

MANAGED LANES

Managed Lanes Research In Texas

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Seattle, WA**

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Presentation Overview

- Background & Overview
- Complete Work
- Work Underway
- Upcoming Efforts
- Final Remarks



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Managed Lanes

“A facility that increases freeway efficiency by packaging various operational and design actions. Lane management operations may be adjusted at any time to better match regional goals.”

- TxDOT Project Monitoring Committee



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Possible Vehicle User Groups

- SOV
- HOV
- Bus/BRT
- Truck
- ILEV
- Taxi, shuttle
- Emergency vehicles
- Motorcycles
- Future rail


Selection of user groups will depend upon

- ✓ Corridor characteristics
- ✓ Project goals/objectives
- ✓ Policy issues

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Selection of user groups will drive

- ✓ Design
- ✓ Operations
- ✓ Enforcement
- ✓ Technology





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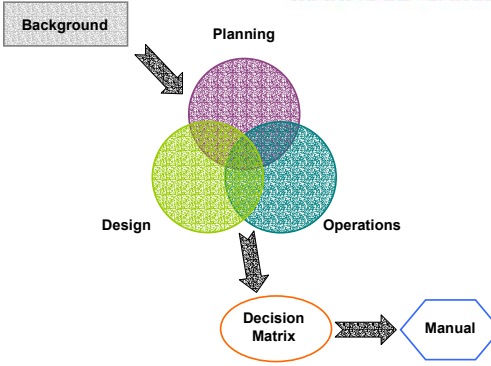
TxDOT Managed Lanes Research

. . . to develop a better understanding of how managed lanes can improve mobility for people and freight.

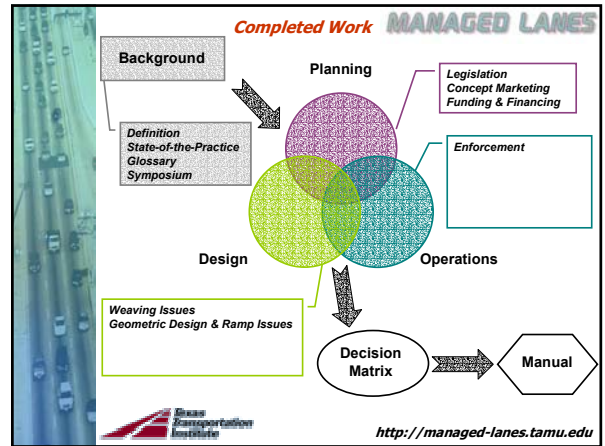
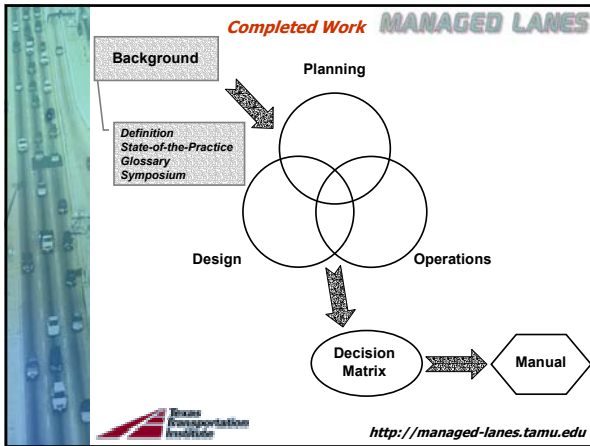


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State & Federal Legislation

- Recommended changes to allow all operational options
- Recent Texas legislation
 - ✓ Defines & permits exclusive lanes
 - ✓ Gives state and counties authority to create lane restrictions
 - ✓ Gives state authority to designate exclusive lanes
 - ✓ Corrects problem with municipal law for lane restrictions



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Concept Marketing

- Guidelines for marketing managed lanes
- Development of user-friendly brochures
- Extremely popular



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Funding & Financing

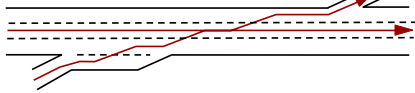
- Highlighted types of financing available to a managed lanes project
- Critical to match financing method to project goals
 - ✓ What is being managed?
- Leverage monies
- Recent Texas legislation benefits alternative funding of managed lanes

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Ramp & Weaving Issues



- Minimum weaving lengths for different geometries and expected volume levels
- Look at providing direct connect ramps


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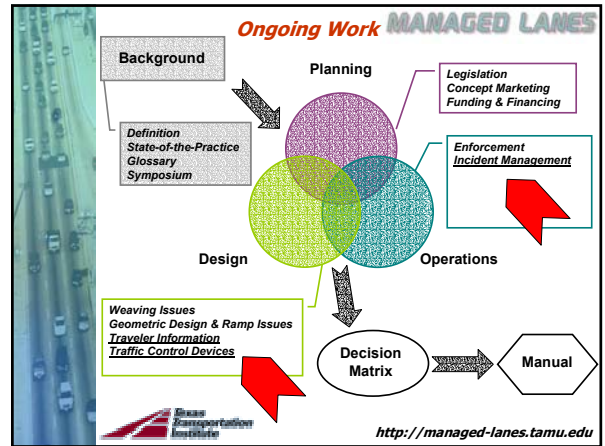
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Enforcement

- Role of enforcement on managed lanes
- State-of-the-practice in enforcement around the country including responsible agencies
- Enforcement area design guidelines
- Automated enforcement technology
 - ✓ Automated vehicle identification (AVI)
 - ✓ License plate recognition (LPR)
 - ✓ Electronic toll collection (ETC)




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Traveler Information

- Matrix with user information needs as a function of user group and facility type
- Important to identify target user – familiar vs. unfamiliar
- Closely coordinated with traffic control devices activities




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Traffic Control Devices

- Use traveler information needs to assess traffic control device needs
- Identify best way to provide that information
- Focus groups
- Testing of experimental signs
- Guidelines
- Potential changes to the MUTCD



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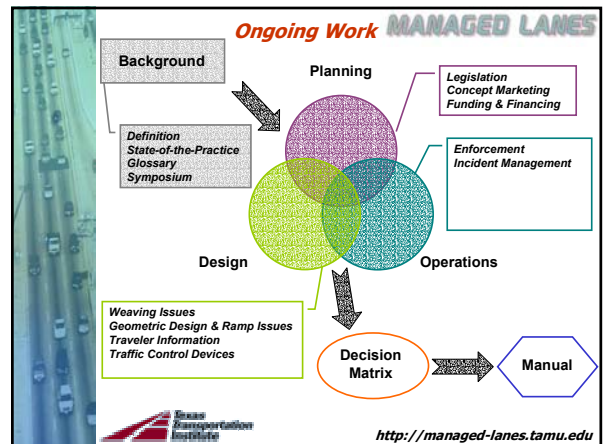
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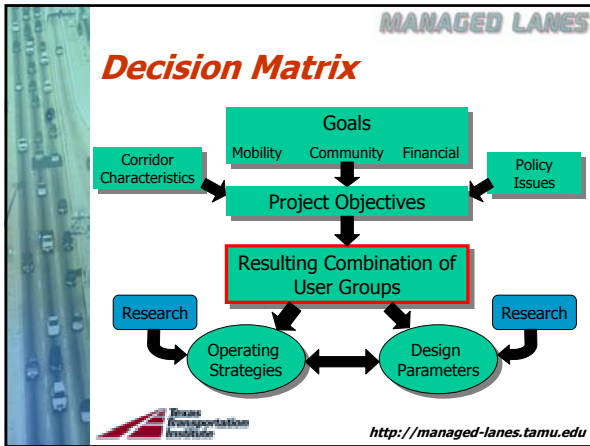
Incident Management

- Identify appropriate strategies for managing incidents
- Matrix matching strategies to user needs, facility type
- Consider agencies involved



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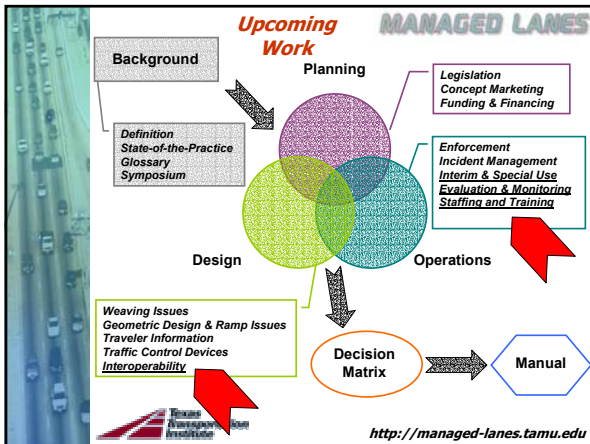
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Interim Managed Lanes Manual

- **Four chapters to date**
 - ✓ Guide
 - ✓ Introduction
 - ✓ Planning
 - ✓ Design
- **Others to be developed and draft framework established**



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Final Remarks

- **Flexibility to maximize freeway efficiency and managed lane effectiveness 24/7**
- **Type of managed facility needed in a corridor depends on corridor characteristics**

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Web Site & Newsletter


List: 350 Members

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Questions?

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