

Inspection and Maintenance of Switches and Derails

General Inspection & Maintenance of Switches and Derails



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Inspection and Maintenance of Switches and Derails

Riders Depend on Us



What do these three pictures all have in common?

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Inspection and Maintenance of Switches and Derails

Outline

- Identify hardware which needs to be tightened
- Demonstrate ability to tighten appropriate hardware
- Ensure all locks are in place and secure
- Identify areas/components which need to be lubricated on a regular PM schedule
- Inspect and maintain switch layout (where applicable)
- Describe purpose and components of mechanical locking
- Inspect and maintain lock rod
- Inspect and maintain throw rod

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Course 202: Inspection and Maintenance of Switches and Derails
Module 3: Generic Inspection of Switches and Derails

Inspection and Maintenance of Switches and Derails

Outline

- Inspect and maintain point detector rod
- Inspect and maintain switch circuit controller
- Inspect and maintain switch point heaters/snow melters (where applicable)
- Inspect and maintain moveable point frogs
- Demonstrate ability to perform point detector test
- Demonstrate ability to perform obstruction test
- Demonstrate ability to adjust point tension
- Inspect and maintain circuit control heaters (where applicable)
- Demonstrate ability to test electrical indication

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Inspection and Maintenance of Switches and Derails

Key Terms

Activity: In your course book, circle any key terms you feel you need to learn better.

Example:


- Front Rod

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Recall

Thinking back to previous knowledge or course work, what do you already know about general inspection and maintenance for switches and derails?

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Course 202: Inspection and Maintenance of Switches and Derails
 Module 3: Generic Inspection of Switches and Derails

Inspection and Maintenance of Switches and Derails


Overview

- Manual
- Electrical
- Electro-Pneumatic
- Electro-Hydraulic

Information in Module 3 applies to ALL (unless otherwise noted)



Always take appropriate actions to secure the work area before performing any inspections/maintenance. Always request time on the line. When performing inspection and maintenance that does not require throwing the switch: secure points, disconnect electricity and shut off appropriate valves. More information on this in Course 202 Module 1: Overview and Safety.


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Inspection and Maintenance of Switches and Derails

General Inspection & Maintenance


Sensory Inspection

- Walk length of layout inside and outside
- Inspect hardware
- Check for rust
- Inspect for items that would prevent smooth movement




Electro-Hydraulic Difference: do not inspect/maintain the following:

- Switch Keeper
- Track Braces
- Plates
- Stock Rail Spikes/Screw Spikes

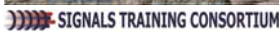
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Inspection and Maintenance of Switches and Derails

Sensory Inspection - Hardware



- Switch Mounting Bolt
- Switch Keeper
- Rail Plates
- Stock Rail Spikes
- Connection Point(s)
- Ground Wires
- Switch Heater
- Terminations
- Rail Braces
- Bonding

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