



DRAFT 2023 CONSUMER PRODUCTS SURVEY DATA RELEASE

CARB Public Webinar

June 2, 2026

Outline



2023 Survey Timeline



December 3, 2024, Survey Launch



April 8, 2025, Deadline for Submitting Completed Survey Data for both RP and Formulators



September 22, 2025, New Reporting Deadline



May 5, 2026, 2023 Draft Survey Data Summary Release



Late Summer 2026 Final 2023 Survey Data Summary Release

2023 Survey Scope and Statistics

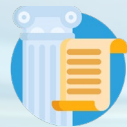
Survey Status	2023	3-Year Survey*
Total Reporting Responsible Parties (RP)	461	894
Total Products Reported	~42,200	~59,500
Total Ingredients Reported	~634,900	~525,000
Total Potentially New Ingredients Reviewed	~8,200	NA

*3-Year survey data is only for the same 37 categories surveyed in 2023

37 Surveyed Categories

Category Code	Category Name
10115	Plastic Pipe Cement and Primer
10209	Sealant or Caulking Compound -- Chemically Curing
10210	Sealant or Caulking Compound -- Nonchemically Curing
20103	Dual Purpose Air Freshener/Disinfectant (aerosol)
20104	Air Freshener, liquid/pump spray
20305	Disinfectant (aerosol)
20311	General Purpose Cleaner (nonaerosol)
20312	General Purpose Degreaser (aerosol)
20313	General Purpose Degreaser (nonaerosol)
20321	Metal Polish/Cleanser (aerosol)
20326	Oven or Grill Cleaner (nonaerosol)
20504	Carpet and Upholstery Cleaner (nonaerosol - dilutable)
20513	Spot Remover (nonaerosol)
20903	Laundry Detergent
20919	Liquid Fabric Softener
21003	Cutting or Tapping Oil (aerosol)
21012	Multi-purpose Dry Lubricant
21014	Penetrant
21018	Rust Preventative or Rust Control Lubricant (aerosol)

Category Code	Category Name
21301	Footwear or Leather Care Product (aerosol)
21303	Footwear or Leather Care Product (all other forms)
21405	Floor Wax Stripper
30101	Antiperspirant
30102	Deodorant
30207	Body Wash/Mousse/Gel/Soap/Foam/Scrub
30211	Anti-microbial Dry Hand Wash (Hand Sanitizer)
30404	Hand and Body Conditioner, Cream, Lotion, and Moisturizer
30411	Sunscreen (hair or body) (aerosol)
30602	Conditioner without styling claims
30603	Dye, permanent
60203	Clean Up Solvent
60211	Lacquer Thinner
60213	Multi-purpose Solvent (nonaerosol)
60214	Paint Remover or Stripper
60216	Paint Thinner (nonaerosol)
60223	Thinner/Reducer/Retardant (Motor Vehicle Coating Systems)
70117	Undercoating (aerosol only)



- SIP Commitment
- PCBTF Prohibition US
- EPA Regulations

Roadmap Step 1



Survey Quality Assurance / Quality Control Process

General QA/QC (Submittal Level)

- Correct CSV submittal errors
- Correct CSV formats
- Correct Product UPC formats
- Spot-check formulations vs Product Label

Label QA/QC (Product Level)

- Confirm Product Label Submittal
- Confirm Survey Category Code
- Correct Product Form and Delivery
- Check for inflated mass (Multipack, Container Fill)

Ingredient QA/QC (Ingredient Level)

- Flag all potentially newly reported ingredients (~8,200 in 2023)
- Correct mismatches and typos with CAS # and chemical names
- Identify physical/chemical properties of new ingredients
- Classify ingredients: TOG, Inorganic, or Non-Volatile Organics
- Identify TOG ingredient reactivity or surrogate
- Incorporate new ingredients into survey database for next batch use

Roadmap Step 2



List of Draft Documents for the 2023 Data Release

- Data Summary - All Categories
- TOG Speciation Summary Report
- Number of Products per Responsible Party by Category Code
- Survey Draft Chemical List and Assignments
- TOG Ingredients by Category
- Hydrocarbon Solvents List



All documents are posted at:

[Consumer & Commercial Products Surveys | California Air Resources Board](#)

Data Confidentiality

- Addressed in the design of survey reporting tools
- Incorporated in all steps of data processing
- Ensured in the current Draft Data release

For details see Survey Format Overview and Explanation at [Draft CP 2023 Survey Format Overview and Explanation](#)

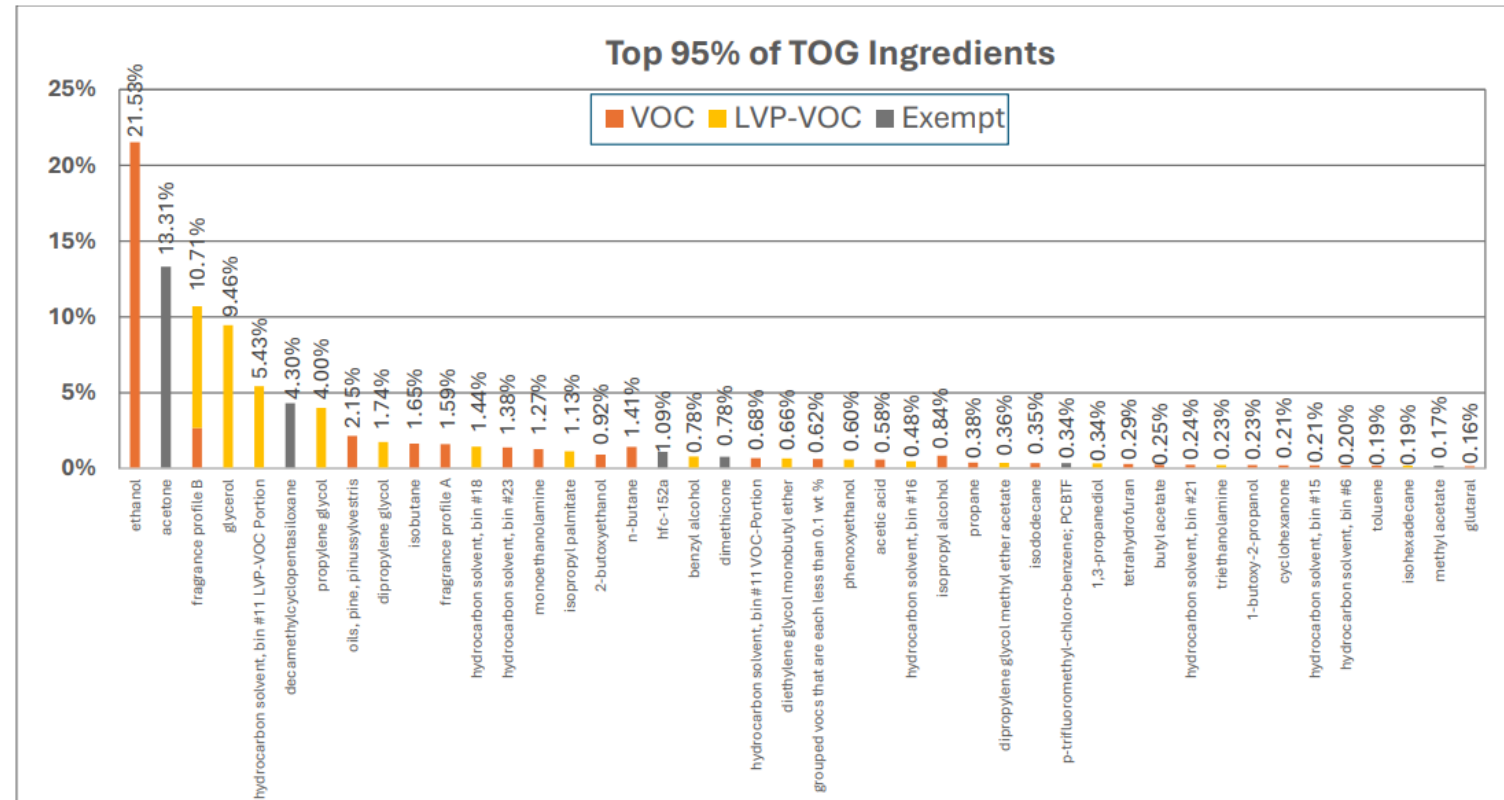
Draft Data Summaries

CARB Draft Consumer and Commercial Products Survey for Year 2023															
Initial Draft - April 30, 2026															
Category Code	Category Name	Product Data					Emissions Data (Fate and Transport Adjusted)								
		Reporting Companies	Reported Products	Sales (tpd)	Sales Weighted Average VOC Content (undiluted)	Speciation					VOC (tpd)	ROG (tpd)	TOG (tpd)	SWA-PWMIR (gO3/g)	Ozone Forming Potential (tpd)
						VOC	LVP-VOC	Exempt	Water	Other					
10115	Plastic Pipe Cement and Primer	Omitted to Protect Confidentiality													
	All Adhesives	Omitted to Protect Confidentiality													
10209	Sealant or Caulking Compound -- Chemically Curing	27	926	7.68	2.17%						0.17	0.18	0.21	0.03	0.23
10210	Sealant or Caulking Compound -- Nonchemically Curing	22	443	23.25	0.72%						0.17	0.32	0.41	0.03	0.58
	All Sealants and Caulks	35	1369	30.93	1.08%						0.33	0.51	0.62	0.03	0.81
	All Adhesives, Sealants, and Related Products														
20103	Dual Purpose Air Freshener/Disinfectant (aerosol)	9	37	0.42	37.22%						0.16	0.16	0.16	0.55	0.23
20104	Air Freshener, liquid/pump spray	45	2216	6.19	17.44%						1.08	4.73	4.74	1.97	12.17
	All Air Fresheners	50	2253	6.61	18.75%						1.24	4.88	4.90	1.87	12.40
20305	Disinfectant (aerosol)	36	141	14.60	62.72%						9.16	9.22	9.22	0.97	14.23
20311	General Purpose Cleaner (nonaerosol)	121	2904	516.74	1.37%						7.08	8.94	8.94	0.06	29.46
20312	General Purpose Degreaser (aerosol)	30	66	0.33	15.26%						0.05	0.12	0.19	0.47	0.15
20313	General Purpose Degreaser (nonaerosol)	76	660	67.04	1.38%						0.92	2.32	2.32	0.08	5.33
20321	Metal Polish/Cleanser (aerosol)	32	67	1.97	13.19%						0.26	0.80	0.98	0.29	0.57
20326	Oven or Grill Cleaner (nonaerosol)	36	196	20.87	1.30%						0.27	2.12	2.12	0.34	7.02
	All Cleaners and Degreasers	141	4034	621.55	2.80%						17.74	23.51	23.77	0.09	56.77
20504	Carpet and Upholstery Cleaner (nonaerosol - dilutable)	46	544	12.85	0.35%						0.04	0.13	0.13	0.02	0.30
20513	Spot Remover (nonaerosol)	60	377	22.15	0.30%						0.07	0.17	0.18	0.02	0.39
	Carpet, and Upholstery Care Products (Non-Laundry Products)	72	921	35.01	0.31%						0.11	0.30	0.30	0.02	0.69
20903	Laundry Detergent	64	1711	1095.61	0.64%						2.27	8.42	8.42	0.02	24.91
20919	Liquid Fabric Softener	34	541	412.61	0.66%						0.98	2.58	2.58	0.02	7.35
	All Laundry Products	65	2252	1508.22	0.64%						3.25	11.00	11.00	0.02	32.25

Speciation Summary Reports

2023 CARB Consumer and Commercial Products Survey All Categories

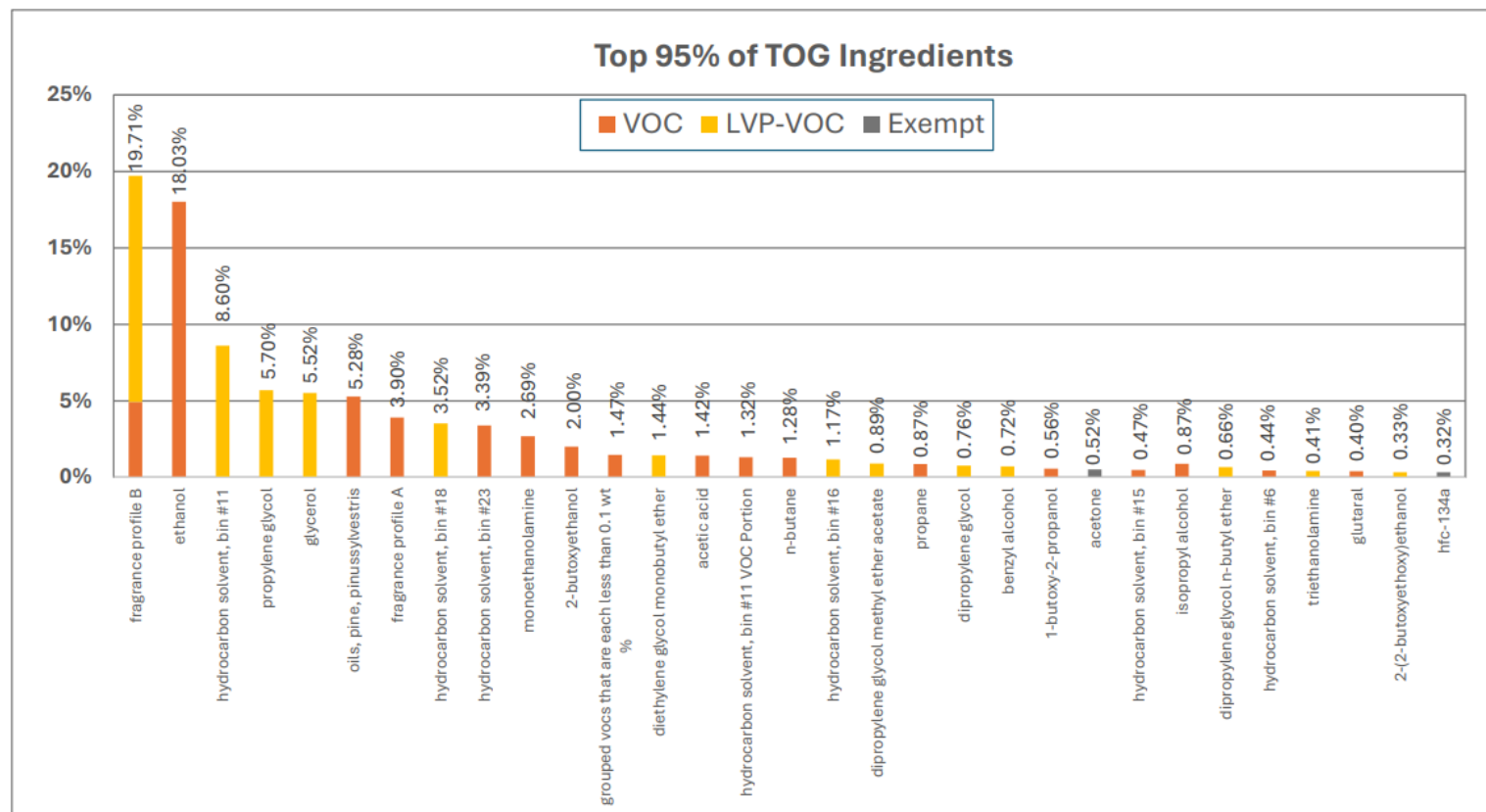
TOG (tpd)	123.34	ROG (tpd)	97.23
Sales Weighted Average PWMIR (gO3/g product)	0.02-2.58	VOC (tpd)	52.59
Speciation Based on Reported Product Formulations	0.98	LVP-VOC (tpd)	44.64
Ozone Forming Potential (tpd)	229.50	Exempt (tpd)	26.11



TOG Ingredients per Sector

2023 CARB Consumer and Commercial Products Survey
20000 - Household and Institutional Products

TOG (tpd)	49.53	ROG (tpd)	49.03
Sales Weighted Average PWMIR (gO3/g product)	0.02-2	VOC (tpd)	26.09
Speciation Based on Reported Product Formulations	0.98	LVP-VOC (tpd)	22.94
Ozone Forming Potential (tpd)	123.44	Exempt (tpd)	0.50



Number of Products per Company by Survey Category

CARB Draft Consumer and Commercial Products Survey for Year 2023		
Initial Draft- April 30, 2026		
Select Category Name	General Purpose Degreaser (nonaerosol)	
Total Number of Companies (per selected category)		76
Total Number of Products (per selected category)		660
Category Code	Company Names for Selected Category	Total Product Count (Per Company)
20313	Spartan Chemical Company, Inc.	64
20313	Ecolab Inc	58
20313	State Industrial Products	37
20313	Chemcor Chemical Corporation	34
20313	Maintex, Inc	33
20313	ZEP INC	33
20313	BradyPLUS	32
20313	Betco Corporation LLC	32
20313	Clark Core Services LLC	24
20313	Hillyard, Inc	16
20313	Genlabs	14
20313	Lawson Products, Inc	14
20313	3M Company	13
20313	W.W. Grainger Inc.	12
20313	ITW Pro Brands	12
20313	Rust Oleum Corporation	12

Select category here

Chemical List and Assignments

CARB Draft Consumer and Commercial Products Survey for Year 2023					
Initial Draft - April 30, 2026					
Chemical Name	CAS #	VOC	LVP-VOC	Exempt	MIR
(5R)-5-Methyl-2-Propan-2-ylidenecyclohexan-1-one*	89827	100			4.04
(Ethylenedioxy)Dimethanol*	3586558	100			3.60
1-(1-Butoxy-2-Propoxy)-2-Propanol	29911282		100		1.83
1,1,1,2-Tetrafluoroethane	811972			100	0.00
1,1-Difluoroethane	75376			100	0.02
1,1-Propanediol*	598447	100			2.58
1,2,3-Trimethylbenzene	526738	100			11.97
1,2,4-Trimethylbenzene	95636	100			8.87
1,2-Hexanediol	6920225		100		2.55
1,2-Pentanediol*	5343920		100		2.52
1,3-Butanediol	107880		100		3.36
1,3-Dioxolane	646060	100			4.96
1,3-Propanediol*	504632		100		2.58
1,4-Dioxane	123911	100			2.62
1,5-Pentanediol*	111295		100		2.72
1-Amino-2-Propanol	78966	100			5.42
1-Butanol	71363	100			2.88
1-Butoxy-2-Propanol	5131668	100			2.72
1-Chloro-2-(trifluoromethyl)benzene	88164	100			0.13
1-Chloro-4-(trifluoromethyl)benzene	98566			100	0.13

TOG Ingredients By Category

CARB Draft Consumer and Commercial Products Survey for Year 2023		
Initial Draft - April 30, 2026		
Select Category Name	Laundry Detergent	
Category Code	Chemname	CAS Number
20903	glycerol	56815
20903	propylene glycol	57556
20903	ethanol	64175
20903	monoethanolamine	141435
20903	dipropylene glycol	25265718
20903	grouped vocs that are each less than 0.1 wt %	99999996
20903	fragrance profile B	99999999

Select category here

Hydrocarbon Solvent List

Hydrocarbon Solvents Reported in 2013-2015 Consumer & Commercial Products Surveys,
2018 Aerosol Coating & Aerosol Adhesive Products Survey, and 2023 Consumer & Commercial Products Survey

Chemical Name	Trade Name	Manufacturer Name	Bin #	MIR
Hydrocarbon Solvent, Bin #15	Kensol 30	American Refining Group	15	1.57
Hydrocarbon Solvent, Bin #15	Kensol 48H	American Refining Group	15	1.57
Hydrocarbon Solvent, Bin #20	Kensol 61H	American Refining Group	20	0.95
Hydrocarbon Solvent, Bin #01	Hexane	Calumet	1	1.42
Hydrocarbon Solvent, Bin #02	Calumet 195-208	Calumet	2	1.31
Hydrocarbon Solvent, Bin #02	Calumet HP Isohexane	Calumet	2	1.31
Hydrocarbon Solvent, Bin #06	Calumet 210-245 <1%	Calumet	6	1.17
Hydrocarbon Solvent, Bin #06	VM&P <1%	Calumet	6	1.17
Hydrocarbon Solvent, Bin #11	142 Flash <1%	Calumet	11	0.70
Hydrocarbon Solvent, Bin #11	Conosol C-145	Calumet	11	0.70
Hydrocarbon Solvent, Bin #11	Drakesol 165	Calumet	11	0.70
Hydrocarbon Solvent, Bin #11	Drakesol 165 AT	Calumet	11	0.70
Hydrocarbon Solvent, Bin #11	Drakesol 205	Calumet	11	0.70
Hydrocarbon Solvent, Bin #11	LVP 100	Calumet	11	0.70
Hydrocarbon Solvent, Bin #11	Mineral Spirits <1%	Calumet	11	0.70
Hydrocarbon Solvent, Bin #15	Mineral Spirits	Calumet	15	1.57
Hydrocarbon Solvent, Bin #16	Calprint 35	Calumet	16	0.52
Hydrocarbon Solvent, Bin #16	Calprint 38	Calumet	16	0.52
Hydrocarbon Solvent, Bin #16	Conosol 260	Calumet	16	0.52
Hydrocarbon Solvent, Bin #16	Conosol C-170	Calumet	16	0.52
Hydrocarbon Solvent, Bin #16	Conosol C-200	Calumet	16	0.52
Hydrocarbon Solvent, Bin #16	Drakesol 260	Calumet	16	0.52
Hydrocarbon Solvent, Bin #16	Hydrocal 100	Calumet	16	0.52

Roadmap Step 3



Review and Assessment of Draft Survey Data

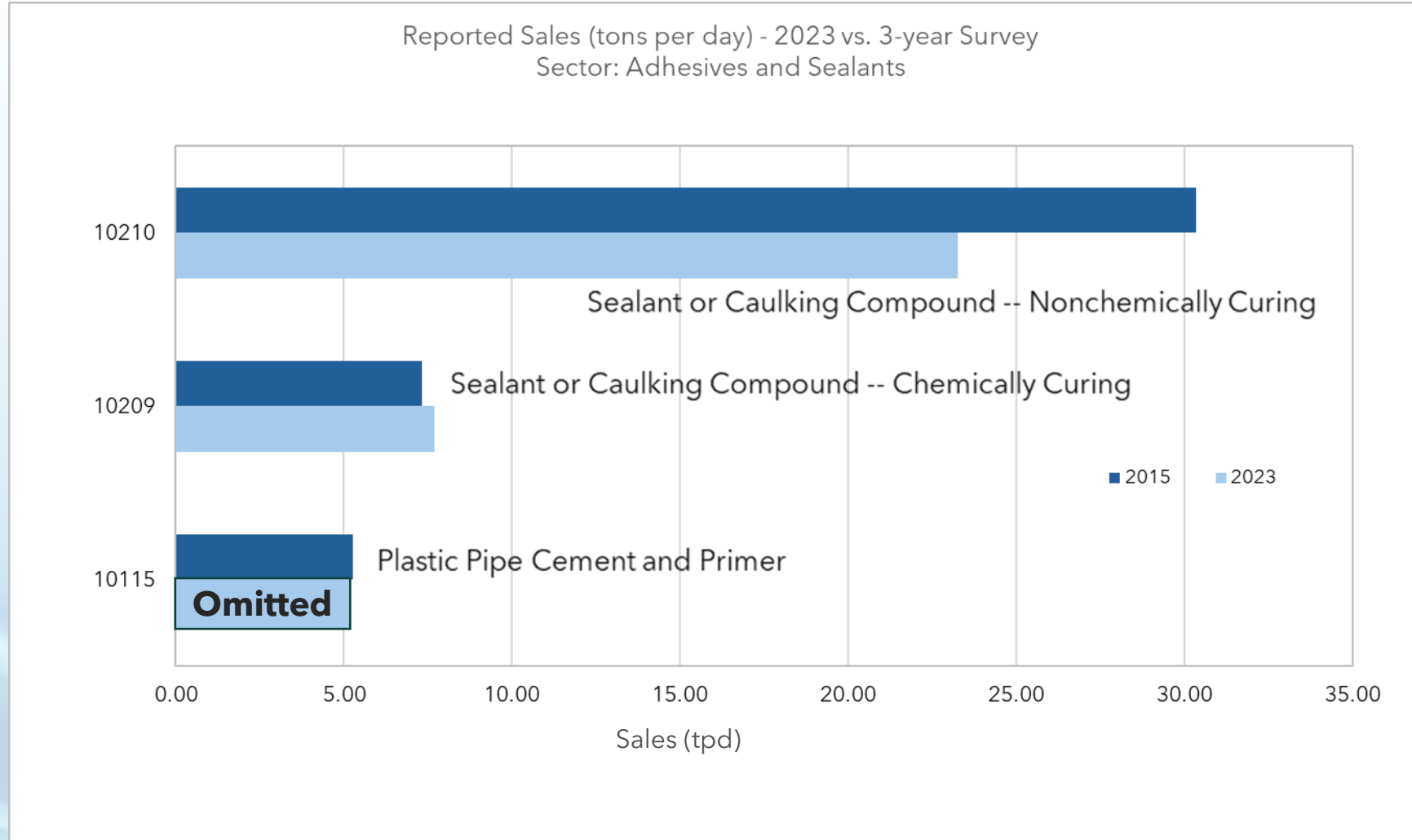
Top 10 TOG emissions Survey Categories

Category code	Category name	TOG (tpd)
30201	Anti-microbial Dry Hand Wash (Hand Sanitizer)	15.31
60213	Multi-purpose Solvent (nonaerosol)	14.63
30404	Hand and Body Conditioner, Cream, Lotion, and Moisturizer	11.26
20305	Disinfectant (aerosol)	9.22
20311	General Purpose Cleaner (nonaerosol)	8.94
30101	Antiperspirant	8.72
20903	Laundry Detergent	8.42
21014	Penetrant	7.24
20104	Air Freshener, liquid/pump spray	4.74
30411	Sunscreen (hair or body) (aerosol)	4.33

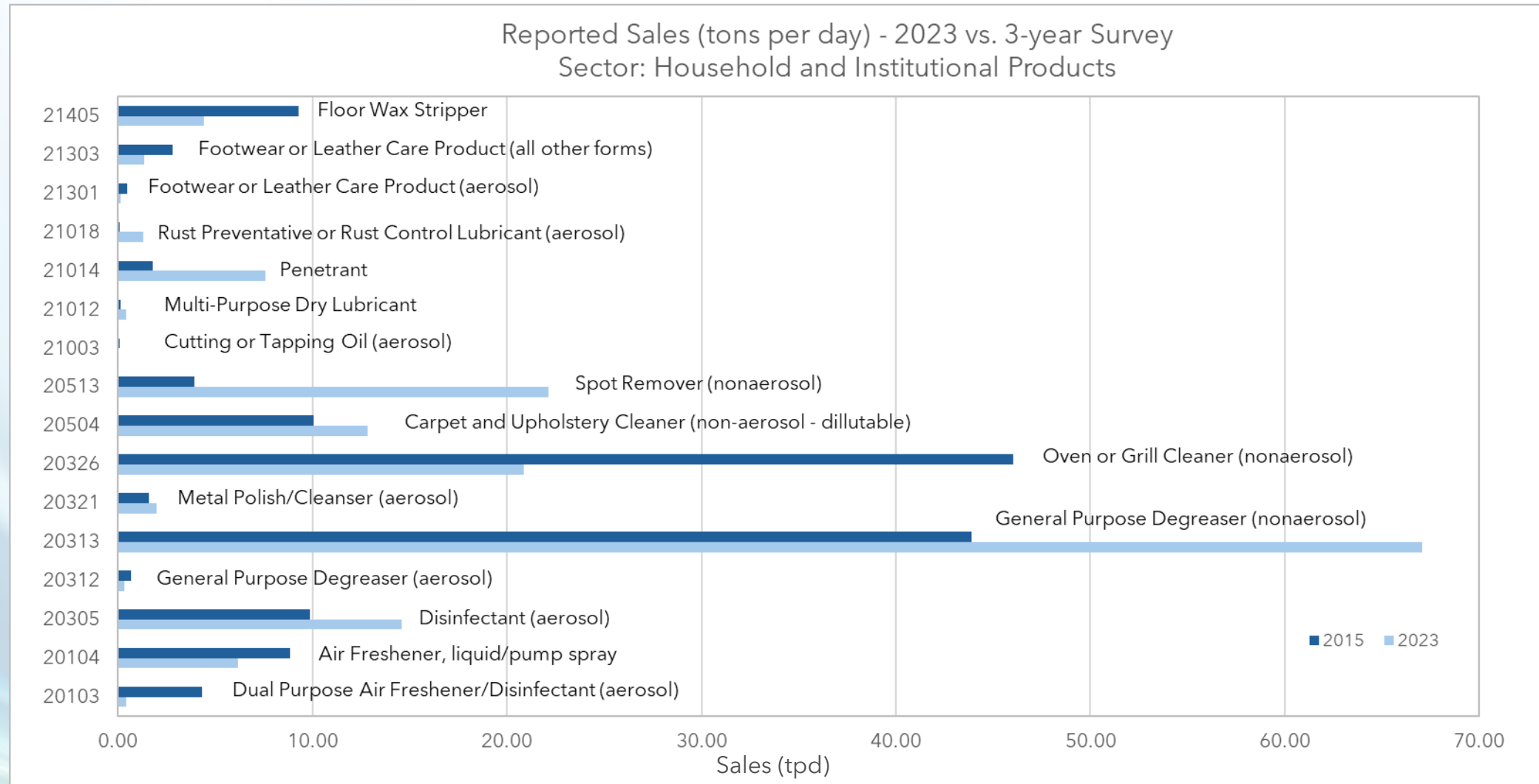
Top 10 Ozone Forming Survey Categories

Category code	Category name	OFP (tpd)
30404	Hand and Body Conditioner, Cream, Lotion, and Moisturizer	29.52
20311	General Purpose Cleaner (nonaerosol)	29.46
20903	Laundry Detergent	24.91
30201	Anti-microbial Dry Hand Wash (Hand Sanitizer)	23.43
21014	Penetrant	15.14
20305	Disinfectant (aerosol)	14.23
20104	Air Freshener, liquid/pump spray	12.17
30102	Deodorant	9.23
20919	Liquid Fabric Softener	7.35
20326	Oven or Grill Cleaner (nonaerosol)	7.02

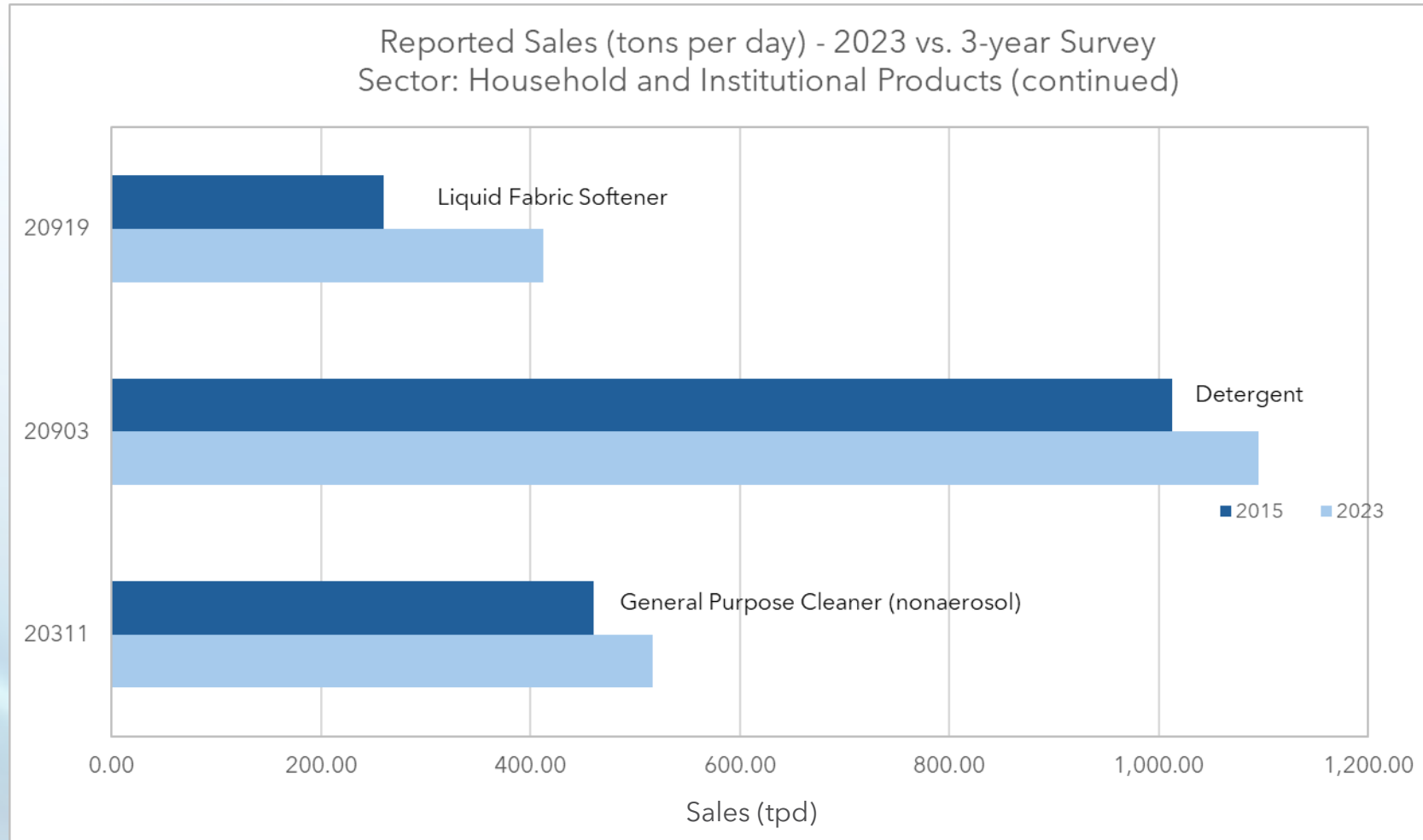
Last and Current Survey Sales Mass Comparison: Adhesives and Sealants Sector



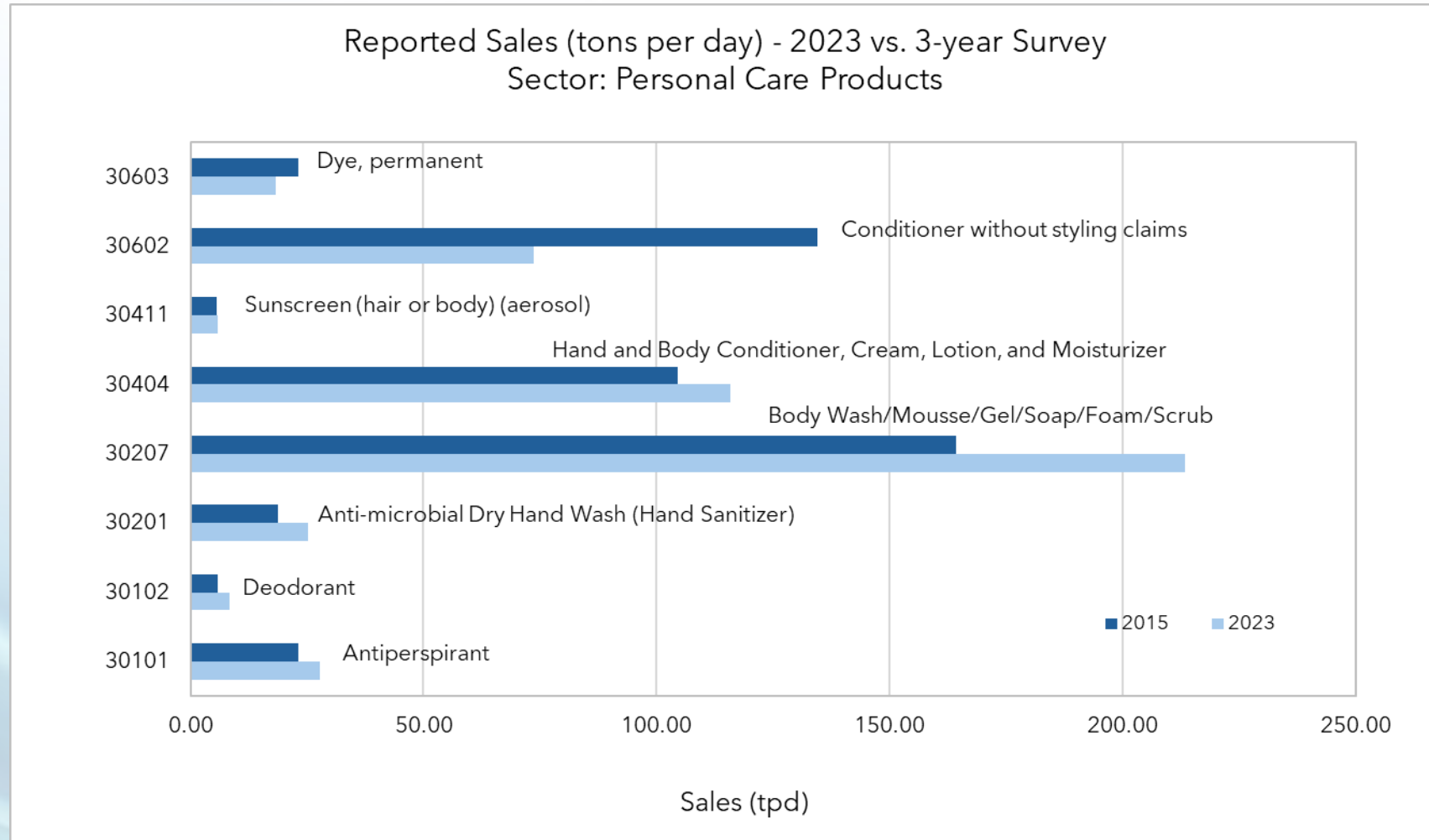
Last and Current Survey Sales Mass Comparison: Household and Institutional Products Sector



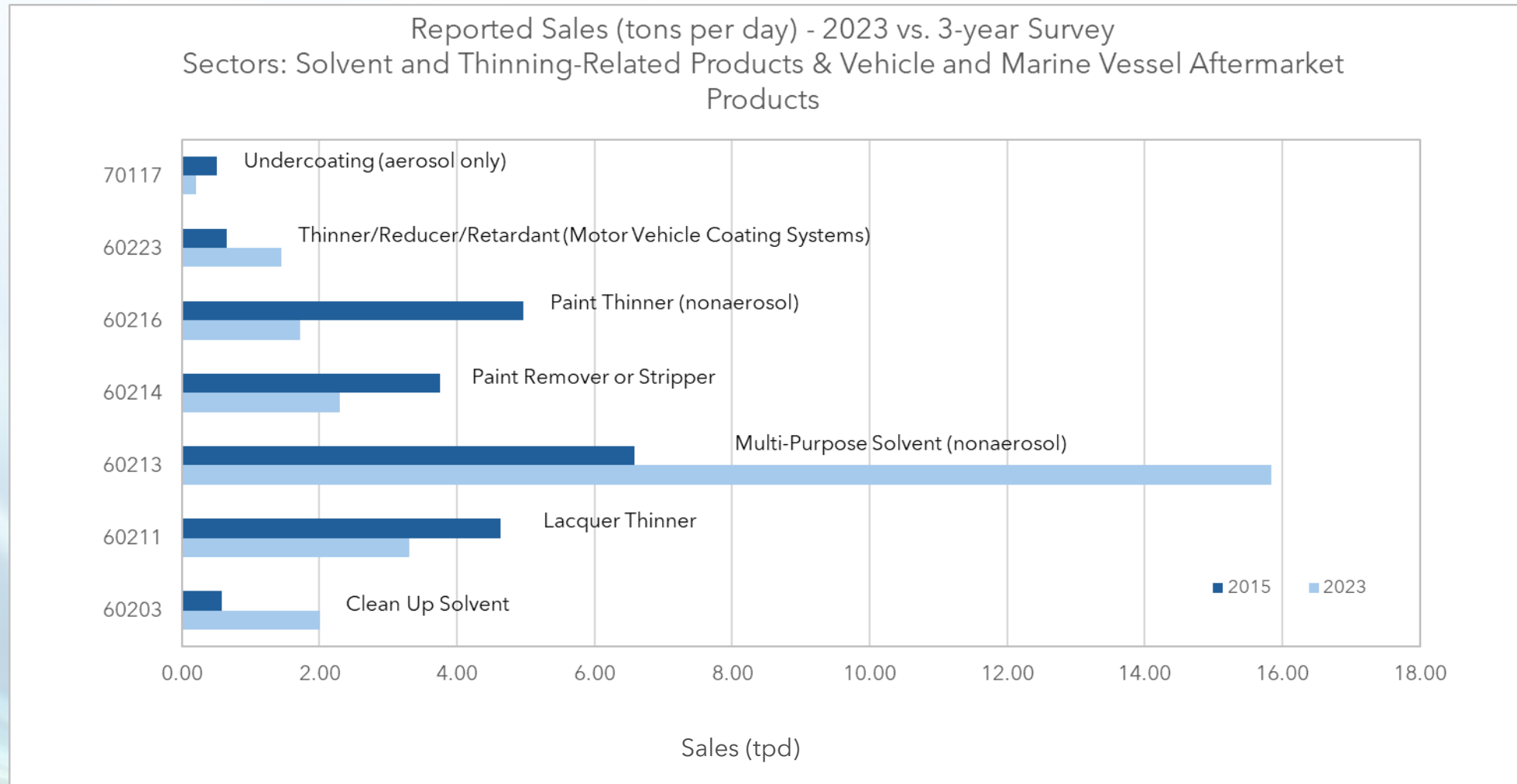
Last and Current Survey Sales Mass Comparison: Household and Institutional Products Sector (continued)



Last and Current Survey Sales Mass Comparison: Personal Care Products Sector



Last and Current Survey Sales Mass Comparison: Solvent and Thinning-Related & Vehicle Marine Vessel Aftermarket Products Sectors



Roadmap Step 4



Data Processing for the Final Data Summary

Next Steps:

- Address additional issues identified during the feedback period.
- Address over-reporting due to incorrectly reported sales through additional company outreach.
- Address under-reporting through additional company outreach.
 - Categories are identified based on industry feedback and cross-survey comparisons
 - Categories that are persistently under-reported after the Final Data release will be addressed using the Weighted Random Sampling (WRS) methodology described in the September 8, 2025 Webinar.

Next Steps Timeline



June 8, 2026 2023 Data Summary Release Feedback Period Ends



Summer 2026 Individual and Workgroup Stakeholder Meetings



Late Summer 2026 Final 2023 Survey Data Summary Release



2026-2027 Pre-regulatory Category Evaluation and Stakeholder Webinars/Workshops



Late 2027 Regulatory Amendment Board Hearing

Draft Data Release Feedback Period



Feedback Period Deadline: June 8, 2026

Please submit feedback via email to one of our contacts:

Consumer Product Help Box: csmrprod@arb.ca.gov
Moslem Hossein Mardi, Manager: Moslem.Hossein-Mardi@arb.ca.gov
Austin Henry, 2023 Survey Lead Staff: Austin.Henry@arb.ca.gov

Example Feedback:

- Draft Data Summary Feedback
- New Market Trends since the last survey
- Potential post pandemic impacts
- Company consolidations/acquisitions

Thank you!

Questions



Use the **raised hand** function (#2 if calling in by phone)



Moderators will **call on speakers** by name or last 4 digits of their phone number.

