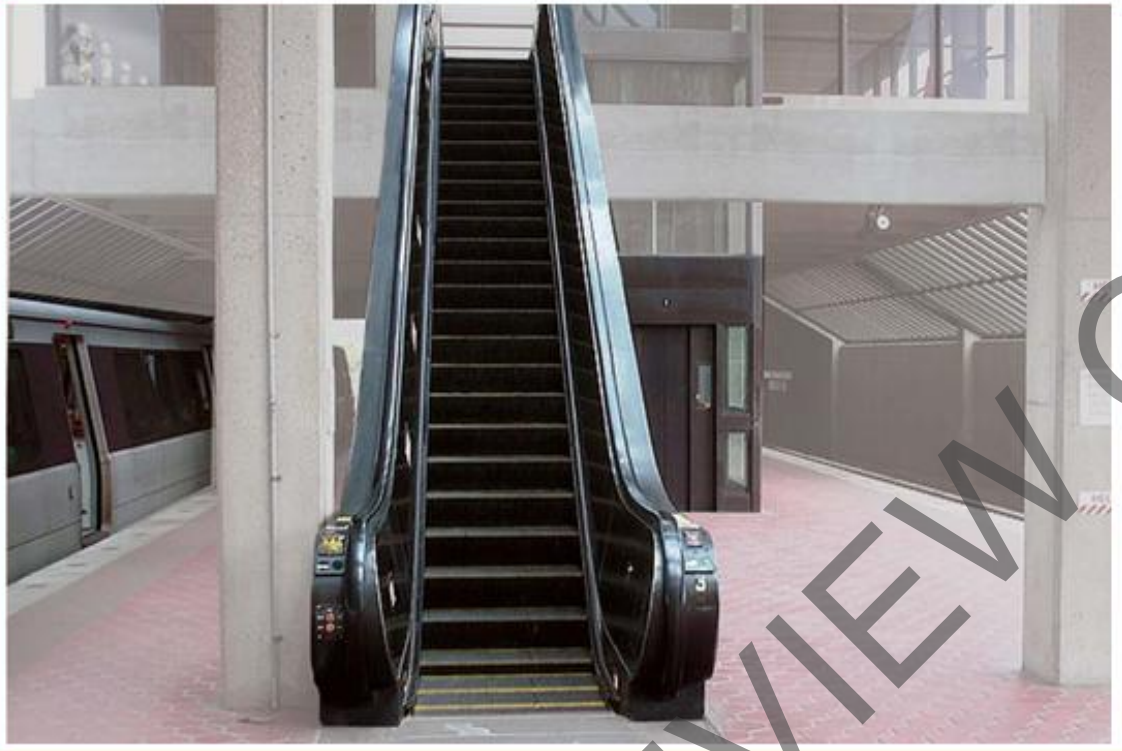
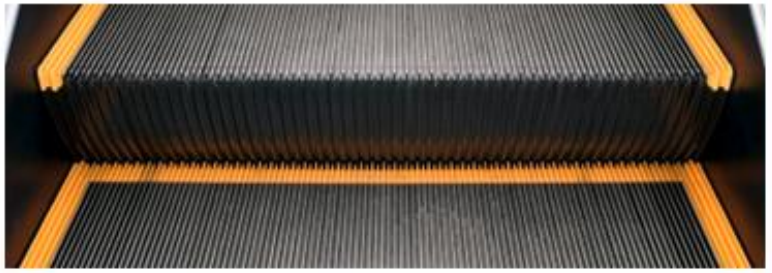
Instructor/Participant Guide





212: Escalator-Inspection & Basic Maintenance

Module 2: Lighting and Heating

Transit Elevator/Escalator Consortium

Table of Contents:

Table of Figures:

Icons Used in This Guide

Throughout the Instructor's Guide, the following icons indicate the type of content 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	Passenger Lighting • Combplate Lighting • Understep/Demarcation Lighting • Balustrade Lighting	30 minutes
3	Maintenance Lighting	10 minutes
4	Heating • Truss Heaters • Pit Heaters • Landing Heaters • Machine Room Heaters	40 minutes
5	Summary	5 minutes
	Total Time:	**1.5 hours**

Overview

Purpose

The purpose of this module is to:

- Prepare participants to perform inspections and basic maintenance on the lighting and heating systems commonly found in U.S. transit systems.

Objectives

At the end of this chapter, the learner will be able to:

- Identify the specific lighting and heating components and their locations.
- Complete a visual inspection of the lighting
- Clean, repair and/or replace any faulty lighting components
- Check all heater and thermostatic controls for proper operation
- Complete applicable maintenance documentation

Materials

Make sure you have the following:

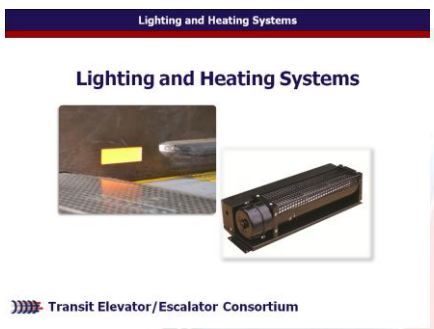
- Laptop (one for leader)
- Participant Guides
- PowerPoint slide deck
- LCD projector
- A17.1 Safety Code for Elevators and Escalators
- A17.2 Guide for Inspection of Elevators, Escalators and Moving Sidewalks
- A17.3 Safety Code for Existing Elevators and Escalators
- Heavy Duty Transportation System Escalator Design Guidelines (APTA RT-RP-FS 007-02)
- Field Employees' Safety Handbook
- Transit Agency Handbook

Preparation

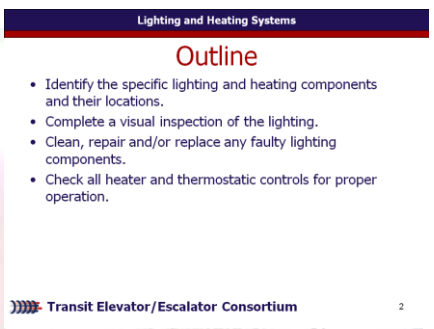
PREPARE flip charts with the following title:

- Class Expectations

Instructor's Notes



Slide 1



Slide 2

GAIN audience attention by introducing yourself.

WELCOME the participants to the Lighting and Heating Systems module.

ASK: What type of inspection is done on most lighting and heating systems?

DIRECT participants to the objectives on slide 2.

REVIEW the objectives on Slide 2.

Introduction

Welcome to the Lighting and Heating Systems module.

What type of inspection is done on most lighting and heating systems?

Instructor's Notes

Slide 3

REVIEW the basics of combplate lighting.

ASK the participants to describe each of the items listed.

Combplate Lighting

Where is this style of lighting located?

Figure 1: Combplate Lighting

Instructor's Notes

Slide 6

REVIEW slide 6 and discuss balustrade lighting.

CONTENT: Direct participants to describe in their own words the basics of passenger lighting.

APPLICATION FEEDBACK: Now that we have discussed a little about passenger lighting, have the participants answer the following questions.

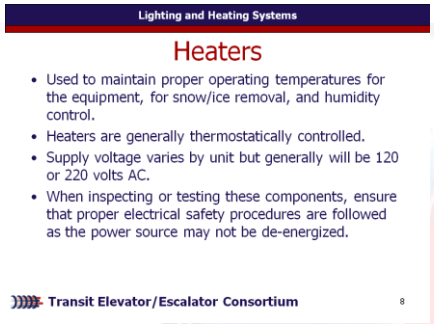
ASK participants to describe what the balustrade light illuminates.

Balustrade Lighting

What does the balustrade lighting illuminate?

Figure 2: Demarcation Lamps

Instructor's Notes



Slide 8

REVIEW slide 8 and the basics of heaters.

ASK: What is the supply voltage for most heaters?

Heaters

What is the supply voltage for most heaters?

Instructor's Notes

Slide 9

REVIEW slide 9 and the details on truss heaters.

ASK: What is the purpose of truss heaters?

Truss Heaters

What is the purpose of the truss heater?

Figure 3: Truss Heater

Instructor's Notes

Slide 11

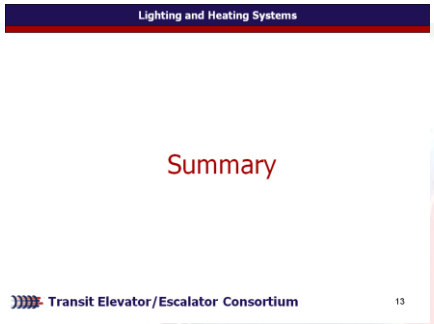
REVIEW slide 11 and the landing heater's functions.

ASK: What is the landing heater's primary function?

Landing Heater

What is the landing heater's primary function?

Instructor's Notes



Slide 13

REVIEW slide 13 and summarize the module.

EVALUATION AND CLOSURE: Recap the main points of the module before moving on to the next topic within this course.

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

Summary