

### Technical Report for

### Providence Engineering

Valero-CAMS, Baton Rouge, LA

712-001

SGS Accutest Job Number: JC13502

Sampling Date: 01/24/16

#### Report to:

Providence Engineering

kevincalhoun@providenceeng.com

ATTN: Kevin Calhoun

Total number of pages in report: 10



Test results contained within this data package meet the requirements of the National Environmental Laboratory Accreditation Program and/or state specific certification programs as applicable.

Nancy Cole  
Laboratory Director

Client Service contact: Victoria Pushkova 732-329-0200

Certifications: NJ(12129), NY(10983), CA, CT, DE, FL, IL, IN, KS, KY, LA, MA, MD, MI, MT, NC, OH VAP (CL0056), AK (UST-103), AZ (AZ0786), PA, RI, SC, TN, TX, VA, WV, DoD ELAP (L-A-B L2248)

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Test results relate only to samples analyzed.

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## Sample Summary

**Providence Engineering**

**Job No: JC13502**

**Valero-CAMS, Baton Rouge, LA**  
**Project No: 712-001**

Sample Number	Collected		Received	Matrix		Client Sample ID
	Date	Time By		Code	Type	
JC13502-1	01/24/16	13:00 KH	02/02/16	AIR	Ambient Air Grab	CAMS 270

**Sample Results**

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**Report of Analysis**

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### Report of Analysis

<b>Client Sample ID:</b> CAMS 270		
<b>Lab Sample ID:</b> JC13502-1		<b>Date Sampled:</b> 01/24/16
<b>Matrix:</b> AIR - Ambient Air Grab	<b>Summa ID:</b> A755	<b>Date Received:</b> 02/02/16
<b>Method:</b> TO-15		<b>Percent Solids:</b> n/a
<b>Project:</b> Valero-CAMS, Baton Rouge, LA		

Run #	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	3W52434.D	1.65	02/02/16	YMH	n/a	n/a	V3W1990
Run #2							

Run #	Initial Volume
Run #1	660 ml
Run #2	

VOA TO15 List

CAS No.	MW	Compound	Result	RL	MDL	Units	Q	Result	RL	MDL	Units
67-64-1	58.08	Acetone	1.9	0.20	0.036	ppbv		4.5	0.48	0.086	ug/m3
106-99-0	54.09	1,3-Butadiene	ND	0.20	0.028	ppbv		ND	0.44	0.062	ug/m3
71-43-2	78.11	Benzene	0.14	0.20	0.031	ppbv	J	0.45	0.64	0.099	ug/m3
75-27-4	163.8	Bromodichloromethane	ND	0.20	0.039	ppbv		ND	1.3	0.26	ug/m3
75-25-2	252.8	Bromoform	ND	0.20	0.016	ppbv		ND	2.1	0.17	ug/m3
74-83-9	94.94	Bromomethane	ND	0.20	0.018	ppbv		ND	0.78	0.070	ug/m3
593-60-2	106.9	Bromoethene	ND	0.20	0.018	ppbv		ND	0.87	0.079	ug/m3
100-44-7	126	Benzyl Chloride	ND	0.20	0.027	ppbv		ND	1.0	0.14	ug/m3
75-15-0	76.14	Carbon disulfide	ND	0.20	0.031	ppbv		ND	0.62	0.097	ug/m3
108-90-7	112.6	Chlorobenzene	ND	0.20	0.056	ppbv		ND	0.92	0.26	ug/m3
75-00-3	64.52	Chloroethane	ND	0.20	0.036	ppbv		ND	0.53	0.095	ug/m3
67-66-3	119.4	Chloroform	ND	0.20	0.017	ppbv		ND	0.98	0.083	ug/m3
74-87-3	50.49	Chloromethane	0.39	0.20	0.052	ppbv		0.81	0.41	0.11	ug/m3
107-05-1	76.53	3-Chloropropene	ND	0.20	0.027	ppbv		ND	0.63	0.085	ug/m3
95-49-8	126.6	2-Chlorotoluene	ND	0.20	0.017	ppbv		ND	1.0	0.088	ug/m3
56-23-5	153.8	Carbon tetrachloride	ND	0.20	0.031	ppbv		ND	1.3	0.20	ug/m3
110-82-7	84.16	Cyclohexane	ND	0.20	0.016	ppbv		ND	0.69	0.055	ug/m3
75-34-3	98.96	1,1-Dichloroethane	ND	0.20	0.015	ppbv		ND	0.81	0.061	ug/m3
75-35-4	96.94	1,1-Dichloroethylene	ND	0.20	0.021	ppbv		ND	0.79	0.083	ug/m3
106-93-4	187.9	1,2-Dibromoethane	ND	0.20	0.042	ppbv		ND	1.5	0.32	ug/m3
107-06-2	98.96	1,2-Dichloroethane	ND	0.20	0.018	ppbv		ND	0.81	0.073	ug/m3
78-87-5	113	1,2-Dichloropropane	ND	0.20	0.022	ppbv		ND	0.92	0.10	ug/m3
123-91-1	88.12	1,4-Dioxane	ND	0.20	0.045	ppbv		ND	0.72	0.16	ug/m3
75-71-8	120.9	Dichlorodifluoromethane	0.43	0.20	0.019	ppbv		2.1	0.99	0.094	ug/m3
124-48-1	208.3	Dibromochloromethane	ND	0.20	0.053	ppbv		ND	1.7	0.45	ug/m3
156-60-5	96.94	trans-1,2-Dichloroethylene	ND	0.20	0.028	ppbv		ND	0.79	0.11	ug/m3
156-59-2	96.94	cis-1,2-Dichloroethylene	ND	0.20	0.021	ppbv		ND	0.79	0.083	ug/m3
10061-01-5	111	cis-1,3-Dichloropropene	ND	0.20	0.015	ppbv		ND	0.91	0.068	ug/m3
541-73-1	147	m-Dichlorobenzene	ND	0.20	0.020	ppbv		ND	1.2	0.12	ug/m3
95-50-1	147	o-Dichlorobenzene	ND	0.20	0.016	ppbv		ND	1.2	0.096	ug/m3
106-46-7	147	p-Dichlorobenzene	ND	0.20	0.027	ppbv		ND	1.2	0.16	ug/m3
10061-02-6	111	trans-1,3-Dichloropropene	ND	0.20	0.018	ppbv		ND	0.91	0.082	ug/m3

ND = Not detected      MDL = Method Detection Limit      J = Indicates an estimated value  
 RL = Reporting Limit      B = Indicates analyte found in associated method blank  
 E = Indicates value exceeds calibration range      N = Indicates presumptive evidence of a compound

### Report of Analysis

<b>Client Sample ID:</b> CAMS 270		
<b>Lab Sample ID:</b> JC13502-1		
<b>Matrix:</b> AIR - Ambient Air Grab	<b>Summa ID:</b> A755	<b>Date Sampled:</b> 01/24/16
<b>Method:</b> TO-15		<b>Date Received:</b> 02/02/16
<b>Project:</b> Valero-CAMS, Baton Rouge, LA		<b>Percent Solids:</b> n/a

VOA TO15 List

CAS No.	MW	Compound	Result	RL	MDL	Units	Q	Result	RL	MDL	Units
64-17-5	46.07	Ethanol	2.1	0.50	0.075	ppbv		4.0	0.94	0.14	ug/m3
100-41-4	106.2	Ethylbenzene	ND	0.20	0.042	ppbv		ND	0.87	0.18	ug/m3
141-78-6	88	Ethyl Acetate	ND	0.20	0.075	ppbv		ND	0.72	0.27	ug/m3
622-96-8	120.2	4-Ethyltoluene	ND	0.20	0.017	ppbv		ND	0.98	0.084	ug/m3
76-13-1	187.4	Freon 113	ND	0.20	0.021	ppbv		ND	1.5	0.16	ug/m3
76-14-2	170.9	Freon 114	ND	0.20	0.031	ppbv		ND	1.4	0.22	ug/m3
142-82-5	100.2	Heptane	ND	0.20	0.020	ppbv		ND	0.82	0.082	ug/m3
87-68-3	260.8	Hexachlorobutadiene	ND	0.20	0.020	ppbv		ND	2.1	0.21	ug/m3
110-54-3	86.17	Hexane	0.15	0.20	0.023	ppbv	J	0.53	0.70	0.081	ug/m3
591-78-6	100	2-Hexanone	ND	0.20	0.045	ppbv		ND	0.82	0.18	ug/m3
67-63-0	60.1	Isopropyl Alcohol	0.38	0.20	0.16	ppbv		0.93	0.49	0.39	ug/m3
75-09-2	84.94	Methylene chloride	ND	0.20	0.025	ppbv		ND	0.69	0.087	ug/m3
78-93-3	72.11	Methyl ethyl ketone	0.23	0.20	0.048	ppbv		0.68	0.59	0.14	ug/m3
108-10-1	100.2	Methyl Isobutyl Ketone	ND	0.20	0.055	ppbv		ND	0.82	0.23	ug/m3
1634-04-4	88.15	Methyl Tert Butyl Ether	ND	0.20	0.020	ppbv		ND	0.72	0.072	ug/m3
80-62-6	100.12	Methylmethacrylate	ND	0.20	0.040	ppbv		ND	0.82	0.16	ug/m3
115-07-1	42	Propylene	ND	0.50	0.032	ppbv		ND	0.86	0.055	ug/m3
100-42-5	104.1	Styrene	ND	0.20	0.015	ppbv		ND	0.85	0.064	ug/m3
71-55-6	133.4	1,1,1-Trichloroethane	ND	0.20	0.024	ppbv		ND	1.1	0.13	ug/m3
79-34-5	167.9	1,1,2,2-Tetrachloroethane	ND	0.20	0.016	ppbv		ND	1.4	0.11	ug/m3
79-00-5	133.4	1,1,2-Trichloroethane	ND	0.20	0.039	ppbv		ND	1.1	0.21	ug/m3
120-82-1	181.5	1,2,4-Trichlorobenzene	ND	0.20	0.056	ppbv		ND	1.5	0.42	ug/m3
95-63-6	120.2	1,2,4-Trimethylbenzene	ND	0.20	0.015	ppbv		ND	0.98	0.074	ug/m3
108-67-8	120.2	1,3,5-Trimethylbenzene	ND	0.20	0.045	ppbv		ND	0.98	0.22	ug/m3
540-84-1	114.2	2,2,4-Trimethylpentane	ND	0.20	0.023	ppbv		ND	0.93	0.11	ug/m3
75-65-0	74.12	Tertiary Butyl Alcohol	ND	0.20	0.053	ppbv		ND	0.61	0.16	ug/m3
127-18-4	165.8	Tetrachloroethylene	ND	0.040	0.023	ppbv		ND	0.27	0.16	ug/m3
109-99-9	72.11	Tetrahydrofuran	ND	0.20	0.045	ppbv		ND	0.59	0.13	ug/m3
108-88-3	92.14	Toluene	0.12	0.20	0.012	ppbv	J	0.45	0.75	0.045	ug/m3
79-01-6	131.4	Trichloroethylene	ND	0.040	0.019	ppbv		ND	0.21	0.10	ug/m3
75-69-4	137.4	Trichlorofluoromethane	0.18	0.20	0.022	ppbv	J	1.0	1.1	0.12	ug/m3
75-01-4	62.5	Vinyl chloride	ND	0.20	0.021	ppbv		ND	0.51	0.054	ug/m3
108-05-4	86	Vinyl Acetate	ND	0.20	0.054	ppbv		ND	0.70	0.19	ug/m3
	106.2	m,p-Xylene	ND	0.20	0.068	ppbv		ND	0.87	0.30	ug/m3
95-47-6	106.2	o-Xylene	ND	0.20	0.051	ppbv		ND	0.87	0.22	ug/m3
1330-20-7	106.2	Xylenes (total)	ND	0.20	0.051	ppbv		ND	0.87	0.22	ug/m3

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
460-00-4	4-Bromofluorobenzene	97%		65-128%

ND = Not detected      MDL = Method Detection Limit      J = Indicates an estimated value  
 RL = Reporting Limit      B = Indicates analyte found in associated method blank  
 E = Indicates value exceeds calibration range      N = Indicates presumptive evidence of a compound

**Misc. Forms****Custody Documents and Other Forms**

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**Includes the following where applicable:**

- Chain of Custody
- Summa Canister and Flow Controller Log

AIR



# CHAIN OF CUSTODY

## Air Sampling Field Data Sheet

FED-EX Tracking #  
6514968 2989

Sample Control #  
RP-1125/2016-1987  
Lab Job #  
JC13502

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Company Name <b>Providence Engr</b>		Project Name <b>Valero Refining</b>		Weather Parameters		Requested Analysis
Address <b>1201 Main St</b>		Street		Temperature (Fahrenheit)		
City <b>BR</b> State <b>LA</b> Zip <b>70802</b>		City <b>Meroux</b> State <b>CA</b>		Start: Maximum:		
Project Contact <b>Paul Hollis @ providenceeng.com</b> E-mail		Project # <b>712-001</b>		Stop: Minimum:		
Phone # <b>225-766-7400</b> Fax # <b>-7440</b>		Client Purchase Order #		Atmospheric Pressure (inches of Hg)		
Sampler(s) Name(s) <b>K Hudson</b>				Start: Maximum:		Standard TO-15 Reporting List
				Stop: Minimum:		
				Other weather comment:		

Lab Sample #	Field ID / Point of Collection	Air Type		Sampling Equipment Info			Start Sampling Information					Stop Sampling Information				
		Indoor(I) Soil Vap(SV) Ambient(A)	Canister Serial #	Canister Size SL or 1L	Flow Controller Serial #	Date	Time (24hr clock)	Canister Pressure ("Hg)	Interior Temp (F)	Sampler Init.	Date	Time (24hr clock)	Canister Pressure ("Hg)	Interior Temp (F)	Sampler Init.	
1	CAMS 270	A	A75562	-	-	1-23	1300	0.01	75	KH	1-24	1300	10.07	75	KH	✓

Turnaround Time (Business days) Standard - 15 Days 10 Day 5 Day 3 Day 2 Day 1 Day Other	Approved By: _____ Date: _____	Data Deliverable Information All NJDEP TO-15 is mandatory Full T1 Comm A Comm B Reduced T2 Full T1 Other:	Comments / Remarks COC # 668 INITIAL ASSESSMENT <u>UABV</u> LABEL VERIFICATION <u>BL</u> <u>Suming</u>
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Sample Custody must be documented below each time samples change possession, including courier delivery.

Relinquished by: <b>1 Paul Hollis</b>	Date/Time: <b>1/25/16 12:50</b>	Received By: <b>Fed Ex</b>	Relinquished By: <b>2 Paul Hollis</b>	Date/Time: <b>2/2/16 9:00</b>	Received By: <b>Paul Hollis</b>
Relinquished by: <b>3 Paul Hollis</b>	Date/Time:	Received By: <b>Fed Ex</b>	Relinquished By: <b>4 Paul Hollis</b>	Date/Time:	Received By: <b>Paul Hollis</b>
Relinquished by: <b>5 Paul Hollis</b>	Date/Time:	Received By:	Custody Seal #		

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# Accutest Laboratories Sample Receipt Summary

Accutest Job Number: JC13502      Client: \_\_\_\_\_      Project: \_\_\_\_\_  
 Date / Time Received: 2/2/2016 9:10:00 AM      Delivery Method: \_\_\_\_\_      Airbill #s: \_\_\_\_\_

Cooler Temps (Raw Measured) °C: \_\_\_\_\_  
 Cooler Temps (Corrected) °C: \_\_\_\_\_

**Cooler Security**      Y or N      Y or N  
 1. Custody Seals Present:        3. COC Present:    
 2. Custody Seals Intact:        4. Smpl Dates/Time OK

**Cooler Temperature**      Y or N  
 1. Temp criteria achieved:         
 2. Cooler temp verification:      N/A  
 3. Cooler media:      N/A  
 4. No. Coolers:      N/A

**Quality Control Preservation**      Y or N      N/A  
 1. Trip Blank present / cooler:          
 2. Trip Blank listed on COC:          
 3. Samples preserved properly:         
 4. VOCs headspace free:     

**Sample Integrity - Documentation**      Y or N  
 1. Sample labels present on bottles:         
 2. Container labeling complete:         
 3. Sample container label / COC agree:     

**Sample Integrity - Condition**      Y or N  
 1. Sample recvd within HT:         
 2. All containers accounted for:         
 3. Condition of sample:      Intact

**Sample Integrity - Instructions**      Y or N      N/A  
 1. Analysis requested is clear:         
 2. Bottles received for unspecified tests         
 3. Sufficient volume recvd for analysis:         
 4. Compositing instructions clear:          
 5. Filtering instructions clear:     

Comments

Accutest Laboratories  
 V: 732.329.0200

2235 US Highway 130  
 F: 732.329.3499

Dayton, New Jersey  
 www.accutest.com

JC13502: Chain of Custody

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# Summa Canister and Flow Controller Log

**Job Number:** JC13502  
**Account:** PROVLABR Providence Engineering  
**Project:** Valero-CAMS, Baton Rouge, LA  
**Received:** 02/02/16

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SUMMA CANISTERS													
Shipping							Receiving						
Summa ID	Vac L	Date " Hg Out	By	SCC Batch	SCC FileID	Sample Number	Date In	By	Vac " Hg	Pres psig	Final psig	Dil Fact	
A755	6	29.4	01/08/16	RD	CP8156	3W51840.D	JC13502-1	02/02/16	LM	10.5		1	1.65

**SGS Accutest Bottle Order(s):**  
 VP-1/8/2016-3

**Prep Date**      **Room Temp(F)**      **Bar Pres "Hg**  
 01/08/16          70                                  29.92