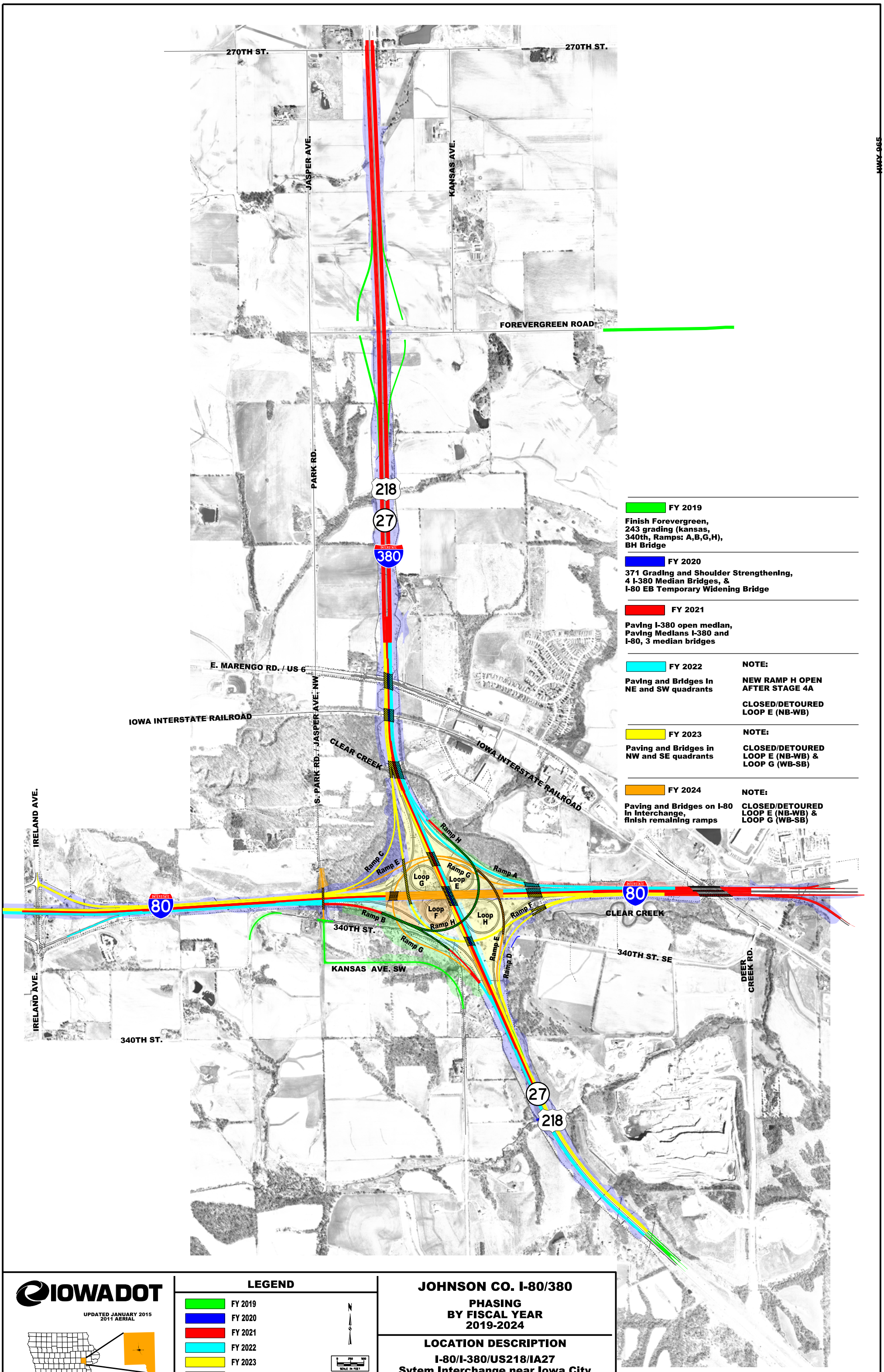
GETTING YOU THERE

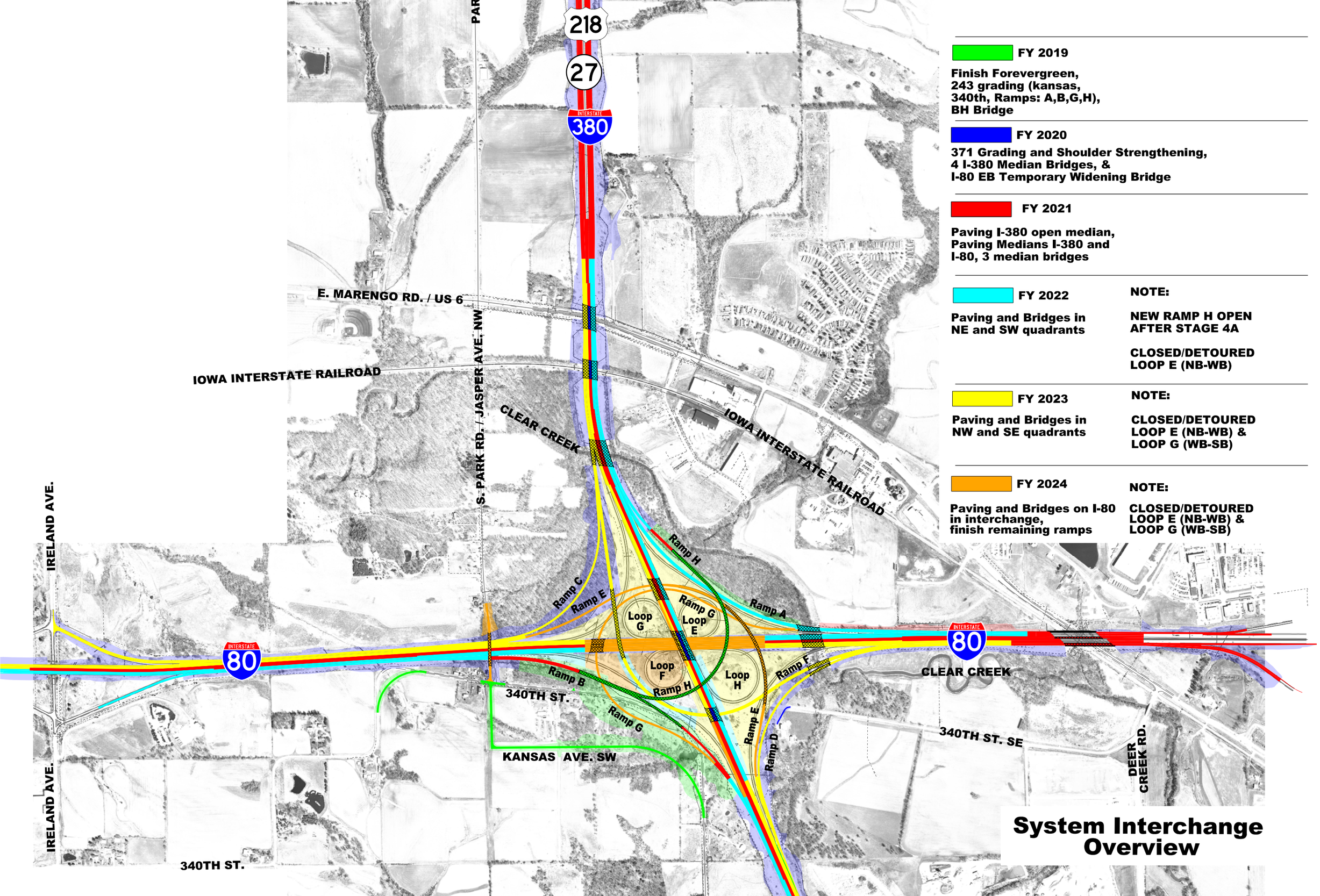
I-80/I-380 SYSTEMS INTERCHANGE

AGC MEETING – FEB 14, 2018

MEETING GOALS

- Overview of Program
- Traffic Management Plan (TMP)
  - Keep two lanes open in each direction on the interstate
  - No Traffic Chutes Over the Winter
  - Closures only allowed over-night (9PM – 6AM)
- Roadway Critical Sections
- Bridge Constructability
  - I380 Over I80
  - I380 North Leg Bridges over RR & US 6
  - Ramp H Flyover Bridge over Ramp A
- Other Project Items (Geotech, Trails, Utilities)
- Feedback from AGC using Voting Buttons
- Interactive Format with limited time


270TH ST.
270TH ST.
JASPER AVE.
KANSAS AVE.
HWY 965
FOREVERGREEN ROAD
PARK RD.
218
27
INTERSTATE
380
E. MARENGO RD. / US 6
IOWA INTERSTATE RAILROAD
S. PARK RD. / JASPER AVE. NW
CLEAR CREEK
IOWA INTERSTATE RAILROAD
IRELAND AVE.
Ramp H
Ramp C
Ramp E
Ramp G
Loop E
Loop G
Ramp A
Loop F
Loop H
Ramp F
Ramp B
Ramp H
Ramp G
Ramp E
Ramp D
INTERSTATE
80
INTERSTATE
80
CLEAR CREEK
340TH ST.
340TH ST. SE
KANSAS AVE. SW
DEER CREEK RD.
IRELAND AVE.
340TH ST.
27
218
FY 2019
Finish Forevergreen,
243 grading (kansas,
340th, Ramps: A,B,G,H),
BH Bridge
FY 2020
371 Grading and Shoulder Strengthening,
4 I-380 Median Bridges, &
I-80 EB Temporary Widening Bridge
FY 2021
Paving I-380 open median,
Paving Medians I-380 and
I-80, 3 median bridges
FY 2022
Paving and Bridges In
NE and SW quadrants
NOTE:
NEW RAMP H OPEN
AFTER STAGE 4A
CLOSED/DETOURED
LOOP E (NB-WB)
FY 2023
Paving and Bridges in
NW and SE quadrants
NOTE:
CLOSED/DETOURED
LOOP E (NB-WB) &
LOOP G (WB-SB)
FY 2024
Paving and Bridges on I-80
In Interchange,
finish remaining ramps
NOTE:
CLOSED/DETOURED
LOOP E (NB-WB) &
LOOP G (WB-SB)
IOWADOT
UPDATED JANUARY 2015
2011 AERIAL
LEGEND
FY 2019
FY 2020
FY 2021
FY 2022
FY 2023
FY 2024
N
0 250 500
SCALE IN FEET
JOHNSON CO. I-80/380
PHASING
BY FISCAL YEAR
2019-2024
LOCATION DESCRIPTION
I-80/I-380/US218/IA27
Sytem Interchange near Iowa City



FY 2019

Finish Forevergreen,
243 grading (kansas,
340th, Ramps: A,B,G,H),
BH Bridge

FY 2020

371 Grading and Shoulder Strengthening,
4 I-380 Median Bridges, &
I-80 EB Temporary Widening Bridge

FY 2021

Paving I-380 open median,
Paving Medians I-380 and
I-80, 3 median bridges

FY 2022

Paving and Bridges in
NE and SW quadrants

NOTE:

NEW RAMP H OPEN
AFTER STAGE 4A

CLOSED/DETOURED
LOOP E (NB-WB)

FY 2023

Paving and Bridges in
NW and SE quadrants

NOTE:

CLOSED/DETOURED
LOOP E (NB-WB) &
LOOP G (WB-SB)

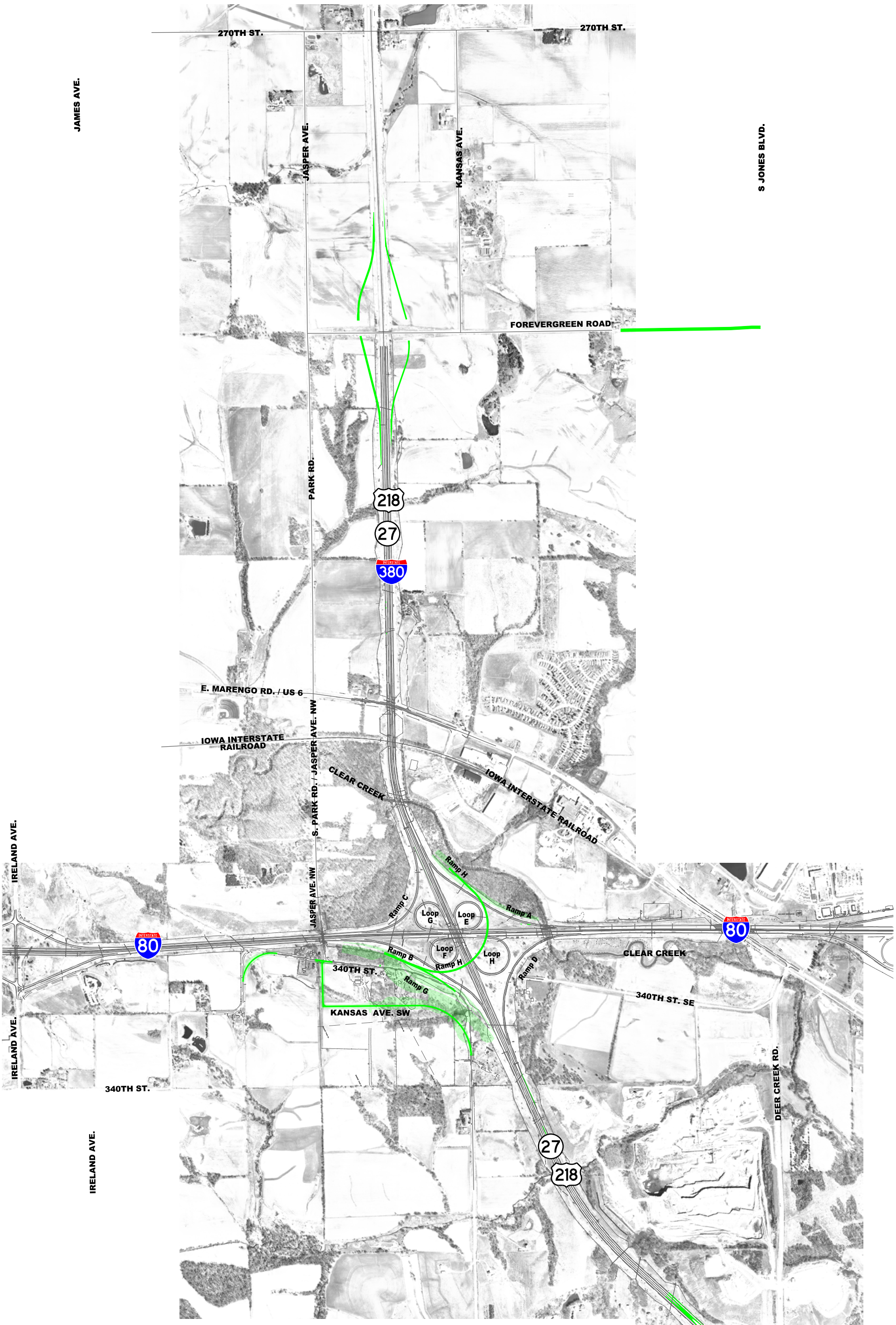
FY 2024

Paving and Bridges on I-80
in interchange,
finish remaining ramps

NOTE:

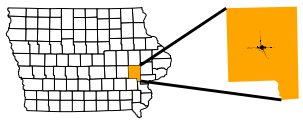
CLOSED/DETOURED
LOOP E (NB-WB) &
LOOP G (WB-SB)

System Interchange Overview



IOWADOT

UPDATED JANUARY 2015
2011 AERIAL



LEGEND

FY 2019

Finish Forevergreen, 243 grading (kansas, 340th, Ramps: A,B,G,H), BH Bridge

N

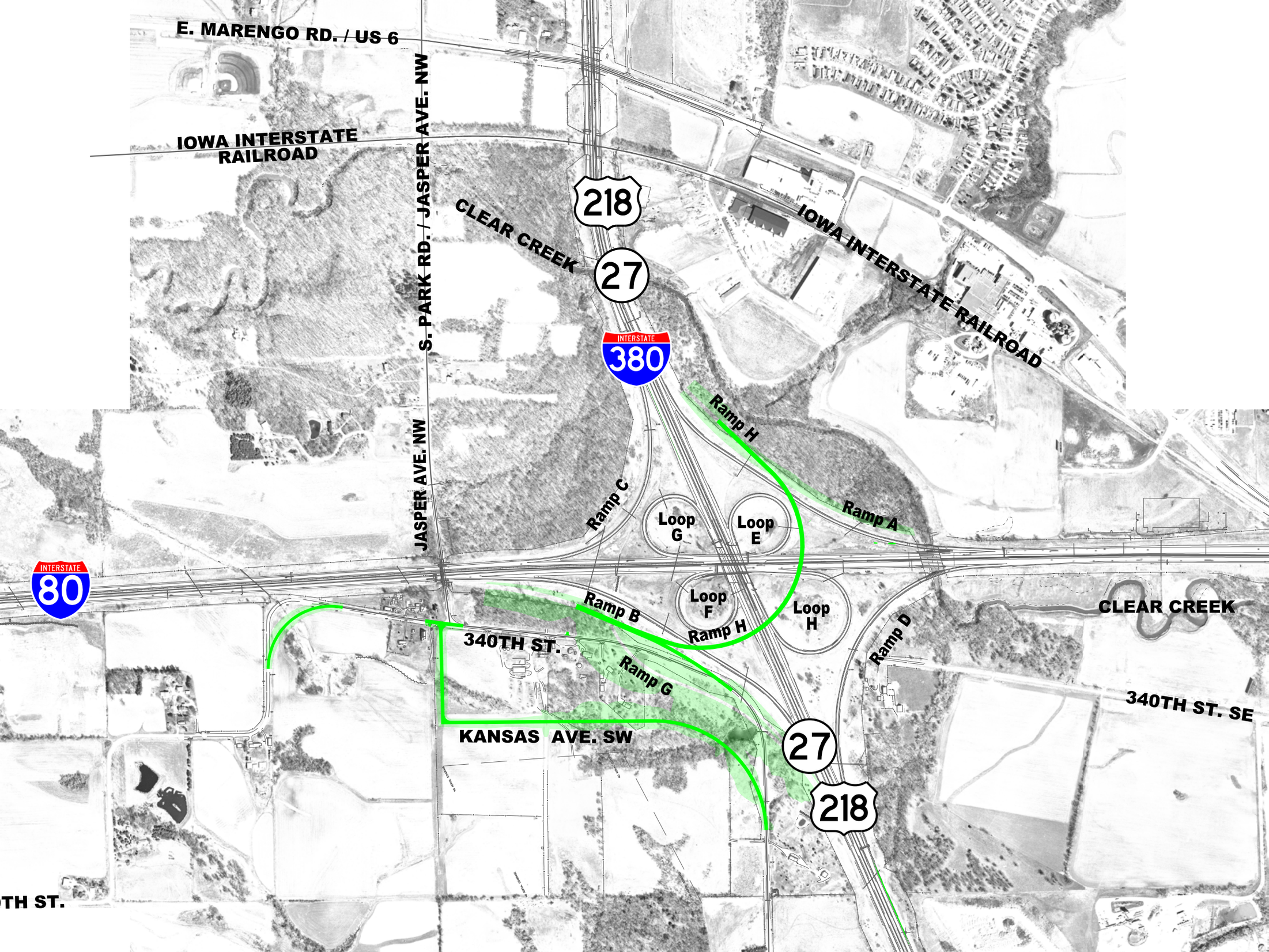
0 250 500
SCALE IN FEET

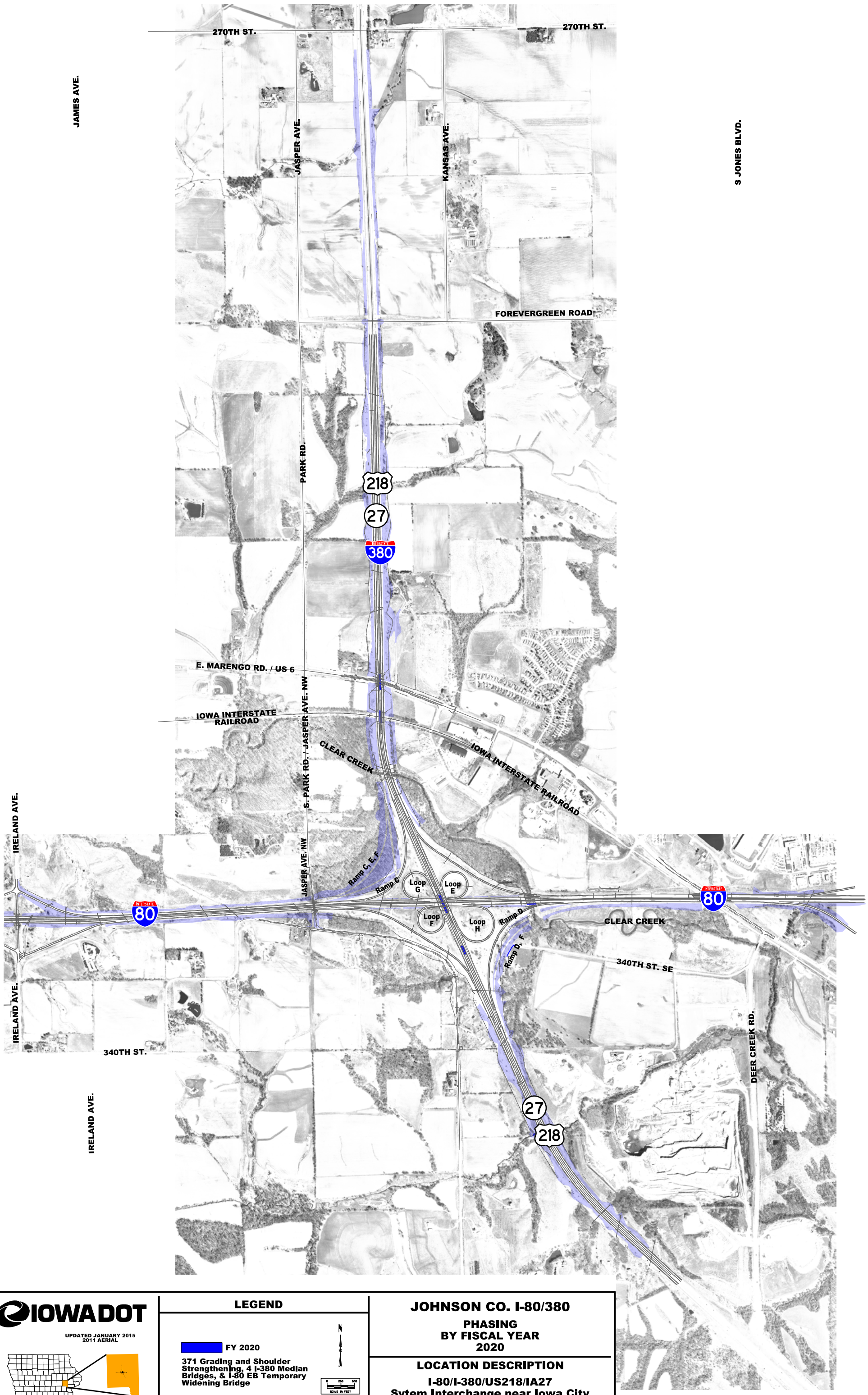
JOHNSON CO. I-80/380

PHASING BY FISCAL YEAR 2019

LOCATION DESCRIPTION

I-80/I-380/US218/IA27
Sytem Interchange near Iowa City


E. MARENGO RD. / US 6
IOWA INTERSTATE RAILROAD
S. PARK RD. / JASPER AVE. NW
JASPER AVE. NW
CLEAR CREEK
218
27
INTERSTATE 380
IOWA INTERSTATE RAILROAD
Ramp H
Ramp C
Loop G
Loop E
Ramp A
INTERSTATE 80
Ramp B
Loop F
Ramp H
Loop H
CLEAR CREEK
340TH ST.
Ramp G
Ramp D
340TH ST. SE
KANSAS AVE. SW
27
218
TH ST.



IOWADOT

UPDATED JANUARY 2015
2011 AERIAL

LEGEND

FY 2020

371 Grading and Shoulder Strengthening, 4 I-380 Median Bridges, & I-80 EB Temporary Widening Bridge

N

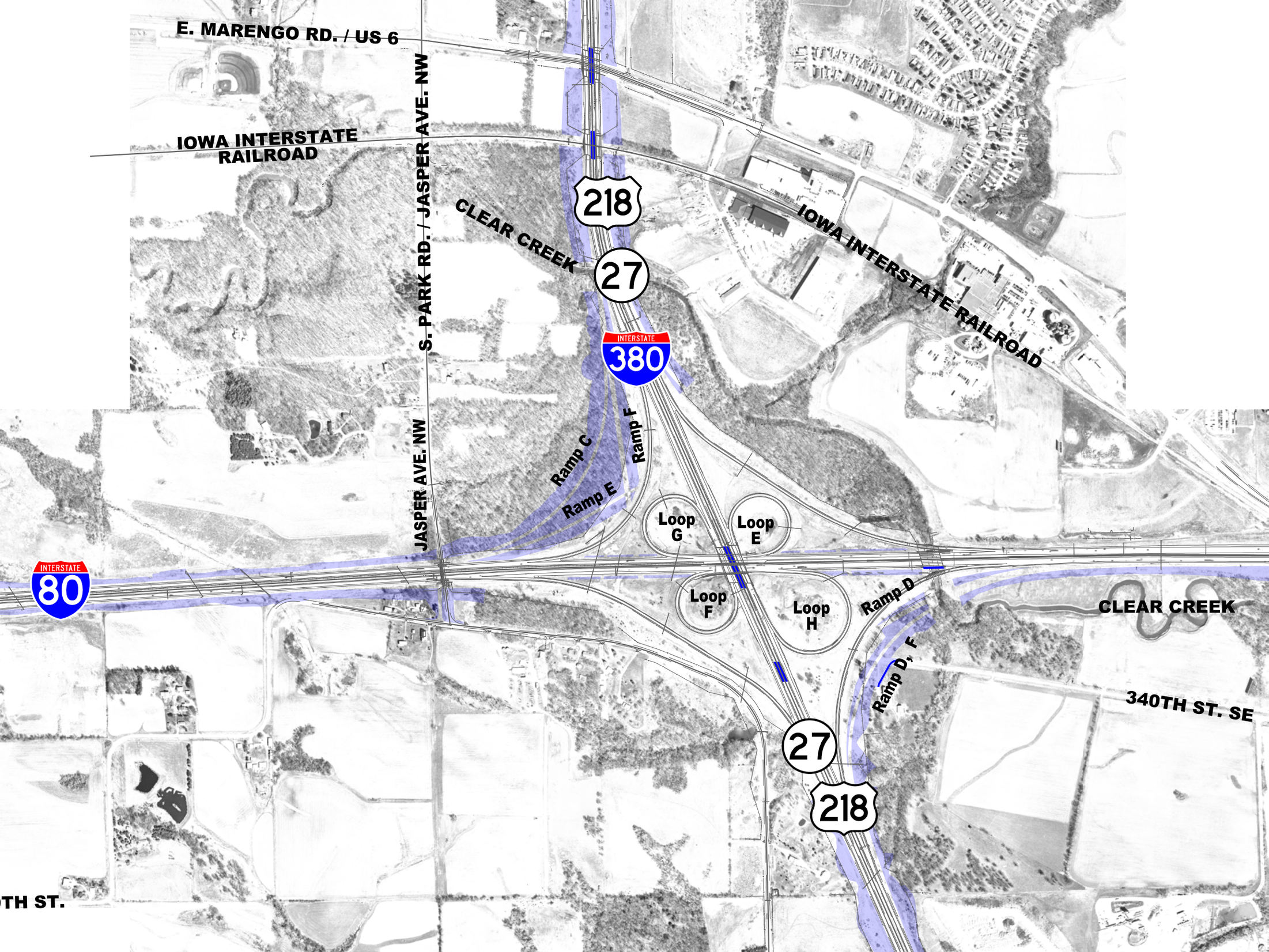
0 250 500
SCALE IN FEET

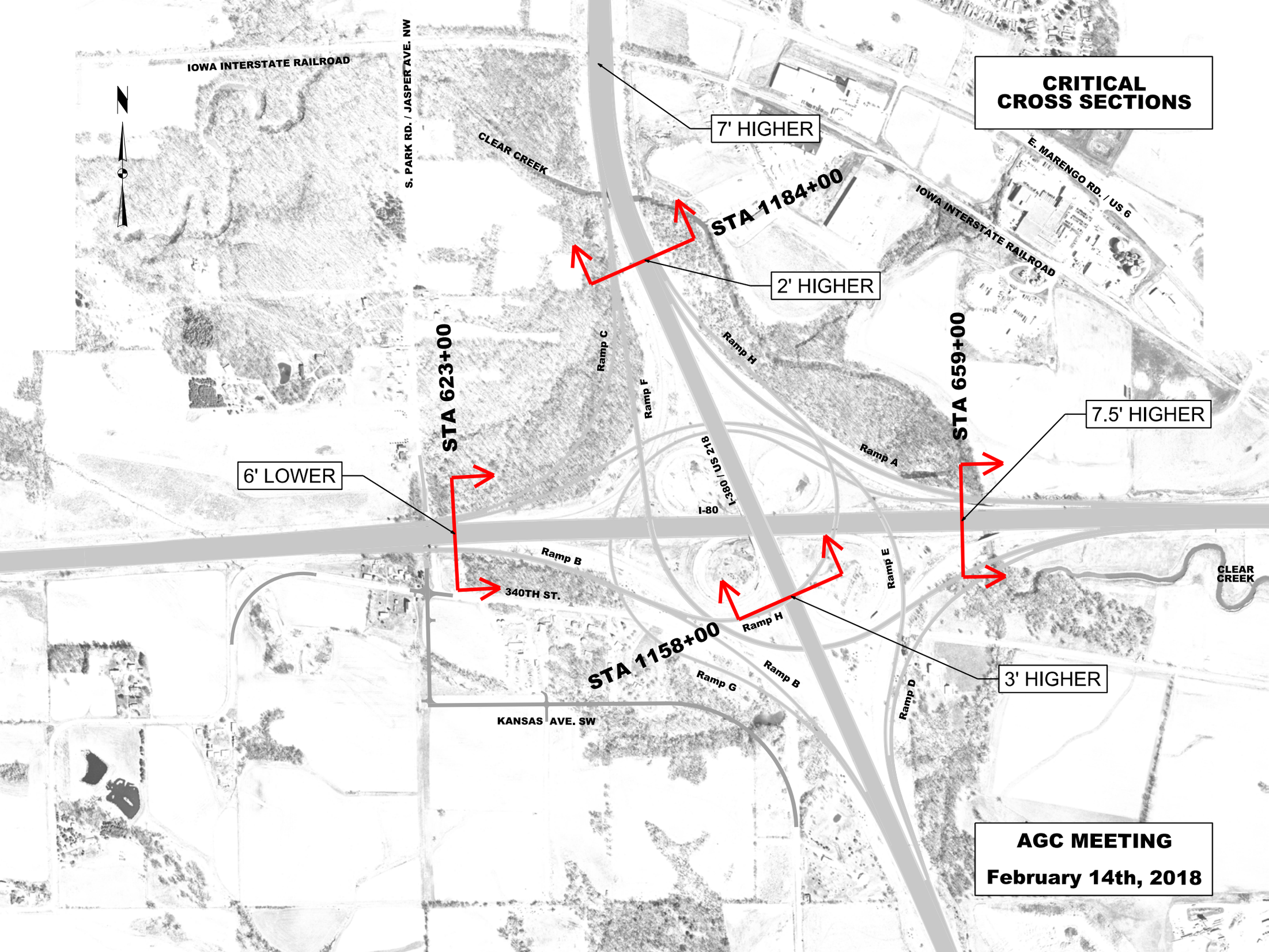
JOHNSON CO. I-80/380

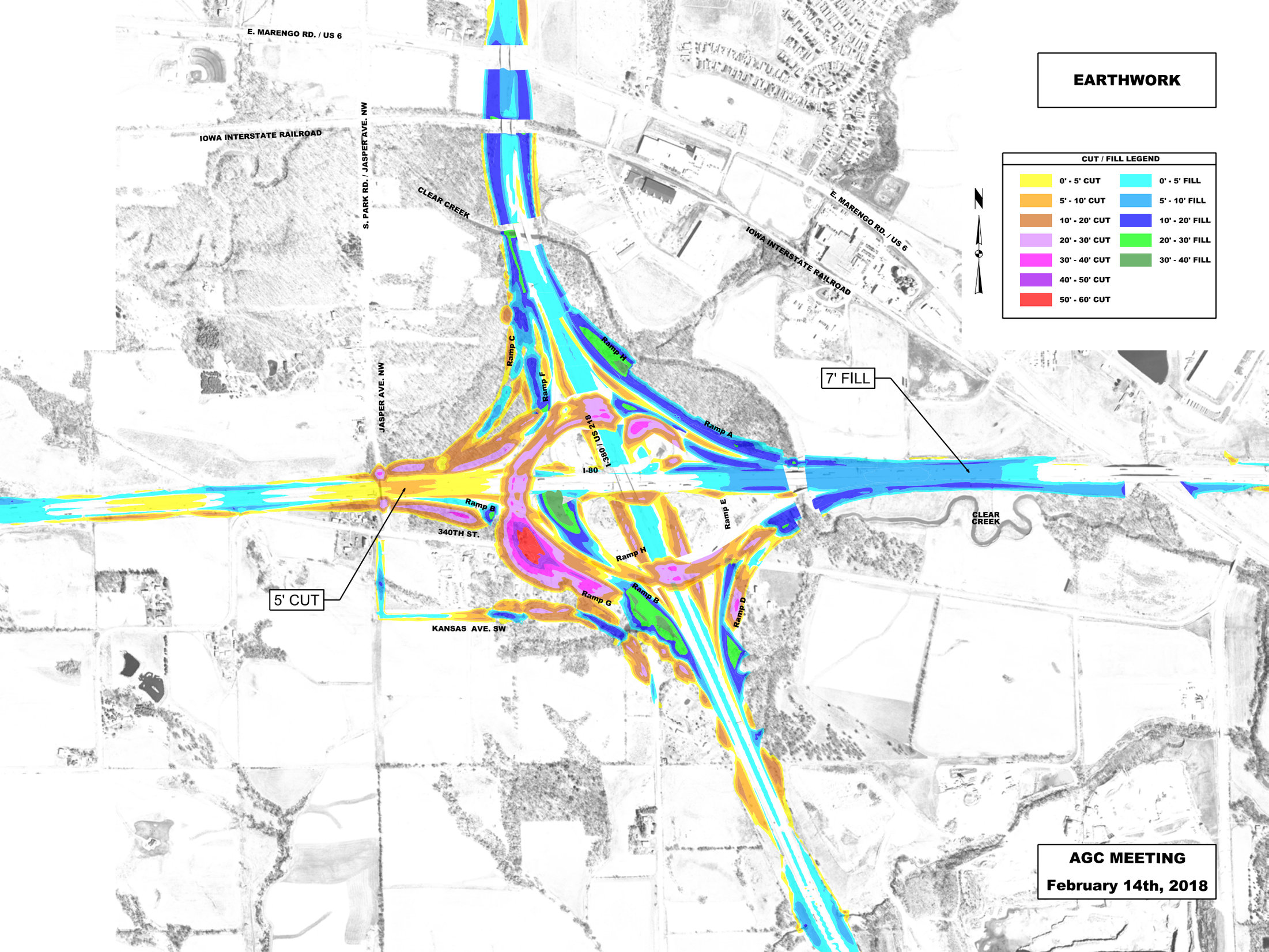
PHASING BY FISCAL YEAR 2020

LOCATION DESCRIPTION

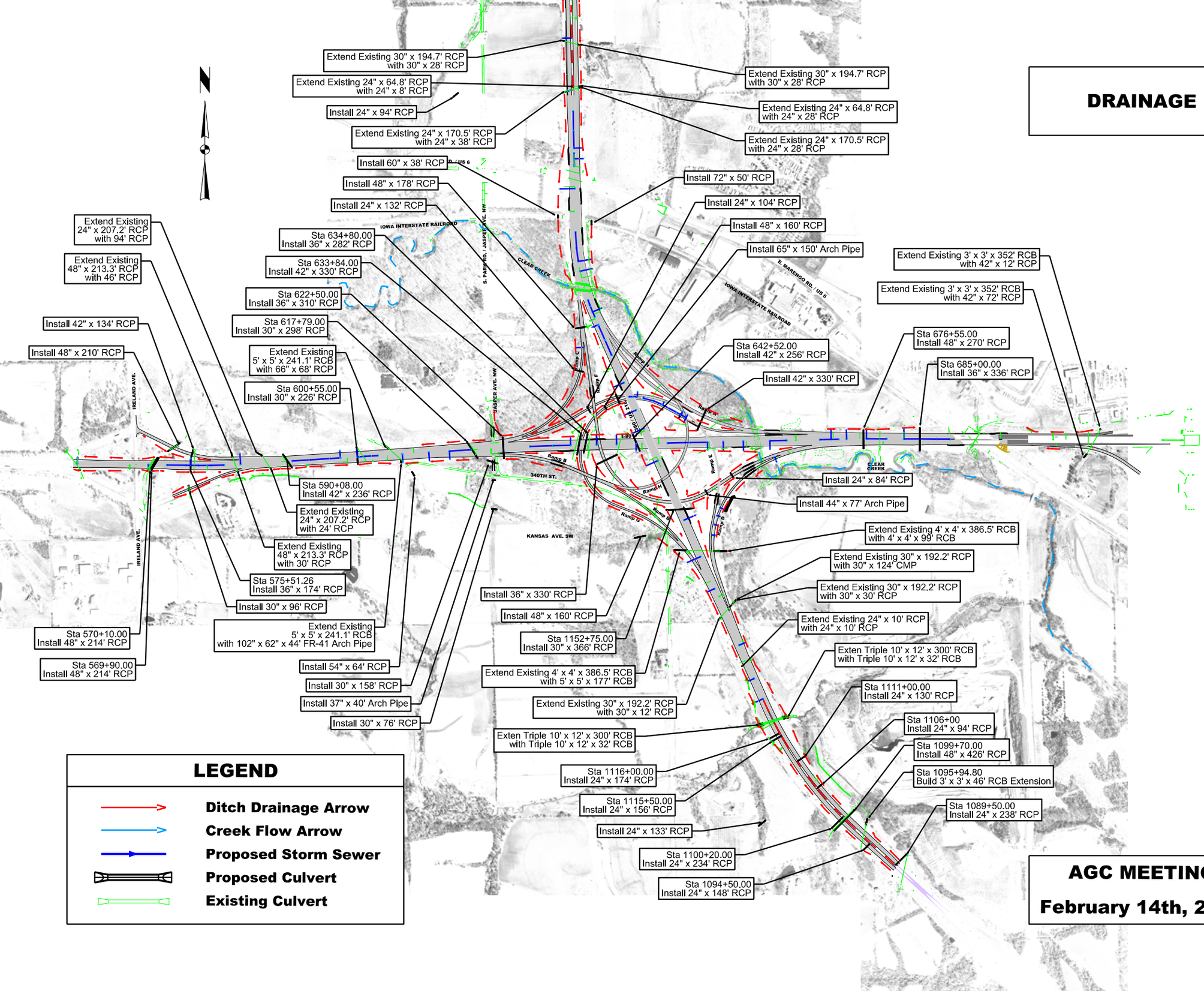
I-80/I-380/US218/IA27
Sytem Interchange near Iowa City


E. MARENGO RD. / US 6
IOWA INTERSTATE RAILROAD
S. PARK RD. / JASPER AVE. NW
CLEAR CREEK
218
27
INTERSTATE
380
IOWA INTERSTATE RAILROAD
Ramp C
Ramp F
Ramp E
JASPER AVE. NW
Loop G
Loop E
INTERSTATE
80
Loop F
Loop H
Ramp D
CLEAR CREEK
Ramp D, F
340TH ST. SE
27
218
TH ST.


CRITICAL CROSS SECTIONS
7' HIGHER
2' HIGHER
7.5' HIGHER
6' LOWER
3' HIGHER
STA 1184+00
STA 623+00
STA 659+00
STA 1158+00
IOWA INTERSTATE RAILROAD
S. PARK RD. / JASPER AVE. NW
CLEAR CREEK
E. MARENGO RD. / US 6
Ramp C
Ramp F
Ramp H
Ramp A
Ramp B
Ramp E
Ramp G
Ramp D
I-380 / US 218
I-80
340TH ST.
KANSAS AVE. SW
AGC MEETING
February 14th, 2018

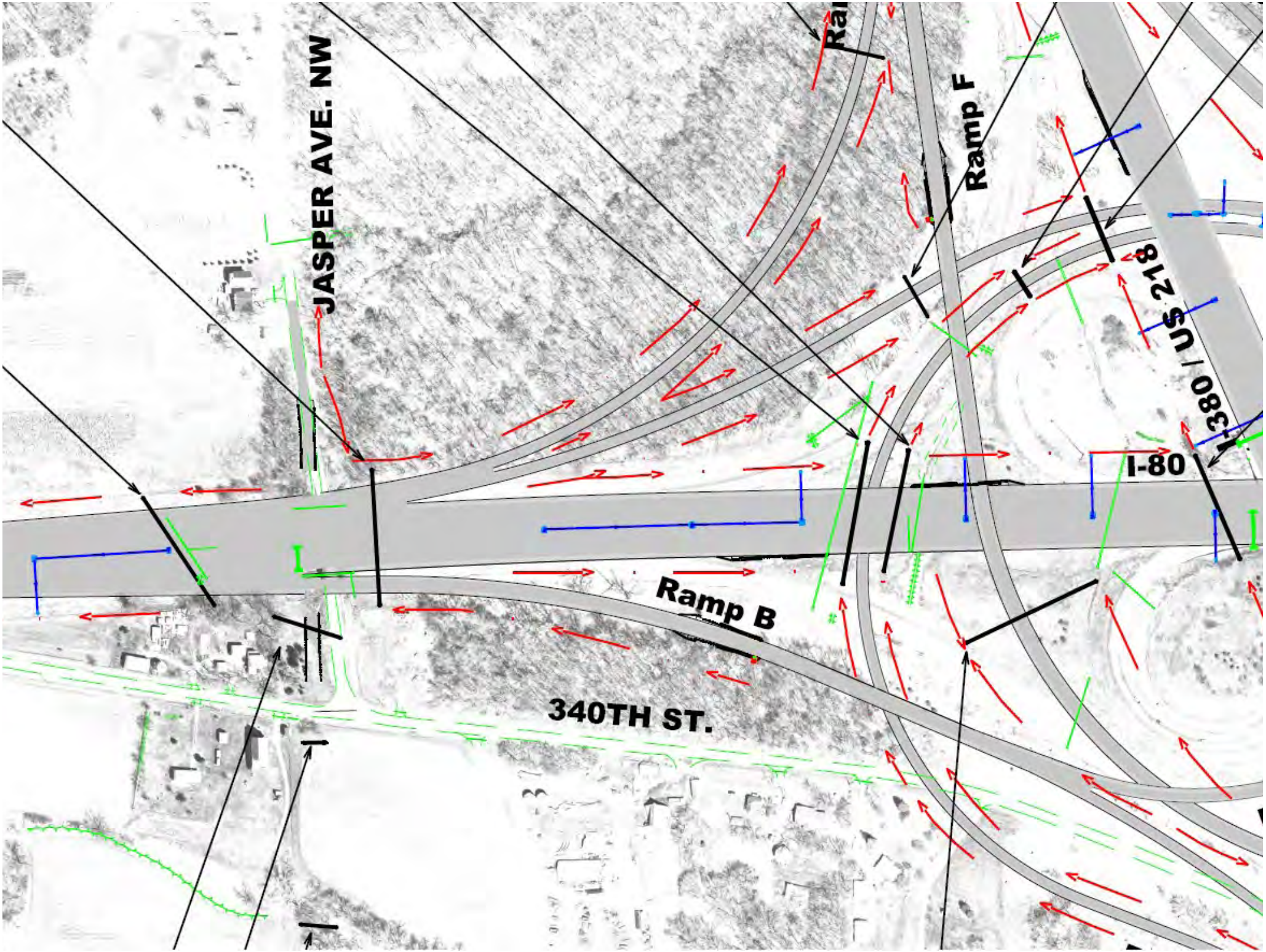

EARTHWORK
CUT / FILL LEGEND
0' - 5' CUT
5' - 10' CUT
10' - 20' CUT
20' - 30' CUT
30' - 40' CUT
40' - 50' CUT
50' - 60' CUT
0' - 5' FILL
5' - 10' FILL
10' - 20' FILL
20' - 30' FILL
30' - 40' FILL
N
E. MARENGO RD. / US 6
IOWA INTERSTATE RAILROAD
S. PARK RD. / JASPER AVE. NW
CLEAR CREEK
JASPER AVE. NW
Ramp C
Ramp F
Ramp H
Ramp A
I-380 / US 218
I-80
7' FILL
5' CUT
Ramp B
340TH ST.
Ramp E
Ramp H
Ramp G
Ramp B
Ramp D
KANSAS AVE. SW
AGC MEETING
February 14th, 2018

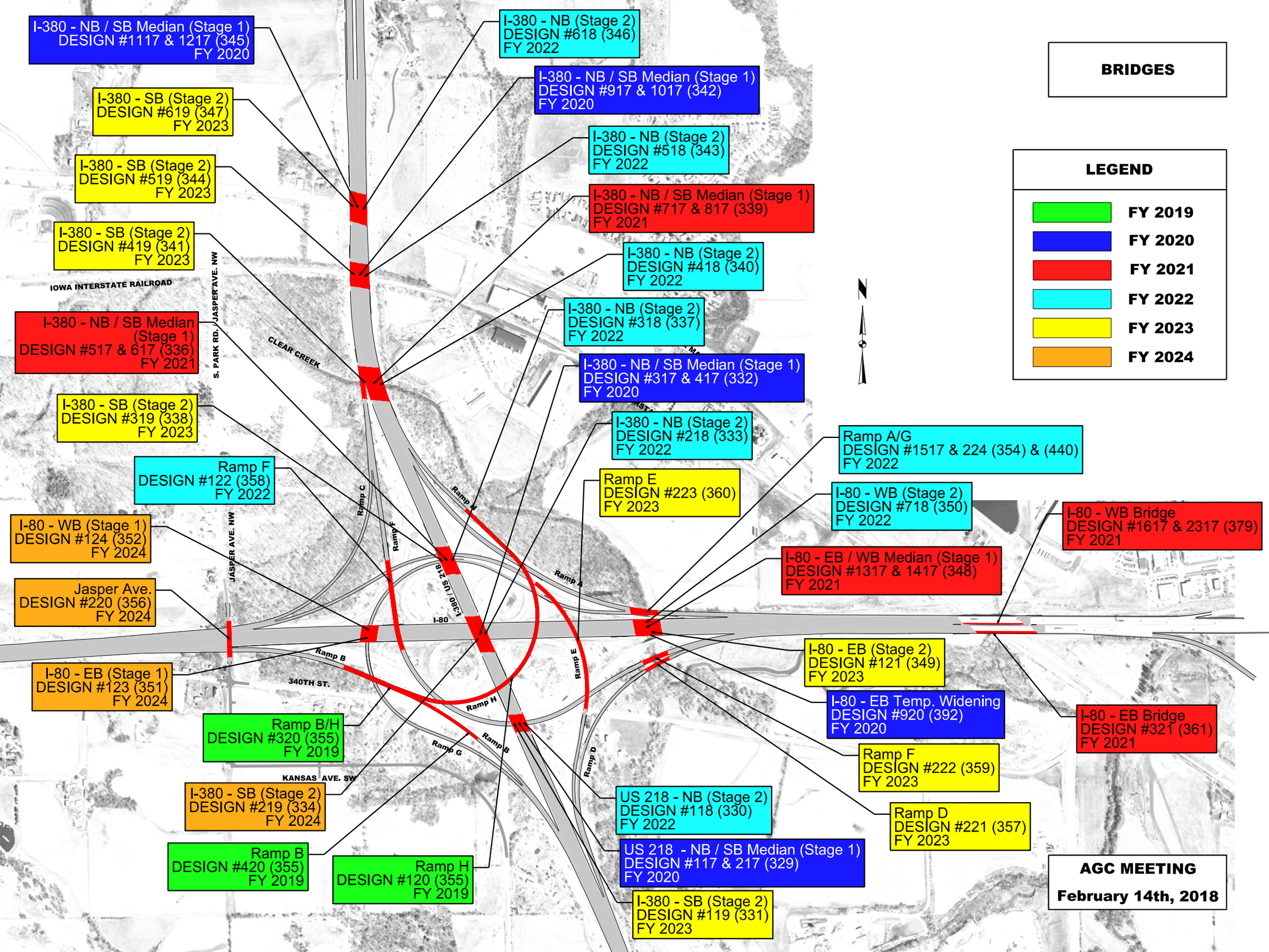
DRAINAGE



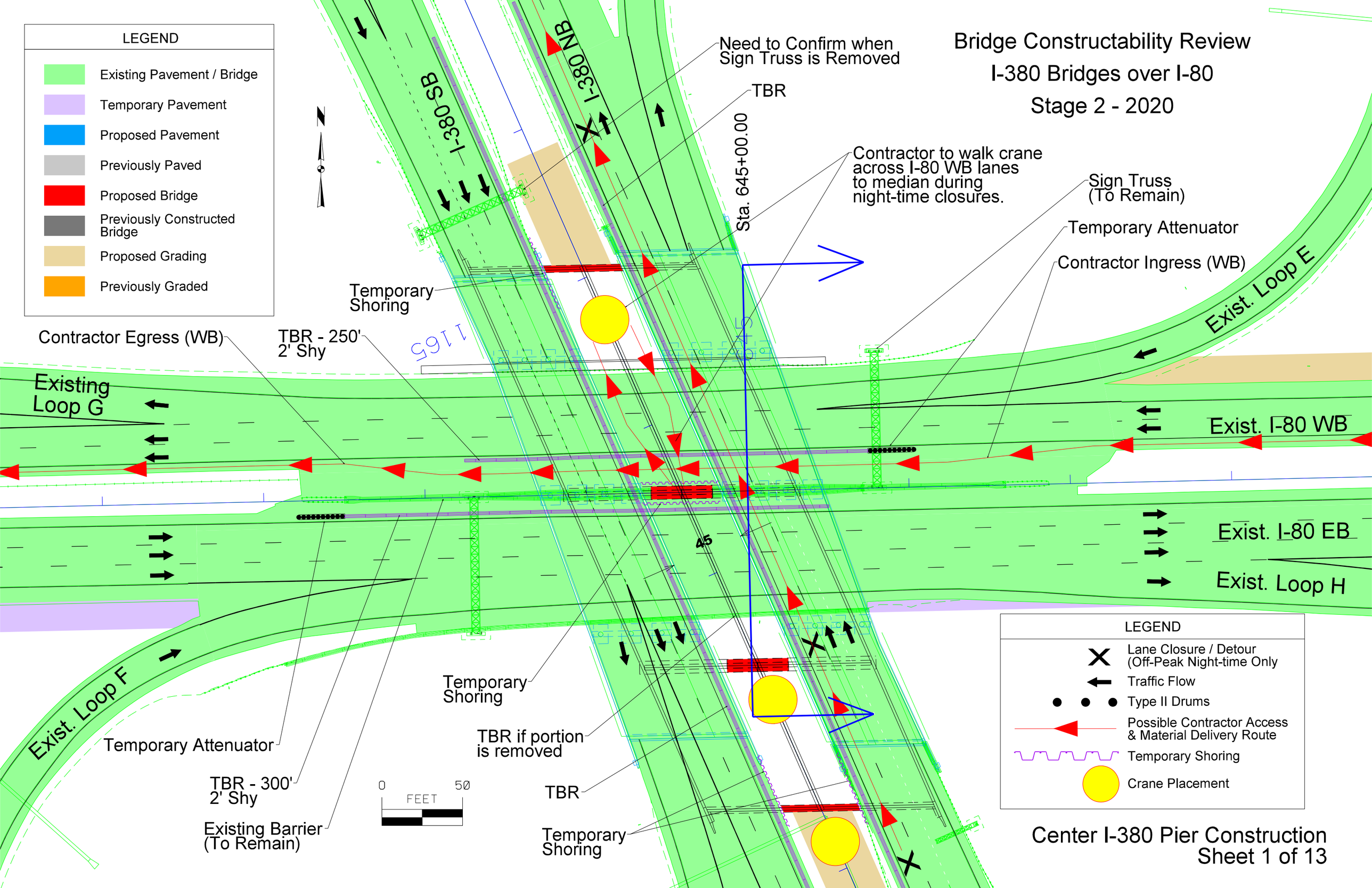
AGC MEETING

February 14th, 2018


JASPER AVE. NW
Ramp F
I-380 / US 218
I-80
Ramp B
340TH ST.


I-380 - NB / SB Median (Stage 1)
DESIGN #1117 & 1217 (345)
FY 2020
I-380 - NB (Stage 2)
DESIGN #618 (346)
FY 2022
I-380 - NB / SB Median (Stage 1)
DESIGN #917 & 1017 (342)
FY 2020
I-380 - SB (Stage 2)
DESIGN #619 (347)
FY 2023
I-380 - NB (Stage 2)
DESIGN #518 (343)
FY 2022
I-380 - SB (Stage 2)
DESIGN #519 (344)
FY 2023
I-380 - NB / SB Median (Stage 1)
DESIGN #717 & 817 (339)
FY 2021
I-380 - SB (Stage 2)
DESIGN #419 (341)
FY 2023
I-380 - NB (Stage 2)
DESIGN #418 (340)
FY 2022
IOWA INTERSTATE RAILROAD
I-380 - NB / SB Median (Stage 1)
DESIGN #517 & 617 (336)
FY 2021
S. PARK RD. / JASPER AVE. NW
CLEAR CREEK
I-380 - NB (Stage 2)
DESIGN #318 (337)
FY 2022
I-380 - NB / SB Median (Stage 1)
DESIGN #317 & 417 (332)
FY 2020
I-380 - SB (Stage 2)
DESIGN #319 (338)
FY 2023
I-380 - NB (Stage 2)
DESIGN #218 (333)
FY 2022
Ramp A/G
DESIGN #1517 & 224 (354) & (440)
FY 2022
Ramp F
DESIGN #122 (358)
FY 2022
Ramp E
DESIGN #223 (360)
FY 2023
I-80 - WB (Stage 2)
DESIGN #718 (350)
FY 2022
I-80 - WB Bridge
DESIGN #1617 & 2317 (379)
FY 2021
I-80 - WB (Stage 1)
DESIGN #124 (352)
FY 2024
I-80 - EB / WB Median (Stage 1)
DESIGN #1317 & 1417 (348)
FY 2021
Jasper Ave.
DESIGN #220 (356)
FY 2024
JASPER AVE. NW
Ramp C
Ramp F
Ramp H
Ramp A
I-380 / US 218
I-80
Ramp E
I-80 - EB (Stage 2)
DESIGN #121 (349)
FY 2023
I-80 - EB (Stage 1)
DESIGN #123 (351)
FY 2024
Ramp B
340TH ST.
Ramp H
I-80 - EB Temp. Widening
DESIGN #920 (392)
FY 2020
I-80 - EB Bridge
DESIGN #321 (361)
FY 2021
Ramp B/H
DESIGN #320 (355)
FY 2019
Ramp G
Ramp B
Ramp D
Ramp F
DESIGN #222 (359)
FY 2023
KANSAS AVE. SW
I-380 - SB (Stage 2)
DESIGN #219 (334)
FY 2024
US 218 - NB (Stage 2)
DESIGN #118 (330)
FY 2022
Ramp D
DESIGN #221 (357)
FY 2023
Ramp B
DESIGN #420 (355)
FY 2019
Ramp H
DESIGN #120 (355)
FY 2019
US 218 - NB / SB Median (Stage 1)
DESIGN #117 & 217 (329)
FY 2020
I-380 - SB (Stage 2)
DESIGN #119 (331)
FY 2023
BRIDGES
LEGEND
FY 2019
FY 2020
FY 2021
FY 2022
FY 2023
FY 2024
N
AGC MEETING
February 14th, 2018

Bridge Constructability Review
I-380 Bridges over I-80
Stage 2 - 2020

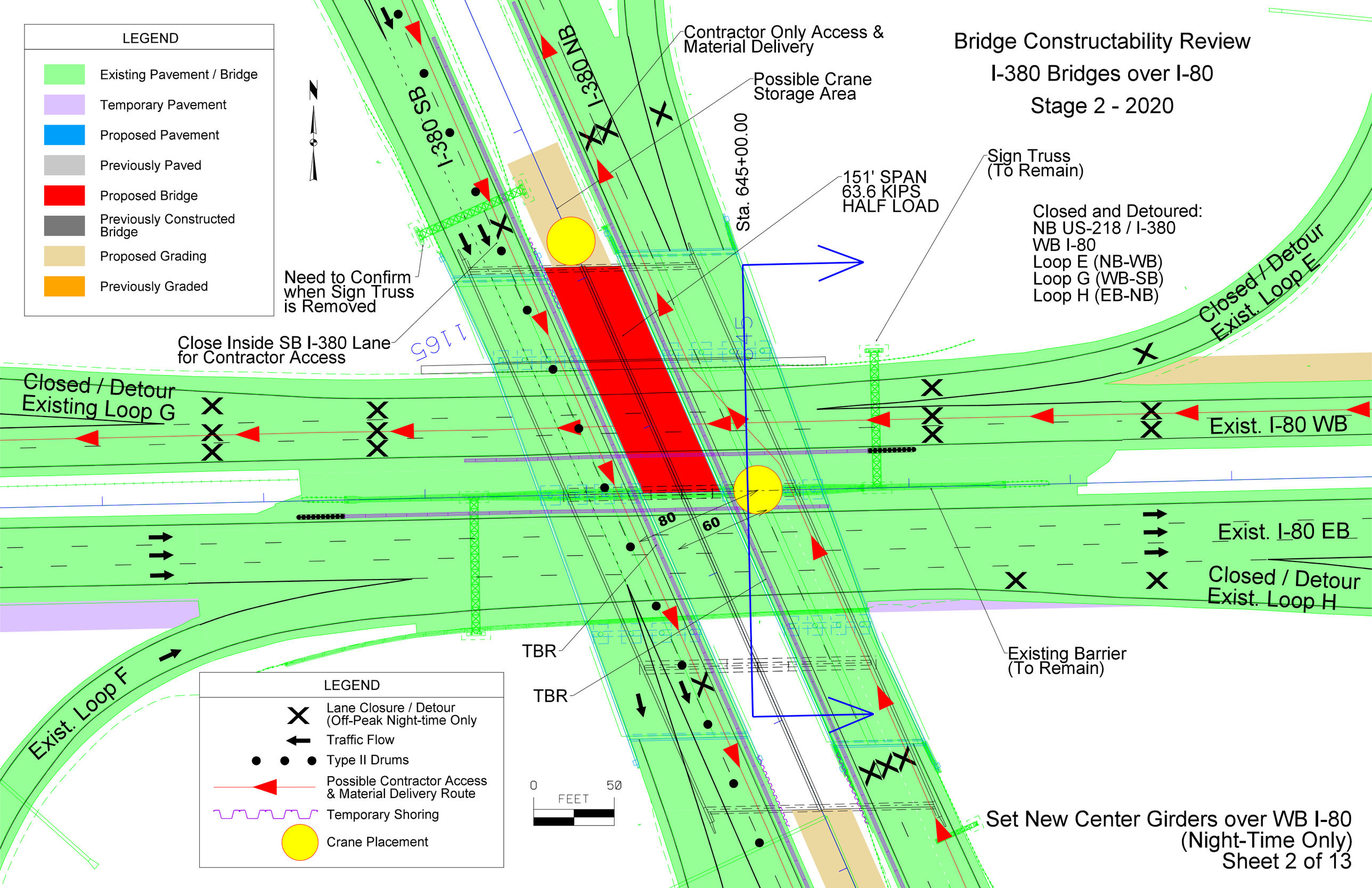


Center I-380 Pier Construction
Sheet 1 of 13

Bridge Constructability Review

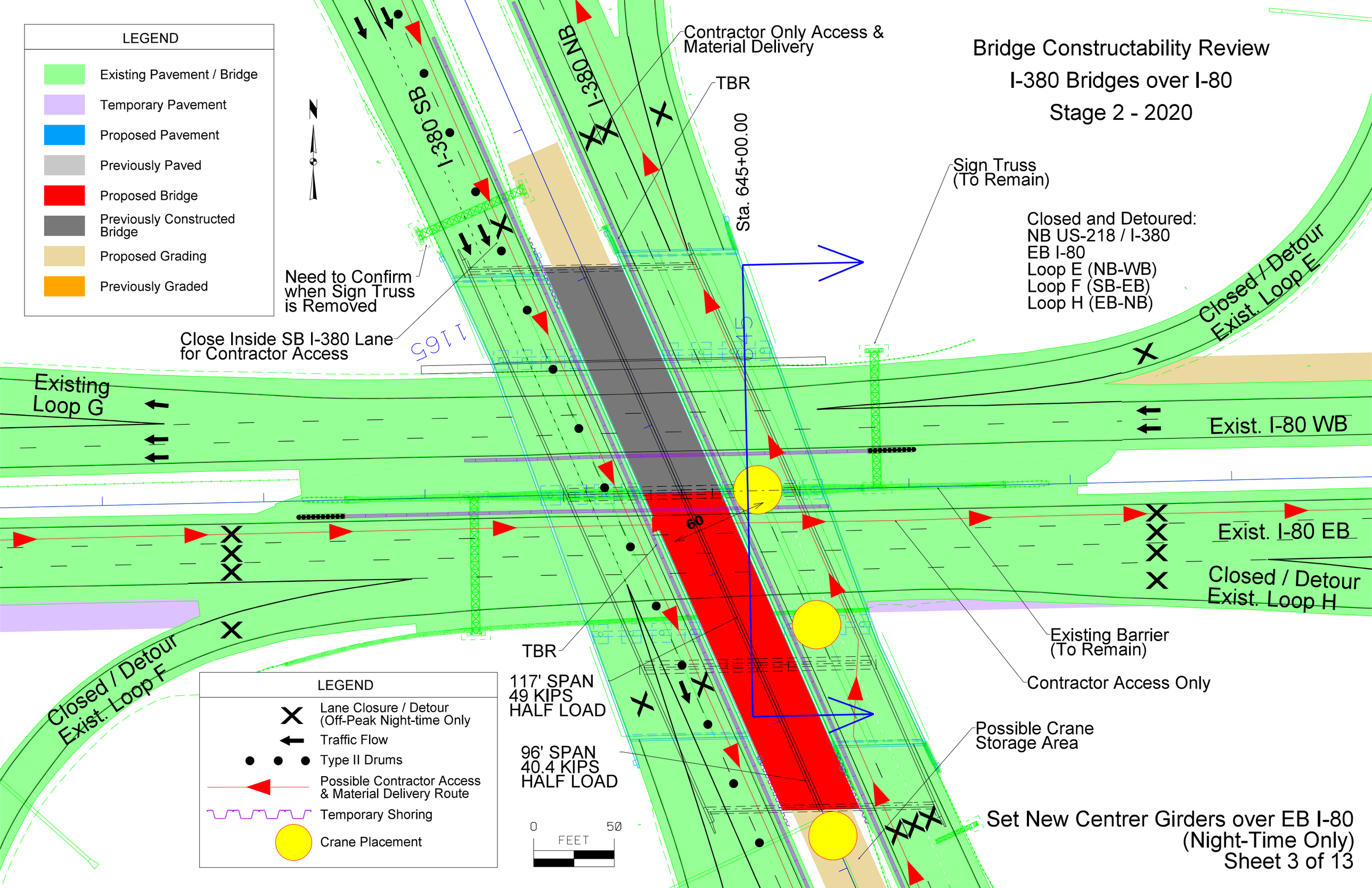
I-380 Bridges over I-80

Stage 2 - 2020



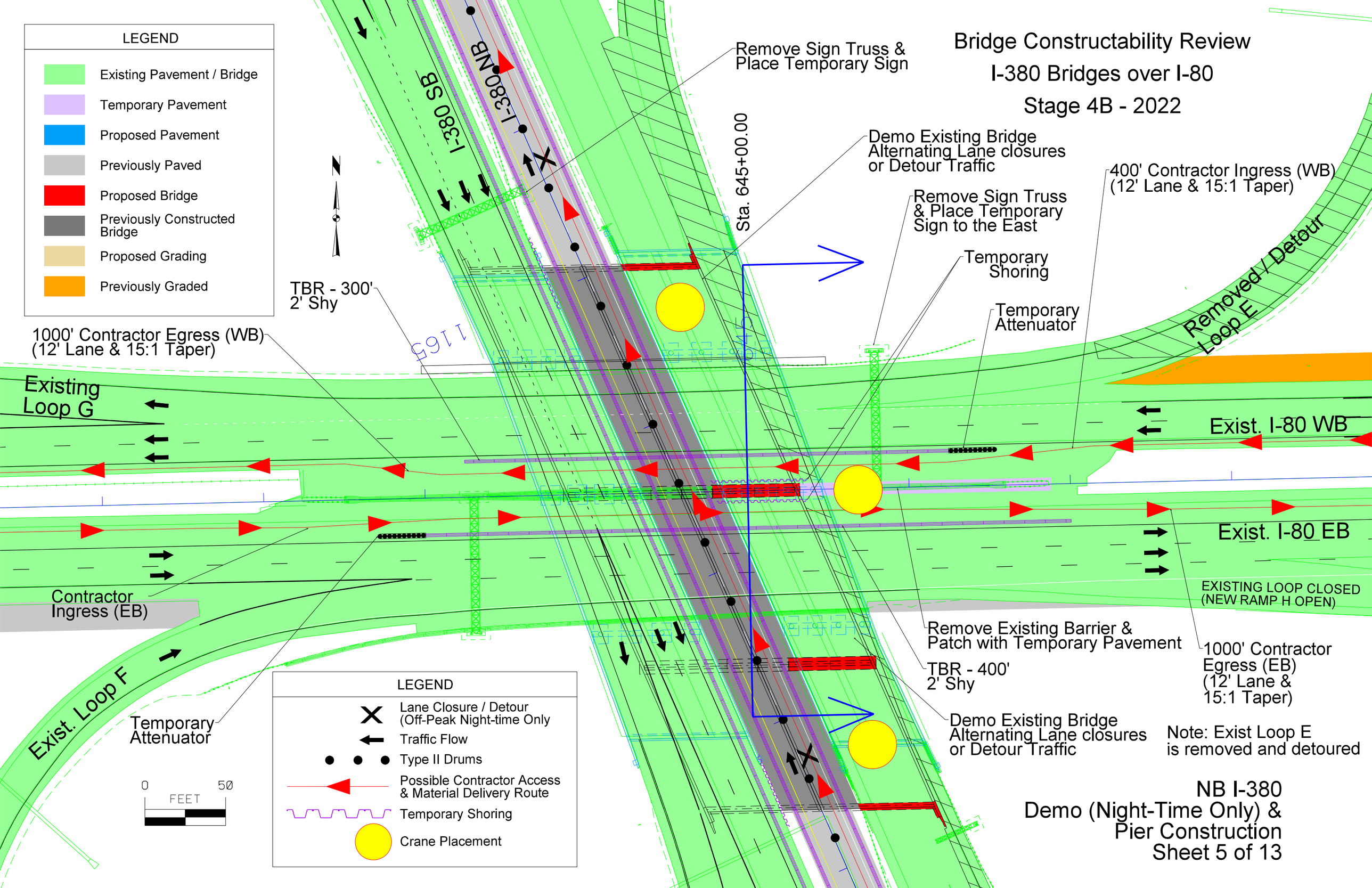
Set New Center Girders over WB I-80
(Night-Time Only)
Sheet 2 of 13

Bridge Constructability Review
I-380 Bridges over I-80
Stage 2 - 2020



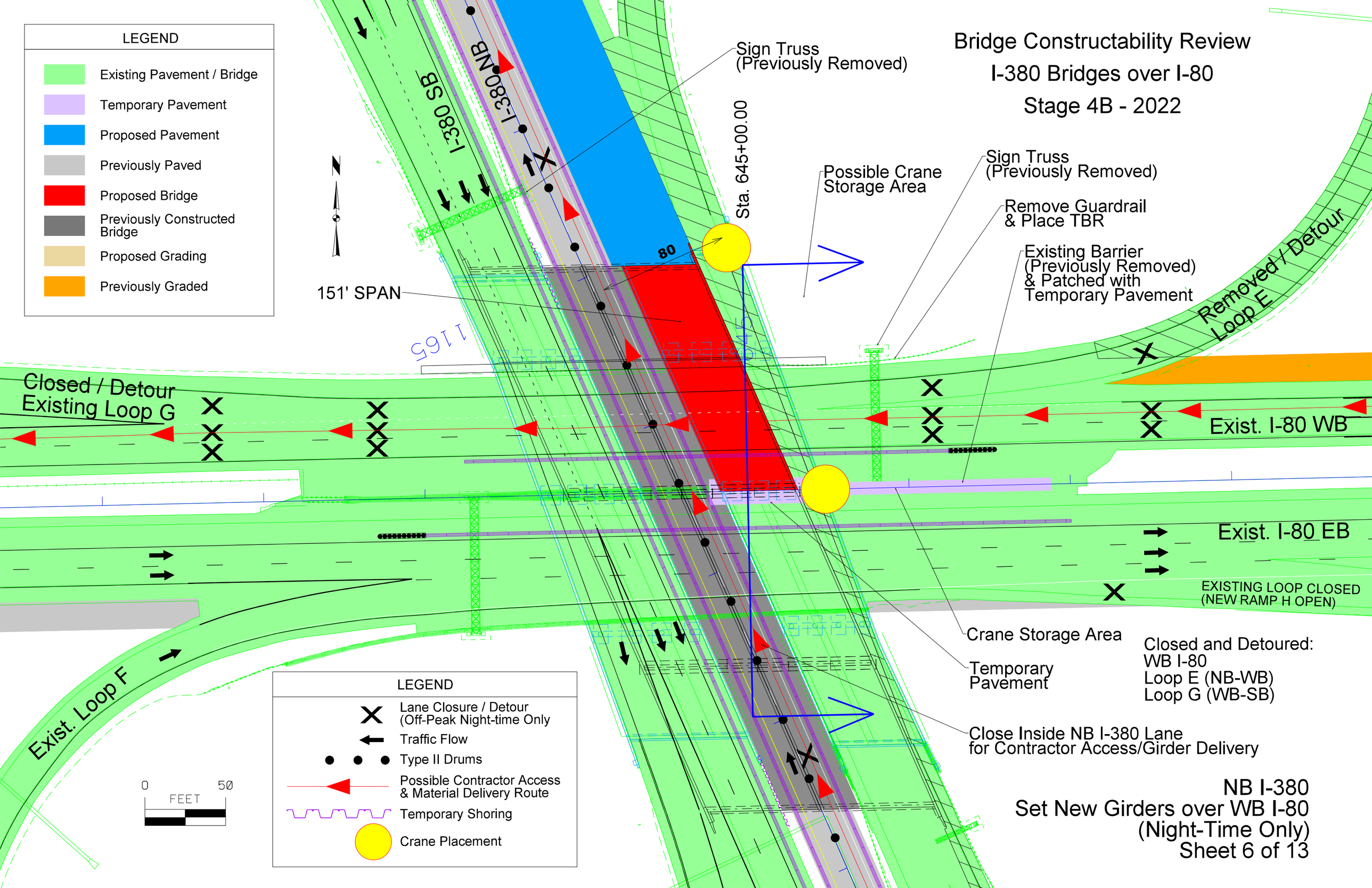
Set New Centrer Girders over EB I-80
(Night-Time Only)
Sheet 3 of 13

Bridge Constructability Review
I-380 Bridges over I-80
Stage 4B - 2022



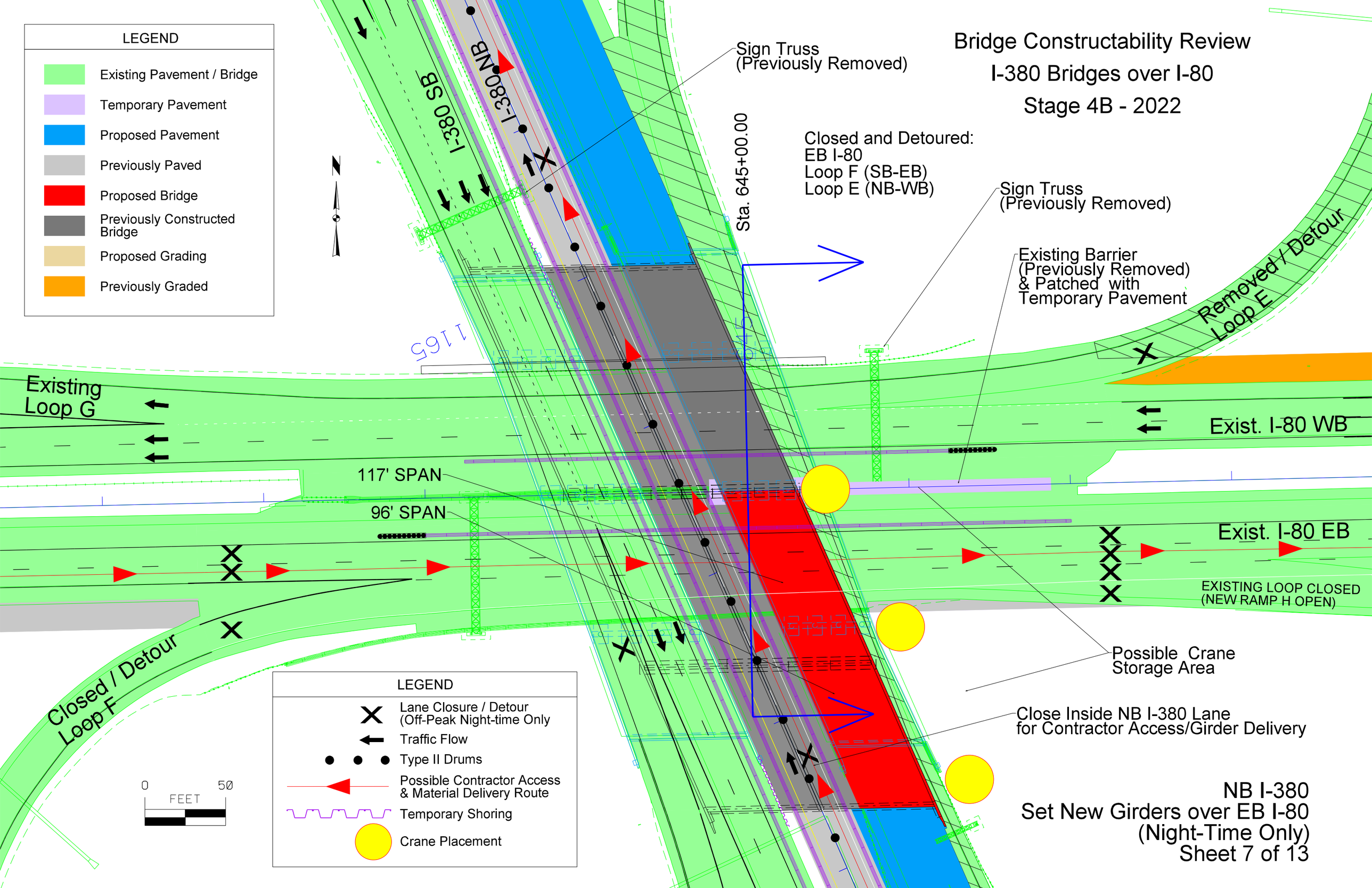
NB I-380
Demo (Night-Time Only) &
Pier Construction
Sheet 5 of 13

Bridge Constructability Review
I-380 Bridges over I-80
Stage 4B - 2022



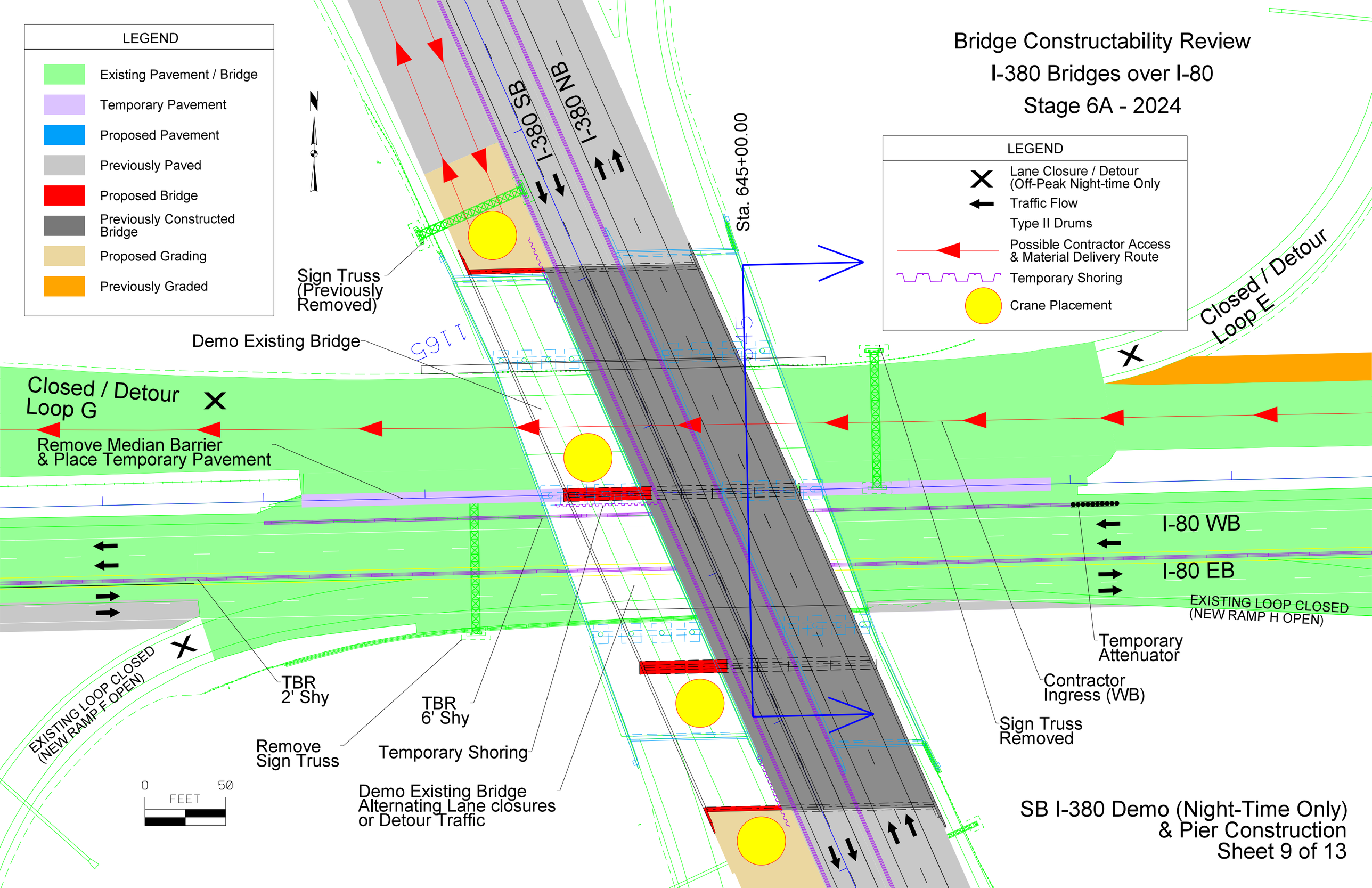
NB I-380
Set New Girders over WB I-80
(Night-Time Only)
Sheet 6 of 13

Bridge Constructability Review
I-380 Bridges over I-80
Stage 4B - 2022



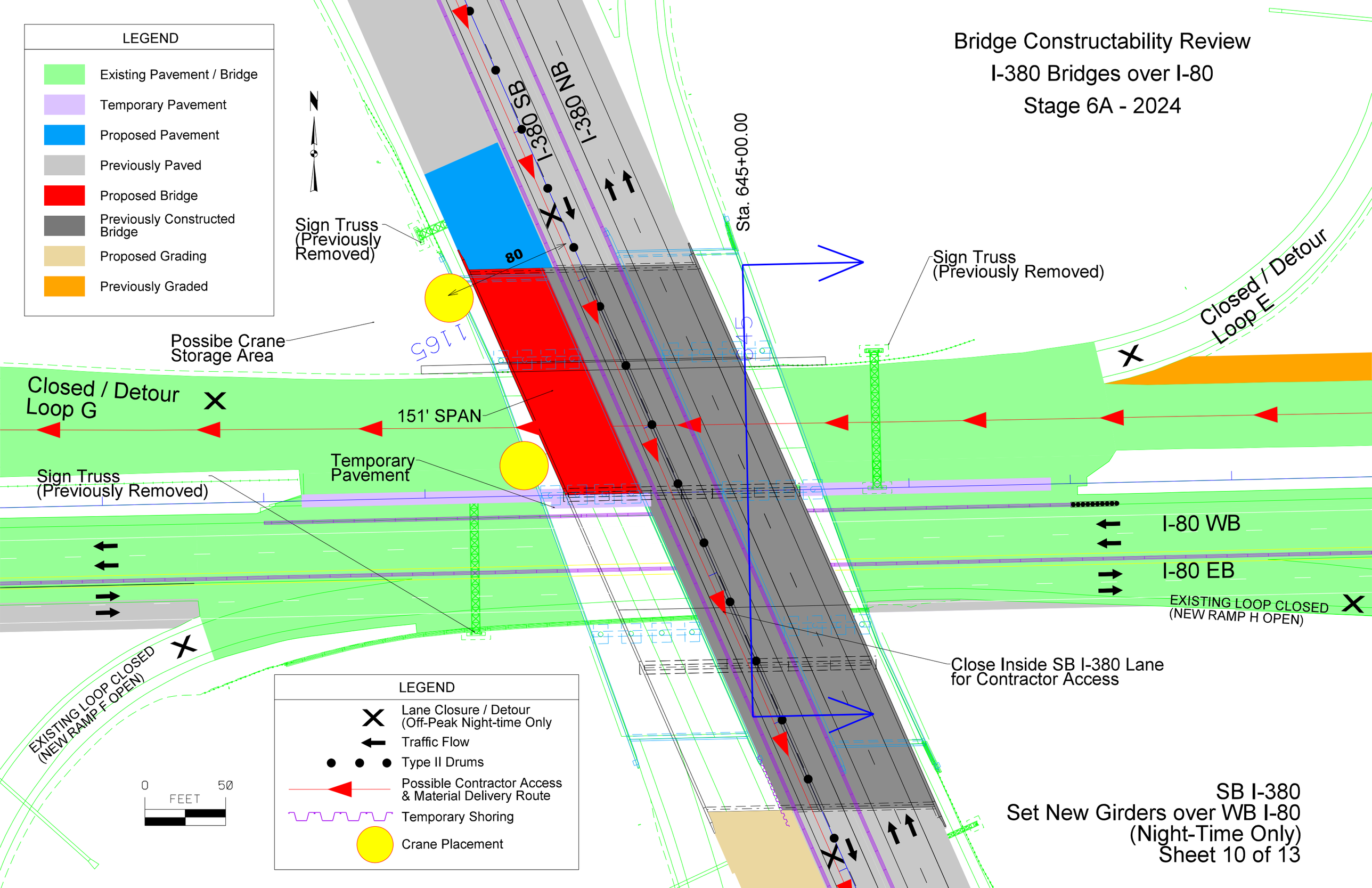
NB I-380
Set New Girders over EB I-80
(Night-Time Only)
Sheet 7 of 13

Bridge Constructability Review
I-380 Bridges over I-80
Stage 6A - 2024



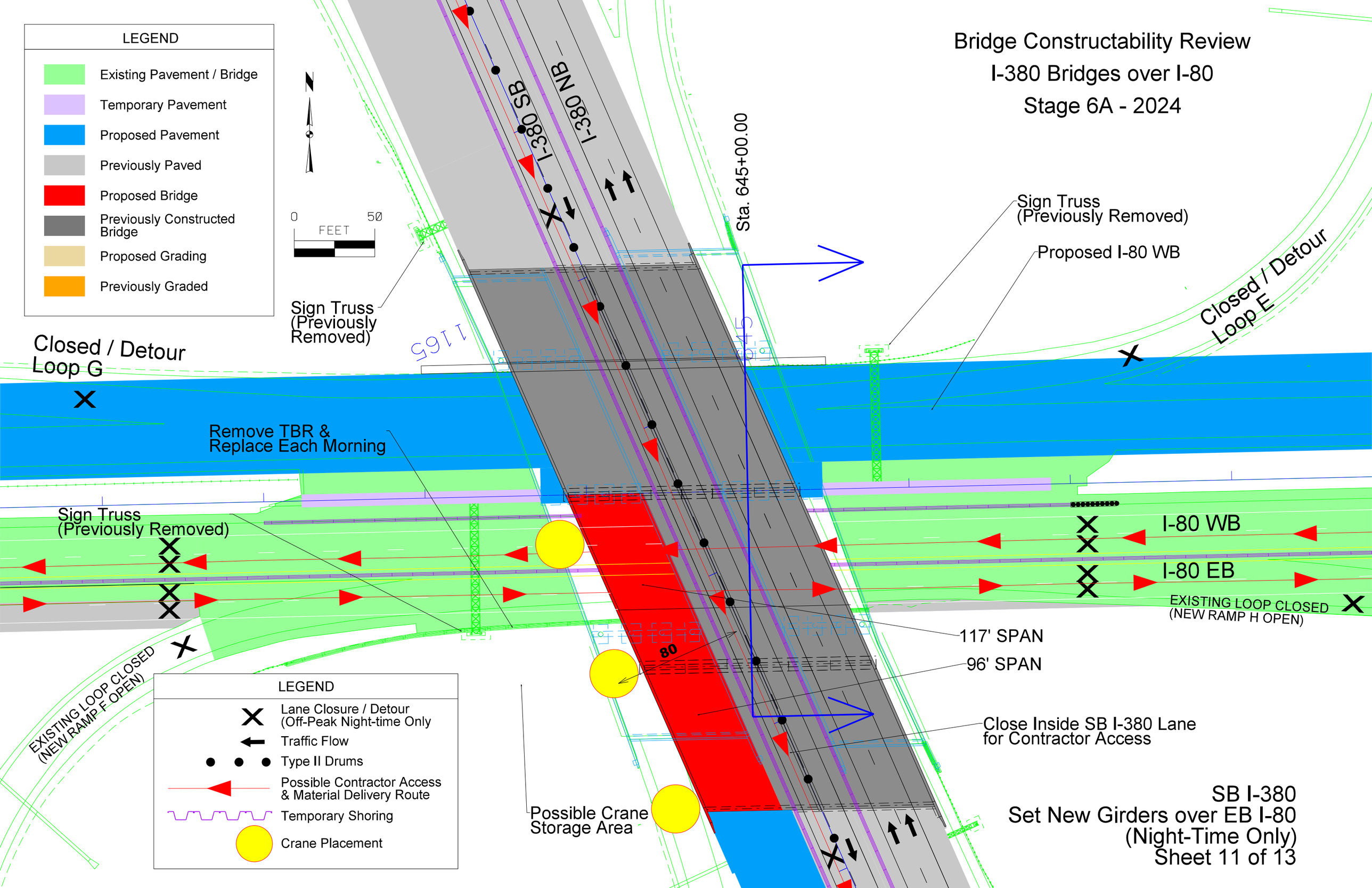
SB I-380 Demo (Night-Time Only) & Pier Construction
Sheet 9 of 13

Bridge Constructability Review
I-380 Bridges over I-80
Stage 6A - 2024

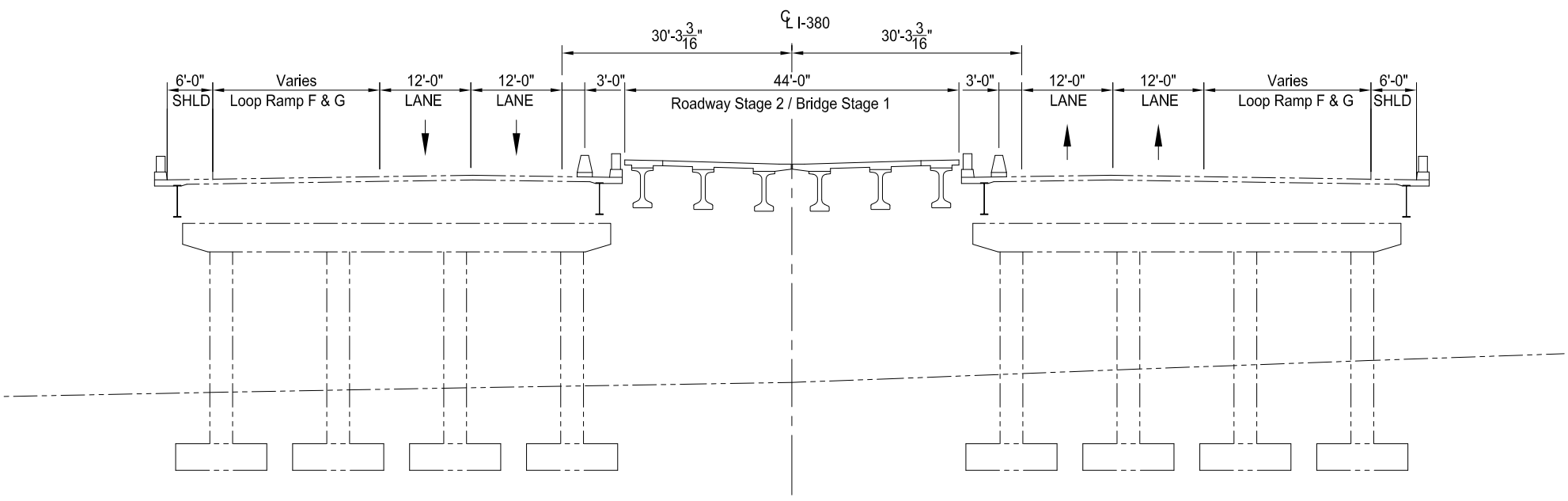


SB I-380
Set New Girders over WB I-80
(Night-Time Only)
Sheet 10 of 13

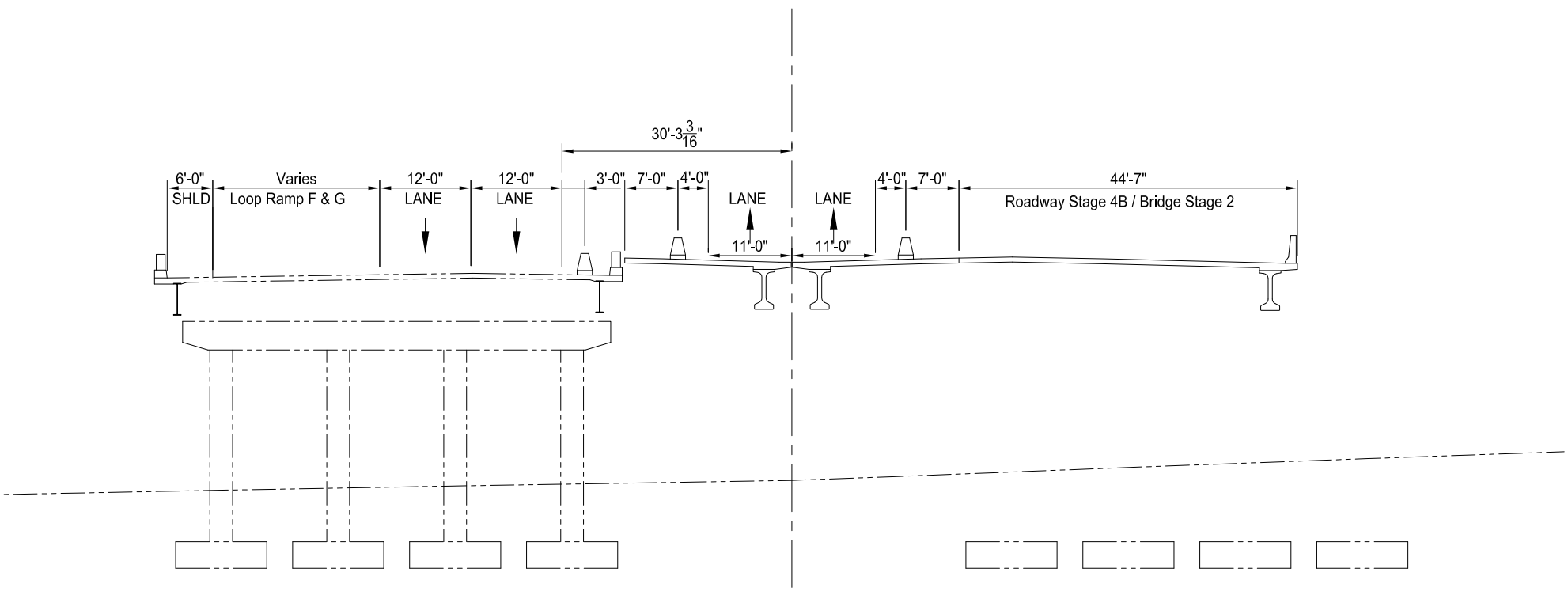
Bridge Constructability Review
I-380 Bridges over I-80
Stage 6A - 2024



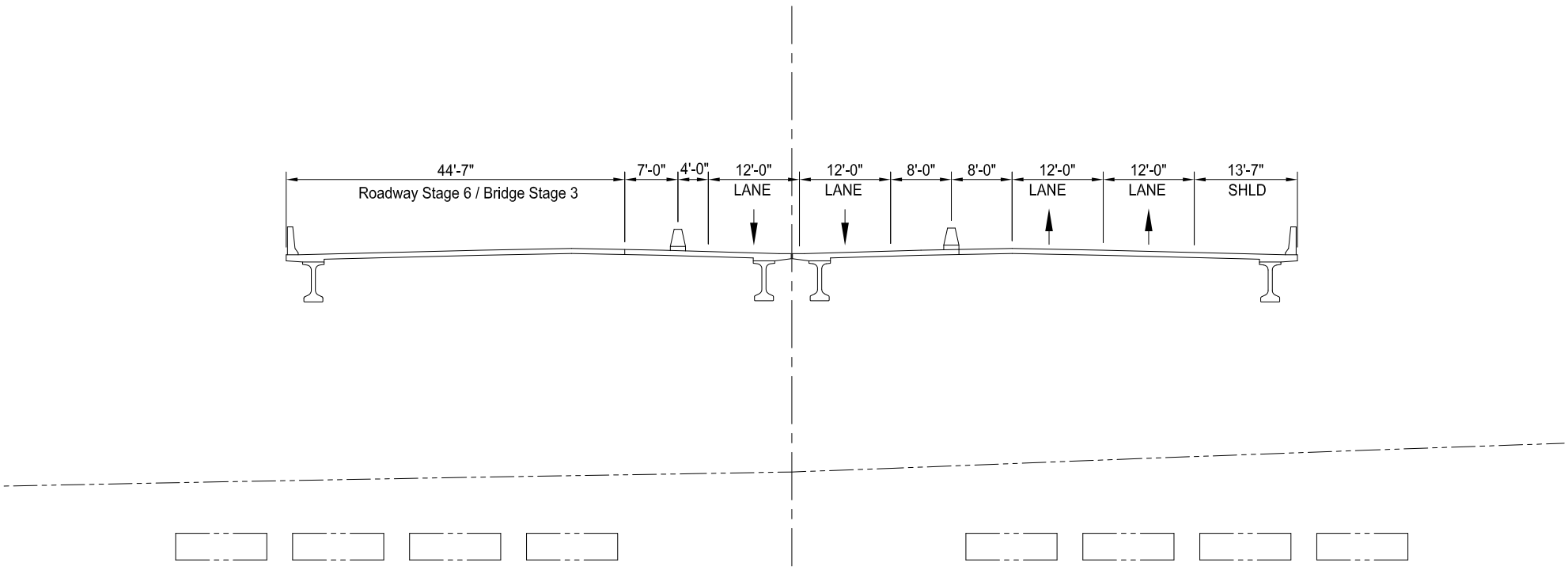
SB I-380
Set New Girders over EB I-80
(Night-Time Only)
Sheet 11 of 13



ROADWAY STAGE 2 (2020)



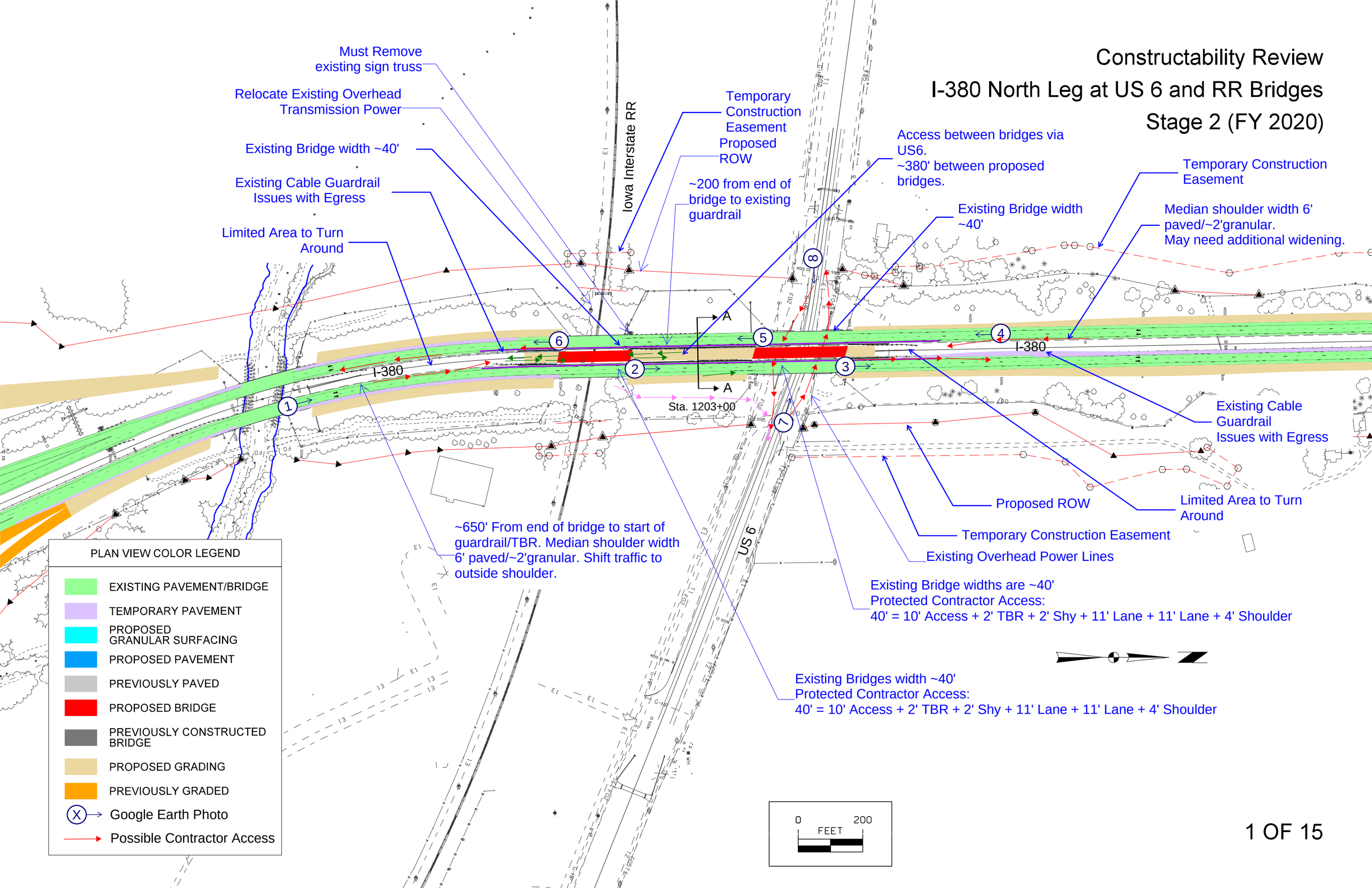
ROADWAY STAGE 4B (2022)



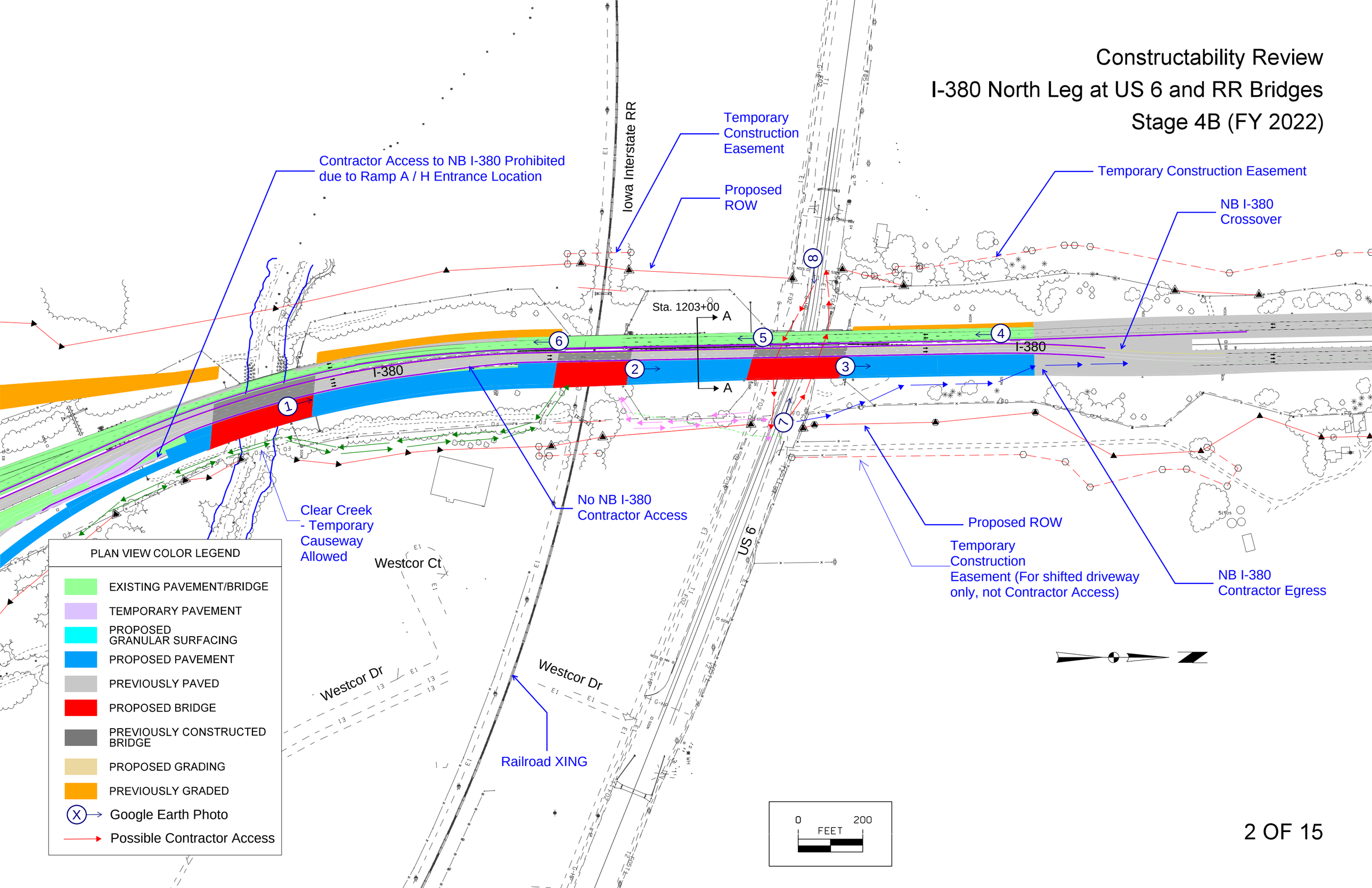
ROADWAY STAGE 6 (2024)

Sheet 13 of 13
I-380 Bridge Cross Section
STA 1163+54.25

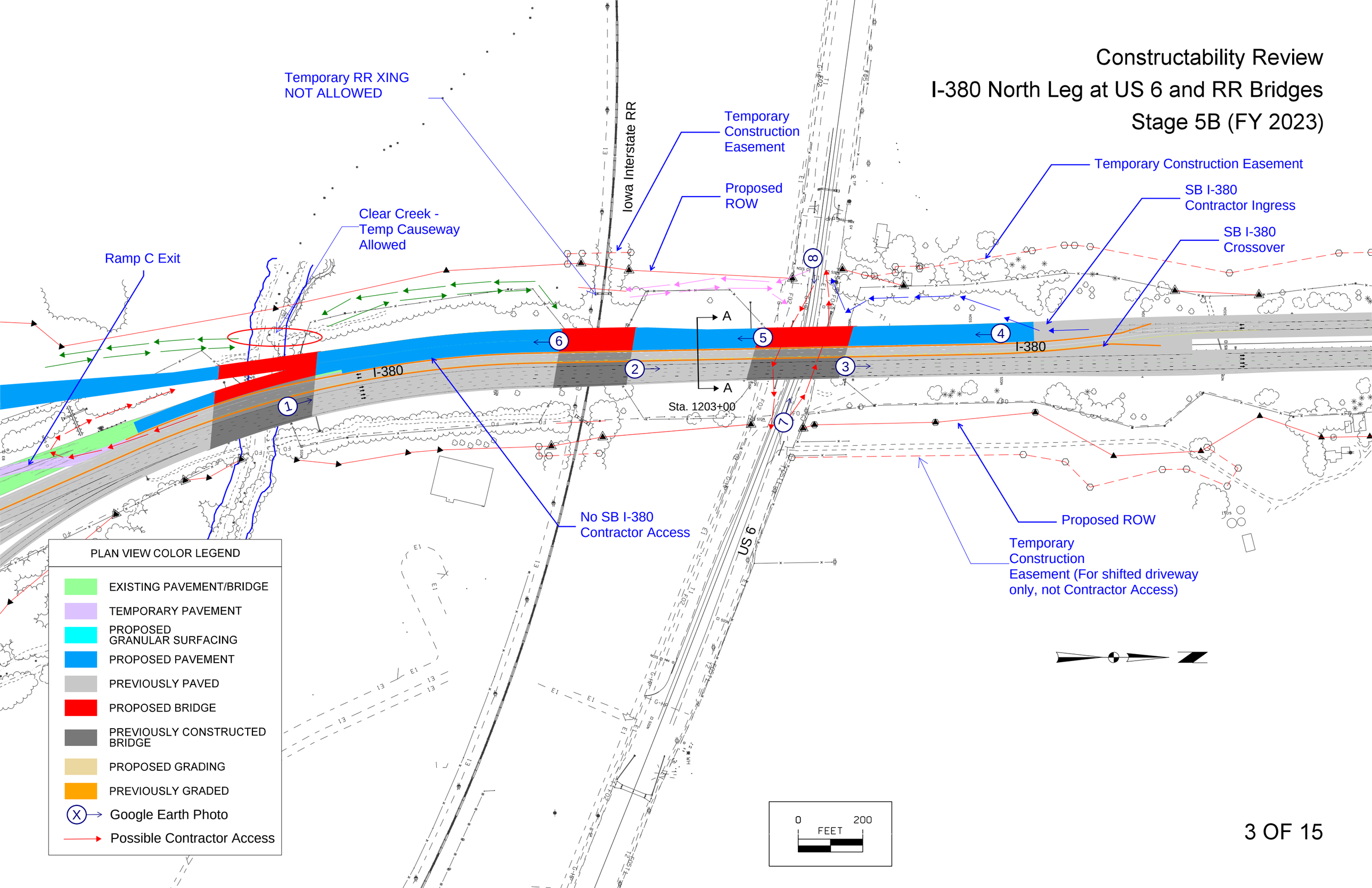
Constructability Review
I-380 North Leg at US 6 and RR Bridges
Stage 2 (FY 2020)



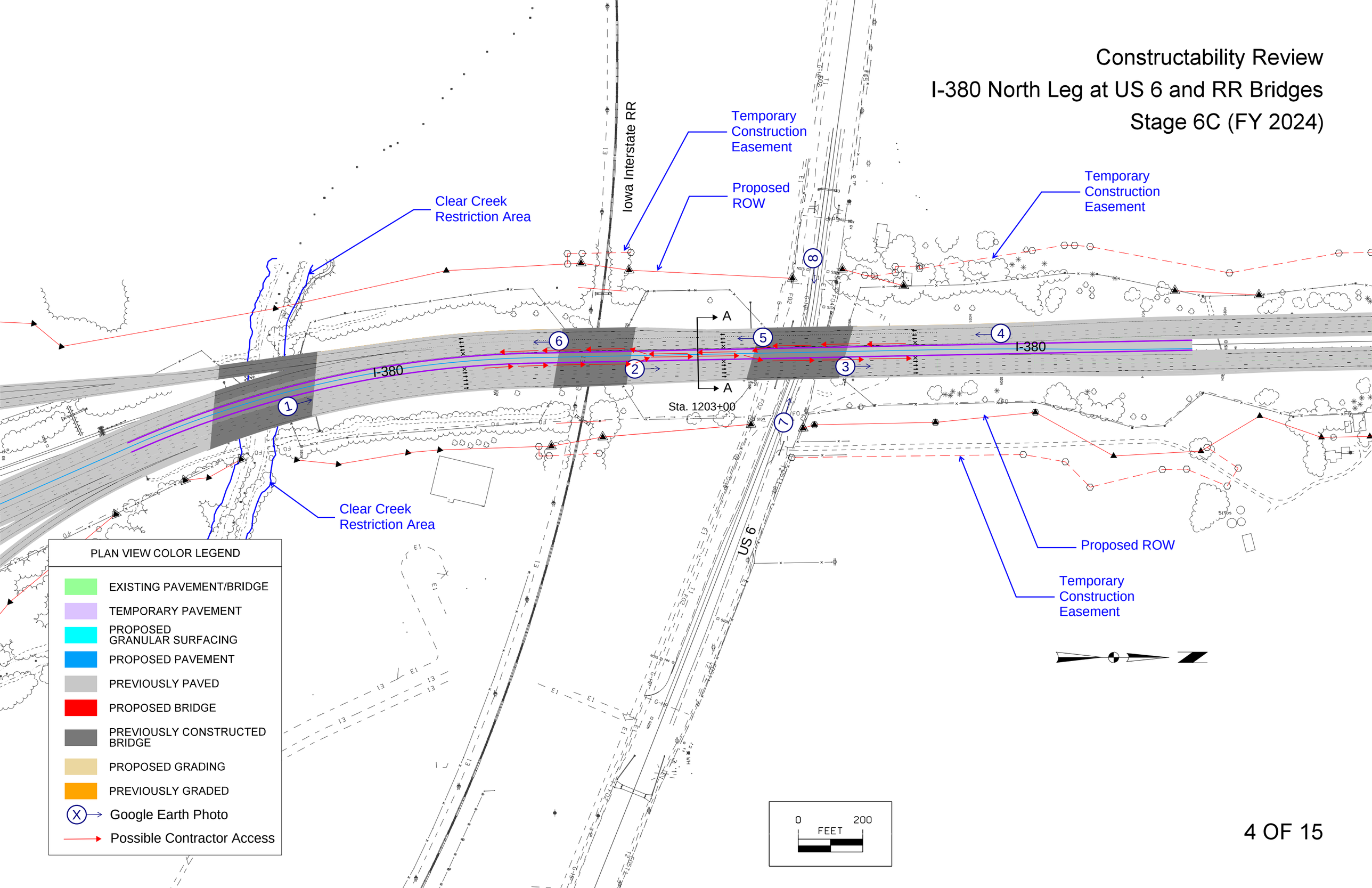
Constructability Review
I-380 North Leg at US 6 and RR Bridges
Stage 4B (FY 2022)

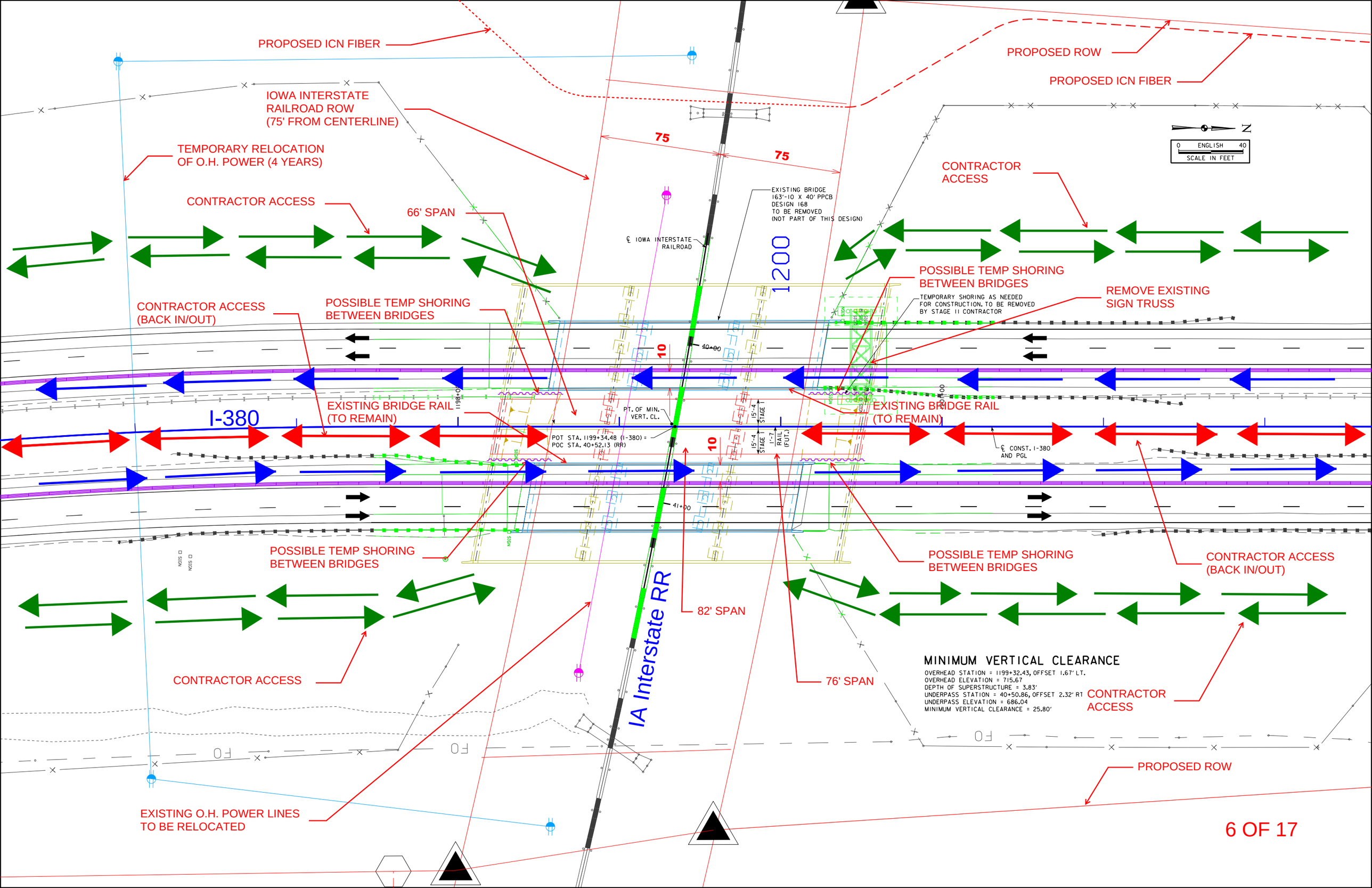


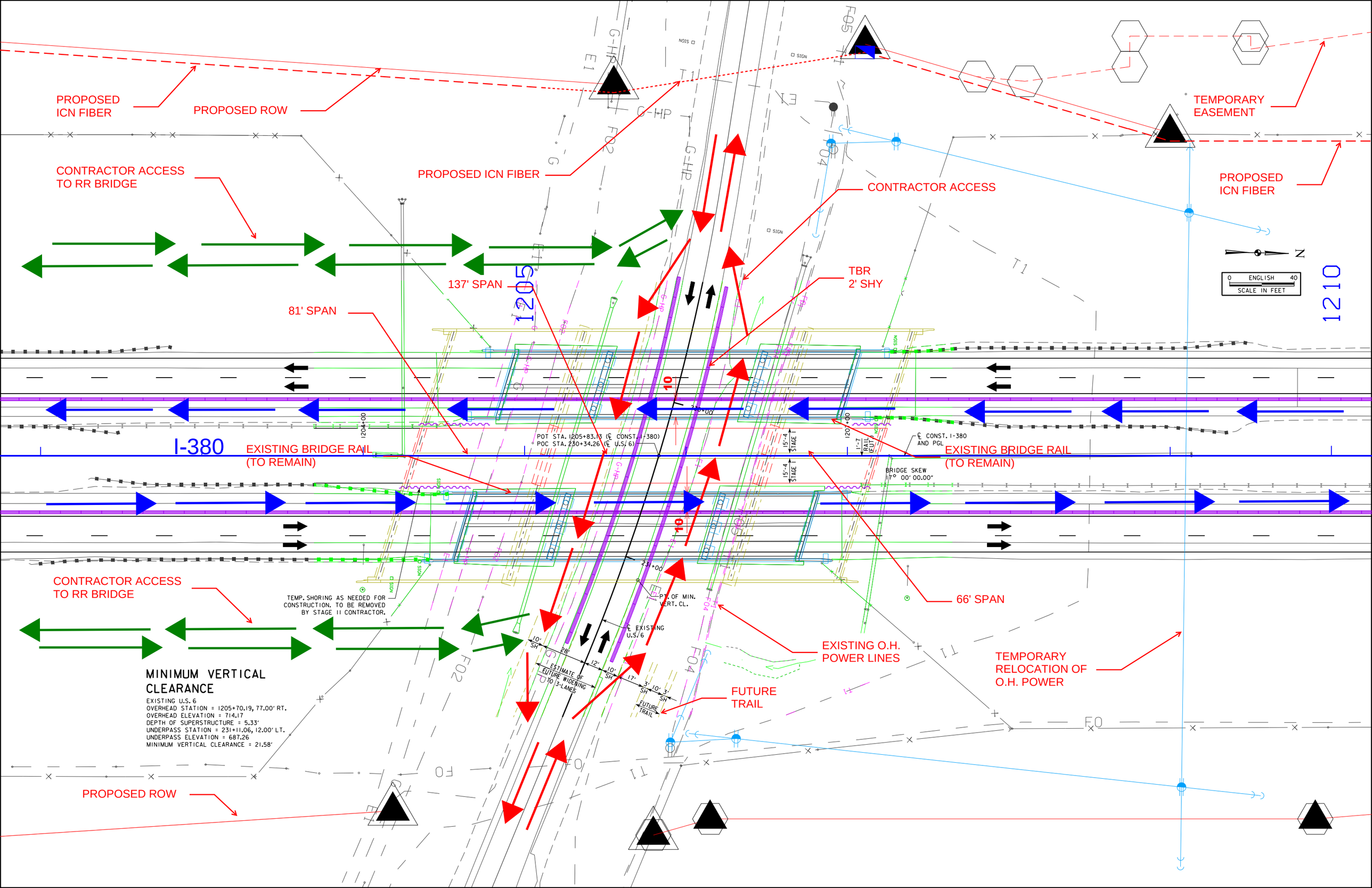
Constructability Review
I-380 North Leg at US 6 and RR Bridges
Stage 5B (FY 2023)



Constructability Review
I-380 North Leg at US 6 and RR Bridges
Stage 6C (FY 2024)



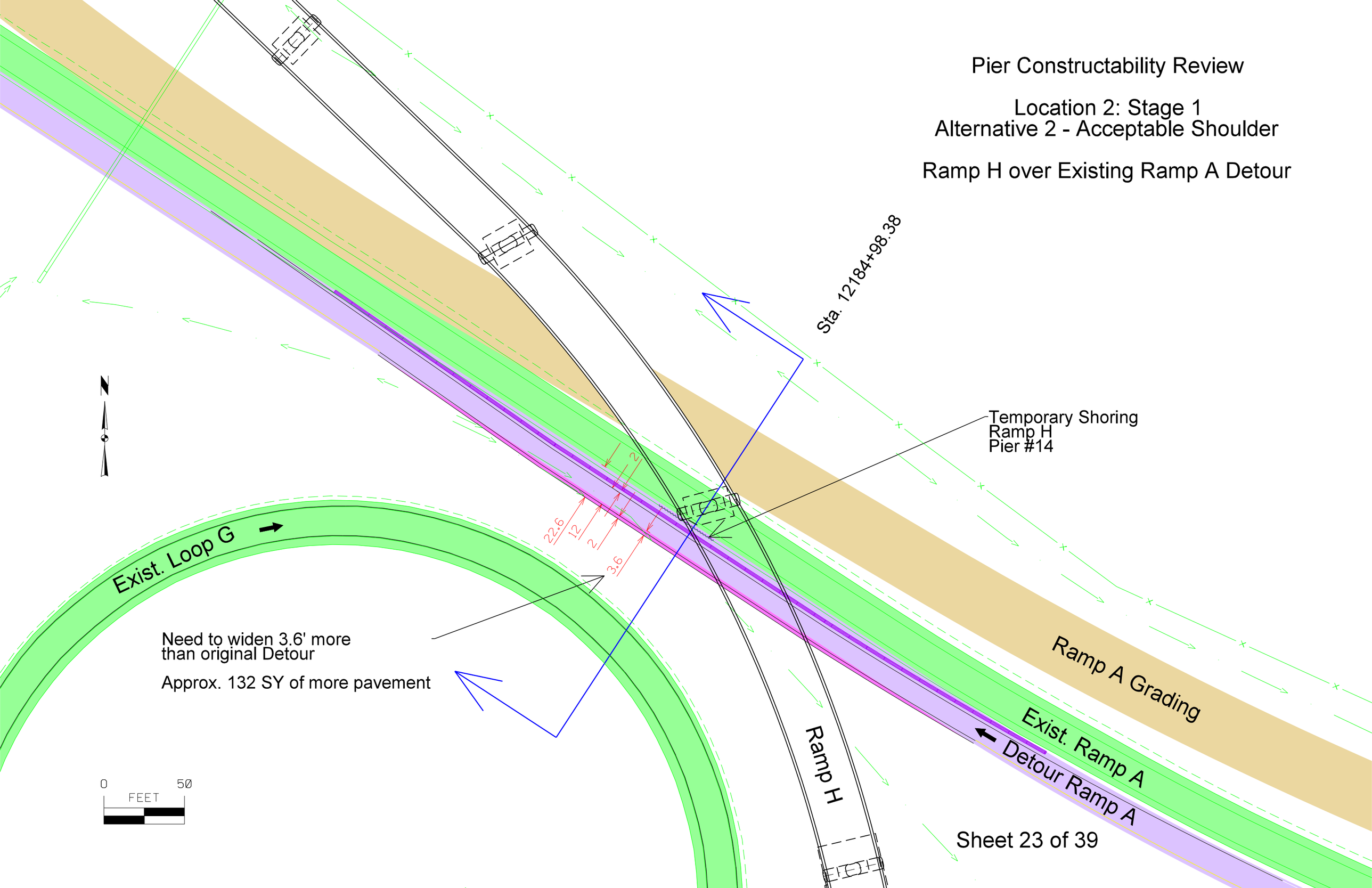

PROPOSED ICN FIBER
PROPOSED ROW
PROPOSED ICN FIBER
IOWA INTERSTATE
RAILROAD ROW
(75' FROM CENTERLINE)
TEMPORARY RELOCATION
OF O.H. POWER (4 YEARS)
CONTRACTOR ACCESS
66' SPAN
75
75
EXISTING BRIDGE
163'-10 X 40' PPCB
DESIGN 168
TO BE REMOVED
(NOT PART OF THIS DESIGN)
℄ IOWA INTERSTATE
RAILROAD
1200
CONTRACTOR
ACCESS
N
0 ENGLISH 40
SCALE IN FEET
POSSIBLE TEMP SHORING
BETWEEN BRIDGES
TEMPORARY SHORING AS NEEDED
FOR CONSTRUCTION. TO BE REMOVED
BY STAGE II CONTRACTOR
REMOVE EXISTING
SIGN TRUSS
CONTRACTOR ACCESS
(BACK IN/OUT)
POSSIBLE TEMP SHORING
BETWEEN BRIDGES
10
40+00
EXISTING BRIDGE RAIL
(TO REMAIN)
EXISTING BRIDGE RAIL
(TO REMAIN)
I-380
PT. OF MIN.
VERT. CL.
POT STA. 1199+34.48 (I-380) =
POC STA. 40+52.13 (RR)
15'-4
STAGE I
15'-4
STAGE I
1'-7
RAIL
(FUT.)
10
℄ CONST. I-380
AND PGL
41+00
POSSIBLE TEMP SHORING
BETWEEN BRIDGES
POSSIBLE TEMP SHORING
BETWEEN BRIDGES
CONTRACTOR ACCESS
(BACK IN/OUT)
82' SPAN
IA Interstate RR
CONTRACTOR ACCESS
76' SPAN
MINIMUM VERTICAL CLEARANCE
OVERHEAD STATION = 1199+32.43, OFFSET 1.67' LT.
OVERHEAD ELEVATION = 715.67
DEPTH OF SUPERSTRUCTURE = 3.83'
UNDERPASS STATION = 40+50.86, OFFSET 2.32' RT
UNDERPASS ELEVATION = 686.04
MINIMUM VERTICAL CLEARANCE = 25.80'
CONTRACTOR
ACCESS
PROPOSED ROW
EXISTING O.H. POWER LINES
TO BE RELOCATED


PROPOSED ICN FIBER
PROPOSED ROW
CONTRACTOR ACCESS TO RR BRIDGE
PROPOSED ICN FIBER
CONTRACTOR ACCESS
TEMPORARY EASEMENT
PROPOSED ICN FIBER
137' SPAN
81' SPAN
TBR 2' SHY
1205
1210
N
0 ENGLISH 40
SCALE IN FEET
I-380
EXISTING BRIDGE RAIL (TO REMAIN)
EXISTING BRIDGE RAIL (TO REMAIN)
POT STA. 1205+83.3 (℄ CONST. I-380)
POC STA. 230+34.26 (℄ U.S. 6)
℄ CONST. I-380 AND PGL
BRIDGE SKEW 17° 00' 00.00"
15'-4 STAGE I
66' SPAN
CONTRACTOR ACCESS TO RR BRIDGE
TEMP. SHORING AS NEEDED FOR CONSTRUCTION. TO BE REMOVED BY STAGE II CONTRACTOR.
PT. OF MIN. VERT. CL.
℄ EXISTING U.S. 6
ESTIMATE OF FUTURE WIDENING TO 3-LANES
FUTURE TRAIL
EXISTING O.H. POWER LINES
TEMPORARY RELOCATION OF O.H. POWER
MINIMUM VERTICAL CLEARANCE
EXISTING U.S. 6
OVERHEAD STATION = 1205+70.19, 77.00' RT.
OVERHEAD ELEVATION = 714.17
DEPTH OF SUPERSTRUCTURE = 5.33'
UNDERPASS STATION = 231+11.06, 12.00' LT.
UNDERPASS ELEVATION = 687.26
MINIMUM VERTICAL CLEARANCE = 21.58'
PROPOSED ROW

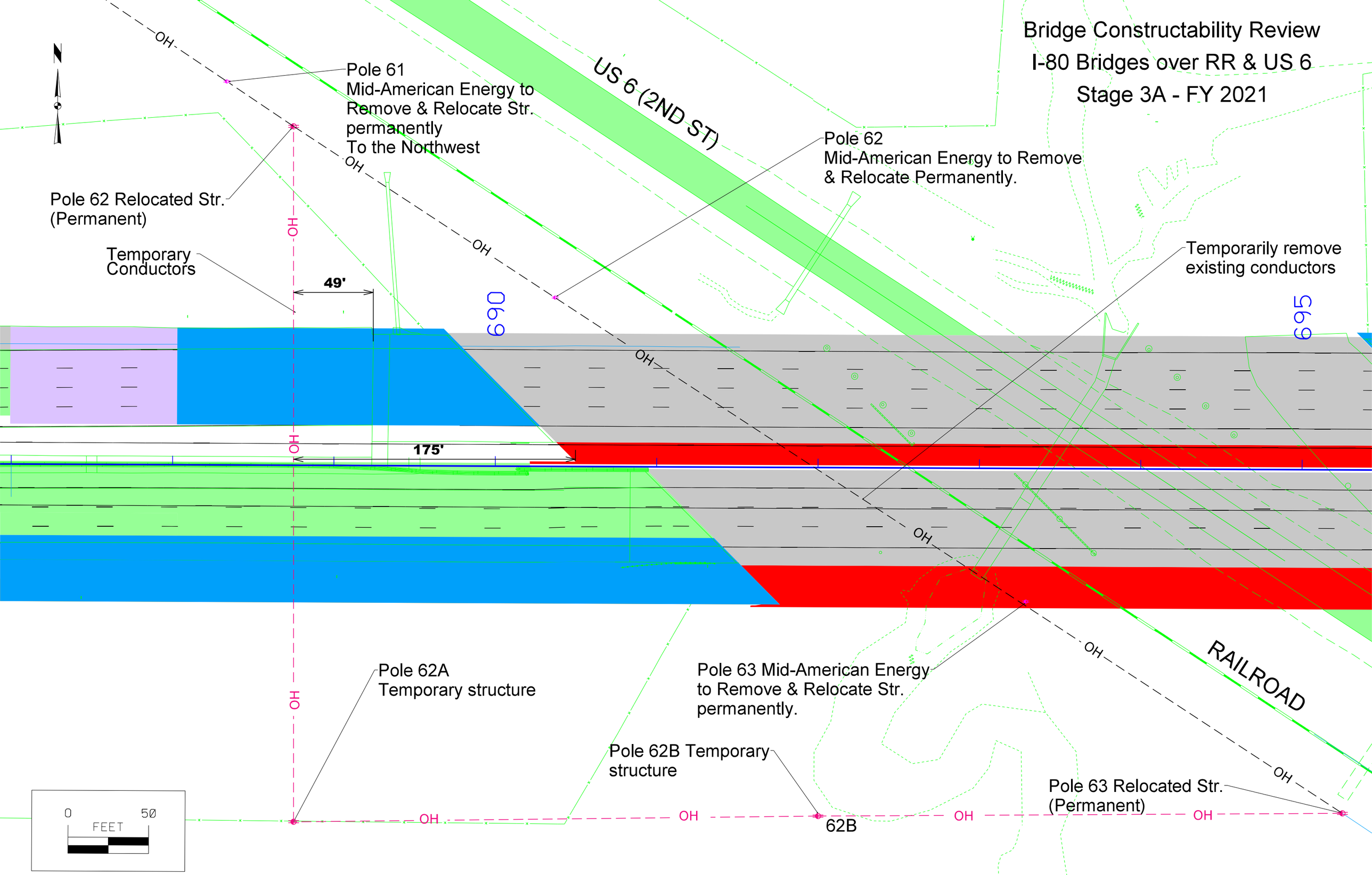
Pier Constructability Review

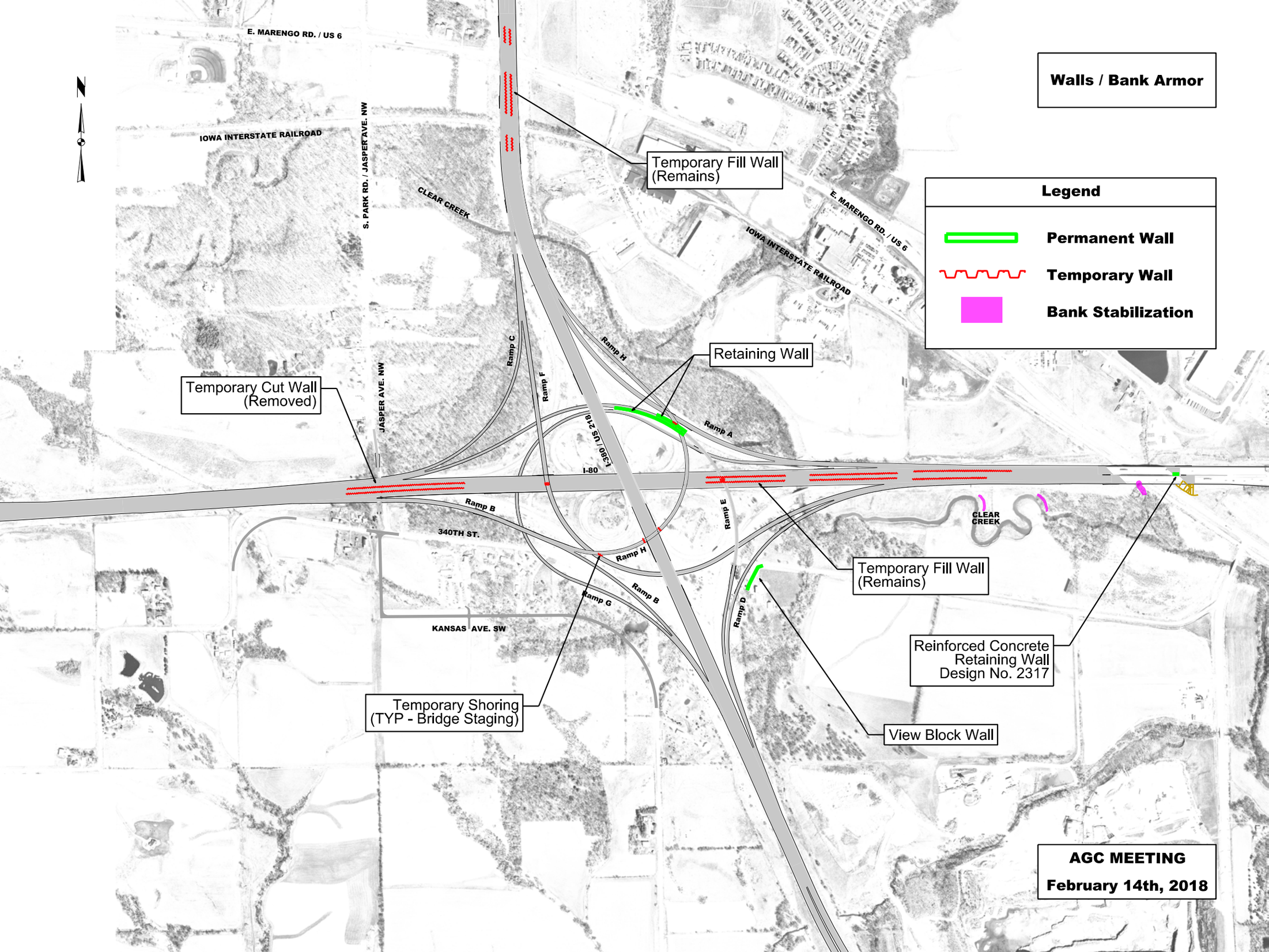
Location 2: Stage 1
Alternative 2 - Acceptable Shoulder

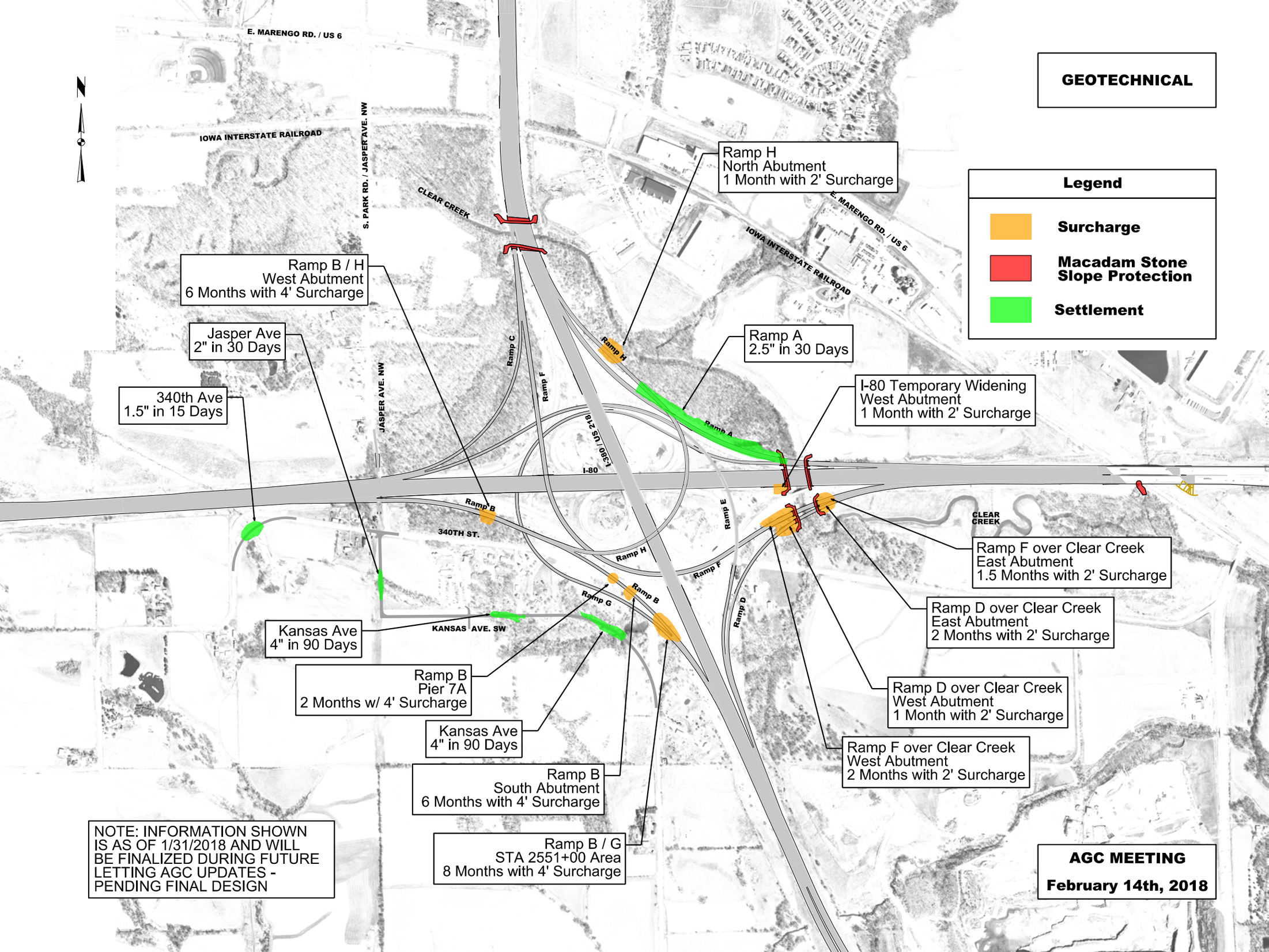
Ramp H over Existing Ramp A Detour

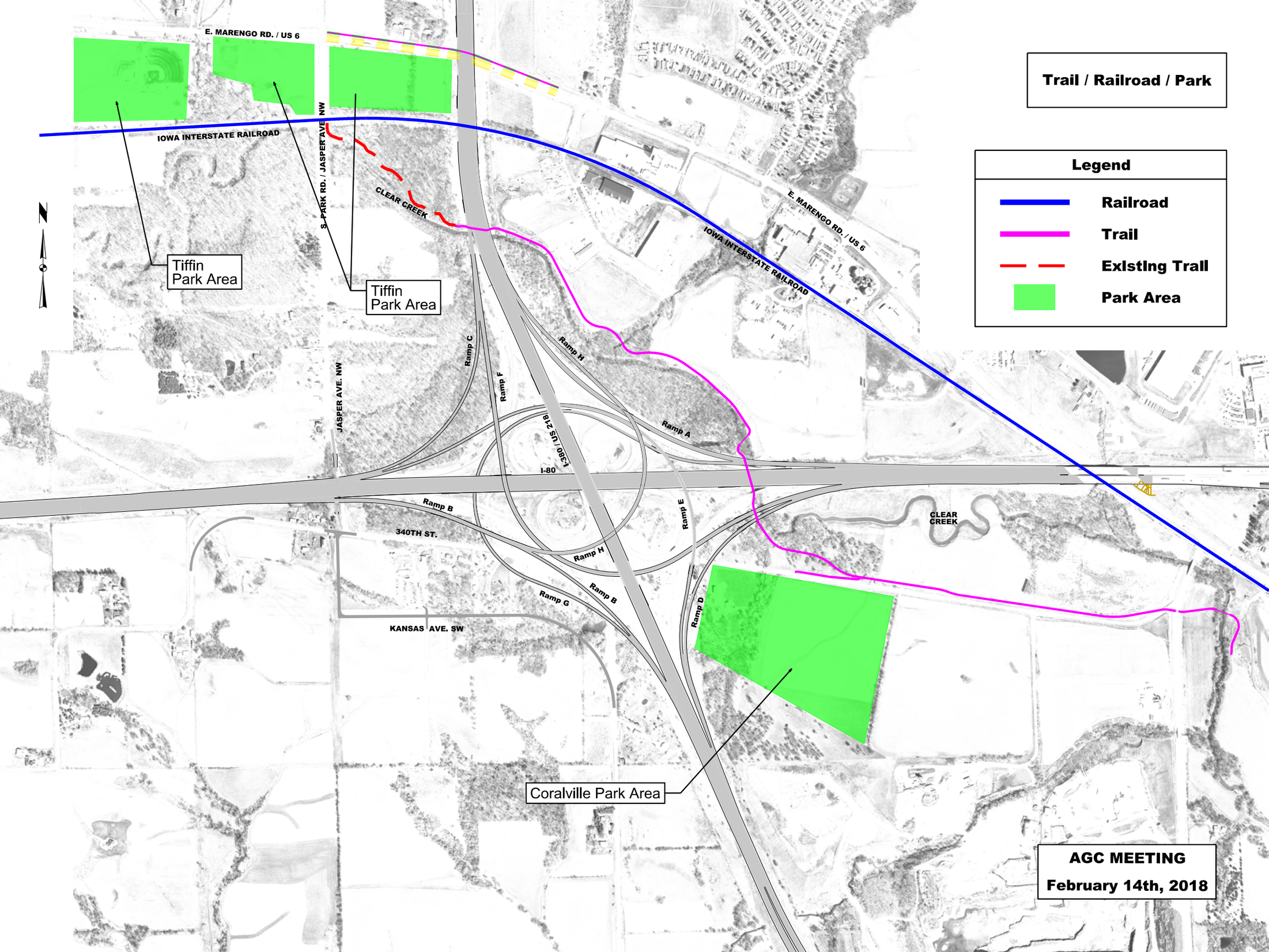


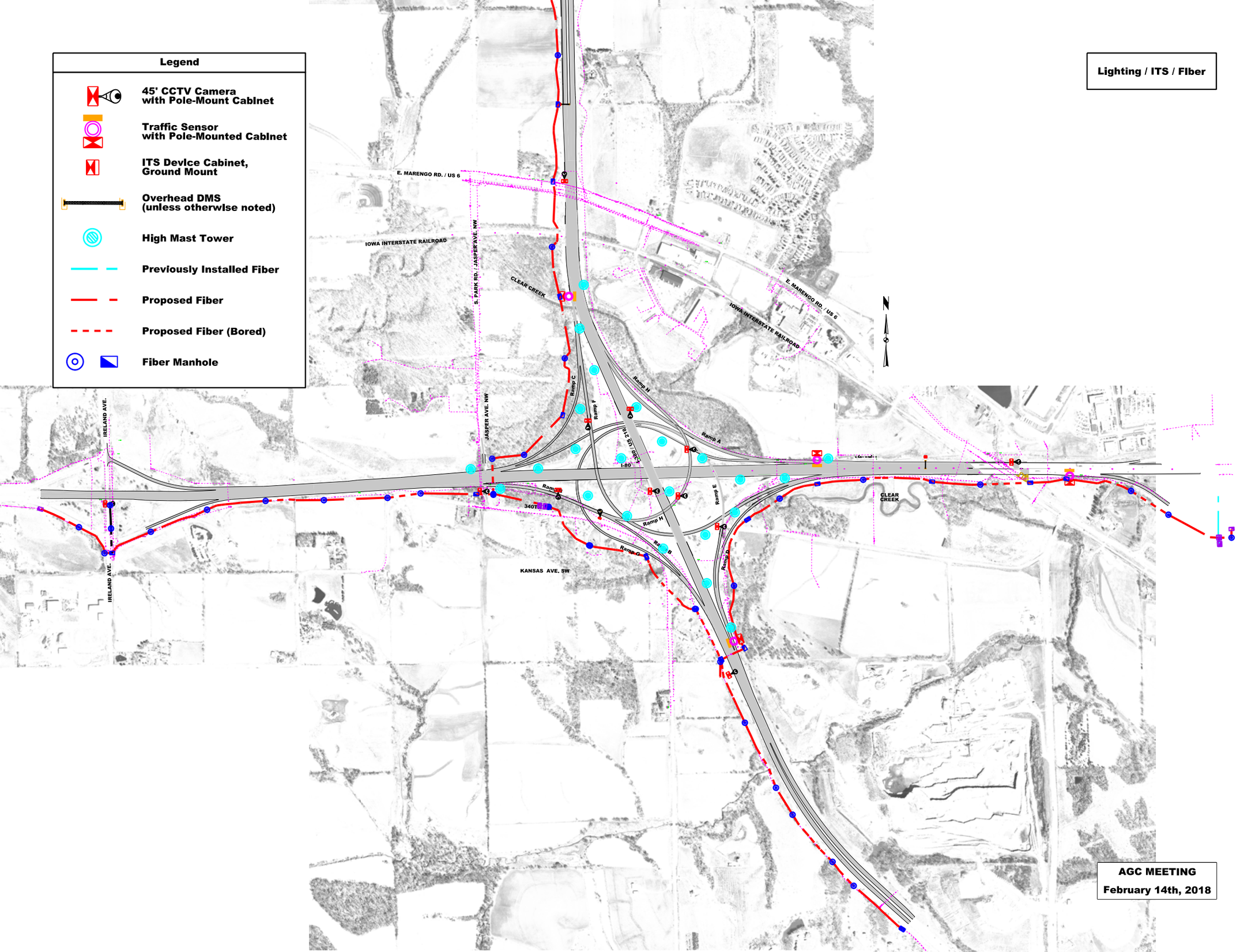
Sheet 23 of 39

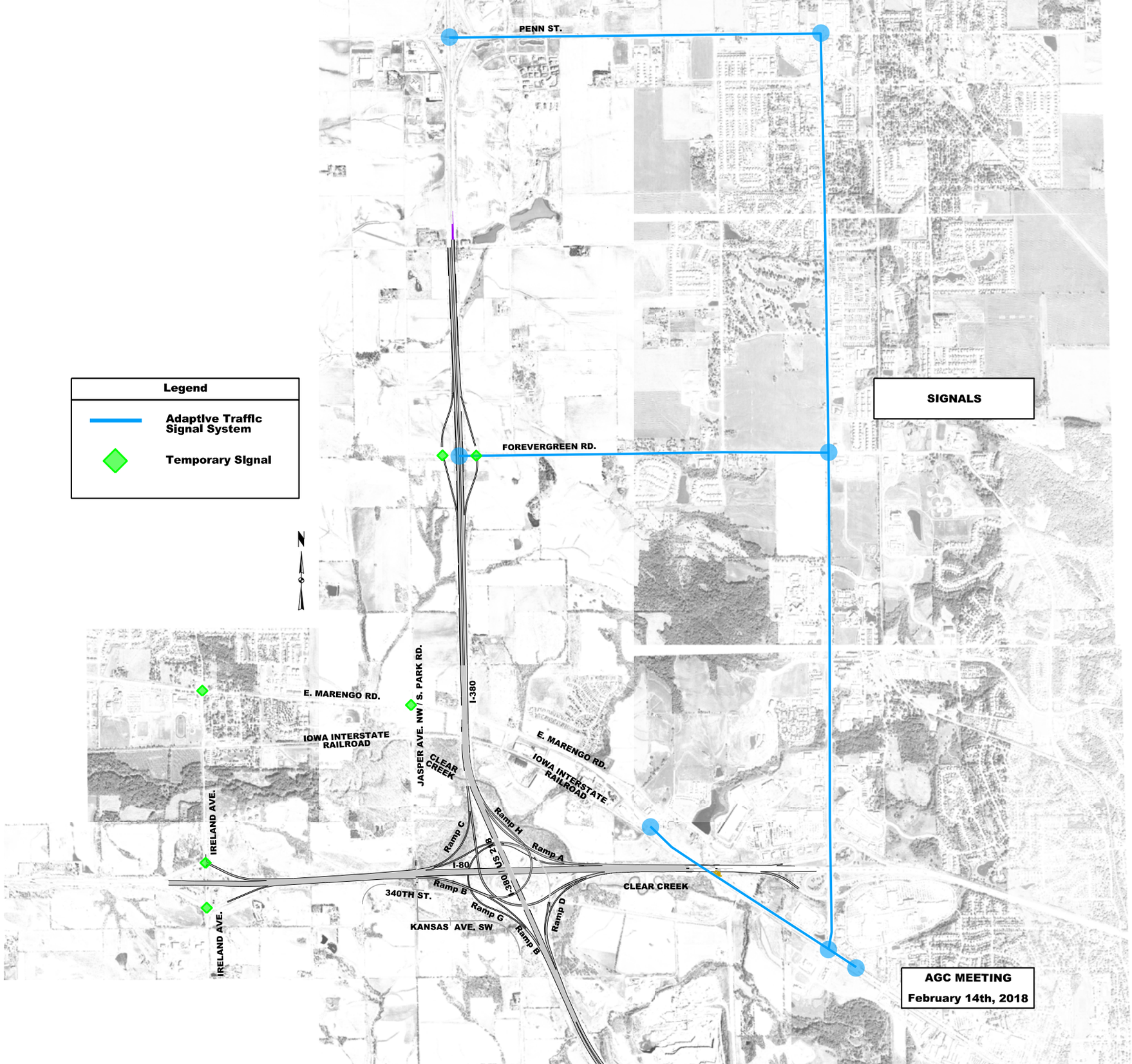

Bridge Constructability Review
I-80 Bridges over RR & US 6
Stage 3A - FY 2021
US 6 (2ND ST)
Pole 61
Mid-American Energy to
Remove & Relocate Str.
permanently
To the Northwest
Pole 62
Mid-American Energy to Remove
& Relocate Permanently.
Pole 62 Relocated Str.
(Permanent)
Temporary
Conductors
Temporarily remove
existing conductors
49'
175'
690
695
OH
Pole 62A
Temporary structure
Pole 63 Mid-American Energy
to Remove & Relocate Str.
permanently.
Pole 62B Temporary
structure
62B
Pole 63 Relocated Str.
(Permanent)
RAILROAD
0
50
FEET


Walls / Bank Armor
Legend
Permanent Wall
Temporary Wall
Bank Stabilization
E. MARENGO RD. / US 6
IOWA INTERSTATE RAILROAD
S. PARK RD. / JASPER AVE. NW
CLEAR CREEK
Temporary Fill Wall (Remains)
Retaining Wall
Temporary Cut Wall (Removed)
JASPER AVE. NW
Ramp C
Ramp F
Ramp H
Ramp A
I-380 / US 218
I-80
Ramp B
340TH ST.
Ramp E
Ramp H
Ramp G
Ramp B
Ramp D
KANSAS AVE. SW
Temporary Fill Wall (Remains)
Reinforced Concrete Retaining Wall Design No. 2317
Temporary Shoring (TYP - Bridge Staging)
View Block Wall
AGC MEETING
February 14th, 2018


GEOTECHNICAL
Legend
Surcharge
Macadam Stone Slope Protection
Settlement
E. MARENGO RD. / US 6
IOWA INTERSTATE RAILROAD
S. PARK RD. / JASPER AVE. NW
CLEAR CREEK
JASPER AVE. NW
340TH ST.
KANSAS AVE. SW
I-80
I-380 / US 218
Ramp A
Ramp B
Ramp C
Ramp D
Ramp E
Ramp F
Ramp G
Ramp H
Ramp H
North Abutment
1 Month with 2' Surcharge
Ramp B / H
West Abutment
6 Months with 4' Surcharge
Jasper Ave
2" in 30 Days
340th Ave
1.5" in 15 Days
Ramp A
2.5" in 30 Days
I-80 Temporary Widening
West Abutment
1 Month with 2' Surcharge
Ramp F over Clear Creek
East Abutment
1.5 Months with 2' Surcharge
Ramp D over Clear Creek
East Abutment
2 Months with 2' Surcharge
Ramp D over Clear Creek
West Abutment
1 Month with 2' Surcharge
Ramp F over Clear Creek
West Abutment
2 Months with 2' Surcharge
Kansas Ave
4" in 90 Days
Ramp B
Pier 7A
2 Months w/ 4' Surcharge
Kansas Ave
4" in 90 Days
Ramp B
South Abutment
6 Months with 4' Surcharge
Ramp B / G
STA 2551+00 Area
8 Months with 4' Surcharge
NOTE: INFORMATION SHOWN IS AS OF 1/31/2018 AND WILL BE FINALIZED DURING FUTURE LETTING AGC UPDATES - PENDING FINAL DESIGN
AGC MEETING
February 14th, 2018


Trail / Railroad / Park
Legend
Railroad
Trail
Existing Trail
Park Area
E. MARENGO RD. / US 6
IOWA INTERSTATE RAILROAD
S. PARK RD. / JASPER AVE. NW
CLEAR CREEK
Tiffin Park Area
Tiffin Park Area
JASPER AVE. NW
Ramp C
Ramp F
Ramp H
Ramp A
I-380 / US 218
I-80
Ramp B
340TH ST.
Ramp H
Ramp B
Ramp G
Ramp E
Ramp D
KANSAS AVE. SW
CLEAR CREEK
Coralville Park Area
AGC MEETING
February 14th, 2018


Legend
45' CCTV Camera with Pole-Mount Cabinet
Traffic Sensor with Pole-Mounted Cabinet
ITS Device Cabinet, Ground Mount
Overhead DMS (unless otherwise noted)
High Mast Tower
Previously Installed Fiber
Proposed Fiber
Proposed Fiber (Bored)
Fiber Manhole
Lighting / ITS / Fiber
E. MARENGO RD. / US 6
IOWA INTERSTATE RAILROAD
S. PARK RD. / JASPER AVE. NW
CLEAR CREEK
JASPER AVE. NW
IRELAND AVE.
Ramp C
Ramp F
Ramp H
Ramp A
I-80
Ramp B
Ramp E
Ramp D
Ramp G
KANSAS AVE. SW
CLEAR CREEK
AGC MEETING
February 14th, 2018


PENN ST.
FOREVERGREEN RD.
SIGNALS
Legend
Adaptive Traffic Signal System
Temporary Signal
N
E. MARENGO RD.
IOWA INTERSTATE RAILROAD
JASPER AVE. NW / S. PARK RD.
I-380
CLEAR CREEK
E. MARENGO RD.
IOWA INTERSTATE RAILROAD
IRELAND AVE.
Ramp C
Ramp H
Ramp A
I-80
US 218
I-380
Ramp B
340TH ST.
CLEAR CREEK
Ramp G
Ramp D
KANSAS AVE. SW
Ramp B
IRELAND AVE.
AGC MEETING
February 14th, 2018

GETTING YOU THERE

I-80/I-380 SYSTEMS INTERCHANGE

AGC MEETING – FEB 14, 2018