexavalent chromium, di (2-ethylhexyl) phthalate (DEHP) for about \$50,000 per chemical. For each chemical, TURI identified the significant uses in manufacturing, consumer products and other applications, reviewed health and environmental effects, evaluated alternatives and their effects on employment and economic competitiveness associated with implementing the alternatives.) More complicated Alternatives Analyses requiring testing could run into the hundreds of thousands of dollars. Responsible entities will be able to reduce individual manufacturer costs by participating in consortiums enabling technical experts with strong experience with the products and materials of concern to collaborate to address single or multiple components or chemicals on behalf of multiple manufacturers.

B.3. If the regulation imposes reporting requirements, what are the annual costs a typical business may incur to comply with these requirements?

The SCP regulations do not require all businesses to prepare reports. The regulations also do not impose any annual or other on-going reporting requirements on any businesses.

The SCP regulations do allow DTSC to request businesses to provide information to DTSC (using existing information or by developing new information). There is no mandate for businesses to provide such information requested by DTSC (except as part of the Alternatives Analysis process or as a regulatory response requirement). Also, responsible entities that have a Priority Product would have to conduct an Alternatives Analysis and submit work plans and preliminary and final Alternative Analysis Reports. For the reasons described under A.2 and B.1/B.2 of this attachment, DTSC cannot estimate the costs to businesses of providing requested information or completing the Alternatives Analysis Reports until implementation is under way.

B.4. Will this regulation directly impact housing costs?

The SCP regulations do not directly impact housing costs. It is possible that a product used in housing construction would be listed as a Priority Product. However, at this time, DTSC is unable to estimate what, if any, impact the SCP regulations could have on housing costs.

B.5. Are there comparable Federal regulations?

There are no comparable Federal regulations. The United States Environmental Protection Agency (USEPA) has some authority under the Toxic Substances Control Act (TSCA) to manage chemicals. For example, under TSCA, section 5(b) (4), USEPA has the authority to list chemical substances that present or may present unreasonable risk to health or the environment. USEPA has never exercised this specific authority in the 30 years since TSCA was enacted. A rule making is required to list any specific chemical substance as a priority chemical. USEPA is developing chemical action plans for several chemicals. USEPA's chemical action plan for Bisphenol A includes considering a rulemaking under section 5(b)(4). USEPA also has the authority under

TSCA, Section 6(a) to limit, prohibit, or regulate a chemical's manufacture, processing, distribution, use or disposal by a rule making if the chemical poses an unreasonable risk. The current USEPA Administrator has announced plans to revise and strengthen USEPA's chemicals management and risk assessment programs. USEPA has taken risk management actions for a number of chemicals including lead, mercury, and formaldehyde. USEPA is also initiating a rulemaking under section 5(a)(2) of TSCA to require prior notification to USEPA before new consumer uses of glymes.

DTSC is specifically required by statute (AB 1879, Chapter 559, Stats. 2008) to adopt regulations to establish a process for identifying and prioritizing chemicals of concern in consumer products and evaluating those chemicals and their alternatives for the purpose of making California consumer products safer.

C. Estimated Benefits

Section 6 "Social Benefits of the Regulation" (Attachment 2) discusses various societal benefits that will occur as a result of adopting the SCP regulations. The extent of the health benefits or environmental benefits achieved depends on the potential of the chemical(s) of concern in the priority product to cause adverse public health and environmental impacts. Adoption of the SCP regulations also provides an opportunity to advance environmental justice, as information on safer products will be more widely available. (See Executive Summary and Section 6, Attachment 2.)

D. Alternatives to the Regulations

D.1. List alternatives considered and describe them.

In developing the SCP regulations, DTSC has tried to minimize the impact on businesses by:

1. Making responses to DTSC requests for information on chemicals and products optional instead of mandatory.
2. Providing options to extend compliance deadlines.
3. Allowing businesses to meet the requirements of the regulations through consortiums, partnerships and similar arrangements.
4. Providing guidance documents and sample alternatives analyses.
5. Providing exemptions for products containing only threshold amounts of chemicals of concern.
6. Providing flexibility in the alternatives analysis process.
7. Allowing businesses to submit alternatives analyses that do not have all the required data. Businesses would only be required to fill data gaps if DTSC requires the additional data as a component of a regulatory response.
8. Allowing businesses to avoid the alternatives analysis requirement by notifying DTSC that the chemical of concern has been removed from the product.

DTSC considered and rejected the alternatives described below:

1. *Do Nothing*. DTSC rejected this option because Health and Safety Code sections 25252 and 25253 *require* that DTSC adopt regulations to address chemicals of concern in consumer products. To do nothing would place Californians in jeopardy of continued exposure to chemicals of concern in consumer products when the average U.S. consumer already comes into contact with 100 chemicals per day.

To do nothing would also reject the California Legislature's direction to develop a broader, more comprehensive approach to chemicals policy for the State of California following the Green Chemistry Initiative's policy recommendation:

“Accelerate the Quest for Safer Products, creating a systematic, science-based process to evaluate chemicals of concern and identify safer alternatives to ensure product safety.”

Therefore, DTSC has rejected this option.

2. *Products and Chemical Hazard Categories Prioritization Process to Develop Safer Consumer Products*. While this alternative (described below) contains some conceptual merits that appear in the chosen alternative, DTSC has determined that this alternative, in its original form, is not viable.

To further develop this particular alternative, many meetings with stakeholders were held and DTSC evaluated numerous written comments and letters that were received in response to this alternative. This process was a continuous process between DTSC and stakeholders and in the end, transformed this alternative into the chosen alternative.

This alternative would require DTSC to identify product categories and chemical hazard categories. If a manufacturer produced a consumer product in a listed product category, the manufacturer would be required to evaluate the chemicals in the consumer product according to the chemical hazard categories and prioritize the chemical according to the scheme set out in regulations. Based on the chemical priority, the manufacturer would be required to make the chemical hazard characterization data available to its supply chain and/or conduct an alternatives analysis to develop a safer consumer product. A wide range of stakeholders objected to this approach because of its lack of specific DTSC oversight of various parts of the proposed process. Additionally, this approach did not fully comport with the requirements of the authorizing statutes.

3. *Other Options Considered in Earlier Proposed Drafts of the Regulations*. DTSC released two other Drafts of the SCP regulations in 2010 and an informal draft in October 2011. The following approaches contained in the originally proposed SCP

regulations and the October 2011 informal draft regulations have been reconsidered by DTSC and have been removed or revised for the reasons explained below:

- a. Two chemicals lists and two products lists --- The original proposed SCP regulations (Draft 1) required DTSC to adopt a list of chemicals under consideration and then identify a subset of this list as priority chemicals. Subsequently, DTSC would be required to evaluate products containing priority chemicals to develop a list of products under consideration, and then identify a subset of this list as priority products for which alternatives analyses would be required. DTSC determined that adoption of two chemicals lists and two products lists is not necessary to achieve the objective of the statute authorizing and mandating these regulations. DTSC revised the originally proposed draft of the regulations (Draft 2) to require DTSC to adopt one list of chemicals of concern, and then a single list of priority products from the universe of products containing chemicals of concern. In Draft 2 of the regulations, until January 1, 2016, the list of priority products would be limited to children's products, personal care products, and household cleaning products. Upon adoption, the current proposed SCP regulations as well as the October 2011 informal draft regulations (Draft 3) would establish an immediate list of approximately 1,200 chemicals of concern based on work already done by numerous authoritative bodies. The proposed SCP regulations will enable DTSC to immediately start work on evaluation of chemicals of concern in products; send immediate signals to the market place; and stimulate an alternatives analysis market. The current proposed regulations (Draft 4) limit the initial list of Priority Products to no more than five (5) products.
- b. Notifications for early product reformulations --- Draft 1 of the proposed SCP regulations required that manufacturers who reformulated their products to remove chemicals of concern prior to their product being listed as a priority product provide a notification to DTSC about the chemical removal. Based on numerous comments received about this provision, DTSC determined that this requirement could have the unintended and undesirable effect of discouraging early reformulations that would lead to placing safer products into the California marketplace. Therefore, this requirement was not included in Draft 2, Draft 3 or Draft 4 of the SCP regulations.
- c. Detailed qualification requirements for entities and individuals allowed to perform alternatives analysis --- Draft 1 of the SCP regulations included detailed qualification requirements for businesses wishing to perform in-house or third-party alternatives analysis and for individuals in charge of the performance of alternatives analysis. These qualification requirements were not included in Draft 2 of the proposed SCP regulations because of concerns that there might not be sufficient numbers of qualified businesses and individuals to meet the demand, and that such a shortage would delay implementation of the alternatives analysis portion of the program. Drafts 3 and 4 of the proposed SCP regulations require that after January 1, 2015 alternative analysis be performed by, and preliminary and final alternative analysis reports be prepared by, certified assessors. The

proposed SCP regulations also include a process by which DTSC designates entities as accreditation bodies. By providing a future date by which the alternatives analysis must be performed by a certified assessor, there should be sufficient time to have qualified businesses and individuals available to meet the demand.

- d. Scope of entities responsible for compliance --- Draft 1 of the proposed SCP regulations defined “responsible entities” to include a number of businesses in the supply chain for each product (manufacturers, importers, distributors, and retailers). Both manufacturers and retailers raised a concern that this approach made it too confusing in terms of knowing who is responsible for complying with the requirements of the regulations. Commenters also expressed concerns about the length of time allowed for implementing a sales ban (if the retailer chose this option in lieu of complying with the regulatory requirements). Draft 3 and Draft 4 of the proposed SCP regulations assign primary compliance responsibility to the manufacturer or the business that controls the specifications and design of, or use of materials in, a product. If the manufacturer fails to comply, then the importer is required to comply. California retailers are only required to comply with the requirements of the regulations if the manufacturer and importers fail to comply, and only after this information is posted on the “Failure to Comply List” on DTSC’s website. A retailer may opt out by ceasing to order the product (but they may sell out any remaining inventory) and notifying DTSC that they have stopped ordering the product.
- e. Due diligence requirements for unintentionally added chemicals exclusion --- Draft 1 of the proposed SCP regulations provided an exclusion for products that contained only unintentionally added chemicals of concern. However, Draft 1 of the proposed SCP regulations required manufacturers to conduct a fairly rigorous due diligence effort to identify all chemicals contained in their products in order to qualify for this exclusion. Many commenters expressed the concern that the specified due diligence requirement could not practically be met, thus rendering the exclusion meaningless. Draft 3 and Draft 4 of the proposed SCP do not contain an exclusion for unintentionally added chemicals; however, these chemicals are a consideration for setting higher alternatives analysis threshold levels.
- f. De minimis / Alternatives Analysis Threshold exemption process --- Draft 1 of the proposed SCP regulations provided an exemption for products containing only a de minimis amount of chemicals of concern, but required manufacturers to request DTSC approval in order to qualify for the exemption and to provide specified information and data in support of such an exemption request. To enable DTSC and manufacturers to focus their resources on those products and chemicals having a significant potential to cause adverse impacts to public health and the environment (i.e., those products containing chemicals of concern in excess of de minimis amounts), Drafts 2 and 3 of the proposed SCP regulations made the de minimis exemption self-implementing, if the manufacturer notified

DTSC of any products for which the manufacturer had made a de minimis determination. Draft 4 of the regulations changes the wording from “de minimis” to “Alternatives Analysis Threshold”. In addition, Draft 4 requires that the manufacturer provide substantiating documentation, including laboratory results, to DTSC as part of the exemption claim to enable DTSC to assess the validity of the claim.

- g. No exposure pathway exclusion criteria --- Draft 1 of the proposed SCP regulations provided exclusions for chemicals and products for which DTSC determined there is no exposure pathway. That is, if DTSC had determined there was no means by which a chemical in a product could result in a person or the environment being exposed to the chemical, then it was exempt. In Draft 2 of the proposed SCP regulations, the exclusion was revised to apply only to products, since exposure pathways cannot practically be evaluated except as they relate to the potential for exposure to a chemical contained in a consumer product. Draft 3 and Draft 4 of the proposed SCP regulations eliminated the “no exposure pathway exclusion”, because of the difficulty of proving with certainty that absolutely no possible exposure pathway exists. However, exposure is still an important consideration in the chemical/product prioritization process.
- h. Hazard Traits --- In Draft 2 of the proposed SCP regulations, the chemicals that could be considered for the first chemicals of concern list would be limited to carcinogens, mutagens, reproductive toxins, and persistent bioaccumulative toxic chemicals appearing on a very short “list of lists”. For all subsequent chemicals of concern lists, consideration of carcinogens and reproductive toxins would continue to be limited to chemicals appearing on a very short list of lists. In Draft 3 and Draft 4 of the proposed SCP regulations, the list of hazard traits has been expanded to include all hazard traits and environmental and toxicological endpoints specified by the Office of Environmental Health Hazard Assessment in regulations that it adopted. Additionally, the universe of chemicals considered to be carcinogens and reproductive toxins is no longer limited to only those chemicals listed on a short list of lists. These changes were made to ensure that the program would be able to address the full range of chemicals in consumer products that pose adverse public health and environmental impacts, consistent with the intended scope and goal of the statute and the regulations. Draft 4 establishes an immediate list of chemicals of concern using 22 existing lists that:
 - (i) list chemicals on the basis of exhibiting at least one of seven hazard traits (carcinogenicity, reproductive toxicity, mutagenicity, developmental toxicity, endocrine disruptor, neurotoxicity, and/or persistent bioaccumulative toxicity); or
 - (ii) chemicals that are of concern for water quality, air quality, or biomonitoring.
- i. Worker Exposure --- In Draft 2 of the proposed SCP regulations only service-provider worker exposures were specifically included in the product prioritization factors. Draft 3 of the proposed SCP regulations adds worker exposure as a product prioritization factor. Draft 4 also includes worker exposure as a product prioritization factor, and makes it clear that the term “public health” included

occupational health. These changes were made to ensure that the program would be able to adequately address public health impacts for workers.

- j Process to Evaluate Prioritization Factors --- Draft 4 of the proposed SCP regulations adds a new section to the regulations that explains the process by which DTSC is to evaluate the product prioritization factors to identify the products to include on the Priority Products List. This section was added in response to requests that there be greater clarity in the regulations as to how the product prioritization process would proceed.

D.2. Summarize the total statewide costs and benefits from this regulation and each alternative considered.

D.3. Briefly discuss any quantification issues that are relevant to a comparison of estimated costs and benefits for this regulation or alternatives.

For the reasons identified in A.2. of this attachment, DTSC is not able to quantify the costs and benefits of the regulations or the alternatives. While the alternative “Do Nothing” would not pose any additional regulatory costs, doing nothing will continue the exposure of the public and environment to harmful chemicals in products. Section 6 of Attachment 2 describes the factors that will impact the societal benefits of adopting these regulations.

D4. Rulemaking law requires agencies to consider performance standards as an alternative, if a regulation mandates the use of specific technologies or equipment, or prescribes specific actions or procedures. Were performance standards considered to lower compliance costs?

The proposed SCP regulations do not mandate any specific technologies or equipment. The SCP regulations prescribe specific actions that responsible entities are required to perform, but build in a great deal of flexibility regarding how the actions are to be performed. The regulations do include an Alternatives Analysis Threshold exemption process that exempts a responsible entity from the requirement to perform an alternatives analysis. The responsible entity must show that their Priority Product meets the criteria for the Alternatives Analysis Threshold exemption. The regulations also require the responsible entity to develop certain metrics for use in comparing the existing Priority Product with alternatives in the Alternatives Analysis process. However, in general, performance standards are not applicable to these regulations.

E. Major Regulations

E.1. Will the estimated costs of this regulation to California business enterprises exceed \$10 million?

While DTSC is unable to estimate the costs of the SCP regulations to California businesses for the reasons described in A.2. of this attachment, DTSC believes that these regulations likely qualify as major regulations. Attachment 2 describes the various factors that will affect costs to businesses. These regulations require businesses to test products for chemicals of concern; conduct alternatives analyses; implement the selected alternative, if any, which could include product redesign, reformulation or substitution of a different product; and comply with any regulatory

responses imposed by DTSC. Each of these requirements will impose costs on businesses.

In discussing the alternatives analysis requirements of these regulations with alternatives analysis practitioners and stakeholders engaged in conducting alternative analyses, a wide range of costs were projected depending on the complexity of the analysis. A *simple* single chemical alternatives analysis could cost as little as \$2,000 to \$3,000, a *moderately complex* alternatives analysis using existing data would be in the tens of thousands of dollars, and an alternative analysis of *greater complexity* requiring extensive testing could cost in the hundreds of thousands of dollars. The scope and complexity of the alternatives analysis that the responsible party elects to undertake will undoubtedly impact the costs as will the extent to which a responsible party is already engaged in performing alternatives analyses for its own research and development activities.

Without considering any other costs associated with the regulations, overall costs for California businesses associated with the performance of alternatives analyses for the initial and subsequent lists of Priority Products could vary dramatically depending on a number of factors: (i) the number of products listed; (ii) the number of manufacturers of each product located in California (it is expected many will be out-of-state); and (iii) the scope and complexity of the alternatives analyses as determined by each individual manufacturer. (The costs to California businesses associated with compliance with any regulatory responses required by DTSC will also vary dramatically based on a similar set of factors.) For example:

Example #1: Two Priority Products listed – each product has 25 manufacturers – all manufacturers choose *simple* alternative analysis scope and approach.

Estimated aggregate costs for all affected manufacturers*: \$125,000

Example #2: Three Priority Products listed – each product has 50 manufacturers – all manufacturers choose a moderately complex alternatives analysis.

Estimated aggregate costs for all affected manufacturers*: \$7.5 million

Example #3: Four Priority Products listed – each product has 100 manufacturers – 50 manufacturers choose a moderately complex alternative analysis, and 50 manufacturers choose an alternative analysis of *greater complexity*.

Estimated aggregate costs for all affected manufacturers*: \$110 million

* *Many/most of the affected manufacturers would be non-California businesses.*

These costs would likely be greatly reduced to the extent responsible entities form consortiums to perform all or part of their alternatives analyses.

E.2. Briefly describe each equally effective alternative, or combination of alternatives, for which a cost-effectiveness analysis was performed.

E.3. For the regulation and each alternative just described, provide the estimated total cost and overall cost-effectiveness ratio.

DTSC did not complete a cost-effectiveness analysis of any of the other alternatives that were considered due to the difficulty of estimating costs/benefits when so many variables are unknown. However, the cost savings from the health and environmental benefits could be significant. In the “Fiduciary Guide to Toxic Chemical Risk” issued in March 2007 by the Investor Environmental Health Network and the Rose Foundation for Communities and the Environment (Executive Summary, page 4, www.iehn.org or www.rosefdn.org), the authors cited a national study that estimated the direct and indirect environmentally attributable costs of selected illnesses and disabilities in American children at almost \$55 billion in 2002 (Landrigan, P.J., C.B. Schechter, et al. (2002). “Environmental Pollutants and Disease in American Children: Estimates of Morbidity, Mortality, and Costs for Lead Poisoning, Asthma, Cancer, and Developmental Disabilities.” *Environmental Health Perspectives* 110(7): 721-728.)

FISCAL IMPACT STATEMENT

A. Fiscal Effect on Local Government

6. Other

The SCP regulations address chemicals in products. Any fiscal impact from the regulations to local agencies would likely be in the operating expense and possibly the equipment and capital outlay line items. (That is, there would be no direct costs imposed on local governments because the regulations only apply to manufacturers, importers and retailers of consumer products.) However, generally, DTSC does not expect the SCP regulations to result in cost increases given the wide variety of products readily available at competitive prices. (Please see a more detailed explanation in Section B, immediately below).

Any costs incurred by local government agencies for the cost of goods would not likely be state-reimbursable because any increase in costs would not be unique to local government and would apply generally to all entities purchasing the same product.

Local governments could also be impacted if manufacturers are required to implement end-of-life management strategies for priority products. For certain products, the SCP regulations require that the manufacturers of those products identify the roles and responsibilities of various parties, including government, throughout the life cycle of the product. Further, the SCP regulations require that the manufacturer of the product provide a financial guarantee mechanism for a sustainable end-of-life management program for the product. The SCP regulations allow multiple manufacturers to form a third-party product stewardship organization, funded by participating manufacturers, to provide local services to collect, recycle, or otherwise appropriately manage the product types that they manufacturer in common.

The goal is to transfer the costs of end-of-life product management programs to the manufacturers, with the understanding that manufacturers will likely pass these costs on to consumers. Local governments implementing such programs in the future should not incur any additional costs for which they are not reimbursed.

B. Fiscal Effect on State Government

4. Other

COST OF GOODS

The SCP regulations address chemicals in products. Any fiscal impact from the regulations to State agencies in general would likely be in operating expense and possibly equipment and capital outlay line items.

However, generally, DTSC does not expect the SCP regulations to result in cost increases, given the wide variety of comparable safer products readily available at competitive prices. Product competition will provide the incentive for companies that redesign their products to keep prices for the redesigned products competitive. Competition will also ensure that State and local agencies, and other consumers, have a wide variety of products to choose from at competitive prices (even if a particular brand an agency or consumer is using is replaced with a higher price product).

It is important to note that nothing in the SCP regulations would force an agency to buy a particular product or to replace in-use items (e.g., carpet, furniture, or paint). Further, the SCP regulations will have the benefit of making more information available for state and local agencies to inform them in making their own discretionary purchasing decisions for their environmentally preferable purchasing programs.

Even if DTSC ends up banning a product, significant cost impacts are not expected because comparable safer products should be readily available at competitive prices, and because economic feasibility is one of the key findings DTSC must make before imposing a ban on a priority product for which an alternative is not selected. In this use, economic feasibility means that there are safer alternatives to the product or product component that do not contain the chemical of concern that the manufacturer could choose without significantly impacting the profitability of the product.

Even if costs of some products do increase, products do not make up a significant proportion of most state agencies' operating budgets. Further the benefits of using a safer product would outweigh any increase in price.

DTSC STATE OPERATIONS

DTSC has been redirecting staff and operating expenses for the past three fiscal years to develop these regulations and implement the Green Chemistry Initiative. For fiscal year 2012/2013 and ongoing, DTSC is proposing to increase the amount of redirected resources so that sufficient resources are available to implement these proposed SCP regulations. DTSC is proposing to redirect a total of 39 positions as follows: 23

positions within the Pollution Prevention and Green Technology Program, 3 positions within the Environmental Chemical Laboratory, 3 positions within the Office of Legal Affairs, 4 positions within the Enforcement Program, and 6 positions within Information Technology. Total annual staff costs will be \$4.8 million. DTSC is also proposing to cut several vacant positions to supplement existing contract funds to budget a total of \$1.4 million for contracts and laboratory equipment required to implement the regulations. DTSC estimates its annual cost to implement these regulations will be \$6.2 million.

DTSC's resource needs are based on its review of the staffing and operating costs of government agencies such as the Air Resources Board, the California Department of Pesticide Regulation, USEPA, the State of Massachusetts, and the European Union, all of which have organizations that perform functions that are comparable to some of the activities DTSC would perform under these regulations. The fiscal impact is a conservative estimate based on a limited Priority Products List. As DTSC gains experience in implementing the regulations, resource needs could change as the Priority Product List expands and as DTSC identifies improvements and efficiencies.

C. Fiscal Effect on Federal Funding of State Programs

4. Other

Federal funds provide full or partial support for a wide range of programs administered by California State government. DTSC does not expect any decrease in federal funds to California as a result of these regulations.

Even if federal funds provided to State government agencies are used to pay for Priority Products, the SCP regulations pose no risk/jeopardy to the receipt of federal funds. As discussed above in Section B, the SCP regulations are not expected to increase costs or add a cost pressure since government agencies can switch to safer products of similar costs. Thus, the SCP regulations also would not result in a redirection of federal funds from direct services to operating equipment and expenses.