



## **Railroad On Call Scope of Work**

Type of work may include all or parts of the following activities:

Railroad Coordination - the scope of work for Railroad Services may include:

- I. Coordinate the following activities through the CDOT Project Manager as directed by the CDOT Railroad Program Manager:
  - A. The Consultant shall conduct and document an investigation of the project area to determine railroad ownership. As part of the investigation the Consultant will provide inventory reports of the crossings, provide location maps of the crossings, easement information, identify and list stake holders and determine if the railroad company both operates and maintains the crossings. CDOT staff will assist in research to find existing agreements and easements at the crossings.
  - B. Project Goals:**
    - 1) Determine the process moving forward for an at-grade and/or signal interconnect projects.
    - 2) Determine the process moving forward for a separated grade project.
    - 3) Working with the Railroad Program Manager determine if a utility license agreement/permit will be needed for the project.
    - 4) Determine if right of way acquisition will be needed for the project.
    - 5) Working with the Railroad Program Manager determine if a new agreement will be needed, or an amendment will be needed to the existing agreement for the project.
    - 6) Determine if preliminary utility investigation will be needed for the project.
    - 7) Determine if a PUC application will be needed for the project.
    - 8) Determine if construction management will be required for the project.
  - C. Railroad Process:**
    - 1) Determine best process for CDOT Projects
      - a. Railroad At-Grade and/or Signal Interconnect
      - b. Railroad Maintenance (MCL)
      - c. Railroad Separated Grade Crossings
      - d. ROW Acquisition
      - e. Utility Coordination/License agreement across railroad property
      - f. Construction Management
    - 2) Develop and determine the review submittal requirements for the railroad package:

- a. For grade separation projects, submittals shall follow the UPRR-BNSF Railway Grade Separation Guidelines, latest version
  - b. For at-grade crossings and other projects, submittals shall follow the Public Projects Manual of the railroad, latest version, if available
  - c. For utility projects, submittals shall be determined from the website information for the railroad company
- 3) Identify construction responsibilities between the railroad and roadway authority, work includes putting exhibits together for railroad review and responding to railroad comments.
  - 4) Prepare Public Utilities Commission application and exhibits as required for PUC Application for CDOT
  - 5) Prepare Construction Maintenance Agreements (C&M) and exhibits as required for CDOT.
  - 6) Prepare Utility License Agreements/Permits as required for CDOT.
  - 7) Prepare Railroad Specifications for at grade or separated grade crossings.

**D. Grade Crossing Design Support:**

- 1) Assist with review of railroad submittals to clear the project.
- 2) Assist with coordination for securing railroad permitting for utility work on railroad property.
- 3) Review roadway plans and specifications for compliance with MUTCD and PUC standards
- 4) Assist with coordination of the field diagnostic meeting, participate in the meeting and compile and review draft diagnostic notes
- 5) Assist with coordination or requests for railroad signal design and estimates
- 6) Assist with coordination of roadway and railroad construction schedules
- 7) Provide construction inspection and oversight of roadway elements only for compliance with project requirements

**E. Grade Separated Structural Review Support:**

- 1) Assist with review of submittals (i.e., Concept, 30%, and Final design plans) prepared by CDOT designers or consultants, for completeness, including:
  - a) Review of designs for compliance with railroads design plan standards.
  - b) Review of submittal requirements to ensure railroads list of required documents are included.
  - c) Review of project with regards to railroads ROW requirements for future tracks.
  - d) Review of project constructability.
- 2) Assist with railroad reviewer coordination.
- 3) Assist with railroad field employee coordination.
- 4) Assist with project site visits.
- 5) Assist with reviews of project estimates.
- 6) Assist with project meetings.

7) Assist with general project coordination.

**F. Railroad Agreement Support:**

- 1) Provide CDOT assistance with the preparation, submittal and coordination for the following (but not limited to) Agreements:
  - a) Preliminary Engineering (PE) Agreement
  - b) License Agreement/Permits
  - c) Construction & Maintenance (C&M) Agreement
  - d) Maintenance Consent Letter (MCL) and C&C-1 Agreement
- 2) Provide CDOT assistance with the preparation, submittal and coordination for PUC Applications
- 3) Provide CDOT and its designer or contractor assistant with the preparation, submittal and coordination for Right of Entry (ROE) Agreement
- 4) Attend meetings as necessary

**G. Construction Management Support Railroad Coordination/Oversight:**

- 1) Provide CDOT Project Engineer with the following construction inspection support:
- 2) Railroad Coordination Oversight during Construction Conduct activities to schedule, monitor, instruct and guide Contractor during construction on or near railroad property. The position would ensure that these activities are conducted in accordance with CDOT, State and Federal regulations and safety guidelines and policies. Additional support may include:
- 3) Conduct activities to schedule, monitor, instruct, and guide Contractor to schedule preconstruction meetings with the railroad companies, that contractor has all required permits in place before starting construction.
- 4) Additional railroad coordination to proactively resolve potential delays. This may include phone calls, meetings, or field meetings with railroad companies and contractor.
- 5) Provide updates to the CDOT CM PM when railroad work is not proceeding according to plans, specifications, and agreements. Help identify steps to recover schedule and present to CDOT CM PM, up to and including escalation protocol.
- 6) Help set-up, facilitate, and document the pre-construction meeting for railroad process.
- 7) Coordinate with contractor to ensure the contractor is applying for all the necessary permits in place before starting work, including MCL and railroad right of entry.
- 8) Participating in weekly progress meetings with contractor, subs, utilities, and other interested parties.
- 9) Anticipating project problems and directing recommended solutions to the CDOT Project Engineer/Manager.
- 10) Reviewing drawings and data submitted by the CDOT or Consultant designer for conformance with the intent of the specifications. Informing and obtaining concurrence as needed from the CDOT Project Engineer and keep relevant documentation for project records.
- 11) Notifying contractors and the CDOT Project Engineer of non-compliance with the contract plans and specifications in a timely manner.

- 12) Preparing and distributing substantial punch list items to be completed between the contractor and railroad to necessary parties.
- 13) Preparing and distribute work acceptance to start final invoicing to necessary parties

**H. Other:**

- 1) Railroad Coordination
- 2) Flagging Coordination
- 3) Constructability and Value Engineering Studies
- 4) Dispute Resolution
- 5) Claim Analysis
- 6) Railroad Invoicing (Month)