



WMSC Inspection Report 20250922A

ISSUED 9/24/25

Inspection Details

Title: Rail Traffic Controller Granting Exclusive Track Occupancy Protection

Location: (C09)- OPS 3, (D08)- OPS 2, (K04)- OPS 4, (C01)- OPS 2, (A08)- OPS 1, (G01)- OPS 2, (E04)- OPS 3, - OPS 1

Date of Inspection: 9/17/2025 through 9/22/2025

Time of Inspection: September 17, 2025, to September 22, 2025 (eight hours)

Unannounced

Risk-Based (Investigation)

Functional Area: Roadway Worker Protection, Operations

Hazard Rating: 1B

Overview

From September 17, 2025, through September 22, 2025, a WMSC Inspector spent approximately eight hours inspecting Metrorail radio rail traffic controllers using digital tools such as radio playback (radio operations channels 1–4) and Advanced Information Management System (AIMs)¹ playback. This inspection targeted nine instances of radio rail traffic controllers granting roadway work crews using exclusive track occupancy (ETO) protection.² ETO is a form of protection that is granted to roadway workers by the control center and is intended to ensure that a roadway work crew can safely perform maintenance without the risk of collision from other trains or on-track equipment.

This is a risk-based inspection based on a recent near miss that occurred on August 28, 2025, at Anacostia Station. That near miss is currently under investigation; however, based on preliminary

¹ The Advanced Information Management System (AIM) is the Supervisory Control and Data Acquisition (SCADA) system used by Metrorail's control center to manage all rail line traffic, traction power devices and station equipment by receiving information from the field, processing it, and displaying it on workstations and large projection screens on the floor of the control center. AIMs playback function enables the review of historical information to investigate.

² Exclusive Track Occupancy (ETO) is "a method of establishing working limits on controlled track in which the movement authority of trains and other equipment is withheld by the rail traffic controller or interlocking operator or restricted by flagman. The authority for movement of rail vehicles within the working limits rests solely with the RWIC of said limits." (Metrorail Operating Rulebook, Glossary of Terms.)



information from the August 28 event: a rail traffic controller granted exclusive track occupancy protection to a work crew without protecting the workers from train movement via red signals and prohibit exits. Subsequently, the rail traffic controller granted permission for a roadway maintenance machine to enter that same work area. The RMM nearly collided with the work crew but the work crew noticed the vehicle and were able to move out of the way. This safety event was reported to the WMSC as an O-23 (Improper Roadway Worker Protection) required by the [WMSC Program Standard](#), which defines in Section 7.C all reportable safety events in the Safety Event Notification Matrix. O-23 events automatically require a final investigation report. When complete, this report will be posted at WMSC.gov (Oversight > Investigation Reports).

In the interim, as a result of this near miss, the WMSC is conducting a series of risk-based inspections focusing on rail traffic controller granting exclusive track occupancy protection for purposes of roadway worker protection.

After concluding the inspection, the WMSC Inspector conducted a debrief with the control center's Metro 1, in accordance with Program Standard Section 6.F.1.

Defects and Corrective Actions

WMSC Inspections identify safety issues that may be classified as defects, findings, or recommendations. Findings and recommendations are defined by Program Standard Section 5.E.2 and 5.E.3 respectively. Ordinarily, issues identified in a WMSC inspection report are classified as defects. Defects are specific safety issues of non-conformance/non-compliance that are identified and that require remedial action.

This inspection did not identify any findings or recommendations and therefore does not require a WMSC Corrective Action Plan in accordance with Program Standard Section 5.E.4.

Defect Observations and Determinations

For this inspection, the WMSC Inspector relied on Advanced Information Management System (AIMS) playback, the AIMS event log, the General Orders/Tracking Rights System (GOTRS) records, and radio recordings to check compliance with MICC-ROC-PRO-14 Roadway Worker Protection: Exclusive Track Occupancy and MICC-ALL-PRO-24 Absolute Block/Permissive Block.



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The table below references all nine protection events that were inspected.

Date	Time	OPS/Location	Protected	Radio RTC Rules Compliance	Rule Violation
6/25/2025	12:58am	OPS 3- L'Enfant (F03)	Yes	No	MICC-ALL-PRO-24 Absolute Block/Permissive Block 6.8.2
6/25/2025	1:04am	OPS 3- Crystal City (C09)	Yes	Yes	None
7/11/2025	12:40am	OPS 2- Stadium Armory (D08)	Yes	No	MICC-ROC-PRO-14 6.1.9.2 Identify ETO limits
7/21/2025	1:11am	OPS 4- Ballston (K04)	Yes	No	MICC-ROC-PRO-14 6.1.9.2 Identify ETO limits
8/4/2025	12:34am	OPS 2- Metro Center (C01)	Yes	Yes	None
8/11/2025	12:37am	OPS 1- Friendship Heights (A08)	Yes	Yes	None
8/12/2025	12:51am	OPS 2- Benning Road (G01)	Yes	Yes	None
8/21/2025	1:22am	OPS 3- Columbia Heights (E04)	Yes	Yes	None
8/27/2025	1:25am	OPS 1- Wheaton (B10)	No	Yes	MICC-ROC-PRO-14 Exclusive Track Occupancy 6.1.8.1

Defect 1

During the review of audio, AIMs playback, and AIMs event log for the work zone setup on June 25, 2025 (Observation 1), the WMSC also identified an unrelated defect that the radio rail traffic controller granted an absolute block to a roadway maintenance machine from Waterfront Station (F04) to L'Enfant Plaza Station (F03) despite there being a red signal at 12:58am. The equipment operator of the RMM stopped and reported this red signal F03-34 to the radio rail traffic controller. The lunar signal was established before the radio rail traffic controller reissued the absolute block at 1:03am.

Thus, the radio rail traffic controller granted an RMM an absolute block without the signal being lunar in accordance with MICC-ALL-PRO-24 Absolute Block/Permissive Block 6.8.2. "The RTC shall use interlocking signals indicating a lunar of adjacent interlocking locations or stations in the direction of travel as the block's limits."

Hazard Rating: 1B



Defect 2

On July 11, 2025, at approximately 12:40am, a track work crew was granted permission to enter the roadway using exclusive track occupancy protection near Stadium Armory Station (D08). The work zone was properly protected (via red signals and prohibit exits), but the radio rail traffic controller did not use any location name or chain markers when granting permission.

Therefore, the rail traffic controller violated MICC-ROC-PRO-14, which states:

Roadway Worker Protection: Exclusive Track Occupancy 6.1.9: The Radio RTC must then contact the RWIC requesting ETO (via radio) and grant them ETO by stating the following:

6.1.9.1 Department, if applicable, and radio call number

6.1.9.2 Identify ETO limits including line, track number, between/at chain markers (e.g., C2 140+00 to C2 150+00).

Hazard Rating: 1B

Defect 3

On July 21, 2025, at approximately 1:11am, a Track roadway work crew was granted permission to enter the roadway using exclusive track occupancy protection near Ballston Station (K04). The work zone was properly protected (via red signals and prohibit exits), but the radio rail traffic controller did not use any location name or chain marker when granting permission violating MICC-ROC-PRO-14, which states:

Roadway Worker Protection: Exclusive Track Occupancy 6.1.9: The Radio RTC must then contact the RWIC requesting ETO (via radio) and grant them ETO by stating the following:

6.1.9.1 Department, if applicable, and radio call number

6.1.9.2 Identify ETO limits including line, track number, between/at chain markers (e.g., C2 140+00 to C2 150+00).

Hazard Rating: 1B

Defect 4

On August 27, 2025, at approximately 1:25am, a Track work crew was granted permission to enter the roadway using exclusive track occupancy protection near Wheaton Station (B10). The work zone was not properly protected with red signals or prohibit exits until 20 minutes after permission was granted. The radio rail traffic controller provided the correct location and chain markers when granting permission.



The radio rail traffic controller, granting exclusive track occupancy protection to a track roadway work crew for their working limits before the area was protected is a violation in accordance with MICC-ROC-PRO-14, which states:

Roadway Worker Protection: Exclusive Track Occupancy 6.1.8.1 Ensure that no rail vehicles that are not part of the work crew have been authorized to occupy the track segment where ETO has been requested, stop indications have been displayed on all signals leading to and within the ETO track segment, and blocking devices (including technological solutions) have been applied to switches and signals leading into and within the ETO working limits.

6.1.8.1.1 The Button RTC must ensure that the area to be protected is clear of all movements that are not part of the work crew and verbally confirm this with the Radio RTC.

6.1.8.1.2 The Button RTC will cancel all signals leading to and within the area to be protected and shall establish prohibit exits and blue block traffic in the ETO area.

Hazard Rating: 1B

Observation 1

On June 25, 2025, at approximately 1:04am, a Plant work crew was granted permission to enter the roadway using exclusive track occupancy protection. This work zone was properly protected by red signals and prohibit exits and the radio rail traffic controller used the correct location when granting permission.

Observation 2

On August 4, 2025, at approximately 12:34am, a track work crew was granted permission to enter the roadway using exclusive track occupancy protection near Metro Center Station. The work zone was properly protected, and the radio rail traffic controller provided the correct location and chain markers when granting permission.

Observation 3

On August 11, 2025, at approximately 12:37am, a track work crew was granted permission to enter the roadway using exclusive track occupancy protection near Friendship Heights Station (A08). The work zone was properly protected, and the radio rail traffic controller provided the correct location and chain markers when granting permission.



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Observation 4

On August 12, 2025, at approximately 12:51am, a communications and signaling work crew was granted permission to enter the roadway using exclusive track occupancy protection near Benning Road Station (G01). The work zone was properly protected and the radio rail traffic controller provided the correct location and chain markers when granting permission.

Observation 5

On August 21, 2025, at approximately 1:22am, a plant work crew was granted permission to enter the roadway using exclusive track occupancy protection near Columbia Heights Station (E04). The work zone was properly protected and the radio rail traffic controller provided the correct location and chain markers when granting permission.

Next Steps

Please respond **by Monday, September 29, 2025**, to acknowledge receipt and to convey responses to the WMSC regarding what, if any, actions will be or have been taken in response.