Continuation of the SRP Review of the Draft Proposed Updates to the Chemical Substances List in Appendix A of the AB 2588 Air Toxics "Hot Spots" Emission Inventory Criteria and Guidelines Regulation

Background

At the June 28, 2019 meeting of the Scientific Review Panel (SRP), California Air Resources Board (CARB) staff provided an informational presentation about CARB's plans to update the Air Toxics "Hot Spots" Emission Inventory Criteria and Guidelines (EICG) regulation. At the October 4 meeting, CARB staff presented the draft proposed changes to the chemical substances list in Appendix A of the EICG regulation, and panel members provided initial input to the three CARB questions listed below.

Summary of SRP comments to questions posed by CARB staff at the October 4, 2019 meeting

- 1. Are we missing any important air toxic chemicals from the proposed list?
 - Check ACGIH¹ values for chemicals to be included
 - Check NIOSH list, and the Kent Olson toxicology handbook; perhaps the recent Environmental Health Perspectives article by Barupal and Fiehn could be helpful
 - All IARC group 1 and 2 chemicals should be on the list
 - Expand cobalt to consider both insoluble and soluble forms
 - Consider adding rare earth metals, metals used in catalytic converters
 - Check the EU REACH chemical list restricted chemicals or that achieve a certain status
 - Consider adding carbonyl compounds that are used as flavorings for vaping
 - Carbon nanoparticles, nanotubes and nanofibers
- 2. Are the functional group characterizations for emerging chemicals appropriate and adequate? Are there other functional groups to add?
 - Panel indicated that the functional groups approach is a good idea
 - In addition to the three proposed functional groups, panel suggested that staff explore whether to include some possible additional groups:
 - Freons and other fluorinated chemicals
 - Methylating agents
 - Aldehydes
 - o Epoxides and other reactive chemicals in epoxy mixes
 - Other categories of PAHs (e.g., nitro-PAHs, polycyclic aromatic quinones)
 - Strobins (fungicides used in purple drywall)

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¹ ACGIH = American Conference of Governmental Industrial Hygienists

- 3. Are there any chemicals on the "Not Proposed for Inclusion" List that should be included in one of the A Appendices?
 - Consider a wider vapor pressure range for substances that might partition into the gas phase or otherwise become airborne
- 4. Other general comments:
 - Why not include cardio and pulmonary toxicants as a separate category?
 - It would be good to see the existing list broken down into same categories
 - Consider including "other organics" as a category
 - Add columns for health outcomes, chemical types, and source lists
 - Like to see list combining existing and proposed new
 - May want to look into cannabis-related emissions

Next Steps

CARB requests a letter of support (or a similar document) memorializing the panel's general approval of the proposed updates to the Appendix A chemical list and any additional directions provided to CARB staff at the October 4, 2019 and in today's meetings. CARB staff will then initiate the formal rulemaking to amend the EICG regulation, and will apprise the panel of any additional changes arising from the public process. CARB staff may request a final letter of support if there are substantive changes to the Appendix A chemical list.

Timeline

- SRP's initial letter of support by February 2020
- Public workshops on EICG regulation updates expected to start in spring 2020
- CARB anticipates taking the amended regulation to the Board in late 2020
- CARB and SRP will revisit the Appendix A chemical list to draft final letter of support as needed