

## **1.0 GENERAL TECHNICAL REQUIREMENTS**

### **1.1 General**

Conduct all Work necessary to meet the requirements of this Section 1 (General Technical Requirements) and to satisfy all functional needs of the Project, including design and construction of the Project.

All references to alignment information and stationing in this Section 1 (General Technical Requirements) shall be to the alignment information and stationing as shown in Reference Documents.

#### **1.1.1 Ultimate I-70 Infrastructure Configuration**

The Ultimate I-70 Infrastructure Configuration (UIC) is defined as follows:

- (1) A network of freeways, surface streets, ramps, and interchanges between I-25 and Tower Road to provide operational improvement and future Level of Service (LOS) demands as defined within the I-70 East Draft Environmental Impact Statement (DEIS)
- (2) This network includes reconfiguration of the I-70 and Havana St Interchange to a full diamond Interchange and an elevated profile for the Ultimate Havana St. westerly interchange ramps extended over the realigned Union Pacific Arsenal Industrial Lead;

### **1.2 Project Basic Configuration**

The Basic Configuration for the Project shall:

- (1) Replace the existing I-70 Bridge over Havana Street (E-17-JP) to the Ultimate Typical Section as shown in the Contract Drawings,
- (2) Construct the Railway Overhead Structure to accommodate the future alignment of the Union Pacific Arsenal Industrial Lead Track, within the Ultimate Typical Section as shown in the Contract Drawings,
- (3) Reconstruct mainline I-70 between Sta. 4088+00 to 4123+00 and all associated Highway Work as depicted in Book 2, Section 1, Exhibit A, including Havana St. access ramps required to tie existing Roadway into proposed Bridge structure,
- (4) Provide improvements shown on CDOT Highway Construction Bid Plans of Proposed Federal Aid Project No. IM 0704-222 contained in the Reference Documents, except for those improvements identified in CDOT Highway Construction Bid Plans of Proposed Federal Aid Project No. IM 0704-222 that conflict with the Work identified in Book 2, Section 1.2 (3) above.

The Basic Configuration is further defined as completing the Work within the existing Right-of-Way in consideration of the following:

**I-70 / Havana Street Interchange**

- Areas of reconstruction shall maintain existing laneage, as a minimum, and include additional lanes and shoulders as shown in Exhibit A.
- Reconstruct the existing I-70 over Havana Street Bridge to a horizontal and vertical geometry that accommodates the Ultimate I-70 Infrastructure Configuration improvements, but limited to the lanes and shoulders as shown in Exhibit A.
- Reconnect existing folded diamond interchange ramps from Havana Street to I-70 mainline.
- Construct retaining walls, Sidewalks, drainage, signage, striping, access, fencing, signalization, ITS elements, lighting, utility relocations, etc., to accommodate the Project and Ultimate I-70 Infrastructure Configuration requirements.
- Horizontal and vertical Roadway alignments may be adjusted throughout the limits of I-70 provided any such adjustments accommodate the Ultimate I-70 Infrastructure Configuration.
- Construct interim water quality improvements in conformance with the Contract Documents.