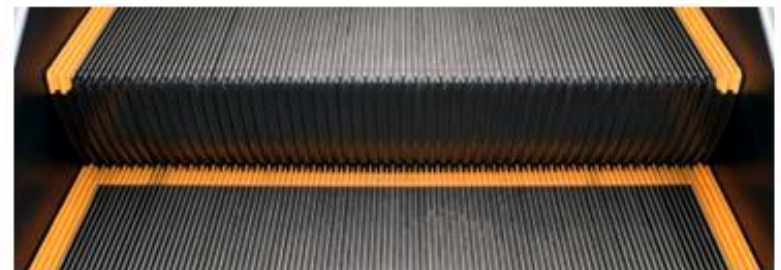


Instructor/Participant Guide



211: Escalator-Specific: Handrail Installation and Maintenance

Module 4: Inspection, Maintenance, and Troubleshooting



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PREVIEW ONLY



Icons Used in This Guide

Throughout the Instructor's Guide, the following icons indicate the type of content being presented.



Refer To



PowerPoint



Multimedia



Web based Training



Write



Ask



Individual Activity



Small Group Activity



Classroom Activity



Duration

Agenda

Topic No.	Topic Title	Duration
1	Introduction	5 minutes
2	Inspect for Cracks	10 minutes
3	Inspect for Vandalism	10 minutes
4	De-lamination	10 minutes
5	Bubbles at Splice	10 minutes
6	Cleaning/Vacuuming	15 minutes
7	Tension <ul style="list-style-type: none"> • Too Loose • Too Tight 	20 minutes
8	Transition	10 minutes
9	Storage <ul style="list-style-type: none"> • Coiling 	20 minutes
10	Maintenance Documentation	10 minutes
11	Summary	5 minutes
Total Time:		2 hours



Overview

Purpose	The purpose of this module is to: <ul style="list-style-type: none">• Introduce participants to Escalator-Specific: Handrail Installation and Maintenance.	Preparation	PREPARE flip chart with the following title: <ul style="list-style-type: none">• Class Expectations
Objectives	At the end of this chapter, the learner will be able to: <ul style="list-style-type: none">• Identify inspection, maintenance, and troubleshooting procedures for Transit Escalator Handrail Systems• Identify common problems and state recommended solutions• Complete required maintenance documentation		
Materials	Make sure you have the following: <ul style="list-style-type: none">• Laptop (one for leader)• Participant Guides• PowerPoint slide deck• LCD projector• A17.1 Safety Code for Elevators and Escalators• A17.2 Guide for Inspection of Elevators, Escalators and Moving Sidewalks• A17.3 Safety Code for Existing Elevators and Escalators• Heavy Duty Transportation System Escalator Design Guidelines (APTA RT-RP-FS 007-02)• Field Employees' Safety Handbook• Transit Agency Handbook		



Instructor's Notes

Inspection, Maintenance, and Troubleshooting

Bubbles at Splice

- Caused from cooking too long or at too high of a temperature
- Splices can be broken and reheated

Transit Elevator/Escalator Consortium 7

Slide 7



REVIEW slide 7 and describe how bubbles can occur at splice locations.



ASK: What can be done if bubbles form at a splice?

Bubbles at Splice

What can be done if a bubble has formed at a splice?



Instructor's Notes

Inspection, Maintenance, and Troubleshooting

Cleaning/Vacuuuming

Clean:

- Apply cleaner with damp cloth
- Wipe cleaner off with damp cloth

Polish:

- Spray on dry soft cloth
- Wipe generously
- Remove excess with fresh cloth

Cleaning Schedule:
New Handrails: Clean immediately following installation
Existing Handrails: Daily or weekly is recommended

Transit Elevator/Escalator Consortium

Slide 8



REVIEW slide 8 and provide the participants with the proper handrail cleaning process.

Cleaning/Vacuuuming

Cleaning Schedule:

New Handrails: Clean immediately following installation
Existing Handrails: Daily or weekly is recommended

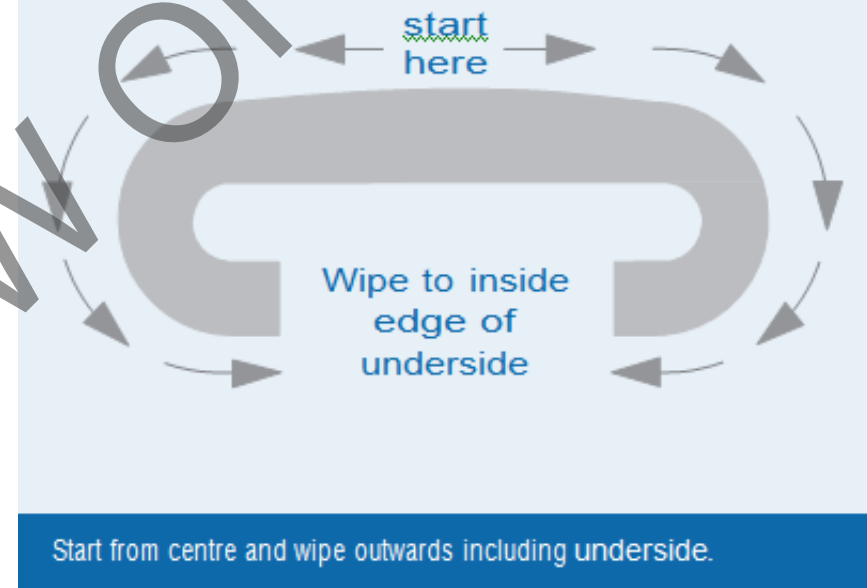


Figure 1: Handrail Cleaning Procedure



Instructor's Notes


Summary


Inspection, Maintenance, and Troubleshooting

Summary

Transit Elevator/Escalator Consortium 15

Slide 15

 **REVIEW** slide 15 and summarize the module.

 **ASK** the participants if they have any outstanding questions on what was presented.

PREVIEW ONLY