



## Course 201

**Length:** 2 days

**Target:** Initial training for persons responsible for, or involved in, the preparation of and actual operation of hazardous materials packaging and transportation. This includes, but is not limited to, materials handlers, technicians (operators, health physicists, analysts, etc.), QA/QC personnel, safety engineers, front-line management, and shippers. This workshop is also ideal for those who require retraining or those who wish to continue on in one of RRI's advanced shipper courses.

**Prerequisite:** None

**Intensity:**     \_\_\_ Mild            X Medium           \_\_\_ Challenging           \_\_\_ Extreme

**Materials:** RRI provides all training materials including the latest 49 CFR 100-180. Testing and course completion certificate are also provided.

### Objectives & Topics:

#### Module 1: General Awareness / Familiarization

*Define the purpose, scope and applicability of the Hazardous Materials Regulations (HMR).*

1. State personal responsibility in complying with the HMR.
2. Recognize personal liability for failure to comply with the HMR.
3. Describe the training requirements DOT has in place for hazmat employees.
4. Recognize other hazardous materials transport compliance requirements beyond DOT.
5. Define when a hazardous material is subject to the HMR.
6. Recognize the general layout of the HMR.

#### Module 2: Identification of Hazardous Materials

*Explain how DOT classifies and identifies hazardous materials.*

1. Identify the eleven DOT hazard classes and applicable divisions
2. Recognize the hazard classes that are divided into divisions.
3. Define the columns in the Hazardous Materials Table (HMT).
4. List the three Packing Groups and their corresponding level of danger.
5. Locate and apply the requirements for a given Special Provision.
6. Locate from the HMT those materials meeting the definition of a Poison-Inhalation Hazard.
7. Recognize the order of determination for selection of a Proper Shipping Name (PSN).
8. Identify PSNs that are acceptable for transport.
9. Identify primary hazard classes/divisions for multiple/mixed hazardous materials.
10. Define the requirements for determination of a reportable quantity (RQ) of a hazardous substance.



## Course 201

### Module 3: Packaging Operations

*Identify the types of packagings authorized by the HMR and the conditions that are acceptable for shipment.*

1. Define the terms associated with hazardous materials packaging and packages.
2. Identify the applicable packaging references from the HMT.
3. Recognize the UN Packaging Certification Code.
4. Recognize unacceptable transport package situations/conditions.

### Module 4: Package Markings

*Identify the proper markings required on a given package of hazardous material.*

1. Identify the acceptable methods for marking hazmat packages.
2. Recognize the markings considered to be “basic markings” for non-bulk hazmat packages.
3. Identify additional markings which may be required on a given hazmat package.
4. Recognize when and how to apply the additional markings which may be required on hazmat packages.

### Module 5: Labeling of Packages

*Identify how and what DOT label(s) must be displayed on a given hazmat package.*

1. Select from the HMT the appropriate label(s) for a given non-bulk hazmat package.
2. Determine subsidiary labeling requirements, as applicable.
3. Identify the proper location for display of a label(s) on a non-bulk hazmat package.
4. Recognize authorized labeling exceptions.

### Module 6: Shipping Papers

*Identify the entries necessary for a complete DOT hazardous materials shipping paper.*

1. Recognize the components comprising the “Basic Description”.
2. List the sequence options for the components of the Basic Description.
3. Identify additional description entries and when they are required.
4. Define the applicability of the emergency response telephone number.
5. Identify the basic requirements needed to fulfill the emergency response information requirement.
6. Recognize a given package from the hazmat description.
7. State the minimum retention time for shipping papers.

### Module 7: Vehicle Placarding

*Explain the process to determine the specific vehicle placarding requirements.*

1. Recognize the situations excepted from placarding requirements.
2. Define the difference between the two placarding tables.
3. Select the appropriate placards for the given hazmat conveyance.
4. State prohibited and permissive placarding situations.
5. Select the appropriate locations for placard placement and placard display configuration.



## Course 201

### Module 8: Vehicle Loading by Highway

*Explain the requirements for properly loading hazmat in vehicles and storage incidental thereto.*

1. Define the requirements concerning load securement.
2. Identify those hazmats which may be loaded, transported, or stored without restriction.
3. Identify those hazmats which cannot be transported on the same transport vehicle.
4. Identify those hazmats which cannot be loaded above or adjacent to other hazmats.
5. Recognize when the subsidiary hazard affects the separation and segregation of a hazmat.
6. Explain the limitations for transporting cyanides with acids, and Class 8 liquids with Division 4.2 material.

### Module 9: Special and Unique Moves

*Identify the requirements for certain hazmats and packaging situations encountered in transport.*

1. Define "empty packaging" per the HMR.
2. Identify the shipping requirements placed on empty hazmat packages.
3. Recognize the difference between the terms overpack and salvage drum.
4. State the requirements for the use of a salvage drum.
5. State the requirements for the configuration of an overpack.
6. Explain the requirements for the use of the small quantity exception.
7. Recognize the HMR requirements for packaging and transport of a sample.
8. Identify specific regulatory requirements for the packaging and transport of PCBs.
9. Identify the requirements for the Materials of Trade exception.
10. Recognize the DOT HMR hazard communication retention requirements in OSHA.

### Module 10: Safety & Security

*Explain the requirements for emergency response notification and reporting and security requirements imposed by the HMR.*

1. Select appropriate actions for a given hazmat spill or leak as defined in the Emergency Response Guidebook (ERG).
2. Recognize the basic hazards associated with a given DOT hazard class or division.
3. Identify the actions to be taken to ensure proper hazmat incident reporting to the DOT and National Response Center.
4. Recognize your personal responsibility with regard to hazmat transport incidents.
5. Recognize the minimum requirements for DOT hazmat security.
6. Identify the components of a Security Plan.
7. State the requirements of a Security Plan.
8. State the security training required for a given hazmat employee.