

Region Preconstruction – Roadway

Region Summary

The TDOT Regions are at the forefront of the department's mission in providing a safe and reliable transportation system that supports economic growth and quality of life. The TDOT Regions are vital to the timely delivery of projects that provide increased safety and mobility while improving existing transportation infrastructure and traffic operations. In partnership with other TDOT disciplines, local communities, other state agencies, and municipalities, TDOT Regions provide strong strategic relationships and coordinated service to TDOT's customers.

To achieve the vision of TDOT's leadership, the Regions collaborate as a matrix organization to support the strategic direction and goals of the Asset Management Division in delivering targeted investment levels and performance goals that meet or exceed the expected life cycle targets set for TDOT's infrastructure assets.

Region Roadway Design Section

The Roadway Section will lead the implementation of innovative concepts that improve performance and increase the sustainability of TDOT's transportation system. The Region Roadway Section is responsible for designing and developing roadway design plans and specifications for TDOT transportation projects. This Section integrates Region Hydraulics, Quality Management, and ROW engineering into Roadway Design to foster the collaborative effort necessary for developing transportation projects that meet the scope, schedule, and budget.

EPIC Modifications

The Roadway Design Section will be supplemented with additional discipline specialists, including Hydraulics, Quality Management, and Right-of-Way Engineering.

Benefits

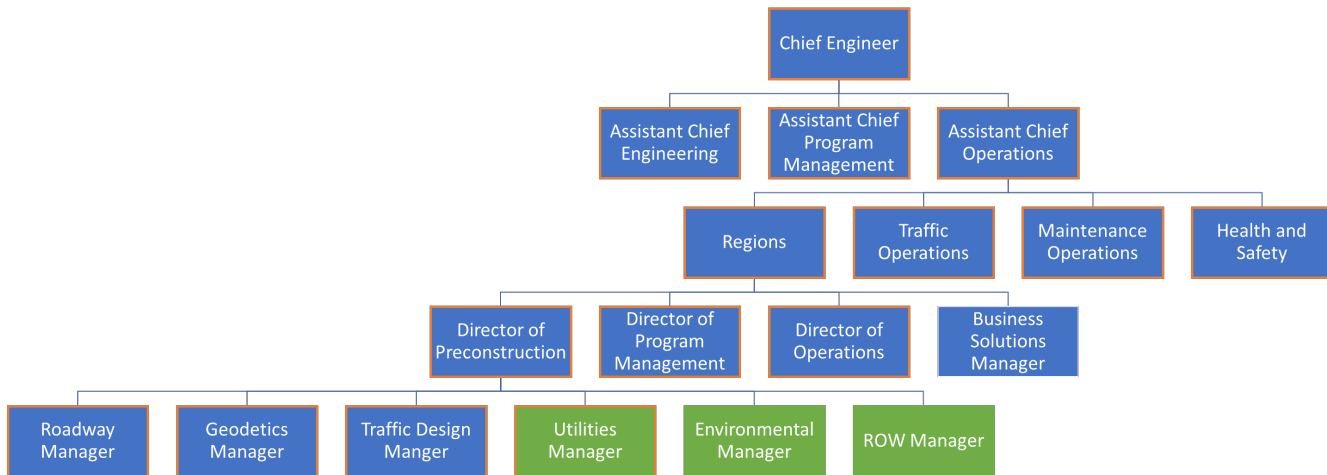
- *Provides for more effective integration of policies for roadway, hydraulics, and ROW*
- *Improves consistency in the design of roadway deliverables and reduces construction overruns through the collaborative efforts of the Project Team and the Region Quality Team*
- *Builds a culture of continuous learning, enacting a succession planning process that develops leaders both functionally and culturally*
- *Creates a culture of accomplishment through the collaborative effort of Project Teams in delivering transportation projects on time, within budget, and per the project scope*

- *Develops Project Team members by providing each person with an understanding of the roles and responsibilities of the other disciplines needed to move a project forward from start to completion with efficiency and flexibility*
- *Allows for Project Teams to focus on those projects that have been prioritized as part of the 5-Year Work Program*

Challenges

- *Ensuring continuous and effective coordination is occurring between the Region Roadway Design Section, TDOT disciplines, other Regions, and HQ*
- *Ensuring the Region Roadway Design Section has active participation and integration with the Project Teams as part of a matrix organization in delivering successful projects that meet schedule, budget, scope, and quality requirements*
- *Attracting and hiring qualified candidates in a timely manner*
- *Implementing a strategy for recruitment and retention of qualified staff*
- *Implementing the Quality Assurance process for all deliverables as listed in the Project Delivery Network (PDN)*

Functional Organizational Chart



Responsibilities

- *Support and implement innovation for the Region Roadway Design Section that improves the efficiency, effectiveness, reliability, and safety of TDOT's transportation network*
- *Incorporate statewide policy, design standards, specifications, and direction into roadway design deliverables that promote uniformity and consistency in the design of roadway-related assets*

- *Effectively coordinate with State Design, State Construction, and State Maintenance in tracking lessons learned and implementing solutions to proactively prevent future concerns*
- *Manage the financial performance for the Region Roadway Design Section in coordination with State Design to ensure alignment with TDOT financial processes that ensure transparency and accountability*
- *Provide technical expertise and support in roadway and hydraulic design-related matters*
- *Integrate Quality Management into all deliverables in compliance with the PDN with the purpose of reducing plan errors, right-of-way delays, construction delays, and contractor claims*
- *Perform interdisciplinary reviews on projects developed by either TDOT or consultant teams to ensure a coordinated design at each stage of the PDN*
- *Audit design consultant teams, working as an extension of the department, to ensure the design consultants are following their own quality control process*
- *Jointly evaluate anticipated right-of-way needs with Right-of-Way Appraiser, Roadway Design, Construction, and the Project Team to determine locations where innovative solutions can reduce the right-of-way taking or to identify those locations for which additional right-of-way is needed for constructability purposes and/or maintainability purposes*
- *Develop right-of-way estimates through collaboration with the Right-of-Way Appraiser, Resident Engineer, Maintenance Superintendent, and other applicable TDOT Project Team members*
- *Support TDOT Districts with the hydraulics review of development permits*
- *Provide customer service in addressing drainage concerns from the public*
- *Collaborate with Environmental Permits to meet applicable permitting requirements and address constructability concerns*
- *Assist HQ Construction and all applicable TDOT disciplines in the development of Technical Special Provisions*
- *Serve on selection committees for professional engineering services as part of the Brooks Act, including assistance with RFP development, attendance at project-specific marketing meetings, assistance with determining scoring criteria, assistance with project information sessions, when applicable, serving as a scorer as part of the consultant acquisition process, and attendance at de-briefs for consultants where usable feedback must be provided.*
- *Coordinate with State Production Support to identify training needs*
- *Participate in peer exchange, fostering collaboration both internally and with relevant partners to share ideas, skills, and insights*
- *Assist on Project Teams as part of the Project Delivery Network by providing input at all applicable project milestones, including Project Kick-Off, Risk Workshops, Project Scoping meetings, Plan-in-Hand Field Review meeting, and the Plans, Specs, and Estimates meeting*
- *Provide sign-off on the Project Commitment Document*
- *Coordinate with Project Teams to produce roadway and hydraulic designs consistent with the project's scope, schedule, and budget as part of a matrix organization*
- *Update estimates per the Project Delivery Network (PDN)*
- *Retain records consistent with the department's Record Retention Policy*
- *Assist with the development and implementation of a Consultant Acquisition Plan for the Region*
- *Achieve TDOT's performance metrics for Roadway Design*

Division Metrics and Performance Goals

- *Finalize 100% of all documents required for letting within the allowable scope, schedule, and budget for each project as listed in the Project Delivery Network (PDN).*
- *100% of all submittal documents, as listed in the PDN, must comply with the Quality Assurance process.*
- *Do not exceed 8% of construction overruns resulting from Supplemental Agreements.*
- *Prioritize Requests for Information (RFIs) as part of the construction phase. When feasible, collaborate with applicable TDOT leadership to respond to construction RFI's within one contractor-working day and provide resolution to construction RFI's within three contractor-working days if an analysis is required.*
- *Coordinate with statewide groups quarterly to assess those items within the specifications and/or design standards that warrant modification.*

Section Deliverables

- *Roadway designs that incorporate innovative concepts*
- *Roadway Design Deliverables as listed in the Project Delivery Network (PDN)*

Internal Partners

- *TDOT Regions*
- *Project Teams as part of a matrix organization*
- *TDOT Disciplines*

External Partners

- *General public and property owners*
- *Local municipalities, including MPOs and RPOs, local elected officials, and other state agencies*
- *Legislators*
- *Contractors*
- *Consultants*
- *Permitting Agencies having jurisdiction over projects*
- *Utilities and Railroads*
- *Law Enforcement and Emergency Services*
- *Federal Agencies*
- *Trucking companies, Airports, and Ports*
- *Universities and Research Facilities*



Data Systems

Systems housed in the division, data owners, data needs