## What is QICO?

The Office of Quality Assurance, Internal Compliance & Oversight (QICO) is an internal management function that partners with other departments to provide an objective review. Authorized by the General Manager as outlined in the Quality Management System Plan (QMSP).

## Why QICO Performed This Review:

 These internal reviews are intended to provide Metro senior management with an assessment of the state of Maintenance & Engineering within five distinct areas (three within Metrorail and two within Metrobus) and promote the actions needed to address any concerns.

#### QICO's Methodology:

- Develop relevant review activities by identifying and assessing risks to policies, procedures & standards, quality & compliance, and traceability.
- Review documentation, observe processes and interview key personnel.
- Review findings and required actions are rated based on severity of risk, which ranges on a scale from "Insignificant" to "High".

Note: An itemized internal Corrective and Preventive Action (iCAPA) is developed for each required action to achieve effective and measureable resolution of identified concerns. To check the status of iCAPA implementation go to:

www.wmata.com/initiatives/transparency/.

## WHAT WE FOUND | ENGINEERING & MAINTENANCE

## 3. Metrorail Vehicle Maintenance & Engineering

#### Wins:

At Bladensburg bus garage, leadmen used handheld radios to assist one another allowing for efficient and effective communication.

1. Metrobus Maintenance & Engineering

✓ The Bus Maintenance group has an intranet repository of governing maintenance and engineering documentation that provides all recent revisions promoting effective maintenance practices.

### Items Resolved During Review:

- At the Montgomery bus garage it was observed that oxygen and acetylene cylinders were stored out of compliance with OSHA 29 CFR 1910. Maintenance personnel separated these cylinders according to standards.
- At all bus garages assessed there were expired electrical gloves and maintenance issues with fire extinguishers. Expired gloves were discarded, new gloves were purchased, and fire extinguishers were replaced, inspected and tagged.
- At all bus garages assessed there were uncovered anti-freeze, diesel fuel drums and buckets. Personnel mitigated these issues by providing covers for anti-freeze drums and removing diesel fuel drums and buckets.
- At all bus garages assessed there were fluid drums with no spill containment. Drums were placed on spill containment dollies and spill containment palettes.
- At Bladensburg bus garage jib cranes with expired certifications were observed. Personnel immediately took the cranes out of service, tagged them, and scheduled them to be re-certified.

### 2. Metrobus Parts & Material Inventory Management

### Wins:

- ✓ At Bladensburg and Carmen Turner Facility (CTF) bus parts are bundled together in advance of scheduled overhauls streamlining workloads and increasing the efficiency of bus maintenance activities.
- ✓ The number of operating purchase requisitions greater than 30 days has decreased by 96% in three months leading to the increased availability of parts for use.

#### Items Resolved During Review:

- At the Bladensburg and CTF storerooms inventory discrepancies were identified for engine oil filters. The storeroom supervisor identified the issue using Maximo and made the necessary corrections.
- At Montgomery and Shepherd Parkway storerooms, damage to packaging and improper parts storage was observed. Parts were immediately placed into correctly labeled storage boxes.

## Wins:

- Personal protective equipment (PPE) at all rail facilities visited was readily available and properly used promoting safe work practices.
- ✓ Preventive maintenance (PM) documentation at all facilities visited was readily available to the technicians and had proper document controls in place allowing for consistent maintenance activities.
- Precision measuring devices at New Carrollton, Shady Grove, and West Falls Church facilities were secured and managed properly fostering positive quality control.

### Items Resolved During Review:

- At the Greenbelt facility the shelf life management program had not been implemented. The superintendent initiated the shelf life program and appointed an individual responsible for oversight.
- At Greenbelt and West Falls Church facilities, shop safety devices were damaged or missing. Repairs were made right away to door obstruction, machine guard, and shop power safety devices.
- Improper maintenance of eye wash stations and fire extinguishers at Greenbelt, New Carrollton, and West Falls Church facilities was observed. Eye wash station and fire extinguisher issues were corrected immediately.

# **4.** Metrorail Vertical Transportation: Elevator Maintenance & Inspections

## Wins:

✓ At visited sites elevator barricades were used to prevent unauthorized access into work areas protecting technicians and the riding public.

### Items Resolved During Review:

At Franconia-Springfield, Eastern Market, and Friendship Heights discarded material, debris and trash were observed. Supervisors and technicians at these locations took immediate action to remove discarded materials, debris and trash.

# 5. Metrorail Automatic Fare Collection (AFC) Inspection & Maintenance

#### Wins:

✓ AFC Engineering has developed a web based application (AFC Listener) to provide real time monitoring and failure reporting of AFC assets.

## WHAT WE WILL DO MOVING FORWARD



April 2018

## **Key Takeaway**

Continuing to enhance supervisory controls will contribute towards improving WMATA's quality, safety and reliability of service.

Through the implementation of 19 internal Corrective and Preventive Actions (iCAPAs) we are committed to driving quality improvement initiatives with the objective of safeguarding the mission success of the agency while enhancing customer experience. These strategic plans to address issues of concern, required actions and recommendations are intended to drive real progress that is measureable and verifiable.

## 1. Metrobus Maintenance & Engineering

- Revise and implement sustainable safety and preventive maintenance program requirements adhering to industry best practices for asset management.
- For details on the committed action plans see the following iCAPAs: QICO-BME-18-01, BME-18-02, BME-18-03, BME-18-04, BME-18-05, & BME-18-06.

### 2. Metrobus Parts & Material Inventory Management

- Identify opportunities to streamline the inventory management strategy with regard to supply chain tracking and identification, and the removal of outdated inventory.
- For details on the committed action plans see the following iCAPAs: QICO-BMI-18-01 & BMI-18-02.

### 3. Metrorail Vehicle Maintenance & Engineering

- Update and implement procedures to improve safety, work quality and parts management.
- For details on the committed action plans see the following iCAPAs: QICO-RCM-18-01, RCM-18-02, RCM-18-03, RCM-18-04, RCM-18-05, & RCM-18-06.

## **4.** Metrorail Vertical Transportation: Elevator Maintenance & Inspections

- Incorporate adequate controls and methodology for records management.
- For details on the committed action plans see the following iCAPAs: QICO-ELES-18-01, ELES-18-02, ELES-18-03, & ELES-18-04.

## **5.** Metrorail Automatic Fare Collection (AFC) Inspection & Maintenance

- Review and update the Maintenance Control Plan (MCP) and implement processes to improve reliability reporting.
- For details on the committed action plans see the following iCAPA: QICO-AFCS-18-01.

http://www.wmata.com/transparency