order to load the receiving vessel to a deeper draft.

Vapor balancing means the transfer of vapor displaced by incoming cargo from the tank of a vessel receiving cargo into a tank of the vessel or facility delivering cargo via a vapor collection system.

Vapor collection system means an arrangement of piping and hoses used to collect vapor emitted from a vessel's cargo tanks and to transport the vapor to a vapor processing unit.

Vapor control system means an arrangement of piping and equipment used to control vapor emissions collected from a vessel. It includes the vapor collection system and vapor processing unit.

Vapor processing unit means the components of a vapor control system that recovers, destroys, or disperses vapor collected from a vessel.

Vessel vapor connection means the point in a vessel's fixed vapor collection system where it connects with the vapor collection hose or arm.

§ 39.10–5 Incorporation by reference—TB/ALL.

(a) Certain materials are incorporated by reference into this part with the approval of the Director of the Federal Register in accordance with 5 U.S.C. 552(a). To enforce any edition other than the one listed in paragraph (b) of this section, notice of change must be published in the FEDERAL REGISTER and the material made available to the public. All approved material is on file at the U.S. Coast Guard, Office of Operating and Environmental Standards (G-MSO), 2100 Second Street, SW., Washington, DC 20593–0001, or at the National Archives and Records Administration (NARA). For information on the availability of this material at NARA, call 202–741–6030, or go to: *http://www.archives.gov/federal_register/code_of_federal_regulations/ibr_locations.html.* All material is available from the sources indicated in paragraph (b) of this section.

(b) The material approved for incorporation by reference in this part, and the sections affected are:

American Petroleum Institute (API), 1220 L Street NW., Washington, DC 20005
- API Standard 2000, Venting Atmospheric and Low-Pressure Storage Tanks (Nonrefrigerated and Refrigerated), Third Edition, January 1982 (reaffirmed December 1987) 39.20–11

American National Standards Institute (ANSI), 11 West 42nd Street, New York, NY 10036
- ANSI B16.5, Steel Pipe Flanges and Flanged Fittings, 1981 ..... 39.20–1

American Society for Testing and Materials (ASTM), 100 Barr Harbor Drive, West Conshohocken, PA 19428–2959
- ASTM F 1271–90 (1995)—Standard Specification for Spill Valves for Use in Marine Tank Liquid Overpressure Protection Applications 39.20–9

International Electrotechnical Commission (IEC), Bureau Central de la Commission Electrotechnique Internationale, 1 rue de Varembé, Geneva, Switzerland
- IEC 309–1—Plugs, Socket-Outlets and Couplers for Industrial Purposes: Part 1, General Requirements, 1979 ..... 39.20–9
- IEC 309–2—Plugs, Socket-Outlets and Couplers for Industrial Purposes: Part 2, Dimensional Interchangeability Requirements for Pin and Contact-tube Accessories, 1981 ..... 39.20–9

National Electrical Manufacturers Association (NEMA), 2101 L St. NW., Washington, DC 20036
- ANSI/NEMA WD6—Wiring Devices, Dimensional Requirements, 1988 ..... 39.20–9

National Fire Protection Association (NFPA), 1 Batterymarch Park, Quincy, MA 02269
- NFPA 70—National Electrical Code, 1987 ..... 39.20–9

Oil Companies International Marine Forum (OCIMF), 15th Floor, 96 Victoria Street, London SWIE 5JW, England
- International Safety Guide for Oil Tankers and Terminals, Third Edition, 1988 39.30–1

[CGD 88–102, 55 FR 25446, June 21, 1990, as amended by CGD 95–072, 60 FR 50462, Sept. 29, 1995; CGD 96–041, 61 FR 50727, Sept. 27, 1996; CGD 97–057, 62 FR 51043, Sept. 30, 1997; USCG–1999–5151, 64 FR 67177, Dec. 1, 1999]

§ 39.10–9 Vessel vapor processing unit—TB/ALL.

Each vessel which has a vapor processing unit located on board must meet

the requirements of 33 CFR part 154, subpart E to the satisfaction of the Commandant (G-MSO) in addition to complying with the requirements of this part.

[CGD 88–102, 55 FR 25446, June 21, 1990, as amended by CGD 95–072, 60 FR 50462, Sept. 29, 1995; CGD 96–041, 61 FR 50727, Sept. 27, 1996]

§ 39.10–11 Personnel training—TB/ALL.

(a) A person in charge of a transfer operation utilizing a vapor collection system must have completed a training program covering the particular system installed on the vessel. Training must include drills or demonstrations using the installed vapor control system covering normal operations and emergency procedures.

(b) The training program required by paragraph (a) of this section must cover the following subjects:

(1) Purpose of a vapor control system;

(2) Principles of the vapor control system;

(3) Components of the vapor control system;

(4) Hazards associated with the vapor control system;

(5) Coast Guard regulations in this part;

(6) Operating procedures, including:

(i) Testing and inspection requirements,

(ii) Pre-transfer procedures,

(iii) Connection sequence,

(iv) Start-up procedures, and

(v) Normal operations; and

(7) Emergency procedures.

[CGD 88–102, 55 FR 25446, June 21, 1990; 55 FR 39270, Sept. 26, 1990]

§ 39.10–13 Submission of vapor control system designs—TB/ALL.

(a) Plans, calculations, and specifications for a new vessel vapor collection system must be submitted to the Marine Safety Center for approval prior to installation.

(b) An existing vapor collection system installation that has been Coast Guard approved to transfer cargo vapor to specific facilities must be reviewed and approved by the Marine Safety Center prior to transferring vapors to other facilities.

(c) The owners/operators of a foreign flag vessel may submit certification by the classification society which classes the vessel that the vessel meets the requirements of this part as an alternative to meeting the requirements in paragraph (a) of this section.

(d) Upon satisfactory completion of plan review and inspection of the vapor collection system or receipt of the certification provided for in paragraph (c) of this section, the Officer in Charge, Marine Inspection, shall endorse the Certificate of Inspection for U.S. flag vessels, or the Certificate of Compliance for foreign flag vessels, that the vessel is acceptable for collecting the vapor from crude oil, gasoline blends, and benzene, or any other vapor it is found acceptable to collect.

[CGD 88–102, 55 FR 25446, June 21, 1990, as amended by CGD 95–028, 62 FR 51200, Sept. 30, 1997; USCG–2004–18884, 69 FR 58345, Sept. 30, 2004]

Subpart 39.20—Design and Equipment

§ 39.20–1 Vapor collection system—TB/ALL.

(a) Each vapor collection system must meet the following requirements:

(1) Except as allowed by paragraph (a)(3) of this section or the Commandant (G-MSO), vapor collection piping must be permanently installed, with the vessel's vapor connection located as close as practical to the loading manifold;

(2) If the vessel collects vapors from incompatible cargoes simultaneously, it must keep the incompatible vapors separate throughout the entire vapor collection system;

(3) A vessel certified to carry cargo listed in Table 151.05 of part 151 or Table 1 of part 153 of this chapter may have vapor connections located in the vicinity of each tank in order to preserve segregation of cargo systems, in lieu of common header piping;

(4) A means must be provided to eliminate liquid condensate which may collect in the system, such as draining and collecting liquid from each low point in the line;

(5) Vapor collection piping must be electrically bonded to the hull and must be electrically continuous; and