



Regulatory Strategies Work Group:

- Hair Finishing Spray
- No Rinse Shampoo
- Dye, Permanent

(May 20, 2019)



Today's Meeting

Hair Finishing Spray

- Program Background
- Category Summary and Analysis
- Overview and Discussion

No Rinse Shampoo and Dry Conditioner

- Definition
- Category Summary and Analysis
- Overview and Discussion

Dye, Permanent

- Category Summary and Analysis
- Overview and Discussion

Next Steps

Hair Finishing Spray

- “Hair Finishing Spray” means a consumer product that is designed or labeled for application to styled hair to provide sufficient rigidity, to hold, retain or finish the style of the hair for a period of time. “Hair Finishing Spray” includes aerosol hair sprays, pump hair sprays, spray waxes; color, glitter, or sparkle hair sprays that make finishing claims; and products that are both a styling and finishing product. “Hair Finishing Spray” does not include spray products that are intended to aid in styling but do not provide finishing of a hair style.
- For the purposes of this subchapter, “finish” or “finishing” means the maintaining and/or holding of previously styled hair for a period of time.
- For the purposes of this subchapter, “styling” means the forming, sculpting, or manipulating the hair to temporarily alter the hair's shape.

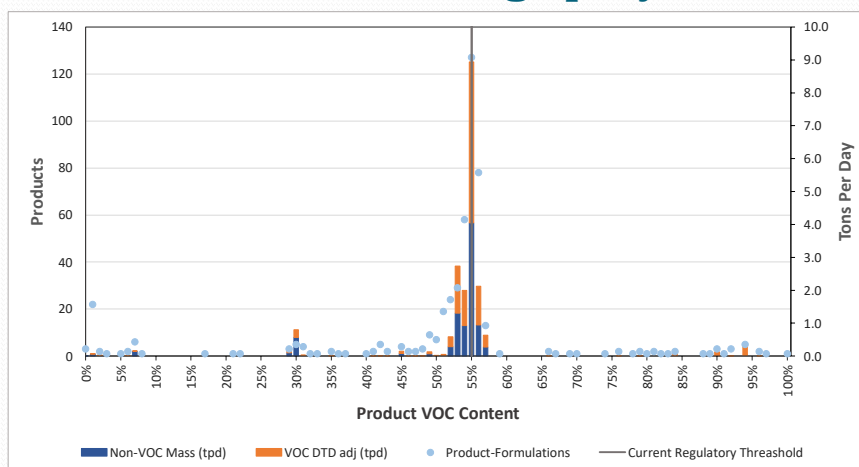
Hair Finishing Spray

- Regulation Activity
 - 80% VOC effective January 1, 1993
 - 55% VOC effective June 1, 1999
 - Hairspray Credit Program Regulation
 - Expired January 1, 2010
 - Repealed January 1, 2015

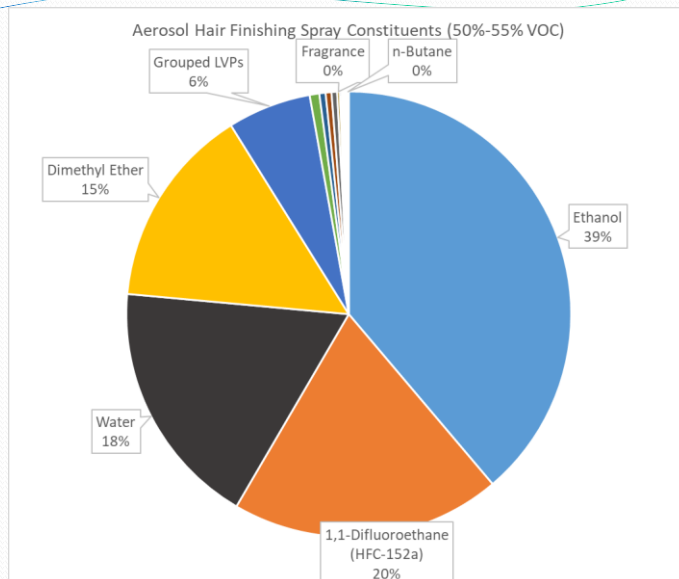
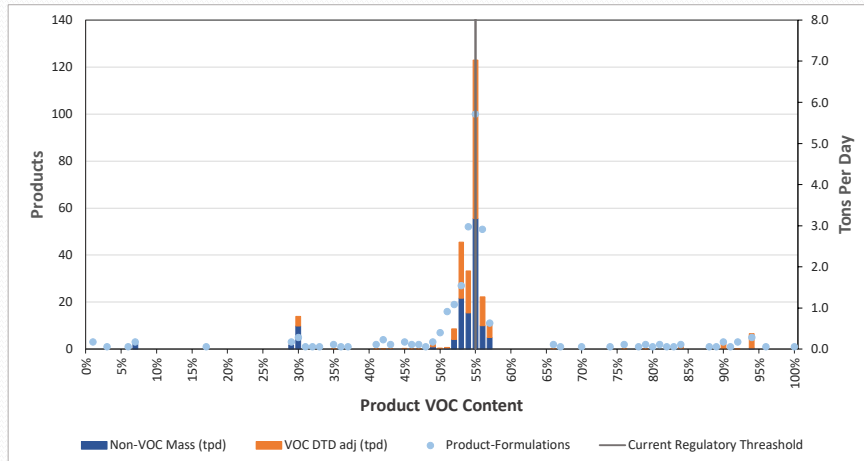
Category Summary

- 1,165 products surveyed
- 109 companies surveyed
- 19.5 tpd sales
- 10.4 tpd VOC
- Sales weighted average VOC 53.24%
- 0 to 96% VOC in category, most products 50-55% VOC
- Formulations consists primarily of ethanol and propellant

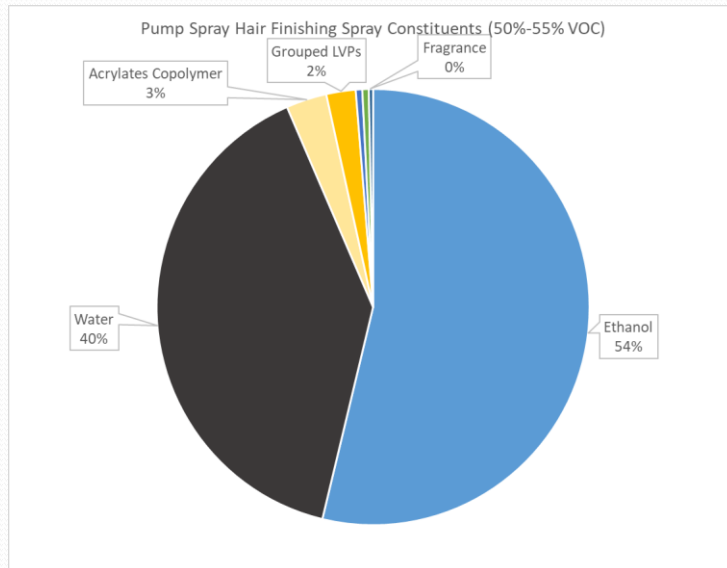
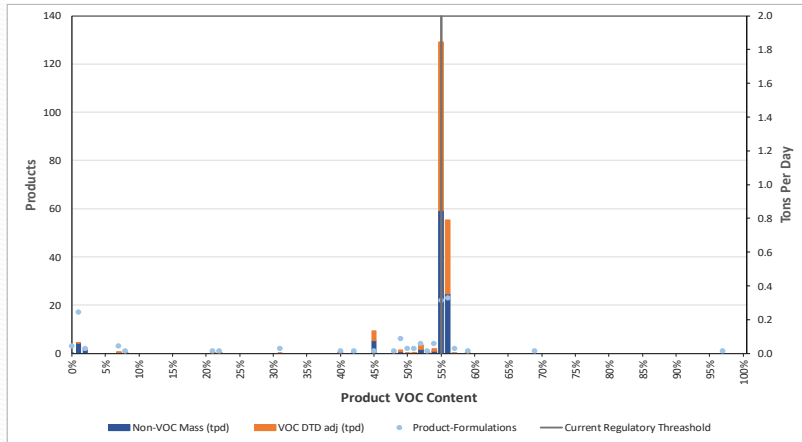
Hair Finishing Spray



Hair Finishing Spray (Aerosol)



Hair Finishing Spray (Pump Spray)



Questions and Considerations

- Adopting a VOC limit of 50% would result in around 1 tpd VOC reductions
- Aerosol and pump spray product forms appear to have different formulations. Does this mean there are different reformulation pathways?

Discussion and Questions

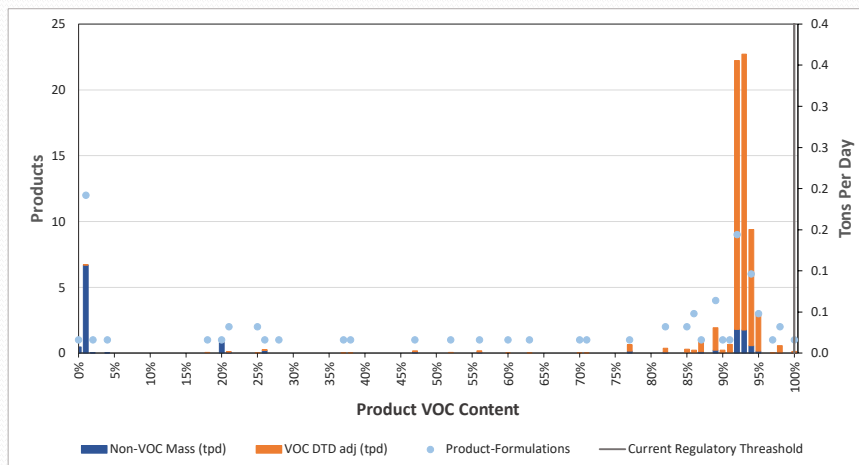
No Rinse Shampoo and Dry Conditioner

- “No Rinse Shampoo” means a product designed or labeled solely to be applied to hair that is dry to clean, absorb oil, or eliminate odor, and is subsequently removed from the hair by combing, brushing, or toweling the hair.

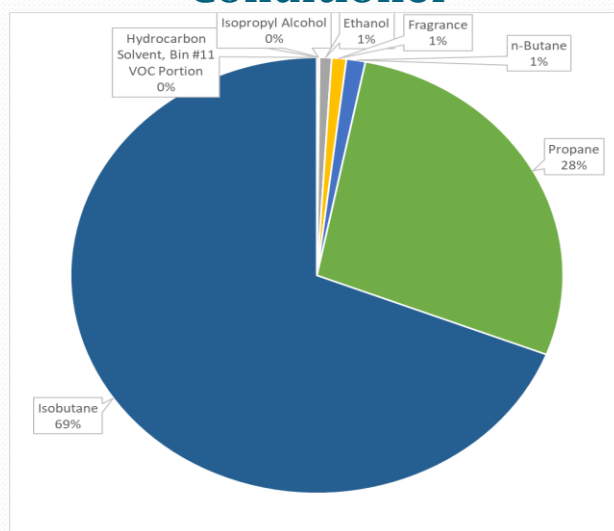
Category Summary

- 325 products surveyed
- 75 companies surveyed
- 1.19 tpd sales
- 0.94 tpd VOC
- 81.2% Sales Weighted Average VOC Content
- No VOC limit
- 0 to 99% VOC in category
- Formulations consists primarily of propellant and ethanol

No Rinse Shampoo (Dry Shampoo and Dry Conditioner)



No Rinse Shampoo and Dry Conditioner



Questions and Considerations

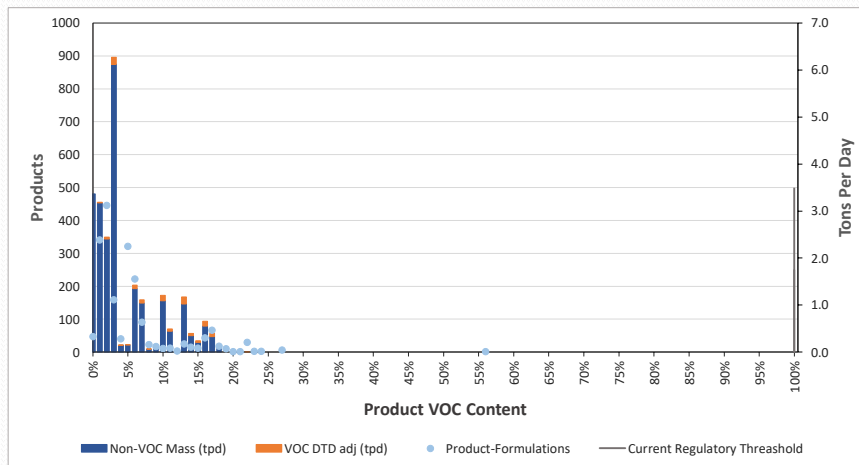
- Possible VOC limit 5-20%?
- How do the different propellants affect product performance?

Discussion and Questions

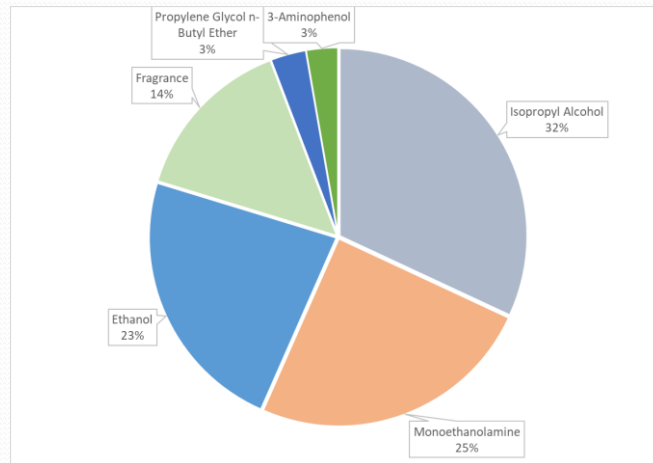
Dye, Permanent Category Summary

- 7,918 products surveyed, majority under 5% VOC
- 53 companies surveyed
- 23.11 tpd sales
- 1.00 tpd VOC
- 4.31% Sales Weighted Average VOC Content
- Category not defined and no VOC limit
- 0 to 55% VOC in category

Dye, Permanent



Dye, Permanent



Overview and Considerations

- Possible 5% VOC limit
- What explains the range of VOC content in the category?
- What is the role of monoethanolamine in the products?

Discussion and Questions

Next Steps

- Additional work group meetings this summer
- Discussions with individual manufacturers
- Further evaluation is needed to identify feasible emission reduction strategies.
- Next public workshop will be in fall 2019 to include possible regulatory options to meet our emissions reductions commitments.

Next Work Group

May 22, 2019

10 a.m. – noon PDT

Topics:

- Laundry Detergent
- Liquid Fabric Softener
- Dish Detergent/Soap (manual)
- Aerosol Cooking Spray

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