The MODERATOR



Training Resources and Information for the Nuclear Industry

Vol. 9, No. 4 September 2011

Hazardous Materials Regulations; Compatibility With the IAEA Regulations

On Friday, **August 12, 2011** (76 FR 50332), Pipeline and Hazardous Materials Safety Administration (PHMSA) issued a Notice of Proposed Rulemaking (NPRM) in coordination with the Nuclear Regulatory Commission (NRC) to harmonize requirements of the Hazardous Material Regulations (HMR) with the current international standards (International Atomic Energy Agency's (IAEA) TS-R-1, 2009 Edition) for the transport of Class 7 radioactive materials. It also updates, clarifies, and corrects certain regulatory requirements for transport of Class 7 materials.

The NPRM explains, bullet by bullet, what specific sections of the HMR will be changed and exactly how they propose the new regulations will be worded. Some of the notable amendments include:

- § 173.25(a)(4) -adopt marking all overpacks of Class 7 packages with the word "OVERPACK." § 173.401 -clarify that non-radioactive solid objects with radioactive substances on their surfaces not exceeding the levels cited in the definition of contamination are not subject to Subpart I of Part 173.
- § 173.403, -define the criticality safety index (CSI) for each conveyance to be the sum of the CSIs of all the packages in that conveyance.
- § 173.410(i)(3) -require that packages containing liquid radioactive material transported by air be capable of withstanding, without leakage, an internal pressure which produces a pressure differential of not less than maximum normal operating pressure plus 95 kPa.
- §§ 173.411 and 173.412 -specify that the testing of Types IP-2, IP-3 and Type A packages shall not result in "more than a 20% increase in the maximum radiation level at any external surface of the package."

PHMSA is also proposing additional changes which include:

§§ 172.203 and 172.403 - clarify that the activity shown on shipping papers and labels should be the total maximum activity of all the radioactive contents during transport.

§ 172.310(b) -eliminate an inconsistency with the "Type A" marking requirements for Type A packages.

§ 172.504 - revise Table 1 to additionally require conveyances carrying fissile material packages, unpackaged LSA-I or SCO-I, all conveyances required by §§ 173.427 and 173.441 to operate under exclusive use conditions, and all closed vehicles used in accordance with § 173.443(d) to be placarded.

§§ 173.411(c) and 173.415(a) -extend the retention period for Type IP-2 , Type IP-3 and Type A package documentation from one year to two years after the offeror's latest shipment.

- § 173.422 -permit an excepted package of radioactive material that is also a hazardous substance or hazardous waste to be shipped without having to comply with §§ 172.202(a)(6), 172.203(d) or 172.204(c)(4) and require that packages containing hazardous substances be marked with the letters "RQ."
- § 173.427(a)(6)(vi) -require that shipments of low specific activity (LSA) materials or surface contaminated objects (SCO) that contain a subsidiary hazard from another hazard class be labeled for the subsidiary hazard.

To see the proposed rulemaking go to: www.gpo.gov/fdsys/pkg/FR-2011-08-
12/pdf/2011-19872.pdf

Comments on the NPRM must be received by November 10, 2011 in order to be considered.

New Rulings in the Federal Register

On August 15, 2011 (76 FR 50500), the U.S. Nuclear Regulatory Commission (NRC) published a request for comments on the draft policy statement on volume reduction and low-level radioactive waste management. The NRC is proposing to revise its 1981 Policy Statement on Low-Level Waste (LLW) Volume Reduction. The purpose of the revised statement is to recognize that progress in reducing waste volume has been achieved since the 1981 Policy Statement was published and to acknowledge that factors other than volume reduction may be used by licensees to determine how best to manage their LLW. Electronic copies available ADAMS: are in http://www.nrc.gov/reading-rm/adams.html SECY-10-0043 or go to http://www.regulations.gov and search for documents filed under Docket ID NRC-2011-0183. Comments on the draft Policy Statement should be submitted by September 14, 2011.

On August 18, 2011 (76 FR 51324), the Pipeline and Hazardous Materials Safety Administration (PHMSA) published а notice of proposed rulemaking (NPRM) amending the Hazardous Materials Regulations (HMR) to incorporate seven (7) rail transport special permits that authorize tank car transportation operations not specifically permitted under the HMR. This rulemaking also proposes to respond to two petitions for rulemaking. P-1497 concerning the use of electronic shipping and P-1567 papers, concerning the removal of the Association of American Railroad's (AAR's) AAR-600 portable tank program for previously adopted standards that meet or exceed the AAR- 600 requirements. Written comments should be submitted on or before October 17, 2011.



On July 20, 2011 (76 FR 43510), the PHMSA published a final ruling amending the HMR to make many miscellaneous changes and updates. Some noteworthy changes that were adopted from the September 29, 2010 NPRM: Add a requirement for each applicant to a special permit under §§ 107.105, 107.107, and 107.109 to identify their role as a shipper (offeror), carrier, or both; revise the definition of "person" to include those who manufacture, test, repair, and recondition packages (see § 171.8); revise § 171.14 transitional provisions to remove expired transitional provisions and incorporate the current transitional provisions into their specific sections of the HMR; and many more. This final rule was effective on August 19, 2011.

§ 171.14 [Removed and Reserved]

■ 8. Section 171.14 is removed and reserved.

The shipping description sequences in effect on December 31, 2006. may be used until January 1, 2013.

§ 172.202 Description of hazardous material on shipping papers.

(b) Except as provided in this subpart, the basic description specified in paragraphs (a)(1), (2), (3), and (4) of this section must be shown in sequence with no additional information interspersed. For example, "UN2744, Cyclobutyl chloroformate, 6.1, (8, 3), PG II." The shipping description sequences in effect on December 31, 2006, may be used until January 1, 2013.



New Rulings in the Federal Register Cont'd

On **June 27, 2011** (76 FR 37283), the PHMSA published a final ruling amending the HMR by removing saccharin "1,2-Benzisothiazol-3(2H)-one, 1,1-dioxide" and its salts from the list of hazardous substances and reportable quantities. The Comprehensive Environmental Response, Compensation and Liability Act require PHMSA to list and regulate all hazardous substances designated by statute or by the U.S. Environmental Protection Agency (EPA). EPA recently removed saccharin and its salts from their list of hazardous substances through notice and comment rulemaking. This final rule was effective on June 27, 2011.

TABLE 1 TO APPENDIX A—HAZARDOUS SUBSTANCES OTHER THAN RADIONUCLIDES—Continued

Hazardous substance	Reportable quantity (RQ) pounds (kilograms)
Saccharin & salts	100 (45.4)
1,2-Benzisothiazol-3(2H)-one, 1,1-dioxide, & salts	100 (45.4)

On **June 22, 2011** (76 FR 36363 & 36480), the Environmental Protection Agency (EPA) published both a NPRM and direct final ruling to change the Resource Conservation and Recovery Act (RCRA) hazardous waste manifest regulations to allow red ink, as well as other distinct colors, or other methods to distinguish the copy distribution notations from the rest of the printed form and data entries are permissible. This change would afford authorized manifest form printers greater flexibility in complying with the federal printing specifications. This final rule was effective on August 22, 2011.

§ 262.21 Manifest tracking numbers, manifest printing, and obtaining manifests.

(f) ** *

(4) The manifest and continuation sheet must be printed in black ink that can be legibly photocopied, scanned, or faxed, except that the marginal words indicating copy distribution must be printed with a distinct ink color or with another method (e.g., white text against black background in text box, or, black text against grey background in text box) that clearly distinguishes the copy distribution notations from the other text and data entries on the form.

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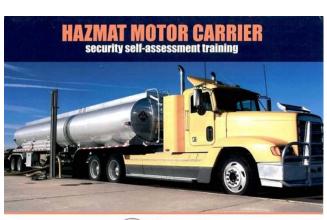
NRC List of Governor Designees Update

The U.S. Nuclear Regulatory Commission (NRC) typically publishes in the Federal Register annually on or about June 30 the names, addresses and telephone numbers of those individuals in each State who are responsible for receiving information on nuclear waste shipments that require advance notification Governors or their designees by NRC licensees prior to transportation of certain shipments of nuclear waste and spent fuel. This list is delayed and is expected to be published in September in the Federal Register. The current State contact information can also be accessed throughout the at http://nrcyear stp.ornl.gov/special/designee .pdf.

New Training Available

Suspect / Counterfeit / Fraudulent / Substandard Item Detection Training Workshops are now available and will introduce the participant to the growing counterfeit issue through hands-on training with actual hardware parts and materials and are geared towards every type of employee within your organization - maintenance master crafts persons, purchasing agents, engineers, procurement engineers, building inspectors, material handlers, quality assurance personnel, warehouse persons, job planners, clerical, credit purchaser. vendors/suppliers management. Three workshops are available for specific audiences and designed for flexibility to your training needs. For more information, please visit: www.energysolutions.com/uploads/ Documents/CFSI(2).pdf or

<u>Documents/CFSI(2).pdf</u> or contact: Roger Moerman, Project Manager, Counterfeit/ Fraudulent Training, Energy Solutions Quality Division, <u>rdmoerman@energysolutions.com</u>, 509-528-6771











Hazardous Material Security Awareness Training

The Transportation Security Administration (TSA) has recently published two comprehensive training programs to help shippers and motor carriers meet the security awareness requirements in 49 CFR. The Security Self-Assessment Training CD focuses regulations. security on the threats. assessments, actions and reporting procedures. The Security Action Item (SAI) Training contains both a CD and DVD that focuses on the 23 SAIs developed by the U.S. Department of Transportation (DOT) to enhance transportation security. Visit the TSA website: www.tsa.gov/what we do/ tsnm/highway/ for ordering and more information.

Two New Classes at Convenient Locations

- Transportation of Limited Quantities and Consumer Commodities by Air, Highway, and Vessel
- Transport of Lithium Batteries by Air/Highway

February 8 – 9, 2012 - **SAN DIEGO, CA** February 22 – 23, 2012 - **LAS VEGAS, NV** March 14 – 15, 2012 - **TAMPA, FL** April 18 - 19, 2012 - **ATLANTA, GA** May 16 - 17, 2012 - **SEATTLE, WA** June 27 - 28, 2012 - **CHICAGO, IL**

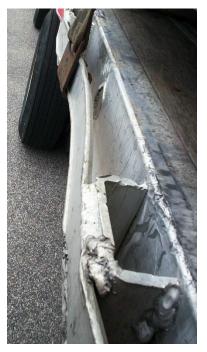
To register for these courses, please contact: Jennifer Keszler, (509) 375-9507 or Email: jkeszler@energysolutions.com

Recent Industry Issues



Wow, . . . where do we begin with this picture? This is not staged or a made-up training aid, but a real incoming shipment. Will a personal cooler pass the Type A package test requirements? (See 49 CFR 173.465 & 178.350) Can we mix and match manufacturer marking requirements in 49 CFR 178.350: "USA DOT 7A Type A"? The activity should be in what units? (49 CFR 172.403) Can the Transport Index (TI) by definition ever be "0.0"? (49 CFR 173.403) As a side note, please use up all your old Cargo Aircraft Only labels by December 31, 2012.

We found these 3 versions of the spontaneously combustible division 4.2 label in our training aids. Which one is correct? First, does the red portion belong on top or the bottom? (See 49 CFR 172.422) Second, must the hazard class be displayed in the bottom part of the label? [49 CFR 172.402(b) & 172.407(c)(3)] Once again, who will be responsible if the wrong label is applied to a package? Please verify every package communication to the specifications listed in the regulations.



Considering load securement, what is wrong here? Is this trailer rub rail a rated anchor point? Will the current condition of the rub rail change your answer? (See 49 CFR 393.104 for the prohibition on the use of damaged devices) Is the tiedown hooked in a fashion that will prevent from unfastening during transportation? [49 CFR 393.104(f)(3)] Would a chain around the stake pocket be a better option?





The MODERATOR is the official Training Services Newsletter for Energy Solutions
This newsletter can also be viewed on our web site at www.energysolutionstraining.com



2012 Training Class Schedule is Now Available

Thank you for your input. We now have our training class schedule for 2012. Based on your input, we have moved our 3-Day DOT/NRC Advanced Radioactive Waste Transportation and Disposal Refresher classes to cities near our disposal and processing facilities. The **Salt Lake City, Utah** class will include a tour of our *Clive disposal facilities*; the **Aiken, South Carolina** class will include a tour of our *Barnwell facilities*; and the **Oak Ridge, Tennessee** class will include a tour of our *Bear Creek processing facilities*. What a great opportunity to combine your DOT/NRC training and meet the people at the facilities you ship

to at Energy Solutions.



Clive

Bear Creek







Barnwell



New Web Address for EnergySolutions Training

We are excited to let you know we are in the process of changing our training homepage to a full service fun and user-friendly interactive place. This site is still under construction, but you can get a preview now and bookmark us at: http://energysolutionstraining.com/