SHEET 1 OF 4

WILLIAMSON COUNTY

WILLIAMSON COUNTY

PRELIMINARY DESIGN FOR:

FM 3349 at US 79

PCT 2

PRECINCT 4

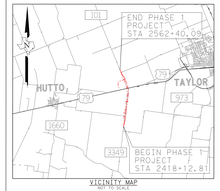
COUNTY: WILLIAMSON
LIMITS:FM 3349 FROM CR 404 TO NORTH OF CR 395
APPROX. LENGTH OF PROJECT = 2.73 MI
APPROX. LENGTH OF BRIDGE = 0.24 MI
FUNCTIONAL CLASSIFICATION = FREEWAY
ROADWAY CLASSIFICATION = RURAL
TERRAIN = ROLLING
MAXIMUM SUPERELEVATION RATE (emax) = 6.0%
FM 3349 AND US 79: TxDOT ROM (APRIL 2018)
COUNTY ROADS: WILLIAMSON COUNTY DCM

DESIGN SPEED CRITERIA

FM 3349 FRONTAGE ROAD:	45 MPH (INTERIM)
COUNTY ROADS:	45 MPH
JUG HANDLE * :	45 MPH

* LOW-SPEED DESIGN CRITERIA

	AADT		TRUCK PERCENTAGE	
	2018	2040		
FM 3349	950	66200	6.7	
US 79	18000	71000	17.2	



VICINITY MAP
NOT TO SCALE

BEARING BASIS: NAD83, TEXAS STATE PLANE, CENTRAL ZONE, US FOOT.

COORDINATES FOR THIS PROJECT ARE SURFACE VALUES BASED ON A COMBINED SURFACE ADJUSTMENT FACTOR OF 1.00012352
VERTICAL DATUM: NAD83, NORTH AMERICA DATUM OF 1983

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0 100 200 300 0 10 20 30

H: 1"=100' V: 1"=10'

FELIPE S. TUDTUD 104836 LICENSED ENGINEER

9/10/2020

PRELIMINARY

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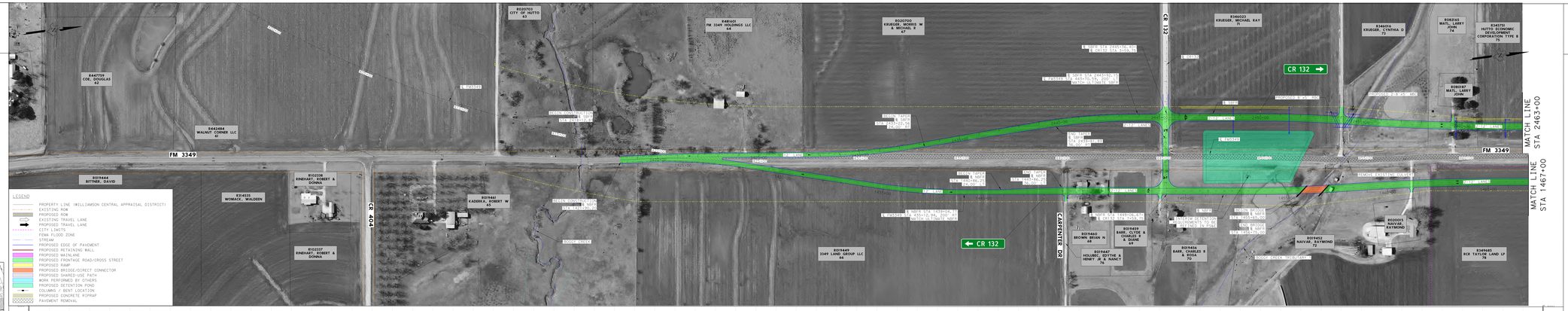
FM 3349
PHASE 1
INTERIM PROJECT
PLAN AND PROFILE

HDR Engineering Inc.
Texas P.E. Firm Registration No. F-754



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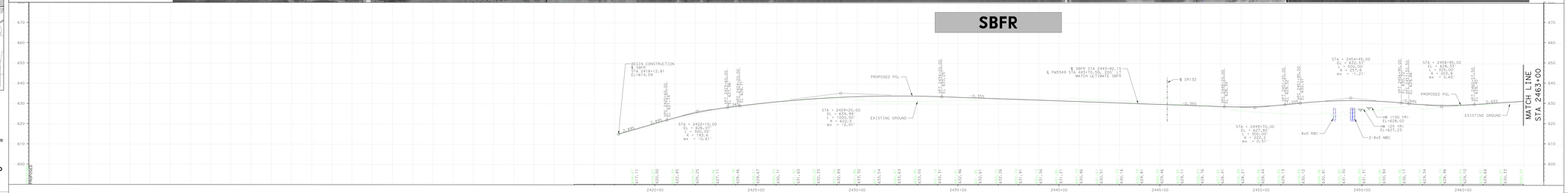
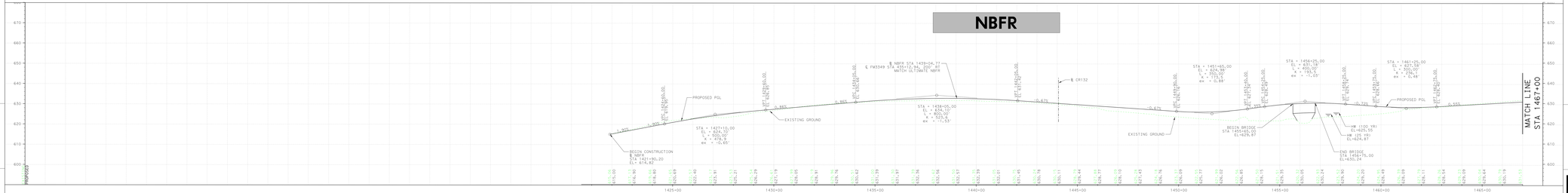


NBFR



WILLIAMSON COUNTY

WILLIAMSON COUNTY

PRELIMINARY DESIGN FOR:

FM 3349 at US 79

PCT 2

PRECINCT 4

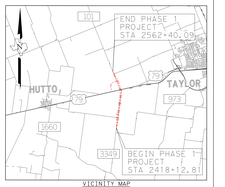
COUNTY: WILLIAMSON
LIMITS:FM 3349 FROM CR 404 TO NORTH OF CR 395
APPROX. LENGTH OF PROJECT = 2.73 MI
APPROX. LENGTH OF BRIDGE = 0.24 MI
FUNCTIONAL CLASSIFICATION = FREEWAY
ROADWAY CLASSIFICATION = RURAL
TERRAIN = ROLLING
MAXIMUM SUPERELEVATION RATE (emax) = 6.0%
FM 3349 AND US 79: TxDOT ROM (APRIL 2018)
COUNTY ROADS: WILLIAMSON COUNTY DCM

DESIGN SPEED CRITERIA

FM 3349 FRONTAGE ROAD:	45 MPH (INTERIM)
COUNTY ROADS:	45 MPH
JUG HANDLE * :	45 MPH

* LOW-SPEED DESIGN CRITERIA

	AADT		TRUCK PERCENTAGE	
	2018	2040		
FM 3349	950	66200	6.7	
US 79	18000	71000	17.2	



VICINITY MAP
NOT TO SCALE

BEARING BASIS: NAD83, TEXAS STATE PLANE, CENTRAL ZONE, US FOOT.

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VERTICAL DATUM: NAD83, NORTH AMERICA DATUM OF 1983

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0 100 200 300 0 10 20 30

H: 1"=100' V: 1"=10'

FELIPE S. TUDTUD 104836 LICENSED ENGINEER

9/10/2020

PRELIMINARY

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FM3349
PHASE 1
INTERIM PROJECT
PLAN AND PROFILE

HDR Engineering Inc.
Texas P.E. Firm Registration No. F-754

SHEET 2 OF 4

WILLIAMSON COUNTY

WILLIAMSON COUNTY

PRELIMINARY DESIGN FOR:

FM 3349 at US 79

PSJ2

PRECINCT 4

COUNTY: WILLIAMSON
LIMITS:FM 3349 FROM CR 404 TO NORTH OF CR 395
APPROX. LENGTH OF PROJECT = 2.73 MI
APPROX. LENGTH OF BRIDGE = 0.24 MI
FUNCTIONAL CLASSIFICATION = FREEWAY
FUNCTIONAL CLASSIFICATION = RURAL
TERRAIN = ROLLING
MAXIMUM SUPERELEVATION RATE (emax) = 6.0%
FM 3349 AND US 79: TxDOT ROM (APRIL 2018)
COUNTY ROADS: WILLIAMSON COUNTY DCM

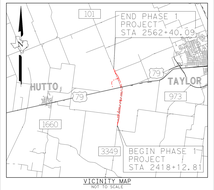
DESIGN SPEED CRITERIA

FM 3349 FRONTAGE ROAD:	45 MPH (INTERIM)
COUNTY ROADS:	45 MPH
JUG HANDLE * :	45 MPH

* LOW-SPEED DESIGN CRITERIA

AADT

	2018	2040	TRUCK PERCENTAGE
FM 3349	950	66200	6.7
US 79	18000	71000	17.2



VICINITY MAP
NOT TO SCALE

BEARING BASIS: NAD83, TEXAS STATE PLANE, CENTRAL ZONE, US FOOT.

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VERTICAL DATUM: NADB3, NORTH AMERICA DATUM OF 1983

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9/10/2020

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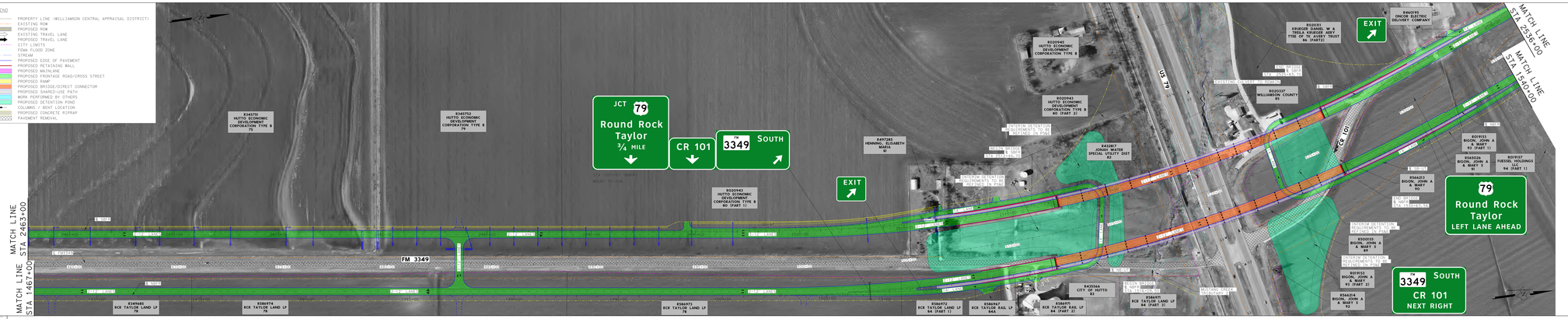
FM 3349
PHASE 1
INTERIM PROJECT
PLAN AND PROFILE

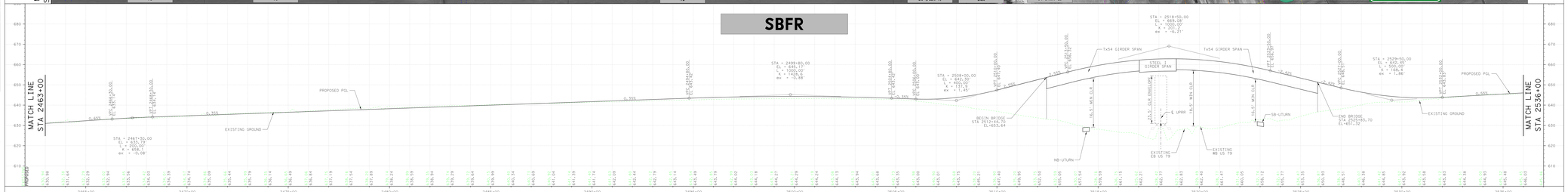
HDR Engineering Inc.
Texas P.E. Firm Registration No. F-754

LEGEND

- PROPERTY LINE (WILLIAMSON CENTRAL APPRAISAL DISTRICT)
- EXISTING ROW
- PROPOSED ROW
- EXISTING TRAVEL LANE
- PROPOSED TRAVEL LANE
- CITY LIMITS
- FEMA FLOOD ZONE
- STREAM
- PROPOSED EDGE OF PAVEMENT
- PROPOSED RETAINING WALL
- PROPOSED MAINLANE
- PROPOSED FRONTAGE ROAD/CROSS STREET
- PROPOSED RAMP
- PROPOSED BRIDGE/DIRECT CONNECTOR
- PROPOSED SHARED-USE PATH
- WORK PERFORMED BY OTHERS
- PROPOSED DETENTION POND
- COLUMNS / BENT LOCATION
- PROPOSED CONCRETE RIPRAP
- PAVEMENT REMOVAL



SBFR



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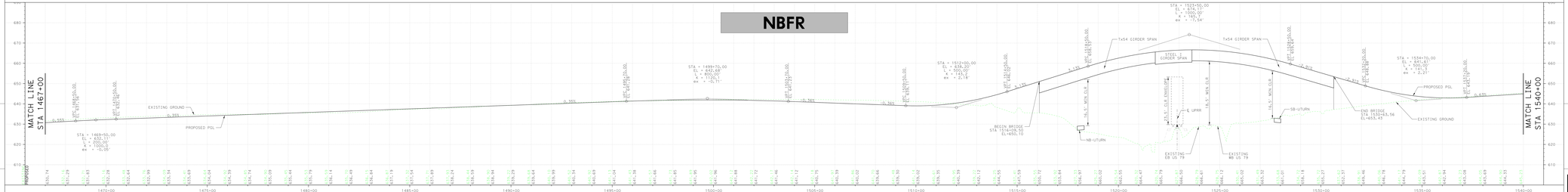

WILLIAMSON COUNTY

WILLIAMSON COUNTY

PRELIMINARY DESIGN FOR:

FM 3349 at US 79

PSJ2

PRECINCT 4

COUNTY: WILLIAMSON
LIMITS:FM 3349 FROM CR 404 TO NORTH OF CR 395
APPROX. LENGTH OF PROJECT = 2.73 MI
APPROX. LENGTH OF BRIDGE = 0.24 MI
FUNCTIONAL CLASSIFICATION = FREEWAY
FUNCTIONAL CLASSIFICATION = RURAL
TERRAIN = ROLLING
MAXIMUM SUPERELEVATION RATE (emax) = 6.0%
FM 3349 AND US 79: TxDOT ROM (APRIL 2018)
COUNTY ROADS: WILLIAMSON COUNTY DCM

DESIGN SPEED CRITERIA

FM 3349 FRONTAGE ROAD:	45 MPH (INTERIM)
COUNTY ROADS:	45 MPH
JUG HANDLE * :	45 MPH

* LOW-SPEED DESIGN CRITERIA

AADT

	2018	2040	TRUCK PERCENTAGE
FM 3349	950	66200	6.7
US 79	18000	71000	17.2

VICINITY MAP
NOT TO SCALE

BEARING BASIS: NAD83, TEXAS STATE PLANE, CENTRAL ZONE, US FOOT.

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0 10 20 30 — V: 1"=10'

9/10/2020

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FM3349
PHASE 1
INTERIM PROJECT
PLAN AND PROFILE

HDR Engineering Inc.
Texas P.E. Firm Registration No. F-754

SHEET 3 OF 4

WILLIAMSON COUNTY
1848

WILLIAMSON COUNTY

PRELIMINARY DESIGN FOR:

FM 3349 at US 79

PSTS

PRECINCT 4

COUNTY: WILLIAMSON
LIMITS:FM 3349 FROM CR 404 TO NORTH OF CR 395
APPROX. LENGTH OF PROJECT = 2.73 MI
APPROX. LENGTH OF BRIDGE = 0.24 MI
FUNCTIONAL CLASSIFICATION = FREEWAY
TERRAIN = ROLLING/MOUNTAIN = RURAL
TERRAIN = ROLLING
MAXIMUM SUPERELEVATION RATE (emax) = 6.0%
FM 3349 AND US 79: TxDOT ROM (APRIL 2018)
COUNTY ROADS: WILLIAMSON COUNTY DCM

DESIGN SPEED CRITERIA

FM 3349 FRONTAGE ROAD:	45 MPH (INTERIM)
COUNTY ROADS:	45 MPH
JUG HANDLE * :	45 MPH

* LOW-SPEED DESIGN CRITERIA

AADT

	2018	2040
FM 3349	950	66200
US 79	18000	71000

TRUCK PERCENTAGE

	6.7
	17.2

VICINITY MAP
NOT TO SCALE

BEARING BASIS: NAD83, TEXAS STATE PLANE, CENTRAL ZONE, US FOOT.

COORDINATES FOR THIS PROJECT ARE SURFACE VALUES BASED ON A COMBINED SURFACE ADJUSTMENT FACTOR OF 1.00012052
VERTICAL DATUM: NADB5, NORTH AMERICA DATUM OF 1983

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0 100 200 300
H: 1"=100'

0 10 20 30
V: 1"=10'

9/10/2020

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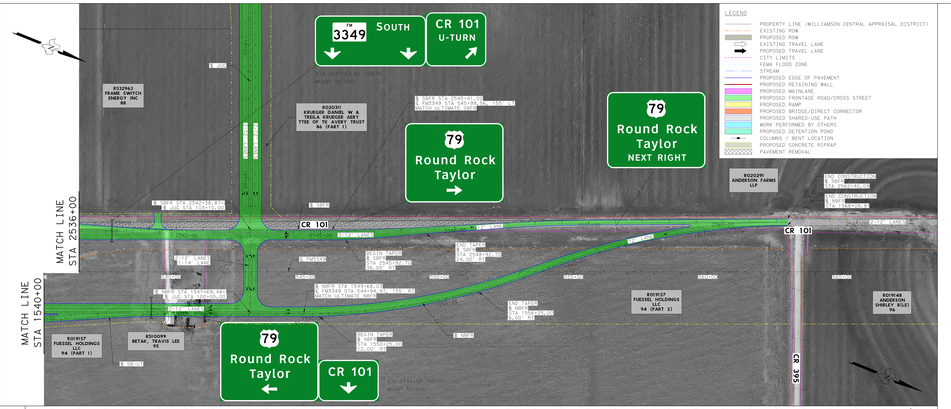
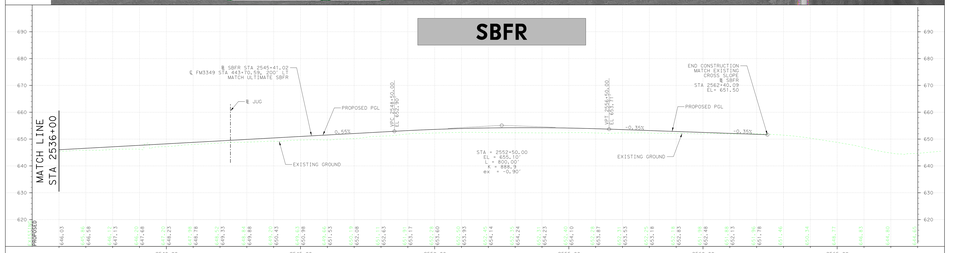
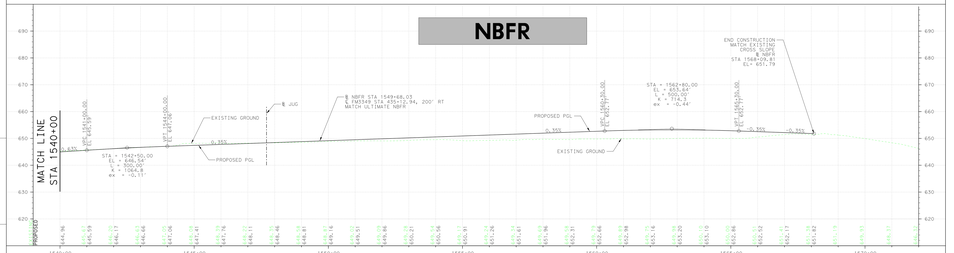
FM 3349
PHASE 1
INTERIM PROJECT
PLAN AND PROFILE

HDR Engineering Inc.
Texas P.E. Firm Registration No. F-754







NB FRONTAGE ROAD "E NBFR"

	STATION	NORTHING	EASTING
Elements Linear			
POB ( )	1421+90.21	10167798.190	3192725.606
PC ( )	1422+86.92	10167894.507	3192734.278
Tangent Direction(Back)	N 5°08'40.19" E		
Tangent Length(s)	96.7064		
Elements Circular			
PC ( )	1422+86.92	10167894.507	3192734.278
PI ( )	1425+54.10	10168140.692	3192755.442
CC ( )		10167670.337	3193224.207
PT ( )	1427+79.68	10168377.771	3192826.388
Radius	2500.0000		
Delta	17°17'35.73" Right		
Degree of Curvature(Arc)	2°17'30.59"		
Length	492.7613		
Tangent	247.1814		
Chord	491.0638		
Middle Ordinate	12.1309		
External	12.1900		
Tangent Direction(In)	N 5°08'40.19" E		
Chord Direction	N 3°29'52.32" E		
Chord Length	10'47'28.057 E		
Radial Direction	S 73°31'44.09" E		
Tangent Direction	N 16°26'15.91" E		
Elements Linear			
PT ( )	1427+79.68	10168377.771	3192826.388
POE ( )	1563+45.52	10169076.204	3193014.746
Tangent Direction	N 16°26'15.91" E		
Length	8685.6397		
Elements Circular			
PC ( )	1434+45.52	10169016.204	3193016.746
PI ( )	1436+75.50	10169236.971	3193079.879
CC ( )		10169965.125	3193151.365
PT ( )	1439+04.77	10169965.089	3193110.572
Radius	5000.0000		
Delta	8°46'29.33" Left		
Degree of Curvature(Arc)	1°54'35.49"		
Length	458.4482		
Tangent	229.5182		
Chord	458.2993		
Middle Ordinate	6.7913		
External	6.8171		
Tangent Direction(In)	N 16°26'15.91" E		
Chord Direction	S 73°53'44.06" E		
Chord Length	N 12°03'01.09" E		
Radial Direction	S 81°39'59.75" E		
Tangent Direction	N 7°39'46.58" E		
Elements Linear			
PT ( )	1439+04.77	10169965.089	3193110.572
PC ( )	1453+50.11	10170897.526	3193303.301
Tangent Direction(Back)	N 7°39'46.58" E		
Length	1445.3437		
Elements Circular			
PC ( )	1453+50.11	10170897.526	3193303.301
PI ( )	1455+75.18	10171120.596	3193335.313
CC ( )		10171730.266	3187114.051
PRC ( )	1458+00.06	10171345.228	3193347.190
Radius	6295.0000		
Delta	4°07'41.18" Left		
Degree of Curvature(Arc)	0°55'02.88"		
Length	449.9461		
Tangent	225.0704		
Chord	449.8484		
Middle Ordinate	4.0518		
External	4.0545		
Tangent Direction(In)	N 7°39'46.58" E		
Chord Direction	S 82°20'13.42" E		
Chord Length	S 5°30'55.99" E		
Radial Direction	S 86°27'54.60" E		
Tangent Direction	N 3°32'05.40" E		
Elements Circular			
PRC ( )	1458+00.06	10171345.228	3193347.190
PI ( )	1462+60.10	10171744.512	3193571.855
CC ( )		10170680.854	3204426.073
PT ( )	1465+99.80	10172140.985	3193425.199
Radius	11100.0000		
Delta	4°07'41.18" Right		
Degree of Curvature(Arc)	0°30'58.24"		
Length	799.5741		
Tangent	399.7911		
Chord	799.5311		
Middle Ordinate	7.2018		
External	7.2065		
Tangent Direction(In)	N 3°32'05.40" E		
Chord Direction	S 86°27'54.60" E		
Chord Length	N 5°30'55.99" E		
Radial Direction	S 82°20'13.42" E		
Tangent Direction	N 7°39'46.58" E		
Elements Linear			
PT ( )	1465+99.80	10172140.985	3193425.199
PC ( )	1502+38.34	10175747.027	3193910.380
Tangent Direction(Back)	N 7°39'46.58" E		
Length	3636.5353		
Elements Circular			
PC ( )	1502+38.34	10175747.027	3193910.380
PI ( )	1519+99.39	10177492.353	3194145.208
CC ( )		10176626.439	3187316.812
PT ( )	1536+81.52	10179125.392	3194386.049
Radius	6855.0000		
Delta	29°38'37.94" Left		
Degree of Curvature(Arc)	0°50'09.18"		
Length	3443.1469		
Tangent	1761.0528		
Chord	3406.9056		
Middle Ordinate	221.4417		
External	229.0636		
Tangent Direction(In)	N 7°39'46.58" E		
Chord Direction	S 82°20'13.42" E		
Chord Length	N 7°09'32.39" E		
Radial Direction	N 68°01'08.64" E		
Tangent Direction	N 21°58'51.36" W		
Elements Linear			
PT ( )	1536+81.52	10179125.392	3193486.049
PC ( )	1546+73.52	10180045.277	3193314.748
Tangent Direction(Back)	N 21°58'51.36" W		
Length	991.9949		
Elements Linear			
PT ( )	1546+73.52	10180045.311	3193314.734
PC ( )	1549+68.03	10180518.415	3193004.499
Tangent Direction(Back)	N 21°58'51.36" W		
Length	294.5128		

NB FRONTAGE ROAD "E NBFR" - CONTINUE

	STATION	NORTHING	EASTING
Elements Circular			
PC ( )	1549+68.03	10180518.415	3193004.499
PI ( )	1554+08.85	10180727.189	3192839.502
CC ( )		10179382.670	3189886.228
PT ( )	1558+40.70	10181054.878	3192544.646
Radius	2500.0000		
Delta	25°00'00.00" Left		
Degree of Curvature(Arc)	2°17'30.59"		
Length	1091.6846		
Tangent	460.8615		
Chord	1082.9409		
Middle Ordinate	37.9806		
External	38.5865		
Tangent Direction(In)	N 21°58'51.36" W		
Chord Direction	N 9°28'15.64" W		
Chord Length	N 31°58'51.36" W		
Radial Direction	N 68°01'08.64" E		
Tangent Direction	N 41°58'51.36" W		
Elements Linear			
PT ( )	1558+40.70	10181054.878	3192544.646
POE ( )	1563+17.08	10181111.660	3192493.554
Tangent Direction(In)	N 41°58'51.36" W		
Length	76.3845		
Elements Circular			
PC ( )	1559+17.08	10181111.660	3192493.554
PI ( )	1563+50.20	10181435.625	3192203.851
CC ( )		10182785.868	3194351.972
PRC ( )	1567+74.80	10181834.278	3193039.338
Radius	2500.0000		
Delta	19°39'26.66" Right		
Degree of Curvature(Arc)	2°17'30.59"		
Length	1457.7172		
Tangent	735.1149		
Chord	1450.5157		
Middle Ordinate	53.2403		
External	53.9460		
Tangent Direction(In)	N 41°58'51.36" W		
Chord Direction	N 68°01'08.64" E		
Chord Length	N 31°09'06.03" W		
Radial Direction	N 67°40'35.30" E		
Tangent Direction	N 22°19'24.70" W		
Elements Linear			
PRC ( )	1567+74.80	10181834.278	3193039.338
PI ( )	1568+56.88	10181910.208	3193008.160
Tangent Direction(In)	N 22°19'24.70" W		
Length	82.0820		
Elements Linear			
POB ( )	1568+56.88	10181910.208	3193008.160
POE ( )	1574+65.56	10182474.504	3191779.975
Tangent Direction(In)	N 22°07'01.17" W		
Length	608.6854		

SB FRONTAGE ROAD "B SBFR"

	STATION	NORTHING	EASTING
Elements Linear			
POB ( )	2418+12.81	10167797.925	3192701.485
PC ( )	2420+40.10	10168044.215	3192723.659
Tangent Direction(In)	N 5°08'40.19" E		
Length	247.2889		
Elements Circular			
PC ( )	2420+40.10	10168044.215	3192723.659
PI ( )	2421+58.87	10168142.587	3192732.515
CC ( )		10167529.343	3189442.529
PT ( )	2422+57.42	10168240.596	3192744.750
Radius	5740.0000		
Delta	9°58'15.33" Right		
Degree of Curvature(Arc)	0°59'52.21"		
Length	1197.5198		
Tangent	599.9036		
Chord	1195.6493		
Middle Ordinate	21.4693		
External	21.6494		
Tangent Direction(In)	N 5°08'40.19" E		
Chord Direction	S 84°51'19.81" E		
Chord Length	N 6°07'47.86" E		
Radial Direction	S 82°53'04.48" E		
Tangent Direction	N 7°06'55.52" E		
Elements Linear			
PT ( )	2422+57.42	10168240.596	3192744.750
PI ( )	2427+00.65	10168680.216	3192799.628
Tangent Direction(In)	N 7°06'55.52" E		
Length	443.0320		
Elements Circular			
PC ( )	2427+00.65	10168680.216	3192799.628
PI ( )	2427+35.64	10168714.890	3192804.323
CC ( )		10169317.424	3189851.451
PT ( )	2427+70.63	10168739.758	3192826.955
Radius	5700.0000		
Delta	1°47'39.92" E		
Degree of Curvature(Arc)	0°1'7.54"		
Length	526.1200		
Tangent	263.0763		
Chord	525.4460		
Middle Ordinate	11.5260		
External	11.5705		
Tangent Direction(In)	N 7°42'35.92" E		
Chord Direction	S 82°17'20.08" E		
Chord Length	N 7°41'15.25" E		
Radial Direction	N 87°39'46.58" E		
Tangent Direction	N 2°20'13.42" W		
Elements Linear			
PT ( )	2427+70.63	10168739.758	3192826.955
PC ( )	2438+68.56	10169846.047	3192804.212
Tangent Direction(In)	N 2°20'13.42" W		
Length	606.7936		

SB FRONTAGE ROAD "B SBFR" - CONTINUE

	STATION	NORTHING	EASTING
Elements Circular			
PC ( )	2438+68.56	10169846.047	3192804.212
PI ( )	2441+31.02	10170108.294	3192781.509
CC ( )		10169968.581	3195801.716
PT ( )	2443+92.15	10170368.417	3192828.507
Radius	5000.0000		
Delta	10°00'00.00" Right		
Degree of Curvature(Arc)	1°8'45.92"		
Length	1023.4866		
Tangent	512.5480		
Chord	522.3545		
Middle Ordinate	11.4159		
External	11.4695		
Tangent Direction(In)	N 2°20'13.42" W		
Chord Direction	N 87°39'46.58" E		
Chord Length	N 2°39'46.58" E		
Radial Direction	N 87°39'46.58" E		
Tangent Direction	N 7°39'46.58" E		
Elements Linear			
PT ( )	2443+92.15	10170368.417	3192828.507
PC ( )	2449+78.85	10170950.864	3192906.874
Tangent Direction(In)	N 7°39'46.58" E		
Length	587.6956		
Elements Circular			
PC ( )	2449+78.85	10170950.864	3192906.874
PI ( )	2452+04.92	10171173.369	3192936.866
CC ( )		10170118.123	3190906.104
PRC ( )	2454+29.80	10171394.246	3192982.877
Radius	6295.0000		
Delta	4°07'41.18" Right		
Degree of Curvature(Arc)	0°55'02.88"		
Length	450.9461		
Tangent	225.5704		
Chord	449.8488		
Middle Ordinate	4.0518		
External	4.0545		
Tangent Direction(In)	N 7°39'46.58" E		
Chord Direction	S 82°20'13.42" E		
Chord Length	N 9°43'31.16" E		
Radial Direction	S 78°12'32.25" E		
Tangent Direction	N 11°47'27.75" E		
Elements Linear			
PRC ( )	2454+29.80	10171394.246	3192982.877
PI ( )	2458+29.84	10171785.849	3193066.624
CC ( )		10170662.453	3193117.094
PT ( )	2462+29.54	10172182.322	3193117.968
Radius	11100.0000		
Delta	4°07'41.18" Left		
Degree of Curvature(Arc)	0°30'58.24"		
Length	799.7441		
Tangent	400.0451		
Chord	799.5711		
Middle Ordinate	7.2018		
External	7.2065		
Tangent Direction(In)	N 11°47'27.75" E		
Chord Direction	S 78°12'32.25" E		
Chord Length	N 9°43'31.16" E		
Radial Direction	S 82°20'13.42" E		
Tangent Direction	N 7°39'46.58" E		
Elements Linear			
PT ( )	2462+29.54	10172182.322	3193117.968
PC ( )	2498+68.08	10175788.364	3193603.149
Tangent Direction(In)	N 7°39'46.58" E		
Length	3638.5353		
Elements Circular			
PC ( )	2498+68.08	10175788.364	3193603.149
PI ( )	2515+45.10	10177452.590	3193821.038
CC ( )		10176634.459	3187314.812
PT ( )	2531+50.87	10179009.360	3193986.584
Radius	6345.0000		
Delta	29°38'37.94" Left		
Degree of Curvature(Arc)	0°54'10.82"		
Length	3282.1961		
Tangent	1679.0203		
Chord	3246.3036		
Middle Ordinate	211.1266		
External	218.3895		
Tangent Direction(In)	N 7°39'46.58" E		
Chord Direction	S 82°20'13.42" E		
Chord Length	N 7°09'32.39" E		
Radial Direction	N 68°01'08.64" E		
Tangent Direction	N 21°58'51.36" W		
Elements Linear			
PT ( )	2531+50.87	10179009.360	3193986.584
POE ( )	2545+42.01	10180298.377	3193677.882
Tangent Direction(In)	N 21°58'51.36" W		
Length	1391.1410		
Elements Circular			
PC ( )	2545+42.01	10180298.377	3193677.882
PI ( )	2546+72.94	10180420.789	3193628.876
CC ( )		10179421.681	3189641.340
PT ( )	2548+03.81	10180539.470	3193575.582
Radius	5000.0000		
Delta	3°00'00.00" Left		
Degree of Curvature(Arc)	1°08'45.92"		
Length	261.7994		
Tangent	130.9296		
Chord	261.7695		
Middle Ordinate	1.7134		
External	1.7180		
Tangent Direction(In)	N 21°58'51.36" W		
Chord Direction	N 68°01'08.64" E		
Chord Length	N 23°28'51.36" W		
Radial Direction	N 65°01'08.64" E		
Tangent Direction	N 24°58'51.36" W		
Elements Linear			
PT ( )	2548+03.81	10180539.470	3193575.582
PC ( )	2552+57.03	10180950.286	3193582.182
Tangent Direction(In)	N 24°58'51.36" W		
Length	453.2155		

SB FRONTAGE ROAD "B SBFR" - CONTINUE

	STATION	NORTHING	EASTING
Elements Circular			
PC ( )	2552+57.03	10180950.286	3193582.182
PI ( )	2553+75.00	10181055.409	3193533.205
CC ( )		10183061.869	3196914.423
PT ( )	2554+86.93	10181162.689	3193285.154
Radius	5000.0000		
Delta	11°48'35.80" Right		
Degree of Curvature(Arc)	1°08'45.92"		
Length	1136.9025		
Tangent	115.9920		
Chord	231.8817		
Middle Ordinate	1.1644		
External	1.1688		
Tangent Direction(In)	N 24°58'51.36" W		
Chord Direction	N 65°01'08.64" E		
Chord Length	N 29°39'06.05" W		
Radial Direction	N 61°40'35.30" E		
Tangent Direction	N 35°19'24.70" W		
Elements Linear			
PT ( )	2554+86.93	10181162.689	3193285.154
PC ( )	2562+81.22	10181901.152	3193985.934
Tangent Direction(In)	N 35°19'24.70" W		
Length	798.2913		
Elements Linear			
PT ( )	2562+81.22	10181901.152	3193985.934
POE ( )	2568+85.33	10182455.646	3191761.713
Tangent Direction(In)	N 29°01'01.17" W		
Length	598.1130		

JUG HANDLE "B JUG"

	STATION	NORTHING	EASTING
Elements Linear			
POB ( )	100+00.00	10180134.298	3193076.815
PC ( )	114+27.10	10179600.136	3191755.449
Tangent Direction(In)	S 68°01'08.64" E		
Length	1427.1050		
Elements Circular			
PC ( )	114+27.10	10179600.136	3191755.449
PI ( )	121+50.48	10178929.378	3191284.653
CC ( )		10178891.923	3190975.602
PT ( )	126+25.76	10178623.921	3191294.654
Radius	850.0000		
Delta	80°47'50.63" Left		
Degree of Curvature(Arc)	6°44'26.45"		
Length	1186.6535		
Tangent	725.3734		
Chord	1101.7144		
Middle Ordinate	202.6789		
External	266.1403		
Tangent Direction(In)	S 68°01'08.64" E		
Chord Direction	N 81°58'57.43" E		
Chord Length	S 27°51'15.33" E		
Radial Direction	S 77°13'18.01" W		
Tangent Direction	S 12°46'41.99" E		
Elements Linear			
PT ( )	126+25.76	10178623.921	3191294.654
POE ( )	138+00.13	10177478.632	3191504.402
Tangent Direction(In)	S 12°46'41.99" E		
Length	1174.3545		

WILLIAMSON COUNTY
1848

WILLIAMSON COUNTY

PRELIMINARY DESIGN FOR:

FM 3349 at US 79

PSTS

PRECINCT 4

COUNTY: WILLIAMSON
LIMITS:FM 3349 FROM CR 404 TO NORTH OF CR 395
APPROX. LENGTH OF PROJECT = 2.73 MI
APPROX. LENGTH OF BRIDGE = 0.24 MI
FUNCTIONAL CLASSIFICATION = FREEWAY
TERRAIN = ROLLING/MOUNTAIN = RURAL
TERRAIN = ROLLING
MAXIMUM SUPERELEVATION RATE (emax) = 6.0%
FM 3349 AND US 79: TxDOT ROM (APRIL 2018)
COUNTY ROADS: WILLIAMSON COUNTY DCM

DESIGN SPEED CRITERIA

FM 3349 FRONTAGE ROAD:	45 MPH (INTERIM)
COUNTY ROADS:	45 MPH
JUG HANDLE * :	45 MPH

* LOW-SPEED DESIGN CRITERIA

AADT

	2018	2040
FM 3349	950	66200
US 79	18000	71000

TRUCK PERCENTAGE

	6.7
	17.2

VICINITY MAP
NOT TO SCALE

BEARING BASIS: NAD83, TEXAS STATE PLANE, CENTRAL ZONE, US FOOT.

COORDINATES FOR THIS PROJECT ARE SURFACE VALUES BASED ON A COMBINED SURFACE ADJUSTMENT FACTOR OF 1.00012052
VERTICAL DATUM: NADB5, NORTH AMERICA DATUM OF 1983

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0 100 200 300
H: 1"=100'

0 10 20 30
V: 1"=10'

9/10/2020

PRELIMINARY

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FM3349
PHASE 1
INTERIM PROJECT
PLAN AND PROFILE

HDR Engineering Inc.
Texas P.E. Firm Registration No. F-754

SHEET 4 OF 4

WILLIAMSON COUNTY
1848

WILLIAMSON COUNTY

PRELIMINARY DESIGN FOR:

FM 3349 at US 79

PRECINCT #4

COUNTY: WILLIAMSON
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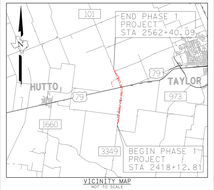
FUNCTIONAL CLASSIFICATION = RURAL
TERRAIN = ROLLING
MAXIMUM SUPERELEVATION RATE (emax) = 6.0%
FM 3349 AND US 79: TxDOT ROM (APRIL 2018)
COUNTY ROADS: WILLIAMSON COUNTY DCM

DESIGN SPEED CRITERIA

FM 3349 FRONTAGE ROAD:	45 MPH (INTERIM)
COUNTY ROADS:	45 MPH
JUG HANDLE * :	45 MPH

* LOW-SPEED DESIGN CRITERIA

	AADT		TRUCK PERCENTAGE	
	2018	2040		
FM 3349	950	66200	6.7	
US 79	18000	71000	17.2	



VICINITY MAP
NOT TO SCALE

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9/10/2020

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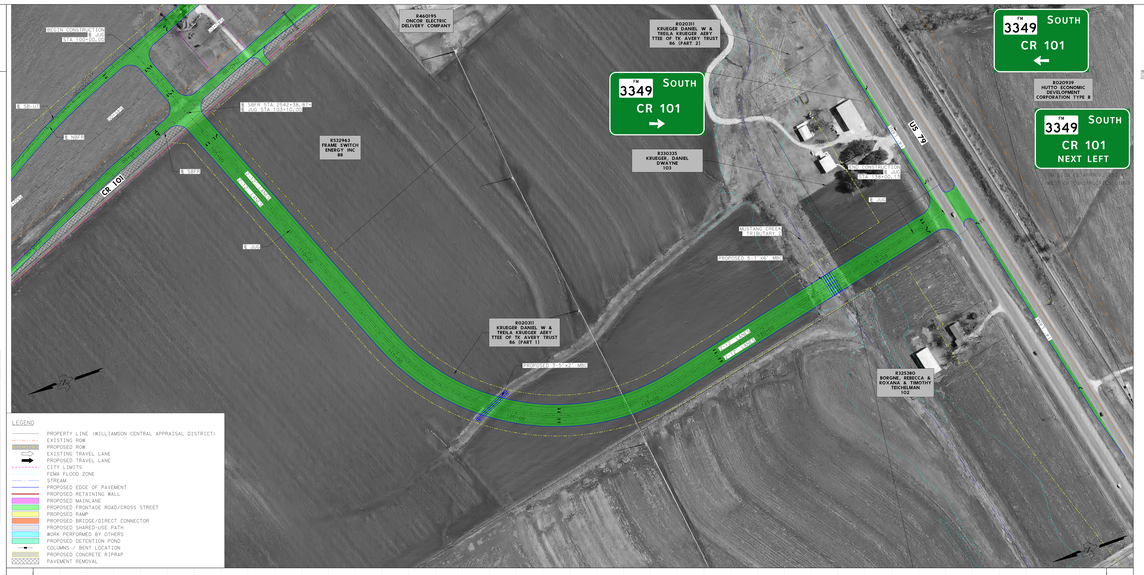
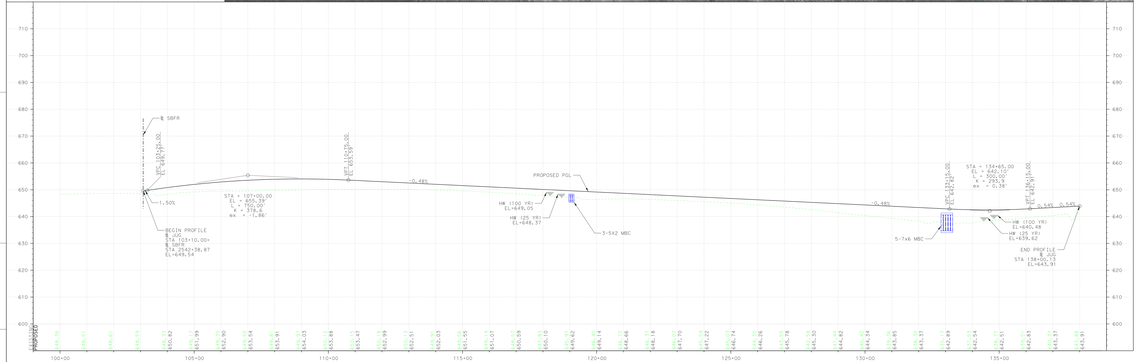
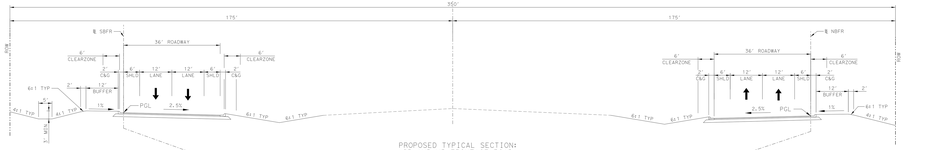
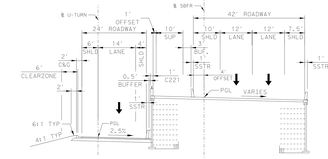
FM 3349
PHASE 1 INTERIM PROJECT-JUG HANDLE PLAN AND PROFILE

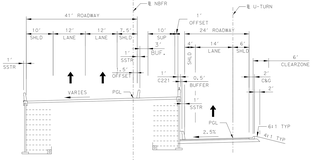
HDR Engineering Inc.
Texas P.E. Firm Registration No. F-754

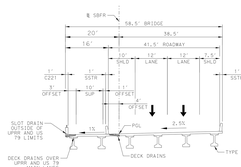


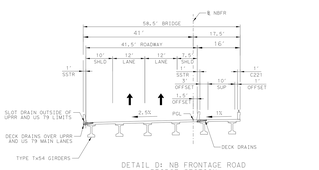


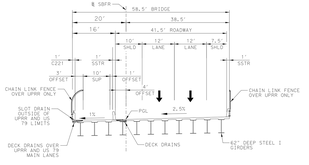


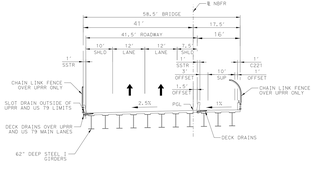


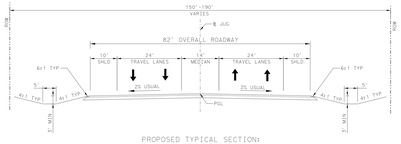


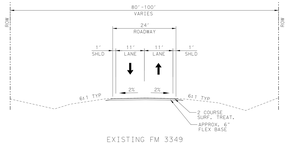












WILLIAMSON COUNTY
1848

WILLIAMSON COUNTY

PRELIMINARY DESIGN FOR:

FM 3349 at US 79

PRECINCT #4

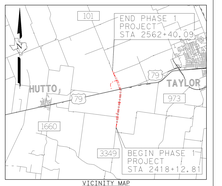
COUNTY: WILLIAMSON
LIMITS:FM 3349 FROM CR 404 TO NORTH OF CR 395
APPROX. LENGTH OF PROJECT = 2.73 MI
APPROX. LENGTH OF BRIDGE = 0.24 MI
FUNCTIONAL CLASSIFICATION = FREEWAY
FUNCTIONAL CLASSIFICATION = RURAL
TERRAIN = ROLLING
MAXIMUM SUPERELEVATION RATE (emax) = 6.0%
FM 3349 AND US 79: TxDOT ROM (APRIL 2018)
COUNTY ROADS: WILLIAMSON COUNTY DCM

DESIGN SPEED CRITERIA

FM 3349 FRONTAGE ROAD:	45 MPH (INTERIM)
COUNTY ROADS:	45 MPH
JUG HANDLE * :	45 MPH

* LOW-SPEED DESIGN CRITERIA

	AADT		TRUCK PERCENTAGE	
	2018	2040		
FM 3349	950	66200	6.7	
US 79	18000	71000	17.2	



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9/10/2020

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FM3349
PHASE 1 INTERIM PROJECT-JUG HANDLE PLAN AND PROFILE

HDR Engineering Inc.
Texas P.E. Firm Registration No. F-754