

STATE OF CALIFORNIA  
ENVIRONMENTAL PROTECTION AGENCY  
DEPARTMENT OF TOXIC SUBSTANCES CONTROL

GREEN CHEMISTRY INITIATIVE  
STRAW PROPOSAL ON SAFER ALTERNATIVES REGULATION  
WORKSHOP

BYRON SHER AUDITORIUM  
SECOND FLOOR  
CALIFORNIA EPA HEADQUARTERS  
1001 I STREET  
SACRAMENTO, CALIFORNIA

WEDNESDAY, OCTOBER 21, 2009

9:18 A.M.

A P P E A R A N C E S

DTSC Staff Present

Maziar Movassaghi, Acting Director

Bob Boughton

Peggy Harris

Nancy Ostrom

Donald Owen, Jr.

Evelia Rodriguez

Janette Sartain

Joseph Smith, Counsel

Cynthia Miller

Also Present

Joe Guth  
Science and Environmental Health Network

Gene Livingston  
Soap and Detergent Association

Gretchen Lee Salter  
Breast Cancer Fund

Bill Greggs, Consultant  
Grocery Manufacturers Association  
Green Chemistry Alliance

Catherine Porter  
California Health Nail Salon Collaborative

Tom Jacob  
DuPont

Davis Baltz  
Commonweal; CHANGE Coalition

Missy Johnson  
California Retailers Association

ALSO PRESENT

Dawn Koepke  
Green Chemistry Alliance

Bill Magavern  
Sierra Club

Paul Deleo  
The Soap and Detergent Association

Pam Palitz  
Environment California

Robert Doty  
Cox, Costle and Nicholson

Amy Lily  
American Honda

Dan Leacox  
Greenberg Traurig

Joe Gregorich  
Tech America  
Information Industry Council

John R. Ulrich  
California Chemical Industry Council  
Green Chemistry Alliance

Doug Poole  
DuPont

Randy Fischback  
Dow Chemical

Laurie Nelson  
Consumers Specialty Products Association

Heather Bowman  
Holland and Knight  
Coke Industries

Amy Lily  
American Honda

Robert Callahan  
California Chamber of Commerce

ALSO PRESENT

Andy Hackman  
Toy Industry Association

John Ulrich  
Chemical Industry of California

Robert Beck  
Masco Corporation

Eileen Sheehan  
Region 9  
United States Environmental Protection Agency

Mike Rogge  
California Manufacturing Technical Association

Heidi Sandborn  
California Product Stewardship Council

Eric Newman  
K P Public Affairs

Bill Allayaud  
Environmental Working Group

Pam Palitz  
Environ.California

Lesli Daniel

I N D E X

	<u>Page</u>
Welcome	1
Opening Remarks	1
Maziar Movassaghi, Acting Director	1
Introductions, Objectives, Guidelines	5
Janette Sartain	5
Safer Alternatives Straw Proposal	6
Overview	6
Peggy Harris	6
Panel Presentations	16
Joe Guth	16
Gene Livingston	21
Gretchen Lee Salter	25
Bill Greggs	31
Panel Discussion	36
Process to Identify and Prioritize Chemicals of Concern in Consumer Products	67
Donald Owen	68
Questions/Comments	74
Afternoon Session	108
Process to Evaluate Alternatives and Lifecycle	109
Nancy Ostrom, Bob Boughton	109
Questions/Comments	126

I N D E X

Page

Response Actions	155
Evelia Rodriguez	155
Questions/Comments	166
General Questions/Comments	203
Adjournment	231
Reporter's Certificate	232

P R O C E E D I N G S

9:18 a.m.

1  
2  
3 DIRECTOR MOVASSAGHI: All right, good morning,  
4 everybody. Now I know why all those college professors say  
5 there's a lot of empty seats up front, please come close.  
6 Seems like a cavernous auditorium, so, folks, please feel  
7 free to come on up. The projector is visible from upfront  
8 and down-back, as well.

9 First of all, I want to thank everybody for  
10 showing up today on a beautiful day to talk about a very  
11 very important project to the State of California, and that  
12 is our Green Chemistry Initiative.

13 The workshop today is going to be focused on the  
14 straw proposal that DTSC put out to meet the requirements of  
15 AB-1879. I would like to remind everyone that the Green  
16 Chemistry Initiative called for six planks, one of which is  
17 the quest of alternatives. Other planks were related to  
18 education and workforce and infrastructure issues. And DTSC  
19 is working on those arenas, as well. So I'm highlighting  
20 this because I feel a lot of wonderful brain power that I  
21 hope will also help and give some guidance on those  
22 initiatives, as well.

23 But today we're talking about AB-1879 and the  
24 straw proposal. I would also like to remind everybody that  
25 the straw proposal is not, let me repeat, is not the

1 official proposal from DTSC.

2           We have had a couple of years of workshops,  
3 hundreds of hours of workshops on phase one and phase two of  
4 this initiative. We've heard a lot of great ideas. We even  
5 tried to use the WIKI model to tap into the knowledge base  
6 out there in the world, and not just California and this  
7 room, to give us some guidance.

8           We got some good feedback on general ideas. Each  
9 one of those ideas has tradeoffs. And our attempt in the  
10 straw proposal was to be able to put it in a structure so  
11 everybody can see what those tradeoffs are.

12           I don't need to remind this body that we do not  
13 have unlimited resources and time, money and manpower. So  
14 there's going to be a process where we're going to need to  
15 identify which one of the tradeoffs we're willing to live  
16 with.

17           To that end, we're going to start off the workshop  
18 today by a facilitated discussion. We have four individuals  
19 that are very smart and have been involved in this process  
20 for a long time. And they're going to help present views  
21 from their perspectives, to help couch the discussions and  
22 identify some key questions that we need to focus on.

23           Because we are required by AB-1879 to have these  
24 regulations done by January 2011, that means that we need to  
25 start the official APA regulatory review process sometime in

1 Q1 2010.

2 We have some proposed timeline options submitted  
3 to agency, Cal EPA Agency, for review and approval. Once  
4 that's done, and that should happen pretty quickly, we will  
5 also post those so everybody can see all the different steps  
6 that are going to happen between now and January 2011.

7 This is not the only time you will have an  
8 opportunity to comment. There will be multiple  
9 opportunities to comment as we develop the draft  
10 regulations. And then go through the APA process.

11 By Friday DTSC will also post a series of  
12 questions that we have heard through the Green Ribbon  
13 Science Panel, some of the comments we've received from the  
14 stakeholders in the room, and the comments we hear today.  
15 With the idea being that we want to make sure that we  
16 captured all the questions that have been raised, and also  
17 give you an idea of what it is that we're looking at in  
18 order to move forward.

19 We will also make the transcripts of the Green  
20 Ribbon Science Panel and this workshop available so  
21 everybody can see what the points of discussion were.  
22 Because we are getting to the point where we need some  
23 clear, constructive feedback to be able to move forward.

24 I have to apologize. I have a meeting that I have  
25 not been able to reschedule, so I'm going to miss a part of

1 this workshop, but I'm going to be listening in. And we  
2 have a number of capable staff from DTSC here.

3 They're going to make very abbreviated  
4 presentations. You've all heard the presentations,  
5 probably, to the Green Ribbon Science Panel discussions and  
6 some of the ideas are laid out in the straw proposal. The  
7 idea for today is to have comment and constructive dialogue.

8 And I hope we can get there, because, like I said,  
9 we are getting -- we're almost like in the bottom of the  
10 seventh inning, we're done with the seventh inning stretch.

11 Everybody had a chance to stretch their legs. This is the  
12 time to get into some constructive dialogue.

13 So, with that, I'm going to turn the floor over to  
14 Janette Sartain, a wonderful facilitator that's going to  
15 guide us today. And after that, the panel's going to start.

16 But, again, I really want to thank all of you for taking  
17 time from your busy schedules to help us, because no one  
18 else in the world has done this.

19 The Governor has laid out some very clear  
20 guidelines of where we need to go. We have a piece of  
21 legislation that's given us a focus. We've had two years of  
22 discussion about ideas. Now's the time to put those ideas  
23 into motion.

24 So, with that, I'm going to turn the floor over to  
25 Janette.

1 MS. SARTAIN: Thank you, Maziar. Well, as Maziar  
2 mentioned, it's great to see you all here. It's really nice  
3 to know that there's so many people who have an interest in  
4 discussing green chemistry. So your participation today is  
5 very much appreciated.

6 I get to do the housekeeping stuff and get that  
7 out of the way. We do have handouts, if anybody has come in  
8 late. We have handouts for everybody on that back table.  
9 If, for some reason, we should run out, which I don't  
10 expect, but if we do, please find a DTSC Staff Member and  
11 we'll do our best to make that available to you.

12 There is also going to be a sign-up for speakers  
13 today. Your input is the whole purpose of this meeting.  
14 So, we would like you to consider speaking or commenting.  
15 And who has the sign-up sheet for that? Do we have a sign-  
16 up sheet?

17 MR. O'DOCHARTY: We'll bring it in shortly.

18 MS. SARTAIN: Perfect. We're going to have breaks  
19 and lunch, so that will give you a great time to do that.

20 And we also want to have staff members in the  
21 audience today with microphones. We know that not everybody  
22 is really comfortable coming up to a podium, so we thought  
23 it might be more comfortable for you to be able to have us  
24 bring it to you there.

25 Cellphones, beepers, if you could possibly turn

1 them either to buzz or jiggle or down on low volume or  
2 something, that would be great, so we don't interrupt the  
3 meeting.

4 In case of a fire or a fire drill, of course, you  
5 have your two exits there, and the two behind me. I feel  
6 like an airline steward here, but they're right up on the  
7 top of the stage there.

8 Restrooms, straight out and to your left. And  
9 there is a cafeteria downstairs in the lobby. I believe it  
10 closes at 3:00, but it's available to the public.

11 So, quickly, we're going to have Peggy Harris come  
12 up and give you an overview of the safer alternative straw  
13 proposal. Peggy.

14 MS. HARRIS: I'm going to give you an overview of  
15 the straw, and it's going to be just a brief overview, so  
16 that as the panelists are having their discussion you can  
17 sort of put their comments in that discussion in context.

18 After the panel discussion, then each of the reg  
19 team members will get up and give a much more detailed  
20 discussion on each of these subject areas. So, if you have  
21 any questions as a result of my presentation, I'm sure they  
22 will be answered when the reg team actually does its  
23 presentation.

24 As well as we have a series of questions and  
25 issues that we would like to raise for discussion purposes.

1 And clearly, you're free to raise other issues. But as  
2 we're going through and giving the presentations on the  
3 specific sections, there will be specific questions that we  
4 will be asking you all to get your input on.

5 The first step that was laid out in the straw was  
6 obviously the identification and prioritization of chemicals  
7 of concern. And what we had laid out in the straw is a  
8 process for first the manufacturers to determine if the  
9 product or chemical is within the scope.

10 And the scope that we laid out in the regulation  
11 was one of 11 product categories. There were nine true  
12 product categories, and then there were two additional  
13 product categories that were chemicals that were either  
14 identified on a specific list of chemicals, or on a list of  
15 lists.

16 So through the discussion that Don Owens will be  
17 leading this afternoon or later this morning, there will be  
18 much more of a discussion about the pros and cons of each of  
19 those three approaches, as well as other areas. But that's  
20 one of the areas he'll be focusing on.

21 The second requirement we have for the  
22 manufacturer is to generate data to determine if it meets  
23 certain hazard criteria. We identified in the straw 12  
24 different hazard criteria such as acute toxicity, eye  
25 damage, organ toxicity, cancer, reproductive effects,

1 endocrine disruption, respiratory sensitization,  
2 bioaccumulation, acute and chronic aquatic toxicity, blah,  
3 blah, blah, so there's 12. And there will be a discussion,  
4 obviously, about those hazard categories.

5           One of the things that we heard from the Green  
6 Ribbon Science Panel was a discussion about scope. And we  
7 sort of knew that as we were going into this, that it will  
8 be really beneficial to us to begin to have more of a  
9 discussion about really what should be the scope of these  
10 regulations as we move them forward.

11           The third requirement for the manufacturer is to  
12 prioritize the chemicals of concern. What we have set out  
13 in the straw are three different priorities, the chemical  
14 after you've gone through and identify what chemicals are in  
15 the product categories; compared them to the hazard  
16 criteria. Then those would be considered chemicals of  
17 concern.

18           After that's done, then they would fall into one  
19 of the three priorities. The first priority would be one  
20 where those chemicals would be expected to have a release.  
21 It could be easily anticipated that there would be a  
22 release.

23           The second priority is a release only during  
24 reclamation or disposal. And then the third priority is  
25 really no reasonably anticipated release would be expected.

1           So, you know, clearly, I think, there will be  
2 discussion about those priorities, and whether or not those  
3 that would have -- there would be no reasonable expectation  
4 for exposure, as to whether or not there's any reason to  
5 move on for alternative analysis. And that's one of the  
6 issues that we've heard, and one of those that we'd like to  
7 have a dialogue about.

8           The fourth requirement, then, for the manufacturer  
9 is to communicate the hazard category outcome and the  
10 documentation through both the clearinghouse, which is being  
11 developed as a result of 509; and also through the supply  
12 chain.

13           So that would be another area of discussion that  
14 we would like to have is this supply chain documentation.  
15 What is it that each -- we call a transferee, if there's a  
16 better term -- but what does each step of the process think  
17 that they need.

18           One manufacturer, we've put the requirement on  
19 them in the straw, but what does each transferee in the  
20 process, through the consumer, feel that they need to have.

21           So we would like to have input on that, as well.

22           We've laid out a timeframe for this step of the  
23 process of one year. I consider that to be a bit of a  
24 placeholder, so we obviously will have a discussion about  
25 what would be the appropriate timeframe.

1           The next step in the process is the alternative  
2 assessment process, the process to evaluate potential  
3 alternatives. What we've laid out in the straw is the first  
4 step is to identify the functional equivalent alternatives.

5           Nancy Ostrom and Bob Boughton will be walking  
6 through this part of the process in much more detail. The  
7 second part of the process would then, after they've  
8 identified functionally equivalent potential alternatives,  
9 would be to compare the consumer product and the potential  
10 alternatives on the basis of hazard category.

11           And then the third step of that process would be  
12 looking more at exposure pathways, lifecycle criteria.

13           We have suggested that if no alternative is  
14 identified, that this analysis be repeated on a two-year  
15 frequency. We have also laid out in the straw certain  
16 reporting and supply chain documentation that would be  
17 required.

18           For this one we also have identified in the straw  
19 a timeframe for completion of one year. You'll see a  
20 pattern here. And then we will be asking various questions  
21 related to alternatives analysis.

22           Of those will be -- once again, we've asked this I  
23 think at every workshop -- dealing with weighting of the  
24 factors. And two, we did hear quite a bit of comment about  
25 trying to tier the alternatives analysis. And I think Nancy

1 will be trying to get input from you on what the criteria  
2 might be for different types of tiers. But she'll raise  
3 those issues.

4 The third step of the process is the response  
5 actions. Those result of the alternative analysis, then we  
6 have a response action.

7 For the response actions we've laid out a series  
8 of potential response actions. For the prohibitions we've  
9 laid out if a safer alternative exists that we've laid out  
10 certain prohibitions for certain conditions that vary, based  
11 on certain exposures, depending on which priority they fall  
12 into, of two to 15 years. And if no safer alternative  
13 exists, from five to 20 years.

14 I think that one of the things that we would  
15 really like to hear from you is what is the subset as a  
16 result of the alternative analysis that really does need to  
17 move to prohibition.

18 We've laid out a certain proposal in the straw,  
19 but I do think there's probably a subset, rather than we  
20 sort of laid out any potential product or alternative that  
21 contains a chemical of concern would be subject to a  
22 prohibition. But it most likely is a subset that we should  
23 really apply the prohibition to. And Evelia Rodriguez will  
24 be talking to you about that.

25 We also have laid out certain requirements for if

1 a alternative is chosen, but it has significant impacts,  
2 that alternative still has a chemical of concern. And there  
3 are impacts associated with that that were identified in the  
4 lifecycle. And we've laid out specific requirements  
5 associated with that, including notification of the  
6 appropriate board or department, i.e., there's a water  
7 impact so you'd be notifying the Water Board.

8 We've also laid out criteria for development of an  
9 implementation plan if a response action is required. Once  
10 again, we've laid out a timeline of one year after  
11 completion of the alternative analysis to complete the  
12 response action.

13 So, all of these timeframes, we will be asking and  
14 taking comment on as to what would be the appropriate  
15 reasonable timeframe. And the one thing that we're really  
16 trying to signal is the straw is that we do expect this to  
17 be a somewhat streamlined process. We don't want like the  
18 alternative analysis to end up being a black hole, because  
19 that doesn't really get to our objective, which is  
20 identification of safer alternatives.

21 So, we're very open to what really should be the  
22 timeframes, what really should be the scope. But we do want  
23 to signal that we do expect that this is not going to be a  
24 20-year process.

25 We did lay out a variance process with certain

1 criteria. The idea of the variance process is because we  
2 have laid out specific requirements, we recognize that  
3 there's going to be site-specific scenarios where the  
4 requirements we have don't really make sense.

5 So we did feel that there did need to be a way for  
6 us to be able to evaluate and have site-specific, case-  
7 specific considerations.

8 The last part of this that I'll raise before  
9 turning it back to the panel for further discussion is we  
10 did identify this to be a self-implementing process. We do  
11 expect that the department will be doing enforcement. We  
12 have laid it out so that the department can do call-ins. We  
13 did lay it out so that we could impose alternatives; we  
14 could impose certain response actions, if necessary. But we  
15 did lay this out as a self-implementing process.

16 We have heard comments about this. We would be  
17 very interested in having a discussion about this today.  
18 What would be an alternative to a self-implementing process  
19 that would be a reasonable alternative for all considered.

20 So, with that, I will turn it back to Janette.  
21 And, once again, I've given a very quick overview. But you  
22 will get a much more detailed discussion from each of the  
23 reg writers on these specific subject areas.

24 Janette.

25 MS. SARTAIN: Thank you. Rather than go through

1 every item of the agenda, I'd like to just quickly mention a  
2 couple of things to you. During the panel discussion we  
3 would hope to have some time to open it up for a couple of  
4 questions from the house, if they are specifically directed  
5 to one of our panel members.

6 At this time could I ask the panel members to come  
7 and take your seats, please. Are you all here? Thank you.

8 And later on in the day there will be time for  
9 open discussion for the room.

10 While they're taking their seats I'll mention  
11 that, of course, your input on this is vitally important, so  
12 we do encourage you, please, to write down your comments,  
13 suggestions, solutions -- especially solutions. And you  
14 have until November the 4th to get those in. November 4.

15 And when you do put those in, please try to make  
16 them constructive and attainable. And don't be afraid to  
17 use directive language. If you feel very passionately about  
18 something, let us know that; say, this is really important  
19 to me; here's what I want to see done.

20 Before we get going, we'd like to just mention a  
21 few simple guidelines for the discussions throughout this  
22 day. If you could, please, avoid interrupting or talking  
23 over each other. We realize that sometimes two people will  
24 speak up at the same time, that's fine. But let's be  
25 respectful of who has the floor.

1           Please keep your comments concise and on topic.  
2 And, of course, our topic for today is a discussion of the  
3 pros and cons of the present straw proposal. Please  
4 maintain a conversational voice level. Speak loud enough  
5 that we can hear you, but that you don't scare us, please.  
6 And avoid repeating what someone else has already said. If  
7 you want to agree with them, fine. Say, I agree with so-  
8 and-so. But it will really save us a lot of time if we can  
9 avoid hearing things repeatedly.

10           I understand that we had a coin toss, is that  
11 true, to see who starts? Everybody deferred. Well, then I  
12 guess it's up to me.

13           (Laughter.)

14           MS. SARTAIN: Okay, I would like to introduce our  
15 panelists to you. We're so fortunate to have them here  
16 today, and we're very grateful to all of you for taking time  
17 out of your lives to come down and do this. Thank you.

18           We have with us today -- and if you wouldn't mind  
19 giving way for the people in the back who can't read your  
20 name tags, we have Joe Guth of the Science and Environmental  
21 Health Network. We have Gene Livingston with Soap and  
22 Detergent Association. Gretchen Lee Salter, Breast Cancer  
23 Fund. And Bill Greggs of Chemical Industry Council of  
24 California.

25           And I understand you prefer being called Bill? Or

1 is it William?

2 MR. GREGGS: I do, and it's for the Grocery  
3 Manufacturers Association.

4 MS. SARTAIN: I'm sorry. That's quite different,  
5 isn't it? Could you repeat that, Grocery Manufacturers  
6 Association?

7 MR. GREGGS: Right.

8 MS. SARTAIN: Okay, my apologies. Pardon? Ah,  
9 okay. We're going to start out by giving each one of the  
10 panelists say three to five minutes to make a personal  
11 statement. And then after that open it up so that you can  
12 all have a discussion with each other.

13 And hopefully, at some point, as I said, we'll be  
14 able to field some questions or comments from the house  
15 directly to the panel members.

16 So, shall we start here and just work down the  
17 row? Does that work for everybody? Oh, before you start,  
18 I'm sorry, I will try to give you guys a five-minute heads-  
19 up before our break, so please don't be offended if I cut in  
20 on the microphone and say five minutes, okay? Thanks. You  
21 may start.

22 MR. GUTH: I'm trying to keep in mind all these  
23 ground rules. It's so unlike the way I usually conduct  
24 myself.

25 All right. Well, the Science and Environmental

1 Health Network is an environmental health nonprofit  
2 organization, so I'm on the nonprofit, but we think of it as  
3 a public interest side of these issues.

4           So, there are a couple things that -- points I'd  
5 like to make about just the overall feeling about a number  
6 of us in the NGO community about the proposal. And then a  
7 few comments on the specifics of what we think of as the  
8 front-end, the beginning parts of the bill. And then  
9 Gretchen will have some comments on the parts of the bill  
10 starting with prioritization.

11           There are a lot of things that many of us like  
12 about the bill, the proposal, the straw proposal. The broad  
13 scope of covered consumer products we think is appropriate.

14           There's an effort to close the data gaps by requiring  
15 publicly available information about a wide variety of  
16 ingredients in products.

17           And there's a focus on an alternatives assessment,  
18 which is intended to prompt manufacturers to really take a  
19 serious look at their products, what's in them, what the  
20 impacts on society are, and to think seriously about what  
21 they're doing and whether they can improve their products,  
22 and to minimize those impacts.

23           We think all those things are very appropriate.  
24 It's an ambitious task, but that's commensurate with the  
25 size of the task that really needs to be done. There's a

1 large number of existing products and existing chemicals in  
2 commerce that have not gone through any kind of analysis  
3 like this that needs to be dealt with. And we need to get  
4 our arms around it.

5 But it's not a permanent task. I think the  
6 ongoing going-forward task for the new products and new  
7 chemicals that are introduced into commerce each year is not  
8 going to be as difficult a process as getting our arms  
9 around the situation that we find ourselves in now.

10 So, on some more specifics that we think. Some  
11 things that we think need to be improved to make this  
12 structure work. One is that the regulation, the proposed  
13 regulation delegates to manufacturers responsibility for  
14 making what are essentially value judgments. Things like  
15 what is a significant impact, what is a significant risk.

16 I just think that these things cannot be left to  
17 the complete open-ended discretion of manufacturers. We  
18 heard a lot about this is the Green Ribbon Science Panel.  
19 There are value judgments here. What is important, what is  
20 the most important to society. And I think the DTSC and  
21 government has got to spell out what those terms mean.

22 And we have filed some comments with DTSC. We  
23 have the CHANGE Coalition, a lot of suggestions about what  
24 those tests ought to look like.

25 The second major point that we'd like to make is

1 that I think that the self-implementing nature of this  
2 proposal has a serious lack of oversight. Manufacturers are  
3 going to be doing the analyses and making decisions,  
4 themselves. There's no third party doing them. The  
5 oversight by DTSC is very ad hoc. They can do call-ins, but  
6 it's not a systematic overview. There's no regular approval  
7 by DTSC of decisions that are made.

8 I think the public oversight is intended, but  
9 we're very concerned that it will be defeated by excessive  
10 confidential business information claims. Lack of penalties  
11 and enforcement. And I think maybe those are intended to be  
12 in the bill, but they need to be specified.

13 So, this lack of oversight, you know, is a serious  
14 issue because the amount of discretion that's left to  
15 manufacturers, they will go through the paperwork of making  
16 decisions and looking at their products, and, you know,  
17 creating a paper record of what they've done, that DTSC  
18 could call in.

19 But the substance of discretion that is permitted,  
20 as those decisions are made, we're really afraid will just  
21 end up being justifications for how things are already being  
22 done. And that just turns into a giant paperwork exercise  
23 and justification of the current situation.

24 So, some people say the Toxic Substances Control  
25 Act, they call that the Toxic Substances Conversation Act.

1 We would hate for this to turn into the Toxic Substances  
2 Paperwork Act.

3           So, we're very concerned about the lack of  
4 oversight and the discretionary nature of the judgments that  
5 will be made.

6           Third point I want to make is burden of proof.  
7 It's unclear in a lot of places, but for the most part we  
8 fear it rests on government, where it currently is. And the  
9 reason is discretion, as I mentioned, -- now this is an  
10 issue, it's not about who does the work, the burden of proof  
11 is not about who does the work. It's about how uncertainty  
12 is handled.

13           And we believe that chemicals -- that  
14 manufacturers need to provide a body of data and demonstrate  
15 that chemicals are unlikely, not likely to have an impact on  
16 human health and the environment. So, there's going to be  
17 conflicting data. Pick any chemical you want, there's going  
18 to be different ways to look at the data.

19           When we talk about the burden of proof what we  
20 mean is how you deal with that uncertainty. Okay, it needs  
21 to be specified in the bill. And the burden of proof needs  
22 to rest on manufacturers.

23           Last point that I'll make is the no data, no  
24 market provision, which we, I think is critical. The entire  
25 concept of a sort of market-driven process where information

1 will be put into the market and downstream users will get  
2 information about how to -- about the chemicals that they're  
3 using to make their products, is critically dependent on  
4 substantial information about health and safety properties  
5 of products being made, publicly available, to the public,  
6 the users of chemicals, and also the downstream users.

7           There is what is trying to be, I think, a strong  
8 no data, no market provision in the bill, but it's, again,  
9 appears to be a lot of discretion about what information  
10 actually has to be provided. And I'm just very concerned  
11 that that won't work to actually produce information that  
12 will help this market-driven concept actually work.

13           So, I'll have other comments later, I think, but  
14 those are our main points I want to start with. Thank you.

15           MR. LIVINGSTON: I'm Gene Livingston and I have  
16 worked with a number of other people in industry with the  
17 Green Chemistry Alliance to develop, and we have developed  
18 an implementation regulation that we have submitted to the  
19 department, and I think it's on the department's website,  
20 where we've addressed many of the issues that are set out in  
21 AB-1879.

22           But I'd like to just say at the outset that I  
23 appreciate this approach, Janette, of having a panel  
24 discussion. There was a good deal of collaboration and  
25 cooperation between industry, the NGOs and the department,

1 and all of state government, in developing the legislation.

2 And it seems to me that we need to get back to that kind of  
3 working process in order to develop the regulations. And  
4 perhaps this panel is the first step in that effort.

5 I think it's important to point out that while I  
6 recognize there's a perception out there that manufacturers  
7 put products out into the marketplace with little or no  
8 concern about the impact on consumers and the environment,  
9 that's just totally not true.

10 You know, we're talking about green chemistry  
11 today because of the passage of AB-1879, but the truth of  
12 the matter is that business has been pursuing green chemistry  
13 program by pursuing sustainability principles for decades.  
14 And it's really business that has the experience and has  
15 demonstrated the ability to make the kinds of changes.

16 They compete in the marketplace for developing  
17 products that provide a social benefit; that make life  
18 easier, more convenient, safer and more healthy for  
19 consumers. They seek ways to compete in the green arena, as  
20 well.

21 So, I think that when I look at AB-1879 and think  
22 about an implementation regulation, it seems to me that the  
23 first principle is that we should begin by codifying the  
24 best practices that we see in the business community today.

25 The second thing is that green chemistry should be

1 implemented to avoid undermining product efficacy,  
2 performance, and usability. It should be implemented in a  
3 way to encourage innovation and not to stifle innovation.

4 Obviously the program has got to be workable and  
5 realistic. And a program that seeks to eliminate all  
6 chemicals from society is neither workable nor realistic.  
7 And program that seeks to cover every product and every  
8 hazard at once is neither workable nor realistic.

9 It also seems that a green chemistry program, to  
10 be workable and realistic, ought to focus on chronic  
11 hazards, things that people are not aware of. If someone  
12 experiences a skin rash from a product, the solution is  
13 simple. You throw the damn thing away, and you just don't  
14 buy it again. But that's not the kind of outcome, the kind  
15 of hazard that green chemistry ought to be focusing on.

16 Also, a workable program should prioritize those  
17 chemicals, and taking into account the exposure that results  
18 from the use of that chemical in a product, and the priority  
19 should be given to those exposures that occur and potential  
20 adverse effect on vulnerable populations.

21 And then time and experience demonstrates that we  
22 need to expand the hazards, the chemicals, the products,  
23 then the regulation can be amended. But we have to begin in  
24 a realistic and workable manner.

25 And a green chemistry program should encourage

1 incremental progress. Dramatic breakthroughs are rare in  
2 all aspects of life. Hence, the regulation should promote  
3 and expect incremental, but continuous, progress.

4           Peggy said 20 years. We want it done in less time  
5 than that. The truth of the matter is that green chemistry  
6 is now and forever, you know. This is not something we're  
7 going to get done tomorrow or the day after tomorrow. We're  
8 going to be pursuing this for as long as there are products.

9           The alternatives assessments should be  
10 realistically required. They should be required to address  
11 real risk, not just concerns or possible risk. Also,  
12 there's no need to require repetitive assessments if no new  
13 developments have been made in a particular area.

14           A green chemistry program should subject  
15 alternatives to as rigorous an evaluation process as the  
16 products that are -- the current products and the chemicals  
17 that are used in those products today. We don't want to  
18 replace a well characterized risk with an unknown risk.

19           And finally, government has a role. We understand  
20 that there are limited resources, but as Joe indicated, and  
21 I think we would agree, there's clearly a role for  
22 government in this.

23           It should pursue the goals of promoting the best  
24 practices; focusing on the most significant risk, on  
25 encouraging continuous improvement. And on insuring that

1 there is compliance. And that aspect is important, not just  
2 to benefit consumers and society, but also to provide a  
3 level competitive playing field for businesses within a  
4 particular industry.

5 So those are the principles that I think should  
6 guide the green chemistry program.

7 MS. SALTER: Great. Well, thank you. I think  
8 I'll echo a lot of Joe's comments, so I'll try to make my  
9 comments a little bit different here. But at the outset I'd  
10 like to say that we're at a critical moment here, and I  
11 think everybody realizes that.

12 We have the chance to either be the model for the  
13 nation or the object lesson for the nation. And that was a  
14 comment I heard somebody say yesterday, and I want to repeat  
15 that, that we either have a moment to be hailed as doing  
16 something really great and evolutionary, or we'll be  
17 ridiculed by saying, oh, my gosh, don't go there. And I  
18 think all of us here want to make sure that we are the model  
19 for the nation.

20 I think we also need to remember that despite the  
21 serious economic crisis that the state finds itself in, that  
22 we need to be looking to the future and building a program  
23 that actually will stand the test of time, and not just  
24 response to the current crisis that the state happens to be  
25 in.

1           So I do appreciate the fact that the DTSC reg  
2 writing team has put pen to paper here. I think it's an  
3 incredibly difficult task to do. And in all of our  
4 stakeholder meetings that we've had through the, I don't  
5 know how many years that it's been now, I think we've all  
6 realized that it is very difficult. And so I really do want  
7 to compliment you and appreciate the work that you have  
8 done. And really do say that -- I've said this a number of  
9 times, I wouldn't want your job. So, thank you for doing  
10 that.

11           The other thing I would say, also, is that you  
12 have created an ambitious program and I think that's a good  
13 thing. You know, casting a broad net is good. I think Joe  
14 said it very well when he said there is a lot of work to be  
15 done.

16           We have gotten to a point where consumers don't  
17 trust that their products are safe, where cancer is on the  
18 rise, where a number of chronic diseases are on the rise.  
19 And a lot of them have been linked to toxic exposure.

20           So we're at a moment here where we have a  
21 momentous task in front of us. But we just need to figure  
22 out the best way to do that.

23           So, as Joe talked about the front end of the  
24 proposal, I'm going to talk a little bit about the back end,  
25 and then just talk briefly about some of the issues, those

1 in the good and bad, that I see with the prioritization and  
2 alternatives assessment, response action, and finally the  
3 waiver process.

4           So, on the prioritization, I think it's good that  
5 it's tied to exposure, that you prioritize the chemicals  
6 based on how we're exposed to them. I think that's a  
7 necessary way to prioritize.

8           I think a couple things that are missing, that are  
9 actually spelled out in the statute, is exposure to  
10 sensitive subpopulations and the volume in commerce. I  
11 didn't see that as part of the prioritization scheme, and if  
12 I'm wrong, please let me know.

13           But I think some of the issues of the  
14 prioritization scheme again, is that it's entirely up to  
15 manufacturers to decide how this exposure happens. There's  
16 a lot of discretion here, and it seems to me that, again,  
17 like Joe said, this is a way to perhaps justify the status  
18 quo.

19           A classic example of this is brominated flame  
20 retardants where for a number of years we didn't think flame  
21 retardants were getting into household dust, and lo and  
22 behold, they actually were. Where would they have fallen on  
23 this prioritization scheme?

24           Also I think that's something that's a little  
25 challenging about prioritization, as well, is that it's not

1 only tied to action or to when an alternatives assessment  
2 will occur, but also it's tied to the response action.

3           So you're getting into kind of a containment  
4 strategy, which is what got us here in the first place. I  
5 think Peggy's comment earlier about being reasonably  
6 anticipated to be released in the environment, I think  
7 that's a good way to think about how you're going to  
8 prioritize for action, but perhaps not for the regulatory  
9 response.

10           And the reason I say this, is on the DTSC's walls,  
11 all the art work has pictures of chemical accidents and  
12 clean-up sites. And those were not reasonably anticipated  
13 releases, but they still happened.

14           Moving on to the alternatives assessment, again,  
15 and I'm going to differ with Gene here, in that I like the  
16 way that there's a mechanism for continuous improvement and  
17 for constantly looking at alternatives. I think it's a good  
18 thing that manufacturers have to repeat the alternatives  
19 assessment if there's no alternative there.

20           But, again, I think, to repeat what Joe said, and  
21 I think what a lot of us in the NGO community feel, that  
22 there is a lot of discretion left up to manufacturers. And  
23 it feels as though DTSC has abdicated a lot of these  
24 judgment calls to industry.

25           And it's just fundamentally unfair to both the

1 public and to industry to think and make them make decisions  
2 against their own interests in favor of public health.

3           And I do realize that, you know, some  
4 manufacturers, and perhaps many manufacturers make those  
5 calls all the time, and do a good job at it. But  
6 unfortunately, regulations and laws need to be to the lowest  
7 common denominator, not to the best manufacturer. That's  
8 why we have laws.

9           The idea of a tiered assessment, which is  
10 something that the Green Ribbon Science Panel talked a lot  
11 about at the last meeting and the meeting before that, I  
12 think is one that DTSC should be pursuing. There are  
13 certain chemicals that, you know, we, in the NGO community,  
14 feel need to be on the fast track. For instance, some  
15 bioaccumulative toxins, very consistent, very  
16 bioaccumulative chemicals. They need to be fast-tracked  
17 because they are chemicals that will not go away.

18           And lastly, it appears as though calls for  
19 oversight by a third party, by a neutral third party, on  
20 these alternatives assessments hasn't been heeded. And I  
21 think that that's a critical error in this proposal. And  
22 needs to be addressed.

23           On response actions, you know, when we came  
24 together on 1879 or our work on 1879, I realized that it was  
25 a rush job. But I think many of us in the NGO community had

1 a vision of what this was going to look like. And we called  
2 them regulatory responses because they were going to be  
3 responses made by regulators.

4 We never used the term response action, thinking  
5 that industry would decide what regulatory response they  
6 would put on themselves. These are decisions that need to  
7 be left up to government. Again, it is unfair to both the  
8 public and to industry to think that they can do this.

9 And as part of the regulatory response also there  
10 needs to be standards and guidance on how to weight  
11 decisions, and how decisions are going to be weighed and are  
12 going to be made. The standards really aren't in the  
13 proposal, and they need to be there.

14 The last thing I'll just talk a little about the  
15 waiver or variance process, which is at the end of the  
16 proposal. I think that this is probably one of these most  
17 problematic parts of the entire proposal, in that it inserts  
18 a real-space paradigm into what is essentially a hazard-  
19 based statute.

20 It allows manufacturers to apply for a waiver  
21 based on no significant impact, although not significant  
22 impact has been defined on MADLs and no significant risk  
23 level. And that was not at all part of the 1879 statute.  
24 And so I'd urge DTSC to go back and reconsider that waiver  
25 process.

1           Secondly, I think it's problematic because I  
2 think, as many folks in the industry have stated, that the  
3 department will likely be overloaded with requests. And I  
4 think it's going to be more than the department can handle.

5           Lastly, I'll just say, and I realize I've said  
6 lastly three times, now, I apologize. I really am wrapping  
7 it up this time.

8           The need for transparency in a process like this  
9 cannot be overstated. The idea that alternatives  
10 assessments are going to be -- you may click on a website of  
11 the manufacturer's choosing, is not going to give confidence  
12 to consumers or to those of us in the NGO community that  
13 this is a transparent process.

14           There needs to be a centralized place where this  
15 information can be made available to the public so that the  
16 public can review what these assessments look like. And so  
17 that there can be better oversight on this process.

18           So, I'll go ahead and wrap it up there. Thanks.

19           MR. GREGGS: Well, good morning. I'm Bill Greggs  
20 and I'm representing the Grocery Manufacturers Association,  
21 and also the Green Chemistry Alliance.

22           Now GMA and the Alliance have supported the Green  
23 Chemistry Initiative, and we supported the passage of 1879  
24 and 509. In the next few minutes I want to talk about some  
25 ideas we have on implementation of these laws in helping

1 creating a workable and successful green chemistry program.

2 I like Gretchen's idea about a model for the  
3 nation. I think we're thinking that same way. And so, you  
4 know, let's figure out how to do that.

5 As we heard from the Green Ribbon Panel, the  
6 current straw proposal will not accomplish that goal. It's  
7 breathtakingly expansive in scope. It has no meaningful  
8 prioritization, and would be impossible for any company to  
9 comply.

10 If implemented I think it will collapse under its  
11 own weight with no compliance and no green chemistry  
12 innovation. Our Associations and our company members have  
13 no interest in such a failure.

14 Briefly, it would encompass hundreds of thousands  
15 of products. It would also encompass 10,000 chemicals, 8000  
16 from the reference lists and an estimated additional 2000 in  
17 the hazard trait pathway.

18 Since it doesn't focus on chemical ingredients,  
19 any detectable level of any of these 10,000 chemicals in a  
20 product will trigger what is a massive alternative and  
21 lifecycle assessment, and an extremely burdensome supply  
22 chain communication effort.

23 The identification assessment must be completed in two  
24 years. Every detected chemical, if not eliminated within  
25 certain timeframes, triggers a ban from California commerce

1 of all the products using the chemical, and the chemical,  
2 itself.

3           Meanwhile, DTSC has no apparent significant role  
4 in what will be tsunami for virtually every product sold in  
5 California, from toy trains to jet planes, and everything in  
6 between. The public, California consumers, have no apparent  
7 role, either.

8           Now, this straw proposal, I think, is trying to do  
9 40 years of green chemistry in two years, to try to make  
10 that happen in two years. Now, that's an admirable intent,  
11 but I don't think it will work, and that would really be a  
12 shame.

13           You know, it's a signal of very serious trouble  
14 when the European Union says that a program is not feasible.  
15 And that's what we heard at the panel.

16           Now, we support this program and we want to see it  
17 succeed, so let's start with the 40-year goal in mind, but  
18 for this first cycle let's also focus on scope and  
19 prioritize. Let's generate important successes we can build  
20 on for future cycles.

21           I want to quickly cover some ideas we have on how  
22 to do that. These are not final answers, but places for  
23 starting the conversation.

24           Broadly, we agree it makes sense to have a  
25 chemical pathway and to have a product pathway and to have

1 them converge and really focus the program.

2 On products we need to have much more tightly  
3 focused categories. And we need to drop the three catch-  
4 alls, the anticipated to release, the any products  
5 containing and the any list of chemicals categories.

6 On chemicals we need to establish focused  
7 selection criteria and a known set of selected -- end up  
8 with a known set of selected chemicals.

9 For the initial cycle, let's start with category  
10 one chemicals, the ones that we all agree are problematic,  
11 known and presumed CMRs and chemicals that are persistent,  
12 bioaccumulative and toxic.

13 And we shouldn't waste the state's limited  
14 resources on regulated chemicals or products. The statute  
15 says don't duplicate regulation. Why open the department up  
16 to wasteful legal challenges.

17 Then we need to stringently prioritize. First  
18 DTSC needs to select 25 to 50 high priority chemicals for  
19 this first cycle, using the criteria that I previously  
20 described. If only half of those selections come to  
21 successful resolution, that will be twice as much success  
22 here in California as anywhere else on the globe.

23 Second, we need to focus on chemical ingredients  
24 in products, not every detectable chemical. The most  
25 meaningful health and environmental benefits will be

1 achieved by targeting intention addition, not chasing  
2 insignificant traces.

3 We also need to add an evaluation step at the  
4 front end. REACH has an evaluation step, why not California  
5 green chemistry? The evaluation should look at the  
6 likelihood of harm. It would screen out low concerns and  
7 focus on real threats to health and the environment.

8 Then there are the issues of authority,  
9 communication, transparency and stakeholder involvement.  
10 Now, I always thought that Cal-EPA and DTSC was the  
11 regulator in this case. I don't think that the supply chain  
12 has any chance of filling the enforcement role, and it's not  
13 really proper to assign that to them.

14 We think that product evaluations and work plans  
15 for manufacturers should be submitted to the DTSC. We also  
16 think there should be an opportunity for stakeholder comment  
17 on the evaluations and work plans. This needs to include  
18 appropriate CBI provisions as mandated in the statute.

19 Next we need a practical and workable approach to  
20 lifecycle assessments. Now, I really don't think the  
21 alternative analysis is an expertise area for DTSC, or for  
22 most of us in this room. We think the department should  
23 workshop alternatives assessment with experienced experts to  
24 determine successful elements and what doesn't work.

25 Alternative assessment response plans should also

1 be things that are submitted to DTSC. And, again, there  
2 should be an opportunity for stakeholder involvement.

3 Finally, we think a strong dose of reality to make  
4 the timelines and response actions feasible. And calibrated  
5 to the likelihood of harm.

6 So those are some of the ideas on how to get the  
7 first cycle program on a success track. It will enable, we  
8 think, both large and small companies not only to comply,  
9 but to innovate on green chemistry.

10 There are probably other good ideas out there, and  
11 there are a lot of details to work out to make this a  
12 feasible program. The Green Chemistry Alliance is prepared  
13 to work together with the department and other stakeholders  
14 to make this a real and long-lasting success.

15 MS. SARTAIN: Thank you, panel, for those very  
16 thoughtful statements. We would like to open up the  
17 discussion now for discussion between the four of you, and  
18 hopefully at some point, also have some time to field a  
19 couple of questions for you.

20 Would any of you consider volunteering to begin?  
21 Do you have anything that you've heard that you would like  
22 to respond to?

23 MR. LIVINGSTON: There was something you said,  
24 Gretchen, that I felt a particular need to respond to. You  
25 talked about how you can't expect business to put its

1 interest against the interest of public health.

2 And that is just so far removed from the way  
3 business formulates products. We have to take into account  
4 the public health. I mean if for no other reason other than  
5 the potential liability, we would take that into account.  
6 But people are not going to buy products if it causes  
7 problems for them.

8 And so I know that there is a fair amount of  
9 suspicion about how business develops and markets their  
10 products. But that's not an appropriate one.

11 And, you know, I think what I envision, at least  
12 in the green chemistry, is that there is a lot of good  
13 things going on today. We need to take that, perhaps  
14 expedite it a little bit, and expand it. But it's not to  
15 address people who are acting without regard to the public  
16 health or the environment.

17 MS. SALTER: And, thank you, I appreciate the  
18 opportunity to kind of clarify what I really meant there.  
19 And it isn't the role of industry to -- it's not the sole  
20 role of industry to protect public health. That is not, has  
21 not been your charge.

22 And I completely agree that there are many  
23 manufacturers out there who do, you know, who do the right  
24 thing, who do the necessary due diligence. And if, for no  
25 other reason, than liability.

1           But what I also said, and I think it's really  
2 important that we keep this in mind, is that we're not  
3 building a program for the best companies out there, and for  
4 the companies that are doing the right thing. And that's  
5 not why we make laws. That's not why we wrote these  
6 regulations.

7           We're writing them because something is going on  
8 in the marketplace where you have babies being born with  
9 toxic chemicals in umbilical cord blood. And that is not  
10 the fault of any one industry. That is not the fault of,  
11 you know, of the public at all.

12           But this is a system that has broken, and that has  
13 left a lot of these decisions up to industry. And it's  
14 unrealistic to think that industry can do that.

15           I mean the other thing that I think is important  
16 to recognize is that if one manufacturer is making a  
17 decision based on their particular product, how are they  
18 supposed to know how that particular chemical is used in a  
19 variety of products, and how a person's exposed in a variety  
20 of situations, and how those mixtures come together.

21           That's why we have government. That's why we  
22 have, you know, people who our tax dollars pay to protect  
23 public health. Because they can take a look at the big  
24 picture.

25           I think it's fundamentally unfair to make industry

1 look at the entire big picture and know every single  
2 exposure that could happen, because I just don't think you  
3 guys are equipped to do that. And I don't think that's  
4 fundamentally your job.

5 MR. LIVINGSTON: Another issue. I wanted to just  
6 raise the issue of I think you said that this is a hazard-  
7 based program and not risk-based. And yet when you look at  
8 1879 it talks about exposure, and particularly exposures to  
9 vulnerable populations.

10 So it seems to me that in the prioritization  
11 process risk is a factor that has to be taken into account.

12 MS. SALTER: And I do think that is appropriate  
13 that -- and I think I said this in my comments, and maybe I  
14 didn't say it as clearly as I needed to, and I apologize,  
15 that it is appropriate to take into account exposure when  
16 you are prioritizing chemicals. And that is that it's very  
17 very appropriate.

18 I think the problem, inserting a risk-based  
19 paradigm into essentially a hazard-based statute is in the  
20 waiver process. And particularly I think it's B-1 that  
21 talks about no significant risk levels are below maximum  
22 allowable daily limits. And without taking into account  
23 cumulative exposures, the risks of low-dose exposures,  
24 multiple different exposures.

25 I think those are things that the entire reason

1 that the Green Chemistry Initiative was created was to  
2 address the fact that we are exposed to many different  
3 chemicals from many different sources. And that sometimes  
4 these MADLs don't adequately take that into account.

5 And so inserting that kind of paradigm that has  
6 really kind of -- that has really failed us, into a program  
7 like this that is essentially trying to do something new, it  
8 a step backwards in my opinion.

9 MR. LIVINGSTON: So it would make more sense, at  
10 least to me, and perhaps to you, that it would be part of  
11 the prioritization process, rather than sort of a variance  
12 process. It would be something you'd look at upfront.

13 MS. SALTER: Well, I mean I do think looking at  
14 exposure upfront is important, but I also think it's  
15 important that it's not a risk-based criteria. So, in  
16 effect, saying, oh, we use this chemical, but it's such a  
17 small amount that it's okay, and we don't have to go through  
18 the process.

19 I think that's not what I'm talking about when I  
20 talk about a risk-based exposure scenario. But rather, are  
21 people exposed through, you know, through use of the  
22 product. Is this, you know, for example, a cleaning product  
23 that's intended to be released in your home.

24 Are there other thoughts about this?

25 MR. GUTH: Yeah, I have some sympathy with the

1 idea of a sort of de minimis sort of, you know, way of  
2 prioritizing. However, exactly how that would be  
3 structured, I mean we'd really have to think about. Because  
4 some chemical, in very small volumes, are problematic.  
5 There are a lot of chemicals we have no information about,  
6 and they're in small quantities.

7           So, I mean I think we really have to have some  
8 concern about that. Although, there are a lot of issues  
9 about prioritization that we really have to face here,  
10 particularly for the, you know, alternatives analysis. And  
11 I think we need to -- that could be one element of a  
12 prioritization process.

13           But, again, I would look at it as prioritization  
14 rather than just complete exemptions.

15           MR. LIVINGSTON: If I could -- did you want to  
16 add?

17           MR. GREGGS: Yeah, I'd just like to sort of, you  
18 know, a thought about the aggregate exposure kind of  
19 concept. I mean I think that could be part of the process  
20 or should be part of the process of that upfront evaluation.

21           I mean we've done some of these, and a number of  
22 those are public through the OECD HPV program, you know.  
23 And our experience with those has been that when you try to  
24 encompass all of the exposure, different exposure pathways  
25 and sources, both direct from the initial product exposure,

1 and then others, in all of the examples that I've looked at,  
2 it comes back to some small number, which are the dominant  
3 exposures that are the dominant pathways.

4 I meant that's not to discount that there's some  
5 little piece of something, a molecule coming from here or  
6 there or the other thing. But that's kind of the  
7 experience.

8 Now, I think we need to make those public. I  
9 agree with Joe's point about there's questions of  
10 uncertainty. And so, you know, let's put those, you know,  
11 evaluations out in the public domain, you know, and have the  
12 kind of comment back and forth about, you know, where the  
13 right choice is made relative to exposure. Have we looked  
14 at bands of uncertainty and those kinds of things.

15 But that's sort of a thought at least about  
16 looking at the multiple exposures.

17 MS. SALTER: And if I could add on -- I'm sorry,  
18 Joe, I know you wanted to ask a quick question -- but if I  
19 could add onto that because you reminded me of something  
20 that I think is critically missing in this, and that is  
21 information about ingredients that are in products.

22 And it's going to be very difficult, I think, to  
23 prioritize what are the highest exposures. I mean we have  
24 certain proxy for exposures certainly with, you know, high-  
25 production volume chemicals that may be found on

1 biomonitoring data. There are problems with each of those  
2 approaches. Certainly with biomonitoring you only find what  
3 you look for. And in HPD chemicals it's a proxy for  
4 exposure, but it may not be great.

5 And so I think one of the steps that's missing  
6 here is manufacturers submitting ingredient information so  
7 we can see exactly what's in products. And there could be  
8 some surprises out there that we just don't know. There  
9 could be chemicals that are being used in many different  
10 products that, you know, we all just did not know about.  
11 And that we would never have even thought to prioritize.

12 So I think that's part of the prioritization  
13 scheme that needs to be in this proposal.

14 MR. LIVINGSTON: I'd like to respond to that. As  
15 you know, we worked last year on a piece of legislation here  
16 in the California Legislature to address that on behalf of a  
17 number of product categories.

18 And it's easy to agree with you on the general  
19 concept, because what happens is if people know what's in  
20 the product then the marketplace will bring about a green  
21 chemistry program probably faster than DTSC or any of us.

22 The problem, of course, and it's a trite phrase,  
23 the devil's in the details. And you get into the issues  
24 about what gets disclosed, how does it get disclosed.

25 And then there is this whole issue that you raised

1 earlier about the confidential business information. And  
2 business is concerned, and legitimately concerned, about  
3 knock-off products, people capturing their R&D, where they  
4 spent millions of dollars developing a product.

5 And so if there's a way to protect that and still  
6 maximize, if you will, the ingredient disclosures, I think  
7 that -- I agree with you, I think that goes a long way  
8 toward enhancing any kind of a green chemistry program.

9 MR. GUTH: Well, that really gets to the question  
10 that I wanted to raise and ask about. It was about the  
11 confidential business information question.

12 I think under the Toxic Substances Control Act,  
13 hazard information is not meant to be kept confidential.  
14 And it's true that you can get hazard information through  
15 Freedom of Information Act requests of EPA. You can get a  
16 document that shows a hazard study of a chemical. But the  
17 identity of the chemical is masked. So you can't tell what  
18 chemical you're talking about.

19 So, you know, from the public's point of view, and  
20 I think in many cases governments, we don't know what's in  
21 products and we don't know what the properties are of most  
22 of those ingredients. And every government agency has  
23 looked at this, GAO, the Europeans; UC Berkeley studies  
24 finds there are very extensive, even massive data gaps.

25 And I think they're talking about not just what

1 the public knows, but actually what is known at all.

2 Because there are obligations where industry, under various  
3 circumstances, turn over information that they have.

4 And so from that point of view it's very difficult  
5 to have confidence in claims that products are safe, we're  
6 on top of this, we're studying it, we're very concerned  
7 about public health and the environment. Because there's  
8 just really no means whatsoever of any kind of oversight.

9 So, I understand, there are strong commercial  
10 reasons for companies that claim CBI. And I think that they  
11 will, if they can. Because it's a competitive world out  
12 there; they're trying to survive. They put a lot of R&D  
13 into developing products that can be copied, you know.

14 So I think, if a company can, it's going to claim  
15 CBI. That would be my advice to a company.

16 But if that is what happens, no regulation is  
17 going to work. This regulation isn't going to work, no  
18 regulation is going to work.

19 And, I'm sorry, this is a question, actually.

20 (Laughter.)

21 MR. GUTH: One of industry's reasons for being  
22 interested in chemical policy reform is that they're  
23 concerned that consumers have lost confidence in their  
24 products.

25 And so my question is, you know, on balance where

1 do you think industry is going to come out on this? I mean,  
2 to get the kind of program we're looking for and the  
3 public's looking for, they're going to have to give  
4 substantially on the CBI claim.

5 MR. GREGGS: Joe, a couple of thoughts I've got on  
6 this. One, I don't think this issue is sort of a black-and-  
7 white, let's-claim-everything CBI. Let's, you know, make  
8 everything public.

9 And so relative to this process I think we  
10 probably ought to have an extended discussion with maybe  
11 people who are experts. I'm not a big expert in the CBI  
12 area. So that's sort of one piece of thought on that.

13 I think we ought to be able to come to some way  
14 about how to make that workable, to protect some things that  
15 are truly proprietary, but on the other hand to make public  
16 those kinds of things, particularly for some high-priority  
17 chemicals that have been identified in this program, to make  
18 that -- find ways to make that more public. So that's sort  
19 of one piece.

20 On the hazard information, let me talk about that.  
21 I didn't have time to include that in my thoughts, but, you  
22 know, the idea for the toxics clearinghouse, you know, I  
23 thought that started with an idea of let's look at where the  
24 information is on that, and let's assemble that within the  
25 toxics information clearinghouse.

1           And in the straw proposal there's, you know, and I  
2 hate to be cynical, but it's sort of like a garbage can  
3 proposal, with everybody pitching in. You know, we're not  
4 going to have synthesized, very well synthesized or very  
5 scientific information. I think we're going to just have a  
6 pile of stuff.

7           And I think we need to find a more workable way to  
8 do that. There's probably, again, a lot of ideas about  
9 that. But, you know, -- but one thought that I've got, I  
10 was taking a look the other day at the REACH pre-  
11 registration list. And, you know, REACH has had pre-  
12 registration. That was completed last year.

13           And what I did was I took a look at the pre-  
14 registered substances in REACH. It turns out that over 90  
15 percent of what was submitted in 2006 by U.S. industry to  
16 the U.S. inventory update rule, over 90 percent of those  
17 chemicals are pre-registered in REACH.

18           Well, no surprise, you know. We've got a global  
19 commerce system and so it's not surprising that the vast  
20 majority are pre-registered.

21           The other important point is over 85 percent of  
22 those chemicals are targeted -- I'm sorry, over 80 percent  
23 of those substances are targeted to be submitted in November  
24 2010.

25           So, you know, within REACH we're going to have a

1 real treasure-lode within -- before these regulations are  
2 scheduled to be completed, at the end of that same year.  
3 We've got a real treasure trove.

4           And so I think maybe the idea of going back to  
5 let's look at the databases and chemical sources of chemical  
6 information that are out there. Let's bring those in. And  
7 then, you know, let's see where we are.

8           MS. SARTAIN: Panel? This would be a good time to  
9 find out if there are any questions or comments on what  
10 you've been discussing, from the room. Do we have anybody  
11 who would be interested in either directing a question or  
12 comment to one of our panelists? Or discussing what they've  
13 been talking about?

14           If so, please raise your hand. We'll bring the  
15 mic to you. Okay, we have mics in the room. Also please do  
16 let us know. Is there anybody who would like to speak?

17           Great. Comment cards, we have those, as well.  
18 Well, if there are no questions -- okay.

19           (Laughter.)

20           MS. PORTER: Hello. My name is Catherine Porter;  
21 I am with the California Healthy Nail Salon Collaborative.  
22 And a member of CHANGE.

23           And this question is for Gene Livingston. Mr.  
24 Livingston, you mentioned that you'd like to see best  
25 practices of manufacturers codified. And I was curious what

1 best practices you're talking about.

2 MR. LIVINGSTON: Well, there are a number of  
3 things that companies have done over the years. And I think  
4 the department has, in many instances, reached out to a lot  
5 of those manufacturers in order to gather information about  
6 how to set up a green chemistry program.

7 But those best practices extend to the selection  
8 of the raw materials, taking into account how those  
9 materials are produced. Taking into account transportation;  
10 taking into account the energy use, water use; as well as  
11 the impact on human health and the impact on the  
12 environment. And obviously the efficacy of the product.

13 And so there's a constant search for ways to improve  
14 those factors.

15 And candidly, a lot of those sustainability  
16 principles are driven by cost. If we can reduce energy  
17 costs, then we can provide the product at a less expensive  
18 price to consumers. But that has an impact on the lifecycle  
19 analysis and results in a better product.

20 And so one of the things that business struggles  
21 with is values. You know, you might reduce your energy cost  
22 or your transportation use that reduces greenhouse gases.  
23 You know, does that have value in the green chemistry  
24 program here?

25 And when you look at it, it seems to be focused on

1 the toxicity of chemicals. And although in the lifecycle  
2 analysis you've got to look at all of those aspects.

3 MS. PORTER: I'd just like to do a follow-up. I  
4 guess I should have been more specific with my question.  
5 Because what we're talking about here today is the danger of  
6 toxicity of products and ingredients.

7 And so I was curious about what specific best  
8 practices you were thinking about that manufacturers have  
9 already implemented that could be codified, the relation to  
10 toxic ingredients in products.

11 MR. LIVINGSTON: Okay, well, the toxicity of  
12 ingredients in many products have been reduced over the  
13 years. You don't have to go back too many years to find  
14 products that were on the market decades ago that are no  
15 longer there. There's been complete reformulations as  
16 business has sought to reduce the toxicity and has succeeded  
17 in reducing the toxicity.

18 MR. GREGGS: I'd like to do a follow-up on that.  
19 You know, a lot of that information is -- innovation,  
20 rather, isn't just, oh, let's drop chemical A and put in  
21 chemical B.

22 Products today are very sophisticated. A lot of  
23 interaction between things. And so a lot of that innovation  
24 also comes from the invention of new chemistry. And, you  
25 know, that's a big part of what this green chemistry program

1 is about, I think, is not just finding things that are lower  
2 down the toxicity level, but new chemicals that are out  
3 there that provide all of the same or more efficacy, at the  
4 same or better -- with the same or better safety profile.

5 MS. SALTER: Can I ask a follow-up? Is that  
6 allowed. So, you know, DTSC has its pollution prevention  
7 program. And part of this is to set up, you know, voluntary  
8 systems to reduce the, you know, reduce pollution and reduce  
9 toxicity. But those are still voluntary efforts.

10 So I guess the question of both of you is the  
11 voluntary efforts that the P2 program has been able to put  
12 out there, is that something that you think should be  
13 codified, as well?

14 MR. LIVINGSTON: I don't know that I can answer  
15 that.

16 MR. GREGGS: I'm not familiar.

17 MR. LIVINGSTON: Yeah.

18 MS. SALTER: Okay.

19 MR. GUTH: I think one of the reasons that we're  
20 all here and talking about this in terms of green chemistry  
21 is there is a sense that there's a lot of room for  
22 technological improvement.

23 The work John Warner has done, you know, he's put  
24 a whole program in place. But, I mean, that is a program  
25 that is newly emerging. I don't think it's fair to say that

1 the green chemistry, as it's been conceived in the last, you  
2 know, five or ten years by the leading proponents of this  
3 has been implemented industrywide.

4 I think the industry is, it's fair to say that  
5 it's very innovative on certain levels, on the level of  
6 specialty chemicals, but on the broad scale level of  
7 chemicals, I'm not so sure.

8 One of the systems that EPA uses is that for the  
9 high-production volume chemicals, which is chemicals made in  
10 about a million pounds a year or more, 92 percent of the  
11 current high production chemicals were on the market 30  
12 years ago.

13 So these are large chemicals that have found their  
14 way into commerce. They're very efficiently manufactured,  
15 and there's a lot of innovation in how they're used. But  
16 this is not a rapid turnover, you know, of continually  
17 improving the chemical profile in the industry.

18 But there's a lot of room for hope that that can  
19 change. And I think that's why we're here.

20 MS. SARTAIN: I believe that there may be a  
21 question in the back.

22 MR. JACOB: Tom Jacob from DuPont. And I guess  
23 I'd just like to make a comment on the CBI issue. And then  
24 frame a question back to Joe.

25 I believe that's an extremely critical one. And

1 if you take kind of an evolutionary view of the  
2 environmental movement from its initial kind of dominant  
3 focus on waste and emissions from specific facilities, and  
4 it's migrated downstream. And with that migration you get  
5 into jurisdictional challenges for governments that can't  
6 necessarily control product flows. You get into much more  
7 complexity in terms of products.

8           And my experience has been, when I tried to  
9 discuss CBI within my company, for example, within my  
10 businesses immediately what it just screams is competitors.

11       And they can't see beyond that.

12           When I discuss it with you or with Bill, you know,  
13 what I see is barriers to safety information, or hazard  
14 information that may be relevant to safety. And I just  
15 believe we have to find a new way of kind of thinking and  
16 dealing with this.

17           And I'm tempted by some of the discussion to think  
18 it is viewed as either black or white. You either claim it  
19 or not claim it. There's criteria.

20           But, I guess the question is, what's the role for  
21 the regulator in arbitrating this? You know, the system  
22 does depend currently on the regulator playing a role in  
23 making some degree of judgment. And I guess I'd like your  
24 thoughts as to whether some modification in that role might  
25 be helpful in increasing the confidence with respect to

1 whether there's appropriate discrimination being made.

2 MR. GUTH: Well, I appreciate that question, Tom.

3 It is a complicated area, but I think that the box we're in  
4 now really doesn't work for a lot of reasons.

5 There's no oversight, there's no reason for  
6 confidence in products. It's hard to have confidence in  
7 manufacturers' claims that they're on top of the situation.

8 So it's not serving anybody from manufacturers to the  
9 society.

10 There are some other models. For example, in  
11 pharmaceuticals. The pharmaceutical industry has to  
12 disclose the content of all their products. Okay. And they  
13 wouldn't if they didn't have to. But they do because the  
14 law requires it.

15 And that allows doctors, patients, everybody to  
16 know what's actually in the drugs that they're using. And  
17 it just has to be done. Right.

18 So, there's a balance that's been struck by  
19 government in balancing those interests. And they decided  
20 that the public health concern, knowing what the ingredients  
21 in pharmaceuticals are outweighs the competitive interests,  
22 which are identical for the pharmaceutical industry as they  
23 are for the chemical industry.

24 Now, there are other aspects of pharmaceutical  
25 laws that do help pharmaceutical companies. For example, --

1 and it might be applicable here in some ways. Which is that  
2 a lot of pharmaceuticals are patented, which helps. And  
3 that may be possible here. It may be more difficult.

4 But another provision is there's a data protection  
5 act. Pharmaceutical companies submit a vast amount of data  
6 to the FDA in the process of getting approval. And that  
7 data, itself, is required to get approved. And a  
8 competitor, a generic, cannot use that data for a certain  
9 period of time, I think it's seven years.

10 So, they may generate their own data, if they want  
11 to submit a drug application if there's no patent issue, for  
12 example. But it's expensive to do that. They basically  
13 have to do a development, and generics don't do that. They  
14 copy chemicals. They're not in the R&D business. So, those  
15 data protection provisions end up being substantial barriers  
16 to competitors.

17 Now, it's not out of the realm of possibility to  
18 imagine here that there's substantial data requirements in  
19 the law, as I talk about things that need to be made more  
20 concrete. But you can imagine the company that submits that  
21 data is the only one that's allowed to use it for going  
22 through this process. So that competitors have to generate  
23 their own, for example.

24 So this is just an idea I'm throwing out there.  
25 But I think that, you know, -- and I think this would be

1 fruitful here for actually industry to come forward with, in  
2 a creative way, to think of some ways that they could have  
3 interests satisfied by other than nondisclosure of the  
4 information.

5 MR. LIVINGSTON: Let me respond to that, just add  
6 onto the comment that I made earlier. The Consumer  
7 Specialty Product Association and the Soap and Detergent  
8 Association members have launched a voluntary ingredient  
9 communication program. And that will begin January 1st next  
10 year, where there will be substantial disclosure of the  
11 ingredients.

12 And so I think that experience will probably help  
13 inform other ingredient disclosure for other products. And  
14 so I would invite both of you to take a look at that and see  
15 how that program is working. That's being launched in both  
16 the United States and in Canada.

17 The other aspect is that, you know, I appreciate  
18 about the point you made about pharmaceuticals and so on.  
19 One of the problems that a lot of our products, personal  
20 care products and so on, experience is what you might call  
21 the grey market. Where particularly, you know, and again I  
22 always hate to point to China, but you get Asian  
23 manufacturers who will copy those products. And there's  
24 really not much of a way to enforce that or to protect  
25 yourself from that, other than to withhold some of that

1 information.

2           So, I appreciate, you laid out the issue really  
3 well in your initial comment on that. The competing  
4 interests there. And it seems to me that this may be a  
5 situation where we may have to accept getting 95 percent  
6 disclosure or some percent like that, which is better than  
7 zero percent that we have in many instances today, in order  
8 to address some of the other concerns that you identified.

9           MR. GUTH: So when you say 95 percent disclosure  
10 I'm thinking you could imagine potentially a range, for  
11 example, of a concentration of an ingredient in a product  
12 being disclosed that would make it, you know, very hard to  
13 copy such a product, if you only knew the ranges. But that  
14 could still be very useful for evaluating the safety  
15 properties of a product.

16           I mean, so if that's what you're talking about,  
17 then I think there's a lot of room for creative thought  
18 about that.

19           MR. LIVINGSTON: Yeah, there are a lot of details  
20 on this that are worth discussing, I think.

21           MS. SALTER: Oh, I'm sorry, -- just very quickly.  
22 On this issue of CBI, just in regard to ingredient  
23 disclosure. This is very tricky, and I think both sides  
24 agree that we are talking about two different sets of  
25 concerns and trying to address those concerns.

1 I do think, though, that -- I think Joe brought up  
2 this point, that there are certain public health  
3 considerations that need to trump CBI. And so I think  
4 there's certain ingredients that should never be able to be  
5 claimed as CBI, such as carcinogens, mutants, -- toxins, you  
6 know, PBTs. There should be a certain class of chemicals  
7 that says, you know what, you just can't claim CBI because  
8 public health considerations outweigh your need to protect  
9 your business interests here.

10 So, I think that there's a place that we can come  
11 to where we can all agree. But I do think that the ultimate  
12 outcome needs to be information in order to protect public  
13 health.

14 MS. SARTAIN: Sorry, we have about five minutes  
15 left. And I understand that we have two more questions.  
16 So, if I could ask you, for the same of time limits, to make  
17 your questions as concise as possible, and your answers as  
18 concise as possible.

19 MR. BALTZ: Thank you. Davis Baltz with  
20 Commonweal and the CHANGE Coalition. This ties in with what  
21 you've been discussing.

22 Sort of look back to the genesis of the Green  
23 Chemistry Initiative, was a report that the legislature  
24 commissioned from the University of California a few years  
25 ago that came to the conclusion that the data gaps were so

1 immense in what we know about chemicals that it was  
2 interfering with the market's ability to work effectively,  
3 and get the best green chemistry products to the market.

4           So, as to my point of view, one of the best things  
5 that can come out of this exercise of implementing this  
6 statute is the provision of data that heretofore has not  
7 been available.

8           And that will enable the market to work more  
9 efficiently, and will get the innovation and the better  
10 products to the market more quickly.

11           So, with that in mind, I would just like to put  
12 forward that this concept of no data new market is extremely  
13 important. We can't ask DTSC to do all of the heavy lifting  
14 on this. They don't have the resources and it wouldn't be  
15 practical.

16           Wouldn't it make sense for the data that is  
17 generated in this program to be made publicly available so  
18 that others, besides DTSC, can start to weigh in and drive  
19 the market towards these safer alternatives.

20           I'm not saying that, you know, the economy -- of  
21 course, you're not deliberately putting toxic materials into  
22 your products. But the fact of the matter is, it has  
23 happened. We see these chemicals in umbilical cord blood  
24 now, over the last ten years, brominated flame retardants,  
25 perfluorinated chemicals, -- have all come onto the radar

1 screen in a way that we didn't know before because we have  
2 more information about them.

3           So I agree that asking the supply chain to be the  
4 enforcement mechanism somehow is not going to work. But why  
5 not make all the information available through alternatives  
6 assessment and elsewhere so that the public and market will  
7 start to drive things.

8           We're not asking for the secret sauce, the secret  
9 recipe, but, you know, the range of concentrations or  
10 something. This is practical. If the Green Chemistry  
11 Initiative doesn't get to this point, I think it's going to  
12 fall short of its potential.

13           MS. SARTAIN: Thank you.

14           MR. GREGGS: You know, again, just a thought from  
15 that. And, you know, I agree with the point that health and  
16 safety data ought to be public information. It shouldn't be  
17 CBI.

18           I think, though, if you're looking at 10,000  
19 chemicals, you know, it's not going to happen. I think if  
20 in our first cycle we could focus on 25 or 50, and do a  
21 really good job across the whole thing, the data side, as  
22 well as the evaluations, as well as what are the  
23 alternatives and what are the lifecycles. And where should  
24 we go with that.

25           To me, I think that's where we can do a good job

1 on the program by focusing, not narrowing what it is we work  
2 on, but how much we work on.

3 MS. SALTER: Just a quick response to that.

4 Davis, I think your point is really great. And I think it's  
5 interesting because at the Green Ribbon Science Panel  
6 meeting, Maziar talked about how this is supposed to be a  
7 market-driven process. And that everybody's very interested  
8 in having this be a very market-driven process.

9 But I think, as Davis pointed out, the market can  
10 only function well with proper information. And so I think  
11 that this is one of the ways to make the market function  
12 better, is to have great information.

13 And I totally agree with you that health and  
14 safety information can't be CBI. I want to also add on that  
15 the chemical name associated with that health and safety  
16 information can't be CBI, either, so we don't get into the  
17 scenario that we're in under TOSCA.

18 MR. GUTH: And then just, I can't resist jumping  
19 in on the point of prioritization and the suggestion of  
20 trying to focus on 20 to 50 chemicals, you know, a year.

21 You know, let's see, 10,000 chemicals divided by  
22 50 a year, is 200 years. This is a model that is thinking  
23 about government, you know, making a lot of decisions. If  
24 DTSC had to make the decisions, that might be what they can  
25 handle. But this is an -- but I'm envisioning, we're

1 envisioning an industrywide thing, where industry is  
2 responsible for all of its chemicals in its products. Not  
3 every industry has to do all the chemicals in commerce.  
4 Every industry only has to do its own chemicals.

5           So, I just think that we really need to think more  
6 broadly about what we're expecting industry to undertake;  
7 although I do agree one year might be a little tight for  
8 some of these things.

9           MS. SARTAIN: All right, we have apparently two  
10 more questions. Please make them very short, as short as  
11 possible.

12           MS. JOHNSON: I'll be very quick. I don't have a  
13 question as much as a comment. Missy Johnson with the  
14 California Retailers Association.

15           My comment centers basically upon what Bill Greggs  
16 has said and also the previous speaker. Clearly the  
17 retailers have an interest in the development and  
18 implementation of these regulations regarding the  
19 enforcement rule that the department may envision that  
20 retailers have in this.

21           We have a number of questions regarding the supply  
22 chain communications, as well as the definition of first  
23 importer, which most often are retailers. We don't have  
24 answers to these questions at this point. I just wanted to  
25 comment on that really quickly to say that we are very

1 interested in the development of the regs, and we're paying  
2 close attention.

3 MS. SARTAIN: All right, thank you. And we will  
4 have a lot of time for public participation later in the  
5 day, too.

6 MS. KOEPKE: Thank you, Dawn Koepke with The  
7 McHugh and Associates. I'm one of the co-chairs of the  
8 Green Chemistry Alliance. Thank you for your participation  
9 on the panel today.

10 One of the things I just wanted to bring up and  
11 hope that maybe we could have a discussion about, whether it  
12 be now or later in the day, is dealing with issues  
13 surrounding de minimis naturally occurring trace.

14 Those are some key issues that the Green Chemistry  
15 Alliance has identified. And we believe that in addressing  
16 some of those issues we can make this a more workable  
17 program.

18 And, you know, we have some specific concerns  
19 relative to the way the straw's been laid out obviously.  
20 But we think, you know, with regard to identifying chemicals  
21 of concern, prioritizing them, and that that needs to be  
22 done in a very careful manner. Such that, you know, the way  
23 the straw's, you know, laid out now, many of those chemicals  
24 are going to be facing bans at the end of the process.

25 And we think that, you know, with regard to hazard

1 being the only criteria, that that's inappropriate as the  
2 sole determinant of a chemical of concern. And that things  
3 like exposure pathway, the level at which a chemical  
4 presents an exposure has to be identified. The period of  
5 time.

6 I mean these are key issues that we really need to  
7 start dealing with in a more expeditious fashion if we're  
8 going to move this forward and make this workable.

9 And specific to, you know, some examples of where  
10 we think that need to be addressed in this fashion, look at,  
11 you know, wood, for example. Wood is a naturally occurring  
12 product, and without any kind of treatment whatsoever, wood  
13 has formaldehyde in it.

14 And under the program that we have laid out before  
15 us today, that is a chemical that would certainly be headed  
16 for the prohibition list in that capacity. But as far as  
17 wood goes, if it's naturally occurring in wood, how do we  
18 deal with that? Because that product, down the line, would  
19 be banned.

20 And there are many other instances like that. If  
21 you look at some heavy metals, you know, zinc, copper,  
22 chromium, iron, I mean these are, you know, elements that,  
23 you know, at certain levels do pose very significant  
24 concerns for the health and the environment. And yet  
25 they're critical to the human body's functions, as well as

1 other functions in the environment.

2 So we think that we need to have a deeper  
3 discussion about de minimis consideration about naturally  
4 occurring. And the only way to make this workable is to  
5 consider some of those ideas upfront when identifying  
6 chemicals of concern and prioritizing those.

7 So, we'd love to hear your thoughts on that, and  
8 how we could deal with those issues going forward to make  
9 sure that we're really targeting those specific products and  
10 chemicals, if that's what's determined to be needed to make  
11 sure this is workable, and we're not inadvertently banning  
12 products that should not otherwise be done.

13 Thanks.

14 MS. SARTAIN: Would anybody like to respond?

15 MR. GUTH: Sure, I can always think of a response.

16 (Laughter.)

17 MR. GUTH: You know, I think a lot of concerns you  
18 identified are certainly legitimate. I think of them, tend  
19 to see them as sort of in the prioritization bucket, rather  
20 than the identification of chemicals of concern bucket.

21 And I think it's appropriate what DTSC has done to  
22 focus on hazard for identifying chemicals of concern is  
23 appropriate, because all that means is we're going to start  
24 to take a closer look on how it's being used.

25 And some of the criteria that you've talked about,

1 I mean, you know, I think, in some situations, might make  
2 some sense. But, I mean, I just really hate to see exposure  
3 and all this stuff start to be incorporated into the  
4 identification of a chemical as being of concern at the  
5 outset.

6 MS. SARTAIN: Thank you. And thank you to the  
7 gentleman who offered to hold his question until later  
8 today. Please do remind us to give you first shot when we  
9 have the open discussion later. Thanks for doing that.

10 Panel, this has been wonderful. Thank you so much  
11 for being here. It's been very informative. We appreciate  
12 it very much.

13 (Applause.)

14 MS. SARTAIN: I bet at least some of you are  
15 anxious for a break, right? Let's take a 15-minute break  
16 and then come right back, because DTSC Staff has some  
17 wonderful presentations that will be very informative to  
18 you.

19 (Off the record at 10:50 a.m.)

20 (On the record at 11:17 a.m.)

21 MS. SARTAIN: So if you could find your seats,  
22 we'll get going with the presentations. Thank you.

23 (Pause.)

24 MS. SARTAIN: All right, one little bit of  
25 housekeeping. For the sake of our reporter it's very

1 important to us that we get your names correctly and your  
2 organization. So, when you do speak if you wouldn't mind to  
3 make sure that you speak up loudly enough for us to get  
4 that, and even repeat it, if you'd like to. We want to make  
5 sure we get it right.

6 DTSC Staff has some presentations for you now.  
7 I'd like to bring up Don Owen.

8 MR. OWEN: Good morning. I'm Donald Owen with the  
9 rulemaking team. And first I'd like to introduce my  
10 colleagues, Peggy -- where's the switch? Can you hear me  
11 now -- Peggy Harris, Evelia Rodriguez, Nancy Ostrom, Bob  
12 Boughton, I believe, is in the audience. Today I'm making  
13 our other colleague, Robert Brushia, presentation on his  
14 behalf. He could not be here. And our counsel, Joseph  
15 Smith.

16 Thank you, again, to the panelists this morning.  
17 They've identified a number of the topics the team has  
18 struggled with and seeks your input today.

19 This presentation is very similar to that which  
20 was presented to the Green Ribbon Science Panel last  
21 Wednesday. It has within it a number of questions. I'd  
22 like to go through the presentation, try to clarify some of  
23 the points that are related to the straw proposal from the  
24 panel discussion today, hold the questions we've formulated  
25 to the end. And more importantly, take your questions. And

1 have a dialogue.

2           Terms: To begin with, some of the terms are very  
3 important and what meaning we give them. In the straw  
4 proposal the majority are defined in the law, itself. And  
5 we've not offered additional definitions with the exception  
6 of one or two of these terms. Chemical, chemical  
7 ingredient, a manufacturer, a consumer product, and a  
8 chemical of concern. So we seek your insight with respect  
9 to the terminology, both in terms of scope and application;  
10 who does what; how; what they mean.

11           As Peggy mentioned, in the identification, and the  
12 process by which chemicals of concern are identified and  
13 prioritized, I should mention the law requires us to devise  
14 a process to do so for consumer products.

15           First, the manufacturer determines if their  
16 product or chemicals, within the scope of the regulation in  
17 the law. As Peggy mentioned, this is done in three distinct  
18 ways.

19           First, we offer nine product categories.  
20 Secondly, we have created essentially for placeholder  
21 purposes a specified list of chemicals. And thirdly,  
22 chemicals which are identified by others, generally  
23 authoritative bodies, on lists of lists.

24           If you manufacture a product within that category,  
25 or a product which contains one of the specified or lists of

1 lists chemicals, you're within the scope.

2           Subsequent to that, if you're in, you're required  
3 to review the hazard traits associated with the chemical  
4 ingredients in your product, the one which was captured  
5 within the scope. You can do so either using existing data  
6 that you possess that's in the toxic information  
7 clearinghouse or elsewhere. But we define what that data is  
8 to some degree. Or in the absence of data, conduct  
9 appropriate analytical and scientific testing using  
10 appropriate test methods.

11           Manufacturers generate the data or use existing  
12 data to determine if the chemicals in their products, which  
13 are within the scope, fit into the specified hazard  
14 categories. The hazard categories are specified in the  
15 regulations, as well.

16           Thirdly, manufacturers then prioritize those  
17 chemicals of concern for the chemical ingredients in the  
18 products within the scope. As Peggy mentioned, there are  
19 three priority schemes.

20           First, those which are likely or reasonably  
21 anticipated to have an exposure during use. Second,  
22 priority of those which are likely or anticipated to have  
23 exposure after use or in disposal or reuse. And lastly,  
24 those that are anticipated to not have an exposure or  
25 release.

1           Fourthly, the process to identify and prioritize  
2 requires that at the end of the first year, so one year  
3 after the effective date of the regulation, the manufacturer  
4 communicates that hazard categorization result to not only  
5 the clearinghouse, but the first link in the supply chain.

6           This is a schematic of the initial steps of the  
7 process to identify and prioritize chemicals of concern. So  
8 to review, there are three distinct pathways to enter the  
9 nine categories of specified consumer products. Designated  
10 chemicals of concern, which the chemical, itself, is listed  
11 in the rule, proposed rule, or would be listed in the  
12 proposed rule. This is just a straw proposal. And lastly,  
13 any chemical identified on one of the specified lists.

14           These are the categories. There are 11. Parts  
15 designed or for use by infants and children. We seek  
16 feedback on the terminology. How this is defined. How big  
17 this bucket is. What the parameters are.

18           Second, for use in K-12 schools. Designed for  
19 application directly or to the human body. Clothing, linen  
20 and textiles. Home furnishings. Cleaning products. Those  
21 which release a fragrance of scent, or deodorizer during  
22 use. Products designed to dispense, store or prepare food.

23           Products designed to or anticipated to release a chemical  
24 during use to consumers.

25           As the Green Ribbon Science Panel said, the ninth

1 category includes things such as automotive brake pads and  
2 others that would potentially affect ecosystems. Ten and 11  
3 are the chemical pathways.

4 So our first question, actually our first three  
5 questions, are what are the pros and cons of each of the  
6 ways one would enter the system. The product categories,  
7 the 16 designated chemicals or the lists of lists? That's  
8 the initial scope.

9 Our fourth question goes to a question that we  
10 heard a lot about this morning from the panel. And it's  
11 phrased in this matter because of the provisions in the  
12 statute, itself.

13 What are the pros and cons of including a possible  
14 exemption for a chemical or a chemical ingredient in a  
15 consumer product which presents either an insignificant  
16 level of hazard or for which exposure is adequately  
17 controlled through product design and manufacture.

18 This concept may include de minimis, trace,  
19 impurity, intentionality and a variety of other things in  
20 terms of reuse. So we seek more discussion about this  
21 following this presentation.

22 The statute also directs this department to make  
23 use and reference information available elsewhere. This is  
24 on the concept that a lot is happening in the world. In  
25 REACH, in Canada, in existing risk paradigm systems, prop

1 65, others, people who characterize chemicals, analyze  
2 chemicals, whether it's USEPA, IARC, NTP. And to apply that  
3 information in our process to identify or prioritize. And  
4 leverage the work done elsewhere.

5           Generally these are other governments or  
6 government authoritative bodies. Our Green Ribbon Science  
7 Panel did tell us that there are distinctions between the  
8 two. But our question, what are the pros and cons of the  
9 definition of authoritative bodies as set forth in the straw  
10 proposal, and what changes would you suggest either in who  
11 is an authoritative body, or how their information and/or  
12 decisions are applied.

13           Manufacturers have one year to generate, apply and  
14 collect the documentation sufficient to determine if a  
15 chemical or chemical ingredient in the product fits into one  
16 or more of the hazard categories.

17           They may use suitable testing methodology,  
18 including some of the newer techniques like quantitative  
19 structural activity relationship models, under certain  
20 circumstances.

21           Our question: Is one year an adequate amount of  
22 time to complete the required testing, if testing is  
23 necessary? And are the test methods appropriate? What  
24 additional data requirements might be required, and what  
25 should be specified?

1           Peggy gave me a review of the hazard categories.  
2 These include chronic human health effects, but they also  
3 include environmental compartments and nonhuman species,  
4 such as acute aquatic toxicity, and effects upon the stratus  
5 -- ozone layer. We'd like your input on these categories.

6           MS. SARTAIN: Plus keep your comments to two  
7 minutes or less so that we can break for lunch.

8           MR. OWEN: In clarifying the straw proposal, these  
9 categories are deduced from the globally harmonized system  
10 as they're put into the regulatory process within the  
11 European nations. That's where we got them from, and we've  
12 made modification, or made decisions about the levels that  
13 were used in European regulations which are reflected in the  
14 straw proposal. So our eighth question, should additional  
15 or different hazard categories be considered.

16           Question nine: Several of the panel members  
17 talked about the analysis of a chemical or chemical  
18 ingredient for which either the data is unknown or the data  
19 does not exist.

20           A question is, and this is part of the need we  
21 would have when we enter the formal rulemaking process, what  
22 is the scope, scale and cost of the required testing to  
23 characterize an unknown chemical. So, a data gap question.

24           Heard a lot about prioritization. The straw  
25 proposal sets forth three relatively simple, straightforward

1 prioritization categories and methodologies. I know this is  
2 an important area where people have a lot of ideas. We seek  
3 your comment on the straw proposal, but also your  
4 suggestions to strengthen or change or modify the  
5 prioritization scheme.

6           Question ten: The straw proposal requires the  
7 manufacturer to notify the supply chain regarding the  
8 identification and prioritization steps taken. How can that  
9 information be shared most effectively and efficiently? A  
10 few of the commenters this morning mentioned this topic.

11           And lastly, to restate, terminology is important,  
12 so if you have an assumption about something that is  
13 foundational to your point, particularly in terms of words  
14 and terms, please let us know that, as well.

15           So, thank you. And I'd like to open up to  
16 questions and a dialogue.

17           MR. MAGAVERN: Thanks. Bill Magavern, Sierra  
18 Club, California. I have a comment in support of the scope  
19 of the proposal. And that is that if green chemistry and  
20 the search for safer alternatives are to mean anything, then  
21 it has to mean that every manufacturer needs to examine its  
22 products.

23           And first of all, if they don't know already they  
24 need to know everything that's in those products. They need  
25 to identify any of the materials in them that could be

1 hazardous to humans or the environment. And then they need  
2 to take steps to investigate alternatives. And wherever  
3 possible, to replace those harmful substances with safer  
4 alternatives.

5           Every manufacturer should be doing that, and it is  
6 the job of the government to make sure that every  
7 manufacturer is doing that.

8           So I know there are a lot of people saying that,  
9 well, we shouldn't have to do this for every product, every  
10 chemical, but I think actually 1879 does require that. So I  
11 think that this part of the proposal is actually well  
12 structured.

13           MS. HARRIS: Since I have the mic, I'm going to --  
14 can I ask a question? We've heard this before, and I'd  
15 like, Bill, if you could respond to this, as well.

16           What if we kept the net broad, a broad net, but we  
17 started off with a schedule. Let's say we started off with  
18 a subset and then either laid out a schedule, or within the  
19 reg, or separate from the reg, for adding to it over time.  
20 But there was a subset that we're starting with, and then  
21 augment that over time. What do you think about that?

22           MR. MAGAVERN: I've been thinking about something  
23 like that, also. And it kind of gets into the big issue  
24 we're dealing with here over how much the companies  
25 implement on their own and how much of an oversight role

1 there is for the department.

2 And I think that it probably is a good idea for  
3 the department to have such a schedule of high priorities in  
4 which the department would actually be very involved, where  
5 you would not use the self-implementation model.

6 And then for everything else you could start out  
7 using the self-implementation model. And this way you would  
8 husband the scarce resources of the department and focus  
9 those on the highest priorities.

10 MS. MILLER: Okay, just so -- we have a  
11 transcriber here, I'm sure you're aware. If you could,  
12 please, when you make a comment, after your comment please  
13 hand us this card with your name the way you spell it, and  
14 we'll be sure that your name appears written correctly in  
15 this transcript.

16 So when we hand you the mic we'll also hand you a  
17 card.

18 MR. DELEO: Hi. Paul Deleo with the Soap and  
19 Detergent Association. Two comments, the first one quite  
20 quick. With regard to the definition of chemical, you may  
21 want to think about specifying that further.

22 One of your list of lists includes things like  
23 guinea pigs and redwood trees and frogs, and I don't think  
24 we traditionally think of them as chemicals. But that's not  
25 really clear if you intend that to be the case.

1           In more detail, though, in other areas, you have  
2 several prospective approaches, a product approach and a  
3 chemical approach, and a number of chemical or product  
4 criteria. But it's not clear where those came from.

5           And I think it was reflected in the Green Ribbon  
6 Science Panel that establishment of criteria first, and then  
7 populating, you know, what sources you may draw to establish  
8 what are chemicals of concern. And if you go a products  
9 approach, for the products. One of the product categories  
10 that would be included should be kind of process that you're  
11 establishing.

12           Don said that, you know, a number of decisions  
13 have been made. And it's not clear how those decisions were  
14 made. I think those criteria need to be established, and  
15 there needs to be transparency with regard to how the  
16 department would be making those kinds of decisions.

17           MR. OWEN: I have a follow-up question for Paul.  
18 Do you have a preference on product category or chemical or  
19 list approach?

20           MR. DELEO: In thinking about this a little bit,  
21 my sense of DTSC's experience is it's more on the chemical  
22 side than on the product side. I'm a little concerned,  
23 being on the industry side of things, that you're getting  
24 into the consumer product arena without much experience.

25           The fact that you're cutting your teeth potentially on

1 dealing with consumer products is somewhat troubling.

2           So my preference is probably starting on the  
3 chemical side of things, and then looking at how these  
4 chemicals are used in particular products, rather than  
5 defining particular consumer products that you're going to  
6 focus on first.

7           MR. OWEN: The law requires us to look at  
8 alternatives analysis of chemicals of concern in consumer  
9 products. How would you suggest we go from chemical  
10 ingredients or chemical approach to products?

11           MR. DELEO: Well, once you identify your chemicals  
12 of concern you're going to have to have some idea of what  
13 kind of products they're used in. I think you might be  
14 talking about like a data call, and if at that point in time  
15 you don't already understand where those chemicals might be  
16 used, from that, as Bill suggested, it's probably not  
17 necessarily a real difficult analysis to determine where the  
18 greatest exposures occur. And then, by virtue of that, you  
19 can identify where the alternatives analyses need to be  
20 done.

21           It's my sense that those alternatives analyses  
22 will be done on specific uses of chemicals. So, the example  
23 was given of brominated flame retardants in circuit boards.

24           That's the kind of thing that you would do an alternatives  
25 assessment on. And that's what I would expect at the end of

1 the day, a chemical of concern would be identified with a  
2 specific use in a consumer product. And then the next step  
3 would be to do an alternatives assessment on that particular  
4 use.

5 MR. OWEN: Thank you.

6 MR. BALTZ: Davis Baltz with Commonweal and CHANGE  
7 Coalition. A question for the pros and cons of the possible  
8 exemption.

9 I think that you're asking this question somewhat  
10 prematurely in that you're asking should it get an exemption  
11 if it has an insignificant level of hazard. But nowhere in  
12 the draft straw proposal do you define what a significant or  
13 insignificant impact or risk is. So you will certainly need  
14 to build that in before you can -- we can really adequately  
15 address this question.

16 And for the second part of that, if exposure is  
17 adequately controlled through product design and  
18 manufacture, I think you've already heard that some of us  
19 have a concern about putting sort of a precedent, a priority  
20 on containing something, as opposed to preventing it in the  
21 first place. And so I think that we want to prevent an  
22 exposure or release as opposed to adequately controlling it  
23 after the fact.

24 But even if you do go down this road, you would  
25 also need to include, in addition to product design and

1 manufacture, what happens during its use and its disposal  
2 after the fact.

3 MS. SARTAIN: Any additional comments or  
4 questions?

5 MS. PORTER: Yes. I am Catherine Porter with  
6 California Healthy Nail Salon Collaborative. I have a  
7 couple of comments.

8 One has to do with the question about  
9 authoritative bodies. And maybe this is redundant, because  
10 I think it says something about this in the statute. But I  
11 think other state agencies, especially California state  
12 agencies, ought to be considered authoritative bodies.

13 I know that OEHHA might have generated, or has  
14 generated, a lot of information or analysis tools that could  
15 be useful for this process.

16 The other issue that I'd like to speak to is that  
17 of workers and worker exposures. And specifically, I'd like  
18 to draw your attention -- and I would like to see in this  
19 regulation that those exposures are considered.

20 So, for instance, on page 3 the 11 product  
21 categories, on number 8 where it says, products designed or  
22 reasonably anticipated to release any chemicals during, and  
23 it mentions different stages. And we would like to see the  
24 phrase, during manufacture, should also be included.

25 And then on page 12 and 13 of your handout,

1 prioritization, number 1. Priority number 1 should include,  
2 anticipated to be released during use or disposal or during  
3 manufacture, to which human beings are exposed.

4           And then on number 13 I would suggest that  
5 chemical or chemical ingredients, somehow include the  
6 phrase, or be intended to include chemicals that are  
7 released during manufacture.

8           Thank you.

9           MR. OWEN: Returning to the question of a  
10 potential exemption for a chemical or chemical ingredient.  
11 If we were to restate it differently, is there a level at  
12 which a chemical ingredient might be considered exempt from  
13 the subsequent steps of the process, including  
14 identification as a chemical of concern.

15           MS. SALTER: Gretchen Lee Salter, Breast Cancer  
16 Fund. I wasn't going to address that specific question,  
17 Don. I apologize. But I think, just in regard to your very  
18 last phrase, whether or not it should be exempt from even  
19 being considered a chemical of concern, no. I don't think  
20 that there's a level at which chemicals cannot be considered  
21 a chemical of concern.

22           I think Joe Guth's comments today, or earlier  
23 today, about how do we consider in prioritization, that's  
24 probably more the appropriate place, given, I think, some of  
25 the concerns that were raised earlier.

1           What I really wanted to dovetail off of was  
2 Catherine Porter's comment where she talked about workers.  
3 And I think something in here that needs to be better  
4 defined and more broadly defined is what constitutes a  
5 vulnerable population or sensitive subpopulation. Right now  
6 it's just infants and children. And I think the legislation  
7 said such as infants and children, but that there is the  
8 ability for the proposed regulations to go beyond that when  
9 we consider vulnerable populations.

10           And I would recommend that pregnant women be  
11 included in vulnerable populations, workers, those who are  
12 disproportionately impacted by pollution, such as those  
13 living in fenceline communities, as well as those who have  
14 some sort of sensitive disease, you know, immunocompromised  
15 in some way. That those be included in sensitive  
16 subpopulations, and not just infants and children.

17           MR. OWEN: At what step in the process would those  
18 be considered?

19           MS. SALTER: I think they need to be considered in  
20 multiple steps. First of all in prioritization, certainly.

21           But then also in response action, or in regulatory -- I'm  
22 going to stop calling it response action because I believe  
23 that the regulatory response belongs to DTSC and not to the  
24 manufacturers.

25           So in the regulatory response that we take those

1 vulnerable populations into account when choosing the best  
2 response to take.

3 MR. OWEN: So, for example, if a chemical  
4 ingredient is in a consumer product, the worker, and  
5 specific more broadly defined sensitive subpopulation should  
6 be considered as part of prioritization, alternatives  
7 analysis and the regulatory response?

8 MS. SALTER: Yes.

9 MR. OWEN: Following something that was  
10 discussing, and I think it's a great area we need all of  
11 your input on, what about a chemical that is not found in  
12 the consumer product, but is used in manufacturing?

13 MS. SALTER: Well, and I don't think that that's  
14 exempted at all. I think the definition of consumer product  
15 in 1879 is intentionally broad, so that it can include those  
16 chemicals that are used only in manufacturing. So, they  
17 should be included in this reg.

18 MR. OWEN: I guess I should clarify one of the  
19 foundations of the draft straw is that it relates to a  
20 regulated California activity. In 1879 that means the sale  
21 or use of a chemical.

22 So, with respect to manufacturing, that would be  
23 manufactured in a California facility. Manufacturing in  
24 Midland, Texas, or in Guangdong, China, is beyond the scope  
25 of the statute, as our team interprets it.

1 MS. PALITZ: I am Pam Palitz. I'm the  
2 environmental health advocate for Environment California.  
3 I'd like to speak to question 2, which what are the pros and  
4 cons of the 16 designated chemicals of concern.

5 I believe there's insufficient criteria for having  
6 chosen those chemicals, the 16. I think in order to make  
7 that kind of legally viable and to make it withstand legal  
8 challenge, I think you're going to have to have very  
9 specific criteria why you picked them. And I think that  
10 they're in the media a lot is insufficient. I think you're  
11 going to need really specific kind of criteria in order to  
12 pick.

13 Although, on the other hand, I need to say that I  
14 really like that as one of the -- I do think that there are,  
15 that specific chemical, that I definitely support that  
16 pathway. But I think you just need stronger criteria to  
17 support your choices.

18 MR. OWEN: Setting aside the particular chemicals  
19 that are specified, what would the criteria look like in  
20 your mind?

21 MS. PALITZ: You know, I think that because -- I  
22 think the -- from what I've understood from you guys, that  
23 part of the choice of the chemicals is that there's a lot of  
24 uncertainty in terms of whether or not -- in terms of their  
25 hazard traits.

1 I think you just have to -- I think that you just  
2 need to, you know, list -- figure out which hazard traits --  
3 I mean why those are different than just chemicals that  
4 would fall under hazard traits.

5 And so you just have to kind of, you know, go  
6 through each one and then figure out what their traits are.

7 And, you know, why they don't fall into the categories that  
8 you've already chosen.

9 MS. KOEPKE: Hello. Dawn Koepke again with McHugh  
10 and Associates on behalf of the Green Chemistry Alliance.  
11 To your question, Don, about the insignificant risk level,  
12 the Green Chemistry Alliance has been working to frame out a  
13 proposal to address that very issue, largely surrounding the  
14 concept of de minimis.

15 As we understand it, based on our conversations  
16 with the DTSC team, largely the hazard traits and hazard the  
17 information in the straw proposal was largely derived from  
18 the GHS system, the global harmonize system.

19 And we believe that that would be a good starting  
20 point for framing out this concept of de minimis. GHS  
21 provides some threshold, some levels that we think that  
22 would be a good starting point for a discussion around.

23 There's been some question about whether all of  
24 those levels within GHS are appropriate. And that is  
25 certainly a discussion we'd be willing to have.

1           But in terms of furthering the work here and  
2 making this a workable approach, we think that talking about  
3 using that system would be a really good start in moving  
4 that ball forward.

5           MR. DOTY: I had a question about question number  
6 1, and that is whether the definition of -- sorry, Robert  
7 Doty, D-o-t-y, Cox, Costle and Nicholson.

8           And the question is whether the intended-for-use-  
9 by-children piece of your first product category is intended  
10 to extend to dwelling units, houses, apartments, hotel  
11 rooms, any places where children go.

12          MR. OWEN: That gets back to the term, what is a  
13 consumer product. That statute, itself, defines it broadly.

14          And lists four or five exemptions, which are food, --  
15 pesticides, essentially FDA-regulated drugs and durable  
16 medical appliances and dental amalgam, and specified mercury  
17 lighting. What do you think about the definition of  
18 consumer product?

19          MR. DOTY: The definition is as it is stated in  
20 the statute. I don't have any question about that. I  
21 wasn't sure whether that intended to be use phraseology, or  
22 as a way of carving up some of the statutory definition or  
23 not. That's why I was asking the question about what the  
24 intention was.

25          MR. OWEN: The intention about categories was to

1 identify what we thought were consumer products that are in  
2 general use, or in high volume in numbers of units. And  
3 what effect, since the subpopulation is children as they're  
4 infants and developing. So that was the general concept.

5           You're asking about the execution and the detail,  
6 does it include it. We don't know the definition of those  
7 product categories. We've not heard much, other than the  
8 scale is too large. Today Bill Greggs told us how many  
9 chemicals are identified on the list of lists.

10           So a third pathway. But, we ask you, how many  
11 products are included in those categories? What are those  
12 buckets, and how are they defined?

13           And if we begin with the chemical pathway, how do  
14 we get to products? Bill mentioned 100,000 products would  
15 be included. What's the derivation of that number and  
16 what's included? This team does not have that information.

17           I should also clarify that that list of nine  
18 product categories was the starting point. It was the  
19 intention of the department to try to construct a system of  
20 periodic update, which would be through subsequent  
21 rulemaking, to add or augment or refine those product  
22 categories.

23           We don't have -- someone properly characterized  
24 the department as being chemical and waste focused. We  
25 don't have much information, nor have we received

1 information, about consumer products. So we're looking for  
2 help on terminology, size of the bucket, order and priority  
3 of the buckets.

4 MS. LILY: Hi. My name's Amy Lily. I'm with  
5 American Honda. And I just would like to make a request  
6 that we need some definition of what these product  
7 categories are. And I think that was -- maybe I'm  
8 misinterpreting his question, that are we in the category or  
9 not. And so maybe that could be a next step to help define  
10 that.

11 And then I also just wanted to talk a little bit  
12 about our industry. And I think this isn't a one-size-fits-  
13 all type of regulation. I think there are different kinds  
14 of consumer products that have huge supply bases.

15 And just to find out the information that's in  
16 products such as in an automobile that has hundreds of  
17 suppliers, various tiers, hundreds of thousands of parts, to  
18 be able to get that kind of information within a year is not  
19 realistic.

20 Especially when you're going down to these small  
21 mom-and-pop companies. You know, we've been collecting  
22 information for over ten years to comply with the end-of-  
23 life directive in Europe. And we have put together a  
24 system, and I think we're ahead of the game more than other  
25 industries. But at the same time, it's taken us that long

1 to get information on a defined list of chemicals.

2 And so, you know, our request is that you narrow  
3 down the chemicals. Sure, you can expand them over time.  
4 We feel we understand what you're trying to get to. But I  
5 think that you've got to start small and enlarge what you're  
6 going after over time. So that it is workable. So that you  
7 do achieve some things.

8 And eventually -- we just don't understand what  
9 the rush is to get all this right away.

10 MR. LEACOX: I have a couple of comments. The  
11 first is -- oh, I'm sorry, I'm Daniel Leacox with Greenberg  
12 Traurig, and I have a couple of comments.

13 The first in response to the suggestions regarding  
14 workers. And the first is that in evaluating worker  
15 exposures, workers are generally considered a health  
16 population. And it would be a serious mis-definition to  
17 consider them a sensitive subpopulation.

18 The fact that it's a population that may include  
19 some sensitive individuals or a sensitive subpopulation  
20 doesn't make the larger group a sensitive subpopulation.

21 The second point is that the statute seems to be  
22 very clear that where you have regulation already in place,  
23 that's left to that regulatory body. And worker exposures  
24 are regulated by the Cal-OSHA program.

25 And that's it.

1 MR. OWEN: As a follow-up to the prior commenter,  
2 what would be the appropriate timeframe, as defined? And  
3 what would the timeframe be if it were defined differently?

4 MS. LILY: I don't think it's a one-size-fits-all,  
5 and I think that it's, and I hate to say that, but I think  
6 every industry has different product cycles.

7 And I'll just give you an example of the  
8 automobile industry. You know, our products are typically  
9 on a five- to seven-year cycle. And to gather information  
10 on what's in a product for a cycle for five years might be  
11 different than another company that's going to take, you  
12 know, might have very few parts.

13 And so I'm really hesitant to respond to that.  
14 But I think, first of all, you've got to take into  
15 consideration what is already in place for that industry.  
16 What information do they have from their suppliers. Is  
17 there something like the automobile industry that may have a  
18 database already in place? Even though we might have more  
19 parts, we might be able to gather the information more  
20 quickly.

21 But I can honestly say I think a year is very  
22 unrealistic to take that first step gathering the  
23 information. I'd say maybe three for an industry that  
24 doesn't have anything in place already.

25 MR. GUTH: Hi. Joe Guth, Science and

1 Environmental Health Network. Let me see here, where am I?

2 Okay.

3 I wanted to address, or ask a question, actually,  
4 about the prioritization. There are three categories that  
5 you've identified here, based on likelihood of release.  
6 There are some other elements of those criteria in the straw  
7 proposal, itself, about whether there's encapsulation, et  
8 cetera.

9 So, in parsing through this, I wonder if I can ask  
10 you, are all chemicals of concern going to be priority one,  
11 two or three? Or would there be some chemicals of concern  
12 that are not priority one, two and three?

13 Because I can't tell whether these are intended to  
14 include all chemicals of concern one way or another.

15 MR. OWEN: As drafted, the straw would have all  
16 chemicals of concern in priority one, two or three.

17 MR. GUTH: Okay. So then all chemicals of concern  
18 will go through an alternatives analysis, or all products  
19 containing them, at some point?

20 MR. OWEN: Yes. To clarify, we understand that  
21 the law requires an alternatives analysis of a consumer  
22 product containing chemicals of concern be conducted.

23 MR. GUTH: Okay.

24 MR. OWEN: But there's no shortcut.

25 MR. GUTH: Okay, then the other point I wanted to

1 raise is on the data requirements, which is question five.  
2 The straw proposal says that manufacturers will have a year  
3 to generate data or collect documentation sufficient to  
4 determine if the chemicals fit and how they're categories.

5 That is just a lot of discretion, you know. And  
6 there's a lot of ways to pick and choose different toxicity  
7 tests. And I really think that this has to be made -- or I  
8 want to suggest that it be made more concrete.

9 There are -- OEHHA, for example, specifies kinds  
10 of data that can be used to show the chemical meets  
11 reproductive tox or cancer tox. There's a group called the  
12 California Breast Cancer Research Program that's developing  
13 a set of tests that would focus on cancer, or breast cancer  
14 specifically. There's REACH, of course.

15 So, you know, I share -- you're probably feeling  
16 concerned about being too specific about exactly what tests.

17 And I think that's a legitimate concern. But on the other  
18 hand, I think this needs to be made more concrete or there's  
19 a substantial risk of not getting very much out of it at  
20 all.

21 MS. HARRIS: Joe, I don't expect you to tell me  
22 this right now, but you mentioned in your comments earlier  
23 that you felt that in many places we were too discretionary.

24 And it would be helpful for us for you, as you just  
25 identified one, -- I mean I think we know certain areas

1 where we have included discretion. That wouldn't have been  
2 one that I would have really thought of.

3 So it would be helpful for us for you to go  
4 through and sort of identify to us where you do think that  
5 the requirements we have in place are too discretionary.  
6 And you don't have to tell me today, you can send it in.

7 MR. GUTH: We'll do that.

8 MR. OWEN: I wanted to clarify the straw proposal  
9 as best I can. I'm filling in for Rob, but my understanding  
10 is the way it's constructed, if, for example, a hazard trait  
11 is human cancer, that if you're a list of lists and an  
12 authoritative body, any one of which has identified cancer  
13 as a hazard end point, that's the determination. So it's  
14 not very discretionary.

15 So I suppose you're concerned about the hazard  
16 trait characteristics for which test protocols and/or lists  
17 of lists do not yet exist, like aquatic toxicity?

18 MR. GUTH: Right. I'm operating on the assumption  
19 there are a lot of data gaps. And that there are going to  
20 be ingredients in consumer products that are -- covered  
21 consumer products for which there is, you know, literal  
22 definition, or maybe some kind of information about whether  
23 they meet those hazard criteria, and that new information is  
24 going to have to be generated. Studies are going to have to  
25 be done; tests are going to have to be done. But only if

1 the manufacturers decide that it's necessary to determine  
2 whether it fits in that hazard criteria.

3 So, you know, there are people who do a very  
4 simple, quick, superficial test to determine -- and decide  
5 this is enough to show it's not a carcinogen, for example.

6 There's just, you know, there's a lot of judgment  
7 involved in making these determinations. And there's just  
8 an overwhelming interest to reduce costs and find, know that  
9 a chemical's not a chemical of concern that I just think  
10 will lead manufacturers to make -- I mean, there's an  
11 incentive to make a superficial and easy decision. And  
12 therefore, get your chemical out of the whole program.

13 So I think there's got to be -- I think it's  
14 entirely feasible to generate a description of what kind of  
15 data is required without being too prescriptive on the exact  
16 tests that can be done.

17 I mean just as one example, you know, I think we  
18 know carcinogenicity assays, different animals can be chosen  
19 that are more or less likely to develop tumors. And, you  
20 know, that is all done, you know, people are very well aware  
21 of that when they design and pick tests.

22 MR. OWEN: There's been much discussion in the  
23 Green Ribbon Science Panel and this morning's panel about  
24 uncertainty. In the case of an authoritative body where  
25 they have made a decision and generated a list for

1 particular hazard end point determination, typically cancer  
2 or developmental toxicity, some of those chronic human  
3 health concerns, as our panel advised.

4           What about the circumstances where they have  
5 reviewed a chemical and not made a finding? Would that be  
6 demonstrative for a showing, independent of a manufacturer?

7           MR. GUTH: Well, yeah, I guess I have an opinion  
8 about that. Well, the authoritative bodies make different  
9 kinds of decisions. They have different burdens of proof,  
10 and so they are not making equivalent decisions.

11           For example, the recent decision by OEHHA's DAR  
12 Tech Committee not to list BPA. They have a complete  
13 different legal standard that they were comparing the  
14 evidence to than other authoritative bodies.

15           So, this gets to the question of what is your  
16 standard for whether a chemical is a chemical of concern  
17 under the data that's available. It's the allocation of the  
18 burden of proof, the response to uncertainty.

19           In the case of the DAR Tech Committee, the  
20 standard was the evidence has to clearly show it's a fairly  
21 -- and that was argued by the industry to be a very high  
22 standard -- clearly show something like clear and convincing  
23 evidence. So that means a little bit of doubt they don't  
24 list it.

25           Other authoritative bodies has a different screen

1 that they pass the data through. So, these decisions are  
2 not necessarily conflicting. All right. They don't  
3 necessarily represent different views of the science. They  
4 represent a different legal threshold for decisionmaking.  
5 And that's why it's so important for DTSC to establish those  
6 legal standards at various places in these regulations.

7 MR. OWEN: We're writing regulations like  
8 chemicals of concern in consumer products in California  
9 activity, which is use in California. OEHHA is a sister  
10 agency. Cal-OSHA is a sister agency. We've heard about  
11 what legal standard or what jurisdiction might be included.

12 Do you have an opinion if we should give deference to the  
13 California entities?

14 MR. GUTH: Are you --

15 MR. OWEN: Or anyone else?

16 MR. GUTH: Yeah, anyone else.

17 (Laughter.)

18 MR. GUTH: I think that the standard, for example,  
19 or listing under proposition 65 is inappropriate. It's too  
20 high, it's too high a burden of proof. There haven't been  
21 very many listings lately.

22 I don't think that's appropriate for identifying a  
23 chemical as a chemical of concern which is the trigger for  
24 then moving into an alternatives analysis. I think that's  
25 too high a standard.

1           So I think that, you know, we need to think about  
2 the purpose of this law and the purpose of each decision  
3 step and establish a burden of proof and response to  
4 uncertainty that's appropriate for this law, those purposes  
5 and that particular decision.

6           MS. JOHNSON: Missy Johnson with the California  
7 Retailers Association. I'd like there to be a little bit  
8 more broader discussion on the definition of manufacturer,  
9 particularly as it relates to the treatment of retailers who  
10 sell private-label product.

11           A number of retailers sell those products which  
12 bear their store brand, but they are not actually the  
13 manufacturer of those products.

14           I was curious to see as to what DTSC's vision is  
15 for those types of -- that type of instance in which a  
16 retailer may be considered a manufacturer of that product or  
17 not, or how they would factor into the regulation or the  
18 proposed straw.

19           MR. OWEN: Just to clarify how the straw was  
20 constructed. The law -- and as we've spoken to our sister  
21 agencies who also regulate consumer products, the Air  
22 Resources Board with respect to motor vehicles and fuels,  
23 and other consumer products; to the Department --  
24 Regulation, to the Integrated Waste Management Board, to the  
25 Department of Health Services, again the activity for the

1 sale or use.

2 As a concept from the Green Chemistry final  
3 report, it's important that the greatest place to effect  
4 change in the ultimate toxicity to humans and the  
5 environment is at the design stage, when you select the  
6 ingredients and determine how they'll function and be used  
7 in products. So it was with that goal that we tried to  
8 focus on the manufacturer.

9 If the definition is too big, too small, wrongly  
10 worded, let us know what your definition for manufacturer  
11 would be.

12 MS. JOHNSON: Will do.

13 MR. GREGORICH: Joe Gregorich with Tech America.  
14 I'm actually speaking today on behalf of both Tech America  
15 and the Information Industry Council, our association in  
16 Washington.

17 We represent about 1600 high tech companies, and  
18 so our companies really operate and rely on a global  
19 marketplace. And so when looking at the issue of  
20 prioritization we really want you to look at what has been  
21 going on in Europe with the GHS system and with the E-REACH.

22 A couple of specific points on the issue of  
23 thresholds. The EU has set a de minimis threshold at about  
24 .1 percent, and so we do think that that's an appropriate  
25 thing so we can continue to operate in both California and

1 in the European Union.

2 And also when looking at consumer products, we  
3 urge DTSC to look at consumer products differently. You  
4 need to look at chemical formulations differently than you  
5 do at articles because of the differences in chemical  
6 composition.

7 And again, these are thing that the European Union  
8 has done through REACH and in the international GHS system.

9 MR. OWEN: What are those differences for a  
10 chemically formulated product versus a manufactured article?

11 MR. GREGORICH: I was going to let one of my  
12 members answer it, but if it's -- yeah. We don't have the  
13 details on us at this time, but we can definitely work with  
14 you guys in getting that to you.

15 MS. SARTAIN: We have five minutes.

16 MR. ULRICH: I'm John Ulrich with the California  
17 Chemical Industry Council. Along with Dawn Koepke, I also  
18 co-chair the Green Chemistry Alliance.

19 The Green Chemistry Alliance, as was mentioned  
20 earlier, had proposed a comprehensive package in June. We  
21 would like to again stress the fact that we believe this is  
22 a workable package. It has some flexibility, which we think  
23 would be extremely valuable. And we could certainly work  
24 with the staff and with the NGO community to find ways that  
25 we could make that a workable approach.

1           If, following our prioritization process were to  
2 take place, we would have some 2000 chemicals that would be  
3 responsive to chemicals of concern. Those, compared with,  
4 or conjunctive with product categories and products of  
5 concern, would enable us to lead to a very reasonable  
6 approach for alternatives analysis.

7           And we would again refer this to staff and  
8 recommend to the environmental community that they, once  
9 again, read this carefully, because I think it offers some  
10 possibilities.

11           The draft proposal, the straw proposal, as it is  
12 currently written, we believe is unworkable. I testified in  
13 front of, or commented in front of the Science Panel that it  
14 was just unbelievable in terms of its scope, its breadth,  
15 and its cost.

16           If we pursue that particular proposal and go to  
17 the normal extent that it would take us, we would have just  
18 a meltdown in terms of the ability of that program to exist.

19           We recommend at this point in time that you  
20 seriously give thought to starting a different approach;  
21 that you look once again at the approach that we've  
22 identified in terms of a more focused mechanism. And we  
23 certainly want to make this work. We have, from the very  
24 beginning, testified that this is something that the  
25 business community and the chemical industry needs to work.

1           One of the things that concerns me greatly is the  
2 fact that there seems to be this overriding, pervasive  
3 concept that only regulation will drive innovation. That's  
4 just absolutely not true.

5           Green chemistry is subsumed within the larger  
6 concept of sustainable development. Sustainable development  
7 has been around for 20 years. The industry is a global  
8 market. Global markets are changing the way chemicals are  
9 being designed and maintained. And innovation is taking  
10 place all the time.

11           So we greatly appreciate your opportunity to look  
12 at this, or your willingness to look at this. And we,  
13 again, extend our invitation to the NGO community to sit  
14 down and try to work this out.

15           Thank you very much.

16           MR. OWEN: We've heard many comments about scale  
17 and scope and the various pathways. An idea which emerged  
18 more recently, both from the Green Ribbon Science Panel and  
19 today's panel, is the convergence of chemicals and products.

20           What do you think about that? Having a joint  
21 approach and what would the parameters or scale look like?  
22 What product categories would be the appropriate ones to  
23 begin with?

24           MS. KOEPKE: Hello. Dawn Koepke, again, on behalf  
25 of the Green Chemistry Alliance. To your point, we, in the

1 Green Chemistry Alliance, a proposal that we put forth in  
2 June, towards the end of June, did have kind of that hybrid  
3 approach.

4 We started with chemicals and identified those of  
5 highest priority based on CMR and PVT hazard criteria. And  
6 that, specifically with regard to question 8 regarding  
7 additional or different hazard categories to be considered,  
8 we really think that that is the best starting point. We're  
9 not adverse to possibly adding additional hazard criteria  
10 down the line. That's not at all something we're opposed  
11 to.

12 But we think as a good starting point for the  
13 program we think that is the way to go. So this is the  
14 resources on those chemicals and products, with some of  
15 those chemicals, focuses those on the highest priorities,  
16 for one. Focuses the resources on those highest priorities.

17 In those two categories alone it helps avoid a lot  
18 of redundancy with regard to a number of chemicals. Also it  
19 focuses on scientifically sound data and test methods. And  
20 we think that to make sure that this is a workable program  
21 from the start, we think that that is the way to go.

22 Start with that. And I do emphasize start; I do  
23 not want to at all indicate that we're willing or we're  
24 interested in holding the line on that forever into the  
25 future. But we think starting with that is good.

1           Going back from there we, in our Green Chemistry  
2 Alliance proposal, start with chemicals identifying those  
3 that are CMRs and PVTs, as John alluded to, and from there  
4 identifying the products that contain those chemicals with  
5 those hazard criteria. And going from there in terms of  
6 prioritizing them based on exposure pathways for those  
7 chemicals and those products, the concentrations and those  
8 sorts of things.

9           So, I, as well, would echo John in encouraging all  
10 stakeholders to look at that proposal. Based on our  
11 conversations that we've had with DTSC, as well as other  
12 stakeholders, since June we do completely acknowledge that  
13 there are areas where we can make some changes, make it  
14 workable to address some of DTSC's challenges, as well as  
15 some of those points that have been identified by other  
16 stakeholders, including some of the concerns relative to  
17 self-implementation. We think we have something that might  
18 be workable in that regard. And I'll save my comments on  
19 that for later in the discussion.

20           Thank you.

21           MS. SARTAIN: Thank you. We have one more person  
22 who would like to speak -- if we can make it very fast here  
23 so we can all get out for lunch -- over there in the corner.

24           Yes. You know what, would you be willing to hold  
25 yours until our next session? Thank you for reminding me of

1 that. If --

2 MR. POOLE: Yeah, hi. Doug Poole with DuPont.  
3 What I wanted to try and do here is give a little bit of a  
4 different perspective from a practical standpoint on some of  
5 the things that would arise out of this.

6 For the last two years one of my jobs has been the  
7 project manager to manage the food contact approval for the  
8 replacements for PFOA. And PFOA is one of the chemicals on  
9 the list.

10 This has been a rather expensive effort by DuPont  
11 to do that. All of the manufacturers of flurochemicals are  
12 replacing PFOA with something else. We decided to not just  
13 do a drop-in, but do something that would also improve the  
14 end product.

15 There are many dozens of people involved, many  
16 many millions of dollars involved in coming up with the  
17 chemistry; running the toxicology test, the environmental  
18 tests; getting the approvals through the FDA. And even more  
19 complex is getting the approvals through the European Food  
20 Safety Authority. And I can't tell you -- I'm not going to  
21 tell you the exact numbers, but it's many many many millions  
22 of dollars, including a lot of modifications to our plants  
23 to be able to handle the new chemistry.

24 Okay, so PFOA probably won't exist, or it won't be  
25 made by anybody after probably next year. But anyway, that

1 was one thing.

2           The other thing is my current job now is I'm hip-  
3 deep in REACH. I'm very involved with the responsibility  
4 for getting a number of substances approved through the  
5 REACH process.

6           And when I look through this straw proposal, the  
7 idea that it could collapse under its own weight, or it's  
8 too ambitious or so on, rings really true with me.

9           We have 139 people worldwide working just on  
10 REACH. It's going to cost, I don't know, by the time we're  
11 done, several hundred million dollars. And that's the same  
12 with BASF for Dow or any of the other large chemical  
13 companies.

14           And the amount of data, if you don't know, that  
15 comes out of this, the dossier has 10,000 fields. I mean  
16 it's physical and chemical data, use and exposure data. The  
17 use and exposure involves not just workers, but  
18 transportation, end of use, manufacture, you name it. They  
19 cover it.

20           All of the E-phate, all of the toxicology. And,  
21 again, to do a single substance, I'll give you one.  
22 Titanium dioxide. They estimate it's going to cost about \$5  
23 million to get that done through REACH.

24           The good thing about REACH is it forces everybody  
25 to cooperate with one another under the Substance

1 Information Exchange Forum, which is suggested, I think, in  
2 the straw panel, but it's sort of mandated.

3 And as far as the types of tests that are done,  
4 the individual back here talked about the .1 percent  
5 threshold level. That's true for CMRs and PVTs.

6 But there's an enormous amount of data that's  
7 going to be available through REACH. And a lot of what I  
8 hear is fairly redundant. So, I saw in a lot of the  
9 comments that either REACH or CEPA, there's information that  
10 we should avail ourselves of and try and go after, rather  
11 than reinvent the wheel.

12 But just the one thing is to keep this in  
13 perspective. Trying to do 10,000 chemicals is absurd. I  
14 mean, you know, you've got to get it down to a reasonable  
15 list. And understand that the cost to do this, I mean you  
16 can't just pull something off the shelf, it's incredibly  
17 expensive.

18 MS. SARTAIN: Thank you.

19 MS. HARRIS: Let me just jump in. I don't agree  
20 with -- I mean I don't disagree that this is an extremely  
21 broad approach that we laid out in the straw. But what we  
22 would like to hear in your comments is if you believe it's  
23 too ambitious, how we would narrow it.

24 MS. SARTAIN: Is there anyone here who wanted to  
25 -- oh, I'm sorry, go ahead.

1 MR. POOLE: Just the answer to that. Tom Jacob,  
2 who represents us up here, is probably going to be the  
3 person that's going to give those comments. I am sort of an  
4 observer here.

5 MS. SARTAIN: Tom? We like solutions, any  
6 solutions are very welcome.

7 All right. Is there anyone here who is not going  
8 to be here later in the day, and really is feeling the urge  
9 to say something at this point? Or would you like to go  
10 ahead and break for lunch?

11 I don't see any hands up, so let's take a one-hour  
12 lunch. Be back by 1:25.

13 (Whereupon, at 12:20 p.m., the workshop was adjourned, to  
14 reconvene at 1:25 p.m., this same day.)

15 --o0o--  
16  
17  
18  
19  
20  
21  
22  
23



1 MS. OSTROM: Actually I'm just going to give the  
2 presentation. Bob is available, though, for questions,  
3 he'll be answering questions.

4 I was informed that most of you had already heard  
5 my presentation at the Green Ribbon Science Panel, and not  
6 to be too repetitive. So, I'll try and speak a little bit  
7 about other things, perhaps, that we didn't get into too  
8 much. And then maybe also talk about how the Green Ribbon  
9 Science Panel comments are informing the changes we're going  
10 to make in this section.

11 So the alternatives assessment, now we know, or we  
12 don't know, about the identification and prioritization of  
13 chemicals of concern. We got a lot of comments from you.  
14 Along the lines of what Janette said, if you have additional  
15 comments or you have suggestions, we are really interested  
16 in, of course, how you feel, but also real interested in  
17 specifically what you think this should look like; the  
18 specific language; the specific criteria; the actual, you  
19 know, the specific factors. That's the detail we are most  
20 interested in.

21 Of course, you know, if you feel strongly, that's  
22 great. But we really want to know specifically how you  
23 think it should look, how it would work. And those details.

24 So, anyway, that's just a plug for that.

25 Alternatives assessment. So we've identified

1 chemicals of concern. They have been prioritized in some  
2 way. They move into the alternatives assessment. And these  
3 are performed, as you can see, they are consumer products  
4 that have been prioritized -- that contain a prioritized  
5 chemical of concern.

6 We have, as Don mentioned earlier, we determined  
7 that these would be done by the manufacturer. We thought  
8 that it would be best done by the manufacturer because  
9 they're the ones who are most familiar with their products.

10 They're the ones who know the most about what potential  
11 alternatives could be found for those. And they are the  
12 ones who are in the best position to gather data up and down  
13 the supply chain. So that's one of the reasons why we  
14 focused on the manufacturer for these.

15 This slide just presents just a real broadbrush  
16 overview of what the alternatives assessment looks like.  
17 Then the alternatives assessment, some form or summary of  
18 that assessment is submitted in some way.

19 And I think originally we had it submitted to  
20 DTSC. Right now I think what the straw proposal says is  
21 something along the lines of a notification to DTSC that  
22 it's completed. And that it be posted to some website  
23 someplace. And that we left open. It doesn't necessarily  
24 have to be the manufacturer's website. It could potentially  
25 be something that DTSC runs. The details of that have not

1 really been worked out. If you have specific ideas about  
2 how that should be, that would be a good thing to let us  
3 know.

4 And we envision ongoing updates. As long as there  
5 is a chemical of concern in the consumer product, we  
6 envision an ongoing update of the alternatives assessment.

7 One of the comments we got at the Green Ribbon  
8 Science Panel last week was that we needed to have a tiered  
9 alternatives assessment. Let me make sure we're on the  
10 right slide.

11 Our intent at tiering the alternatives assessment  
12 was to narrow the number of alternatives that would be  
13 subject to the full-blown alternatives assessment. And it's  
14 turning out the Green Ribbon Science Panel actually  
15 suggested something a little bit different, in that a tiered  
16 assessment would be a little bit different.

17 So, I'll run through what we have done, and then  
18 I'll talk a little bit -- I didn't prepare a slide, but I  
19 will talk a little bit about what the Green Ribbon Science  
20 Panel had suggested.

21 So what we had thought of in terms of a step-rise  
22 alternatives assessment is that in the first step the  
23 alternatives, potential alternatives, are identified. And  
24 that that would focus on things that are -- alternatives  
25 that are functionally equivalent to the original consumer

1 product.

2           And, again, this is one of those things where the  
3 manufacturer would determine what that equivalence means.  
4 And that they would do that by specifying specific  
5 performance factors.

6           And in recognition that there are many different  
7 kinds of products out there, you know. We heard already  
8 this morning we're talking about articles, we're talking  
9 about formulations, and we're talking about cars.

10           So, potentially it didn't seem like something we  
11 could come up with, those performance factors. We could  
12 come up with perhaps criteria for those. And it looks like  
13 we may be ending up that way. But we thought that the  
14 performance factors are process-specific, product-specific,  
15 manufacturing-specific, and that it was up to the  
16 manufacturer to come up with those. And to help identify  
17 what functionally equivalent would be.

18           The potential alternatives. We actually define  
19 that fairly broadly. That could be changing chemicals, like  
20 a substitution. Or changing process, or product redesign.

21           And then so in the first phase we identified  
22 potential alternatives. If there are no alternatives that  
23 are found, then you move on to the response actions.

24           In the second stage of our alternatives assessment  
25 if you do have identified potential alternatives, then you

1 identify those hazard categories, using the same hazard  
2 categorization that we did for the original consumer  
3 products.

4           So for the original chemicals of concern in the  
5 consumer products. So you would evaluate each of your  
6 alternatives to determine if they have chemicals of concern,  
7 using the same hazard categorization that we talked about  
8 this morning.

9           And so here you are able to eliminate those  
10 alternatives that have exactly the same hazard categories,  
11 and additional ones.

12           So if they have different hazard categories then  
13 you wouldn't eliminate those alternatives, because really  
14 thinking too much about relating, having a relative ranking  
15 of different hazard categories.

16           But if it was the same hazard category, for  
17 example, if your original chemical of concern was a  
18 carcinogen, and the alternative had a carcinogen, and say,  
19 one of the other hazard categories, say some other acute  
20 toxicity measurement, then you'd be able to eliminate that  
21 alternative, because clearly it was inferior in terms of the  
22 hazard.

23           So that was sort of our approach to tiering. If  
24 there were no alternatives, you went directly to the  
25 response action. You would document those findings and

1 submit that information to DTSC. And then you would repeat  
2 that alternatives analysis in two years in the hopes that  
3 perhaps there might be additional alternatives in that  
4 timeframe that you hadn't considered when you first did your  
5 alternatives assessment.

6 Those alternatives that did make it through that  
7 particular screening would go on to the full lifecycle  
8 assessment.

9 Now the tiering that the Green Ribbon Science  
10 Panel envisioned is a little bit different. They thought  
11 that perhaps there were tiers where in the first tier there  
12 might be enough information about a particular chemical of  
13 concern or product to know that perhaps there were no  
14 alternatives; or to know that perhaps you would want to move  
15 directly to the response actions. And that it would just be  
16 a minimum level of assessment done.

17 And then perhaps a medium level of assessment.  
18 And then there would be some chemicals of concern in certain  
19 consumer products where you would want the full lifecycle  
20 assessment.

21 So one of my questions to you is do you have any  
22 ideas about the criteria that we would use to distinguish  
23 between those three tiers. We, you know, asked the Green  
24 Ribbon Science Panel, as well, but I'm interested if you  
25 have ideas, also.

1           Oh, yeah, as Peggy says, what type of alternatives  
2 assessment, what is the appropriate level of assessment for  
3 each of those tiers? If you have ideas about that, as well.

4           So, in the straw proposal once you do have, you  
5 have assembled your potential alternatives and you've  
6 determined that they're equivalent and that they're  
7 available, you would look at the alternatives assessment,  
8 the full-blown alternatives assessment, which looks at the  
9 lifecycle factors, as well.

10           And so we created and included in the straw  
11 proposal these requirements. So, I'm now going to address  
12 the quality of the assessment. We heard that there was -- I  
13 know that a lot of you thought that you gave us comments and  
14 we ignored them, but we really didn't. We took them into  
15 account as much as we could.

16           And one of the comments we did take to heart was  
17 that people aren't certain that a manufacturer might do a  
18 good job at doing an alternatives assessment if they did it  
19 themselves.

20           And so we came up with a series of requirements  
21 that would be used as sort of the base of minimum qualities  
22 of a sound evaluation. And they're laid out in a little bit  
23 more detail in the straw proposal. And here's a summary of  
24 some of them. They have to do with completeness and  
25 accuracy and transparency. The sort of qualities you think

1 of when you think of a sound analysis.

2 In the alternatives assessment we evaluate hazard  
3 criteria, and the assignment of values. And those would be  
4 the same hazard criteria that we use for the prioritization.

5 The identification of prioritization step.

6 We originally had different additional criteria,  
7 and then thought that, you know, in the spirit of trying to  
8 get the alternatives assessment done in a simple,  
9 straightforward way, that we would use the same data instead  
10 of requiring additional hazard criteria data to be  
11 generated.

12 If then you feel that we should consider different  
13 or additional hazard criteria in an alternatives assessment,  
14 that's something we'd be interested in knowing.

15 And then we just came up with three different  
16 exposure criteria and values; they're in the straw proposal,  
17 also. And, again, if you have suggestions for additional  
18 ones. And how you would measure those. The values are  
19 important because that's how you distinguish in the  
20 alternatives assessment.

21 And then the lifecycle impacts. Ordinarily Bob  
22 steps forward to talk about those, but we have such a  
23 cursory explanation of these right now, that if you want  
24 additional details, Bob can step up and describe this to  
25 you.

1           But in general the lifecycle impacts, they're the  
2 similar impacts, they're the same ones, sort of expanded a  
3 bit, as specified in the statute.

4           But the important thing for the lifecycles, again,  
5 to define the boundaries, just the scope and the boundaries  
6 of the study. And so one of the things you can focus on  
7 when looking at the lifecycles, it depends -- the type of  
8 analysis you're doing depends on the type of alternatives  
9 you're considering.

10           If you're considering changing out a chemical  
11 substitute, and the chemicals are similar to the existing  
12 chemical of concern in the product, then there are the  
13 aspects of the lifecycle that don't change. So those you  
14 would hold constant. And you would just look at those  
15 aspects of the lifecycle that do change, depending on the  
16 alternative.

17           Now, if you're looking at a complete redesign, as  
18 described earlier, where a new chemical is being created and  
19 invented, then that's going to affect many more aspects of  
20 the lifecycle. And that is going to be a much more  
21 complicated analysis.

22           So our process is pretty detailed requirements for  
23 documentation. And all of the documentation, while it is  
24 not submitted to DTSC, it is made available to DTSC upon  
25 request, if we want to evaluate these things.

1           And it is important to remember that at any step  
2 along the way in an alternatives assessment is that we do  
3 retain the right to get this information; to evaluate the  
4 analysis. And to challenge the analysis and to challenge  
5 results. So it's not as though, you know, it's not as  
6 thought it's just going to happen and we're going to sit  
7 back and never ask questions.

8           So these are the lifecycle impacts as they're laid  
9 out in the statute. They are described in a lot more detail  
10 in the straw proposal. And I won't go into that now. If  
11 you want to discuss it, Bob would be happy to do that.

12           This is sort of the meat of the analysis, how we  
13 compare the alternatives. We select one that's best, one  
14 that's safer, one that's preferable. Choose your adjective.

15           What we proposed in the straw proposal was to have  
16 a tabular format. Anybody who's familiar with the  
17 alternatives assessment is familiar with this type of  
18 tabular format, where different impacts are laid out. Each  
19 of the alternatives, if evaluated to the same degree as the  
20 original product -- that's important to know. I know  
21 somebody mentioned that this morning, that that needed to  
22 happen. And that's what we envision in our straw proposal.

23           All of the factors that are evaluated for the  
24 product are also evaluated for the alternatives, each of the  
25 alternatives being considered. And then each of the

1 alternatives are compared to the original product. Okay.

2 Using these factors.

3 Now, our alternatives assessment was envisioned to  
4 be not a huge lifecycle -- formal lifecycle assessment with  
5 the full data collection. We envisioned it to be more  
6 qualitative. We envisioned it to be a way of identifying  
7 those regrets, potential regrets that could come from  
8 switching to an alternative without considering all of the  
9 impacts that could occur.

10 And those impacts did include costs, but not just  
11 direct costs to the company. Indirect costs to the  
12 environment and to the public, as well. So it is intended  
13 to incorporate and internalize external impacts and external  
14 costs.

15 So, anyway, in the comparison table we've  
16 identified a bunch of different impacts. And I didn't put  
17 them all in this slide. It would be impossible to read.  
18 But they are in the straw proposal. They do end up falling  
19 into four different named impact categories. Hazards and  
20 exposure, eco, resource depletion and economic impacts.

21 And then what we are suggesting is that based on  
22 the data in the analysis, the data that was gathered, and  
23 the analysis that was conducted based on that data, that  
24 these be evaluated. Each alternative is compared to the  
25 original product. And some kind of indication of its value,

1 relative value, relative to that product is included in this  
2 table. So plus/minus/equal/unknown, that sort of thing.

3           And then based on those findings we anticipated  
4 that as was the case with most of these types of analyses,  
5 in some instances some alternatives are going to be clearly  
6 superior on all counts. And others are going to be clearly  
7 inferior. But most of them will fall somewhere in the  
8 middle.

9           And most of them will be better on some impacts,  
10 worse on other impacts. And we did not come up with a kind  
11 of ranking of impacts. And that's one of our questions to  
12 you, is should we try to rank those impacts that come up.

13           For us, it is our opinion that the selection of  
14 the alternatives should be based on the objectives of the  
15 company that's making the change. That they consider the  
16 performance factors, and they consider, you know, the locale  
17 of where they're doing an assessment for some of these  
18 impacts. And whether an impact in one location might not be  
19 as important as the impact in another location.

20           So because of those types of variabilities, and  
21 because it is not one-size-fits-all, we thought that we  
22 would leave it up to you, the manufacturer, to make the  
23 determination as to whether the alternative is superior to  
24 the consumer product. And to document and justify that  
25 determination.

1           And so the findings report contains a formula of  
2 the findings. And that documentation of that decision or  
3 determination that they make.

4           And then so they go into a fair amount of detail  
5 about their decision process. In this instance, again, it's  
6 the manufacturer who decides this.

7           Now, we can get more detailed information from  
8 them. We can ask for their lifecycle information; we can  
9 ask for their data. If we know of more alternatives that  
10 they didn't consider, we can suggest that to them. There's  
11 a fair amount of flexibility in the process, but ultimately  
12 it's the manufacturer who makes the determination.

13           And we had some provisions in there that the  
14 findings report will be made available to the public in some  
15 way. And there was a fairly lively discussion this morning  
16 about CBI and how one -- CBI related to the identification  
17 and prioritization section. It's really important here,  
18 too.

19           All of those considerations about competition and  
20 about R&D information, and about protecting, you know, a  
21 company's interest in protecting their interests, all rolled  
22 against the public's interest in knowing which alternatives  
23 were evaluated. Competitors' interest in knowing which  
24 alternatives were evaluated.

25           And people who have alternatives; their interests

1 in knowing, you know, maybe they have an alternative that  
2 wasn't evaluated and ought to be evaluated.

3 So, you know, we're trying to come up with a way  
4 to -- and that was actually the purpose of the findings  
5 report. We thought that the information in the findings  
6 report could be general enough that it could be released  
7 without seeking CBI protection. But that it be detailed  
8 enough that people could comment and gain some insight from  
9 it.

10 And if it doesn't, let us know. And let us  
11 specifically know how you get around that.

12 So, again, we have -- documentation that the  
13 alternatives analysis was done. And again, if there were no  
14 changes to the consumer product, if none of the alternatives  
15 were selected, or if an alternative was selected and it  
16 still contains a chemical of concern, perhaps a different  
17 one, then the alternatives assessment is repeated. And it  
18 continues to be repeated every two years.

19 Now, it's important to remember and to note that  
20 in our straw proposal we do have an option for a third-party  
21 participation. And we would hope to include some sort of  
22 third-party program in these regs. And we just didn't get  
23 to it. So we hope to actually come up with some kind of  
24 follow-up regs that do include some sort of third-party  
25 option.

1           So if you have specific suggestions on what that  
2 looks like, should it be mandatory. If it is mandatory, how  
3 does it take place. If it's not mandatory, how does it take  
4 place. And, you know, we're interested in that.

5           And also it's important to note that we looked at  
6 lots of models for alternatives assessment. And a lot of  
7 models are very specialized. Some of them use algorithms  
8 that are not readily accessible and known in terms of coming  
9 up with the decisionmaking criteria for deciding among  
10 different dissimilar attributes.

11           So, if somebody wanted to use a model, they're  
12 welcome to use a model. They just have to be sure that all  
13 the impacts that we have laid out in our whatever our regs  
14 look like are addressed by that model. Okay. So you would  
15 need to get the manufacturer, the programmer or a rep of the  
16 model to insure that all those impacts are covered in that  
17 model.

18           But we elected not to incorporate a model in this  
19 regulation in the interest of transparency.

20           So our questions: Should the comparison of  
21 alternatives specify preference perhaps in safety  
22 attributes? And these questions sort of address the rating  
23 or ranking of the different impacts.

24           Now, we did incorporate sort of an implicit  
25 ranking in our sort of tiered system, where we say that in

1 the second stage of evaluation you have to compare the  
2 hazard categories. So there is sort of an implicit ranking  
3 for at least that particular hazard categories.

4 But there is no ranking at the end. And there is  
5 no indication at the end of how to evaluate or compare  
6 against those alternatives.

7 Now the Green Ribbon Science Panel suggested that  
8 we come up with criteria. That we just use heuristics,  
9 common sense, and just come up with a set of criteria that  
10 one would use to compare the dissimilar attributes.

11 We spent some time looking at what's a criteria  
12 decision also. Most of those do rely on rankings, though.  
13 So if you have suggestions for what criteria would look  
14 like, what heuristic criteria should look like, if we should  
15 use ranking or not use ranking, let us know specifically  
16 what those suggestions might be.

17 And then again this is accountability in the self-  
18 implementing, feeling as though the manufacturer maybe will  
19 not do a good job and will just see this as a paperwork  
20 requirement. I realize many people think that the solution  
21 to that is to have DTSC do it. And it just, you know, the  
22 variety of products, I don't know that any one entity can do  
23 a good job on alternatives assessment across the huge  
24 variety of products we're talking about. So, are there  
25 other ideas that people might have for insuring that

1 quality.

2           What should be included in addition to things  
3 we've thought about to insure that all potential  
4 alternatives are considered, that people don't just discount  
5 alternatives?

6           The functional equivalency and protocol that we  
7 came up with was really intended to be a floor, not  
8 necessarily a ceiling. That was intended to insure that at  
9 least some alternatives, just very basic alternatives, would  
10 be considered. Anybody could consider additional ones.

11           But did we build our floor in the right place?  
12 Are there different ways of doing this?

13           And then my final questions had to do with costs.  
14 We have to evaluate the cost impacts associated with these  
15 regulations. So, if you have ideas on how much it would  
16 cost, if you are a manufacturer and you feel that perhaps  
17 you manufacture a product that might be subject to these  
18 requirements, how much would it cost for each step in the  
19 process?

20           Are you already performing an alternatives  
21 analysis for your products? I'm feeling that a lot of  
22 companies already do this. Some people did this as part of  
23 R&D. Some people have done this all along, but then just  
24 for different purposes. And then started adding some of the  
25 sustainability and some green chemistry type criteria into

1 their evaluations of products as they evaluate new products  
2 or changes in their products. So are you currently doing  
3 that?

4 And then as a whole, how much do you think -- now  
5 this is kind of a difficult question to ask, because we  
6 don't really have a regulation yet, all we have is the straw  
7 proposal, and I guarantee you it will change. But if you  
8 have an idea of how much this would cost per product, we're  
9 interested in that, as well.

10 So that's all I had prepared to say. Are there  
11 questions, comments? Our friend from DuPont.

12 MS. SARTAIN: If possible, could we start with the  
13 gentleman in the back over here who was kind enough to wait  
14 for his question? Thank you.

15 MS. OSTROM: I'm going to sit down so I can take  
16 notes.

17 MR. FISCHBACK: Thank you. I'm Randy Fischback  
18 with the Dow Chemical Company. I'm glad you asked that  
19 question at the end about cost, because one of my comments  
20 was going to be about beta testing this, or testing a few  
21 products and see what it takes to go through that. And  
22 that's a question that I asked when the Green Ribbon Panel  
23 was there.

24 But also one of the guys on the Green Ribbon Panel  
25 said that he was testing, I think, a fire retardant in

1 circuit boards, and said that they had seven alternatives  
2 and they've been at it for four years, and lots of money.  
3 And then it sort of dawned on them at the end of the game  
4 that they had to consider products of combustion of the same  
5 fire retardants. And that they'd gotten a grant for \$75,000  
6 to do that, and that wasn't going to nearly begin to deal  
7 with that extra problem that they had tacked on the end.

8           So I think your cost question is a good one. I  
9 don't know that I have an answer to that. I'm sure my  
10 company has done some of that. I'm not familiar with what  
11 they've done.

12           The other question I really wanted to bring up,  
13 though, was the scope of the alternatives analysis. It's  
14 not clear to me what a company has to do to consider what's  
15 in an alternatives, what is considered an alternative.

16           Is a glass drinking bottle an alternative to a  
17 plastic bottle? Or is a metal bottle an alternative to a  
18 plastic bottle? Is mass transit an alternative to an  
19 automobile? Is a paper bag an alternative to a plastic bag?

20           I don't know the answers to those. You know, it  
21 easy to look at solvent A and solvent B, or widget A or  
22 widget B, but what if there's a different way to do it. So  
23 I think you need to just spend some more time talking about  
24 the alternative.

25           I'm also worried about that alternative to

1 somebody's discovered, you know, in Scandinavia that my  
2 company's unfamiliar with. And I get sued because I wasn't  
3 familiar that alternative was even out there.

4           So those are some of my issues. And I apologize  
5 because I don't have answers to those, and I know you're  
6 looking for answers. Although I would sort of echo John  
7 Ulrich's comment that the Green Chemistry Alliance has spent  
8 a lot of time putting together some regulatory language that  
9 we would love to see reflected in some of your own straw  
10 language.

11           Thank you.

12           MS. HARRIS: Randy, don't give up your microphone  
13 because I am going to ask you a question.

14           MR. FISCHBACK: Okay.

15           MS. HARRIS: What does the beta test look like in  
16 the regulations? How do you write a regulation that  
17 incorporates a beta test, do you know? I mean, do you have  
18 a suggestion?

19           MR. FISCHBACK: I guess I wasn't considering a  
20 beta test in the regulations so much as I was considering  
21 the department running through this exercise even as you're  
22 developing the regulation --

23           MS. HARRIS: Prior?

24           MR. FISCHBACK: Yeah, prior, --

25           MS. HARRIS: Okay.

1 MR. FISCHBACK: -- basically taking examples,  
2 saying let's grab something. I think it was Bill Carroll of  
3 the Green Ribbon Panel mentioned sulfuric acid. There's a  
4 lot of sulfuric acid in commerce. And he couldn't imagine  
5 that car batteries would go away in a 20-year time period.

6 So, what if you ran a test on sulfuric acid and  
7 said, what would happen to sulfuric acid if we ran it  
8 through the whole system.

9 MS. HARRIS: Okay.

10 MR. FISCHBACK: Thanks.

11 MS. HARRIS: Thank you.

12 MS. OSTROM: In answer to your question about the  
13 potential alternative, I'll read to you what we've included  
14 in the regs, and then I'll interpret it, or in the straw  
15 proposal, and I'll interpret it for you.

16 What we included as a definition for potential  
17 alternative was a change in chemicals, materials,  
18 production, processes or design for a particular product.  
19 Potential alternatives may include, but are not limited to,  
20 alternatives resulting in chemical substitution,  
21 elimination, process change, material substitution, product  
22 redesign or a change in systems or operations.

23 And, in short, the answer to your question is that  
24 we envision, as I mentioned earlier, that's the floor. If  
25 somebody wants to go beyond that, they can. But we did not

1 envision if you were a manufacturer of plastic baby bottles  
2 that you would then also have to consider glass baby bottles  
3 as an alternative. You could if you wanted to. But that  
4 wasn't envisioned as an alternative.

5           Some of us did envision that at the outset, but it  
6 was taken out. So that's the interpretation of that.

7           Question? Oh, sorry.

8           MR. POOLE: Yeah, Doug Poole with DuPont, again.  
9 On the question of costs, one thing I wanted to add, and I  
10 could have added it when I was talking about what we were  
11 doing in going through our PFOA replacement, is our customer  
12 base.

13           We have 28 different market segments that we have  
14 to address. Most of these think of fluoropolymers maybe as  
15 pots and pans. That's significant, but it's just one part.  
16 Goes into all sorts of stuff.

17           And so we have to go through product approvals  
18 with our customers. Some of the approvals, like in the  
19 military section, take as long as five years. Automotive  
20 takes, I don't know, three years.

21           So you have to take that into account. And  
22 that's, you know, some of that's direct cost by the  
23 manufacturer, but other is costs that are incurred by  
24 customers and so on. And also adds to the time.

25           Secondly, number five, performed alternative

1 analysis. I just want to bring up, for example, in moving,  
2 say, from an oil-based product to something that comes from  
3 a renewable resource. I think Tom has talked in the past  
4 about a product called 1,2 propanediol, which we're now  
5 deriving from corn using bugs to develop it.

6 It's many years in developing, but now it's  
7 replacing 1,2 propanediol that comes from oil. And it's  
8 used to make polyester, which goes into carpets and is now  
9 on the market.

10 And again, this was, as Randy was discussing, some  
11 of these things, you know, they take five, six, seven, eight  
12 years to do, and they cost, you know, millions of dollars.  
13 And I want to keep throwing out the reality of the time and  
14 the effort that goes into making some of these -- coming up  
15 with some of these alternatives.

16 I know there are some that you could probably do  
17 replacing one solvent with another, and we're going through  
18 some of that internally. But even that takes months, and  
19 you know, chemists, too, involved with it.

20 Thank you.

21 MS. NELSON: Laurie Nelson on behalf of the  
22 Consumers Specialty Products Association. And first off I'd  
23 like to agree with Gretchen on one thing, I would not want  
24 your job for anything.

25 That said, one of the reasons --

1 (Laughter.)

2 MS. NELSON: One of the reasons that industry came  
3 out in support and neutrality of the whole green chemistry  
4 concept is that we didn't think the chemical-by-chemical ban  
5 was working in the legislature, with all due respect to the  
6 legislators. We thought it was better given to the state  
7 scientists to do all of the process to identify and  
8 prioritize chemicals of concern.

9 So, that said, I have two questions for DTSC.  
10 Number one is you have a list of 16 chemicals which I would  
11 be very interested in what the process was in developing  
12 that. Since we said, no, we don't want the legislature to  
13 do chemical-by-chemical bans. Why were those 16 chemicals  
14 selected as part of your prioritization list. That's the  
15 first question.

16 And the reason that's important as far as  
17 alternatives is that it appears as though all chemicals of  
18 concern, and we can debate on how many chemicals of concern  
19 are listed here, but 7000, 8000, somewhere around that  
20 number.

21 It looks as though all of those within a 20-year  
22 timeframe end up being banned. And that's a question to  
23 DTSC. Am I perhaps misreading the regs? Because in the  
24 legislation there was a wide variety of alternatives that  
25 you could use, from no action, labeling, certain kinds of

1 containment.

2 But here it looks as though you have a chemical of  
3 concern. You go through an alternatives analysis. You  
4 either have an alternative or the chemical is banned.

5 Thank you.

6 MS. OSTROM: Don, do you want to talk about the  
7 chemicals?

8 MR. OWEN: The list of the 16 specified chemicals,  
9 which is the second pathway, represent those -- essentially  
10 supposed to elicit discussion about uncertain science among  
11 authoritative bodies where different decisions are made  
12 about a chemical.

13 They also, said very simply, are those that were  
14 presented to us throughout the ten months of workshops, and  
15 WIKI and others. As the straw proposal we're not married to  
16 them, but we were trying to explore several issues that  
17 those represent. Most especially how do we deal with  
18 uncertainty, lack of information, or disagreement among  
19 experts.

20 There are other ways to do that. So that's just  
21 by way of background where that list came from. It came  
22 from many of the people in this room.

23 I might mention a group of legislators did send us  
24 a letter giving us specific chemicals. But we have heard  
25 them in other workshops.

1           Whatever the size or dimension or scope of the  
2 number of chemicals on list of lists, I'll defer to Evelia  
3 and Nancy regarding the outcome of alternatives analysis.  
4 Remember, this is not chemicals, it's chemicals in consumer  
5 products.

6           So, as Nancy said, the alternatives analysis piece  
7 is from a product to an alternative product.

8           MS. RODRIGUEZ: I get to answer the question about  
9 the ban. And I want to clarify that it is not a ban in that  
10 it encompasses a specific chemical as banned by a specific  
11 date.

12           We have started this process by bringing in a  
13 product. And then we're identifying the chemicals in there.  
14 And if they meet the hazard criteria, then they're  
15 prioritized by exposure.

16           The original products that were chosen were deemed  
17 to be of high exposure to sensitive populations. That's how  
18 we picked those original nine categories.

19           So what we were actually doing is restricting the  
20 use of a chemical with one of those ten hazards in a product  
21 that had exposure to a sensitive population. That's what  
22 the intent was.

23           And then somehow at the beginning of our process  
24 it got altered. And we haven't gone back to fix that. We  
25 know that needs to be fixed.

1           So the way the proposal is currently written,  
2 you're right, we appear to ask for millions and billions of  
3 dollars to be spent on information, and only to reward you  
4 with a ban at the very end. That is not what we want.

5           We want monies and resources to be spent  
6 effectively. Just as we are limited in our resources, we  
7 understand that money is better spent protecting and not  
8 just generating data.

9           MS. SALTER: Gretchen Lee Salter with the Breast  
10 Cancer Fund. I have a couple of questions. So, first,  
11 maybe I'm not seeing it, or maybe I'm just not reading this  
12 correctly, but is there a requirement in the draft straw  
13 proposal that if a safer alternative is found, that the  
14 manufacturer needs to implement that.

15           MS. RODRIGUEZ: No.

16           MS. SALTER: No.

17           MS. RODRIGUEZ: No.

18           MS. SALTER: Okay.

19           MS. RODRIGUEZ: The way we drafted the  
20 regulations, now we didn't require that they select a safer  
21 alternative. The definition of that is still up in the air.

22           But that we crafted the response action so that it would  
23 encourage somebody to select a safer alternative. So if  
24 they elected not to select a safer alternative, they went to  
25 a more stringent response action.

1 MS. OSTROM: Okay, and I'm a little bit troubled  
2 by the answer to Randy's question, specifically using the  
3 baby bottle example. That a bottle manufacturer need not  
4 look at a different kind of material as a possible  
5 alternative, that that's an option, but that they need not  
6 do that. I think that fundamentally goes against what most  
7 of us were intending this product regulation to be.

8 You know, in a lot of our conversations we had  
9 talked about there are just certain problematic chemicals  
10 and problematic ingredients and problematic materials. And  
11 to not require manufacturers to consider all of the  
12 alternatives -- and I know you can't consider all of them.  
13 I realize it's difficult. There may be some alternative out  
14 there, but I think something as simple as baby bottles or  
15 plastic bags, when you know that paper is an alternative or  
16 canvas is an alternative to plastic bags. You know that  
17 stainless steel and glass is an alternative to plastic baby  
18 bottles.

19 It's a little short-sighted. And I think that  
20 points out why this self-implementing scheme is inherently  
21 problematic in that it does not take all the alternatives  
22 into account, and decide what is best for public health.  
23 But rather what the company knows and is capable of doing.

24 MR. LEACOX: Daniel Leacox with Greenberg,  
25 Traurig. Just picking up on your last comment, it seems to

1 me if you put together the fact that there are limited  
2 resources, and that what we're trying to accomplish is a  
3 public health benefit, that the only way really to get there  
4 is to incorporate, in a more realistic way, the factors of  
5 risk. Both in this section of comparing alternatives, and  
6 also in the previous section of identifying hazard traits  
7 and establishing the priorities.

8           If you don't, I think you're going to wind up with  
9 an allocation of resources where many dollars and manhours  
10 are spent on characterizing hazards in areas where the  
11 potential health benefit is very minuscule.

12           And there was some discussion earlier about  
13 business practices. And I daresay that the first business  
14 practice that should be codified is to really look for where  
15 the real public health opportunities are. And, again,  
16 that's in risk.

17           And so a specific example is where you  
18 characterize exposure only in terms of, you know, a period  
19 of time of contact. You've really left out any factor of  
20 dose or any real health related factor. You have to get all  
21 the way to what is the real risk there. And that would be  
22 getting to dose, and dose response.

23           So I think that's just kind of fundamentally  
24 throughout all of these sections, is just that falling short  
25 of really reaching that understanding of the risk in a

1 product, and in the alternatives. And I think you have to  
2 keep in mind that the alternatives have to meet this same  
3 rubric, this same system of evaluation.

4 And in getting to that prohibition factor, that's  
5 critical because the lifespan of a product is a critical  
6 factor in encouraging development.

7 MS. SARTAIN: The gentleman in the blue suit here.  
8 Do we have a microphone for this gentleman? Oh, okay.

9 MS. BOWMAN: My name is Heather Bowman. I'm here  
10 with Holland and Knight on behalf of Coke Industries. And  
11 what we wanted to do is just present an idea of a solution  
12 to some of the issues that we've heard talked about today.

13 One is the issue that we've heard from some of the  
14 NGO community that they've got some concerns with the self-  
15 implementation aspect of this. The timeline issue that  
16 we've heard from a lot of the industry, that LCAs take,  
17 sometimes for especially complex products and products that  
18 may have a lot of alternatives. Those LCAs can take quite a  
19 bit of time.

20 So the idea that we would like to put forward is  
21 the idea that once you've determined that you have a covered  
22 consumer product that needs to go through an alternatives  
23 assessment, that the manufacturers would then submit a  
24 workplan that would outline the timeline that they  
25 anticipate the alternatives assessment taking. And the

1 methods that they will be using to go through that  
2 assessment.

3 We believe that this, in addition to addressing  
4 some of the issues of what is industry doing, also will show  
5 what they are doing. So therefore, addressing the issue of  
6 transparency.

7 In addition, we think that this also helps to  
8 address some of the industry concerns regarding the level  
9 playing field. Because if you see that manufacturers are  
10 submitting workplans you know who's doing what. And if  
11 there's an obvious company or a product that has not  
12 submitted a workplan, then you'll know from that point on  
13 that that's where you need to focus some of your enforcement  
14 options.

15 In addition, we also think that there needs to be  
16 a simplified approach to this LCA, focusing on key aspects  
17 of concern in the product. Why are we looking at this  
18 product? Why are we looking at these chemicals of concern?  
19 And focusing in on those key aspects so that we can really  
20 get to the solutions that the green chemistry and safer  
21 alternatives regulation is trying to get at.

22 Thank you.

23 MS. OSTROM: I have a follow-up question.

24 MS. BOWMAN: Okay.

25 (Laughter.)

1 MS. OSTROM: Back at you. So do you envision the  
2 workplan that you're suggesting to be a public document,  
3 that would be available for the public? Or we would maybe  
4 post something on a website like some summary of who  
5 submitted what, and how long it's going to take, or  
6 something like that?

7 MS. BOWMAN: We're definitely open to whatever  
8 makes it easiest for the department in that sense. And that  
9 it would be public that those have been submitted. Whether  
10 the entire workplan is --

11 MS. OSTROM: Um-hum.

12 MS. BOWMAN: There may be aspects of the workplan  
13 that need to be submitted as CBI, but, you know, in  
14 envisioning what it is, it's really an outline of here's  
15 what we're looking at, here's why, and here's our path  
16 forward.

17 So, it's possible that we can develop that in a  
18 way that could be a public document, and that could be  
19 commented on and approved by the department as we move  
20 forward.

21 MS. OSTROM: Thank you. I have another question,  
22 too. When you suggested about simplifying the LCA, we  
23 thought we simplified it pretty extensively already.

24 Can you suggest which aspects of the LCA, which  
25 impacts might be ones that we wouldn't have to evaluate?

1 MS. BOWMAN: Well, I think that it depends -- and  
2 I apologize for --

3 MS. OSTROM: We may agree.

4 MS. BOWMAN: -- it depends, and we're working  
5 internally to try to identify what some of those areas might  
6 be. I think focusing in on -- part of the answer is  
7 focusing in on why we're at this place to begin with.

8 So, why are we looking at this product? Why are  
9 we looking at this chemical? And then focusing in on those  
10 issues.

11 Not ignoring the other concerns, because obviously  
12 that's what we need to deal with. But really focusing in on  
13 those key aspects so that we can get to solutions.

14 MS. OSTROM: If you come up with something will  
15 you send it to us?

16 MS. BOWMAN: Absolutely, we plan to.

17 MS. OSTROM: Okay.

18 MS. BOWMAN: Thank you.

19 MR. BOUGHTON: I think I might respond to the --  
20 one of the -- my understanding, my interpretation of the  
21 statute, one of the ideas behind using lifecycle thinking is  
22 to identify potential regrets. Without having a broad-  
23 based, comprehensive look, you may not see the next MTBE.

24 So, you can't truncate and consolidate necessarily  
25 a priori. So setting up the decision rules, I mean it's

1 real easy to stand there and say, oh, this is too big, it  
2 needs to be made smaller.

3 Tell us the decision rules that we would put in so  
4 people would follow that. Because otherwise we can come up  
5 with all sorts of things.

6 The same thing with weighting. If you want to  
7 talk about weighting, what are the decision rules. How are  
8 we going to come up with those numbers for weighting?

9 The other thing we talked about before was instead  
10 of necessarily weighting, was there some sort of grouping  
11 where particular impact categories would be of the highest,  
12 and they would be grouped as a tier one and a tier two and a  
13 tier three. Is that a concept that could be used?

14 So there's all sorts of different ways to scramble  
15 it where you don't have to have weighting values, but you  
16 could have them grouped or tiered or top-down ordered,  
17 something like that.

18 So whatever people can come up with it would be  
19 real helpful.

20 MS. SARTAIN: May I just quickly interject here.  
21 If you're an attorney it would help us a lot if you could  
22 let us know not only your name and the name of your  
23 practice, but also who you're representing. Thank you.

24 MS. LILY: Hi. I'm Amy Lily with Honda. I wanted  
25 to say I think Heather's idea was very good, but I also

1 wanted to say that, in Europe, once again with the ELV  
2 directive, we have some experience with exemptions and doing  
3 alternatives analyses.

4           And what the industry has done in those cases,  
5 take for example lead in bushings. Everybody has worked  
6 together, considering these analyses are very expensive, to  
7 try to pool their resources, including the suppliers, you  
8 know, the people, you know, down the chain. So that  
9 everybody's involved and they work together. They submit a  
10 plan together, which has to be approved by the agency.

11           And so we would like to support, in cases maybe --  
12 it might not apply in all cases, but for specific uses I  
13 think that is a very good approach to take.

14           And in getting to the lifecycle analyses, I'm not  
15 sure if those were all spelled out in the legislation, that  
16 all those have to be included. But, for instance, having to  
17 do an analysis of climate change, what all do you have to  
18 take into account. The whole lifecycle of climate change?  
19 I think there does need to be a little bit more definition  
20 because that, in and of itself, could be an exercise in, you  
21 know, years and years of gathering information.

22           So I think it's just getting more clarity of what  
23 we really would need to put together. We do like the  
24 assessment tool that you're put together. We think that  
25 would be very helpful.

1 MR. MAGAVERN: Bill Magavern, Sierra Club  
2 California. First of all, we think alternatives assessments  
3 and lifecycle analysis can be very useful tools. We  
4 appreciate the thought and the work you've put into  
5 incorporating them.

6 I think it's really essential not to define the  
7 alternatives too narrowly. So in agreement with Gretchen,  
8 you need to look at an alternative that fulfills the  
9 function of the product.

10 So just if you're looking at something like baby  
11 bottles or wood preservatives, it's not enough just to look  
12 at, well, what are the other chemicals that we could drop in  
13 here. But there might be a completely other way of  
14 fulfilling that function that doesn't involve using those  
15 chemicals at all.

16 Secondly, the question of who performs the  
17 assessments. A scientist who has actually been responsible  
18 for a lot of nontoxic alternatives said to me, if industry  
19 is doing alternatives assessments, then there won't be any  
20 alternatives.

21 So that's a real concern. I think you really  
22 should build in a requirement for evaluation assessments  
23 done by third parties. And then have a process for  
24 certifying those third parties that is rigorous and allows  
25 for a decertification by the department if necessary.

1           An additional check, of course, would be to make  
2 these assessments public, so everybody can scrutinize them  
3 for possible green washing.

4           And also I think it is important to have the  
5 possibility of tiered assessments. And there should be a  
6 matching of the scope of the assessment to the scope of the  
7 regulatory response. And this is another suggestion that  
8 doesn't really fit into your model of the self-implementing,  
9 but would fit in if you adopted our suggestion that for some  
10 regulations the department actually initiate the regulatory  
11 action.

12           So, for example, and this is something we strongly  
13 recommend, if you have products for which the department has  
14 already enacted a prohibition on disposal to landfill, it  
15 shouldn't require a full-blown alternatives assessment to  
16 say, well, the manufacturer should be responsible for the  
17 end-of-life management of those products.

18           You wouldn't be taking anything off the market, so  
19 you don't need to do an assessment of every possible  
20 alternative. You just need to look at what would be the  
21 consequences of a standard producer responsibility. And  
22 that's something that we hope the department will initiate  
23 in the early stages of this implementation.

24           Thank you.

25           MR. CALLAHAN: Thank you. Robert Callahan with

1 the California Chamber of Commerce. Because the slide in  
2 front of me was talking about costs I figured now would be  
3 as good a time as any to make a couple comments, big picture  
4 comments, if you will.

5 Number one, we need to keep in mind, as we go  
6 through this process, the tremendous cost that will be borne  
7 by the business community as they attempt to comply.

8 And the straw proposal in front of us today, I  
9 think, has tremendous costs along with it, because the scope  
10 and the breadth is very excessive in our opinion.

11 And we need to insure that the regulations are  
12 cost effective and that they protect the commercial and  
13 economic feasibility of products. Because the cost to  
14 society of having beneficial products pulled from the  
15 shelves due to compliance, you know, compliance hurdles, or  
16 complications with, you know, an excessive regulation, far  
17 outweigh the incremental benefits to the environment that  
18 would occur. So I think these are things we need to be  
19 cognizant of as we go through this process.

20 Again, I think we reiterate the workability and  
21 reasonable regulations proposed by the Green Chemistry  
22 Alliance. And we associate ourselves with that draft  
23 proposal. And, again, we believe that we can do this in a  
24 cost effective manner while providing environmental  
25 benefits. We don't think those two are mutually exclusive.

1           So we do think this program can be implemented in  
2 an effective way, protecting the environment and keeping  
3 cost low for the business community. Thanks.

4           MR. BOUGHTON: One thing I might say in response  
5 is that I believe that the whole green chemistry concept and  
6 the Initiative is predicated on the tremendous cost to  
7 society that is not borne by manufacturers, in human health  
8 and in eco costs.

9           So I think what we're trying to do is to find some  
10 sort of balance there. It's not all about what it costs the  
11 manufacturer to make something. Society pays a huge price  
12 right now for these chemicals in us, in you. And how do we  
13 find some balance there to push that back.

14           That's, I believe, one of the -- what this is  
15 predicated on.

16           MR. CALLAHAN: And my comment was only in regards  
17 to products being forcibly pulled from the shelves due to  
18 some sort of complication with compliance with the  
19 regulation -- the loss of benefits from those products which  
20 are being used by society-at-large today -- due to some sort  
21 of, you know, hiccup in the regulation.

22           I was considering the balance of cost and benefits  
23 from that perspective.

24           MR. HACKMAN: Andy Hackman with the Toy Industry  
25 Association. One comment, you know, one of the aspects

1 that's looked at in the alternatives assessment is  
2 performance and equivalence to the alternative that's being  
3 replaced.

4 I think one aspect that needs to be considered  
5 here is a safety factor. For example, if you move from  
6 plastic that has shatter-resistant capabilities in a toy to  
7 glass, you create an inherent safety hazard by moving to  
8 that alternative. And those trade-offs need to be  
9 considered and evaluated in terms of just moving from a  
10 chronic exposure concern to the safety hazards that might be  
11 created by moving to that alternative.

12 And I think something needs to be delineated here  
13 around safety of the characteristics that you're moving  
14 towards.

15 MS. OSTROM: So you're suggesting in the  
16 alternatives assessment one of the attributes we should  
17 include is safety?

18 MR. HACKMAN: Yeah --

19 MS. OSTROM: Okay.

20 MR. HACKMAN: -- safety. I think it might be  
21 captured under the performance factors element --

22 MS. OSTROM: I think that's where we thought it  
23 would be.

24 MR. HACKMAN: I think it needs to be called out  
25 more directly, because if you're looking just at performance

1 of a physical action, say it's a chemical that reacts in a  
2 certain fashion in a product, you wouldn't necessarily  
3 consider that in terms of performance and safety factors.

4 One chemical or one product may have a specific  
5 safety profile, and that profile may be significantly  
6 different in another product that's used.

7 MS. OSTROM: Thanks. Bill, if I could, I wanted  
8 to follow up on your comments. You were saying about the  
9 third-party approval, sort of certified third party. Do we  
10 envision that as something that DTSC would administer, some  
11 kind of a certification requirement?

12 And also would you consider then that the third-  
13 party performance of the alternatives assessment would be  
14 mandatory for all products?

15 MR. MAGAVERN: Yes. Since the department doesn't  
16 have the resources to do the assessments, rather than just  
17 leaving them up to industry, which actually have an interest  
18 in not identifying alternatives, then there should be  
19 professional third parties that industry could go to.

20 Yes, to prevent those third parties from just  
21 providing the company with what it wants to hear, there  
22 needs to be a certification process, which I think DTSC  
23 would be the logical certifier.

24 MS. OSTROM: How would you envision that working  
25 for like overseas manufacturers?

1 MR. MAGAVERN: Well, overseas manufacturers are  
2 going to have to comply with California law. So, you know,  
3 they're going to be engaged here.

4 MS. OSTROM: Okay.

5 MR. MAGAVERN: Yeah.

6 MS. OSTROM: What do you think about our ideas of  
7 doing it as a separate, sort of follow up package?

8 MR. MAGAVERN: That would be paired with this?  
9 Just come along later?

10 MS. OSTROM: These regs, as you know, need to  
11 pretty much hit the street --

12 MR. MAGAVERN: Right.

13 MS. OSTROM: -- pretty quickly here in order to  
14 meet our deadline. So, this would probably -- that would  
15 probably be closely followed while these regs are in the  
16 process. We would begin preparing another package at that  
17 point.

18 MR. MAGAVERN: Um-hum. I think that might be one  
19 way to do it as long as it were joined closely enough that  
20 we wouldn't get a situation where those regs never happened  
21 and we got stuck with only industry doing the assessment.

22 MS. OSTROM: It would be awkward to have a  
23 mandatory program and no requirements, huh?

24 MR. MAGAVERN: And I think part of these regs you  
25 would want to have certainly the standards for doing the

1 assessments. You might not need to spell out everything in  
2 the regs, but you could set broad standards.

3 MS. OSTROM: Standards. Do you have suggestions  
4 for that? Or could you send something like that?

5 MR. MAGAVERN: We'll work on it.

6 MS. OSTROM: Okay. Thanks.

7 MR. ULRICH: John Ulrich with the California  
8 Chemical Industry Council and the Green Chemistry Alliance.

9 MS. SARTAIN: I'm sorry, sir. Could you give us  
10 your name, again?

11 MR. ULRICH: Yes. John Ulrich.

12 MS. SARTAIN: Thank you.

13 MR. ULRICH: I'd like to take some exception with  
14 the comment of the previous speaker with regard to  
15 development of alternatives. I think it was indicated by  
16 the chair at the Science Panel on the 14th that certainly  
17 industry has a bias, but the bias doesn't necessarily mean  
18 that it's somehow or another going to do something  
19 unethical.

20 Also I think it's important to recognize, once  
21 again, that regulation isn't the driving force for  
22 innovation. If that were the case we wouldn't have so many  
23 alternative products today.

24 Competition between companies drives product  
25 development. Also competition within companies drives

1 product innovation and development.

2 I worked for a large chemical company for 35  
3 years, and I can assure you there were product groups that  
4 competed inside that company with other product groups to  
5 develop safer and different products.

6 The same is true, look at all of your materials  
7 when you go into a Walmart, and look at the number of  
8 products on the shelf that compete with one another.  
9 They're not all the same product.

10 Now certainly competition is a motivator that will  
11 drive innovation. And I think to the extent that we look at  
12 regulation to drive innovation, we are going to stifle  
13 innovation and we're going to slow everything down.

14 So, again, I recommend to you that you focus very  
15 heavily, and not look at this thing as a broad, broad  
16 regulatory program.

17 Thank you.

18 MS. KOEPKE: Thank you. Dawn Koepke with McHugh  
19 and Associates, on behalf of the Green Chemistry Alliance,  
20 again.

21 One comment that I just wanted to react to that  
22 was made earlier with regard to the overall costs to  
23 society, as it pertains to chemicals. Chemicals also  
24 provide great benefits to society. So I just wanted to  
25 counter that point.

1           But also with regard to the third-party issue.  
2 With all due respect to the previous speaker, just wanted to  
3 take a slightly different approach on that.

4           The Green Chemistry Alliance didn't say outright  
5 in their proposal that we were opposed to third party. That  
6 said, we provided an opportunity for manufacturers to choose  
7 of their own decision to utilize a third party to help back  
8 up zero claims regarding their alternatives assessment.

9           We think that voluntary approach is a workable  
10 one. Especially when you compare that or put that also with  
11 the approach that my other colleague, Heather Bowman,  
12 mentioned with regard to the workplan approach.

13           We think that the workplan approach that Heather  
14 described would be a very workable one. We think that it  
15 would address a lot of the concerns that have been laid out  
16 with regard to the self-implementation piece of this.

17           It would be provided in some transparent manner.  
18 The details of that we just need to flesh out. We're  
19 willing to work with stakeholders to do that.

20           But we think that that, in and of itself, is the  
21 key piece of making sure this is transparent. That we're  
22 addressing all the components that need to be in statute, as  
23 well as the regulation. And would also be provided an  
24 opportunity that other stakeholders, DTSC, as well as  
25 outsiders, could provide some input or comment on.

1           And if there was something missing that can be  
2 challenged. And there would be, we envision, an opportunity  
3 for that.

4           So, with respect to third party, the Green  
5 Chemistry Alliance would rather that be a voluntary  
6 approach, not a mandated approach. But we're certainly open  
7 to that, we'd like to leave it to the manufacturer to decide  
8 that. Particularly if the manufacturer is having to  
9 undertake the cost and time and resources associated with  
10 conducting the alternatives assessment and lifecycle  
11 assessment.

12           We think to add on to that, by mandate, a third-  
13 party cost, as well, is prohibitive. And is certainly going  
14 to add to the time constraints with conducting these  
15 assessments, as well as the cost component, as well.

16           Thank you.

17           MS. SARTAIN: Ladies and gentlemen, because you've  
18 had so many wonderful suggestions and ideas and comments, we  
19 are running just a few minutes over on our schedule.

20           So may we please ask a favor. Instead of a 15-  
21 minute break, can we just take a 10-minute break and come  
22 back in. Because there's still another presentation.

23           And mainly we want to leave enough time for you  
24 for the general discussion at the end. So, if we could all  
25 meet back at five minutes to 3:00, please. Thank you.

1 (Off the record at 2:44 p.m.)

2 (On the record at 2:57 p.m.)

3 MS. SARTAIN: Ladies and gentlemen, can we please  
4 take our seats now and get started again. I know that was a  
5 very short break for you, but that buys us some extra time  
6 for the questions and comments later.

7 Our next presentation is going to be by Evelia  
8 Rodriguez. And it's concerning the response actions.

9 MS. RODRIGUEZ: Good afternoon, everyone. And,  
10 again, thank you for sticking around this late. I know this  
11 is really hard to be sitting here for so long.

12 Before I actually get into response actions, I  
13 just want to point out one thing. That these response  
14 actions are in addition to our current enforcement  
15 authority. And our enforcement authority is found in Health  
16 and Safety Code.

17 And what it basically says is that we have the  
18 authority to enforce on any of our regulations or our laws  
19 that are covered by both Health and Safety Code and by Title  
20 22. And these regs will live in Title 22.

21 So, just want to get that off, first.

22 Now, when you look at AB-1879, what you see in AB-  
23 1879 is the statutory, is the bill that added section 25252  
24 and '253 to our law. And what it says is that it requires  
25 that the regulation specify a range of regulatory responses

1 following the completion of the alternative analysis.

2 And so what we're saying here is that we don't  
3 want to jump to regulatory responses without having the  
4 manufacturers go through that AA.

5 And this has a twofold effect. One is that you  
6 cannot go ahead and substitute for another chemical without  
7 going back and evaluating the consequences of that  
8 substitution. And so the response actions followed  
9 thereafter.

10 Now, these are the nine regulatory responses that  
11 are built into the law. And in trying to come up with the  
12 criteria for when to invoke the self-imposing regulations it  
13 became apparent that they were not conducive to making them  
14 all self-implementing.

15 And so what I did is actually split them into two.  
16 One is self-implementing and built in the criteria; and the  
17 second set are response actions that we're reserving for  
18 DTSC authorization or for us to review and then decide  
19 whether we should impose these.

20 I also want to bring out one other issue, which is  
21 when you finish the alternatives analysis, what you're going  
22 to come out with is four different types of alternatives.  
23 One is there is no alternative, because you get kicked out  
24 at the reasonable functional equivalence, or there is no  
25 alternative that has equivalent performance.

1 Right now those regs in the alternatives analysis  
2 section kicks you into an automatic ban and an automatic R&D  
3 requirement. We're going to fix that. If there is no  
4 alternative we need to adjust that. And I'll get to that a  
5 little bit later when I talk about that.

6 The second kind of alternative that you're going  
7 to get is what is the optimal, the preferred. And that is  
8 what we've defined in our regs as the safer alternative.  
9 Now to actually have a safer alternative, not only do you  
10 have to have less hazard and reduced exposures, but you also  
11 cannot have significant impacts.

12 And then there are the two remaining ones that are  
13 in the middle of those two extremes, the extreme between no  
14 alternative and the safer alternative. And these will have  
15 significant impacts. And they'll have impacts in either  
16 ecology, environmental health, where they're going to have  
17 the other impacts that Nancy went over, which is economic or  
18 resource depletion.

19 So, the response actions have four different  
20 sections. The first is general requirements. So you are  
21 obligated to comply with the response action if your  
22 consumer product contains a priority chemical of concern.

23 Now, Gretchen earlier asked are we requiring that  
24 a manufacturer actually implement an alternative. And the  
25 answer is no. When they come out of that alternative

1 assessment, if they choose not to, then response action is  
2 triggered because their product still contains a priority  
3 chemical of concern.

4 And the regulatory option at that end is you can  
5 still choose to use your product that still has a chemical  
6 of concern, but you're facing a ban, knowing that there is a  
7 safer alternative that has no significant impact.

8 Now, you are out if you implement your safer  
9 alternative, and then you're no longer subject to response  
10 actions.

11 If you do have a response action requirement,  
12 we're going to require an implementation plan or a workplan.

13 And it's going to have two components, a very general  
14 information portion of it and then then the more plan-  
15 specific information.

16 The first part of it, the general stuff that could  
17 be filled into data elements, that's going to be forwarded  
18 to DTSC. The whole thing should be available, as Nancy  
19 said, on the web somewhere. And we don't know exactly where  
20 it's going to live. But it will be a de-centralized  
21 database.

22 Now, we're also holding the -- reserving the right  
23 to impose our response actions based on knowledge that  
24 becomes available to us in the future or now. So, we're  
25 going to reserve the right to impose response actions if a

1 manufacturer has not taken a response action and it's clear  
2 that they need to; or if the continued availability of the  
3 consumer product poses a risk.

4           And we've built in some considerations that DTSC  
5 has to evaluate before we act on it: the nature of the  
6 hazard, the effectiveness, the consistency of response  
7 actions due the level playing field issues. And then  
8 whether there's duplicative requirements out there.

9           Now, this is where I keep getting most of my list  
10 of the comments directed at, which is where people are  
11 commonly referring to as a chemical ban. And again, I want  
12 to repeat, it is not a chemical ban. It is the ban of a  
13 chemical in a product. And the products that we've  
14 originally picked are those that are intended for sensitive  
15 receptors.

16           So what we're saying is if lead is used for paint  
17 for a toy that a child's going to eat, then, yes, we are  
18 banning that. If lead is in a calculator that's  
19 encapsulated in a casing and it doesn't become a problem  
20 until end of life, that becomes a priority two, and the  
21 requirements there are less.

22           Now, I'll speak to this in another terms. Earlier  
23 today we talked about a subset of how these prohibitions or  
24 restrictions would work. I anticipate a lot of people have  
25 opinions on this. And so I'd like to see whether it makes

1 sense to have the ban if a safer alternative does not exist.

2 That doesn't mean that an alternative doesn't exist, it's  
3 just an alternative that does not have an impact exists.

4 So, again, think of this in terms of it's not that  
5 it doesn't exist and we're banning everything forever. It's  
6 just if a safer alternative.

7 So, the time sequence here, I just want to  
8 reiterate something that was said during the Green Ribbon  
9 Science Panel. It's that there won't be diminishing  
10 returns, and I understand that. And so if some of you have  
11 very specific opinions about 20 years going through 10  
12 lifecycle analyses is overwhelming, I'd like to hear about  
13 that.

14 One of the other ways the response actions are  
15 also bifurcated is if you choose to continue to use a  
16 product that has a priority of concern, and you choose not  
17 to make an alternative substitute, that's when you're  
18 facing, quote, "the prohibition of that chemical in a  
19 product."

20 But if you choose to go with one of the  
21 alternatives, and the alternatives has an impact, that's  
22 when the rest of the response actions kick in.

23 So you would have to label your product if that  
24 significant risk is an exposure. If that significant impact  
25 is an end-of-life issue. Or is the impact has exposure

1 risks to workers, a labeling requirement would kick in.

2 I want to clarify that end-of-life in the  
3 alternatives analysis is a phase and not an attribute. And  
4 I don't know if everyone's comfortable with the distinction.

5 The attributes are those characteristics that are listed  
6 down the right-hand column in the alternatives analysis.  
7 And the phase is something that you can analyze throughout  
8 the LCA, which includes the raw materials, the energy  
9 consumption, manufacturing, transportation, use and end of  
10 life.

11 So essentially if you have one of those attributes  
12 that has a significant impact, you would have to go back  
13 into that specific attribute to see if that impact is  
14 occurring at end of life.

15 Now, we also have the requirement to notify our  
16 sister agencies if some of these affect area of their  
17 regulatory authority. So, end-of-life management would  
18 trigger a notification to the Integrated Waste Board. And  
19 there's notifications to the Air Board if there's greenhouse  
20 gas emissions.

21 The DTSC imposed actions are the requirement for  
22 additional data; restrictions, further restrictions I should  
23 say; research and development; green chemistry funding. And  
24 then any other response actions when if we, for some reason,  
25 have to come in and impose one because, again, they haven't

1 initiated their own response actions. Or the product is  
2 continuing to pose a risk. Then these become available to  
3 us, which is kind of a hybrid of the self-imposing. This is  
4 where we actually come in and enact these requirements.

5 Now, one thing that keeps coming up again, and I  
6 mentioned it before, is that term significant impact. How  
7 do we define significant impact? Significant impact is a  
8 requirement in the alternatives analysis. That is where  
9 someone has to compare their alternative to their product.  
10 And the product is the base.

11 So you could have a product that has a carcinogen  
12 and you're comparing another carcinogen to it, and the  
13 difference between the effect of that chemical is what  
14 you're evaluating. So, just because you're safer doesn't  
15 necessarily get you to safe.

16 And there is, in the response actions you will see  
17 that there's this effort to capture that element of we may  
18 not get to safe, but if there are additional toxicological  
19 criteria that you meet, again it will impose one of those  
20 restrictions.

21 Then we get to the petition process. We  
22 understand that there is a lot of edits and corrections  
23 we're going to have to make in our regulations, and that one  
24 size does not fit all. So we decided to add in a mechanism  
25 whereas a manufacturer could come in and kind of get a

1 temporary variance until they're able to comply with a  
2 specific requirement.

3           So, not so as to not just open it up to everyone,  
4 we've decided to build a criteria that needs to be met  
5 before you can come and even ask for a petition. Which is  
6 you need to show efforts to comply with these requirements.

7       It's not, you look at it and you say no, there's no way I  
8 can meet this deadline, and you submit your petition. No.

9           You actually have to demonstrate that there's a  
10 good faith effort to comply. And then we will accept a  
11 petition for review.

12           The department, once it gets this petition, has to  
13 -- where am I -- determine one of the following. And this  
14 came up earlier. If, for some reason, while we're  
15 evaluating your petition to extend some kind of timeframe  
16 for you, we need to make sure that continued use of this  
17 product is imposing a great risk to the general public.

18           So these are the findings DTSC is going to have to  
19 make. And this is the only time we use MADLs, and no  
20 significant risk levels. This is where we bring in that  
21 risk factor. But it's only as a temporary situation until  
22 we decide how we're going to proceed on that petition. And  
23 so DTSC will have a role in approving or disapproving the  
24 criteria and what is being asked.

25           The petitions will be sent via certified mail. We

1 want a 45-day notice. It will be disclosed for written  
2 public comment. There is a public participation factor in  
3 this process.

4 So, here are our questions to you, which is a lot  
5 of the response actions are -- could be considered sticks.  
6 And try to come up with some ideas that might help  
7 innovation and incentivize.

8 So, are there any response actions that we have  
9 not included in here, and that were not included in AB-1879  
10 that can be used to stimulate innovation?

11 Another question is how should the schedules be  
12 adopted to accommodate that hybrid approach that includes  
13 the list of lists and the list of chemicals? In other  
14 words, where we're restricting the use of lead in a paint in  
15 a child's product is one thing, but to restrict the chemical  
16 across, based on a list of lists, is quite a difference.  
17 So, If you guys can weigh in on how you see this more  
18 realistic.

19 How should the schedule be adjusted to allow for  
20 depletion of inventories? They mentioned earlier today that  
21 there's a cost to businesses when you have to pull products  
22 off the shelf. How should we adjust for exactly that  
23 situation?

24 On the variances, if there are additional specific  
25 requirements that we should build in? Are there things that

1 we know, for a fact, are unworkable, such as the timeframes,  
2 or the minimum risk thresholds that need to be adjusted so  
3 that we don't get, you know, 90 percent of the requests for  
4 variances are on one issue. Because we already know that  
5 they would be more appropriately addressed by revising the  
6 regulatory language than addressing them in a case-by-case  
7 variance petition.

8           Should the regulations include a time limit for  
9 that variance? Should we just allow it for a maximum of X  
10 years? Or should we, if someone comes up and says, you  
11 cannot ban sulfuric acid in lead acid batteries, allow the  
12 option of giving it a forever get-out-of-jail card?

13           And what should be the requirements while the  
14 petition is being reviewed? Should we have special  
15 requirements in that will kind of level the playing field so  
16 that this isn't used as a stall tactic?

17           And, like my colleagues, we need cost information.  
18           So, what would be a specific cost associated with a  
19 prohibition of a chemical in a specific consumer product?  
20 What are the specific costs associated with the end-of-life  
21 management programs? And how much do you think the  
22 compliance with this regulation, as a whole, would cost per  
23 product?

24           And what we need here is if you can't give us  
25 costs, if you can give us a range of hours it would take to

1 comply with a specific reporting requirement. If it's  
2 depending on a specific product category, if you could give  
3 us that information it would be very helpful.

4 And if you have questions for me, I will entertain  
5 questions from the floor. Do we have the microphones?

6 MR. POOLE: Doug Poole with DuPont. This is just  
7 sort of to reiterate on the costs and the variance, to take  
8 into consideration when we do make a substitute or change a  
9 product, we have to go through all of our customer  
10 approvals.

11 You know, say we have a substance that goes into  
12 making a part, and you have to do all of the testing. And  
13 some of these tests can take quite a long time. So your  
14 time limit of, what was it, one year on one of them, it's  
15 just -- and I guess it's again on a case-by-case basis, so  
16 that's where the petition might come in. And then the idea  
17 of the workplan I also like.

18 But realistically these time limits, I think, for  
19 the most part, are short. I'm thinking of, we're trying to  
20 replace a solid NMP, which N-pyrrolidone, in a finish. And  
21 we have looked at dozens and dozens of them. So far, it's  
22 working about a year and a half. And we think we're going  
23 to come up with something here, but it just takes a long  
24 time.

25 Once we come up with a substitution, then we have

1 to have all of our client base and customer base do all of  
2 the testing and approve it. And that could take another  
3 year or two.

4 So that's what we're faced with on a realistic  
5 basis. And so I keep harping on that, but that's what it  
6 is.

7 MS. RODRIGUEZ: Okay, so we have these two  
8 approaches. One is to specify a timeframe. And if it's not  
9 working, what would be a better timeframe.

10 And then we have this submit a workplan and then  
11 ask for specific approval from the department for a specific  
12 timeframe being proposed.

13 We can actually merge those two ideas and have a  
14 year. And then if you can't meet the year, submit the  
15 workplan. And then that will fend off some of the workload.

16 So, if you get it done within a year, you're okay. And  
17 then if not.

18 So, think about those kind of approaches where we  
19 could combine some ideas. So, in your case, you're right,  
20 you would need more than a year. So the workplan would kick  
21 in. But what if those products that are much more simple is  
22 a year okay. Maybe it's still not even okay for a simple  
23 product. We need to know that.

24 MS. PORTER: My name is Catherine Porter; I'm with  
25 the California Healthy Nail Salon Collaborative. And I may

1 have other questions or comments, but I was especially  
2 interested in this last question, number 5, in regard to the  
3 cost information.

4 Any my observation, not only in regard to this  
5 question 5, but also we've heard a lot of comment about how  
6 much looking for alternatives is going to cost corporations.

7 And I think if we're going to start hearing and  
8 getting that information, we also should get how much these  
9 companies are making in gross receipts. So that we have  
10 some sense of relativity of how much money they're making  
11 and how much money they're putting out for safer  
12 alternatives.

13 Maybe similarly, how much money they're spending  
14 on marketing. How much money they're spending on lobbying.

15 Thank you.

16 MS. RODRIGUEZ: Good point, and I just want to  
17 clarify one thing. The reason we're asking for costs right  
18 now is when we prepare this rulemaking we're obligated, by  
19 law, to disclose just what is it going to cost. What is it  
20 going to cost the average business. What is it going to  
21 cost industry. Is it going to cost jobs. We need to  
22 disclose that.

23 But thank you for that point.

24 MR. GREGGS: Bill Greggs for the Grocery  
25 Manufacturers Association. You indicated that you don't

1 believe the process gets to a position of chemical ban, it's  
2 a ban of a chemical use in a product. And I agree this  
3 process ought to focus on the chemical and its use in  
4 particular kind of products.

5 But as I'm looking at category 11 of the product  
6 categories, any of the chemicals specified. So, to me,  
7 that's one of the chemicals becomes a product, becomes a  
8 product, itself, has to flow through the process. And ends  
9 up being subject to the ban.

10 So I don't see how you can say you're not going to  
11 ban chemicals.

12 MS. RODRIGUEZ: Okay. First of all, 9 and 10 were  
13 added later, okay. So the intent at the beginning, remember  
14 I said we need to revise this language and right-size it.  
15 We know we need to revise the ban section.

16 Again, you're right, a chemical becomes a product  
17 when it's used in a manufacturing environment. And in that  
18 manufacturing environment you need to prioritize it. Is  
19 there high exposure, low exposure, no exposure, right.  
20 Probably going to be a priority one under those  
21 circumstances.

22 Then it kicks you into the alternative assessment,  
23 right. And you go through that and you try to figure out,  
24 is there a safer alternative, or is there an alternative  
25 with significant impacts. And then that kicks into a

1 response action.

2 Right now you are being banned, no matter what.  
3 And we need to fix that. We all realize that. So, again,  
4 think about the subset that it should apply to. And I think  
5 high hazard, I think everybody could agree, should be part  
6 of that criteria.

7 We just need to take a step back and look at that  
8 again. One of the things that we were looking at is, we  
9 have three really different approaches for getting into the  
10 applicability of this rulemaking. You come -- if you  
11 product a product on that list, you come in if you're on the  
12 list of chemicals. And you come in if you're on the list of  
13 lists.

14 That is a lot. And we've been talking about  
15 wanting to right-size these regulations. If you have  
16 definite ideas of which of those pathways works the best,  
17 then we could adjust the back end to address that one issue.

18 Right now that back end isn't adjusting to all three of  
19 those pathways. And we know that. So, if you have some  
20 input.

21 MR. GREGGS: Okay, thanks. Well, as I said this  
22 morning, I think sort of focusing in on some chemicals and  
23 some products, and then kind of merging that together is  
24 what I think makes sense. I don't think you -- you can't  
25 just do one or the other, I don't believe.

1           But let me -- I did have a second question really  
2 that related to the product categories, and this is number  
3 9, the products designed are reasonably fully anticipated to  
4 release any chemicals during the intended use or after  
5 disposal.

6           I guess I wanted to focus on, I mean I get it,  
7 okay. So we've got an ink pen or an ink cartridge, and it's  
8 going to release chemicals as an intended part of its use.  
9 But the thing I'm concerned about maybe is the definition  
10 about the reasonably anticipated to release.

11           I mean we can do migration studies on any material  
12 anywhere, and we can, you know, detect, at some number of  
13 the molecule levels, we can detect releases.

14           So I think the definition of that, and maybe this  
15 gets back to the same issue as the de minimis that we were  
16 talking this morning, relative to stuff that's in products,  
17 and there needs to be some sort of de minimis. But I think  
18 you need to think about something relative to that  
19 definition that, again, doesn't have us chasing unimportant  
20 traces versus serious threats to human health and the  
21 environment.

22           Thank you.

23           MS. RODRIGUEZ: So, I'm hearing that we need to  
24 redefine that.

25           MR. FISCHBACK: Randy Fischback, Dow Chemical.

1 Mine's just a question of clarification. So this will be an  
2 easy one, I think.

3 Did the priority 3 chemicals, if I read the straw  
4 correctly, those are encapsulated in such a way that they  
5 aren't, there's no exposure during use, and there's no  
6 exposure or release at the end of life into the environment.

7 But they're still subject to the 15- and 20-year,  
8 respectively, bans, for lack of a better word. If I'm  
9 reading that correctly, why is that? Because it sounds like  
10 there's no exposure and there's no release. And yet it's  
11 still subject to ban.

12 MS. RODRIGUEZ: Okay. Again, the bans are only  
13 going to kick in if you have a product that you haven't  
14 replaced with an alternative. So if you've replaced it to  
15 an alternative, you're no longer subject to the ban.

16 So, it's only --

17 MR. FISCHBACK: No, aren't you -- you have 15  
18 years if there's a safer alternative, and 20 years if there  
19 isn't, for a priority three. Did I read your table --

20 MS. RODRIGUEZ: No, no, you're right. But what  
21 I'm saying is the bans are -- I don't want to say bans --  
22 the prohibitions only kick in if you've gone through the AA  
23 and you've come out of there, and your decision, as a  
24 business, is to continue to use a product that has one of  
25 those chemicals of concern. That's when the restriction,

1 that prohibition kicks in.

2 So, what it's doing is it kicks you into the  
3 alternatives analysis to try to find a better alternative.  
4 And what we want is continual improvement.

5 So, yes, it doesn't make sense, but think about  
6 you have a product. You've gone through the AA. And you  
7 can't find an alternative, so you choose to stay using your  
8 product. You have to go back and do an AA and be subject to  
9 the whole thing all over again.

10 MR. FISCHBACK: Right.

11 MS. RODRIGUEZ: So, hopefully, 15 to 20 years  
12 would be enough time to substitute it out. Again, if you  
13 feel strongly that this makes no sense, that's what we want  
14 to hear.

15 MR. FISCHBACK: Well, again, for priority three I  
16 think it makes -- I feel strongly it makes no sense.  
17 Because it's not available to the user, and it's not  
18 released upon end of life. So I'm having trouble  
19 reconciling that in a logical fashion.

20 MS. RODRIGUEZ: Well, some people have actually  
21 proposed that maybe priority three should be exempt. So, --

22 MR. FISCHBACK: By definition it looks like  
23 there's no --

24 MS. RODRIGUEZ: It should be exempt.

25 MR. FISCHBACK: -- exposure, so, yeah, I would

1 support that.

2 MS. RODRIGUEZ: Okay.

3 MR. FISCHBACK: Thanks.

4 MR. BECK: Robert Beck from Masco Corporation.

5 And I'm responding to the question about inventories. How  
6 should the schedule be adjusted to allow for inventory  
7 depletion. And also to kind of reinforce Doug's comment  
8 about the time these things take.

9 We have a good example right here in California  
10 now that the DTSC is involved in, and that's the  
11 implementation of AB-1953. That's a case where there was no  
12 AA, you know. The assembly said, we're not going to have  
13 any more than .25 percent lead in any product that touches  
14 potable water.

15 And it has taken -- and there were at least two  
16 very reasonable and workable alternatives to leaded brass.  
17 And even given all that, it's going to be three years of  
18 very hard and fast work to get unleaded brass, in the sense  
19 that California AB-1953 defines it, into commerce here in  
20 California.

21 So, even after the AA is done, there's quite a bit  
22 of time that's required to implement the alternative.

23 With regard to the question about inventories, I  
24 would suggest that, as opposed to the way AB-1953 reads,  
25 which is have everything off the shelf of every retailer and

1 wholesaler and distributor and so forth in California, by  
2 January 1st of near year, that has too much lead in it, it  
3 makes more sense, from not only an economic standpoint, but  
4 a control standpoint, to just prohibit the sale of the stuff  
5 that's not good as of a certain date. So that all the  
6 inventories don't have to be flushed out and all that cost  
7 has to be imposed, not only on the manufacturers, but also  
8 on the wholesalers and the retailers and the other people  
9 who have the stuff on their shelves.

10 MS. RODRIGUEZ: Can you also provide the product  
11 category that you're concerned about? Like, you gave me a  
12 specific example, and that works. We realize that some  
13 products have a very fast lifecycle, and some products  
14 don't.

15 So to kind of get a feeling for that information  
16 by product category would be extremely helpful.

17 MR. BECK: Well, our company makes a whole wide  
18 variety of products used in residential construction. We  
19 make paint, we make faucets, we make cabinets, we make  
20 bathtubs.

21 And I don't think that there's a significant  
22 difference in concern in any of those product categories. It  
23 goes back to what Doug said. It is a big job to make the  
24 kind of changes that we're talking about making.

25 And I mean I applaud California as a groundbreaker

1 in this kind of legislation, and we support the aims of the  
2 Green Chemistry Initiative completely.

3 But I think it has to be, from my point of view,  
4 we have to have the processes in place and the time that's  
5 necessary to get this stuff done. And it's very hard to do  
6 it really quickly, probably impossible.

7 MS. KOEPKE: Dawn Koepke on behalf of the Green  
8 Chemistry Alliance. So, I know a lots been talked about  
9 with regard to the ban. And I just wanted to also address  
10 that, as well as a few other points, if I may.

11 While we understand what you're saying with regard  
12 to it's not being a chemical ban, generally, we do see this  
13 as a ban of chemicals on a product-by-product basis. So,  
14 essentially getting to the same place.

15 The difference would be there would be longer  
16 timeframes associated with those bans or prohibitions  
17 depending on the actions a manufacturer takes. And that's  
18 certainly problematic.

19 And you say it would not only be based on high  
20 hazard, but exposure, as well. And we think, you know,  
21 throughout this entire process that needs to be remembered.

22 And with regard to the discussion that you had  
23 with Randy about timeframes, even if we, as manufacturers,  
24 chose to use a safer alternative that we had identified,  
25 even in the priority three the concern would be that, you

1 know, with all of the hazard traits listed and included,  
2 it's really going to capture just about every chemical under  
3 the sun within one of those hazard traits.

4 That said, if you're moving towards, you know,  
5 implementing a safer alternative that, you know, may indeed  
6 be safer, you would still be thrown back into that  
7 timeframe. And not that we're opposed to continuous  
8 improvement, certainly.

9 But for a manufacturer looking to, you know, move  
10 towards greater innovation and substitution of safer  
11 alternatives, if that alternative was ultimately going to be  
12 on that same track to prohibition down the road, that's kind  
13 of serving as a disincentive for them to move toward that  
14 continuous improvement, towards that safer alternative.

15 So we would definitely argue that specifically for  
16 priority two and three that we should definitely consider  
17 taking the ban or prohibition off the table. Specifically  
18 for priority three, but we'd like to talk about that for  
19 priority two, as well.

20 And with regard to those instances, whether it be  
21 priority one or even, in some cases, priority two, that if a  
22 ban were to be pursued, that that be done through  
23 regulation. That would provide an opportunity for all sides  
24 to have notice of that action; to provide comments; to  
25 provide science, which, again, going back to a comment that

1 was made much earlier today, this process we envisioned as a  
2 science-based process.

3 We want to make sure that there's an opportunity  
4 to flesh out that science with regard to that specific  
5 product and the chemical use in that product. And whether  
6 that poses an exposure of end-of-life concern. And we think  
7 that that forum is acceptable for such a significant action  
8 on that chemical and the product with that chemical in it.

9 With regard to the petition process, the variance  
10 process and the findings, as I read them, and I know a  
11 number of my colleagues do, many of us feel that just about  
12 all of our products would comply with those findings.

13 You know, as was mentioned earlier, manufacturers,  
14 at least as a whole, do not put products on the market that  
15 pose exposure concerns. And we believe that most of them  
16 will want to seek that variance process, because they match  
17 up with those findings. They have products that don't  
18 present significant risks.

19 And so in response to that, and looking to help,  
20 you know, address your concern with trying to, you know,  
21 size this down to make it a workable approach, to make it  
22 the right size, would be to look at the de minimis  
23 evaluation that we've talked about earlier. And look at  
24 putting that on the front end of this process ahead of the  
25 alternatives assessment.

1           If you have a chemical in a consumer product, that  
2 de minimis levels provides no exposure concern and no  
3 release into the environment, we think that that should be  
4 consideration upfront before a manufacturer takes, you know,  
5 the steps of going through a full-blown alternatives  
6 assessment, lifecycle assessment, with the associated costs,  
7 time, resources.

8           And also, on that same note, for those products  
9 that are regulated by other agencies, governmental agencies,  
10 where there might be duplication and perhaps DTSC wasn't  
11 aware of that in that instance, we think that that also  
12 should be considered on the front end ahead of the  
13 alternatives assessment and lifecycle assessment, as well.

14           So those are some key pieces of that. And we  
15 think that that would certainly help in great part address a  
16 number of the concerns that I know a number of industry and  
17 manufacturers have.

18           MS. RODRIGUEZ: Okay, you have four that I  
19 remember.

20           (Laughter.)

21           MS. RODRIGUEZ: The first one was right sizing the  
22 prohibitions of a chemical in a product. You mentioned two  
23 issues. One is that we should know the scope of the  
24 hazards. So should that be in the response actions or  
25 upfront in the chemicals of concern section? Both, or one

1 or the other?

2 MS. KOEPKE: Well, we think starting off, as I  
3 mentioned previously in the previous discussion, with  
4 focusing initially on CMRs and PVTs as a starting point,  
5 that would be helpful throughout the entire process.

6 And then once we get a handle on the process going  
7 forward, then we can look at adding other hazard traits to  
8 the entirety of the regulation and program.

9 So, starting with CMRs and PVTs throughout the  
10 entire process. We would argue that's a good starting  
11 point.

12 MS. RODRIGUEZ: Okay. Then you said deleting  
13 priority two and three for the prohibition?

14 MS. KOEPKE: Right.

15 MS. RODRIGUEZ: Not a problem. Submit your  
16 comment.

17 MS. KOEPKE: We will.

18 MS. RODRIGUEZ: Thirdly, you mentioned that  
19 chemical bans would be more appropriate to be done  
20 regulatorily.

21 MS. KOEPKE: Um-hum.

22 MS. RODRIGUEZ: We're looking at this as the  
23 chemical in a product. So, to do that regulatorily in the  
24 current structure would be to have to assess it every time  
25 lead shows up in a specific product.

1           It wouldn't be a ban of lead. It would be the ban  
2 of lead in this product used in this way. So, somehow we've  
3 got to come up with a better way of dealing with that.

4           At one point when I was contemplating response  
5 actions, the thought of well, if everyone comes up with the  
6 same conclusion that chemical X is bad in this use, then  
7 maybe it might be appropriate at that point, with  
8 information given to us, that we could go back and look at  
9 that as a potential regulatory response.

10           But, I was told that that may not be a good  
11 approach. I don't know. Maybe you feel differently.

12           MS. KOEPKE: Well, I think, more than anything,  
13 when it comes to a ban it is such significant action, that  
14 DTSC, in conjunction with manufacturers will be taking, or  
15 be subject to, for that matter, is that we think that that  
16 specifically necessitates greater involvement, greater  
17 notice, greater comment opportunity because that is such a  
18 significant action. Whether it be in one product or a  
19 subset of products.

20           So, our concern there is with regard to making  
21 sure that there is ample notice comment opportunity. The  
22 opportunity to provide the additional information. The  
23 concern with the way the framework is headed now is that  
24 there wouldn't be that opportunity to the greatest degree,  
25 and in the most upfront, transparent manner to make sure

1 that all sides are heard on that particular issue.

2 But we're happy to continue to work with you on  
3 that and see what we can find that might be a compromise to  
4 address our issues, as get to where you need to be.

5 MS. RODRIGUEZ: So, what about ban only if there  
6 is a safer alternative?

7 MS. KOEPKE: I think largely it's going to depend  
8 on what the reasoning was for not using that safer  
9 alternative. And, you know, connecting the alternative  
10 assessment there could be a variety of reasons that a  
11 manufacturer chose not to use that safer alternative.

12 And I think that's exactly why we need that  
13 opportunity to provide that level of detail and have a  
14 discussion about that. Because a manufacturer, you know,  
15 they're going to make decisions based on what they find in  
16 that alternatives assessment. And we're not always going to  
17 know upfront about what that is.

18 And we need the opportunity to present our case  
19 and be able to show the science behind why those decisions  
20 were made in the fashion that they were made. So, --

21 MS. RODRIGUEZ: But the alternatives analysis does  
22 allow for health and safety, ecological, financial, economic  
23 reasons. So, if that is a significant impact to a  
24 manufacturer, that is not a safer alternative.

25 MS. KOEPKE: And I can't argue with that. All I'm

1 suggesting is that I'm definitely not a toxicologist, and so  
2 I don't know what all the details and constraints would be  
3 that would have a manufacturer choose not to use that safer  
4 alternative.

5 So I just think that there would need to be more  
6 discussion relative to that ban, why the manufacturer chose  
7 not to use that safer alternatives before just putting them  
8 on the track to that ban.

9 So that's our position on that.

10 MS. RODRIGUEZ: Okay.

11 MS. KOEPKE: Thank you.

12 MS. SHEEHAN: Eileen Sheehan from EPA Region IX --

13 MS. RODRIGUEZ: Hi.

14 MS. SHEEHAN: -- and I want to say thank you to  
15 the team at DTSC for a tremendous effort, tremendous amount  
16 of work to try to move this, you know, flesh out this  
17 tremendously difficult area. It's really impressive.

18 My question, and I do have a question. I  
19 understand you're very much interested in solutions, and I  
20 appreciate that. And we're going to try to give some input,  
21 as well.

22 But I wanted to ask a question as I think about  
23 the alternatives analysis piece and the regulatory response  
24 piece. This question is how is DTSC going to insure some  
25 kind of consistency among a group of maybe products where

1 there should be a similar group of alternatives considered?

2 As you try to compare, you know, was this a well -- you  
3 know, is this a good alternatives assessment.

4 And similarly, do you think, in terms of the  
5 regulatory response, you'll need to group products with  
6 alternatives analysis as you arrive at the regulatory  
7 response?

8 So that -- and I'll give you one example, and it  
9 may not be a good example, but when you think about dry  
10 cleaning solvents. One way, and we know there's a separate  
11 -- there's separate work being done on dry cleaning. PERC  
12 is being phased out by 2021. Someone can maybe clarify  
13 that.

14 But if you look to dry cleaning alternatives, and  
15 let's say a manufacturer came in with their dry cleaning  
16 solvent. And they compared it to two others, but didn't  
17 compare it to wet cleaning, or CO2, for example. And they  
18 are widely accepted alternatives.

19 Then their alternatives analysis might arrive at a  
20 different conclusion. And that might lead to DTSC, then,  
21 trying to look at the, you know, your regulatory response a  
22 little differently.

23 So, I'm just wondering, is DTSC thinking about  
24 trying to insure that some of the more classic alternatives,  
25 I guess, I would say are considered by a product

1 manufacturer? So that you're not having to compare apples  
2 and oranges, both on the alternatives analysis and the  
3 regulatory response?

4 MS. RODRIGUEZ: Thank you.

5 MS. OSTROM: I can take that question. I think  
6 when we first did the thinking about alternatives analysis,  
7 we recognized that different manufacturers of even similar  
8 products may be using different processes. So if they're  
9 just looking at changes in their process, they might be  
10 looking at different alternatives.

11 I think that over time we're hoping, I think some  
12 of us still hold that hope, that we would be able to take  
13 some of this information and compile it in a place  
14 someplace. Or it can be used as a type of technical  
15 assistance for maybe smaller businesses or businesses who  
16 aren't exploring all of the alternatives they potentially  
17 could think of.

18 But, no, we've sort of held it open so that it  
19 wasn't standardized that different manufacturers, even of  
20 similar products, might come up with different solutions,  
21 different alternatives. And it will just depend on their  
22 situation and, you know, what their factors would be, what  
23 their performance factors will be. And, you know, how they  
24 would evaluate their alternatives based on their own  
25 situation.

1           And we anticipated that that would be the case,  
2 and we thought that that was appropriate.

3           MS. SHEEHAN: Well, just a quick followup then is  
4 I think you may want to think a little more about asking  
5 manufacturers of similar products to try to compare the  
6 conventional alternatives.

7           Because I do think you may end up trying -- you  
8 could end up in a difficult position of arriving at  
9 different regulatory response, depending on what a given  
10 product manufacturer may have compared in terms of  
11 alternatives.

12          MS. OSTROM: Maybe can you suggest a way to try to  
13 address that?

14          MS. SHEEHAN: And I think one way is -- and I  
15 definitely will give some thought to that, how to get at the  
16 whole question of making sure that product manufacturers do  
17 compare.

18           I guess conventionally the classic alternatives --

19          MS. OSTROM: Right.

20          MS. SHEEHAN: -- not just the ones that make their  
21 product look good.

22          MS. OSTROM: Yeah, --

23          MS. SHEEHAN: I think that that -- I could see  
24 that down the line.

25          And then just one other quick thought is that I

1 wanted to be sure everyone knew that the EPA Administrator  
2 did announce six principles for TOSCA reform, which has been  
3 a long time coming. But we have those principles. They've  
4 been shared with congress.

5 And I have a feeling that California is going to  
6 be getting out there, and a lot of what will be done here  
7 will inform, I hope, the national TOSCA reform effort, so --

8 MS. OSTROM: Thank you.

9 MS. SHEEHAN: -- that's really --

10 MS. OSTROM: If you have ideas for sort of  
11 instilling that kind of consistency, that would be good for  
12 you to share that. Thanks.

13 MS. RODRIGUEZ: And a follow-up to that. I talked  
14 about the three ways into these regulations. By having that  
15 one pathway through products, it allows us to focus in on  
16 certain product areas.

17 MS. SALTER: Gretchen Lee Salter with the Breast  
18 Cancer Fund. I have a couple of comments on this process,  
19 so I apologize if my comments are a bit long.

20 First, I wanted to address the variance. And I  
21 think that this is, the variance/waiver is a process that  
22 really could bring down the entire regulation for exactly  
23 the reason that Dawn stated, that most manufacturers feel  
24 that they qualify and therefore DTSC will be deluged with a  
25 number of variance requests.

1           Also, it appears as though, the way it's written,  
2 it's a little bit vague, but it appears as though the burden  
3 is on DTSC to show if manufacturers meet or do not meet the  
4 criteria laid out in the variance process. And it doesn't  
5 appear as though the burden is on manufacturers to address  
6 that uncertainty, which is where the burden of proof  
7 belongs.

8           And this whole idea of shifting the burden of  
9 proof, that's what we're talking about. It's not shifting  
10 the burden of work. It's shifting the burden of proof and  
11 that uncertainty. And how you handle the question of  
12 uncertainty. And I don't think you all have captured that  
13 in the way it needs to be, especially in the variance  
14 process.

15           You asked a specific question that if we are going  
16 to have a variance process, if it has to be a part of this,  
17 although I'd encourage it not to be, I think absolutely it  
18 needs to be a time-limited process. And absolutely there  
19 needs to be a fee associated with applying for such a  
20 variance to help administer the program.

21           We talk a lot about how DTSC doesn't have a whole  
22 lot of resources, and if you're going to be dealing with  
23 these requests, somebody's going to have to pay for that.

24           Secondly, I want to talk a little bit about -- and  
25 I mentioned this this morning in my panel presentation, but

1 I don't think this, again, can be overstated.

2 The problem with having prioritization tied to  
3 different kinds of action. And so basically what you're  
4 saying is that the same chemical, depending on how its used,  
5 is going to be subject to different requirements.

6 And I mention that because I think of the example  
7 of persistent and bioaccumulative chemicals where they don't  
8 go away. And this whole idea that you contain exposure is  
9 one that I think has been pretty much disproven.

10 There is exposure somewhere. I think there are  
11 best intentions to make sure that there is not exposure.  
12 But there is going to be exposure somewhere along the  
13 lifecycle.

14 And it's not just in the use and disposal, but  
15 it's in the manufacturing process. There are workers that  
16 are exposed to some sort of these chemicals.

17 And where does the chemical go? I mean it's a  
18 basic law of physics that nothing can be created or  
19 destroyed. Where is this chemical going?

20 And lastly, I think, and I'm going to say it  
21 again, I know I said it this morning, but I think this idea  
22 that you can rely on the containment strategy and that'll  
23 work is ignoring years and years of evidence. And years of  
24 experience by the people in your own department.

25 DTSC's entire goal for many many years was to do

1 cleanup of sites. Cleanup where containment did not work.  
2 Yet one of the -- yet if you have a priority three chemical  
3 you're saying the containment will work.

4 So it does seem to me to be not congress with the  
5 goal of the entire Green Chemistry Initiative, and certainly  
6 not congress with the goals of 1879.

7 I think I'll go ahead and leave it there.

8 MS. RODRIGUEZ: Thank you.

9 MR. ROGGE: Mike Rogge with California  
10 Manufacturers and Technology Association. I'd just like to  
11 make a couple of comments on the economic impact. You were  
12 talking about costs. And I think one of the problems is  
13 that you're taking on the whole economy with this program  
14 with the straw, as it stands.

15 And the costs to one company aren't going to be  
16 anywhere close to the cost to another company. So any  
17 individual information that you get might be meaningless  
18 overall.

19 The same thing with the timeframe to comply. Some  
20 companies will be able to comply easily within a year.  
21 There might be others that it's going to be many many years  
22 before they could do that.

23 So I think you really need to take another look at  
24 the scope of what you're biting off, and don't bite off more  
25 than you can chew.

1 Thank you.

2 MS. RODRIGUEZ: Thank you.

3 MS. SANDBORN: I'm Heidi Sandborn with the  
4 California Products Stewardship Council. And we submitted a  
5 letter on the Green Chemistry rule back in September of --  
6 July 29th that basically supported the comments that Mr.  
7 Magavern made earlier.

8 Which is that we believe that products that have  
9 already gone through an analysis that deemed them toxic  
10 enough to ban from disposal in California should not have to  
11 go through an additional alternatives analysis. And should  
12 go directly to the end-of-life management option. And  
13 there's a lot of reasons for that I'll get to in a minute,  
14 and that includes costs.

15 And on page 47 of the straw proposal where it  
16 talks about end-of-life management, it gives three  
17 alternatives that the manufacturers could use: take-back  
18 programs; or statewide or local recycling or collection  
19 programs. I'd like some clarification of what that means  
20 and who's going to fund it. And statewide or local programs  
21 to control priority chemical or concern of consumer product  
22 impacts to the environment.

23 So I guess the question is for you when you say  
24 local programs, we're funding it now and it's not working.  
25 And we're going bankrupt. And we're putting staff on

1 furlough and we're closing our HHW facilities and we're  
2 reducing hours.

3           And I was just in Calaveras County yesterday where  
4 the public was outraged at a tax increase to pay for the  
5 landfill. And at the same time they reduced their temporary  
6 events from five per year to three. And their cost was  
7 \$200,000. And they're getting about 5 percent of what's out  
8 there.

9           This is not working. And we are in a serious  
10 financial situation with HHW. So for products that have  
11 already been banned from disposal, can we change the  
12 regulation in the straw proposal to get around the  
13 alternatives analysis and get -- because they've already  
14 determined them toxic, you know, so toxic you can't even put  
15 them in an engineered and monitored landfill. And get them  
16 straight to a take-back situation.

17           MS. RODRIGUEZ: Bob, do you want to address --  
18           (Laughter.)

19           MS. RODRIGUEZ: I'll address the end of life, but  
20 the whole philosophy behind why we can't go straight from a  
21 ban -- straight to a ban without going through the AA.

22           MR. BOUGHTON: Yeah, the law requires it to be  
23 done. So we'd have to create a streamlined AA of some sort  
24 that shortcut the heavy lifting of the AA, perhaps, that led  
25 to that. But --

1 MS. OSTROM: Well, I think that would fit into one  
2 of the tiers. If we --

3 MR. BOUGHTON: Yeah.

4 MS. OSTROM: I mean, if we created a tiered  
5 approach, then that's the type of, you know, circumstances  
6 we would want to be able to delineate for, you know, a  
7 particular tier. Where, as you say, we've already done the  
8 research to know that it's prohibited from disposal. To go  
9 straight to end-of-life management.

10 Now, if you're suggesting that, you know, that  
11 might incite somebody to seek an alternative, then we get  
12 into the issue, you know, we don't want to get into, where  
13 somebody might choose an alternative that might have regrets  
14 associated with that. And they might not know that if they  
15 didn't do the alternatives assessment.

16 But if what you're suggesting is to go straight to  
17 end-of-life management without a restriction, then I think  
18 that's appropriate.

19 MS. SANDBORN: So, you agree?

20 MS. OSTROM: I do.

21 MS. SANDBORN: Great. Well, we feel very strongly  
22 about this. I mean this has been an ongoing problem for  
23 local governments that, you know, we certainly appreciate  
24 the industry in having to come up with costs, and what it's  
25 going to cost them to manage and change their rules.

1           But I have to tell you, nobody's really been too  
2 concerned about the cost impacts to local government and  
3 taxpayers to be dealing with this stuff at the back end,  
4 with the imposed mandates that we've had that were unfunded.

5           And we're at a critical point, and this stuff is  
6 not getting managed correctly. And I'm very concerned about  
7 the budgets next year, because they're just going to get  
8 worse. So I just wanted to put it out there as a very  
9 serious consideration. And hopefully public cost  
10 considerations are just as important as the private sector  
11 cost consideration.

12           MS. RODRIGUEZ: Heidi, I want to just bring up a  
13 second point, which is this response action is triggered for  
14 the manufacturer. The manufacturer has to come up with a  
15 plan to help the locals address it. That's what it means.  
16 It doesn't mean that the locals have to come up with it.

17           The manufacturers have to then be responsible for  
18 it at the end of life.

19           MS. SANDBORN: Including funding?

20           MS. RODRIGUEZ: Including funding.

21           MS. SANDBORN: Okay, I just wanted a clarification  
22 because it's not clear from the way I read this that that  
23 was part of the consideration. Okay. Very good. Thank you  
24 very much.

25           MR. NEWMAN: Hello. Eric Newman with KP Public

1 Affairs. I'm working with the Green Chemistry Alliance on  
2 behalf of Californians for Fire Safety. And I have a  
3 comment, and then a follow-up question.

4           Unfortunately, I didn't bring AB-1879 with me.  
5 But the way I read the authorizing legislation is that there  
6 are numerous alternative response actions, and you pointed  
7 them out, that you can take.

8           I was surprised, and it doesn't necessarily -- I  
9 don't see anything in the bill, itself -- that says that  
10 everything becomes prioritized in, you know, level one, two  
11 or three, leads ultimately to a ban. Instead, it may be  
12 appropriate for one of the other response actions to apply  
13 to that product throughout its lifetime.

14           So, my question is that doesn't appear to be the  
15 way that you're reading 1879, since you ultimately ban  
16 everything that falls into a priority.

17           And then secondly, if that's the case, are the  
18 other response actions simply response actions that you put  
19 into place before you reach your ban lifetime?

20           MS. RODRIGUEZ: Okay, first of all, the intent of  
21 the prohibition is to only limit it if there is a safer  
22 alternative, which means it exists, there's less hazard with  
23 exposure, and there isn't a significant impact. If you have  
24 an alternative with a significant impact that triggers other  
25 response actions.

1           It's only when you choose not to, for whatever  
2 reason, a business reason, not to trade out that chemical of  
3 concern in your product, that you would be subject to it.  
4 And, again, it's only the safer alternative.

5           The way it's written right now, it needs to be  
6 adjusted. And that's kind of what some of the input we  
7 need. We don't want people feeling, because, you're right,  
8 it doesn't make sense, to be in it, if you go through  
9 everything, and then you're banned at the end. What's the  
10 point? What's the incentive?

11           MR. NEWMAN: Well, my question also goes beyond  
12 that in terms of I didn't see a ban as mandatory in what  
13 you're doing. You're given a list of possible response  
14 actions. And if one of response actions solves the problem  
15 that you're creating with that chemical in that product, in  
16 terms of safety, I don't see anything in the bill that says  
17 you necessarily, even if that response action solves the  
18 problem, leads to a ban.

19           MR. SPEAKER: That's right. It doesn't  
20 necessarily.

21           MS. HARRIS: You're right. We chose one approach,  
22 and I think even as Evelia said, you know, based on what we  
23 have, we need changes to it. Comments, obviously, on what  
24 the criteria would be for the subgroup of products or  
25 chemicals in products that should be subject to a ban.

1           And if you think that some of the other response  
2 actions are more appropriate, and what those criteria would  
3 be, that's the kind of comment that we need.

4           MR. GUTH: Joe Guth, Science and Environmental  
5 Health Network. I guess just on this point, tell me if I  
6 have this right. Okay.

7           So if you have a chemical of concern in a product  
8 and you don't implement a safe alternative whether there's  
9 not or not, then you're subject to a schedule of  
10 prohibitions.

11          MS. RODRIGUEZ: Um-hum.

12          MR. GUTH: If you do implement a safer  
13 alternative, which is still a chemical of concern, but it's  
14 safer, okay, because it's less potent, it's got whatever,  
15 then the response actions are, I mean they're still present,  
16 but they're not as stringent. They're more relaxed.

17          MS. RODRIGUEZ: Right.

18          MR. GUTH: The prohibition period is longer.  
19 There's a variety of sort of, you know, I'll just call them  
20 escape hatches, you know, based on exposure.

21          So, you still have a product that has a chemical  
22 of concern, but because it's a safer one there's less  
23 stringent consequences. So that's the motivation to move to  
24 a safer alternative.

25          MS. RODRIGUEZ: Um-hum.

1 MR. GUTH: And to keep moving to safer  
2 alternative. Because if you keep doing that you can kind of  
3 keep your product on the market. You might still implement  
4 a continual series of chemicals of concern, but they're  
5 safer and safer as you go.

6 MS. RODRIGUEZ: Right.

7 MR. GUTH: So is that the scheme that you're  
8 trying --

9 MS. RODRIGUEZ: Yes.

10 MR. GUTH: -- to get out here? Okay.

11 So this section on and on, I'm not even -- this  
12 like kind of response action criteria B2, these are for  
13 alternatives that still contain a chemical of concern.

14 Because, in part, you have to find if there's a  
15 significant impact, right?

16 MS. RODRIGUEZ: Um-hum.

17 MR. GUTH: So, if you implement a safer  
18 alternative, it's still a chemical of concern, and if you  
19 find there's no significant impact, then is that --

20 MS. RODRIGUEZ: You got to safer.

21 MR. GUTH: You're done. Even with the chemical of  
22 concern, you might be done?

23 MS. RODRIGUEZ: If you keep getting -- if you  
24 still have a chemical of concern you're still subject to the  
25 AA.

1 MR. GUTH: Okay. So, all right, so if you have a  
2 chemical of concern in a safe alternative that you implement  
3 you're still subject -- so you have to do an alternatives  
4 analysis, but if you decide there's no significant impact,  
5 you don't have to do a response action, but you do have to  
6 do a continual search for yet a safer one?

7 MS. RODRIGUEZ: Right.

8 MR. GUTH: Okay. Then I wanted to go back -- I  
9 mean that does seem to be implementing a procedure that is  
10 not getting rid of all chemicals of concern in commerce  
11 within a certain period of time. It's driving people to  
12 move towards safer and safer ones, as sort of safe harbors,  
13 you know, to forestall those consequences. Okay.

14 Bill, you raised a question of just whether any of  
15 the chemicals -- whether the chemical becomes a product,  
16 itself, and is therefore subject to a prohibition.

17 The way I read that is, in section 111, is that if  
18 a barrel of solvent, okay, is the product, then it may be  
19 subject to a response action. But only that product.

20 And, I guess it would have consequences for  
21 whatever that barrel of solvent is being used to make, but  
22 it doesn't become all instances of the use of that chemical  
23 throughout commerce. It's just tied to the use of that  
24 solvent, that product. That solvent is a product.

25 What I guess I'm trying to say is legally there's

1 still an overlay of whether it's a consumer product. Are  
2 you following me?

3 MR. ALLAYAUD: Of course --

4 MR. GUTH: Of course you are. Thank you.

5 (Laughter.)

6 MR. ALLAYAUD: Bill Allayaud with the  
7 Environmental Working Group. I think these are easy  
8 questions. Page 5, response actions. What does research  
9 and development mean, and green chemistry funding? Can you  
10 elaborate on that a little bit?

11 And then I have one other easier question yet, I  
12 think. I don't see penalties anywhere. I assume there's  
13 existing provisions in the Health and Safety Code for  
14 penalties, and these will eventually show up in regulations,  
15 but you're not there yet because that's kind of the easier  
16 part, I assume.

17 So that's probably a yes-or-not question, but the  
18 other part I'm curious about elaboration on. Thanks.

19 MS. RODRIGUEZ: Okay. For research and  
20 development there is some performance standards in there for  
21 what would qualify as a research and development project.  
22 And this isn't something that somebody could self-implement.

23 You would actually have to come to us, petition for the  
24 authorization to go that route.

25 And when we review that petition, we could put

1 specific conditions in there under which that research and  
2 development can happen.

3 In other words, because somebody wants to do  
4 research and development, it would be up to DTSC, in  
5 conjunction with public input, as to whether or not this  
6 would be a viable alternative, what the timeframe is, so on  
7 and so forth. And there's criteria in the straw that  
8 addresses that.

9 As far as the green chemistry funding, that was  
10 put into the law. And one of the conditions that we put in  
11 there is that DTSC cannot manage that money in any way. So  
12 it has to be set up kind of as a third-party kind of an  
13 entity. And there's criteria in the straw language that  
14 kind of addresses what that would include.

15 And so I see that as an option for multiple  
16 companies coming together to start funding some of these  
17 maybe information gathering or sharing stuff. But we don't  
18 get involved in it. In hazardous waste management it would  
19 be similar to a SEP, a supplemental environmental plan.

20 And think of it in terms of that. Think of it in  
21 terms of there's something that you have to do that you want  
22 to set up kind of a cooperative. And that if two or three  
23 companies come to us and want to do this, and again it would  
24 subject to our approval, what is being proposed, what's the  
25 timeframe, what's the objective, how do we monitor for it,

1 all that would come into play, along with public comment.

2 MS. SARTAIN: We have time for one more question  
3 about -- public response actions.

4 MR. DELEO: Hi. Paul Deleo with the Soap and  
5 Detergent Association. You spoke with regard to the  
6 prohibitions about those being use-specific, so a chemical,  
7 and then the use.

8 Would those uses be specific in the sense of the  
9 product categories? So if the chemical of concern was lead,  
10 would it be lead for use in products used by infants, or be  
11 more specific than that?

12 MS. RODRIGUEZ: More specific.

13 MR. DELEO: Okay, then that begs the question what  
14 point in time do all those uses of a chemical of concern get  
15 inventoried so that DTSC is aware of what those are? And if  
16 there's a necessity for enforcement action, they know how to  
17 enforce the regulations?

18 Have you considered that? Or is there a mechanism  
19 for that?

20 MS. RODRIGUEZ: That would kind of fall into like  
21 implementation plan for the department as to how this thing  
22 actually gets audited, enforced. How outreach is done; how  
23 you -- that would be a part of the plan that comes after.  
24 So, it's not incorporated into --

25 MR. DELEO: It would be guidance or something

1 along those lines?

2 MS. RODRIGUEZ: Guidance.

3 MS. SARTAIN: Thank you, Evelia. Let's go ahead  
4 and open up the room now for general discussion about  
5 anything that you have heard today, any comments that have  
6 been made, pretty much anything.

7 And we can start that now.

8 MS. PALITZ: Pam Palitz from Environment  
9 California. I wanted to just mention follow-up on the EPA,  
10 the person from EPA's comment about consistency in  
11 alternatives assessment and tie that into what Bill Magavern  
12 said.

13 I believe that if we have third parties conducting  
14 the alternatives assessment that that would automatically  
15 guarantee consistency. It would also, I think, be more  
16 efficient because then the third party could aggregate  
17 products, you know, from different manufacturers that are  
18 essentially the same, or, you know, markedly similar.

19 And therefore, would do a more accurate  
20 alternatives assessment. And would include all of the kinds  
21 of alternatives that she was mentioning, the kind of  
22 traditional alternatives. And there would be nothing left  
23 out. There would be no reason to; there would be no vested  
24 interest.

25 I think a third party would be the most efficient

1 and effective way to do alternatives assessments.

2 MR. FISCHBACK: Randy Fischback with Dow Chemical.

3 I was trying to pick up on something that Joe Guth just  
4 talked about. And that was the barrel of solvent or  
5 whatever. It got my mind thinking.

6 Because I'm not sure, I won't claim to understand  
7 how the straw deals with something like this, but my company  
8 uses hazardous raw materials and turns it into benign  
9 products. And I've used the example of the latex glove  
10 before. Use styrene and butadiene to make benign latex  
11 gloves.

12 And I'm just wondering if this process would try  
13 to ban styrene and butadiene as a consumer product to Dow as  
14 a raw material in the course of making latex gloves used in  
15 the medical community.

16 So, -- and I don't know the answer to that, but I  
17 guess I need someone to -- if you know the answer, that's  
18 great. Especially if the answer is no, it doesn't  
19 contemplate doing that.

20 If it does contemplate doing that, I think we've  
21 opened a whole new realm of concern. Because now we're not  
22 talking about baby toys and things that people are buying  
23 off the shelves and we don't know how they're handling them.

24 Now we're talking about the things that we use to  
25 make things in a very controlled environment that the

1 stoichiometry, to use my engineering background, that  
2 stoichiometry and things favor using those reactive  
3 chemicals to make things. You can't use unreactive things  
4 to make things.

5 So, if you've got an answer to that, great.  
6 Otherwise, I think we need to concern ourselves with that.

7 MR. ROGGE: I am Mike Rogge with California  
8 Manufacturers. I'd just like to make a comment as far as  
9 small manufacturers go.

10 When people think about the California  
11 manufacturers they usually think about large companies. And  
12 ten years ago I think our membership was probably 100  
13 percent large companies.

14 Now we're probably 60 percent meeting with the  
15 smaller companies, and probably 25 percent of those are in  
16 the 10 to 20 employee range. And they are the ones who have  
17 contacted me really since the Science Advisory Panel and  
18 heaving of the exorbitant costs for this circuit board  
19 example that was thrown out. And saying, can we even stay  
20 in business in California; should we be considering moving,  
21 or what do we do next.

22 So, those are the startup companies, a lot of the  
23 innovators. We're going to just drive those people out of  
24 this state. And I'd like you to take that into  
25 consideration. Thank you.

1 MR. OWEN: The last two commenters raised an  
2 important point. We are charged, under AB-1879, and the  
3 general laws and the constitution of California, of writing  
4 a regulation to implement that statute -- the California  
5 activity.

6 So, from a product sense, that's fairly  
7 straightforward. It's for the sale or use of the product  
8 which contains a chemical of concern.

9 When we look at the other entry points of the  
10 chemical list, so using Randy's example of styrene, it  
11 appears on that placeholder list. And styrene, as an  
12 intrinsic chemical product, would be regulated. But adding  
13 onto Mike Rogge's comments, that means for its use in  
14 California.

15 To the extent following Randy's example further,  
16 styrene that's used in Midland, Texas to make latex gloves,  
17 it is not detectable in latex gloves, it's not part of the  
18 product category pathway, or the chemical lists of lists  
19 pathway.

20 So something to consider as we talk about the  
21 three entry points. How that plays.

22 MR. FISCHBACK: We make it in Pittsburg,  
23 California, so that -- we would no longer be able to  
24 manufacture that in Pittsburg, California, is that correct?

25 MR. OWEN: It's the product, whether it is the

1 chemical product, itself, identified through the chemical  
2 list, or the list of lists, or the product categories. It's  
3 sale or use in California.

4 So if a chemical input is not in a product, and  
5 that input is made elsewhere, that's beyond the scope of  
6 California law.

7 MR. FISCHBACK: You may have talked that way, but  
8 I didn't understand the answer. We buy styrene in  
9 California to turn into latex gloves in California. Would  
10 that activity no longer be allowed?

11 MR. OWEN: The regulated California activity for  
12 styrene, as a chemical consumer product would be its use in  
13 California. So to answer your question, that hypothetical  
14 model in a different way, if you were to --

15 MR. FISCHBACK: No, it's not hypothetical. We buy  
16 styrene and we make it into latex gloves.

17 MR. OWEN: Styrene, as a consumer product, would  
18 be regulated in California. So if ultimately through that  
19 process it went through an alternatives analysis and was  
20 prohibited, then, yes, you would not be -- would be using  
21 styrene under the prohibitions as a result of the  
22 alternatives analysis for the California activity.

23 I want to bring out, if you were doing it in  
24 Midland, Texas, and styrene is not in the latex, there is  
25 not scope with respect to the use of styrene.

1 MR. FISCHBACK: I'm sorry, I'm not talking about  
2 -- first of all, we don't have facilities in Midland, Texas.  
3 I'm talking about a facility that's operating in the state  
4 of California.

5 MR. OWEN: Styrene, if banned, could not be used  
6 then in your Pittsburg facility, in California.

7 MR. FISCHBACK: Okay, thank you.

8 MR. OWEN: What I was trying to get is that only  
9 occurs, Mike, Randy, and everyone else, based on the three  
10 approaches. The product category approach, this would not  
11 occur. Because it's the product, as defined in those  
12 categories.

13 And, of course, we're looking for input on what  
14 those categories mean, how big the buckets are, how they're  
15 defined, what the jurisdiction is.

16 The list of lists is the same. Again, it's the  
17 consumer product that contains the chemical of concern  
18 identified from the list. It's the intermediate list, the  
19 specified chemical, that presents a problem.

20 MR. SPEAKER: (Off mic) -- styrene never got to be  
21 a product, -- in Pittsburg, California --

22 MR. OWEN: It is a consumer product if it's sold  
23 to him in Pittsburg, California. If Dow Chemical were  
24 buying styrene in Midland, Texas, and manufacturing latex  
25 gloves in Midland, Texas, and then selling latex gloves in

1 California, then it is not a product.

2 THE REPORTER: Excuse me. If you want this on the  
3 transcript you need the mic. We are not picking up his  
4 voice. You need to ask the question on the record, if you  
5 want it on the record.

6 MR. OWEN: Yeah. It's important. Please restate  
7 the question again. Thank you.

8 MR. DOTY: Sure. My name is Robert Doty, Cox,  
9 Costle and Nicholson; it's a lawfirm, but I'm not here on  
10 behalf of any client. Simply here because I'm interested in  
11 environment law and policy and have been since I was a law  
12 student in Berkeley.

13 And if I'm understanding the dialogue between you,  
14 Don, and the gentleman from Dow, if the styrene is sold to  
15 the plant in Pittsburg, it's therefore a regulated product  
16 in California. If it were to be banned through the  
17 alternatives analysis, Dow's only alternative is to move  
18 that product production to some other state?

19 MR. OWEN: Dow has many alternatives. I'm not  
20 going to speak to what Dow's prerogatives and alternatives  
21 are. I'm referring to styrene as a specified chemical in  
22 part D, page 2. It is, itself, a consumer product.

23 So, the chemical, styrene, the barrel, if further  
24 used in California in California is a consumer product.

25 MR. DOTY: Right, I'm with you so far.

1 MR. OWEN: Styrene sold or used anywhere else  
2 outside California, and not detected in a consumer product,  
3 meaning any of those product categories, any of the other  
4 chemicals, were on a list of lists as products containing  
5 those chemicals, it is not a consumer product.

6 MR. DOTY: But he's buying it, and the way he's  
7 buying it and using it --

8 MR. OWEN: In his case the answer is if banned he  
9 could not use it in California.

10 MR. JACOB: Good discussion. Tom Jacob --

11 (Laughter.)

12 MR. JACOB: Tom Jacob from DuPont. I'd just like  
13 to make a few general observations. I think this is an  
14 extremely, this particular dialogue is extremely important.

15 And I think a point that Randy made about the  
16 utility of reactive chemicals can't be lost here. And I  
17 think when you look at the range of hazards that you've  
18 specified, and you start considering this very open-ended  
19 definition of consumer product that we're burdened with  
20 under this law, and when you consider on top of that no  
21 provision for trace detectable quantities, no provision for  
22 de minimis thresholds, you have a situation being created  
23 here that I think we haven't really begun to scope the  
24 ramifications of this across commerce.

25 Not just in California, but we're also talking

1 about this very directly here today, as being a model. This  
2 is a much bigger issue. And I don't think we can dismiss it  
3 lightly.

4           These chemicals are used for very distinct  
5 reasons. And I think when you start making an  
6 interpretation of what is meant by a consumer product that  
7 is that expansive, this is a terribly complicating  
8 circumstance. And I think we've got to find a way around  
9 that.

10           I'd also like to make just a couple of other  
11 observations. Don, on the question of the 16 chemicals, you  
12 had mentioned that it's kind of a placeholder for  
13 uncertainty in science, lack of information, disagreement  
14 among experts. Well, there's a lot more chemicals than  
15 those 16 that would fit under that definition.

16           But a number of us, including our company, voiced  
17 support for this legislation. And I think had a lot of  
18 support among the legislators, on grounds that it was more  
19 appropriate to have these decisions made by the state's  
20 competent scientists in a deliberate process.

21           And, to me, that explanation kind of defies that  
22 expectation. Because, in essence, for those 16, but it  
23 could be 30, it could be 50, if that's the criteria, you're  
24 not making a science-based decision. You're saying we are  
25 defaulting to effectively banning these chemicals.

1           You're punting on the science, but you're not  
2 making a decision. The decision is to affirmatively include  
3 them as compounds -- as chemicals of concern. And I think  
4 that really is not consistent with the expectation of  
5 applying the state's scientific expertise to make these  
6 judgments.

7           And they're hard judgments. I mean, the compounds  
8 that we're involved with that are on that list, there had  
9 been a huge amount of scientific investigation all across  
10 the world, into those compounds. And there's still  
11 controversy.

12           But to resolve it simply by saying, well, there's  
13 controversy, so, you know, we'll resort to the ban, I think  
14 defies the expectations around this law.

15           And I think, you know, in our recommendations from  
16 the Green Chemistry Alliance, I think we tried honestly to  
17 wrestle with some of these questions. But part of wrestling  
18 with them, I would submit, is really having some affirmative  
19 role for the department in arbitrating these tough  
20 questions.

21           And I think, for example, Heather's suggestion of  
22 having, at least for the more complex products, a workplan  
23 that's acted upon one way or another, sanctioned at one  
24 point or another by the department, is very important.

25           And part of the reason why it's important, part of

1 the reason why we're in such a dilemma if we don't, for  
2 example, have de minimis levels, if we stick to that broad  
3 range of chemicals, and if we have those last couple  
4 categories of inclusion, is that we'll end up not making the  
5 department's decisions in a rational science-based  
6 foundation in the department. All these decisions are going  
7 to be kicked to the courts.

8           And I think the point that was made by our  
9 colleague from EPA is a very good one. And I think it's  
10 directly germane to this.

11           One of the concerns that I've had from the get-go  
12 reading this bill and understanding earlier on the general  
13 direction here is that if we don't -- that one of the real  
14 questions here is this question of competitor-to-competitor  
15 evaluations. And how that is reconciled in this process.

16           And in a way, it's, under the current rules it's  
17 kind of not reconciled. But it will be reconciled. And I  
18 think a lot of it will be reconciled as case law evolves.  
19 And I'm not sure that that's really all consistent with the  
20 intent, either.

21           This is a tough issue. And there's not, perhaps,  
22 as explicit direction in the law as we'd like in some areas;  
23 and in other areas there's too much. But, I think we do  
24 need to wrestle with these. I appreciate the challenge of  
25 doing that.

1 I don't have the answers that my colleague, Doug,  
2 said I would give to you today. But, --

3 MS. HARRIS: But you will soon, right?

4 MR. JACOB: Pardon?

5 MS. HARRIS: I said but you will soon, right.

6 MR. JACOB: Well, you already have many of them in  
7 the form of the Green Chemistry Alliance document. A lot of  
8 time on the part of many of us went into that. And I think  
9 it's not perfect, it wasn't intended to be the answer. But  
10 it was intended, in a very honest way, to stimulate dialogue  
11 about these challenging points that necessarily have to be  
12 dealt with in the bill.

13 Sorry for being so long-winded.

14 MR. OWEN: Thank you for your input. And you  
15 raised, at least, five challenges. Again, I need to restate  
16 that the straw proposal is just that, a straw proposal. And  
17 we appreciate the input we received, not only from GCA, but  
18 everyone, CHANGE Coalition and all the people here today.  
19 Those people who are participating by webcast or email, or  
20 in individual meetings. And we encourage that. This is a  
21 reminder that you have the opportunity to give us comment  
22 through November 4th.

23 But, taking it step-by-step, you mentioned the  
24 definition of consumer product, and that it is overly broad.  
25 We don't define it in the straw proposal. We rely on that

1 which is in the statute. And it only gives five exemptions.

2           So how would you define consumer product? We've  
3 tried some examples here today to elicit for the dialogue.  
4 But at the end of the day, this team needs your input on  
5 what the words on the page would be in the rule to define  
6 that. That's not in the GCA proposal, by the way.

7           Second, let me talk about criteria for the second  
8 list of chemicals. I'll re-ask the original question: What  
9 are the pros and cons for the product category approach?  
10 What are the pros and cons of the specified chemicals? And  
11 if -- what should the criteria be? And the weight of the  
12 pros and cons as the list of lists approach. Tell us. Tell  
13 us what you would change. Tell us if you'd drop them or add  
14 others.

15           You also mentioned the workplan. We've heard that  
16 idea before. Tell me how a workplan would work with respect  
17 to de minimis, consumer product and criteria for a specific  
18 chemical. I must repeat, this is not a chemical ban.  
19 Anything that enters must go through the alternatives  
20 assessment, leading to the regulatory response, however or  
21 by whomever that's done.

22           And at the end of the day this law's about  
23 consumer products. So to the extent a chemical is a  
24 consumer product, can't be minimized. That is very  
25 important considerations as we write these rules.

1           The challenge was consistency among competitors in  
2 product classes, uses of a chemical. Tell us your ideas,  
3 please. Our straw proposal there, but it's only a  
4 beginning. And we want fuller detailed dialogue of what  
5 would be changed, or what would make it stronger. What  
6 would make it more practical and effective.

7           MR. GUTH: Did you want to respond?

8           MR. JACOB: Just by way of clarification, I strung  
9 a lot of ideas together. The idea of the workplan wasn't --  
10 I didn't mean to imply that that was an answer with respect  
11 to de minimis.

12           But simply that it's part of the answer in helping  
13 us to better define, for purposes of assuring a degree of  
14 compliance with the law, what is acceptable.

15           And when I look at the lack of de minimis, what  
16 that suggests to me is we cannot, in our decisions, satisfy  
17 -- come to any satisfactory conclusion about what is  
18 acceptable. Because there's always going to be somebody  
19 that can pick up a product and find a way of detecting  
20 something in there that we maybe haven't looked at and not  
21 intended, not an ingredient in the product. We have no  
22 insulation from that outcome.

23           At least the idea of a workplan provides one  
24 measure of order for us, as manufacturers, trying to meet  
25 the expectations that are being framed by the law. That was

1 the point of that.

2 And it was in the larger context of, as I look at  
3 this, one of the big challenges is not just meeting with the  
4 expectations of the law, but doing so in a way that doesn't  
5 necessarily leave us wide open to some sort of, you know,  
6 litigation down the road that's just going to undermine the  
7 whole effort.

8 And I think the threat of that, to the extent it  
9 becomes realized, may be the greatest threat to the  
10 integrity of the whole process.

11 MR. OWEN: If I might, let me try to recast what  
12 I've heard in the sense that this team would need that. The  
13 absence of a de minimis level with respect to a chemical  
14 ingredient which could be detected analytically would be a  
15 con to one or more, or both, the chemical pathways. So,  
16 Tom's comment would be that something would be necessary to  
17 address that.

18 I think the question for us is even larger. At  
19 the Science Panel they tackled this issue, somewhat  
20 imprecisely, but some helpful constructive guidance toward  
21 us. But they raised even more issues. Does use include  
22 transformation or combustion products. If you have a list  
23 of lists of chemicals, which include carcinogens, and --  
24 there are many carcinogens that flow from burning fuel.  
25 Fuel is a consumer product. How does that work?

1           So help us understand chemicals to product,  
2 alternatives analysis, regulatory response.

3           MR. GUTH: Joe Guth, Science and Environmental  
4 Health Network. I just wanted to respond to two issues of  
5 the many that are sort of on the table.

6           One is the issue of litigation, I guess it's been  
7 called the threat of litigation. I think that is a  
8 substantial concern. And it's raised by vague or ambiguous  
9 or uncertain or poorly defined terms. That's what, you  
10 know, a lot of litigation is all about. And I think there  
11 are a lot of those in the regulations as they are. What is  
12 a significant impact?

13           So these are things that I know it's very hard to  
14 define. And, you know, unfortunately, though, there's an  
15 inclination coming from the department to just have somebody  
16 else define them, have manufacturers define them, because  
17 it's hard to define. But that is just a recipe for no one's  
18 going to agree.

19           The various interest groups are not going to agree  
20 on that. And it will end up having to resort to a court.  
21 And so there are a lot of problems with that, besides all  
22 the litigation, uncertainty, all the time it takes. You  
23 would lose control over what those terms mean, you know, and  
24 be giving them to a court.

25           So I would urge you to sort of, you know, as

1 counterintuitive as it is, the harder the question seems to  
2 you in your mind, to define what it is and what it means,  
3 the more important it is for you to do that in the  
4 regulations.

5           Then I wanted to just go back a little bit to the  
6 styrene example. The way I understand this would work is if  
7 styrene's used in Pittsburg, California, to make latex  
8 gloves, it's a chemical of concern; the barrel of styrene is  
9 a consumer product. And Dow needs to take that chemical  
10 through an alternatives analysis.

11           It is prioritized depending on how much exposure  
12 it is to workers, the environment. So if they can -- the  
13 first thing is that if they can handle it in the plant in  
14 such a way as to minimize exposure, get it down the priority  
15 list, then that affects what happens, right? Because if  
16 they do end up with a response action that's stringent the  
17 lower priority it is.

18           The second thing is they need to take it through  
19 an alternatives analysis. Maybe there's a better way to  
20 make latex gloves. Maybe there's alternatives to latex.  
21 Maybe there's alternatives to styrene. I mean I don't know.

22           But they have to go through that process.  
23 Nevertheless, they might end up at the end of the day with a  
24 chemical of concern, a priority chemical of concern that's  
25 subject to being phased out in a certain period of time

1 unless they can find an alternative.

2           So, I think, I have some sympathy for the idea  
3 that in that kind of circumstance where it's a chemical  
4 intermediate, which, I mean it's not going to be -- there's  
5 not a disposal problem, assuming we can really believe that.

6       But this is not in the gloves, and it disappears, it may  
7 present a little bit different situation than a chemical  
8 that is carried on through commerce and ends up in a  
9 landfill somewhere someday.

10           REACH has special provisions for chemical  
11 intermediates. And so I think there might be some merit to  
12 a, you know, sort of constrained set of provisions around an  
13 intermediate, as long as it does go through this kind of  
14 analysis.

15           MR. OWEN: Just to quickly clarify. If styrene is  
16 a chemical of concern, which it would be under the part B  
17 listing, then it would be the manufacturer of styrene from  
18 whom Dow purchases that would be required to do the  
19 analysis.

20           Dow could do it, but our regs are constructed, in  
21 concept, to require the manufacturer.

22           MR. GUTH: Well, the substantive issue, though, is  
23 still the same. Right? The consequence -- the type of  
24 regulatory response is the same, whether it's Dow or whoever  
25 they buy it from.

1           MR. OWEN: For the California activity, that would  
2 be correct.

3           MR. GUTH: Okay.

4           MR. OWEN: But not everything is a California  
5 activity.

6           MR. GUTH: Right. But, --

7           MR. OWEN: Right, so that's a very important thing  
8 because we are just a state. You know, we're not a nation  
9 that can --

10          MR. GUTH: Okay, well, all right. I guess I'm  
11 trying to say that in a circumstance where if you go through  
12 an alternatives analysis with styrene in Pittsburg,  
13 California, and we are confident the way that it's being  
14 handled that latex gloves don't present problems. That  
15 there's no, you know, no alternatives. That some kind of  
16 provision for -- time-limited provision for, you know,  
17 intermediates might be appropriate.

18          MR. BECK: Not to belabor styrene too much, but I  
19 have a further question about it. And it's used in a lot  
20 more things than latex gloves. Every pleasure boat that's  
21 made in the world contains styrene, because it's used as a  
22 cross-linking agent for unsaturated polyester resins.

23                 So my question is forget about, you know, buying  
24 the styrene in California and all that stuff, but first of  
25 all, we don't have to analyze fiberglass reinforced plastics

1 to know that there's styrene there.

2 If we did want to do it, we could probably figure  
3 out an analytical technique fairly easily. You go in and  
4 recognize this cross-link between the polyester poly-alls as  
5 having been styrene at one time.

6 So my question is, you know, what do we mean by a  
7 chemical in a product. Is this resulting fragment that  
8 began as styrene, but which is now hooked in with this  
9 three-dimensional thermal set network that started out as  
10 unsaturated polyester mixed with styrene, is that a product?

11 If I was a boat manufacturer, does my boat then  
12 have styrene in it? Or is it just -- is just polyester  
13 thermal set, and styrene is completely gone? Take away the  
14 fact, you know, that as soon as the boat is made, you can  
15 still smell the styrene because it's still coming off.

16 But assuming that it's been, you know, somehow all  
17 that stuff has been taken care of, and there's still some  
18 resulting fragment of styrene there, does that constitute  
19 styrene in the consumer product?

20 MR. OWEN: That's our question for everyone. What  
21 are the definitions of those terms: Chemical, chemical  
22 ingredient, consumer product. And a number of other  
23 technical considerations. It is detectable? At what level?  
24 Is it transformed? What happens in use and end of life?

25 All of those things have to be part of the

1 definitions. So help us, tell us what your perspective with  
2 respect to then how you would define -- have us define it.

3 MR. ULRICH: John Ulrich, California Chemical  
4 Industry Council, Green Chemistry Alliance. The  
5 conversation that we've just had, starting with Randy  
6 Fischback and continuing, I think points out the tremendous  
7 difficulty of the proposal that's in front of us. And I  
8 think trying to make sense out of it, as it's presented, is  
9 a futile effort.

10 I think we need to go back, take a look at the  
11 green chemistry proposal; look at the definition, as we've  
12 defined it. We agree with the consumer product definition.

13 We go on from there to look at a way to prioritize, to move  
14 to chemicals of consideration, chemicals of concern. Marry  
15 that up with products.

16 Somehow or another the department is going to have  
17 to make some typical choices to limit and prioritize this if  
18 it expects to go forward.

19 I think we have to come to the realization that  
20 even materials that we have in our household, for those that  
21 have pools, you undoubtedly have to buy muriatic acid to  
22 adjust your pH. Something that we have to do routinely.  
23 Thirty-two percent hydrochloric acid. It's an eye -- it  
24 will take an eye out, a tremendous chemical burn.

25 What are we to do, replace that with a different

1 type of acid? Somehow or another we're going to have to  
2 adjust pH. Should we use 1 percent acid in a barrel or two  
3 in order to get the same pH value? It doesn't make sense.

4 A drain cleaner that doesn't dissolve lint is not going  
5 to be a drain cleaner.

6 Somehow or another we need to come to the  
7 realization that chemicals have intrinsic properties that  
8 oftentimes are corrosive and hazardous. And they need to be  
9 used properly. That's not a problem. That's why we buy  
10 them. That's why they're made.

11 We need to come to the realization that not  
12 everything is a carcinogen, mutagen, teratogen, or a  
13 reproductive toxicant, or a persistent bioaccumulative toxic  
14 material. We need to come to rational decisions on this and  
15 move forward.

16 I'd heartily recommend once again, and excuse me  
17 for repeating it, but I think it's extremely important  
18 because so few people read it, look at the Green Chemistry  
19 Alliance proposal. There's a lot of material in there, and  
20 it is a good proposal. And I would suggest to you that it  
21 answers many of the questions that you're asking for answers  
22 to.

23 Thank you very much.

24 MS. DANIEL: I am Lesli Daniel, a member of the  
25 general public. And I just wanted to stand up and remind

1 you, not that you've forgotten, but you don't generally get  
2 the general public at these workshops. And -- the law,  
3 okay? So I just wanted to stand up, not because I have any  
4 insight on the regulations, but to remind you clearly what  
5 goes into, because the consumers don't generally get  
6 represented in these types workshops.

7           And what this law is about. Why did it come  
8 about? It came about because of knowledge that consumers  
9 need greater protection. It came about because consumers  
10 have very limited knowledge and access to information. It  
11 came about because we don't even know what's in chemical  
12 products because it's not required to be listed.

13           It came about because we need information, we need  
14 alternatives -- been known to shift responsibility. Costs.

15           So that we will encompass more rather than just those that  
16 are covered currently under current law for health and  
17 protection. We need more protection for consumers in the  
18 consumer law.

19           So, I just wanted to remind you all, and I think  
20 you're doing a great job. And it's a tough one. But I just  
21 wanted to balance out some of the other reasons. Don't  
22 think they're unimportant. But just keep in mind you are  
23 balancing to make sure that you're taking the consumer  
24 issue, the original intent. And the original intent is to  
25 protect the consumers who don't have the information, don't

1 have the access, and don't have much of a voice.

2 Thanks.

3 MR. HACKMAN: Andy Hackman, again, from the Toy  
4 Industry Association. A comment on the product category  
5 approach, because I think we focused a lot on the chemicals  
6 approach.

7 One of the concerns that I've got in terms of  
8 requiring the product manufacturer, particularly for  
9 products that have various components in very long supply  
10 chains, making them develop the hazard data, and potentially  
11 submit it to the department, is going to be a very difficult  
12 task, both because of the long supply chains, but also  
13 because you may get conflicting data between different  
14 manufacturers and different points that are looked at.

15 So I think, as you look at the product category  
16 approach, that's something that needs to be considered.

17 In terms of recommendations and alternatives,  
18 we've not talked a lot about selecting some chemicals first  
19 and going through that prioritization exercise. We again  
20 support the GCA efforts on that.

21 I think one other aspect you might look at,  
22 instead of requiring product manufacturers to come up with  
23 actual hazard data, is to look at and showing that a product  
24 doesn't have hazard characteristics as it's presented into  
25 the marketplace.

1           So I think a lot of companies would easily be able  
2 to look at and say, our product doesn't have those hazard  
3 characteristics in the marketplace. And I think that's a  
4 better way to go versus making manufacturers scurry around  
5 to develop piles of data that could differ in lots of places  
6 on the chemicals that could be in their products.

7           MR. ALLAYAUD: Bill Allayaud, Environmental  
8 Working Group. I guess this goes in the category of general  
9 statements, because people have given their philosophy about  
10 things.

11           Joe Guth said a lot of what I was going to about  
12 the way this looks like it's supposed to work. But I was  
13 really interested in the styrene example because we know  
14 doctors love these latex gloves. We love latex. I used  
15 latex just last week painting. I put some of these on my  
16 hands. So they're useful things.

17           But then isn't it supposed to work that if styrene  
18 that's bad, and I don't know what list it's on; I don't know  
19 how bad it is. I think it's a carcinogen, but you make it  
20 into something benign, as you said.

21           But maybe that's the whole point of this, is that  
22 you go in, as Joe said, find the alternative. You might  
23 come up with a cheaper latex glove. It won't be called  
24 latex, it'll be glove X. And that's what innovation, as  
25 several of the industry people have talked about.

1           And so I trust the American marketplace to  
2 innovate. And it might be 3 cents more a glove, or 1 cent  
3 more. It might be 3 cents less. We don't know.

4           But I would say I want -- I'd be willing to pay 5  
5 cents more for shampoo that doesn't have phthalates or 4  
6 cents more for the latex glove because it doesn't have  
7 styrene in something else.

8           You know, getting there is a problem. I wouldn't  
9 call it futile, I'd call it challenging. But I kind of  
10 trust that system. And sometimes you need a regulatory kick  
11 to move it that way and innovate faster. Because I don't  
12 think industry, by itself, will just keep innovating and  
13 make things good. I see a lot of shampoos that say,  
14 natural, organic. I know that most of them have phthalates.

15          I don't want phthalates in it particularly. So I have to,  
16 but there's nothing on the label. You will not see that  
17 word, except contains no phthalates.

18          So, that's what I'm talking about, is I think that  
19 innovation will happen. And I'm not afraid of the  
20 regulatory process at all, as a consumer, that I'll pay a  
21 little bit more. If it drives it up to triple the cost, if  
22 that chemical is so bad that the workers are getting high  
23 rates of cancer, we should get styrene out of there. But  
24 that's what the process will reveal, I think.

25          Even though I'm sure Dow, DuPont, others, have

1 looked at these things because of internal liabilities and  
2 things, that you don't just use these willy-nilly.

3 But, you know, it might be difficult getting  
4 there, but I think that might be a worthwhile goal. Thanks.

5 MR. POOLE: Doug Poole with DuPont. For a change  
6 here I'm going to offer a suggestion rather than just a  
7 comment. Something that hopefully is helpful. And by the  
8 way, I am going to offer two comments.

9 Number one, I am fully supportive of this green  
10 chemistry. I have not been much involved in it in the last  
11 year and a half, but I attended some of the first workshops.  
12 And I thought it was just a great idea. I think it's  
13 wonderful.

14 Secondly, I have a wife and two children. I am  
15 also a consumer. I have dogs and a cat. And we're all, I  
16 think, consumers. So we have the same issues that you do.

17 Going back to REACH, going back to Randy's styrene  
18 example, the REACH documentation, I think the basic  
19 regulation is 459 pages. And the notes for guidance are  
20 about 4000 pages.

21 They cover situations like Randy is talking about.  
22 They cover, you know, transported intermediates under  
23 strict control. And how you're supposed to report that.  
24 And what your requirements are. And all of that. They  
25 cover the de minimis things, as I said before, the .1

1 percent for CMRs and PVTs.

2 REACH really is a great model. I just quake at  
3 the thought of having California reinvent the wheel when so  
4 much effort and so much money is going into that thing. And  
5 personally, I thought that REACH probably has reached a  
6 level where it ultimately should become a global standard,  
7 because there's going to be so much information available.

8 And it's one part of your program. Your program  
9 actually is far more ambitious, I think. Because REACH is  
10 just collecting the data; it's not prescribing anything.  
11 But it is prescribing how you collect the data, what tests  
12 you run; what the levels are; and all of that. And how you  
13 cooperate with one another and so forth.

14 So it is a great model. Go back and look at it  
15 again if you haven't looked at it in the last year.

16 (Pause.)

17 MS. OSTROM: Thank you very much for your  
18 comments.

19 MS. SARTAIN: Yeah, we asked for your input, and,  
20 boy, you guys cowboy'd up, didn't you. Stepped up to the  
21 plate and gave us some wonderful suggestions. We do  
22 appreciate it so much.

23 And I'd like to just quickly say a thank you to  
24 the DTSC team for putting this workshop together, and for  
25 all their hard work getting prepared for it.

1 (Applause.)

2 MS. SARTAIN: And thank you to our reporter. We  
3 appreciate you, too.

4 (Applause.)

5 MS. SARTAIN: This isn't the end. Please keep  
6 sending your comments and suggestions right up until  
7 November the 4th, okay. Keep sending them to us.

8 Stay safe, stay green. Good night.

9 (Whereupon, at 5:08 p.m., the workshop was adjourned.)

10 --o0o--

11

12

13

14

15

16

17

18

19

20

21

22

23

## CERTIFICATE OF REPORTER

I, JOHN COTA, an Electronic Reporter, do hereby certify that I am a disinterested person herein; that I recorded the foregoing California Department of Toxic Substances Control Green Chemistry Initiative Workshop; that it was thereafter transcribed into typewriting.

I further certify that I am not of counsel or attorney for any of the parties to said workshop, nor in any way interested in the outcome of said matter.

IN WITNESS WHEREOF, I have hereunto set my hand this 3rd day of November, 2009.

\_\_\_\_\_  
JOHN COTA, Official Reporter

CERTIFICATE OF TRANSCRIBER

I certify that the foregoing is a correct transcript from the electronic sound recording of the proceedings in the above-entitled matter, to the best of my ability.

\_\_\_\_\_  
Margo D. Hewitt    CET\*\*00480

\_\_\_\_\_  
November 3, 2009