

Date 8/27/2019

Dear Mr. Heffner,

The Portland & Western Railroad (PNWR) is providing you with the following information in accordance with the requirements set for in regulation 49 CFR 174.312 HHFT information sharing notification for emergency response planning

**General Information**

- The PNWR operates HHFT’s through following states and counties:

Commodities & Counties	ALCOHOLS, N.O.S
<i>Oregon Counties</i>	
Multnomah	X
Columbia	X

- Based on current traffic volumes and projected traffic levels we anticipate the number of trains that will travel through these counties each week to be as follows:

Commodity	Trains per Week
ETHANOL	0-1
ALCOHOLS, N.O.S	0-1

- The anticipated route of these trains is:

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HHFT's on the PNWR railroad begin operation in Willbridge, OR (approximate latitude/longitude is 45.5563, -122.7329) and ends in Port Westward, OR (approximate latitude/longitude is 46.1780, -123.1712).

Commodities & Counties	ALCOHOLS, N.O.S
Oregon Counties	
Multnomah	X
Columbia	X

- The different commodities transported in HHFT's are described as follows:

Commodity	
ETHANOL	UN1170 (4910240)
ALCOHOLS, N.O.S	UN1987 (4909152)



Ethanol.pdf



Denatured Alcohol.pdf

**PNWR Emergency Response Plan**

The following outlines relevant portions of the PNWR emergency response plan, including preliminary first aid measures and immediate methods of response to all hazards including but not limited to fires and HAZMAT/Chemical spills. The risk of fire or explosion of this commodity has been deemed to be high.

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## **INITIAL ACTIONS – ALL HAZARDS**

### **Safety – Protection of Life and Prevention of Injuries**

The primary concern of the initial person arriving at the site of a train accident/incident must be safety. The FIRST priority is always the protection of life, and the prevention of injuries. Railroad employees must always cooperate and work closely with federal, state and local emergency response groups to achieve this goal. Once personnel are rescued and evacuated, and a perimeter has been secured, there is no need to rush into a scene and risk lives unnecessarily. In many cases, it is prudent to wait until expert assistance arrives before attempting to mitigate the situation. All response personnel must use an acceptable level of personal protective equipment (PPE) based on the chemical or physical properties of the hazards present.

If fire threatens a rail car, all personnel should be withdrawn until expert assistance arrives to assess whether or not it is safe to fight the fire.

**REMEMBER: It is of critical importance to thoroughly understand the chemical and its properties before taking corrective action.**

Any person working on or near railroads must adhere to the Railroad Workplace Safety regulations as covered under 49 CFR 214, *Railroad Workplace Safety*. The purpose of the regulation is to prevent accidents and casualties to employees involved in certain railroad inspection, maintenance and construction activities. The regulation prescribes a minimum Federal safety standard for the railroad workplace safety program, but each railroad or railroad contractor may adopt or enforce additional or more stringent requirements. All employees and contractors must ensure their personnel are trained to the most stringent standard and should consult with the specific railroad before commencing work.

All applicable safety rules, including AGR safety rules, must be followed at all times.

### **Initial Notifications – Train Crew**

The *Train Crew* should begin making the initial notifications to the **Train Dispatcher** and emergency services (9-1-1) as soon as possible.

### ***Railroad Emergency Coordinator* and Train Dispatch Initial Actions**

The *Train Dispatcher* should have already started the process of calling emergency services (if necessary) as soon as first reports of incident are received. The ***Railroad Emergency Coordinator***

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will make an early evaluation of the emergency with information supplied by the ***Train Dispatcher*** and will verify what response personnel are needed.

### **Train Dispatcher Actions**

- Ensure that all personnel are accounted for and isolated from danger
- Arrange for emergency services for any injured personnel
- Notify Federal, State and Local Agencies
- Notify Shipper's Emergency Response System when necessary
- Notify all railroad response personnel - *This process can be given to a railroad manager to complete*
- Notify Heavy Equipment and Emergency Response contractors when called for by the ***Railroad Emergency Coordinator***

### **Railroad Emergency Coordinator Actions**

- Ensure the safety of employees and the public
- Consider both direct and indirect effects of any release
- Go to the scene to conduct an initial detailed survey
- Determine the identity, hazards and status of the cars and materials involved in the emergency
- Assess the possible hazards to human health or the environment
- Cooperate with local responder groups to take measures to ensure that release, fire, or explosions do not occur or spread to other hazardous material cars
- Determine Response Management Team requirement
- Ensure that contractors and on-site response groups will monitor for leaks, pressure buildups, gas generation, or cracks developing in rail cars
- Monitor cleanup efforts, and ensure that the recovered material or contaminated material is properly treated, stored, or disposed of in accordance with Corporate Environmental Policies & Guidelines, as well as applicable federal and state regulations.
- Ensure that cleanup procedures are completed.
- Conduct a follow-up detailed survey.

### **First On-Scene Personnel (fire, police, contractors, etc.)**

In the event of an incident, the following actions should be taken by those first on the scene, ***BUT ONLY IF SAFE TO DO SO:***

- **RESCUE THE INJURED:**

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Rescue the injured if possible, remove them to a safe area, and administer first aid. If there is any potential for smoke, fire, vapor clouds, or leakage of hazardous materials, protective clothing and appropriate respiratory protection must be worn.

All rescue operations should be conducted as quickly as possible from the upwind side. Always plan an escape route prior to entering the immediate area. Personnel should never be unnecessarily exposed to smoke, fire, vapor clouds, or leakage of hazardous materials, and lives should NEVER be risked to save property or the environment.

- **IMMEDIATE HAZARD IDENTIFICATION (if unknown):**

Before attempting any response actions, it is important to identify the materials involved and their associated hazards to avoid further injury or danger. This vital action is the first and most important aspect of conducting an initial survey of the scene.

The three primary means by which hazardous materials can be identified are:

**Shipping papers including waybills.**

- Shipping papers provide the best and most reliable source of identification of the materials involved. These are legal documents, which are in the custody of the Train Conductor, and are required to accompany all rail shipments. Those first on the scene of a train accident should locate the Train Conductor and examine the shipping papers prior to attempting to mitigate the incident. If unable to locate the Train Conductor or the Train Conductor is incapacitated, contact the *Train Dispatcher* to obtain the "Train Consist". This document contains a list of all cars in the train and the location of cars containing Hazardous Materials relative to the lead car.

**Placards and/or labels.**

- Placards may also be used to identify the presence of hazardous materials; however, it is extremely important to recognize the limitations of the placarding system. The required placard represents only the most severe hazard established by the Department of Transportation. It does not, however, indicate if the material has multiple hazards. For example, a chemical classified as a flammable liquid by its primary hazard is placarded flammable; however, that same chemical may also be extremely toxic by inhalation or skin absorption.

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- Placards alone should never be used to identify hazardous materials. Always refer to the Emergency Response Guidebook provided to the train crews, the AAR's Emergency Handling of Hazardous Materials in Surface Transportation book, or CHEMTREC.
- In addition, placards are frequently torn off or destroyed in accidents, and therefore may not be available as a source of identification. NEVER attempt to read a placard when fire is impinging on a car or a vapor cloud or odor is detected.

**Name of commodity stenciled on the car.**

- For intermodal tanks transporting any hazardous materials and for tank cars transporting certain hazardous materials, the commodity name must appear on two opposing sides of the intermodal tank or tank car. The commodity name must match the proper shipping name on the shipping papers and may include the technical name, although it is not specifically required.

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- **EVACUATE THREATENED PERSONNEL:**

If a large vapor cloud is observed, or there is fire involving a rail car, or rail car that contains hazardous materials, it may be necessary to evacuate personnel to a safe area, one-half mile or more, with consideration given to wind speed and direction. Information pertaining to evacuation distances can be found in the Emergency Response Guidebook (ERG). If there is not an ERG available, contact the Shipper's emergency contact. The number is located on the shipping papers. First responders, such as police and fire, will also be able to assist in determining a safe evacuation distance.

- **SECURE THE PERIMETER TO PREVENT UNAUTHORIZED ACCESS:**

Set up roadblocks on the perimeter to prevent all non-essential persons from entering a potentially dangerous environment. Personnel not directly involved with emergency response or rescue operations must be kept away from the hazard area.

- **CONDUCT AN INITIAL SURVEY OF THE SCENE:**

Facts concerning the incident should be gathered quickly and accurately and timely disseminated to all appropriate supervisory personnel. The purpose of the survey is to assess the conditions and hazards of the incident so that evacuation, safety procedures, mitigation activities, and cleanup can be planned.

Initial surveys, however, should NEVER risk human life. In some cases, the accident represents such an extreme hazard to life that the only safe course is to evacuate the area and protect the perimeter. When such conditions exist, initial surveys should be performed at safe distances, with binoculars or by aerial observation.

In situations where fire directly impinges on a rail car and there is a threat of the car rupturing violently, the initial survey should be performed from a distance of at least one-half mile and from the upwind side if possible. If highly radioactive materials or extremely toxic gases such as hydrocyanic acid are involved, only highly trained experts with proper protective equipment should survey the immediate area. An initial survey should determine the following information:

- Nature and extent of any injuries
- Public exposure potential (nearest population, etc.)
- Proximity of schools, waterways, etc. (see **Appendix E - Maps**)
- Number and position of engines and/or cars derailed
- Identity and properties of the materials involved
- Potential hazards
- Presence of fire, smoke or fumes

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- Disposition and overall condition of each rail car. Note structural damages, condition of valves, outer jacket torn, dents or gouges in inner rail etc.
  - Evidence of leakage (wetness on sides of cars, vapor clouds, odors, etc.)
  - Amount and rate of any leakage
  - Look for material pooling, seeping into ground or entering any waterways
  - Location of threatened waterways (streams, rivers, lakes, drainage ditches, culverts, sewers, etc.)
  - Prevailing weather conditions (wind direction and speed, rain, humidity, temperature, etc.)
  - Topography of and accessibility to the area
  - Needed remedial action (dams or dikes, absorbents needed, etc.)
  - Information obtained should be immediately provided to appropriate supervisory personnel, and the *Train Dispatcher*
- **WORK WITH LOCAL RESPONDERS TO HANDLE THE INCIDENT**

Establish on-site procedures to coordinate the incident, and provide consistent information to local authorities. Train crews must not turn over the train consist, unless it is requested by the appropriate authorities.

### **PNWR Emergency Response Plan – Fire Specific Information**

The following is to be made available to fire fighters and first responders who are called to the scene in the event of a fire. This information is to ensure that the fire fighters are informed and is for their consideration in aiding AGR in the case of an emergency.

#### **Introduction**

Water is the most common and generally most available fire extinguishing agent. Exercise caution in selecting a fire extinguishing method since there are many factors to be considered in an incident. Water may be ineffective in fighting fires involving some materials; its effectiveness depends greatly on the method of application. Fires involving a spill of flammable liquids are generally controlled by applying a fire fighting foam to the surface of the burning material. Fighting flammable liquid fires requires foam concentrate which is chemically compatible with the burning material, correct mixing of the foam concentrate with water and air, and careful

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application and maintenance of the foam blanket. There are two general types of fire-fighting foam: regular and alcohol-resistant.

Examples of regular foam are protein-base, fluoroprotein, and aqueous film forming foam (AFFF). Some flammable liquids, including many petroleum products, can be controlled by applying regular foam. Other flammable liquids, including polar solvents (flammable liquids which are water soluble) such as alcohols and ketones, have different chemical properties.

A fire involving these materials cannot be easily controlled with regular foam and requires application of alcohol-resistant foam. Polar-solvent fires may be difficult to control and require a higher foam application rate than other flammable liquid fires (see NFPA/ANSI Standards 11 and 11A for further information). Refer to the appropriate guide to determine which type of foam is recommended. Although it is impossible to make specific recommendations for flammable liquids which have subsidiary corrosive or toxic hazards, alcohol-resistant foam may be effective for many of these materials. The emergency response telephone number on the shipping document, or the appropriate emergency response agency, should be contacted as soon as possible for guidance on the proper fire extinguishing agent to use. The final selection of the agent and method depends on many factors such as incident location, exposure hazards, size of the fire, environmental concerns, as well as the availability of extinguishing agents and equipment at the scene.

Specific tactics are involved when combatting chemical fires. These tactics should only be attempted by qualified industrial firefighting personnel. Surgical application of foam and water is paramount in resolving the incident safely and quickly. Before any attempts are made at combatting the fire, all resources including water supplies and foam supplies, should be gathered at the site and used appropriately. An evaluation of each individual fire must be accomplished to decide if the incident should be allowed to continue to burn or needs to be extinguished. Each fire is evaluated on its own, and the decision to extinguish it or letting it continue to burn will depend on hazards, risk/benefit analysis, and environmental impact. These evaluations must only be performed by trained hazardous materials and firefighting personnel.

### **Flammable Liquid Properties – Flash Point / Boiling Point**

Flash Point Definition: the minimum temperature at which a liquid produces enough vapor to form an ignitable mixture in air.

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- USDOT:
  - Flammable Liquid = Liquids that have a flashpoint below 140 °F
  - Combustible Liquid = Liquids that have a flashpoint of 140 °F to 200 °F
- NFPA:
  - Flammable Liquid = Liquids that have a flashpoint below 100 °F
  - Combustible Liquid = Liquids that have a flashpoint above 100 °F

Boiling Point Definition: *the temperature at which the vapor pressure at the surface of the liquid is equal to or slightly greater than the atmospheric pressure. It's the point of maximum vapor production.*

### Packing Groups

Packing Groups represent the degree of danger the material poses during transportation.

**Table 4-4 - Class 3 Packing Groups**

Class 3 (Flammable) Packing Groups		
Packing Group	Flash Point	Initial Boiling Point
I		<= 35°C (95°F)
II	<23°C (73°F)	>35°C (95°F)
III	>23°C, <=60°C (140°F)	>35°C (95°F)

**Figure 4-4 - PG Key Physical Properties**

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Packing Group (PG) and Key Physical Properties of Common Flammable Materials							
	PG I Crude Oil*	PG II Crude Oil*	PG III Crude Oil*	Ethanol (PG II)	Gasoline (PG I or II)	Acetone (PG II)	LPG (Propane)
<b>Boiling Point</b>	<95 °F	>95 °F	>95 °F	174 °F	90 - 410 °F	132 °F	- 43 °F
<b>Flashpoint</b>	<73 °F	<73 °F	>73 to <140 °F	55 °F	-36 to -50 °F	- 4 °F	- 156 °F

\*No two shipments (even from same well head or mine) will have the exact same chemical and physical composition, flashpoints/boiling points and Packing Groups will vary.

### Vapor Density/Vapor Pressure

Vapor Density Definition: Weight of a unit volume of gas or vapor compared to the weight of an equal volume of air (air is assumed to have a value of 1).

- All Flammable Liquids have a Vapor Density Greater than 1 (air), meaning they will tend to accumulate in low areas
- As such vapors can accumulate in low/depressed areas
- Vapor accumulation will be affected by wind and topography

Vapor Pressure Definition: the pressure exerted by a vapor in thermodynamic equilibrium with its condensed phases (solid or liquid) at a given temperature in a closed system.

- A liquid with a high vapor pressure is considered to be volatile
- Vapor pressure is directly related to temperature; Increasing temperature = Increasing vapor pressure
- Light crude has a higher % of C1-C5 gases (i.e. methane, butane, ethane, propane, pentane) when compared to intermediate or heavy crudes which causes vapor pressures to be 10-12 psi range

### BLEVE VS Heat Induced Tear

#### Boiling Liquid Expanding Vapor Explosion (BLEVE)

BLEVEs can be caused by an external fire near the storage vessel causing heating of the contents and pressure build-up. While tanks are often designed to withstand great pressure, constant heating can cause the metal to weaken and eventually fail. If the tank is being heated in an area where there is no liquid, it may rupture faster without the liquid to absorb the heat. Gas

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containers are usually equipped with relief valves that vent off excess pressure, but the tank can still fail if the pressure is not released quickly enough. Relief valves are sized to release pressure fast enough to prevent the pressure from increasing beyond the strength of the vessel, but not so fast as to be the cause of an explosion. An appropriately sized relief valve will allow the liquid inside to boil slowly, maintaining a constant pressure in the vessel until all the liquid has boiled and the vessel empties.

If the substance involved is flammable, it is likely that the resulting cloud of the substance will ignite after the BLEVE has occurred, forming a fireball and possibly a fuel-air explosion, also termed a vapor cloud explosion (VCE). If the materials are toxic, a large area will be contaminated.

Heat Induced Tear – low pressure container, lower energy, limited overpressure

- Cause – Highly stressed metal (from heat/pressure) forms a “blister” then “pops”
- Heat induced tears will occur in the vapor space (top of the car) so the pressurized liquid will be directed up.

Heat induced tears are the most common found instances where a general service tank car has been involved in a pool fire such as derailments involving crude oil or ethanol..

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## FIRE INCIDENT OPERATIONS

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### Size up incident from a distance and collect information

- What is burning?
- What kind of railcars are burning?
- What color is the smoke?
- How long have the fires been burning?
- Are there pool fires?
- Pressure fires coming out of tank cars?
- Intermittent fires from pressure relief devices or continuous fire?
- What will be gained by an offensive approach?
- Risk vs Reward

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### Fire protection and prevention

When ever hydrocarbons or flammable chemicals are present in closed containers such as tank cars and terminals the potential exists for release of liquids and vapors. These vapors could mix with air in the flammable range and, if subjected to a source of ignition, cause an explosion or fire. Releases should be stopped from entering sewers and drainage systems. Small releases should be covered with dry earth and or absorbent materials , and larger releases with foam, to prevent vapors from escaping and mixing with air. Sources of ignition in areas when hydrocarbon vapors may be present should be eliminated or controlled. Portable fire extinguishers should be carried on service vehicles and located at accessible and strategic positions throughout the incident.

Telephone numbers of responsible persons and agencies to be notified in case of an emergency, should be posted at the facility and a means of communication provided. Local fire departments, emergency response, public safety and mutual aid organizations should also be aware of the procedures and familiar with the area and its hazards.

Hydrocarbon fires or chemical fires are controlled by one or a combination of methods, as follows:

- REMOVING FUEL - One of the best and easiest methods of controlling and extinguishing a hydrocarbon fire is to shut off the source of fuel by closing a valve, diverting product flow or, if a small amount of product is involved, controlling exposures while allowing the product to burn away. Foam may also be used to cover hydrocarbon spills to prevent vapors from being emitted and mixing with the air. Cars that can be accessed safely should be removed from the area.
- REMOVING OXYGEN - Another method is to shut off the supply of air or oxygen by smothering fires with foam or water fog, or by using carbon dioxide or nitrogen to displace air in enclosed spaces.
- COOLING - Water fog, mist or spray and carbon dioxide may be used to extinguish certain petroleum product fires by cooling the temperature of the fire below the product's ignition temperature and by stopping vapors from forming and mixing with air.

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- INTERRUPTING COMBUSTION - Chemicals such as dry powders and halon extinguish fires by interrupting the chemical reaction of the fire.

### **PNWR Emergency Response Plan – HAZMAT Spill Specific Information**

The following is to be made available to first responders and vendors who are called to the scene in the event of an oil spill. This information is to ensure that the vendors and responders are informed and is for their consideration in aiding AGR in the case of an emergency.

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#### **GENERAL HAZMAT/CHEMICAL RELEASE INFORMATION**

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Each HAZMAT/Chemical incident will be different, therefore, phases of the response will vary depending on the type of chemical, container, weather, geographic location, population, logistics, etc.

Timely notifications made by the **Train Crew, Train Dispatcher, and the *Railroad Emergency Coordinator*** are crucial for a safe and effective response. The **Train Dispatcher and/or Railroad Emergency Coordinator** need to contact first responders as soon as possible to begin the initial site assessment. Gathering accurate data as quickly as possible about the product(s) involved and the current situation is extremely important in HAZMAT/Chemical Release incidents.

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#### **HAZMAT/CHEMICAL RELEASE OPERATIONS**

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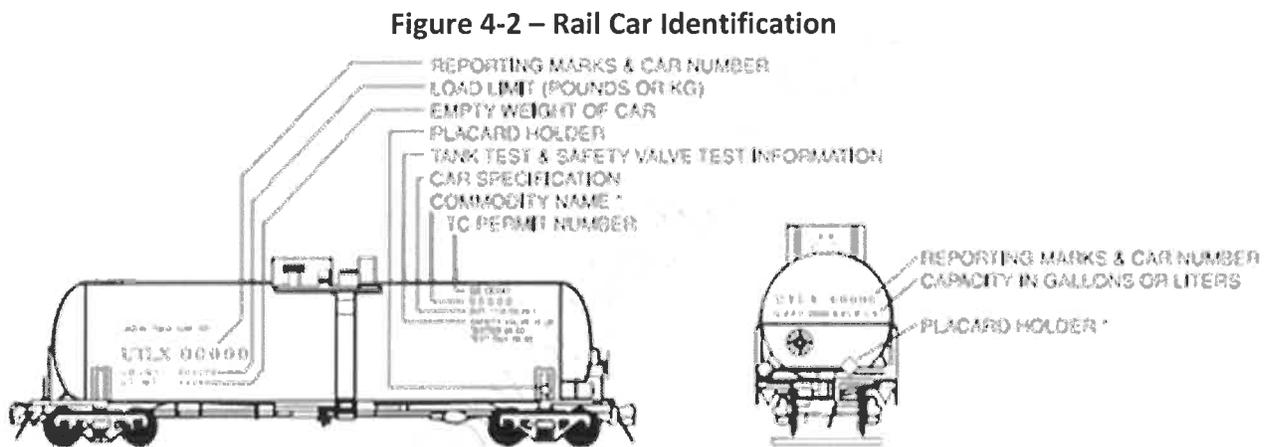
### **Hazard Identification**

Prior to entering an incident site, identification of the materials and containers involved is essential. Once the commodities have been positively identified, the emergency response information for the hazardous materials involved can be reviewed to assist in making good judgments and decisions in determining the initial response actions required. This section addresses how to recognize and identify hazardous materials, and how to use the information resources available.

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## Rail Car Identification

Every rail car has a unique initial and number painted on the top left-hand corner of each side of the car. Using the car's initials and number, shippers, carriers, and Alabama & Gulf Coast can determine the rail car's contents from shipping papers or computer data. Figure 4-2 is a graphic depiction of the location of the rail car initials and number on a rail car (reporting marks).



## Shipping Papers

The best way to identify hazardous materials present in a rail incident is to consult the shipping papers. For the Alabama & Gulf Coast Railway, the shipping papers are called the Waybill and/or Train Consist. The train crew is required to have a copy of all hazardous materials shipping papers in their possession. Generally, both the Waybill and Train Consist identify the contents of the car; and the Train Consist identifies where these cars are located numerically in the train. If either of these documents are not readily available from the train crew, they can be retrieved from the Alabama & Gulf Coast Railway **Train Dispatcher**.

## Train Consist

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The primary shipping paper used by Alabama & Gulf Coast Railway in railroad operations is the Train Consist. The Train Consist details each car in the train, beginning with the lead car. If hazardous materials are part of a car's load, the Train Consist also shows the contents of that car. For a hazardous materials car, the shipping description in the Train Consist contains the following:

- The car's placement (numerically counting from the front of the train);
- The initial and number of the car (a unique identifier);
- The loaded or unloaded status of the car;
- The name of the substance being carried, or last carried in the car;
- The hazard class, the United Nations/North American (UN/NA) ID number, and Packing Group Number, where applicable;
- A telephone number to call in case of emergency (i.e., CHEMTREC);
- The standard transportation commodity code for the substance carried; and
- The name and location for both the consignee and the shipper.

The Train Consist is kept by the train's conductor, who is responsible for adding and deleting cars from the document as cars are picked up or set off.

### **Waybill**

A Waybill is the shipping document for a single car. A Waybill will be made available to responders as required. When the train crew arrives the Train Consist should be reviewed for applicable hazardous material information.

### **Hazardous Material Special Handling Instructions.**

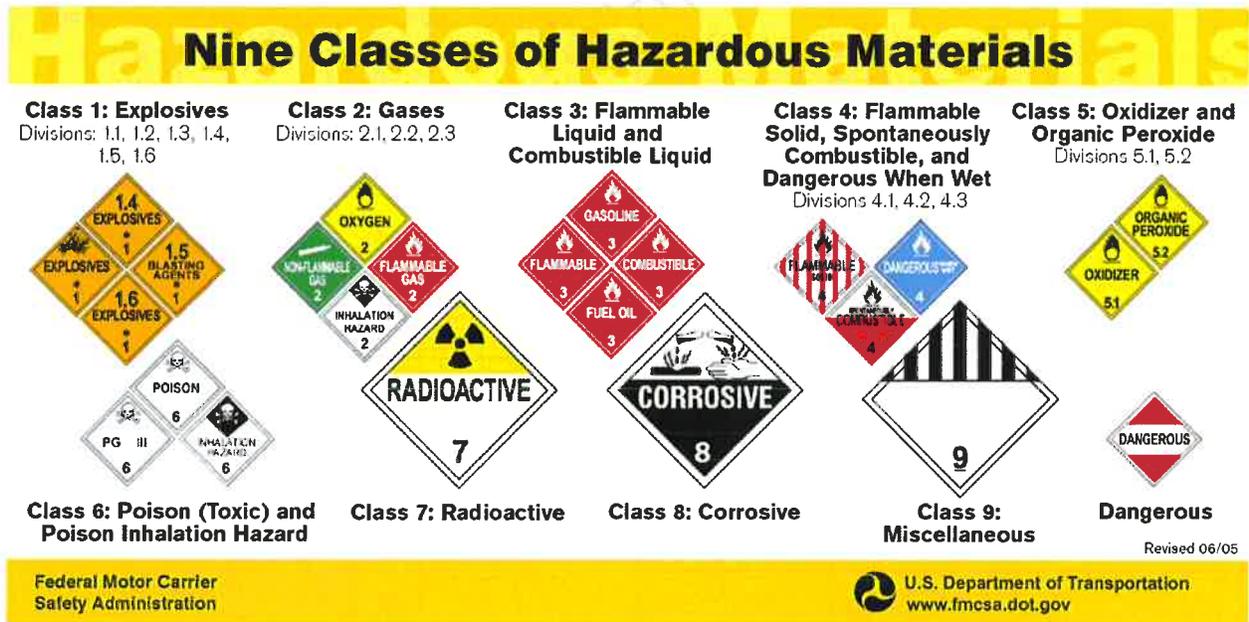
In addition to Waybills and Train Consist, the Train Crew is also required to have a copy of the emergency response information for all the hazardous materials contained in the train. Generally, in addition to the North American Emergency Response Guidebook, the crew will have commodity specific emergency response information printed out at the bottom of the Train Consist for each hazardous material in the train.

### **Placarding and Hazard Classes**

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The Code of Federal Regulations (CFR), 49 CFR Part 172, prescribes that diamond shaped placards must be placed on the outside of certain bulk container rail cars carrying hazardous materials, or residues of such materials. Placards must also be placed on the exterior of some intermodal containers carrying amounts of hazardous materials in excess of certain regulatory thresholds. Placards can tell the responder the DOT hazard class involved and thus provide a general idea of the hazards present and preliminary response requirements. Keep in mind that many materials possess characteristics of more than one hazard class, and therefore hazard class information should generally not be used independently. Please see Figure 4-3 and Table 4-2 for a listing and descriptions of the various DOT hazard classes.

**Figure 4-3**  
**Department of Transportation Hazard Classes**



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Table 4-2 - UN/DOT Hazard Class

UN/DOT Hazard Classes		
CLASS	DIVISION	DEFINITION
EXPLOSIVES	(1)	<p>1.1 Substances and articles, which have a mass explosion hazard</p> <p>1.2 Substances and articles, which have a projection hazard but not a mass explosion hazard</p> <p>1.3 Substances and articles that have a fire hazard and either minor blast hazard or both, but not a mass explosion hazard</p> <p>1.4-1.6 Other materials with explosive potential</p>
COMPRESSED GASES	(2)	<p>Flammable Gas 2.1 Gases which ignite and burn easily</p> <p>Non-Flammable Gas 2.2 Gases that may asphyxiate or can cause frostbite</p> <p>Poison (Toxic) Gas 2.3 Gases which are poisonous by inhalation (PIH)</p>

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		[Subdivided by Hazard Zones]
FLAMMABLE LIQUIDS	(3)	<p>Flammable Liquid 3 Liquids with flash points below 141 F</p> <p>Combustible Liquid 3 Liquids with flash points above 141 F</p>
FLAMMABLE SOLIDS	(4)	<p>Flammable Solids 4.1 Substances which are easily ignitable or burn readily</p> <p>Spontaneously Combustible 4.2 Substances that can self-ignite on exposure to air</p> <p>Dangerous When Wet 4.3 Substances that upon contact with water can either become spontaneously combustible, or can give off flammable or toxic gases</p>
OXIDIZERS	(5)	<p>Oxidizer 5.1 Substances that will react to support combustion even in the absence of air</p> <p>Organic Peroxide 5.2 Substances sensitive to heat, shock, and friction, or may decompose and self-ignite</p>

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POISONS	(6)	<p>Poison (Liquid or Solid) 6.1 Materials toxic enough to create a health hazard (other than zone A)</p> <p>Poison (Inhalation Hazard) 6.1 Poison liquids or solids, PIH, Hazard Zone A</p> <p>Keep Away Form Foodstuffs 6.1 Materials that give off dangerous or irritating fumes</p> <p>Infectious Substances 6.2 Infectious substances and regulated medical wastes</p>
RADIOACTIVE MATERIALS	(7)	Substances which emit ionizing radiation
CORROSIVE MATERIALS	(8)	Substances which corrode steel and damage tissue
MISCELLANEOUS HAZARDS	(9)	Hazardous substances that do not meet the definition of any other hazard class

**Shipping Containers**

Some information about the commodity being shipped may be available from the container type. For example, by determining whether a rail car is a pressure or non-pressure rail car, you may be able to determine if the tank contains compressed gases and possibly even unregulated materials. Additionally, stenciling on the car may actually describe the specific commodity contained in the car.

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