



Western Bridge Preservation Partnership

Date: August 1, 2018 Time: 11:00 – Noon (PDT) Connection Info Below

Time	Topic	Presented By
11:00	Welcome / Introductions	Becky Nix
11:05	Working Group: Local Agency Outreach	Travis Kinney
11:15	Working Group: Deck Patching Matrix	Clay Christiansen
11:25	Technical Topic: Expansion Device Issues	Mike Collins
11:45	Annual Meeting	Darlene Lane
11:55	Administrative items / New Business	All
12:00	Adjourn	All

Action Items

• Owner population of Bridge Deck Database: http://bridgeproductdb.com/overlays/

GoTo Meeting Link:

1. Please join my meeting.

https://www3.gotomeeting.com/join/305841766

2. Use your microphone and speakers (VoIP) - a headset is recommended. Or, call in using your telephone.

Dial +1 (213) 493-0603 Access Code: 305-841-766

Audio PIN: Shown after joining the meeting

Meeting ID: 305-841-766

Discussion Topic Background

Expansion Device Issues

Submitted by Kevin Howland (CDOT) Email: Kevin.Howland@state.co.us

Background:

A recently completed CDOT project installed 0-4 Inch Expansion Devices using polyester polymer concrete to encase the armor angle extrusion and anchorages. Some of the end dams have significant delamination, debonding and unraveling of the material. Standard 4500 psi concrete has been used in the past but generally deteriorates within two years. This is in a very harsh environment around 8,000-10,000 foot elevation on I-70 climbing a steep grade that requires snow plows and semi trucks to be changed up during the winter months. Pictures of a few of the polyester polymer expansion device end dams are shown below. Also attached is the expansion device detail used for these devices. This is a relatively new detail to Colorado with a portion of the steel anchorage exposed at the surface to deflect the plow blades from damaging the armor angle extrusion.

Objective:

CDOT would like input from the partnership on the following:

- 1. What are other states using for expansion device end dam/header material?
- 2. What 0-4 Inch expansion device designs are other states using?







