

BDDM Updates Summary April 2005

1.1.2.3 Span/Depth ratios inserted, from ODOT Office Practice Manual

1.1.7.2 Live Loads – revised loads for new designs, widenings and repairs/strengthenings. Revised permit trucks included. Added Moment and Shear example graphs for various span lengths w/ HL-93 and Permit Loads.

1.1.10 Seismic Maps – 2500 year maps were added. More highways have been added to the seismic maps, and finer contour lines. Criteria added for Phase 1 retrofit when working on existing structures.

1.1.14.1 Design of Precast Prestressed Elements – concrete deck requirements added (ADT & ADTT decision criteria) for multi-beam construction, revised concrete strengths & allowable tension stress. Added criteria to make simple spans continuous for live load. Added NCHRP 18-07 prestress loss calculation criteria.

1.1.19 Elastomeric Bearings – Maximum elastomer thickness increased to 6 inches, use round pads under curved steel beams.

1.1.20.1 Decks – General: Use HPC concrete for decks. Full-depth precast deck panels may be allowed via exception letter from State Bridge Engineer. Figure 1.1.20.1A – corrected Span “S” column, added dimension “(ft)”. Chart does not include design for deck overhang & rail loading.

1.2 Steel Structure Design and Detailing – Numerous revised & added details and text: Cross frame diaphragms, stiffeners, connections, bents, and more.

1.4.8.1 Roadway Clearances – New requirements for temporary and permanent conditions.

2.1.6 Scales - Figure 2.1.6A revised.

2.7.3.8 Railroad Clearance Diagram – Figure 2.7.3.8A modified, higher vertical clearance and revised horizontal clearances.