<u> Module 1 – Core Safety</u>

- 1. Introduction
 - Carry a positive attitude towards safety.
 - Explain the personal responsibility and accountability for safety.
 - Assess and mitigate potential hazards
- 2. Conduct an effective job briefing.
- 3. Yard Safety

• Explain the basic safety and rail industry standard precautions to be taken in a rail yard or customer tracks.

- Demonstrate a commitment to safe practices in everyday work.
- Use hand signals to stop a movement if required or necessary.
- 4. Handling Derails
 - Identify the type of derail.
 - Place the derail non-derailing position.
 - Place the derail in derailing position.
 - Communicate the position of the derail.
- 5. Track Protection
 - Explain the use of blue and Red Flags for protecting workers.
 - Properly use a Blue Flag.
 - Properly use a Red Flag.
 - Explain and comply with industry-standards and rules respecting protection.
- 6. Entrain and Detrain Stationary Equipment
 - Entrain stationary equipment safely and properly.
 - Detrain stationary equipment safely and properly.
- 7. Crossing Over Stationary Equipment

Module 2 – Freight Car Inspection

- 1. Introduction
 - Explain why freight car inspections are important.

• Identify, assess, and mitigate potential hazards associated with inspecting freight cars.

- 2. Reporting Defects
 - Identify the "B" end of a freight car.
 - Identify the right and left sides of a freight car.
 - Correctly number the wheels on a freight car.
 - Identify the components of a rail car.
 - Explain how to report a defect.
- 3. Freight Car Inspection Checklist
 - Perform a freight car inspection.
 - Correctly identify a defect.
 - Correctly report a defect.

Module 3 – Car Air Brakes

- 1. Components
 - Car Air Brake System
 - Brake Pipe and Angle Cocks
 - Branch Pipe and Combined Dirt Collector and Cut-out Cock
 - Control Valve
 - Two-Compartment Reservoir
 - Brake Cylinder
 - Retainer Valve
- 2. Operation
 - Control Valve Operation
 - Charging
 - Application
 - Control Valve Lap
 - Releasing and Recharging
- 3. Working with Car Air Brakes

Be aware of the potential hazards of working with car air brakes such as:

- Lack of Knowledge (components, operations)
- Defective Equipment (airbrake system, equipment design)
- Insufficient Air (charging of the system)
- Non-Compliance / Shortcuts / Ignoring Best Practices
- 4. Background Information

Understanding the relationship between air volume and pressure

Module 4 – Car Securement

1. Introduction

- Explain and follow the rules and policies that pertain to applying handbrakes.
- Identify, assess, and mitigate the potential hazards associated with securing equipment.

• Apply the correct number of handbrakes on any given cut of freight cars.

- 2. Vertical Wheel Hand Brake
 - Correctly apply a Vertical Wheel Geared Hand Brake.
 - Correctly release a Vertical Wheel Geared Hand Brake.
- 3. Car Braking Systems

Module 5 - Switching Operations

- 1. Safe Switching Operations
 - Switching procedures
 - Signalling and radio procedures
 - Safe switching practices
 - Practical onsite training
- 2. Locomotive or Rail Car Mover inspection
 - Pre-departure inspections
 - Brake tests
 - Inspection protocol
 - Maintenance
- 3. Locomotive or Rail Car Mover operations
 - Taking control of a locomotive
 - Locomotive securement
 - Radio procedures
 - Operating practices
 - Mechanical

Module 6 - Rail Car Mover (RCM) and Locomotive Inspection

- 1. Pre-Use Inspection of Locomotive or RCM
- 2. Air Brake Test of Locomotive or RCM
- 3. Locomotive and RCM Operation and Potential Hazards such as:
 - Weather
 - Grade
 - Type and Number of Car Equipment Handled
 - Experience
 - Familiarity with job site
 - Communication
 - Use of / and non-use of the air system
 - Housekeeping inside the cab

Module 7 – Locomotive Operation

- Properly releasing the handbrake fully
- Starting the Locomotive
- How to do a proper engine brake test before moving
- What do all the gauges mean?
- Moving a Locomotive
- Stopping a Locomotive
- Using the Automatic Brake Valve
- Using the Independent Brake Valve
- Recover from a Penalty Application
- Initiate and recover from an Emergency Application
- Safely Shutting down a Locomotive
- Protective devices inside the prime mover

We also can instruct on Train Handling Techniques and Distributed Power Operation and Configuration.