

ADA Compliance in Work Zones



CARSP Conference 2017

Presenter



**Tim Cox, Principal
Cox Transportation, LLC
216-244-3207
timcox@Comcast.net**

SIDEWALK CLOSED
CROSS HERE



Blind man falls into ditch at ART construction site



2 minutes left

“There was no caution tape, no netting, no barricades, just a few little measly little cones that do nothing for me...”

“Pedestrian safety is a low priority at construction project...”



“She tripped and fell on Huron St., after stumbling over a piece of wood protruding from a temporary fence that separates a construction site from the sidewalk.”

“Blocking Toronto streets and sidewalks unavoidable: building industry”



“The city will no longer “rubber stamp” applications from developers who want to close streets and sidewalks for... “unacceptably” long periods...”

Definitions: Accessible



Definitions: Detectable



Definitions: Pedestrians

Dictionary.com:

pe·des·tri·an

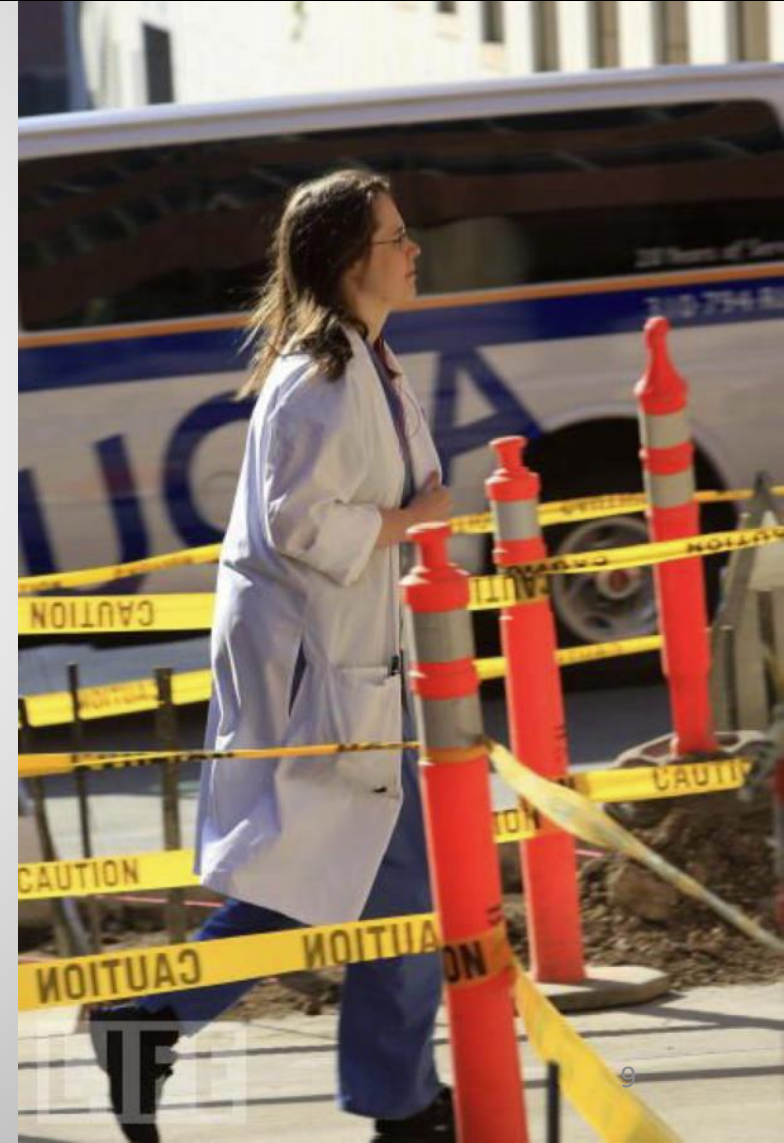
Noun:

1. a person who goes or travels on foot; **walker**.

Adjective:

2. going or performed on foot; **walking**.

3. of or pertaining to **walking**.



Definitions: Pedestrians



Accessible, Detectable Work Zone?



Accessible, Detectable?



Accessible, Detectable?



Regulating Agency: US Access Board

Functions:

- Develops design criteria
- Provides technical assistance, training
- DOJ enforces accessibility standards



Access Board Guidelines: PROWAG



***PROWAG: Public Rights of Way
Accessibility Guidelines***

Sample PROWAG Guideline



R302.4, Barricades & Channelizing Devices:

- Continuous, stable, non-flexible.
- Consists of devices from MUTCD.

FHWA Guidance: MUTCD

MUTCD: Manual on Uniform Traffic Control Devices

Manual on Uniform
Traffic Control Devices
for Streets and Highways

2009 Edition



U.S. Department of Transportation
Federal Highway Administration

MUTCD Standards: Accessible Work Zones

**Section 6F.71,
Pedestrian
Considerations,
Longitudinal
Channelizing Devices**



MUTCD Standards: Accessible Work Zones

**Section 6F.74,
Detectable Edging
For Pedestrians**

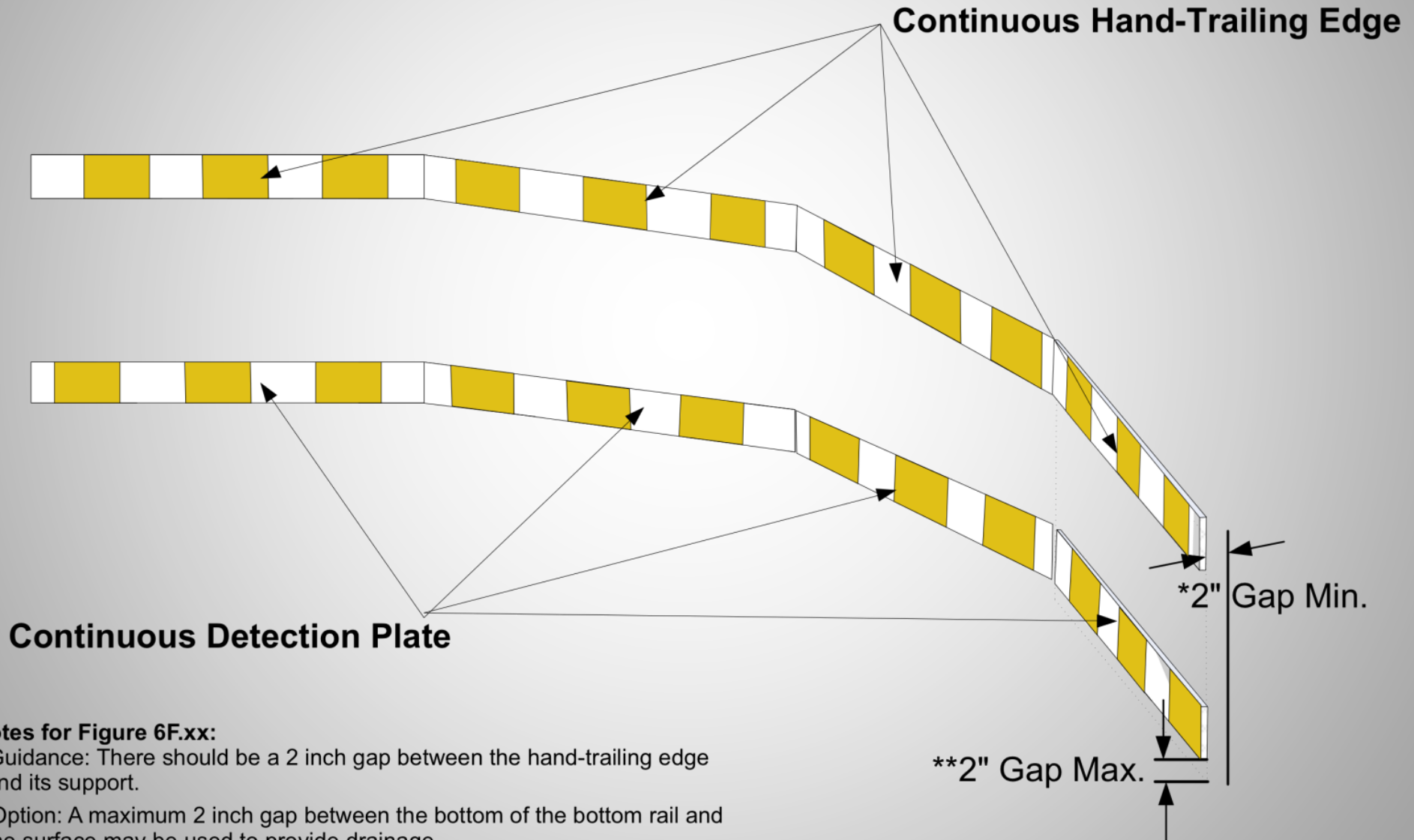


Accessible Work Zones: Components



- **TTC Devices**
- **Sidewalk Closures**
- **Pathway & Surface**
- **Temporary Ramps**

Components: TTC Devices



Notes for Figure 6F.xx:

*Guidance: There should be a 2 inch gap between the hand-trailing edge and its support.

**Option: A maximum 2 inch gap between the bottom of the bottom rail and the surface may be used to provide drainage.

Components: Sidewalk Closures



Components: Pathway



- Walkways shall be 5' in clear width
- If less than 5', passing spaces of 5' x 5', every 200'
- Intrusion free

Components: Surface

Broken, Interrupted, or Changes in Levels:

- Surface < 1/2" max
- Use ramp for broken surfaces > 2"
- Cross-slope shall be 2% max



Components: Temporary Ramps



Parallel Ramp with Platform

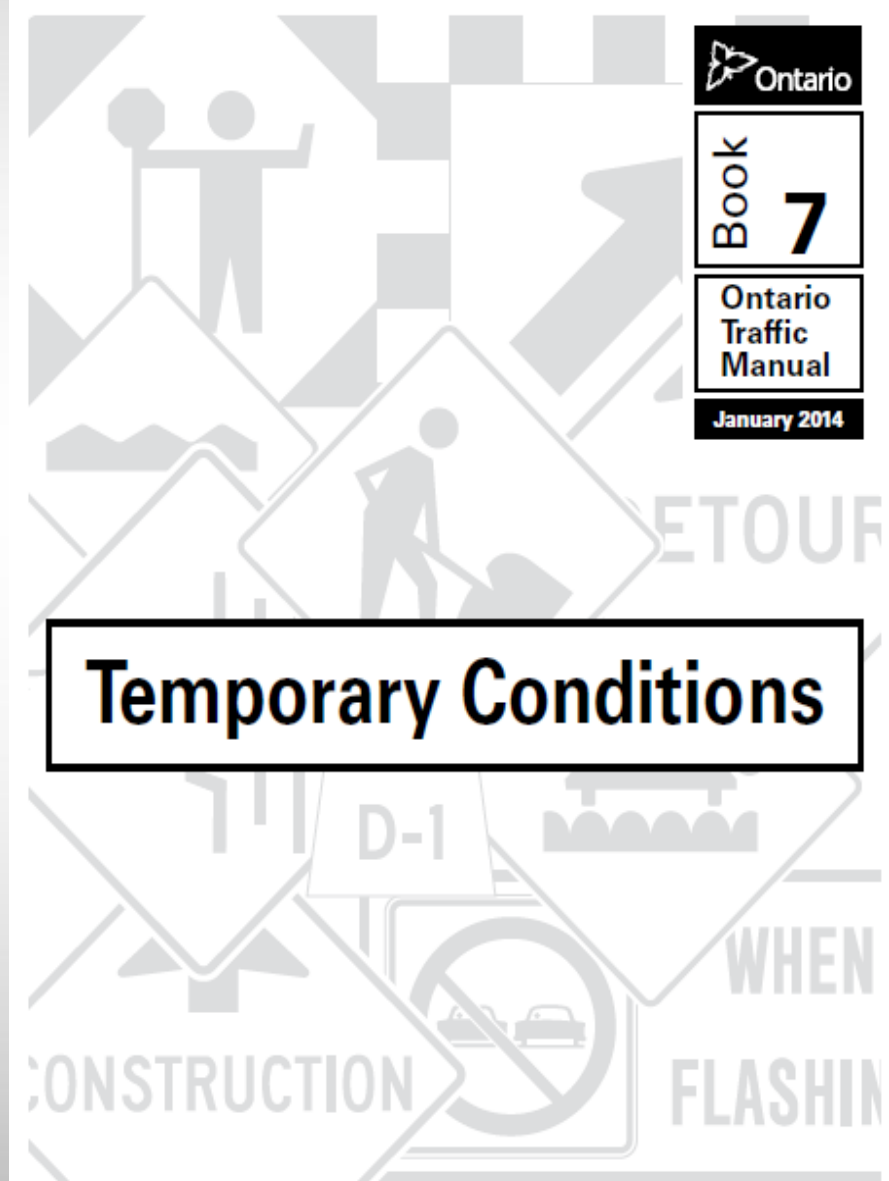


Perpendicular Ramp

Ministry of Transportation, Ontario

Ontario Traffic Manual (OTM)

Language similar to
PROWAG & MUTCD!





OTM Book 7: Characteristics of Pedestrian Pathways

Pedestrian Safety Considerations, Section 2.62

- **Travel paths: safe, convenient, clearly delineated**
- **Pedestrian barricade: minimum 1.0 m (3.3') above surface**
- **Sidewalk width: minimum 1.2 m (3.9')**
- **Width of 1.8 m (5.9') preferred, for 2 wheelchairs to pass**
- **Use curb ramps to avoid hazards**
- **Avoid slippery walkway surfaces**

Ontario Traffic Manual – Book 7

Pedestrian Direction Sign

| TC-40 | TC-41t |
|---|--|
| PEDESTRIAN DIRECTION SIGN | SIDEWALK CLOSED TAB |
|  |  |
| Minimum Background Reflectivity: Engineering Grade (Type I) | |

Size:

TC-40 450 mm x 450 mm

TC-40t 300 mm x 450 mm

Purpose:

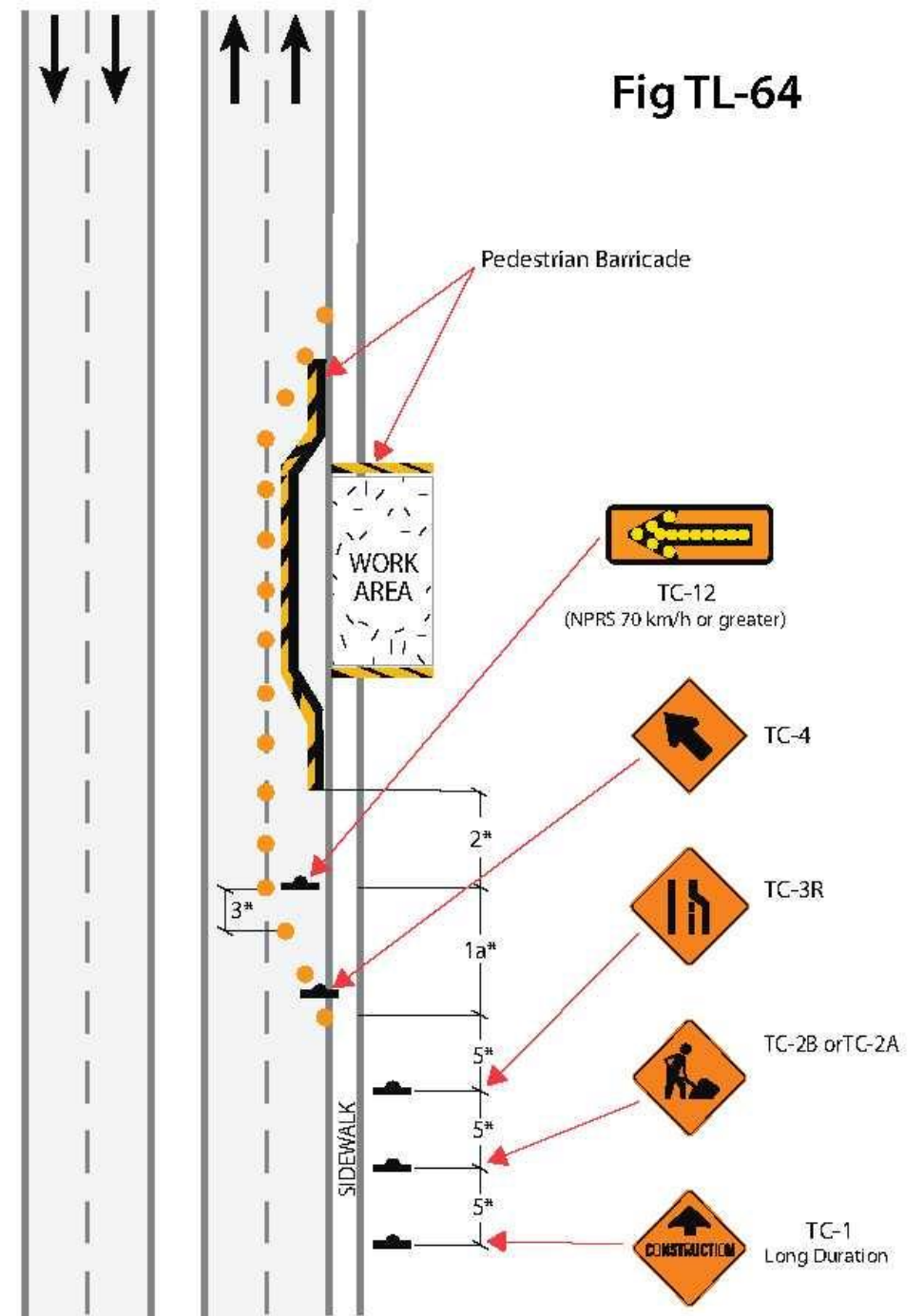
The TC-40 sign is used to indicate to pedestrians the intended pathway through or around a construction, maintenance, or other work area. The sign should be used where the pedestrian is likely to be uncertain as to the intended pathway.

Conditions:

The TC-40 sign must be placed at locations that clearly mark the alternate pathway at all pedestrian decision points.

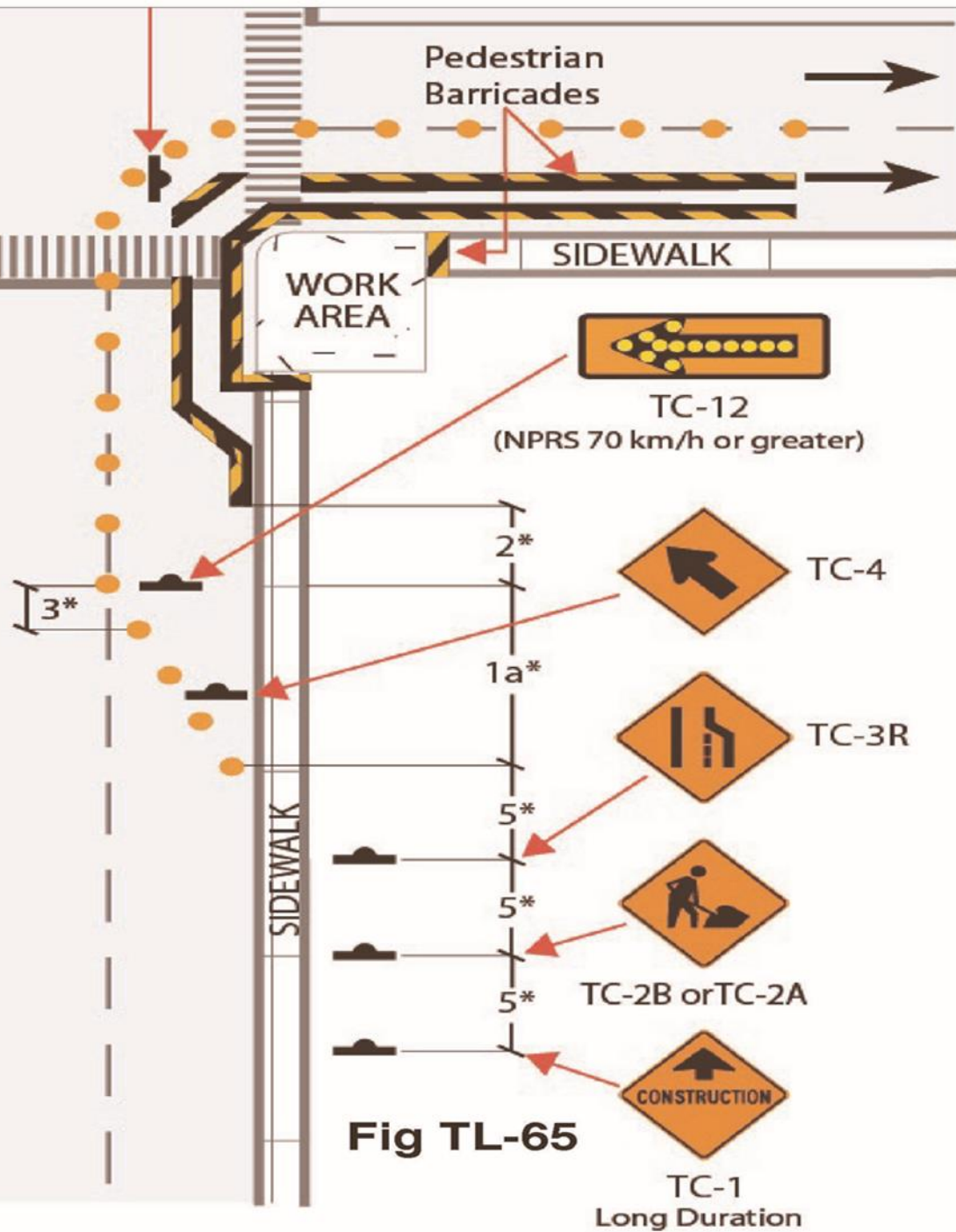
OTM – Book 7: Figure TL-64

Mid-Block Sidewalk Detour onto Roadway



OTM – Book 7

Figure TL-65



Intersection Sidewalk Detour onto Roadway

Case Study: Whole Block Closure













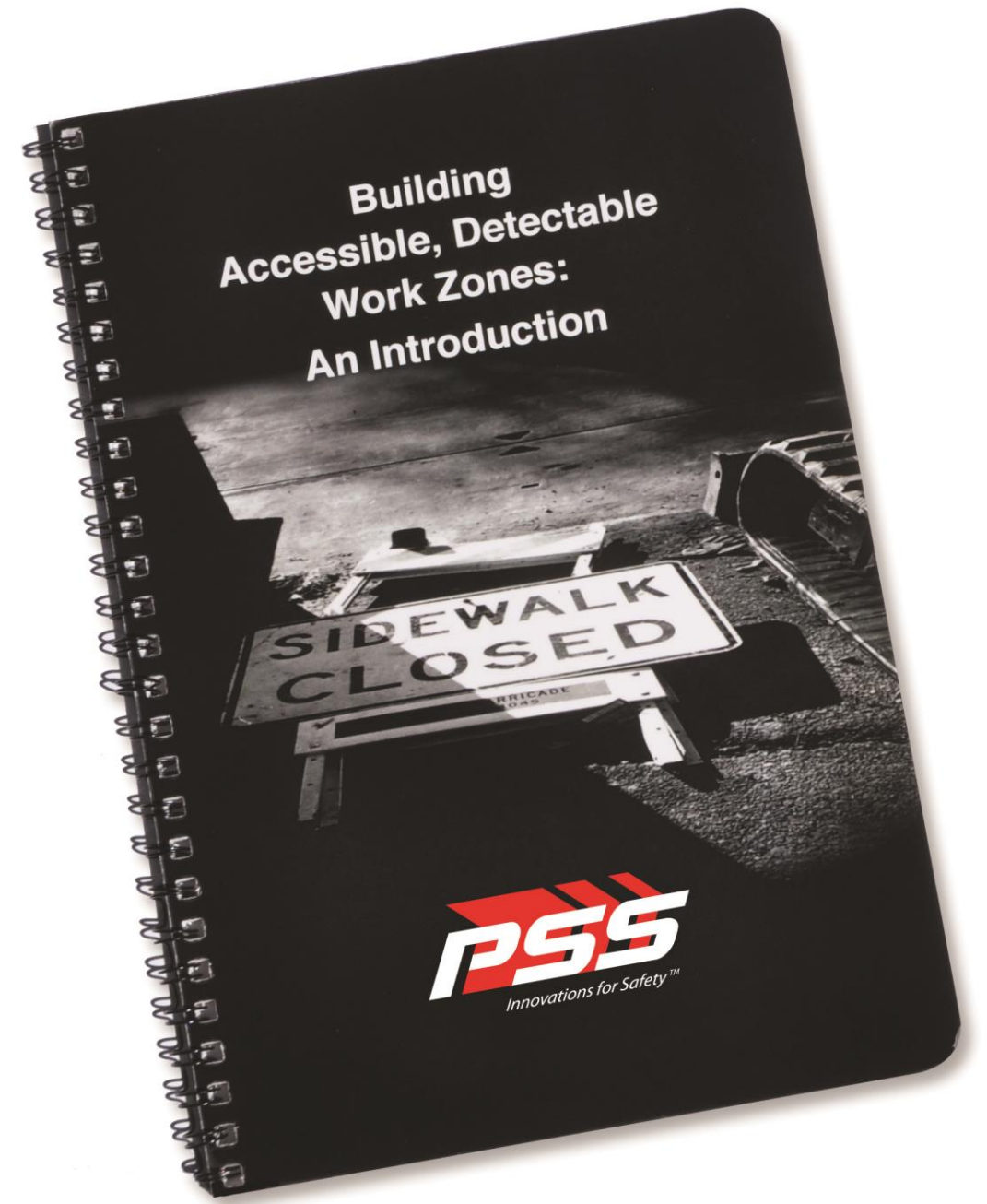






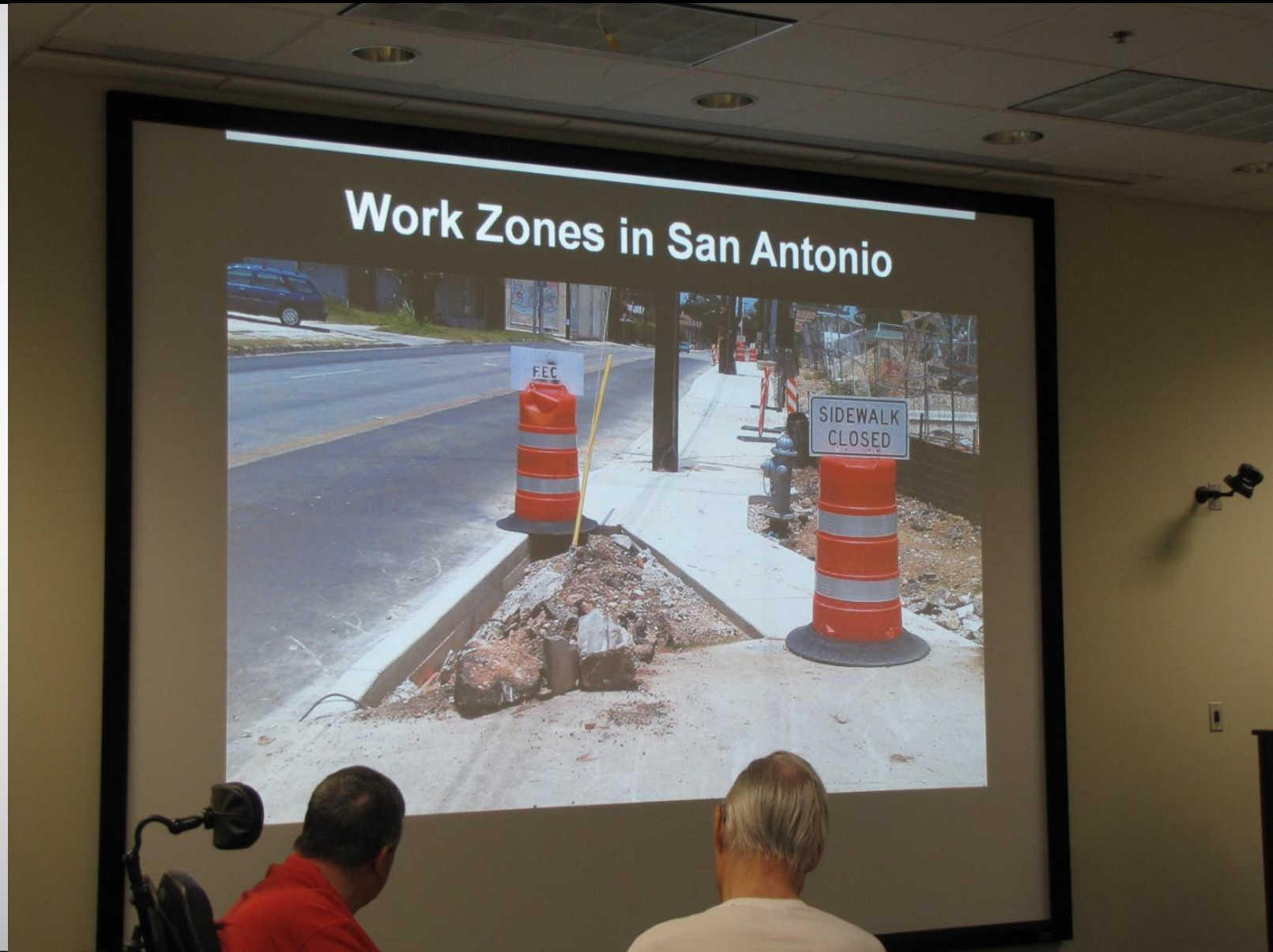
Questions?

But, wait, there's more!



Training Seminars & Webinars

- **Guide Booklet**
- **On-site Seminar**
- **Webinar**



Thank You



**Tim Cox, Principal
Cox Transportation, LLC
216-244-3207
timcox@Comcast.net**