TRANSPORTATION AND MOBILITY PLANNING
Feeding the Program

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Transportation and Mobility Planning Division Director

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Mission

VDOT Mission:
Our mission is to plan, deliver, operate, maintain and support a transportation system that is safe, enables easy movement of people and goods, enhances the economy and improves our quality of life.

Transportation and Mobility Planning Division Mission:
Use performance-based planning to identify problems, work cooperatively with stakeholders, and develop prioritized, targeted solutions that can be readily implemented.
Division Structure

Planning reports to the Chief Engineer and plays critical role in project development

Division Director
Marsha Fiol

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<th>Assistant Director—Ben Mannell, AICP</th>
<th>Assistant Director—Terrell Hughes, PE</th>
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Central Office—34 Staff
- Procedures, Program Management
- Guidance, Technical Assistance
- Complex Project Management

9 District Offices—approx. 34 Staff
- SMART SCALE leads
- Planning study leads
- Oversight of regional planning efforts at MPOs and PDCs
Where do Projects Come From?

...Planning!

Local

Regional

State

Federal/state mandates
What is Planning’s Role in Project Development?

- VTrans Vision, Needs and Priorities
- Planning Data Sources
- Arterial Preservation, STARS and Corridor Planning Programs
- Public Involvement
- Regional Planning
Project Development and Funding Today

- Performance-based
- Addressing underlying issues and looking for greatest return on investment
- Accelerated project development - projects fully funded
- Engagement with decision-makers and public early on
Data Resources:

- Historic Crash Pattern
- Future Improvements Identified
- Funding Identified
- Planning Time Index
- Economic Development Impact
- Annual Average Daily Traffic
- Origin-Destination
- Structures
- Travel Surveys
- Environmental
- Employment
- Travel Time Index
- Census
- Pavement
- Buffer Time Index
- SMART SCALE
- District and Local Support
- Economic Development Impact
- Duration of Congestion
- PSI Rating - Segment
- District and Local Support
- Funding Identified
- Travel Surveys
Data Resources: Supporting Project Development

- SMART SCALE = Data Driven Process
  - Mapping of key performance metrics
  - Correlating SMART SCALE applications to issues is the first step to successful applications
- Using data for other funding programs
  - Not a requirement, but can help
  - Makes applications more defensible
Planning Data Sources- Pathways 4 Planning

https://VDOTP4P.com/  Email: P4P@vdot.virginia.gov

Using “Big Data”
• Sharing
• Querying
• Absorbing

Objective:
• Targeted solutions
• Funded projects
Data Resources: Forecasting

Travel demand modeling program—used to support planning process

• Traffic forecasts
• Alternative transportation scenarios
• Policies

Can help answer questions such as:

• When will a trip be made?
• Where are people and goods traveling?
• How are people and goods traveling?
• Which route will they take to complete the trip?
Developing Candidate Projects

Planning

- Regional Plans Developed by MPOs and PDCs
- Transit Development Plans
- Local Comprehensive Plans
- Planning Studies/STARS
- Asset Condition Assessments
- Strategic Highway Safety Plan
- VTrans Multimodal Transportation Plan (VMTP)

Candidate Projects

- State of Good Repair
- Highway Safety Improvement Program
- SMART SCALE
- CTB Selection
- Revenue Sharing
- Transportation Alternatives Program

Six-Year Improvement Program
Public Involvement

**VDOT Planning Policy:**

- Requires all planning studies to include a public involvement component

- Encourages use of virtual public involvement, alternatives to traditional engagement

- Critical with SMART SCALE where concepts and estimates quickly become projects and budgets
Planning studies offer a high return on investment

- 103 studies since 2010
- Planning studies led to $927M in projects in the SYIP
- 46 studies underway
Arterial Preservation Program

Designed to **preserve and enhance the safety and capacity** of arterial highways - plan now to reduce future costs

Program Goals

- Increased safety for all users
- Local economic development goals are integrated
- Mainline through traffic is served with priority
Special Studies

- Tasked with major studies such as I-81 and I-95 Corridor Improvement Plans
- I-64 Corridor Improvement Plan is currently underway
STARS Program
(Strategically Targeted Affordable Roadway Solutions)

Study Area Selection
- Data-driven
- Stakeholder involvement

Conduct Detailed Analysis
- Safety
- Congestion
- Operations
- Solutions

Prioritize Recommendations
- BCA
- Coordination
- Advance to SYIP

Programming and Implementation
- Pipeline of projects
- Supported by multiple funding sources
Planning: Approach

- Multidisciplinary
- Data-driven

- Accelerated Process
- Tests Concepts

- Improving Accuracy
- Implementable, Targeted Solutions

VDOT
Localities
MPOs/PDCs
Federal Highway
Other state agencies
Institutions
Why are Arterial Preservation and STARS Important to Project Delivery?

They create a project development pipeline that readily feeds the SYIP

Data driven

Accuracy of cost estimates and schedules

Solutions that can be funded in the SYIP
SMART SCALE Support

Planning Division:
- Assists in screening applications
- Leads congestion and accessibility measure scoring, assists in environmental measure

District Planners:
- Serve as SMART SCALE POCs
- Review all applications and project changes after funding
Statewide Bicycle and Pedestrian Program

Interactive Facility Map

Bike/Ped Count Program
Transportation Demand Management

• Focus Areas
  • Park & Ride Lots
  • HOV Lanes
  • Slugging
  • Innovation / Technology
  • DRPT Coordination

Safe Routes to School Program

• Focus Areas
  • Non-Infrastructure grants
  • Mini-grants
  • Crossing Guard Appreciation Day
  • Transportation Alternatives Grant coordination
A project makes it into the SYIP- now what?

Planning Boundaries/ Functional Classification/ National Highway System

MPO Constrained Long Range Plans and Transportation Improvement Programs
Metropolitan Planning Organizations (MPOs)

- 15 MPOs within Virginia
- District Planners serve as lead and provide program oversight
MPO Planning and Programming Documentation

**CLRP**
A minimum 20-year plan that includes long range and short-range multimodal transportation strategies/actions

**TIP**
A minimum 4-year plan reflecting investment priorities identified in the CLRP

**How are the CLRP and the TIP related?**

All regionally significant construction and maintenance projects, regardless of funding, must be in both the CLRP and TIP if they are within an MPO.

A project cannot move forward unless it is included in the MPO adopted CLRP, TIP, and federally approved STIP.
Resources

**Arterial Preservation Program:**
http://www.virginiadot.org/projects/arterial_management_plans.asp

**STARS Program:**
http://www.virginiadot.org/projects/stars.asp

**Park and Ride Program:**
https://www.virginiadot.org/travel/parkride/faqs.asp

**Bicycle and Pedestrian Program:**
http://www.virginiadot.org/programs/bikeped/default.asp

**Safe Routes to School Program:**
http://www.virginiadot.org/programs/ted_Rt2_school_pro.asp
QUESTIONS?