Community Advisory Committee Meeting

February 27, 2014
Today’s Topics

• Welcome & Introductions
• Hennepin County Bike Task Force Recommendation
• Public Engagement Update
  ▪ February Town Hall Recap
• Project Update
  ▪ Draft Reports
• Member and Committee Reports/Public Forum
• Adjourn
Hennepin County Bike Task Force Recommendation
February Town Hall
Community Meetings
February 10 & 12 Town Hall Community Meetings

• Opportunity to:
  ▪ Ask questions and provide verbal testimony on draft water resources and freight rail relocation studies
  ▪ Share community concerns with public officials

• 625+ attendees

• 75+ written comments received
February 10 and 12 Town Hall Meetings

Minneapolis Feb 10
February 10 and 12 Town Hall Meetings

St. Louis Park Feb 12
February 26 Presidential Visit

Photo: Pioneer Press
February 26 Presidential Visit

Photo: Pioneer Press
Water Resources
Draft Report Discussion
Independent Consultant’s Draft
Conclusions / Recommendations

- No fatal flaws with the shallow LRT tunnel design
- Add lateral and nested piezometers
- Collect seasonal water level data
- Complete a comprehensive capacity analysis for sanitary and storm sewer systems
- Design the underground infiltration chambers for the 100-year design storm event
Independent Consultant’s Draft Recommendations (continued)

• Incorporate stormwater pre-treatment devices in the design

• Complete a Phase II Environmental Site Assessment

• Revise the draft Water Monitoring Plan
  ▪ Determine key monitoring locations
  ▪ Define parameter and threshold criteria
  ▪ Monitor infiltration chamber system
  ▪ Sample groundwater quality near chambers and sites in the corridor away from the chambers

• Sample and analyze groundwater for hydrocarbons, chlorides, other potential contaminants
Barr Engineering Memo

• Prepared for City of Minneapolis and MPRB
• Received by SPO Jan. 16, 2014
• Issues and Questions in Memo
  ▪ Effectiveness of sheet pile sealing and seal pour performance
  ▪ Groundwater and surface water
  ▪ Proposed bored twin tunnels
  ▪ Ground movements and impacts to adjacent structures
  ▪ Vibration impacts of freight and LRT on shallow LRT tunnels
  ▪ Maintenance considerations
• Response sent to City and MPRB Feb. 14, 2014
Freight Rail Relocation
Draft Report Discussion
DEIS & SPO Freight Rail Relocation Designs Alternatives
TranSystems’ Draft Report
Preliminary Conclusions

• Identified two viable routes
  ▪ Kenilworth Corridor (current route)
  ▪ MN&S North concept
TranSystems’ MN&S North Concept
TranSystems’ MN&S North Concept
TranSystems’ MN&S North Concept

Section 1: Existing Railroad/County Right of Way with Proposed Improvements

- Proposed Alignment North Wye Segment
- T90' Clear Between Turnouts
- Begin Double Track Structure at STA 134+00
- 2' Offset in Length

Proposed alignment: -
- Concrete barrier between passenger trains, 100' NEC
- Existing ROW
- Proposed: 21B RH turnout
- Adjacent Trail Alinement
- Fencing barrier
- Existing ROW

Potential SWLRT station location

DATE
JANUARY 2014
SCALE
1" = 300'

Exhibit 3
SPO Freight Relocation Design
Modified MNS Connection
TranSystems Alternative

EDEN PRAIRIE | MINNETONKA | EDINA | HOPKINS | ST. LOUIS PARK | MINNEAPOLIS

GREEN LINE LRT EXTENSION
SOUTHWEST 4
TranSystems’ MN&S North Concept
TranSystems’ MN&S North Concept
TranSystems’ MN&S North Concept
Freight Rail Relocation Draft Report Discussion

- Safety considerations
- Property impacts
- Cost
- Operational considerations
Safety Considerations
## At-Grade Freight Rail Crossings Comparison

<table>
<thead>
<tr>
<th>Element</th>
<th>Kenilworth Route</th>
<th>MN&amp;S North Route</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Existing No. Crossings</strong></td>
<td>4</td>
<td>6</td>
</tr>
<tr>
<td>Wooddale</td>
<td></td>
<td>Walker</td>
</tr>
<tr>
<td>Beltline</td>
<td></td>
<td>Library</td>
</tr>
<tr>
<td>Cedar Lake</td>
<td>21st</td>
<td>Lake</td>
</tr>
<tr>
<td>21st</td>
<td></td>
<td>Dakota</td>
</tr>
<tr>
<td>29th</td>
<td></td>
<td>29th</td>
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<td>28th</td>
<td></td>
<td>28th</td>
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<tr>
<td><strong>Proposed No. Crossings</strong></td>
<td>4</td>
<td>2</td>
</tr>
<tr>
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</table>
# At-Grade Freight Rail Crossings Comparison

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<th>Element</th>
<th>Kenilworth Route</th>
<th>MN&amp;S North Route</th>
</tr>
</thead>
<tbody>
<tr>
<td>TranSystems Average Daily Traffic (ADT)</td>
<td>22,000</td>
<td>14,000</td>
</tr>
<tr>
<td>SPO 2013 ADT</td>
<td>33,600</td>
<td>15,000</td>
</tr>
<tr>
<td>TranSystems Average Daily Trains One Way</td>
<td>5</td>
<td>7</td>
</tr>
<tr>
<td>SPO Average Daily Trains One Way</td>
<td>3</td>
<td>5</td>
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</table>
### Proximity to Schools and Residential Units

<table>
<thead>
<tr>
<th>Element</th>
<th>Kenilworth Route</th>
<th>MN&amp;S North Route</th>
</tr>
</thead>
<tbody>
<tr>
<td>TranSystems</td>
<td></td>
<td></td>
</tr>
<tr>
<td>No. of schools within 150’ of tracks</td>
<td>0</td>
<td>2</td>
</tr>
<tr>
<td>TranSystems</td>
<td></td>
<td></td>
</tr>
<tr>
<td>No. of residential units within 150’ of tracks</td>
<td>367</td>
<td>140</td>
</tr>
<tr>
<td>SPO</td>
<td></td>
<td></td>
</tr>
<tr>
<td>No. of schools within 150’ of tracks</td>
<td>0</td>
<td>2</td>
</tr>
<tr>
<td>SPO</td>
<td></td>
<td></td>
</tr>
<tr>
<td>No. of residential units within 150’ of tracks</td>
<td>SLP: 250, MPLS: 500</td>
<td>SLP: 230, MPLS: 10</td>
</tr>
</tbody>
</table>
Property Impacts
## Property Impacts Requiring Relocation Comparison

<table>
<thead>
<tr>
<th>Full Permanent Acquisition*</th>
<th>Kenilworth Route</th>
<th>MN&amp;S North Route</th>
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</thead>
<tbody>
<tr>
<td>Residential</td>
<td>0</td>
<td>6</td>
</tr>
<tr>
<td>Private Business**</td>
<td>0</td>
<td>7</td>
</tr>
<tr>
<td>School***</td>
<td>0</td>
<td>1</td>
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</tbody>
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* Numbers do not include acquisitions required for Southerly Connection, which are common to both routes

** Includes STEP Food Shelf property

*** Metropolitan Open School
Cost
Cost Terminology

• $2013: Capital improvement costs
  ▪ Based on 2013 unit costs

• $YOE: Year of expenditure costs
  ▪ Includes:
    o Capital improvements and ROW based on 2013 unit costs
    o Contingency costs
    o Design related costs
Kenilworth Corridor Shallow LRT Tunnels

<table>
<thead>
<tr>
<th>Element</th>
<th>$YOE (M)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Base Costs</td>
<td>$150 – $160</td>
</tr>
<tr>
<td>Common Elements</td>
<td>$85 - $90</td>
</tr>
<tr>
<td>TOTAL</td>
<td>$235 - $250</td>
</tr>
</tbody>
</table>

- Common elements’ primary cost drivers:
  - Freight rail track
  - Freight rail bridges
  - CP ROW swap
  - Southerly connection (Bass Lake Spur to MN&S Spur)
# TranSystems’ MN&S North Concept Cost Estimate

<table>
<thead>
<tr>
<th>Element</th>
<th>$2013 (M)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Capital Improvements</td>
<td>$60</td>
</tr>
<tr>
<td>Common Elements</td>
<td>$26</td>
</tr>
<tr>
<td>Right-of-Way</td>
<td>$0*</td>
</tr>
<tr>
<td>Engineering (5%)</td>
<td>$4</td>
</tr>
<tr>
<td>Contingency (25%)</td>
<td>$22</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td><strong>$112</strong></td>
</tr>
</tbody>
</table>

* TranSystems’ estimate does not include ROW costs
TranSystems’ MN&S North Concept Cost Estimate: SPO Identified Additions and Adjustments

• Right-of-Way in $2013:
  ▪ Add $20-$25M

• Additional Common Elements in $2013:
  ▪ Add $40-$45M:
    o Freight track from TH 169 to Blake
    o CP ROW swap (ROW cost)
    o Southerly connection (ROW cost)

• Adjust engineering and contingency:
  ▪ Add $35-$40M

• Adjust to $YOE:
  ▪ Add $15-$20M
## TranSystems’ MN&S North Concept Cost Estimate

<table>
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<tr>
<th>Element</th>
<th>Original $2013 (M)</th>
<th>Adjusted (M)</th>
</tr>
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<tbody>
<tr>
<td>Capital Improvements</td>
<td>$60</td>
<td>$60*</td>
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<tr>
<td>Common Elements</td>
<td>$26</td>
<td>$65-$70*</td>
</tr>
<tr>
<td>Right-of-Way</td>
<td>$0</td>
<td>$20-$25*</td>
</tr>
<tr>
<td>Engineering/Contingency</td>
<td>$26</td>
<td>$60-$65*</td>
</tr>
<tr>
<td>YOE</td>
<td>$0</td>
<td>$15-$20</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td><strong>$112</strong></td>
<td><strong>$220 - $240</strong></td>
</tr>
</tbody>
</table>

* 2013 Costs
TranSystems’ MN&S North Concept
Unaccounted Costs

• Additional retaining walls for LRT
  ▪ Blake to Louisiana
• Additional Right-of-Way
  ▪ Skunk Hollow Rail Customer
  ▪ Property along North Frontage Road
  ▪ 27th Street Properties
• Freight track removal – Bass Lake Spur/Kenilworth
  ▪ MN&S to Cedar Lake Junction
• North Cedar Lake Trail Bridge (Iron Triangle)
• Xcel Substation Impacts
Cost of Project Delay

• The cost of project delay assumptions:
  - $1.553 B project
  - 3% escalation per year
  - $45 - $50 M
# Freight Rail Cost Comparison ($YOE)

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<tr>
<td><strong>TOTAL</strong></td>
<td><strong>$235 - $250</strong></td>
<td><strong>$220 - $240</strong></td>
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Comments on Draft Reports
Due March 3, 2014

- Online: www.SWLRT.org
- Email: SWLRT@metrotransit.org
- U.S. Mail
- Filling out a comment card
Next Steps

- Independent consultants publish final reports

- SWLRT Corridor Management Committee recommends project scope and budget to the Met Council

- Met Council votes on project scope and budget

- Met Council submits Municipal Consent plans to cities/county
Member and Committee Reports/
Public Forum
More Information

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Twitter:
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