Expediting Planning and Environmental Review of Infrastructure Projects

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ACEC Environment and Energy Committee – Denver, CO

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1. Identify causes of project delay during planning, NEPA and permitting
2. Identify, evaluate and describe successful expediting strategies
3. Make information useful to practitioners
• Research Method
• Case Study Approach
• Causes of Delay (Constraints)
• Expediting Strategies
Research Method

1. Literature search
   - Existing research
   - Federal and state programs and databases

2. Identify successful Case Studies (13)
   - Transportation
   - (also Energy and Telecommunications)

3. Interview case study project teams

4. Evaluate the constraints (16) and successful expediting strategies (24) they used
What are the Constraints to Expediting?

- Avoiding decisions through continual analysis
- Conflicting resource values
- Difficulty agreeing on impacts or mitigation
- Inability to maintain agreements
- Ineffective internal communication
What are the Constraints to Expediting? (cont)

- Inefficient agency consultation
- Inordinate focus on singular issue
- Insufficient public engagement or support
- Issues arise late in process
- Lengthy review/revision cycles
- Negative or critical coverage from the media
What are the Constraints to Expediting (cont)?

• Relocation process delays
• Revisiting past decisions
• Shortage of dedicated staff
• Slow decision making
• Stakeholder controversy and opposition
• Unusually large or complex project
Expediting Strategies

24 Strategies
Organized in Six Groups (overlap)

1. Improve internal coordination and communication
2. Streamline decision-making
3. Improve resource agency involvement and collaboration
4. Improve public involvement and support
5. Demonstrate real commitment to the project
6. Coordinate work across phases of delivery
### Constraints by Stage of Delivery

#### Strategy

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<thead>
<tr>
<th>Change-Control Practices</th>
<th>Early Planning</th>
<th>Corridor Planning</th>
<th>NEPA</th>
<th>Design/ROW Permitting</th>
<th>Construction</th>
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<tr>
<th>Consolidated Decision Council</th>
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<th>Context Sensitive Design/Solutions</th>
<th>Early Planning</th>
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<th>Coordinated and Responsive Agency Involvement</th>
<th>Early Planning</th>
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<th>Dispute Resolution Process</th>
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<th>DOT-Funded Resource Agency Liaisons</th>
<th>Early Planning</th>
<th>Corridor Planning</th>
<th>NEPA</th>
<th>Design/ROW Permitting</th>
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#### Timing of Implementation and Benefit

- **Early Planning Phase**
- **Corridor Planning Phase**
- **NEPA Phase**
- **Design/ROW/Permitting Phase**
- **(Construction Phase)**

#### Risk Management

- **Early Planning Phase**
- **Corridor Planning Phase**
- **NEPA Phase**
- **Design/ROW/Permitting Phase**

#### Real-Time Collaborative Interagency Reviews

- **Early Planning Phase**
- **Corridor Planning Phase**
- **NEPA Phase**
- **Design/ROW/Permitting Phase**

#### Regional Environmental Analysis Framework*

- **Early Planning Phase**
- **Corridor Planning Phase**
- **NEPA Phase**
- **Design/ROW/Permitting Phase**

#### Strategic Oversight, Readiness Assessment

- **Early Planning Phase**
- **Corridor Planning Phase**
- **NEPA Phase**
- **Design/ROW/Permitting Phase**

#### Team Co-location

- **Early Planning Phase**
- **Corridor Planning Phase**
- **NEPA Phase**
- **Design/ROW/Permitting Phase**

#### Tiered NEPA Process

- **Early Planning Phase**
- **Corridor Planning Phase**
- **NEPA Phase**
- **Design/ROW/Permitting Phase**

#### Up-Front Environmental Commitments

- **Early Planning Phase**
- **Corridor Planning Phase**
- **NEPA Phase**
- **Design/ROW/Permitting Phase**
Product: “Fact sheet” for each Strategy

- Strategy Definition
- What constraints does it address?
- When to apply - phase and decision points
- Effectiveness, Risks, Benefits
- Examples and Citations
- Applicability
Strategies: Improve Internal Coordination and Communication

- Facilitation to Align Expectations
- **Risk Management**
- Project Change Control
- Readiness Assessment
- Team Co-location
Strategy: Risk Management

Purpose
– Identify/ manage risks that can delay project or raise costs

What it is
– Systematically identify risks (uncertain events) with positive or negative effect on project schedule, scope, budget, or quality
– Actively address risks: assess, predict; develop risk responses; monitor and update
– Take action to reduce the probability or impact of a risk

Schedule Effects
– Increases schedule predictability; reduces surprises
Strategy: Risk Management (cont)

Cost Effects

– Adds a line-item to project budgets
– Substantial cost savings when risks are reduced/mitigated

Risks

– Does not cause any substantive new risks

Other Benefits

– Builds internal trust
– Better predictability builds external relationships

Applicability/Transferability

– Transferable, on a program or large project basis
– Models available: Caltrans, WSDOT
Strategies: Streamlining Decision-making

- Readiness Assessment
- Expedited Internal Review and Decision-making
- Decision Council
Strategy: Expedited Internal Review and Decision-making

Addresses following constraints:
- Slow, unclear internal decision-making or communication
- Lengthy internal reviews
- Unusually large scale and complex projects or program
- Avoiding policy decisions through analysis

What it is
- Departmental commitments
- Clear decision-making procedure, assignments and authority
- Accountability to meet or beat internal deadlines

Schedule Effects
- Takes time up front to effectively change procedures and roles
- Faster internal decisions
- Demonstrated commitment can speed other internal work
Strategy: Expedited Internal Review and Decision-making (continued)

Cost Effects
- Reduced project planning and design costs; reduced inflation effects
- Need to spend effort up-front to establish commitments

Risks
- Reduces most risks
- **Risks forcing decisions before they are ready**

Other Benefits
- **Can help build transparency**
- Can help build relationships and trust

Applicability/Transferability
- Highly transferable but customize to fit project and agencies
- Most cost effective for large project or program of projects
- Address internal opposition to changing procedures and roles
- Leadership directive may improve success
Strategies: Improve Resource Agency Involvement and Collaboration

- Dispute Resolution Process
- **Performance Standards**
- Real time Review
- Batched/Programmatic Permits
- Regional Env Analysis Framework
- Funded Agency Liaisons
Strategy: Performance Standards

Purpose

– Avoid delaying permitting for want of design details
– Avoid getting stuck debating speculative impacts
– Avoid expensive, sometimes unworkable overdesign
– Compel earlier resolution of conflicts

What it is

– Permit conditions based on defined outcomes to be achieved by future design/construction decisions
– Make conditions agreeable to design, construction, maint.

Schedule Effects

– Streamlines project-specific negotiations
– Helps ensure adequate staffing, expertise, monitoring
Cost Effects
- Cost savings: efficient communication, avoid bogging down in detail; frontloads permitting costs for a program

Risks
- DOT carries more risk; resource agencies less
- Less risk of resource agency dictating design, means

Other Benefits
- Can help build transparency
- Can help build relationships and trust

Applicability/Transferability
- Beneficial where resource agencies are esp. risk averse
- Best where DOT is concerned about resource agencies’ dictating technologies/approaches
Strategies: Improve Public Involvement and Support

- Highly responsive PI
- CSS/CSD
- Media Relations Manager
Strategy: Highly Responsive Public Involvement

Purpose: To improve constructive public involvement and reduce:
- Issues arising late in process
- Stakeholder controversy and opposition
- Negative or critical coverage from the media
- Inability to maintain agreements

What it is
- **Significant public engagement, and response**
- **Input influences process, documentation, design**
- Community Impact Assessment example

Schedule Effects
- Reduces delay from conflict, opposition
- Can increase early PI duration
Strategy: Highly Responsive Public Involvement (continued)

Cost Effects
– Higher planned PI costs, but may reduce unplanned costs
– Reducing delay reduces costs

Risks
– Could result in higher mitigation costs
– May raise unrealistic expectations

Other Benefits
– Builds public trust; gains public supporters

Applicability/Transferability
– Highly transferable: any agency or project
– Most benefit for controversial and large projects
Strategies: Demonstrate Real Commitment

• Early Construction Funding Commitment
• Upfront Environmental Commitment
Purpose:

– to avoid delays from protracted debate on environmental impacts and mitigation

What it is

– Early and substantial commitment to environmental protection, restoration, mitigation

Schedule Effects

– Reduces negotiation and other process delays
– Allows faster decision-making
Strategy: Upfront Environmental Commitments (continued)

Cost Effects
- May increase direct mitigation costs
- Reduces costs associated with process and delay

Risks
- More mitigation than regs require; precedent
- Violate avoidance, minimization requirements

Other Benefits
- Better relationships; positive image

Applicability/Transferability
- Highly transferable
- Early funding commitments may not be allowed in some states
Strategies: Coordinate Work Across All Phases of Project Delivery

- Planning level Screening
- Planning and Environmental Linkages
- Regional Environmental Analysis Framework
- Tiered NEPA process
Purpose

- Reduce time / effort to develop range of alternatives, evaluate alternatives, and produce environmental documentation

What it is

- Conduct early planning so that it can be used in NEPA (env data, agency involvement, outreach)
- Use planning decisions and info in NEPA process
- Leverage data, analysis, decisions from planning phase in NEPA

Schedule Effects

- Minimizes re-analysis and re-visiting prior decisions
- Increases likelihood that NEPA will begin with concepts responsive to public and environmental concerns
Cost Effects
- Additional costs in planning phase
- Savings result by reducing repetition

Risks
- Reduces risk of uncovering new environmental issues
- Work may “expire” and need to be redone

Other Benefits
- Can make process more transparent and intelligible

Applicability/Transferability
- Funding up front can be a challenge
- SAFETEA-LU requires consideration of environment, consultation and mitigation in statewide & metro planning
Using the Information:
Website and Expediting Assessment Tool
IT Assistant available in TCAPP web portal

Web-based assistant for identifying helpful strategies: www.transportationforcommunities.com

Poses a series of questions for individual or group use

Estimates your “risk” of encountering delays

Suggests strategies from the report that may apply

Suggests links to other resources in TCAPP
Expediting Questions

Expediting Project Delivery Assessment

Please respond to the following statements based on your current situation. The assessment takes only a few minutes, and you can skip any section. A Summary Report with your results and all strategies is available at the end.

You may also take the assessment off-line as an individual or as a group. The Assessment Statements (2 pg, 39.2 KB) and Supporting Strategies (92 pg, 1.5 MB) provide you with all information in a printable format.

<table>
<thead>
<tr>
<th>Avoiding policy decisions through continual analysis</th>
<th>Disagree</th>
<th>Mildly Agree</th>
<th>Moderately Agree</th>
<th>Strongly Agree</th>
<th>N/A</th>
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<tr>
<td>Project decisions are delayed or protracted due to unexpected requests for additional analysis or for more information.</td>
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<th>Disagree</th>
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<th>N/A</th>
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<td>Conflicts between resource values and/or between the advocates for those resources delay project decision-making.</td>
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<td>Stakeholders are critical of the project's adverse effects.</td>
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<td>There is considerable concern or controversy regarding the project's adverse effects (real or perceived).</td>
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Expediting Project Delivery - Results

Your responses may suggest that there are some areas in which expediting project delivery is currently challenging. **Potential Risks** are identified to help you evaluate priorities. If your score indicates **Weak** or **Average** with respect to any of the constraints, you should consider the related strategies in **Things You Can Do** to increase your chances of success. If your score is **Strong**, you are well on your way. However, you may wish to review the strategies provided to see if there is something new you might consider for the future. Keep in mind that your area of greatest weakness may significantly affect your score. Compare your responses in each constraint to the resulting strategies to see if you can more closely pinpoint your challenges.

**How TCAPP Can Help** points to areas of the site with information which may also assist in addressing the constraint. As your process evolves, it may be useful to return to the Assessment to chart progress or to plan for a new project. You may also print the Summary Report which will include your responses as well as scores and strategies.

- **Conflicting resource values**
  - Effectiveness Score: **Weak**
  - Risks To Project Delivery
  - Things You Can Do
  - How TCAPP Can Help

- **Difficulty agreeing on impacts/mitigation**
  - Effectiveness Score: **Weak**
  - Risks To Project Delivery
  - Things You Can Do
  - How TCAPP Can Help

- **Avoiding policy decisions through continual analysis**
  - Effectiveness Score: **Strong**
  - Risks To Project Delivery
  - Things You Can Do
  - How TCAPP Can Help
Other Lessons and Observations

• Common Success Factors:
  – Rigorously identified their key schedule risks
  – Implemented strategies to address those risks
  – Deliberate and committed integration of strategies into project delivery
  – Monitored progress and adjusted as needed
What does it mean for committee?

- How can these strategies be used in other sectors?
- What other agencies would benefit?
- What can be learned from other sectors?
- Any benefit from legislative action?

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Contact Information

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