

United States of America Department of Homeland Security United States Coast Guard

Certification Date: 03 Aug 2023 Expiration Date: 03 Aug 2028

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 | ımber | Call Sign | Service | |
|------------------|---|-------------|------------------------------------|----------------------------|----------------------|--------------------|----------------|-----------------|
| KIRBY 29072 | 2 | | 1245344 | | | | Tank Ba | irge |
| Turio I Zooria | | | | | | | | |
| | | | | | | | | |
| Hailing Port | | | | | | Dragulaina | | |
| HOUMA, LA | | | Hull Material | Ho | rsepower | Propulsion | | |
| , | | | Steel | | | | | |
| UNITED STA | ATES | | | | | | | |
| | | | | | | | | |
| | | | | | | | | |
| Place Built | | | Delivery Date | Keel Laid Date | Gross Tons | Net Tons | DWT | Length |
| MORGAN C | ITY, LA | | 30May2013 | 16Feb2013 | R-1619 | R-1619 | | R-297.5 |
| LINUTED OT | TEO | | 301VIAy2013 | 101 002010 | I- | I- | | 1-0 |
| UNITED STA | ATES | | | | | | | |
| | | | | | | | | |
| Owner | | | | Opera | ator | | | |
| KIRBY INLAN | ND MARINE LP | | | KIR | BY INLAND | MARINE LP | | |
| 55 WAUGH | OR STE 1000 | | | | 350 MARKET | | | |
| HOUSTON, | | | | | ANNELVIEV | | | |
| UNITED STA | TES | | | UN | ITED STATE | :5 | | |
| | | | | | | | 1111 | -4 b - |
| This vessel m | ust be manned w | vith the fo | llowing licensed | and unlicens | ed Personne | II. Included in w | nich there mu | st be |
| 0 Certified Life | eboatmen, 0 Cer | tified I ar | ikermen, u HSC | Type Rating | | | | |
| 0 Masters | 0 L | icensed M | ates 0 Chief | Engineers | 0 0 | Dilers | | |
| 0 Chief Mate | s 0 F | First Class | Pilots 0 First A | Assistant Engine | eers | | | |
| 0 Second Ma | ites 0 F | Radio Offic | ers 0 Secor | nd Assistant Eng | gineers | | | |
| 0 Third Mate | s 0 A | Able Seame | en 0 Third | Assistant Engin | neers | | | |
| 0 Master Firs | t Class Pilot 0 0 | Ordinary Se | eamen 0 Licens | sed Engineers | | | | |
| 0 Mate First | Class Pilots 0 D | Deckhands | 0 Qualif | ied Member En | gineer | | | |
| In addition, the | is vessel may car ved: 0 | ry 0 Pas | sengers, 0 Other | Persons in o | crew, 0 Perso | ons in addition to | o crew, and no | Others. Total |
| Route Perm | nitted And Condi | tions Of | Operation: | | | | | |
| | Bays, and So | | | Coastwi | ea | | | |
| Lakes, | Bays, and Sc | Junus | pius Liiniteu | Coastwi | 36 | | | |
| LIMITED COAS | STWISE SERVICE: | IN SEAS | OF LESS THAN | THREE (03) | FEET, WIND | LESS THAN TWE | NTY (20) KNOT | S AND CLEAR |
| VISIBILITY, | NOT MORE THAN T | rwelve (| 12) MILES FROM | SHORE BETW | EEN ST. MAR | KS AND CARRABI | ELLE, FLORIDA | Α. |
| | | | | | | | | |
| THIS TANK BA | ARGE IS PARTICIE | PATING I | N THE EIGHTH-N | INTH COAST | GUARD DISTR | ICT'S TANK BA | RGE STREAMLIN | NED INSPECTION |
| PROGRAM (TBS | SIP). INSPECTION (TAP). INSPECTI | N ACTIVI | TIES ABOARD TH. ES CONCERNING ' | IS BARGE SH. THIS BARGE | SHOULD BE D | IRECTED TO THE | E OCMI HOUSTO | ON-GALVESTON, |
| TEXAS. | (IRI). INDIDOIS | | | | | | | |
| | | | | | | | | |
| ***SEE NE | KT PAGE FOR A | DOLLIO | NAL CERTIFIC | ATE INFO | RMATION*** | | × | |
| | | | | | | | o Officer in C | narge Marine |
| With this Insp | ection for Certifica ouma, Louisiana d | ation hav | ing been comple | recepte is in | a, LA, UNIT | with the applica | ble vesselins | ection laws and |
| the rules and | ouma, Louisiana d regulations presci | ribed the | ne vessei, in all f reunder | especis, is ii | Constitution | The applica | 12 | |
| are rules and | Annual/Period | | | | This certifica | te issued by | - July | 11 |
| Det | | | | | / // | BACON OD | P VISOC BUIL | Direction |
| Date | Zone | A/P/R | Signatu | | | | NUSUG, BY | |
| 10-16-2-1 | Stlove | A | you Bus | | Officer in Charge, N | | | |
| | | - | | | | Houma | a, Louisiana | |
| | | + | | | Inspection Zone | | | |
| | | 1 | | - | 1 | | | |



United States of America Department of Homeland Security **United States Coast Guard**

03 Aug 2023 Certification Date: 03 Aug 2028 **Expiration Date:**

Certificate of Inspection

Vessel Name: KIRBY 29072

THIS VESSEL HAS BEEN GRANTED A FRESH WATER SERVICE EXAMINATION INTERVAL IN ACCORDANCE WITH 46 CFR TABLE 91.10-21(b); IF THIS VESSEL IS OPERATED IN SALT WATER MORE THAN SIX (6) MONTHS IN ANY TWELVE (12) MONTH PERIOD, THE VESSEL MUST BE INSPECTED USING SALT WATER INTERVALS PER 46 CFR TABLE 31.10-21(a) AND THE COGNIZANT OCMI NOTIFIED IN WRITING AS SOON AS THIS CHANGE IN STATUS OCCURS.

---Hull Exams---

Exam Type

Next Exam

Last Exam

Prior Exam

DryDock

31Jul2033

26Jul2023

30May2013

Internal Structure

31Jul2028

26Jul2023

29Jun2018

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

Authorization:

Total Capacity

Units

Highest Grade Type

Part151 Regulated Part153 Regulated

Part154 Regulated

29254

Barrels

No

No

Hazardous Bulk Solids Authority

Not Authorized

Loading Constraints - Structural

Tank Number

Max Cargo Weight per Tank (short tons)

Maximum Density (lbs/gal)

#1

12.5

#2

819 816

12.5

#3

686

125

Loading Constraints - Stability

Hull Type

Maximum Load

(short tons)

Maximum Draft

Max Density

Route Description

3763

(ft/in)

(lbs/gal)

II

9ft 8in

12.5

4422

11ft 0in

12.5

Conditions Of Carriage

ONLY THOSE HAZARDOUS CARGOES NAMED IN THE VESSEL'S CARGO AUTHORITY ATTACHMENT SERIAL NO. C1-1301876 DATED 04 JUNE 2013, MAY BE CARRIED AND THEN ONLY IN THE TANKS INDICATED, SUBJECT TO THE LOADING CONSTRAINTS OF THE VESSEL'S CURRENT STABILITY LETTER.

PER 46 CFR 150.130, THE PERSON IN CHARGE OF THE BARGE IS RESPONSIBLE FOR ENSURING THAT THE COMPATIBILITY REQUIREMENTS OF 46 CFR 150 ARE MET. CARGOES MUST BE CHECKED FOR COMPATIBILITY USING THE FIGURES, TABLES, AND APPENDICES OF 46 CFR 150 IN CONJUNCTION WITH THE REACTIVE GROUP NUMBER FROM THE "COMPATIBILITY GROUP NO." COLUMN LISTED IN THE VESSEL'S CAA.

PER 46 CFR 151.10-15(c)(2) THE MAX TANK WEIGHTS LISTED ABOVE REFLECT UNIFORM (WITHIN 5%) LOADING AT THE DEEPEST DRAFT ALLOWED. WHEN CARRYING SUBCHAPER "O" CARGOES AT SHALLOWER DRAFTS, THE BARGE(S) SHOULD ALWAYS BE LOADED UNIFOMLY.

WHEN THE VESSEL IS CARRYING CARGOES CONTAINING GREATER THAN 0.5% BENZENE, THE PERSON IN CHARGE IS RESPONSIBLE FOR ENSURING THE PROVISIONS OF 46 U.S. CODE OF FEDERAL REGUALTIONS PART 197, SUBPART C ARE APPLIED.

THE MAXIMUM DESIGN DENSITY OF CARGO WHICH MAY BE FILLED TO THE TANK TOP IS 8.74 LBS/GAL. GARGOES WITH HIGHER DENSITIES, UP TO 12.5 LBS/GAL, MAY BE CARRIED AS SLACK LOADS, BUT SHALL NOT EXCEED THE TANK WEIGHT LIMITS AS LISTED ABOVE.

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United States of America Department of Homeland Security United States Coast Guard

Certification Date: 03 Aug 2023 Expiration Date: 03 Aug 2028

Certificate of Inspection

Vessel Name: KIRBY 29072

IN ACCORDANCE WITH 46 CFR PART 39, EXCLUDING PART 39.4000, THIS VESSEL'S VAPOR CONTROL SYSTEM HAS BEEN INSPECTED TO THE PLANS APPROVED BY MARINE SAFETY CENTER LETTERS SERIAL NO. C1-1204161 DATED 25 SEPTEMBER 2012, AND EXTENDED BY C1-1301876 DATED 04 JUNE 2013, AND HAS BEEN FOUND ACCEPTABLE FOR COLLECTION OF BULK LIQUID CARGO VAPORS ANNOTATED WITH "YES" IN THE CAA'S VCS COLUMN.

IN ACCORDANCE WITH 46 CFR PART 39.1017 AND 39.5000 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.

--- Inspection Status ---

Cargo Tanks

| | | Internal Exam | | | External Exam | | |
|----|---------|---------------|-----------|------------|----------------|------------|------|
| | Tank Id | Previous | Last | Next | Previous | Last | Next |
| | #1 | 30May2013 | 26Jul2023 | 31Jul2033 | _ | - | - |
| | #2 | 30May2013 | 26Jul2023 | 31Jul2033 | - | - | - |
| 11 | #3 | 30May2013 | 26Jul2023 | 31Jul2033 | | : - | - |
| | | | * | Hydro Test | | | |
| | Tank Id | Safety Valves | | Previous | Last | Next | |
| | #1 | - | | - | - | *** | |
| | #2 | - | | - | i u | = | |
| | #2 | <u> </u> | | | <u>-</u> | 21 | |

--- Conditional Portable Fire Extinguisher Requirements---

Required Only During Transfer of Cargo or Operation of Barge Machinery

--- Fire Fighting Equipment ---

Fire Extinguishers - Hand portable and semi-portable

Quantity

Class Type

2

B-II

END

Serial #: Dated: C1-1301876

04-Jun-13



Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HBC 305 Official #: 1245344 Shipyard: Conrad Shipyard

Hull #: C-1031

| Tank Group Information | Cargo I | dentificati | ion | | | | Tanks | | Carg Tran | | Environ Control | | Fire | Special Require | ments | | |
|----------------------------|---------|-------------|-------|-------------|----------------------|---------------------|-------|--------|---------------|------|--------------------|-------------------|------------------------|--|--|----|--------------|
| Trik Grp Tanks in Group | Density | Press, | Temp. | Hull Typ | Cargo Seg Tank | Туре | Vent | Gauge | Pipe Class | Cont | Tanks | Handling Space | Protection Provided | General | Materials of Construction | | Temp Cont |
| A #1P/S, #2P/S, #3P/S, | 12,5 | Atmos | Amb, | 11 | 1ii 2ii | Integral Gravity | PV | Closed | II | G-1 | NR | NA | Portable | 50-5, 50-5(d), 50-60, 50-70(a), 50-70(b), 50-73, | 55-1(b), (c), (e), (f), (h), (j), 56-1(a), (b), (d), (f), (g), | NR | No |

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.

List of Authorized Cargoes

| Cargo Identificatio | Conditions of Carriage | | | | | | | | | |
|--|------------------------|--------------------|----------------|-------|--------------|---------------|-------------------|-----------------|---|-----------------|
| Name | Chem Code | Compat Group No | Sub Chapter | Grade | Hull Type | Tank Group | App'd (Y or N) | VCS Category | Special Requirements in 46 CFR 151 General and Mat'ls of | Insp. Period |
| Authorized Subchapter O Cargoes | | | | | | | | | | |
| Acetonitrile | ATN | 37 | 0 | С | III | Α | Yes | 3 | No | G |
| Acrylonitrile | ACN | 15 ² | 0 | С | Н | Α | Yes | 4 | 50-70(a), 55-1(e) | G |
| Adiponitrile | ADN | 37 | 0 | Е | 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 |
| Aminoethylethanolamine | AEE | 8 | 0 | E | Ш | Α | Yes | 1 | .55-1(b) | G |
| Anthracene oil (Coal tar fraction) | AHO | 33 | 0 | NA | 11 | A | 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 | 10 | Α | Yes | 1 | .50-60 | G |
| Benzene or hydrocarbon mixtures (containing Acetylene and 10% Benzene or more) | вна | 32 ² | 0 | С | IH | 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 | III | Α | Yes | 1 | .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 | Ш | Α | Yes | 1 | 55-1(h) | G |
| Camphor oil (light) | CPO | 18 | 0 | D | П | Α | No | N/A | No | G |
| Chemical Oil (refined, containing phenolics) | COD | 21 | 0 | Е | 11 | Α | No | N/A | 50-73 | G |
| Chlorobenzene | CRB | 36 | 0 | D | Ш | Α | Yes | 1 | No | G |
| Chloroform | CRF | 36 | 0 | NA | 111 | Α | Yes | 3 | No | G |
| Coal tar naphtha solvent | NCT | 33 | 0 | D | III | Α | Yes | 1 | ,50-73 | G |
| Creosote | CCW | / 21 ² | 0 | E | III | Α | Yes | 1 | No | G |
| Cresols (all isomers) | CRS | 21 | 0 | E | III | Α | Yes | 1 | No | G |
| Cresylate spent caustic | csc | 5 | 0 | NA | 111 | Α | No | N/A | "50-73, "55-1(b) | G |
| Cresylic acid tar | CRX | | 0 | Е | HI | Α | Yes | 1 | .55-1(f) | G |
| Crotonaldehyde | CTA | 19 ² | 0 | С | П | Α | Yes | 4 | 55-1(h) | G |
| Crude hydrocarbon feedstock (containing Butyraldehydes and Ethylpropyl acrolein) | CHG | | 0 | С | Ш | Α | No | N/A | No | G |
| Cyclohexanone | ССН | 18 | 0 | D | III | Α | Yes | 1 | .56-1(a), (b) | G |
| Cyclohexanone, Cyclohexanol mixture | CYX | 18 ² | 0 | E | Ш | Α | Yes | 1 | ,56-1 (b) | G |
| Cyclopentadiene, Styrene, Benzene mixture | CSB | 30 | 0 | D | HI | Α | Yes | 1 | .50-60, .56-1(b) | G |
| iso-Decyl acrylate | IAI | 14 | 0 | Е | Ш | Α | Yes | 2 | .50-70(a), .50-81(a), (b), .55-1(c) | G |
| Dichlorobenzene (all isomers) | DBX | 36 | 0 | Е | III | Α | Yes | 3 | .56-1(a), (b) | G |
| 1,1-Dichloroethane | DCH | 36 | 0 | С | 111 | Α | Yes | 1 | No | G |
| 2,2'-Dichloroethyl ether | DEE | 41 | 0 | D | Н | Α | Yes | 1 | ,55-1(f) | G |
| Dichloromethane | DCM | 36 | 0 | NA | III | Α | Yes | 5 | No | G |

^{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.



04-Jun-13

Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HBC 305 Official #: 1245344

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Shipyard: Conrad Shipyard

| Cargo Identificati | Conditions of Carriage | | | | | | | | | | |
|---|------------------------|----------------------|----------------|-------|--------------|---------------|-------------------|-----------------|---|-----------------|--|
| | | | | | | | Vapor R | | | | |
| Name | Chem Code | Compat Group No | Sub Chapter | Grade | Hull Type | Tank Group | App'd (Y or N) | VCS Category | Special Requirements in 46 CFR 151 General and Mat'ls of | Insp. Period | |
| 1,1-Dichloropropane | DPB | 36 | 0 | С | Ш | Α | Yes | 3 | No | G | |
| 1,2-Dichloropropane | DPP | 36 | 0 | С | 111 | Α | Yes | 3 | No | G | |
| 1,3-Dichloropropane | DPC | 36 | 0 | C | Ш | Α | Yes | 3 | No | G | |
| 1,3-Dichloropropene | DPU | 15 | 0 | D | Ш | Α | Yes | 4 | No | G | |
| Dichloropropene, Dichloropropane mixtures | DMX | 15 | 0 | С | - 11 | Α | Yes | 1 | No | G | |
| Diethanolamine | DEA | 8 | 0 | Е | Ш | Α | Yes | 1 | .55-1(c) | G | |
| Diethylamine | DEN | 7 | 0 | С | 111 | Α | Yes | 3 | .55-1(c) | G | |
| Diethylenetriamine | DET | 7 ² | 0 | E | 111 | Α | Yes | 1 | "55-1(c) | G | |
| Diisobutylamine | DBU | 7 | 0 | D | Ш | Α | Yes | 3 | ,55-1(c) | G | |
| Diisopropanolamine | DIP | 8 | 0 | Е | III | Α | Yes | 1 | .55-1(c) | G | |
| Diisopropylamine | DíA | 7 | 0 | С | Ш | Α | Yes | 3 | .55-1(c) | G | |
| N,N-Dimethylacetamide | DAC | 10 | 0 | E | Ш | Α | Yes | 3 | ,56-1(b) | G | |
| Dimethylformamide | DMF | 10 | 0 | D | Ш | Α | Yes | 1 | 55-1(e) | G | |
| Di-n-propylamine | DNA | 7 | 0 | C | Н | Α | Yes | 3 | .55-1(c) | G | |
| Dodecyldimethylamine, Tetradecyldimethylamine mixture | DOT | 7 | 0 | E | 111 | A | No | N/A | 56-1(b) | G | |
| Dodecyl diphenyl ether disulfonate solution | DOS | 43 | 0 | # | II. | A | No | N/A | No | G | |
| EE Glycol Ether Mixture | EEG | 40 | 0 | D | 111 | A | No | N/A | No | G | |
| Ethanolamine | MEA | 8 | 0 | E | III | A | Yes | 1 | .55-1(c) | G | |
| Ethyl acrylate | EAC | 14 | 0 | c | 111 | A | Yes | 2 | 50-70(a), 50-81(a), (b) | G | |
| | EAN | 7 | 0 | A | 11 | A | No | N/A | .55-1(b) | G | |
| Ethylamine solution (72% or less) | EBA | 7 | 0 | | 111 | A | Yes | 3 | ,55-1(b) | G | |
| N-Ethylbutylamine | ECC | 7 | 0 | D | 111 | | Yes | 1 | ,55-1(b) | G | |
| N-Ethylcyclohexylamine | | | 0 | E | | A | | 1 | No | G | |
| Ethylene cyanohydrin | ETC | 20 7 ² | | | - 111 | A | Yes | | ,55-1(c) | G | |
| Ethylenediamine | EDA | - | 0 | D | <u> III</u> | Α . | Yes | 1 | No | G | |
| Ethylene dichloride | EDC | 36 ² | 0 | C | | A | Yes | 1 | No | G | |
| Ethylene glycol hexyl ether | EGH | 40 | 0 | E | III | Α . | No | N/A | | - G | |
| Ethylene glycol monoalkyl ethers | EGC | 40 | 0 | D/E | III | Α | Yes | 11 | No | | |
| Ethylene glycol propyl ether | EGP | 40 | 0 | E | 111 | Α | Yes | 1 | No | G | |
| 2-Ethylhexyl acrylate | EAI | 14 | 0 | E | 111 | Α | Yes | 2 | .50-70(a), .50-81(a), (b) | G | |
| Ethyl methacrylate | ETM | 14 | 0 | D/E | 111 | A | Yes | 2 | 50-70(a) | G | |
| 2-Ethyl-3-propylacrolein | EPA | 19 ² | 0 | Е | 111 | Α | Yes | 1 | No | G | |
| Formaldehyde solution (37% to 50%) | FMS | 19 ² | 0 | D/E | III | Α | Yes | 1 | .55-1(h) | G | |
| Furfural | FFA | 19 | 0 | D | Ш | Α | Yes | 1 | .55-1(h) | G | |
| Glutaraldehyde solution (50% or less) | GTA | 19 | 0 | NA | Ш | Α | No | N/A | No | G | |
| Hexamethylenediamine solution | HMC | 7 | 0 | E | III | Α | Yes | 1 | ,55-1(c) | G | |
| Hydrocarbon 5-9 | HFN | | 0 | С | Ш | Α | Yes | 1 | .50-70(a), .50-81(a), (b) | G | |
| Isoprene | IPR | 30 | 0 | Α | 111 | Α | No | N/A | .50-70(a), .50-81(a), (b) | G | |
| Isoprene, Pentadiene mixture | IPN | | 0 | В | Ш | Α | No | N/A | .50-70(a), .55-1(c) | G | |
| Mesityl oxide | MSO | 18 ² | 0 | D | 111 | Α | Yes | 1 | No | G | |
| Methyl acrylate | MAM | 14 | 0 | С | Ш | Α | Yes | 2 | .50-70(a), .50-81(a), (b) | G | |
| Methylcyclopentadiene dimer | MCK | 30 | 0 | С | III | Α | Yes | 1 | No | G | |
| 2-Methyl-5-ethylpyridine | MEP | 9 | 0 | E | III | Α | Yes | 1 | .55-1(e) | G | |
| Methyl methacrylate | MMM | 14 | 0 | С | III | 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 | 111 | Α | Yes | 2 | .50-70(a), .50-81(a), (b) | G | |
| Morpholine | MPL | 7 ² | 0 | D | III | Α | Yes | 1 | .55-1(c) | G | |
| | | | | _ | | | | | | | |
| Nitroethane | NTE | 42 | 0 | D | Ш | Α | No | N/A | .50-81, .56-1(b) | G | |



Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HBC 305 Official #: 1245344

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Shipyard: Conrad Shipyard

| Cargo Identification | | (| Condi | tions of Carriage | | | | | | |
|---|--------------|--------------------|----------------|-------------------|--------------|---------------|------------------------------|----------------------------|---|-----------------|
| Name | Chem Code | Compat Group No | Sub Chapter | Grade | Hull Type | Tank Group | Vapor R App'd (Y or N) | ecovery VCS Category | Special Requirements in 46 CFR 151 General and Mat'ls of | Insp. Period |
| 1,3-Pentadiene | PDE | 30 | 0 | Α | III | Α | No | N/A | "50-70(a), "50-81 | G |
| Polyethylene polyamines | PEB | 7 2 | 0 | Е | | Α | Yes | 1 | .55-1(e) | G |
| iso-Propanolamine | MPA | 8 | 0 | Е | 101 | Α | Yes | 1 | .55-1(c) | G |
| iso-Propylamine | IPP | 7 | 0 | Α | П | Α | Yes | 5 | .55-1(c) | G |
| Pyridine | PRD | 9 | 0 | С | Ш | Α | Yes | 1 | .55-1(e) | G |
| Sodium chlorate solution (50% or less) | SDD | 0 1,2 | 0 | NA | 111 | Α | No | N/A | .50-73 | G |
| Sodium hypochlorite solution (20% or less) | SHQ | 5 | 0 | NA | Ш | Α | No | N/A | .50-73, .56-1(a), (b) | G |
| Sodium sulfide, hydrosulfide solution (H2S 15 ppm or less) | SSH | 0 1,2 | 0 | NA | Ш | Α | Yes | 1 | .50-73, .55-1(b) | G |
| Sodium sulfide, hydrosulfide solution (H2S greater than 15 ppm but less than 200 ppm) | SSI | 0 1,2 | 0 | NA | Ш | Α | No | N/A | "50-73, "55-1(b) | G |
| Sodium sulfide, hydrosulfide solution (H2S greater than 200 ppm) | SSJ | 0 1,2 | 0 | NA | II | Α | No | N/A | 50-73, 55-1(b) | G |
| Styrene (crude) | STX | | 0 | D | Ш | Α | Yes | 2 | No | G |
| Styrene monomer | STY | 30 | 0 | D | 111 | Α | Yes | 2 | 50-70(a), 50-81(a), (b) | G |
| Tetraethylenepentamine | TTP | 7 | 0 | E | III | Α | Yes | 1 | .55-1(c) | G |
| Tetrahydrofuran | THF | 41 | 0 | С | III | Α | Yes | 1 | .50-70(b) | G |
| o-Toluidine | TLI | 9 | 0 | Е | II | Α | Yes | 3 | .50-5, .50-73 | G |
| 1,2,4-Trichlorobenzene | тсв | 36 | 0 | Е | Ш | Α | Yes | 1 | No | G |
| 1,1,2-Trichloroethane | тсм | 36 | 0 | NA | 111 | A | Yes | 1 | .50-73, .56-1(a) | G |
| Trichloroethylene | TCL | 36 ² | 0 | NA | III | Α | Yes | 1 | No | G |
| 1,2,3-Trichloropropane | TCN | 36 | 0 | E | II | A | Yes | 3 | .50-73, .56-1(a) | G |
| Triethanolamine | TEA | 8 ² | 0 | E | III | Α | Yes | 1 | "55-1(b) | G |
| Triethylamine | TEN | 7 | 0 | С | II | Α | Yes | 3 | .55-1(e) | G |
| Triethylenetetramine | TET | 7 2 | 0 | E | Ш | Α | Yes | 1 | .55-1(b) | G |
| Urea, Ammonium nitrate solution (containing more than 2% NH3) | UAS | 6 | 0 | NA | Ш | Α | No | N/A | .56-1(b) | G |
| Vinyl acetate | VAM | 13 | 0 | С | III | A | Yes | 2 | .50-70(a), .50-81(a), (b) | G |
| Vinyl neodecanate | VND | 13 | 0 | E | III | Α | No | N/A | .50-70(a), .50-81(a), (b) | G |
| Subchapter D Cargoes Authorized for Vapor Contro | al. | | | | _ | | | | | |
| Acetone | ACT | 18 ² | D | С | | A | Yes | 1 | | |
| Acetophenone | ACP | 18 | D | E | | A | Yes | 1 | | |
| Alcohol(C12-C16) poly(1-6)ethoxylates | APU | 20 | D | Ē | | A | Yes | 1 | | |
| | AEB | 20 | D | E | | A | Yes | 1 | | |
| Alcohol(C6-C17)(secondary) poly(7-12)ethoxylates | AEC | 34 | D | D | | A | Yes | 1 . | | - |
| Amyl cleahel (ice and account of the country) | AAI | 20 | D | D | | A | Yes | 1 | | |
| Amyl alcohol (iso-, n-, sec-, primary) | | | | | | | | 1 | | |
| Benzyl alcohol Brake fluid base mixtures (containing Poly(2-8)alkylene(C2-C3) glycols, Polyalkylene(C2-C10) glycol monoalkyl(C1-C4) ethers, and their borate esters) | BAL BFX | 21 20 | D D | E E | | A | Yes Yes | 1 | | |
| Butyl acetate (all isomers) | BAX | 34 | D | D | | Α | Yes | 1 | | |
| Butyl alcohol (iso-) | 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 | | D | С | | Α | Yes | 1 | | |
| | BPH | 34 | D | E | | A | Yes | 1 | | |
| Butyl benzyl phthalate | | | | | | | | | | |
| | BUE | 32 | D | D | | Α | Yes | 1 | | |
| Butyl toluene | BUE | 32 | D | | | A A | | | | |
| Butyl toluene Caprolactam solutions | BUE | | D D | D E C | | Α | Yes | 1 | | |
| Butyl toluene | BUE | 32 22 | D | E | | | | | | |



04-Jun-13

Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HBC 305 Official #: 1245344

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Shipyard: Conrad Shipyard

| Cargo Identification | | | Condi | tions of Carriage | | | | | | |
|--|--------------|--------------------|----------------|-------------------|--------------|---------------|-------------------|-----------------|---|-----------------|
| | | | | | | | | Recovery | | |
| Name | Chem Code | Compat Group No | Sub Chapter | Grade | Hull Type | Tank Group | App'd (Y or N) | VCS Category | Special Requirements in 46 CFR 151 General and Mat'ls of | Insp. Period |
| p-Cymene | CMP | 32 | D | D | | Α | Yes | 1 | | |
| iso-Decaldehyde | IDA | 19 | D | Е | | Α | Yes | 1 | | |
| n-Decaldehyde | DAL | 19 | D | Е | | 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 | E | | Α | Yes | 1 | | |
| Diacetone alcohol | DAA | 20 ² | D | D | | Α | Yes | 1 | | |
| ortho-Dibutyl phthalate | DPA | 34 | D | Ε | | Α | Yes | 1 | | |
| Diethylbenzene | DEB | 32 | D | D | | Α | Yes | 1 | | |
| Diethylene glycol | DEG | 40 ² | D | E | | 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 | Ε | | Α | Yes | 1 | | |
| Dimethyl phthalate | DTL | 34 | D | Е | | Α | Yes | 1 | | |
| Dioctyl phthalate | DOP | 34 | D | Ę | | Α | Yes | 1 | | |
| Dipentene | DPN | 30 | D | D | | Α | Yes | 1 | | |
| Diphenyl | DIL | 32 | D | D/E | | Α | Yes | 1 | | |
| Diphenyl, Diphenyl ether mixtures | DDO | 33 | D | E | | Α | Yes | 1 | | |
| Diphenyl ether | DPE | 41 | D | {E} | | Α | Yes | 1 | | |
| Dipropylene glycol | DPG | 40 | D | E, | | Α | Yes | 1 | | |
| Distillates: Flashed feed stocks | DFF | 33 | D | E | | Α | Yes | 1 | | |
| Distillates: Straight run | DSR | 33 | D | Е | | Α | Yes | 1 | | |
| Dodecene (all isomers) | DOZ | 30 | D | D | | Α | Yes | 1 | | |
| Dodecylbenzene, see Alkyl(C9+)benzenes | DDB | 32 | D | Е | | Α | Yes | 1 | | |
| 2-Ethoxyethyl acetate | EEA | 34 | D | D | | Α | Yes | 1 | | |
| Ethoxy triglycol (crude) | ETG | 40 | D | E | | Α | Yes | 1 | | |
| Ethyl acetate | ETA | 34 | D | С | | Α | Yes | 1 | | |
| Ethyl acetoacetate | EAA | 34 | D | E | | Α | Yes | 1 | | |
| Ethyl alcohol | EAL | 20 ² | D | С | | Α | Yes | 1 | | |
| Ethylbenzene | ETB | 32 | D | С | | Α | Yes | 1 | | |
| Ethyl butanol | EBT | 20 | D | D | | Α | Yes | 1 | | |
| Ethyl tert-butyl ether | EBE | 41 | D | С | | Α | Yes | 1 | | |
| Ethyl butyrate | EBR | 34 | D | D | | Α | Yes | 1 | | |
| Ethyl cyclohexane | ECY | 31 | D | D | | Α | Yes | . 1 | | |
| Ethylene glycol | EGL | 20 ² | D | E | | Α | Yes | 1 | | |
| Ethylene glycol butyl ether acetate | EMA | 34 | D | Е | | Α | Yes | 1 | | |
| Ethylene glycol diacetate | EGY | 34 | D | E | | Α | Yes | 1 | | |
| Ethylene glycol phenyl ether | EPE | 40 | D | E | | Α | Yes | 1 | | |
| Ethyl-3-ethoxypropionate | EEP | 34 | D | D | | Α | Yes | 1 | | |
| 2-Ethylhexanol | EHX | 20 | D | E | - | A | Yes | 1 | | |
| Ethyl propionate | EPR | 34 | D | С | | A | Yes | 1 | | |
| Ethyl toluene | ETE | 32 | D | D | | A | Yes | 1 | | |
| Formamide | FAM | 10 | D | E | | A | Yes | 1 | | |
| Furfuryl alcohol | FAL | 20 2 | D | E | | A | Yes | 1 | | |
| Gasoline blending stocks: Alkylates | GAK | 33 | D | A/C | | A | Yes | • | | |
| Gasoline blending stocks: Reformates | GRF | 33 | D | A/C | | A | Yes | 1 | | |
| Gasolines: Automotive (containing not over 4.23 grams lead per | GAT | 33 | D | C | | Ā | Yes | 1 | | |
| gasolines: Automotive (containing not over 4,23 grams lead per gallon) | GAI | 55 | D | U | | ^ | 108 | ' | | |



Serial #: C1-1301876 Dated: 04-Jun-13

Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HBC 305 Official #: 1245344

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Shipyard: Conrad Shipyard

| Cargo Identificati | on | | | | | | | Condi | tions of Carriage | |
|---|--------------|--------------------|----------------|-------|--------------|---------------|------------------------------|-----------------------------|---|-----------------|
| Name | Chem Code | Compat Group No | Sub Chapter | Grade | Hull Type | Tank Group | Vapor I App'd (Y or N) | Recovery VCS Category | Special Requirements in 46 CFR 151 General and Mat'ls of | Insp. Period |
| Gasolines: Aviation (containing not over 4,86 grams of lead per | GAV | 33 | D | С | - 1 | A | Yes | 1 | | |
| gallon) | O, (V | | | | | | | | | |
| Gasolines: Casinghead (natural) | GCS | 33 | D | A/C | | Α | Yes | 1 | | |
| Gasolines: Polymer | GPL | 33 | D | A/C | | Α | Yes | 11 | | |
| Gasolines: Straight run | GSR | 33 | D | A/C | | Α | Yes | 1 | | |
| Glycerine | GCR | 20 ² | D | Е | | Α | Yes | 1 | | |
| Heptane (all isomers), see Alkanes (C6-C9) (all isomers) | НМХ | 31 | D | С | | Α | Yes | 1 | | |
| Heptanoic acid | HEP | 4 | D | E | | Α | Yes | 1 | | |
| Heptanol (all isomers) | HTX | 20 | D | D/E | | Α | Yes | 1 | | |
| Heptene (all isomers) | HPX | 30 | D | С | | Α | Yes | 2 | | |
| Heptyl acetate | HPE | 34 | D | E | | Α | Yes | 1 | | |
| Hexane (all isomers), see Alkanes (C6-C9) | HXS | 31 ² | D | B/C | | Α | Yes | 1 | | |
| Hexanoic acid | нхо | 4 | D | Ε | | Α | Yes | 1 | | |
| Hexanol | HXN | 20 | D | D | | Α | Yes | 1 | | |
| Hexene (all isomers) | HEX | 30 | D | С | | Α | Yes | 2 | W | |
| Hexylene glycol | HXG | 20 | D | E | | Α | Yes | 1 | | |
| Isophorone | IPH | 18 ² | D | E | | Α | Yes | 1 | | |
| Jet fuel: JP-4 | JPF | 33 | D | Ε | | Α | Yes | 1 | | |
| Jet fuel: JP-5 (kerosene, heavy) | JPV | 33 | D | D | | A | Yes | 1 | | |
| Kerosene | KRS | 33 | D | D | | A | Yes | 1 | | - |
| Methyl acetate | MTT | 34 | D | D | | A | Yes | 1 | | |
| Methyl alcohol | MAL | 20 ² | D | c | | A | Yes | 1 | | |
| Methylamyl acetate | MAC | 34 | D | D | | A | Yes | 1 | | |
| Methylamyl alcohol | MAA | 20 | D | D | | A | Yes | 1 | | |
| Methyl amyl ketone | MAK | 18 | D | D | | A | Yes | 1 | | |
| Methyl tert-butyl ether | MBE | 41 2 | D | C | | A | Yes | 1 | | |
| Methyl butyl ketone | MBK | 18 | D | c | | A | Yes | 1 | V-11/2-12-1-1 | - |
| Methyl butyrate | MBU | 34 | D | C | | A | Yes | i | | |
| Methyl ethyl ketone | MEK | 18 ² | D | c | | A | Yes | 1 | | |
| | MHK | 18 | D | D | | A | Yes | 1 | | |
| Methyl isohutul ketone | MIK | 18 ² | D | C | | A | Yes | 1 | | |
| Methyl pophthelese (melton) | MNA | 32 | D | E | | A | Yes | 1 | | |
| Methyl naphthalene (molten) | | | | | | | | | | |
| Mineral spirits | MNS | 33 | D | D | | Α | Yes | 1 | | |
| Myrcene | MRE | 30 | D | D | | A | Yes | 1 | | |
| Naphtha: Heavy | NAG | 33 | D | # | | A . | Yes | 1 | | |
| Naphtha: Petroleum | PTN | 33 | D | # | | A | 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 | | |
| Nonyl alcohol (all isomers) | NNS | 20 ² | D | É | | Α | Yes | 1 | | |
| Nonyl phenol | NNP | 21 | D | E | | Α | Yes | 11 | | |
| Nonyl phenol poly(4+)ethoxylates | NPE | 40 | D | E | | Α | Yes | 1 | | |
| Octane (all isomers), see Alkanes (C6-C9) | OAX | 31 | D | С | | Α | Yes | 1 | | |
| Octanoic acid (all isomers) | OAY | 4 | D | E | | Α | Yes | 1 | | |
| Octanol (all isomers) | OCX | 20 ² | D | E | | Α | Yes | 1 | | |
| Octene (all isomers) | OTX | 30 | D | С | | Α | Yes | 2 | | |



04-Jun-13

Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HBC 305 Official #: 1245344

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Shipyard: Conrad Shipyard

| Cargo Identifica | Conditions of Carriage | | | | | | | | | |
|---|------------------------|--------------------|----------------|-------|--------------|---------------|------------------------------|-----------------------------|---|-----------------|
| Name | Chem Code | Compat Group No | Sub Chapler | Grade | Hull Type | Tank Group | Vapor l App'd (Y or N) | Recovery VCS Category | Special Requirements in 46 CFR 151 General and Mat'ls of | Insp. Period |
| Oil, fuel: No. 2 | OTW | 33 | D | D/E | | Α | Yes | 1 | | |
| Oil, fuel: No. 2-D | OTD | 33 | D | D | | Α | Yes | 1 | | |
| Oil, fuel: No. 4 | OFR | 33 | D | D/E | | Α | Yes | 1 | | |
| Oil, fuel: No. 5 | OFV | 33 | D | D/E | | Α | Yes | 1 | | |
| Oil, fuel: No. 6 | osx | 33 | D | Ε | | Α | Yes | 1 | | |
| Oil, misc: Crude | OIL | 33 | D | C/D | | Α | Yes | 1 | | |
| Oil, misc: Diesel | ODS | 33 | D | D/E | | Α | Yes | 1 | | |
| Oil, misc: Gas, high pour | OGP | 33 | D | Е | | Α | Yes | 1 | | |
| Oil, misc: Lubricating | OLB | 33 | D | Е | | Α | Yes | 1 | | |
| Oil, misc: Residual | ORL | 33 | D | E | | Α | Yes | 1 | | |
| Oil, misc: Turbine | ОТВ | 33 | D | Е | | Α | Yes | 1 | | |
| Pentane (all isomers) | PTY | 31 | D | Α | | Α | Yes | 5 | | |
| Pentene (all isomers) | PTX | 30 | D | Α | | Α | Yes | 5 | | |
| n-Pentyl propionate | PPE | 34 | D | D | | Α | Yes | 1 | | |
| alpha-Pinene | PIO | 30 | D | D | | Α | Yes | 1 | | |
| beta-Pinene | PIP | 30 | D | D | | Α | Yes | 1 | | |
| Poly(2-8)alkylene glycol monoalkyl(C1-C6) ether | PAG | 40 | D | E | | A | Yes | 1 | | |
| Poly(2-8)alkylene glycol monoalkyl(C1-C6) ether acetate | PAF | 34 | D | Е | | Α | Yes | 1 | | |
| Polybutene | PLB | 30 | D | E | | Α | Yes | 1 | | |
| Polypropylene glycol | PGC | 40 | D | E | | Α | Yes | 1 | | - |
| iso-Propyl acetate | IAC | 34 | D | С | | Α | Yes | 1 | | |
| n-Propyl acetate | PAT | 34 | D | С | | Α | Yes | 1 | | |
| iso-Propyl alcohol | IPA | 20 ² | D | С | | A | Yes | 1 | | |
| n-Propyl alcohol | PAL | 20 ² | D | C | | Α | Yes | 1 | 14.17 | |
| Propylbenzene (all isomers) | PBY | 32 | D | D | | A | Yes | 1 | | |
| iso-Propylcyclohexane | IPX | 31 | D | D | | A | Yes | 1 | | |
| Propylene glycol | PPG | 20 2 | D | E | | A | Yes | 1 | | |
| Propylene glycol methyl ether acetate | PGN | 34 | D | D | | A | Yes | 1 | | |
| Propylene tetramer | PTT | 30 | D | D | | A | Yes | 1 | | |
| Sulfolane | SFL | 39 | D | E | | A | Yes | 1 | | |
| Tetraethylene glycol | TTG | 40 | D | E | | A | Yes | 1 | | |
| Tetrahydronaphthalene | THN | 32 | D | E | | A | Yes | 1 | | |
| Toluene | TOL | 32 | | C | | A | Yes | 1 | | |
| Tricresyl phosphate (less than 1% of the ortho isomer) | TCP | 34 | D | E | | A | Yes | 1 | | |
| Triethylbenzene | TEB | 32 | D | Ē | | | Yes | 1 | | - |
| Triethylene glycol | TEG | 40 | D | E | | A | Yes | 1 | | |
| Triethyl phosphate | TPS | 34 | D | E | | A | Yes | 1 | | |
| | TRE | 32 | D | | | A | Yes | 1 | | |
| Trimethylbenzene (all isomers) | | | | {D} | | | | | | |
| Trixylenyl phosphate | TRP | 34 | D | E DE | | A | Yes | 1 | | |
| Undecene | UDC | 30 | D | D/E | | A | Yes | 1 | | |
| 1-Undecyl alcohol | UND | 20 | D | E | | Α | Yes | | | |
| Xylenes (ortho-, meta-, para-) | XLX | 32 | D | D | | Α | Yes | 1 | | |



04-Jun-13



Certificate of Inspection

Cargo Authority Attachment

Vessel Name: HBC 305 Official #: 1245344

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Shipyard: Conrad Shipya

Hull #: C-1031

Explanation of terms & symbols used in the Table:

Cargo Identification

The proper shipping name as listed in 46 CFR Table 30.25-1, 46 CFR Table 151.05, and 46 CFR Part 153 Table 2

Chem Code

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,

Compatability Group No.

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.

Note 1

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-

Note 2 0001. Telephone (202) 372-1425.

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

Subchapter Subchapter D Subchapter O Note 3

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,

Grade

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 that grade of cargo.

A, B, C D, E

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

Note 4

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.

Hull Type

NA

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.

Conditions of Carriage

Tank Group Vapor Recovery Approved (Y or N) 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

Conditions of Carriage

Tank Group Vapor Recover Approved (Y or N) The vessel's tank 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,

VCS Category:

The specified cargo's provisional classification for vapor control systems.

Category 1

(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, 33 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.

Category 2

(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

Category 3

(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.

Category 4

(Polymerizes and highly toxic) Must comply with requirements of Categories 1, 2 and 3.

Category 5

(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 1 cargoes. Consult the Marine Safety Center's VCS Guidelines for further information. This requirement is in addition to the requirements of Category 1.

Category 6 Category 7

(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.

none

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