

Certification Date: 10 Jan 2024 Expiration Date: 10 Jan 2029

Certificate of Inspection

For ships on international voyages this certificate fulfills the requirements of SOLAS 74 as amended, regulation V/14, for a SAFE MANNING DOCUMENT.

Vessel Name			Official Number	IMO Nu	mber	Call Sign	Service	
HFL 200S			1291093				Tank E	Barge
								J
Hailing Port								
NASHVILLE	TN		Hull Material	Hor	sepower	Propulsion		
14 (0) (1) (222	,		Steel					
UNITED STA	ATES							
Place Built				***************************************				
CARUTHER	SVILLE, MO		Delivery Date	Keel Laid Date	Gross Tons	Net Tons	DWT	Length
51 H 15 11 L	, , , , , , , , , , , , , , , , , , , ,		20Dec2018	13Nov2018	R-705 I-	R-705 I-		R-200.0
UNITED STA	ATES				r	F		10
Owner				Opera	itor			
	ONG LINE INC					BARGE TRA	NSPORTER	S, LLC
	BORO PIKE STE	202			0 FIFTH STF			
NASHVILLE, UNITED STA					NDEVILLE, L TED STATE			
0111122 017	1120			Oivi	ILD OIMIL	J		
This vessel m	nust be manned	with the fo	ollowing licensed	and unlicense	ed Personnel	. Included in w	hich there m	ust be
0 Certified Lif	feboatmen, 0 Ce	rtified Ta	nkermen, 0 HSC	Type Rating,	and 0 GMDS	SS Operators.		
0 Masters	0	Licensed M	lates 0 Chief	Engineers	0 0	ilers		
0 Chief Mate	s 0	First Class	Pilots 0 First A	ssistant Engine	ers			
0 Second Ma	ates 0	Radio Offic	ers 0 Secon	d Assistant Eng	jineers			
0 Third Mate	s 0	Able Seam	en 0 Third .	Assistant Engine	eers			
0 Master Firs	t Class Pilot 0	Ordinary S	eamen 0 Licens	ed Engineers				
0 Mate First 0		Deckhands		ied Member Eng				
In addition, the Persons allow	iis vessel may ca ved: 0	rry 0 Pas	sengers, 0 Other	Persons in c	rew, 0 Person	ns in addition to	o crew, and r	no Others. Total
Route Perm	nitted And Cond	itions Of	Operation:					
Lakes,	Bays, and S	ounds-						
Also in fai	r weather only	not ma	no than tualwa	/12\ ==:l==	form shave			
Florida.	r weather only	, not mo	re than twelve	(12) miles	from shore	between St. M	larks and Ca	arrabelle,
This vessel	has been grant	ed a fro	ch water cervic	o ovaminati	on interval			CFR 31.10-21(a)
(2). If this	s vessel is ope	rated in	salt water mon	e than six	months in a	ny twelve mor	th period.	the vessel must
be inspected soon as this	l using salt wa s change in sta	ter inte	rvals per 46 CH	TR 31.10-21(a)(1)and th	e cognizant (CMI notifie	ed in writing as
	_			nth Coast G	uard Distri	ct's tank bar	ge streamli	ned inspection
			25				-	
			NAL CERTIFIC					
With this Insp	ection for Certific	cation hav	ing been comple	ted at New C	rleans, LA, U	UNITED STATE	ES, the Office	er in Charge, Marine
the rules and	regulations pres	is certifie cribed the	d the vessel, in a reunder	ıı respects, ıs	in conformity	with the applic	cable yessel	nspection laws and
	Annual/Perio				This certificate	e issued by:	1/1/	
Date	Zone	A/P/R				I. HART COM	ANDER L	direction
24.0	20110	7, 01, 71	Oignatui		Officer in Charge, Ma		J. DE TOY	ullection:
					ancer ar onerge, wa	•	lew Orleans	
				- Ir	nspection Zone	3000011	- Oncaris	



Certification Date: 10 Jan 2024 **Expiration Date:** 10 Jan 2029

Certificate of Inspection

program (TBSIP). Inspection activities aboard this barge shall be conducted in accordance with its tank barge action plan. Inspection issues concerning this barge should be directed to sector New Orleans OCMI.

---Hull Exams---

Exam Type

Next Exam

Last Exam

Prior Exam

DryDock

31Dec2028

20Dec2018

Internal Structure

31Dec2028

09Jan2024

20Dec2018

--- Liquid/Gas/Solid Cargo Authority/Conditions ---

Authorization:

GRADE "A" AND LOWER AND SPECIFIED HAZARDOUS CARGOES.

Total Capacity Units Highest Grade Type Part151 Regulated Part153 Regulated Part154 Regulated

10892

Barrels

Yes

No

No

Hazardous Bulk Solids Authority

Not Authorized

Loading Constraints - Structural

Tank Number	Max Cargo Weight per Tank (short tons)	Maximum Density (lbs/gal)
1C	695	13.60
2C	667	13.60
3C	663	13.60

Loading Constraints - Stability

Hull Type	Maximum Load (short tons)	Maximum Draft (ft/in)	Max Density (lbs/gal)	Route Description
1	1243	8ft 11in	8.80	R
1	1423	8ft 11in	8.80	LBS
1	1416	8ft 11in	13.60	R
1	1416	8ft 11in	13.60	LBS
H	1495	9ft 3in	8.80	R
11	1495	9ft 3in	8.80	LBS
п	1488	9ft 3in	13.60	R
п	1488	9ft 3in	13.60	LBS
l III	1785	10ft 7in	8.80	R
l III	1854	10ft 11in	9.20	R
ш	1905	11ft 2in	9.60	R
l III	1902	11ft 2in	10.00	R
III	1899	11ft 2in	10.40	R
III	1914	11ft 3in	10.80	R
111	1929	11ft 3in	11.30	R
Ш	1926	11ft 3in	11.70	R
l .				



Certification Date: 10 Jan 2024 Expiration Date: 10 Jan 2029

Certificate of Inspection

Vessel Name: HFL 200S

Ш	1868	11ft Oin	12.10	R	
III	1866	11ft 0in	12.50	R	
III	1845	10ft 11in	12.90	R	
111	1843	10ft 11in	13.30	R	
186	1832	10ft 10in	13.60	R	
l III	1749	10ft 5in	8.80	LBS	
III	1763	10ft 6in	9.20	LBS	
III	1760	10ft 6in	9.60	LBS	
III	1775	10ft 7in	10.00	LBS	
111	1772	10ft 7in	10.40	LBS	
H	1716	10ft 4in	10.80	LBS	
Ш	1728	10ft 4in	11.30	LBS	
Ш	1726	10ft 4in	11.70	LBS	
Ш	1705	10ft 3in	12.10	LBS	
III	1685	10ft 2in	12.50	LBS	
111	1683	10ft 2in	12.90	LBS	
III	1662	10ft 1in	13.30	LBS	
III	1650	10ft 0in	13.60	LBS	
1					

Conditions Of Carriage

Only those specified hazardous cargoes named in the vessel's Cargo Authority Attachment (CAA), Serial C1- 1804442, dated November 27, 2018 and Grade "C" and lower cargoes may be carried, and then only in the tanks indicated.

Per 46 CFR 150.130, the Person in Charge of the vessel is responsible for ensuring that the compatibility requirements of 46 CFR 150 are met. Cargoes must be checked for compatibility using figures, tables and appendices of 46 CFR 150 in conjunction with the compatibility group numbers from the "COMPAT GRP" column listed in the vessel's CAA.

When the vessel is carrying cargoes containing greater than 0.5% benzene, the Person In Charge is responsible for ensuring the provisions of 46 CFR 197, Subpart C are applied.

Stability and Trim

Cargo tanks must be loaded uniformly whenever a 46 CFR Subchapter "O" cargo is carried; for trim purposes, the weight of cargo in each tank may exceed the uniformly loaded tank cargo weight by at most 5 percent.

The maximum design density of cargo which may be filled to the tank top is 10.0 lbs/gal. Cargoes with higher densities, up to 13.6 lbs/gal, may be carried as slack loads, but shall not exceed the tank weight limits as listed below.

In accordance with 46 CFR Part 39, excluding part 39.4000, this vessel's vapor collection system has been inspected to the plans approved by MSC Letter C1-1804442 dated November 27, 2018 and has been found acceptable for the collection of bulk liquid cargo vapors annotated with "Yes" in the CAA's VCS column of the vessel's Cargo Authority Attachment. The VCS system has been approved with a pressure side 6 psig P/V valve with Coast Guard Approval 162.017/167/4. The cargo tank top is suitable for a maximum allowable working pressure (MAWP) of 6.5 psi. When the vessel is carrying cargoes containing greater than 0.5% benzene, the person in charge is responsible for ensuring the provisions of 46 US Code of Federal Regulations Part 197, Subpart C are applied.

In accordance with 46 CFR Part 39.1017 and 39.5000(e) this vessel's VCS has been evaluated and approved for multi-breasted tandem loading with other vessels specifically approved to tandem load with this vessel.



Certification Date: 10 Jan 2024 Expiration Date: 10 Jan 2029

Certificate of Inspection

Vessel Name: HFL 200S

Note: Per 46 CFR 151.10-15(c)(2) the max. tank weights listed below reflect uniform (within 5%) loading at the deepest draft allowed. When carrying Subchapter O cargoes at shallower drafts, the barge(s) should always be loaded uniformly.

--- Inspection Status ---

Cargo Tanks

1	Internal Exam			External Exam	1	
Tank Id	Previous	Last	Next	Previous	Last	Next
1C	3	20Dec2018	31Dec2028	<u>a</u>	120	-
2C	:€:	20Dec2018	31Dec2028	=	·=	el .
3C		20Dec2018	31Dec2028	2	-	<u></u>
			Hydro Test			
Tank ld	Safety Valves		Previous	Last	Next	
1C	~		-	Ē	.5	
2C	-		:=:	*	<u>≈</u>	
3C	-		:79	<u> </u>	-	

--- Fire Fighting Equipment ---

Fire Extinguishers - Hand portable and semi-portable

Quantity Class Type

40-B

END





Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HFL 200S

Shipyard: TRINITY MARINE

Serial #:

Dated:

GROUP,

CARUTHERSVILLE, MO

C1-1804442

27-Nov-18

Hull #: 6078-1

Official #: 1291093

Tank Group Information Cargo Identification		on		Carno	Tanks			Cargo Transfer		Environmental Control		Fire	Special Requirements				
Tnk Grp Tanks in Group	Densily	Press.	Temp.	Hull Seg Typ Tank	Туре	Vent	Gauge	Pipe Class	Cont	Tanks	Handling Space	Protection Provided	General	Materials of Construction		Temp Cont	
A #1C,#2C,#3C	13.6	Atmos.	Elev	E	1ii 2ii	Integral Gravity	PV	Closed	ı	G-1	NR	NA	Portable	40-1(f)(1), .50-60, .50-70(a), .50-70(b), .50-73, .50-81(a), .50-81(b),	55-1(b), (c), (e), (f), (h), (j), 56-1(a), (b), (c), (d), (e), (f), (g),	NR	Yes

Notes: 1. Under Environmental Control, Tanks, NR means that the tank group is suitable only for those cargoes which require no environmental control in the cargo tanks.

2. Under Environmental Control, Handling Space, NR means that the tank group is suitable only for those cargoes which require no environmental control in the cargo handling space. NA means that the vessel does not have a cargo control space, and this requirement is not applied.

3. Under Electrical Hazard Class, NA means that the tank group is suitable only for those cargoes which have no electrical hazard class requirement. NR means that the vessel has no electrical equipment located in a hazardous location.

List of Authorized Cargoes

Cargo Identificatio	n					Conditions of Carriage				
	Chem	Compat	Sub		Hull	Tank	Vapor R App'd	ecovery VCS	Special Requirements in 46 CFR	laan
Name	Code	Group No	Chapter	Grade	Туре	Group			151 General and Mat'ls of	Insp. Perio
Authorized Subchapter O Cargoes										
Sodium acetate solution	SAN	34	D/O 3	#		Α	No	N/A		
Acetonitrile	ATN	37	0	С	Ш	Α	Yes	3	No	G
Acrylonitrile	ACN	15 ²	0	С	Ш	Α	Yes	4	.50-70(a), .55-1(e)	G
Adiponitrile	ADN	37	0	Ε	П	Α	Yes	1	No	G
Alkyl (C7-C9) nitrates	AKN	34 2	0	NA	Ш	Α	No	N/A	.50-81, .50-86	G
Aminoethyl ethanolamine	AEE	8	0	E	111	Α	Yes	1	.55-1(b)	G
Ammonium bisulfite solution (70% or less)	ABX	43 2	0	NA	Ш	Α	No	N/A	.50-73, .56-1(a), (b), (c)	G
Ammonium hydroxide (28% or less NH3)	AMH	6	0	NA	Ш	Α	No	N/A	.56-1(a), (b), (c), (l), (g)	G
Anthracene oil (Coal tar fraction)	AHO	33	0	NA		Α	No	N/A	No	G
Benzene	BNZ	32	0	С	111	Α	Yes	1	.50-60	G
Benzene or hydrocarbon mixtures (having 10% Benzene or more)	ВНВ	32 ²	0	С		Α	Yes	1	.50-60	G
Benzene or hydrocarbon mixtures (containing Acetylene and 10% Benzene or more)	ВНА	32 ²	0	С	III	Α	Yes	1	.50-60, .56-1(b), (d), (f), (g)	G
Benzene, Toluene, Xylene mixtures (10% Benzene or more)	BTX	32	0	B/C	- 101	Α	Yes	11	.50-60	G
Butyl acrylate (all isomers)	BAR	14	0	D	Ш	Α	Yes	2	.50-70(a), .50-81(a), (b)	G
Butyl methacrylate	вмн	14	0	D	Ш	Α	Yes	2	.50-70(a), .50-81(a), (b)	G
Butyraldehyde (all isomers)	BAE	19	0	С	III	Α	Yes	1	.55-1(h)	G
Camphor oil (light)	CPO	18	0	D	11	Α	No	N/A	No	G
Carbon tetrachloride	CBT	36	0	NA	10	Α	No	N/A	No	G
Caustic potash solution	CPS	5 ²	0	NA	III	Α	No	N/A	.50-73, .55-1(j)	G
Caustic soda solution	CSS	52	0	NA	III	Α	No	N/A	.50-73, .55-1(j)	G
Chemical Oil (refined, containing phenolics)	COD	21	0	Е	. II	Α	No	N/A	.50-73	G
Chlorobenzene	CRB	36	0	D	Ш	Α	Yes	1	No	G
Chloroform	CRF	36	0	NA	III	Α	Yes	3	No	G
Coal tar naphtha solvent	NCT	33	0	D	111	Α	Yes	1	,50-73	G
Coal tar pitch (molten)	СТР	33	0	Е	III	Α	No	N/A	.50-73	G
Creosote	CCM	/ 212	0	E	Ш	Α	Yes	1	No	G
Cresols (all isomers)	CRS	21	0	Е	III	Α	Yes	1	No	G
Cresylate spent caustic	CSC	5	0	NA	Ш	Α	No	N/A	.50-73, .55-1(b)	G
Cresylic acid tar	CRX	21	0	Е	10	Α	Yes	1	.55-1(f)	G
Crotonaldehyde	CTA	19 2	0	С	- 11	A	Yes	4	.55-1(h)	G



Serial #: C1-1804442 Dated: 27-Nov-18

Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HFL 200S

Shipyard: TRINITY MARINE

GROUP,

CARUTHERSVILLE,

MO Hull #: 6078-1

... _ _ _ _

Official #: 1291093

Page 2 of 9

Cargo Identification	on					Conditions of Carriage						
Name	Chem Code	Compat Group No	Sub Chapter	Grade	Hull Type	Tank Group	Vapor Re App'd (Y or N)	VCS	Special Requirements in 46 CFR 151 General and Mat'ls of Construction	Insp. Period		
Crude hydrocarbon feedstock (containing Butyraldehydes and Ethylpropyl acrolein)	CHG	19 ²	0	С	111	Α	Yes	1	No	G		
Cyclohexanone	CCH	18	0	D	Ш	Α	Yes	1	.56-1(a), (b)	G		
Cyclohexanone, Cyclohexanol mixture	CYX	18 ²	0	E	Ш	Α	Yes	1	.56-1 (b)	G		
Cyclohexylamine	CHA	7	0	D	111	Α	Yes	1	.56-1(a), (b), (c), (g)	G		
Cyclopentadiene, Styrene, Benzene mixture	CSB	30	0	D	Ш	Α	Yes	1	.50-60, .56-1(b)	G		
iso-Decyl acrylate	IAI	14	0	Е	111	Α	Yes	2	.50-70(a), .50-81(a), (b), .55-1(c)	G		
Dichlorobenzene (all isomers)	DBX	36	0	Ε	111	Α	Yes	3	.56-1(a), (b)	G		
1,1-Dichloroethane	DCH	36	0	С	Ш	Α	Yes	1	No	G		
2,2'-Dichloroethyl ether	DEE	41	0	D	11	Α	Yes	1	.55-1(f)	G		
Dichloromethane	DÇM	36	0	NA	III	Α	Yes	5	No	G		
2,4-Dichlorophenoxyacetic acid, diethanolamine salt solution	DDE	43	0	Ε	Ш	Α	No	N/A	.56-1(a), (b), (c), (g)	G		
2,4-Dichlorophenoxyacetic acid, dimethylamine salt solution	DAD	0 1.		Α	III	Α	No	N/A	.56-1(a), (b), (c), (g)	G		
2,4-Dichlorophenoxyacetic acid, triisopropanolamine salt solution	DTI	43 ²		E	III	A	No	N/A	.56-1(a), (b), (c), (g)	G		
1,1-Dichloropropane	DPB	36	0	C	III	A	Yes	3	No	G		
1,2-Dichloropropane	DPP	36	0	C	111	A	Yes	3	No	G		
1,3-Dichloropropane	DPC	36	0	C	111	A	Yes	3	No	G		
1,3-Dichloropropene	DPU	15	0	D	11	A	Yes	4	No	G		
Dichloropropene, Dichloropropane mixtures	DMX	15	0	C	<u>;;</u>	A	Yes	1	No	G		
Diethanolamine	DEA	8	0	E		A	Yes	1	.55-1(c)	G		
Diethylamine	DEN	7	0	C	III	A	Yes	3	.55-1(c)	G		
Diethylenetriamine	DET	72	0	E					.55-1(c)	G		
Diisobutylamine	DBU	7	0	D	111	A	Yes	1	.55-1(c)			
Diisopropanolamine	DIP	- 8			III	Α Α	Yes	3		G		
Diisopropylamine	DIA	7	0	E C	- 111	A	Yes	1	.55-1(c)	G		
N,N-Dimethylacetamide			0		II.	A	Yes	3	.55-1(c)	G		
Dimethylethanolamine	DAC	10	0	E	111	A	Yes	3	.56-1(b)	G		
Dimethylformamide	DMB	8	0	D	III	A	Yes	1	.56-1(b), (c)	G		
Di-n-propylamine	DMF	10	0	D	- 111	A	Yes	1	.55-1(e)	G		
	DNA	7	0	C	II	A	Yes	3	55-1(c)	G		
Dodecyldimethylamine, Tetradecyldimethylamine mixture	DOT	7	0	E	!!!	Α	No	N/A	.56-1(b)	G		
Dodecyl diphenyl ether disulfonate solution	DOS	43	0	#	_IL	Α	No	N/A	No	G		
EE Glycol Ether Mixture	EEG	40	0	D	111	Α	No	N/A	No	G		
Ethanolamine	MEA	8	0	E	III	Α	Yes	1	.55-1(c)	G		
Ethyl acrylate	EAC	14	0	С	[]]	Α	Yes	2	.50-70(a), .50-81(a), (b)	G		
Ethylamine solutions (72% or less)	EAN	7	0	Α	_11	Α	Yes	6	.55-1(b)	G		
N-Ethylbutylamine	EBA	7	0	D	III	Α	Yes	3	.55-1(b)	G		
N-Ethylcyclohexylamine	ECC	7	0	D	H	Α	Yes	1	.55-1(b)	G		
Ethylene cyanohydrin	ETC	20	0	E	III	Α	Yes	1	No	G		
Ethylenediamine	EDA	7 2	0	D	111	Α	Yes	1	.55-1(c)	G		
Ethylene dichloride	EDC	36 ²	0	С	III	Α	Yes	1	No	G		
Ethylene glycol hexyl ether	EGH	40	0	E	Ш	Α	No	N/A	No	G		
Ethylene glycol monoalkyl ethers	EGC	40	0	D/E	111	Α	Yes	1	No	G		
Ethylene glycol propyl ether	EGP	40	0	Е	[1]	Α	Yes	1	No	G		
2-Ethylhexyl acrylate	EAI	14	0	E	III	Α	Yes	2	.50-70(a), .50-81(a), (b)	G		
Ethyl methacrylate	ETM	14	0	D/E	111	Α	Yes	2	.50-70(a)	G		



Serial #: C1-1804442 Dated: 27-Nov-18

Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HFL 200S

Shipyard: TRINITY MARINE GROUP,

CARUTHERSVILLE,

MO Hull #: 6078-1

Official #: 1291093

Page 3 of 9

Cargo Identification								Conditions of Carriage						
Name	Chem Code	Compat Group No	Sub Chapter	Grade	Hull Type	Tank Group	App'd	Recovery VCS Category	Special Requirements in 46 CFR 151 General and Mat'ls of Construction	Insp. Period				
2-Ethyl-3-propylacrolein	EPA	19 ²	0	Е	Ш	Α.	Yes	1_	No	G				
Formaldehyde solution (37% to 50%)	FMS	19 ²	0	D/E	111	Α	Yes	1	.55-1(h)	G				
Furfural	FFA	19	0	D	111	Α	Yes	1	.55-1(h)	G				
Glutaraldehyde solutions (50% or less)	GTA	19	0	NA	Ш	Α	No	N/A	No	G				
Hexamethylenediamine solution	НМС	7	0	Е	111	Α	Yes	1	.55-1(c)	G				
Hexamethyleneimine	НМІ	7	0	С	II	Α	Yes	1	.56-1(b), (c)	G				
Hydrocarbon 5-9	HFN	31	0	С	Ш	Α	Yes	1	.50-70(a), .50-81(a), (b)	G				
Isoprene	IPR	30	0	Α	III	Α	Yes	7	.50-70(a), .50-81(a), (b)	G				
Isoprene, Pentadiene mixture	IPN	30	0	В	III	Α	No	N/A	.50-70(a), .55-1(c)	G				
Kraft pulping liquors (free alkali content 3% or more)(including: Black, Green, or White liquor)	KPL	5	0	NA	III	Α	No	N/A	.50-73, .56-1(a), (c), (g)	G				
Mesityl oxide	MSO	182	. 0	D	111	Α	Yes	1	No	G				
Methyl acrylate	MAN	1 14	0	С	111	Α	Yes	2	.50-70(a), .50-81(a), (b)	G				
Methylcyclopentadiene dimer	MCK	30	0	С	111	Α	Yes	1	No	G				
Methyl diethanolamine	MDE	8	0	Е	Ш	Α	Yes	1	.56-1(b), (c)	G				
2-Methyl-5-ethyl pyridine	MEP	9	0	Ε	Ш	Α	Yes	1	.55-1(e)	G				
Methyl methacrylate	MMN	1 14	0	С	Ш	Α	Yes	2	.50-70(a), .50-81(a), (b)	G				
2-Methylpyridine	MPR	9	0	D	Ш	Α	Yes	3	.55-1(c)	G				
alpha-Methylstyrene	MSR	30	0	D	Ш	Α	Yes	2	.50-70(a), .50-81(a), (b)	G				
Morpholine	MPL	7	2 0	D	111	Α	Yes	1	.55-1(c)	G				
Naphthalene (molten)	NTM	32	0	С	111	Α	Yes	1	No	G				
Nitroethane	NTE	42	0	D	П	Α	No	N/A	.50-81, .56-1(b)	G				
1- or 2-Nitropropane	NPM	42	0	D	III	Α	Yes	1	.50-81	G				
1,3-Pentadiene	PDE	30	0	Α	Ш	Α	Yes	7	.50-70(a), .50-81	G				
Perchloroethylene	PER	36	0	NA	III	Α	No	N/A	No	G				
Phthalic anhydride (molten)	PAN	11	0	Е	Ш	Α	Yes	1	No	G				
Polyethylene polyamines	PEB	7	2 0	Ε	Ш	А	Yes	1	.55-1(e)	G				
iso-Propanolamine	MPA	. 8	0	E	UI	Α	Yes	1	.55-1(c)	G				
Propanolamine (iso-, n-)	PAX	8	0	E	III	Α	Yes	1	.56-1(b), (c)	G				
Isopropylamine	IPP	7	0	Α	- II	А	Yes	5	.55-1(c)	G				
Pyridine	PRD	9	0	С	III	Α	Yes	1	.55-1(e)	G				
Sodium acetate, Glycol, Water mixture (3% or more Sodium Hydroxide)	SAP		0		UI	Α	No	N/A	λ .50-73, .55-1(j)	G				
Sodium aluminate solution (45% or less)	SAU	5	C	NA	Ш	Α	No	N/A	,50-73, .56-1(a), (b), (c)	G				
Sodium chlorate solution (50% or less)	SDD	0	1,2	NA	Ш	Α	No	N/A	,50-73	G				
Sodium hypochlorite solution (20% or less)	SHC	5	0	NA	Ш	А	No	N/A	Δ .50-73, .56-1(a), (b)	G				
Sodium sulfide, hydrosulfide solution (H2S 15 ppm or less)	SSH		1,2 C		111	Α	Yes	1	.50-73, .55-1(b)	G				
Sodium sulfide, hydrosulfide solution (H2S greater than 15 ppm but less than 200 ppm)	SSI		1,2 C		III		No	N/A	Δ .50-73, .55-1(b)	G				
Sodium sulfide, hydrosulfide solution (H2S greater than 200 ppm)	SSJ	0	1,2 C	NA.	П	Α	No	N/A	Δ .50-73, .55-1(b)	G				
Styrene (crude)	STX	30	C	D	Ш	Α	Yes	s 2	No	G				
Styrene monomer	STY	30	C	D	111	Α	Yes	3 2	.50-70(a), .50-81(a), (b)	G				
1,1,2,2-Tetrachloroethane	TEC	36	C) NA	III	Α	No	N/A	A No	G				
Tetraethylene pentamine	TTP	7	C) E	Ш	Α	Yes	s 1	.55-1(c)	G				
Tetrahydrofuran	THE	41	C) C	III	Α	Ye	s 1	.50-70(b)	G				
Toluenediamine	TDA) E	П	Α	No	N/A	Δ .50-73, .56-1(a), (b), (c), (g)	G				



Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HFL 200S

Shipyard: TRINITY MARINE GROUP,

CARUTHERSVILLE,

Dated:

27-Nov-18

1,3-Cyclopentadiene dimer (molten)

Cyclopentane

Official #: 1291093	Hull #: 6078-1									
Cargo Identification	n								tions of Carriage	
Name	Chem Code	Compat Group No	Sub Chapter	Grade	Hull Type	Tank Group	App'd	Recovery VCS Category	Special Requirements in 46 CFR 151 General and Mat'ls of Construction	Insp Peri
1,2,4-Trichlorobenzene	тсв	36	O	Е	111	Α	Yes	1	No	G
1,1,2-Trichloroethane	ТСМ	36	0	NA	. III	Α	Yes	1	.50-73, .56-1(a)	G
Trichloroethylene	TCL	36 ²	0	NA	111	Α	Yes	1	No	G
1,2,3-Trichloropropane	TCN	36	0	Ε	11	Α	Yes	3	.50-73, .56-1(a)	G
Triethanolamine	TEA	8 2	0	E		Α	Yes	1	.55-1(b)	G
Triethylamine	TEN	7	0	С	N .	Α	Yes	3	.55-1(e)	G
Triethylenetetramine	TET	7 2		Ε	III	Α	Yes	1	.55-1(b)	G
Triphenylborane (10% or less), caustic soda solution	TPB	5	0	NA	111	Α	No	N/A	.56-1(a), (b), (c)	G
Trisodium phosphate solution	TSP	5	0	NA	[1]	Α	No	N/A	.50-73, .56-1(a), (c).	G
Urea, Ammonium nitrate solution (containing more than 2% NH3)	UAS	6	0	NA	III	Α	No	N/A	.56-1(b)	G
Vanillin black liquor (free alkali content, 3% or more). Vinyl acetate	VBL	5	0	NA	III	Α	No	N/A	.50-73, .56-1(a), (c), (g)	G
Vinyl neodecanoate	VAM	13	0	C	III	A	Yes	2	.50-70(a), .50-81(a), (b)	G
Vinyttoluene	VND	13	0	E	III	A	No	N/A	.50-70(a), .50-81(a), (b)	G
Villykoldolic	VNT	13	0	D	III	A	Yes	2	.50-70(a), .50-81, .56-1(a), (b), (c), (G
Subchapter D Cargoes Authorized for Vapor Contr	ol									
Acetone	ACT	18 ²	D	С		Α	Yes	1		
Acetophenone	ACP	18	D	E		Α	Yes	1		
Alcohol (C6-C17) (secondary) poly(3-6) ethoxylates	AEA	20	D	Е		Α	Yes	1		
Alcohol (C6-C17) (secondary) poly(7-12) ethoxylates	AEB	20	D	Е		Α	Yes	1		
Amyl acetate (all isomers)	AEC	34	D	D		Α	Yes	1		
Amyl alcohol (iso-, n-, sec-, primary)	AAI	20	D	D		Α	Yes	1		-
Benzyl acetate	BZE	34	D	E	-	A	Yes	1		
Benzyl alcohol	BAL	21	D	E		A	Yes	1		
Brake fluid base mixtures (containing Poly(2-8)alkylene(C2-C3) glycols, Polyalkylene(C2-C10) glycol monoalkyl(C1-C4) ethers, and their borate esters)	BFY	20	D	E		A	Yes	1		
Butyl acetate (all isomers)	BAX	34	D	D		Α	Yes	1		
sobutyl alcohol	IAL	20 ²	D	D		Α	Yes	1		
Butyl alcohol (n-)	BAN	20 2	D	D		Α	Yes	1		
Butyl alcohol (sec-)	BAS	20 ²	D	С		Α	Yes	1		
Butyl alcohol (tert-)	BAT	20 ²	D	С		A	Yes	1		
Butyl benzyl phthalate	ВРН	34	D	E		A	Yes	1		
Butyl toluene	BUE	32	D	D		A	Yes	1		
Caprolactam solutions	CLS	22	D	E		A	Yes	1		
Cycloheptane	CYE	31	D	С	-	A	Yes	1		
Cyclohexane	CHX	31	D	С		A				
Cyclohexanol	CHN	20	D	E	-		Yes	11		
Dyclohexyl acetate	CYC					A	Yes	1		
100 N 1 1 100 N	UTU	34	D	D		Α	Yes	_1		

D

D В

D/E

Yes

30

CPD



Serial #: C1-1804442 27-Nov-18

Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HFL 200S

Official #: 1291093

Shipyard: TRINITY MARINE

GROUP

CARUTHERSVILLE,

MO

Hull #: 6078-1

Page 5 of 9

Cargo Identification							Conditions of Carriage					
Name	Chem Code	Compat Group No	Sub Chapter	Grade	Hull Type	Tank Group	App'd	Recovery VCS Calegory	Special Requirements in 46 CFR 151 General and Mat'ls of Construction	Insp. Period		
p-Cymene	CMP	32	D	D		Α	Yes	1				
iso-Decaldehyde	IDA	19	D	E		Α	Yes	1				
n-Decaldehyde ,	DAL	19	D	Е		Α	Yes	1				
Decanoic acid	DCC	4	D	#		Α	Yes	1				
Decene	DCE	30	D	D		Α	Yes	1				
Decyl alcohol (all isomers)	DAX	20	2 D	E		Α	Yes	1				
n-Decylbenzene, see Alkyl(C9+)benzenes	DBZ	32	D	Е		Α	Yes	1				
Diacetone alcohol	DAA	20	2 D	D		Α	Yes	1_				
Dibutyl phthalate	DPA	34	D	E		Α	Yes	1				
Diethylbenzene	DEB	32	D	D		Α	Yes	1				
Diethylene glycol	DEG	40	2 D	Е		Α.	Yes	1				
Diisobutylene	DBL	30	D	С		Α	Yes	1				
Diisobutyl ketone	DIK	18	D	D		Α	Yes	1				
Diisopropylbenzene (all isomers)	DIX	32	D	E		Α	Yes	. 1				
Dimethyl phthalate	DTL	34	D	Е		Α	Yes	1				
Dioctyl phthalate	DOF	34	D	Е		Α	Yes	1				
Dipentene	DPN	30	D	D		Α	Yes	1				
Diphenyl	DIL	32	D	D/	E	Α	Yes	; 1				
Diphenyl, Diphenyl ether mixtures	DDC	33	D	Е		Α	Yes	1				
Diphenyl ether	DPE	41	D	{E	}	Α	Yes	1				
Dipropylene glycol	DPC	3 40	D	Е		Α	Yes	1				
Distillates: Flashed feed stocks	DFF	33	D	E		Α	Yes	1				
Distillates: Straight run	DSF	33	D	Е		Α	Yes	1				
Dodecene (all isomers)	DOZ	Z 30	D	D		Α	Yes	s 1				
Dodecylbenzene, see Alkyl(C9+)benzenes	DDE	3 32	D	Е		Α	Yes	1				
2-Ethoxyethyl acetate	EEA	34	D	D		Α	Yes	s 1				
Ethoxy triglycol (crude)	ETC	3 40	D	E		А	Yes	s 1				
Ethyl acetate	ETA	34	D	С		А	Yes	s 1				
Ethyl acetoacetate	EAA	34		E		А	Yes	s 1				
Ethyl alcohol	EAL	_ 20	2	С		А	Ye	s 1				
Ethylbenzene	ETE			C		А	Ye	s 1				
Ethyl butanol	EB ⁻	20		D		Α	Ye	s 1				
Ethyl tert-butyl ether	EBI) С		Α	Ye	s 1				
Ethyl butyrate	EBI					Α	Ye	s 1				
Ethyl cyclohexane	EC'					A	Ye	s 1				
Ethylene glycol	EG					A	Ye	s 1				
Ethylene glycol butyl ether acetate	EM					Δ						
Ethylene glycol diacetate	EG					Α						
Littytene glycol diacetate												



Certificate of Inspection Cargo Authority Attachment

Vessel Name: HFL 200S

Shipyard: TRINITY MARINE GROUP,

CARUTHERSVILLE,

Serial #: C1-1804442

27-Nov-18

Dated:

Hull #: 6078-1

Official #: 1291093

Page 6 of 9

Cargo Identification								Condi	tions of Carriage	
Name	Chem Code	Compat Group No	Sub Chapter	Grade	Hull Type	Tank Group	App'd	Recovery VCS Calegory	Special Requirements in 46 CFR 151 General and Mat'ls of Construction	Insp. Period
Ethylene glycol phenyl ether	EPE	40	D	Е		А	Yes	1		
Ethyl-3-ethoxypropionate	EEP	34	D	D		Α	Yes	1		
2-Ethylhexanol	EHX	20	D	E		Α	Yes	1	** - * * * * * * * * * * * * * * * * *	
Ethyl propionate	EPR	34	D	С		Α	Yes	1	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	
Ethyl toluene	ETE	32	D	D		Α	Yes	1		
Formamide	FAM	10	D	Е		Α	Yes	1		
Furfuryl alcohol	FAL	20 2	2 D	Е		Α	Yes	1		
Gasoline blending stocks: Alkylates	GAK	33	D	A/C		A	Yes	1		
Gasoline blending stocks: Reformates	GRF	33	D	A/C		Α	Yes	1		
Gasolines: Automotive (containing not over 4.23 grams lead per	GAT	33	D	С		A	Yes	1		
Gasolines: Aviation (containing not over 4.86 grams of lead per gallon)	GAV	33	D	С		Α	Yes	1		
Gasolines: Casinghead (natural)	GCS	33	D	A/C		A	Yes	1		
Gasolines: Polymer	GPL	33	D	A/C		A	Yes	1		
Gasolines: Straight run	GSR	33	D	A/C		A	Yes	1		
Glycerine	GCR	20 2		E	-	A	Yes	1		
Heptane (all isomers), see Alkanes (C6-C9) (all isomers)	HMX	31	D	c	57.5	Α	Yes	1		
n-Heptanoic acid	HEN	4	D	E		A	Yes	1		
Heptanol (all isomers)	HTX	20	D	D/E		A	Yes	1		
Heptene (all isomers)	HPX	30	D	C		A	Yes	2		
Heptyl acetate	HPE	34	D	E		A	Yes	1		
Hexane (all isomers), see Alkanes (C6-C9)	HXS	31 2		B/C		A	Yes	1		
Hexanoic acid	нхо	4	D	E		A	Yes	1		
Hexanol	HXN	20	D	D		A	Yes	1		-
Hexene (all isomers)	HEX	30	D	С		A	Yes	2		
Hexylene glycol	HXG	20	D	E		A	Yes	1		
Isophorone	IPH	18 ²	D	E		A				
Jet fuel: JP-4	JPF	33	D	E			Yes			
Jet fuel: JP-5 (kerosene, heavy)	JPV	33	D	D		Α	Yes	1		
Kerosene	KRS	33	D	D		A	Yes	1		
Methyl acetate	MTT	34				Α .	Yes	1		
Methyl alcohol	MAL	20 2	D	D		A	Yes	1		
Methylamyl acetate	MAC	34	D	С		A	Yes	1		
Methylamyl alcohol	MAA	20	D	D		Α	Yes	1		
Methyl amyl ketone	MAK	18	D	D		Α	Yes	1		-
Methyl tert-butyl ether	MBE	41 2	D	D		A	Yes	1		_
Vethyl butyl ketone			D	С		_ A	Yes	1		
Anthul buturata	MBK	18	D	С		Α .	Yes	1		
dethidaveleh	MBU	34	D	С		Α .	Yes	1		
	MCY	31	D	С		Α	Yes	1		



C1-1804442

27-Nov-18

Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HFL 200S

Shipyard: TRINITY MARINE GROUP,

CARUTHERSVILLE,

MO Hull #: 6078-1

Official #: 1291093

Page 7 of 9

Cargo Identification						Conditions of Carriage					
Name	Chem Code	Compat Group No	Sub Chapter	Grade	Hull Type	Tank Group	App'd	Recovery VCS Calegory	Special Requirements in 46 CFR 151 General and Mat'ls of Construction	Insp. Period	
Methyl ethyl ketone	MEK	18	2 D	С		Α	Yes	1			
Methyl heptyl ketone	мнк	18	D	D		Α	Yes	1			
Methyl isobutyl ketone	MIK	18	2 D	С		Α	Yes	1			
Mineral spirits	MNS	33	D	D		Α	Yes	1			
Myrcene	MRE	30	D	D		Α	Yes	1			
Naphtha: Heavy	NAG	33	D	#		Α	Yes	1			
Naphtha: Petroleum	PTN	33	D	#		Α	Yes	1			
Naphtha; Solvent	NSV	33	D	D		Α	Yes	1			
Naphtha: Stoddard solvent	NSS	33	D	D		Α	Yes	1			
Naphtha: Varnish makers and painters (75%)	NVM	33	D	С		Α	Yes	1			
Nonane (all isomers), see Alkanes (C6-C9)	NAX	31	D	D		Α	Yes	1			
Nonene (all isomers)	NON	30	D	D		Α	Yes	2		-7	
Nonyl alcohol (all isomers)	NNS	20	2 D	Е		Α	Yes	1			
Nonyl phenol	NNP	21	D	Е		Α	Yes	1			
Nonyl phenol poly(4+)ethoxylates	NPE	40	D	Е		Α	Yes	1			
Octane (all isomers), see Alkanes (C6-C9)	OAX	31	D	С		Α	Yes	1			
Octanoic acid (all isomers)	OAY	4	D	Ę		Α	Yes	1			
Octanol (all isomers)	OCX	20	2 D	E		Α	Yes	1			
Octene (all isomers)	ОТХ	30	D	С		Α	Yes	2			
Oil, fuel: No. 2	OTV		D	D/E		Α	Yes	1			
Oil, fuel: No. 2-D	OTD		D	D		Α	Yes	1			
Oil, fuel: No. 4	OFR		D	D/E		Α	Yes	1			
Oil, fuel: No. 5	OFV		D	D/E		Α	Yes				
Oil, fuel: No. 6	OSX		D	E		A	Yes	1			
Oil, misc: Crude	OIL	33	D	A/D		A	Yes	1			
Oil, misc: Diesel	ODS		D	D/E		Α	Yes				
Oil, misc: Gas, high pour	OGP		D	E		Α	Yes				
Oil, misc: Lubricating	OLB	33	D	E		Α	Yes			-	
Oil, misc: Residual	ORL		D	E		A	Yes				
Oil, mísc: Turbine	ОТВ		D	E		Α	Yes	1			
Pentane (all isomers)	PTY		D	Α		Α	Yes				
Pentene (all isomers)	PTX		D	A		Α	Yes				
n-Pentyl propionate	PPE		D	D		A	Yes				
alpha-Pinene	PIO	30	D	D		A	Yes				
beta-Pinene	PIP	30	D	D		A	Yes	1			
Poly(2-8)alkylene glycol monoalkyl (C1-C6) ether	PAG		D	E		A	Yes				
Poly(2-8)alkylene glycol monoalkyl (C1-C6) ether acetate	PAF		D	E		A	Yes				
	PLB		D	E		A	Yes				
Polybutene	PLB	30	IJ			A	res	1			



27-Nov-18

Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HFL 200S

Shipyard: TRINITY MARINE GROUP,

CARUTHERSVILLE,

MO

Official #: 1291093

Page 8 of 9

Hull #: 6078-1

Cargo Identification						Conditions of Carriage					
Name	Chem Code	Compat Group No	Sub Chapter	Grade	Hull Type	Tank Group	Vapor F App'd	Recovery	Special Requirements in 46 CFR 151 General and Mat'ls of Construction	Insp. Period	
Polypropylene glycol	PGC	40	D	Е		Α	Yes	1			
Isopropyl acetate	IAC	34	D	С		Α	Yes	1			
n-Propyl acetate	PAT	34	D	С		Α	Yes	1			
Isopropyl alcohol	IPA	20 2	.3 D	С		Α	Yes	1			
n-Propyl alcohol	PAL	20 2	D	С		Α	Yes	. 1			
Propylbenzene (all isomers)	PBY	32	D	D		Α	Yes	1			
Isopropylcyclohexane	IPX	31	D	D		Α	Yes	1			
Propylene glycol	PPG	20 2	D	Е		Α	Yes	1			
Propylene glycol methyl ether acetate	PGN	34	D	D		Α	Yes	1			
Propylene tetramer	PTT	30	D	D		Α	Yes	1			
Sulfolane	SFL	39	D	Е		Α	Yes	1			
Tetraethylene glycol	TTG	40	D	Е		Α	Yes	1			
Tetrahydronaphthalene	THN	32	D	Е		Α	Yes	1			
Toluene	TOL	32	D	С		Α	Yes	1			
Tricresyl phosphate (containing less than 1% ortho isomer)	TCP	34	D	Е		Α	Yes	1			
Triethylbenzene	TEB	32	D	Е		Α	Yes	1			
Triethylene glycol	TEG	40	D	E		Α	Yes	1		-	
Triethyl phosphate	TPS	34	D	Ε		Α	Yes	1			
Trimethylbenzene (all isomers)	TRE	32	D	{D}		Α	Yes	1			
Trixylyl phosphate	TRP	34	D	E		Α	Yes	1			
1-Undecene	UDC	30	D	D/E		Α	Yes	1			
1-Undecyl alcohol	UND	20	D	E		A	Yes	1			
Xylenes (ortho-, meta-, para-)	XLX	32	D	D		Α	Yes	1			



Department of Homeland Security United States Coast Guard

Serial #: C1-1804442 Dated: 27-Nov-18

Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HFL 200S Official #: 1291093

Page 9 of 9

Shipyard: TRINITY MARI

Hull #: 6078-1

Explanation of terms & symbols used in the Table:

Cargo Identification

Chem Code

none

Compatability Group No.

Note 1

Note 2

Subchapter Subchapter D Subchapter O

Grade

A, B, C Note 4

NA

Hull Type

NA

Conditions of Carriage Tank Group

> Vapor Recovery Approved (Y or N)

Conditions of Carriage

Vapor Recovery Approved (Y or N)

> VCS Category: Category 1

> > Category 2

Category 4

Category 3

Category 5

Category 6

Category 7

The propper shipping name as listed in 46 CFR Table 30.25-1, 46 CFR Table 151.05, and 46 CFR Part 153 Table 2. The three letter designation assigned to the cargo in the Chemical Hazards Response Information System (CHRIS) Manual. Certain mixtures of cargoes may not have a CHRIS Code assigned.

The cargo reactive group number assigned for compatibility determinations in 46 CFR Part 150 Tables I and II. In accordance with 46 CFR 150.130, the Person-in-Charge of

the barge is responsible for ensuring that the compatibility requirements of 46 CFR Part 150 are met. Cargoes must be checked for compatibility using the figures, tables, and appendices of 46 CFR 150 in conjunction with the assigned reactive group number.

Because of the very high reactivity or unusual conditions of carriage or potential compatibility problems, this product is not assigned to a specific group in the Compatibility Chart. For additional compatibility information, contact Commandant (CG-3PSO-3), U.S. Coast Guard, 2100 Second Street, SW, Washington, DC 20593-0001. Telephone

See Appendix I to 46 CFR Part 150 - exceptions to the compatability chart.

The subchapter in Title 46 Code of Federal Regulations under which the cargo has been classified.

Those flammable and combustible liquids listed in 46 CFR Table 30.25-1. Those hazardous cargoes listed in 46 CFR Table 151.05 and 46 CFR Part 153 Table 2.

Those cargoes listed in 46 CFR Part 153 Table 2 are non-regulated cargoes when carried in bulk on non-oceangoing barges.

The cargo classification assigned to each flammable or combustible liquid. Grades inside of "{ }" indicate a provisional assignment based upon literature sources which were not verified by manufacturers data. The Person-in-Charge shall verify the cargo grade based on Manufacturers data and ensure that the barge is authorized for carriage of

Flammable liquid cargoes, as defined in 46 CFR 30-10.22. Combustible liquid cargoes, as defined in 46 CFR 30-10.15.

The flammability/combustibility grade of these cargoes may vary depending upon the flashpoint and Reid vapor pressure. The Person-in-Charge shall verify the cargo grade based on Manufacturers data and ensure that the barge is authorized for carriage of that grade of cargo.

Those subchapter O cargoes which are not classified as a flammable or combustible liquid.

No flammability/combustibility grade has been assigned yet, as the necessary flash point/vapor pressure data for such assignments are presently not available.

The required barge hull classification for carriage of the specified Subchapter O hazardous material cargo, see 46 CFR 151.10-1.

Designed to carry products which require the maximum preventive measures to preclude the uncontrolled release of the cargo. See 46 CFR 151.10-1(b)(1).

Designed to carry products which require significant preventive measures to preclude the uncontrolled release of cargo. See 46 CFR 151.10-1(b)(3).

Designed to carry products of sufficeint hazard to require a moderate degree of control. See 46 CFR 151.10-1(b)(4).

Not applicable to barges certificated under Subchapter D.

The vessel's tank group (as defined in Section 4) which is authorized for carriage of the named cargo.

Yes: The vessel's VCS has been reviewed and approved by the MSC to control vapors of the specified cargo, No: The vessel's VCS has been reviewed and is not approved by the MSC to control vapors of the specified cargo.

The vessel's lank group (as defined under the "46 CFR Tank Group Characteristics" listed on page 1) which is authorized for carriage of the named cargo.

Yes: The vessel's VCS has been reviewed and approved by the MSC to control vapors of the specified cargo. No: The vessel's VCS has been reviewed and is not approved by the MSC to control vapors of the specified cargo.

The specified cargo's provisional classification for vapor control systems. (No additional VCS requirements above those for benzene, gasolines and crude oil) All requirements applying to the handling of oil and hazardous materials in Titles 33 and 46 Code of Federal Regulations (CFR) apply to these cargoes. Those specifically dealing with vapor control systems are in 33 CFR 155.750, 33 CFR 156.120, 35 CFR 156.170, 46 CFR 35.35 and 46 CFR 39. The cargo tank venting system calculations (46 CFR 39.20-11) and the pressure drop calculations (46 CFR 39.30-1(b))

must use appropriate friction factors, vapor densities and vapor growth rates. (Polymerizes) Polymerization and residue build-up of these cargoes can adversely affect the vessel by fouling safety componenets and restricting vapor flow which could lead to cargo tank overpressurization. The vessel's owner must develop a method of ensuring all VCS safety components are functional and polymer build-up is not

causing an unsafe condition due to increased pressure in the vapor control piping and cargo tanks. The method shall be acceptable to the local Officer in Charge, Marine Inspection. This is in addition to the requirements of Category 1. Please note that a material not normally considered a monomer can be a problem in detonation arrester. (Highly toxic) VCSs for these toxic cargoes cannot use a spill valve or rupture disk as the primary means to meet the overfill protection requirement of 46 CFR 39,20-9.

This requirement is in addition to the requirements of Category 1.

(High vapor pressure) VCS pressure drop calculations for cargoes with a vapor pressure greater than 14.7 psia at 115 F must take into account increased vapor-air mixture densities and vapor growth rates as compared to Category 1cargoes. Consult the Marine Safety Center's VCS Guidelines for further information. This

requirement is in addition to the requirements of Category 1.

(High vapor pressure and highly toxic) Must comply with requirements of Categories 1, 3 and 5. (High vapor pressure and polymerizes) Must comply with requirements of Categories 1, 2 and 5.

The cargo has not been evaluated/classified for use in vapor control systems.