Corridor Management Committee

February 3, 2021
Today’s Topics

• Chair’s Update
• Project Update
• 2021 Construction Look Ahead
• Light Rail Vehicles
• DBE & Workforce
• Communications & Outreach
Chair’s Update

Charlie Zelle
Met Council Chair
Project Update

Jim Alexander
SWLRT Project Director
2020 Construction Highlights

• Received FFGA on September 14
• Civil construction: 35% complete
• Under construction:
  ▪ 8 stations underway out of 16
  ▪ 23 bridges underway or completed out of 29
  ▪ 5 tunnels underway out of 8
  ▪ 47% of retaining wall work completed: 127 walls total
• 94% of 946 private utilities completed
• 65% of nearly 1,300 public utilities completed
• Completed all 15 building demolitions
• Systems mobilized and in design and procurement
• Franklin O&M Facility modifications: 40% complete
• 11 LRVs delivered
Construction Challenges

• Corridor Protection Wall in Minneapolis
  - Approximately 1-mile corridor protection wall for an additional layer of protection between the BNSF freight & LRT trains
  - Added as a requirement of BNSF after final design and civil construction contracting
  - This element is not a surprise, we’ve completed analysis and design for the wall and have a fuller understanding of the challenges of constructing this project element in an active rail corridor
Key Issues: Corridor Protection Wall

• Location of Corridor Protection Wall

• Construction factors include:
  ▪ Work adjacent an active freight railroad
  ▪ Confined work area with limited access
  ▪ Impacts project schedule
Corridor Protection Wall
Corridor Protection Wall

Example of section near Bryn Mawr Meadows
Construction Challenges

- **Secant Wall in Minneapolis (Kenilworth Tunnel)**
  - Soil settlement during the initial construction of the tunnel, it was apparent an alternative construction method is needed
  - The secant wall will stabilize the soils while constructing the LRT tunnel
  - Taking this approach out of an abundance of caution to protect the foundations of adjacent buildings
Key Issues: Secant Wall

• Location of Secant Wall

• An alternative construction method to mitigate soil movement adjacent to existing buildings
  ▪ This method is due to unforeseen soil conditions (settling during construction activities)

• Construction factors include:
  ▪ Work adjacent to an active freight railroad
  ▪ Confined work area with limited access points
  ▪ Impacts project schedule
Secant Pile Wall

Secant wall to be constructed on the east side of the tunnel to provide support during construction of the tunnel.
Kenilworth Tunnel Construction

Original Plan

Modified Plan at Calhoun Isles Condominium and Parking Ramp

Sheet Pile Walls on each side of tunnel excavation

Sheet Pile Wall in Plan View

Secant Pile Wall in Plan View
Kenilworth Tunnel Construction

Original Plan

Modified Plan at Calhoun Isles Condominium and Parking Ramp

Sheet Pile Walls on each side of tunnel

Sheet Pile Wall

Secant Pile Wall
Example of a Secant Pile Wall
Construction Challenges

• Both of these elements are major projects by themselves; when taken together, they have a significant impact to the project’s overall schedule due to their scope and complexity

• Next steps:
  ▪ Corridor Protection Wall
    – Complete change order process
  ▪ Secant Wall
    – Complete design plans
    – Initiate & complete change order process for secant wall
    – Reach agreement on tunnel construction re-sequencing
    – Initiate & complete change order process for re-sequencing
  ▪ Update project schedule

• Communicate updates through established channels
2021 Construction Look Ahead
Eden Prairie
Southwest Station, Eden Prairie

Looking east: pile supports for bus loop

Looking west: construction of station waiting area and track foundation
Prairie Center Drive Bridge
Town Center Place, Eden Prairie
Eden Prairie Town Center Station
LRT bridge over Highway 494, Eden Prairie

The bridge is now almost complete with track to be placed in 2021
Flying Cloud Drive, Eden Prairie
LRT Bridge at Valley View Road, Eden Prairie
Nine Mile Creek Bridge, Eden Prairie
Golden Triangle Station, Eden Prairie
LRT Bridge at TH212/Shady Oak Road, Eden Prairie

Bridge piers: looking southeast towards Shop HQ and at right looking northwest towards Shady Oak/Highway 212
Eden Prairie: 2021 Construction Highlights

• SouthWest Station area piling and station/parking ramp construction
• The following bridges have deck work and/or finishing details (piling has concluded):
  ▪ Prairie Center Drive LRT bridge
  ▪ I-494 LRT bridge
  ▪ Valley View Road LRT bridge
  ▪ Nine Mile Creek LRT bridge
• Advance Eden Prairie Town Center Station
• Complete Phase 3 & 4 roadway and LRT construction on Flying Cloud Drive
Eden Prairie: 2021 Construction Highlights

- Advance Golden Triangle station
- Advance Shady Oak/Hwy 212 LRT bridge
- Advance retaining walls at City West Station
- Work on the south segment of Highway 62 LRT tunnel
- Install LRT track beginning at the west end
Eden Prairie: 2021 Construction Highlights
Minnetonka
Hwy 62 Tunnel Construction, Minnetonka
Retaining walls in the Opus area, Minnetonka
Smetana Bridge & Retaining Wall Construction, Minnetonka
Minnetonka: 2021 Construction Highlights

• Highway 62 LRT tunnel north segment ongoing through 2021
• Advance Opus Station
• Complete Smetana Road bridge: roadway opens mid-2021
• Continue work on Feltl Road bridge: close by-pass roadway late-2021
• Advance retaining walls
Minnetonka: 2021 Construction Highlights

Construction continuing on Smetana and Feltl roadway bridges

Yellow and Red Circle Drives have been reconnected. Eastbound traffic permitted.
Hopkins
Minnetonka-Hopkins Bridge
Shady Oak Station, Hopkins
11th Avenue Crossing
Downtown Hopkins Station
Blake Road Regional Trail
Underpass, Hopkins
LRT Bridge at Excelsior Boulevard, Hopkins
Hopkins: 2021 Construction Highlights

• Continue work on Minnetonka-Hopkins bridge through 2021

• Advance Shady Oak and Downtown Hopkins Stations

• Road impacts
  ▪ 8th Avenue South: utilities and roadway work
  ▪ Excelsior Boulevard: LRT bridge construction
  ▪ Blake Road North: regional trail underpass
Hopkins: 2021 Construction Highlights
St. Louis Park
Regional Trail and Freight Bridges at Minnehaha Creek, St. Louis Park
Regional Trail and Freight Bridges at Louisiana Avenue, St Louis Park
Trail Underpass at Louisiana Station
Regional Trail Underpass at Wooddale Avenue
TH-100 Freight Bridge, St. Louis Park
Regional Trail Bridge at Beltline Boulevard, St. Louis Park
St. Louis Park: 2021 Construction Highlights

• **Freight Rail**
  - Shift tracks to final alignment
    – Blake Road to Wooddale Avenue

• **Minnehaha Creek**
  - Demo freight bridge
  - Begin LRT bridge foundations

• **Louisiana Avenue Station area**
  - Demo freight rail bridge
    – Requires short term roadway closure
  - Begin LRT bridge foundations
  - Continue soil correction activity at station
  - Continue retaining wall work
St. Louis Park: Construction Highlights

• Wooddale Avenue Station area
  ▪ Install freight bungalow and complete traffic signals
  ▪ Begin station work

• TH 100
  ▪ Complete LRT bridge deck & abutment work
    – Requires short term highway closure

• Beltline Boulevard Station area
  ▪ Begin station work
  ▪ Complete pedestrian bridge
  ▪ Begin roadway work north of station area
  ▪ Retaining wall work
St. Louis Park: 2021 Construction Highlights

- Short term roadway closures anticipated in 2021
- South Cedar Lake Regional Trail is closed
- Roadway impacts to demolish old freight bridge
- Pedestrian underpass construction
- Trail and freight bridge construction

Legend:
- LRT Station
- LRT Alignment
- Bridge
- Freight Track Work
- Trail Tunnel
- Trail Bridge
- Pile Driving/Sheeting/Vibration Activity
- Building Activities
Minneapolis
Excavation at Kenilworth Tunnel, Minneapolis
New Freight Bridge over Cedar Lake Channel, Minneapolis
SWLRT Freight Rail Improvements

Old Freight Rail Track

New Freight Rail Track
Electrical Conduit Installation at 21st Street Station, Minneapolis
LRT Bridge Pier/Retaining Wall Construction and Freight Rail Shift at Glenwood Avenue, Minneapolis
LRT Bridge Pier Construction at Royalston Avenue/North 7th Street
Minneapolis: 2021 Construction Highlights

• Begin West Lake Street station
• Continue freight rail improvement work in Kenilworth corridor
• Advance Kenilworth LRT tunnel excavation and begin concrete work
• Advance Cedar Lake Channel LRT bridge
• Advance 21st Street station
• Begin retaining wall and foundation work at Bryn Mawr station
• Begin corridor protection wall
• Advance Glenwood/Royalston bridges and retaining walls
• Advance North 5th Avenue/North 7th Street LRT bridge
Minneapolis: 2021 Construction Highlights
Minneapolis: 2021 Construction Highlights
Franklin Operations and Maintenance Facility Modifications
Franklin OMF Modifications
Franklin OMF Modifications

- Wash/Sanding Bay Expansion
- Maintenance and Wash/Sanding Bay Expansion, and RCC Addition
Maintenance Bays: Wall Construction
West Runner: OCS Foundations
Systems
DC Feeder, Breaker FAT Testing
OCS Deflection Testing
Light Rail Vehicles
Light Rail Vehicles: 11 Vehicles Delivered
Type II Design

Type III Design
Light Rail Vehicles

- LRV 301
DBE and Workforce Update

Jon Tao
Met Council’s Office of Equal Opportunity
### DBE Achievement as of Nov. 30, 2020

<table>
<thead>
<tr>
<th>Contractor</th>
<th>Contract Description</th>
<th>Contract Amount</th>
<th>Contractor Billed to Date</th>
<th>DBE Billed to Date</th>
<th>DBE Date %</th>
<th>As of Date</th>
</tr>
</thead>
<tbody>
<tr>
<td>LMJV 16% Goal</td>
<td>Civil</td>
<td>$818,377,984</td>
<td>$384,176,819</td>
<td>$78,602,793</td>
<td>20.5%</td>
<td>11/30/20</td>
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<tr>
<td>APJV 12% Goal</td>
<td>Systems</td>
<td>$193,755,789</td>
<td>$43,191,292</td>
<td>$4,612,976</td>
<td>10.7%</td>
<td>11/30/20</td>
</tr>
<tr>
<td>LS Black 15% Goal</td>
<td>Franklin O&amp;M Exp.</td>
<td>$38,650,000</td>
<td>$10,203,578</td>
<td>$975,271</td>
<td>9.6%</td>
<td>11/30/20</td>
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<tr>
<td>17% Goal</td>
<td>Closed Contracts</td>
<td>$404,992</td>
<td>$404,992</td>
<td>$74,610</td>
<td>18.4%</td>
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<table>
<thead>
<tr>
<th>Contract Amount</th>
<th>Billed to Date</th>
<th>$ DBE to Date</th>
<th>% DBE to Date</th>
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<tbody>
<tr>
<td>15% Goal</td>
<td>$1,051,188,765</td>
<td>$437,976,681</td>
<td>$84,265,650</td>
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Civil DBE Participation as of Nov. 30, 2020

*DBE Goal for the Civil Contract is 16%
Systems DBE Participation as of Nov. 30, 2020

*DBE Goal for the Franklin Contract is 12%
Franklin DBE Participation as of Nov. 30, 2020

*DBE Goal for the Franklin Contract is 15%*
Civil Workforce Participation Percentage*

- November 2020: 62,677 hrs
- Civil Construction Total: 928,900 hrs

*Based on MDHR Workforce Report for November 2020
People of Color/Indigenous (POCI)
Civil Workforce Participation Cumulative*

- Total Women hours to date: 78,721 hrs

*Based on MDHR Workforce Reports through November 2020
Civil Workforce Participation Cumulative*

- Total POCI hours to date: 199,009 hrs

*Based on MDHR Workforce Reports through November 2020
Franklin O&M Workforce Participation Percentage*

- November 2020: 5,280 hrs
- Franklin O&M Facility Construction Total: 11,361 hrs

*Based on MDHR Workforce Report for November 2020
People of Color/Indigenous (POCI)
Franklin Workforce Participation Cumulative*

- Total Women hours to date: 1,380 hrs

*Based on MDHR Workforce Reports through November 2020
Franklin Workforce Participation Cumulative*

- Total POCI hours to date: 4,668 hrs

*Based on MDHR Workforce Reports through November 2020
Disaggregated DBE Data
SWLRT Construction Contracts Disaggregated*

- Construction Contracts Total: $1,051,188,765

<table>
<thead>
<tr>
<th>Ethnic Group</th>
<th>Women</th>
<th>Men</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asian Pacific</td>
<td>$277,743</td>
<td>$40,020,187</td>
<td>$40,297,930</td>
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<tr>
<td>Asian Subcontinent</td>
<td>$0</td>
<td>$1,900,001</td>
<td>$1,900,001</td>
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<tr>
<td>Black</td>
<td>$43,369</td>
<td>$11,238,299</td>
<td>$11,281,668</td>
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<tr>
<td>Hispanic</td>
<td>$715,140</td>
<td>$28,426,050</td>
<td>$29,141,190</td>
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<tr>
<td>Native American</td>
<td>$3,807,561</td>
<td>$15,589,155</td>
<td>$19,396,716</td>
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<tr>
<td>White Women</td>
<td>$115,999,701</td>
<td></td>
<td>$115,999,701</td>
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<tr>
<td><strong>Total</strong></td>
<td><strong>$218,017,205</strong></td>
<td></td>
<td><strong>20.74%</strong></td>
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*Contract values are as of 11/30/20 and includes: Civil, Systems, Franklin O&M Expansion, & OMF Demo
SWLRT Construction Contracts Disaggregated*

- Construction Contracts Total: $1,051,188,765
- DBE contracts total: $218,017,205 (20.74%)

*Contract values are as of 11/30/20 and includes: Civil, Systems, Franklin O&M Expansion, and OMF Demolition.
Civil Contract DBEs Disaggregated*

- Contract total: $817,292,497

<table>
<thead>
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<th>Ethnic Group</th>
<th>Women</th>
<th>Men</th>
<th>Total</th>
<th>Percentage</th>
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<tbody>
<tr>
<td>Asian Pacific</td>
<td>$277,743</td>
<td>$38,624,503</td>
<td>$38,902,246</td>
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<tr>
<td>Asian Subcontinent</td>
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<td>$838,001</td>
<td>$838,001</td>
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<tr>
<td>Black</td>
<td>$0</td>
<td>$7,290,199</td>
<td>$7,290,199</td>
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<tr>
<td>Hispanic</td>
<td>$0</td>
<td>$28,426,050</td>
<td>$28,426,050</td>
<td>3.47%</td>
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<td>Native American</td>
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<td>$15,105,304</td>
<td>$15,105,304</td>
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<tr>
<td>White Women</td>
<td>$92,144,318</td>
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<td>$92,144,318</td>
<td>11.26%</td>
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<tr>
<td><strong>Total</strong></td>
<td></td>
<td></td>
<td>$182,706,118</td>
<td>22.33%</td>
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*Contract values are as of 11/30/20
## Systems Contract DBEs Disaggregated*

- **Contract total:** $193,755,789

<table>
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<th>Ethnic Group</th>
<th>Women</th>
<th>Men</th>
<th>Total</th>
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<tbody>
<tr>
<td>Asian Pacific</td>
<td>$0</td>
<td>$660,800</td>
<td>0.34%</td>
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<tr>
<td>Asian Subcontinent</td>
<td>$0</td>
<td>$1,062,000</td>
<td>0.55%</td>
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<tr>
<td>Black</td>
<td>$0</td>
<td>$3,948,100</td>
<td>2.04%</td>
</tr>
<tr>
<td>Hispanic</td>
<td>$0</td>
<td>$0</td>
<td>0.00%</td>
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<tr>
<td>Native American</td>
<td>$0</td>
<td>$130,402</td>
<td>0.07%</td>
</tr>
<tr>
<td>White Women</td>
<td>$21,713,356</td>
<td>0.00%</td>
<td>$21,713,356</td>
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*Contract values are as of 11/30/20*
Franklin O&M Contract DBEs Disaggregated*

- Contract total: $38,650,000

<table>
<thead>
<tr>
<th>Ethnic Group</th>
<th>Women</th>
<th>Men</th>
<th>Total</th>
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<tr>
<td>Asian Pacific</td>
<td>$0</td>
<td>$734,884</td>
<td>1.90%</td>
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<td>Asian Subcontinent</td>
<td>$0</td>
<td>$0</td>
<td>0.00%</td>
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<tr>
<td>Black</td>
<td>$43,369</td>
<td>$0</td>
<td>0.11%</td>
</tr>
<tr>
<td>Hispanic</td>
<td>$715,140</td>
<td>$0</td>
<td>1.85%</td>
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<tr>
<td>Native American</td>
<td>$3,807,561</td>
<td>$353,449</td>
<td>0.91%</td>
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<td>White Women</td>
<td>$2,067,417</td>
<td>0.00%</td>
<td>5.35%</td>
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Total $7,721,819 19.98%

*Contract values are as of 11/30/20
Disaggregated Workforce Data
### Civil Workforce Participation Disaggregated*

- **Project Total:** 928,900 hrs
- **Total POCI:** 199,009 hrs (21.42%)
- **Total Women:** 78,721 hrs (8.47%)

<table>
<thead>
<tr>
<th>Ethnic Group</th>
<th>Women</th>
<th>Women %</th>
<th>Men</th>
<th>Men %</th>
<th>Total</th>
<th>Total %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asian Pacific</td>
<td>91</td>
<td>0.0%</td>
<td>32,253</td>
<td>3.5%</td>
<td>32,344</td>
<td>3.5%</td>
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<tr>
<td>Black</td>
<td>11,073</td>
<td>1.2%</td>
<td>42,649</td>
<td>5.0%</td>
<td>53,722</td>
<td>5.8%</td>
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<tr>
<td>Hispanic</td>
<td>1,960</td>
<td>0.2%</td>
<td>88,690</td>
<td>9.5%</td>
<td>90,650</td>
<td>9.8%</td>
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<tr>
<td>Native American</td>
<td>7,997</td>
<td>0.9%</td>
<td>10,679</td>
<td>1.1%</td>
<td>18,676</td>
<td>2.0%</td>
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<tr>
<td>Multi-racial</td>
<td>700</td>
<td>0.1%</td>
<td>13,087</td>
<td>1.4%</td>
<td>13,787</td>
<td>1.5%</td>
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<tr>
<td>Not Specified</td>
<td>135</td>
<td>0.0%</td>
<td>2,992</td>
<td>0.3%</td>
<td>3,127</td>
<td>0.3%</td>
</tr>
<tr>
<td>White</td>
<td>60,083</td>
<td>6.5%</td>
<td>60,083</td>
<td>6.5%</td>
<td>120,166</td>
<td>12.9%</td>
</tr>
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</table>

*People of Color and Indigenous People (POCI) participation from 12/1/18 – 11/30/20
Black Participation Total: 53,722 hrs

Black Workforce Participation as of November 2020

*Data points are based on the hours worked each month
Asian Participation Total: 32,344 hrs

Asian Workforce Participation as of November 2020

*Data points are based on the hours worked each month*
White Participation: 748,338 hrs

White Workforce Participation as of November 2020

*Data points are based on the hours worked each month*
Hispanic Participation: 90,651 hrs

*Data points are based on the hours worked each month*
Native American Participation: 18,676 hrs

Native American Workforce Participation as of November 2020

*Data points are based on the hours worked each month
Not Specified Participation: 3,127 hrs

Not Specified Workforce Participation as of November 2020

*Data points are based on the hours worked each month*
Multi-racial Participation: 13,787 hrs

Multi-racial Workforce Participation as of November 2020

*Data points are based on the hours worked each month
Communications & Outreach Update

Sophia Ginis
Public Involvement Manager
2020 Construction Communications

- Construction updates: 16,600+ subscribers; 46% open rate
- 24-hour construction hotline: 270 calls in 2020
- Hundreds more non-hotline calls and emails from community members to outreach staff
Construction Communications

• Construction Information Workgroups:
  - Eden Prairie: 8 meetings
  - Minnetonka: 7 meetings
  - Hopkins: 4 meetings
  - St. Louis Park: 6 meetings
  - Minneapolis: 9 meetings

• 2021 Upcoming:
  - February/March: Virtual community townhalls highlighting 2021 construction activities
  - Expanded used of social media and videos to highlight construction progress
  - Return to in-person events when it is safe to do so
Stay Updated!

Online: SWLRT.org

Twitter: @SouthwestLRT

Flickr: flickr.com/photos/metcouncil/albums

Facebook: @MetropolitanCouncil

Instagram: @southwest_lrt