




FIELD SAMPLING TEST REPORT	
<b>Customer Information</b>	LST.FAI.HBDCResults@ul.com UL Verification Services, Inc 3251 Old Lee Highway, Suite 100 Fairfax, VA 22030 USA
<b>HB Project Number</b>	2009049NY
<b>Date Received</b>	October 7, 2020
<b>Testing Laboratory Location</b>	UL Environment - Marietta, 2211 Newmarket Parkway, Marietta, GA 30067-9399 USA
<b>Method</b>	USEPA Compendium Method TO-17 ; ASTM 6196
<b>Authorized by</b>	 Allyson M. McFry Chemistry Laboratory Director
<p>Sampling: Reported data were obtained from samples and sampling information as provided by the on-site investigator. These data and general information are provided to assist the investigator in an overall IAQ assessment. Interpretation of data is left to the client or persons who conducted the field work.</p> <p>This test is accredited and meets the requirements of ISO/IEC 17025 as verified by ANSI National Accreditation Board. Refer to certificate and scope of accreditation AT-1297.</p> <p>This report shall not be reproduced, except in full, without permission from UL. Results contained within this report only apply to the actual product tested under the testing conditions documented in this report.</p>	

Date Issued: November 11, 2020  
Product #: 1001056156-3371160  
Report #: 1001056156-3371160R1  
©2020 UL LLC  
**Supersedes Report #: 1001056156-3371160**

UL ID:	SV1TFDF
Sample Date:	October 4, 2020
Volume (L):	18.0

## CONCENTRATIONS OF TOTAL AND INDIVIDUAL VOLATILE ORGANIC COMPOUNDS

<b>Sample Location/Description</b>		Field Blank	
<b>Total Volatile Organic Compounds</b>		BQL µg/m³	
CAS Number	Compound	Concentration	
		µg/m³	ppb
none			

UL ID:	SV1TFD
Sample Date:	October 4, 2020
Volume (L):	20.2

## CONCENTRATIONS OF TOTAL AND INDIVIDUAL VOLATILE ORGANIC COMPOUNDS

Sample Location/Description		Burn_03_BR_04_Pre	
Total Volatile Organic Compounds		1,770 µg/m³	
CAS Number	Compound	Concentration	
		µg/m³	ppb
98-56-6	Benzene, 1-chloro-4-(trifluoromethyl)-*	174	23.6
77-68-9	Propanoic acid, 2-methyl-, 3-hydroxy-2,2,4-trimethylpentyl ester (component of Texanol)	162	18.3
25265-77-4	2,2,4-Trimethyl-1,3-pentanediol monoisobutyrate	132	14.9
541-02-6	Cyclopentasiloxane, decamethyl	110	7.3
1120-21-4	Undecane	89.3	14.0
112-40-3	Dodecane†	75.4	10.8
1330-20-7	Xylenes (Total) †	60.7	14.0
872-50-4	2-Pyrrolidinone, 1-methyl†	55.9	13.8
124-18-5	Decane	50.5	8.7
10573-35-0	Ether, 6-methylheptyl vinyl*	48.2	7.5
10486-19-8	Tridecanal*	38.5	4.7
142-96-1	n-Butyl ether	35.7	6.7
108-10-1	2-Pentanone, 4-methyl (Methyl isobutyl ketone, MIBK)	35.1	8.6
110-62-3	Pentanal	29.1	8.2
20324-32-7	2-Propanol, 1-(2-methoxy-1-methylethoxy)	28.1	4.6
64-19-7	Acetic acid	27.5	11.2
66-25-1	Hexanal	27.1	6.6
17301-23-4	Undecane, 2,6-dimethyl	25.5	3.4
78-93-3	2-Butanone (Methyl ethyl ketone, MEK)	25.3	8.6
13151-73-0	Decane 2-cyclohexyl-, 2-cyclohexyl*	24.9	2.7
108-88-3	Toluene (Methylbenzene)	24.4	6.5
13287-21-3	Tridecane, 6-methyl*	23.6	2.9
124-19-6	Nonyl aldehyde (Nonanal) †	22.1	3.8
2456-28-2	Decane, 1,1'-oxybis*	21.0	1.7
112-41-4	1-Dodecene	20.8	3.0
286-99-7	13-Oxabicyclo[10.1.0]tridecane*	18.6	2.5
17312-60-6	Undecane, 6-ethyl*	18.4	2.4
7045-71-8	Undecane, 2-methyl	16.9	2.4
54411-00-6	Cyclohexane, 1-methyl-4-(1-methylbutyl)-*	15.7	2.3
1000131-71-0	6,10,13-Trimethyltetradecanol*	15.0	1.4
39178-69-3	Cyclohexanone, 3-butyl-*	13.2	2.1
13151-82-1	Dodecane, 2-cyclohexyl-*	13.2	1.4
1000372-72-3	(Z)-Dec-4-en-1-yl 2-methylbutanoate*	13.0	1.3
17302-32-8	Nonane, 3,7-dimethyl	12.3	1.9
124-13-0	Octanal†	12.1	2.3
96-29-7	2-Butanone, oxime*	11.9	3.3

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
 Supersedes Report #: 1001056156-3371160

UL ID:	SV1TFD
Sample Date:	October 4, 2020
Volume (L):	20.2

CAS Number	Compound	Concentration	
		µg/m³	ppb
2980-69-0	Undecane, 4-methyl	11.6	1.7
540-42-1	Propanoic acid, 2-methylpropyl ester*	11.4	2.1
5910-87-2	2,4-Nonadienal, (E,E)-*	11.2	2.0
91-20-3	Naphthalene†	10.8	2.1
2499-95-8	n-Hexyl acrylate*	10.7	1.7
123-72-8	Butanal	10.4	3.5
2216-32-2	Heptane, 4-ethyl*	10.3	2.0
10147-40-7	1-Dodecanesulfonyl chloride*	9.9	0.9
5204-80-8	4-Pentenal, 2-ethyl*	9.8	2.1
110-19-0	Acetic acid, 2-methylpropyl ester (Isobutyl acetate)*	9.2	1.9
616-25-1	1-Penten-3-ol*	8.7	2.5
75039-84-8	trans-2-Undecen-1-ol*	8.4	1.2
71-36-3	1-Butanol (N-Butyl alcohol)	8.3	2.7
29911-28-2	2-Propanol, 1-(2-butoxy-1-methylethoxy)-(Dipropylene glycol monobutyl ether)	8.1	1.0
6712-79-4	Isopinocarveol*	8.0	1.3
629-50-5	Tridecane	7.8	1.0
1678-92-8	Cyclohexane, propyl	7.7	1.5
1000364-61-2	1,1,3,3,5,5,7,7-Octamethyl-7-(2-methylpropoxy)tetrasiloxan-1-ol*	7.7	0.5
1678-91-7	Cyclohexane, ethyl	7.4	1.6
611-14-3	Benzene, 1-ethyl-2-methyl (2-Ethyltoluene)	7.2	1.5
141-78-6	Acetate, ethyl	6.7	1.9
111-77-3	Ethanol, 2-(2-methoxyethoxy)	6.4	1.3
1002-43-3	Undecane, 3-methyl	6.4	0.9
111-84-2	Nonane	6.2	1.2
142-62-1	Hexanoic acid	6.0	1.3
18829-55-5	2-Heptenal, (E)	5.9	1.3
95-13-6	Indene*	5.9	1.2
17301-94-9	Nonane, 4-methyl	5.7	1.0
100-52-7	Benzaldehyde	5.5	1.3
871-83-0	Nonane, 2-methyl	5.4	0.9
5077-67-8	1-Hydroxy-2-butanone*	5.2	1.4
123-86-4	Acetate, butyl	5.2	1.1
80-56-8	Pinene, alpha (2,6,6-Trimethyl-bicyclo[3.1.1]hept-2-ene)	4.6	0.8
79-20-9	Acetate, methyl (Acetic acid, methyl ester)	4.5	1.5
2051-30-1	Octane, 2,6-dimethyl	4.3	0.7
100-42-5	Styrene†	4.2	1.0
7146-78-3	1-Cyclohexanol, 2-(2-ethylbutyl)-*	3.9	0.5
110-43-0	2-Heptanone	3.6	0.8
1000139-52-3	trans-2-Ethyl-2-hexen-1-ol*	3.6	0.7
98-01-1	Furfural (2-Furaldehyde)	3.5	0.9
71-43-2	Benzene†	3.1	1.0
4390-04-9	Nonane, 2,2,4,4,6,8,8-heptamethyl*	3.0	0.3

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
 Supersedes Report #: 1001056156-3371160

UL ID:	SV1TFD
Sample Date:	October 4, 2020
Volume (L):	20.2

CAS Number	Compound	Concentration	
		µg/m³	ppb
111-65-9	Octane	3.0	0.6
14411-56-4	Benzene, 1-(1,1-dimethylethyl)-3-ethyl*	3.0	0.4
627-50-9	Ethylvinyl sulfide*	2.8	0.8
3964-66-7	Cyclohexene, 1-hexyl-*	2.6	0.4
17312-57-1	Dodecane, 3-methyl*	2.5	0.3
98-54-4	Phenol, 4-t-butyl (4-(1,1-Dimethylethyl)phenol)	2.4	0.4
64-17-5	Ethanol	2.4	1.3
244074-78-0	Pentanoic acid, 2,2,4-trimethyl-3-hydroxy-, isobutyl ester*	2.1	0.2
2497-25-8	2-Decenal, (Z)-*	2.0	0.3
106-97-8	Butane	2.0	0.8
112-30-1	1-Decanol (N-Decyl alcohol)	2.0	0.3

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
**Supersedes Report #: 1001056156-3371160**

UL ID:	SV2TFD
Sample Date:	October 4, 2020
Volume (L):	18.0

## CONCENTRATIONS OF TOTAL AND INDIVIDUAL VOLATILE ORGANIC COMPOUNDS

Sample Location/Description		Burn_03_BR_04_Post	
Total Volatile Organic Compounds		16.0 µg/m³	
CAS Number	Compound	Concentration	
		µg/m³	ppb
64-19-7	Acetic acid	9.6	3.9
80-56-8	Pinene, alpha (2,6,6-Trimethyl-bicyclo[3.1.1]hept-2-ene) †	7.4	1.3
71-43-2	Benzene†	7.4	2.3
79-20-9	Acetate, methyl (Acetic acid, methyl ester) †	3.2	1.1
1632-70-8	Undecane, 5-methyl*	2.2	0.3

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
**Supersedes Report #: 1001056156-3371160**

UL ID:	SV3TFD
Sample Date:	October 4, 2020
Volume (L):	18.1

## CONCENTRATIONS OF TOTAL AND INDIVIDUAL VOLATILE ORGANIC COMPOUNDS

Sample Location/Description		Burn_04_LR_Hall_Pre	
Total Volatile Organic Compounds		990 µg/m³	
CAS Number	Compound	Concentration	
		µg/m³	ppb
77-68-9	Propanoic acid, 2-methyl-, 3-hydroxy-2,2,4-trimethylpentyl ester (component of Texanol)	261	29.5
25265-77-4	2,2,4-Trimethyl-1,3-pentanediol monoisobutyrate	224	25.3
64-19-7	Acetic acid	51.0	20.8
142-96-1	n-Butyl ether	45.8	8.6
66-25-1	Hexanal	33.3	8.1
91-20-3	Naphthalene†	30.2	5.8
58175-57-8	2-Propyl-1-pentanol*	23.6	4.4
124-19-6	Nonyl aldehyde (Nonanal) †	22.9	3.9
112-41-4	1-Dodecene	21.5	3.1
80-56-8	Pinene, alpha (2,6,6-Trimethyl-bicyclo[3.1.1]hept-2-ene)	18.8	3.4
78-93-3	2-Butanone (Methyl ethyl ketone, MEK)	17.6	6.0
590-01-2	Butyl propionate (Propanoic acid, butyl ester)	15.8	3.0
124-13-0	Octanal†	14.7	2.8
98-01-1	Furfural (2-Furaldehyde)	13.7	3.5
71-36-3	1-Butanol (N-Butyl alcohol)	13.5	4.4
108-95-2	Phenol†	13.3	3.5
68-12-2	Formamide, N,N-dimethyl**	12.4	4.1
127-91-3	Pinene, beta (6,6-Dimethyl-2-methylene-bicyclo[3.1.1]heptane)	11.6	2.1
98-56-6	Benzene, 1-chloro-4-(trifluoromethyl)-*	10.6	1.4
123-86-4	Acetate, butyl	9.7	2.0
100-42-5	Styrene†	8.5	2.0
110-62-3	Pentanal	8.3	2.3
142-62-1	Hexanoic acid	7.6	1.6
98-86-2	Acetophenone (Ethanone, 1-phenyl)*	7.6	1.5
71-41-0	1-Pentanol (N-Pentyl alcohol)	7.5	2.1
123-35-3	1,6-Octadiene,7-methyl-3-methylene (Myrcene)	7.5	1.3
100-52-7	Benzaldehyde	7.0	1.6
110-12-3	2-Hexanone, 5-methyl	6.9	1.5
1000309-21-9	Sulfurous acid, cyclohexylmethyl undecyl ester*	6.5	0.5
108-88-3	Toluene (Methylbenzene)	5.5	1.5
112-40-3	Dodecane	5.2	0.7
92-52-4	1,1'-Biphenyl*	5.1	0.8
111-87-5	1-Octanol	4.9	0.9
13429-07-7	2-Propanol, 1-(2-methoxypropoxy)-*	4.8	0.8
541-02-6	Cyclopentasiloxane, decamethyl	4.5	0.3

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
 Supersedes Report #: 1001056156-3371160

UL ID:	SV3TFD
Sample Date:	October 4, 2020
Volume (L):	18.1

CAS Number	Compound	Concentration	
		µg/m³	ppb
629-50-5	Tridecane	4.4	0.6
6846-50-0	TXIB (2,2,4-Trimethyl-1,3-pentanediol diisobutyrate)	4.3	0.4
57-55-6	1,2-Propanediol (Propylene glycol)	4.3	1.4
71-43-2	Benzene†	4.3	1.3
91186-49-1	2,6,6-Trimethylundeca-1,3-dien-9-yn-5-one*	4.1	0.5
112-31-2	Decanal*	3.9	0.6
79-20-9	Acetate, methyl (Acetic acid, methyl ester)	3.9	1.3
818-72-4	1-Octyn-3-ol	3.8	0.7
620-02-0	2-Furancarboxaldehyde, 5-methyl*	3.7	0.8
120-92-3	Cyclopentanone	3.6	1.0
17301-26-7	Undecane, 2,9-dimethyl*	3.6	0.5
80-62-6	Methyl methacrylate (2-Propenoic acid, 2-methyl-, methyl ester)	3.4	0.8
112-30-1	1-Decanol (N-Decyl alcohol)	3.4	0.5
40933-45-7	2,4-Dimethylhexanedioic acid*	3.3	0.5
25551-13-7	Trimethylbenzene (All Isomers)	3.1	0.6
1000316-00-2	1H-Indazole, 3-methyl-*	3.1	0.6
1196-01-6	Bicyclo[3.1.1]hept-3-en-2-one, 4,6,6-trimethyl-, (1S)-*	2.9	0.5
2162-98-3	1,10-Dichlorodecane*	2.7	0.3
535-77-3	Benzene, 1-methyl-3-isopropyl (m-Cymene)	2.7	0.5
90-12-0	Naphthalene, 1-methyl	2.7	0.5
112-29-8	Decane, 1-bromo*	2.6	0.3
1000192-66-2	2-Hydroxy-2-phenyl-N-(1-phenyl-ethyl)-acetamide*	2.6	0.2
95-13-6	Indene*	2.6	0.5
2548-87-0	2-Octenal, (E)	2.5	0.5
544-76-3	Hexadecane (Cetane) †	2.4	0.3
79-31-2	Propanoic acid, 2-methyl*	2.4	0.7
33900-84-4	Myrtenyl isovalerate*	2.4	0.2
106-46-7	Benzene, 1,4-dichloro	2.4	0.4
75-65-0	2-Propanol, 2-methyl	2.3	0.8
107-98-2	2-Propanol, 1-methoxy-*	2.3	0.6
62108-21-8	Decane, 6-ethyl-2-methyl*	2.2	0.3
3891-99-4	2,6,10-Trimethyltridecane*	2.2	0.2
1000192-68-2	3-(Hydroxy-phenyl-methyl)-2,3-dimethyl-octan-4-one*	2.2	0.2
112-44-7	Undecanal*	2.2	0.3
4117-14-0	2-Decyn-1-ol*	2.1	0.3
1000334-82-1	4,6-Dioxadecane*	2.1	0.3
1000293-49-9	4-Ethylbenzoic acid, 2-ethylhexyl ester*	2.0	0.8
2461-15-6	Oxirane, [[(2-ethylhexyl)oxy]methyl]-*	2.0	0.3
55030-21-2	Cyclohexane, 1,1'-(2-propyl-1,3-propanediyl)bis-*	2.0	0.2

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
 Supersedes Report #: 1001056156-3371160



UL ID:	SV4TFD
Sample Date:	October 4, 2020
Volume (L):	21.2

## CONCENTRATIONS OF TOTAL AND INDIVIDUAL VOLATILE ORGANIC COMPOUNDS

Sample Location/Description		Burn_04_LR_Hall_Post	
Total Volatile Organic Compounds		646 µg/m³	
CAS Number	Compound	Concentration	
		µg/m³	ppb
64-19-7	Acetic acid	98.3	40.0
71-43-2	Benzene†	72.0	22.5
100-42-5	Styrene†	67.6	15.9
91-20-3	Naphthalene†	47.8	9.1
80-62-6	Methyl methacrylate (2-Propenoic acid, 2-methyl-, methyl ester)	36.1	8.8
98-01-1	Furfural (2-Furaldehyde)	31.6	8.0
108-95-2	Phenol†	23.8	6.2
108-88-3	Toluene (Methylbenzene)	19.8	5.2
123-91-1	1,4-Dioxane†	17.0	4.7
77-68-9	Propanoic acid, 2-methyl-, 3-hydroxy-2,2,4-trimethylpentyl ester (component of Texanol)	14.7	1.7
66-25-1	Hexanal	13.3	3.2
116-09-6	2-Propanone, 1-hydroxy	12.7	4.2
68-12-2	Formamide, N,N-dimethyl*	11.3	3.8
141-32-2	Butyl acrylate (2-Propenoic Acid, butyl ester)	11.2	2.1
25265-77-4	2,2,4-Trimethyl-1,3-pentanediol monoisobutyrate	10.1	1.1
98-83-9	a-Methylstyrene (iso-Propenylbenzene; (1-Methylethenyl)benzene)	9.6	2.0
90-05-1	Phenol, 2-methoxy*	9.5	1.9
271-89-6	Benzofuran*	8.5	1.7
534-22-5	Furan, 2-methyl-*	8.4	2.5
106-44-5	Phenol, 4-methyl (p-Cresol)*	8.0	1.8
91-57-6	Naphthalene, 2-methyl	7.9	1.4
95-13-6	Indene*	7.7	1.6
100-52-7	Benzaldehyde	7.5	1.7
109-67-1	1-Pentene	7.4	2.6
120-92-3	Cyclopentanone	7.4	2.2
93-51-6	Phenol, 2-methoxy-4-methyl*	6.4	1.1
100-47-0	Benzonitrile	6.3	1.5
25551-13-7	Trimethylbenzene (All Isomers)	5.8	1.2
208-96-8	Acenaphthylene*	5.8	0.9
123-86-4	Acetate, butyl	5.8	1.2
1632-16-2	Heptane, 3-methylene*	5.7	1.2
1002-11-5	Decane, 3-chloro*	5.6	0.8
620-02-0	2-Furancarboxaldehyde, 5-methyl*	5.5	1.2
22410-74-8	2,6-Octadien-1-ol, 2,7-dimethyl*	5.4	0.9
5077-67-8	1-Hydroxy-2-butanone*	5.1	1.4

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
 Supersedes Report #: 1001056156-3371160

UL ID:	SV4TFD
Sample Date:	October 4, 2020
Volume (L):	21.2

CAS Number	Compound	Concentration	
		µg/m³	ppb
100-41-4	Benzene, ethyl†	4.8	1.1
80-56-8	Pinene, alpha (2,6,6-Trimethyl-bicyclo[3.1.1]hept-2-ene)	4.7	0.8
98-86-2	Acetophenone (Ethanone, 1-phenyl)*	4.7	1.0
95-48-7	Phenol, 2-methyl*	4.7	1.1
110-86-1	Pyridine	4.7	1.4
294-62-2	Cyclododecane	4.5	0.7
565-69-5	3-Pentanone, 2-methyl*	4.5	1.1
105-67-9	Phenol, 2,4-dimethyl	4.4	0.9
14003-71-5	1,2,3,4-Cyclopentanetetrol, (1.alpha.,2.beta.,3.beta.,4.alpha.)-*	4.3	0.8
827-54-3	Naphthalene, 2-vinyl	4.3	0.7
576-26-1	Phenol, 2,6-dimethyl-*	4.2	0.8
78-94-4	Methyl vinyl ketone (3-Buten-2-one)	4.1	1.4
1000380-42-5	L-(+)-Threose, aldononitrile, triacetate*	3.9	0.4
14371-10-9	Cinnamaldehyde, (E)-*	3.7	0.7
112-15-2	Ethanol, 2-(2-ethoxyethoxy), acetate*	3.6	0.5
78-93-3	2-Butanone (Methyl ethyl ketone, MEK)	3.5	1.2
814-78-8	3-Buten-2-one, 3-methyl*	3.5	1.0
767-60-2	1H-Indene, 3-methyl*	3.4	0.6
85-01-8	Phenanthrene*	3.3	0.5
1000293-33-2	m-Toluic acid, 2-ethylcyclohexyl ester*	3.3	0.3
6709-39-3	1,5-Heptadiene, 2,6-dimethyl-*	3.2	0.6
2936-08-5	2,2-di-n-Propylacetyl chloride*	3.2	0.5
1000309-61-6	Oxalic acid, 4-chlorophenyl tetradecyl ester*	3.2	0.2
1330-20-7	Xylenes (Total) †	3.1	0.7
5441-52-1	Cyclohexanol, 3,5-dimethyl*	3.1	0.6
91-10-1	Phenol, 2,6-dimethoxy*	3.1	0.5
134563-46-5	1-hydroxy-1,2,3,4-tetrahydronaphthalene trifluoroacetate ester*	3.1	0.3
1120-73-6	2-Cyclopenten-1-one, 2-methyl*	3.1	0.8
3404-67-9	Hexane, 3-methyl-4-methylene*	3.0	0.7
589-82-2	3-Heptanol*	3.0	0.6
2785-89-9	Phenol, 4-ethyl-2-methoxy*	2.9	0.5
98-00-0	2-Furanmethanol*	2.8	0.7
92-52-4	1,1'-Biphenyl*	2.8	0.4
7402-29-1	Butanoic acid, 3-phenylpropyl ester*	2.7	0.3
1192-62-7	Ethanone, 1-(2-furanyl)*	2.7	0.6
4663-21-2	Cyclopropane, 1-propenyl-*	2.6	0.8
78-85-3	2-Propenal, 2-methyl	2.6	0.9
71-41-0	1-Pentanol (N-Pentyl alcohol)	2.6	0.7
27522-11-8	1-Pentanol, 2-ethyl*	2.6	0.5
42781-12-4	2-Propanone, 1-(1-methylethoxy)-*	2.5	0.5
1000211-14-3	8-Methylene-3-oxatricyclo[5.2.0.0(2,4)]nonane*	2.5	0.4
1000309-56-6	Oxalic acid, hexyl 2-isopropylphenyl ester*	2.5	0.2
624-54-4	Propanoic acid, pentyl ester*	2.4	0.4

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
 Supersedes Report #: 1001056156-3371160

UL ID:	SV4TFD
Sample Date:	October 4, 2020
Volume (L):	21.2

CAS Number	Compound	Concentration	
		µg/m³	ppb
4794-05-2	Benzene, 2,5-cyclohexadien-1-yl-*	2.4	0.4
7786-61-0	2-Methoxy-4-vinylphenol*	2.3	0.4
621-59-0	Benzaldehyde, 3-hydroxy-4-methoxy-*	2.3	0.4
1121-05-7	2-Cyclopenten-1-one, 2,3-dimethyl-*	2.2	0.5
17059-52-8	Benzofuran, 7-methyl*	2.2	0.4
591-11-7	2(5H)-Furanone, 5-methyl-*	2.2	0.5
95798-22-4	3-Hydroxy-piperidine-1-carboxylic acid, benzyl ester*	2.2	0.2
10031-87-5	Acetic acid, 2-ethylbutyl ester*	2.1	0.4
108-46-3	Resorcinol*	2.1	0.5
637-50-3	Benzene, 1-propenyl-*	2.1	0.4
40771-26-4	1,5-Dihydroxy-1,2,3,4-tetrahydronaphthalene*	2.1	0.3
135-77-3	1,2,4-Trimethoxybenzene*	2.1	0.3
3777-69-3	Furan, 2-pentyl	2.0	0.4

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
**Supersedes Report #: 1001056156-3371160**

UL ID:	SV5TFD
Sample Date:	October 4, 2020
Volume (L):	18.0

## CONCENTRATIONS OF TOTAL AND INDIVIDUAL VOLATILE ORGANIC COMPOUNDS

<b>Sample Location/Description</b>		Field Blank	
<b>Total Volatile Organic Compounds</b>		BQL	
CAS Number	Compound	Concentration	
		µg/m <sup>3</sup>	ppb
---	none	---	---

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
**Supersedes Report #: 1001056156-3371160**

UL ID:	SV5TFD
Sample Date:	October 4, 2020
Volume (L):	18.0

TVOC (total volatile organic compounds) are calibrated relative to toluene.

Field Blanks: Reported concentrations based on 18.0 L of volume sampled for VOCs. Actual field blanks are not intended to have a measurable amount of air sampled.

†Denotes quantified using multipoint authentic standard curve. Other VOCs quantified relative to toluene.

Values below 2.0 µg/m³ are for information purposes only. Chemical was detected, but below the quantifiable level of 0.04 µg based on a standard of 18 L air collection volume.

UL Environment's quality assurance program monitors blank sorbent media to ensure that the residual background does not exceed UL Environment's quality objective of ≤ 36 ng of total VOC.

Date Issued: November 11, 2020  
Product #: 1001056156-3371160  
Report #: 1001056156-3371160R1  
©2020 UL LLC  
**Supersedes Report #: 1001056156-3371160**

UL ID:	SV5TFD
Sample Date:	October 4, 2020
Volume (L):	18.0

Page 1 of 2

Project # 2009049NY

1001056156-3371160



ACTIVE CHEMICAL SAMPLING CHAIN OF CUSTODY								
Company: ULVS (Healthy Buildings)			Contact: CARERESULTS@UL.COM			Project/P.O./Job Number: 2009049NY		
Address: 3251 Old Lee Highway #100 Fairfax, VA 22030			Phone: 571.655.7919			Sample Date: 04OCT2020		
			Fax: 703.323.4440			Investigator: SAM.HORNER		
Please check the appropriate fields; Use separate COC for each sample method.	VOLATILE ORGANICS: IVOC SCAN: <input type="checkbox"/> TOP 20 IVOC <input type="checkbox"/> TVOC ONLY <input type="checkbox"/> OTHER <input type="checkbox"/> B.T.E.X.							
	ALDEHYDE SCAN: <input type="checkbox"/> FORMALDEHYDE ONLY <input type="checkbox"/> ANALYSIS: LEED V4 <input type="checkbox"/> LEED V4.1 <input type="checkbox"/> OTHER <input type="checkbox"/> B.T.E.X.							
	TAT: Standard <input checked="" type="checkbox"/> Next Day Rush* <input type="checkbox"/> * Rush charges apply; please call in advance to confirm availability							
Comments:								
UL ID	SAMPLE ID/ TUBE ID	SAMPLE LOCATION/ DESCRIPTION	START TIME	STOP TIME	TIME SAMPLED (MIN)	PUMP ID #	FLOW RATE (L/MIN)	VOLUME (L)
V01	2009049NY-03A/ s/n B26855	Burn_03_BR_04_Pre	08:46	09:53	67	2018	0.301 L	20.16 L
V02	2009049NY-03B/ s/n B26419	Burn_03_BR_04_Post	12:47	13:47	60	2018	0.299 L	17.97 L
V01F	2009049NY-03C/ s/n B26479	Field Blank						n/a 18
Released By: SAM.HORNER (Print/Sign)		Date/Time: 05OCT2020		Method of Shipment: UPS Next Day		Description: VOC Tubes		
Received By: <i>[Signature]</i>		Date/Time: 10/6/20 10:30 AM		1Z 23X 304 01 9905 7141 Sample Condition		3371160		

3371160



Customer: UL Environment Inc.  
Received Date: 2020-OCT-07 09:11:07 AM  
Aurora Project No.: 1001056156  
Order No.:  
Oracle Project No.:

4 of 5

Date Issued: November 11, 2020  
Product #: 1001056156-3371160  
Report #: 1001056156-3371160R1  
©2020 UL LLC  
Supersedes Report #: 1001056156-3371160

UL ID:	SV5TFD
Sample Date:	October 4, 2020
Volume (L):	18.0

Page 2 of 2

Project # 2009049NY

1001056156-3371160



ACTIVE CHEMICAL SAMPLING CHAIN OF CUSTODY								
Company: ULVS (Healthy Buildings)			Contact: CARESULTS@UL.COM			Project/P.O./Job Number: 2009049NY		
Address: 3251 Old Lee Highway #100 Fairfax, VA 22030			Phone: 571.655.7919			Sample Date: 04-05OCT2020		
			Fax: 703.323.4440			Investigator: SAM.HORNER		
Please check the appropriate fields; Use separate COC for each sample method.			VOLATILE ORGANICS: IVOC SCAN: <u>TOP 20 IVOC</u> <u>TVOC ONLY</u> <u>OTHER</u> <u>B.T.E.X.</u> ALDEHYDE SCAN: <u>FORMALDEHYDE ONLY</u> <u>ANALYSIS: LEED V4</u> <u>LEED V4.1</u> <u>OTHER</u> <u>B.T.E.X.</u> TAT: Standard <u>X</u> Next Day Rush* <u>      </u> * Rush charges apply; please call in advance to confirm availability					
Comments:								
UL ID	SAMPLE ID/ TUBE ID	SAMPLE LOCATION/ DESCRIPTION	START TIME	STOP TIME	TIME SAMPLED (MIN)	PUMP ID #	FLOW RATE (L/MIN)	VOLUME (L)
<u>V03</u>	2009049NY-04A/ s/n B26207	Burn_04_LR_Hall_Pre	17:05	18:05	60	2018	0.301 L	18.09 L <u>10/4</u>
<u>V04</u>	2009049NY-04B/ s/n B26891	Burn_04_LR_Hall_Post	12:19	13:19	60	2018	0.353 L	21.18 L <u>10/5</u>
<u>V05</u>	2009049NY-04C/ s/n B26468	Field Blank						n/a <u>18</u> <u>10/5</u>
Released By: SAM.HORNER (Print/Sign) <u>[Signature]</u>			Date/Time: 05OCT2020		Method of Shipment: UPS Next Day			
Received By: <u>[Signature]</u>			Date/Time: <u>10/6/20</u> <u>10:30 AM</u>		1Z 23X 304 01 9905 7141 Sample Condition: <u>Acceptable</u>			
					3371160		 3371160	
Customer: UL Environment Inc. Aurora Project No.: 1001056156 Received Date: 2020-OCT-07 09:11:07 AM Order No.: Oracle Project No.:								

1 OF 5

00-EN-F0R59 - Issue 3.0

Date Issued: November 11, 2020  
 Product #: 1001056156-3371160  
 Report #: 1001056156-3371160R1  
 ©2020 UL LLC  
 Supersedes Report #: 1001056156-3371160