

**Project Name: 000-K-AP01-(PropHorizAlign)**

Description:

Horizontal Alignment Name: PropNB

Description:

Style: Standard [Copy 1]

STATION	NORTHING	EASTING
---------	----------	---------

**Element: Linear**

POT ( )	1+27.23	2928736.0550	774350.9831
PI ( )	2+12.15	2928672.1459	774406.9153

Tangent Direction: S 41^11'30.8137" E

Tangent Length: 84.9281

**Element: Linear**

PI ( )	3+11.05	2928589.8750	774460.9514
PI ( )	5+45.08	2928378.4677	774561.3463

Tangent Direction: S 25^24'9.0285" E

Tangent Length: 234.0345

**Element: Linear**

PI ( )	7+15.51	2928225.2979	774636.0568
PC ( )	9+6.08	2928054.8947	774721.3891

Tangent Direction: S 26^36'0.7713" E

Tangent Length: 190.5751

**Element: Circular**

SC ( )	2+42.15	2928649.1837	774426.2143
PI ( )	2+61.60	2928633.3606	774437.5115
CC ( )		2928770.6061	774646.4701
CS ( )	2+81.05	2928616.7074	774447.5450

Radius: 250.0000  
Design Speed(mph): 50.0000  
Cant(inches): 2.000  
Delta: 8^54'50.0416" Right  
Degree of Curvature(Chord): 22^55'5.9520"  
Length: 38.8942  
Length(Chorded): 38.8942  
Tangent: 19.4864  
Chord: 38.8550  
Middle Ordinate: 0.7560  
External: 0.7583

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Circular**

SC ( ) 5+90.08 2928337.8427 774580.7010  
PI ( ) 6+30.29 2928301.6422 774598.2083  
CC ( ) 2925671.2872 769205.5065  
CS ( ) 6+70.51 2928265.5599 774615.9578  
Radius: 6000.0000  
Design Speed(mph): 50.0000  
Cant(inches): 2.000  
Delta: 0^46'4.7562" Left  
Degree of Curvature(Chord): 0^57'17.7480"  
Length: 80.4235  
Length(Chorded): 80.4235  
Tangent: 40.2124

Chord: 80.4229

Middle Ordinate: 0.1347

External: 0.1348

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Linear**

PI ( ) 10+8.40 2927963.4990 774767.3913

PC ( ) 18+2.26 2927255.1311 775125.7525

Tangent Direction: S 26°50'4.9717" E

Tangent Length: 793.8563

**Element: Circular**

SC ( ) 9+6.08 2928054.8947 774721.3891

PI ( ) 9+57.24 2928009.1733 774744.3434

CC ( ) 2916769.3912 752413.4838

CS ( ) 10+8.40 2927963.4990 774767.3913

Radius: 24999.9999

Design Speed(mph): 50.0000

Cant(inches): 2.000

Delta: 0°14'4.2004" Left

Degree of Curvature(Chord): 0°13'45.0595"

Length: 102.3200

Length(Chord): 102.3200

Tangent: 51.1601

Chord: 102.3199

Middle Ordinate: 0.0523

External: 0.0523

**Element: Circular**

SC ( ) 18+82.26 2927183.5831 775161.5405

PI ( ) 21+35.36 2926951.6802 775262.7494

CC ( ) 2928006.6182 777996.2464

CS ( ) 23+88.47 2926711.9102 775343.5731

Radius: 2930.0000

Design Speed(mph): 50.0000

Cant(inches): 2.000

Delta: 9^53'55.9033" Right

Degree of Curvature(Chord): 1^57'19.7570"

Length: 506.2095

Length(Chord): 506.2095

Tangent: 253.7362

Chord: 505.5801

Middle Ordinate: 10.9253

External: 10.9662

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Linear**

PI ( ) 24+68.47 2926634.8699 775365.1298

TS ( ) 30+46.85 2926077.1758 775518.4456

Tangent Direction: S 15^22'17.2652" E

Tangent Length: 578.3844

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Circular**

SC ( )      32+1.85   2925926.4056   775554.0540

PI ( )      35+6.74   2925624.3118   775537.3140

CC ( )              2925434.8557   776222.0889

CS ( )      38+11.63   2925356.5736   775396.3990

Radius:      710.5000

Design Speed(mph):      50.0000

Cant(inches):      2.000

Delta: 49°10'25.5193" Right

Degree of Curvature(Chord): 8°03'50.9472"

Length:      609.7823

Length(Chord):      609.7823

Tangent:      325.0955

Chord:      591.2391

Middle Ordinate:      64.4200

External:      70.8433

**Element: Circular**

SC ( )      56+7.88   2924144.5233   774071.3410

PI ( )      56+70.00   2924108.2508   774020.9348

CC ( )              2923368.1532   774515.2583

CS ( )      57+32.11   2924075.5816   773968.1220

Radius:      890.0000

Design Speed(mph):      50.0000

Cant(inches):      2.000

Delta: 7°59'50.4536" Right

Degree of Curvature(Chord): 6°26'15.8292"

Length:      124.2263

Length(Chord):      124.2263

Tangent:      62.2142

Chord:      124.1254

Middle Ordinate:      2.1666

External: 2.1718

**Element: Circular**

SC ( ) 61+66.79 2923895.3994 773572.8140

PI ( ) 63+18.83 2923852.4083 773427.0834

CC ( ) 2922691.8704 773690.2406

CS ( ) 64+70.87 2923828.3365 773277.0628

Radius: 1190.0000

Design Speed(mph): 50.0000

Cant(inches): 2.000

Delta: 14°38'27.7534" Right

Degree of Curvature(Chord): 4°48'53.1832"

Length: 304.0859

Length(Chord): 304.0859

Tangent: 152.8757

Chord: 303.2593

Middle Ordinate: 9.6998

External: 9.7796

**Element: Circular**

SC ( ) 74+18.17 2923809.9785 772330.1774

PI ( ) 74+65.53 2923805.7947 772283.0096

CC ( ) 2925626.3932 772097.7508

CS ( ) 75+12.88 2923800.3918 772235.9659

Radius: 1830.0000

Design Speed(mph): 50.0000

Cant(inches): 2.000

Delta: 2°57'54.8933" Left

Degree of Curvature(Chord): 3°07'51.3049"

Length: 94.7086

Length(Chord): 94.7086

Tangent: 47.3649

Chord: 94.6980

Middle Ordinate: 0.6127

External: 0.6129

**Element: Circular**

SC ( ) 87+5.30 2923613.1389 771058.3871

PI ( ) 87+97.15 2923592.6880 770968.8450

CC ( ) 2925448.8513 770497.8008

CS ( ) 88+89.01 2923567.9672 770880.3864

Radius: 1915.0000

Design Speed(mph): 50.0000

Cant(inches): 2.000

Delta: 5^29'47.7760" Left

Degree of Curvature(Chord): 2^59'31.0120"

Length: 183.7133

Length(Chorded): 183.7133

Tangent: 91.9272

Chord: 183.6429

Middle Ordinate: 2.2026

External: 2.2052

**Element: Circular**

SC ( ) 114+23.43 2922763.2869 768477.2193

PI ( ) 116+50.23 2922733.7604 768252.8397

CC ( ) 2921738.9019 768269.6224

CS ( ) 118+77.04 2922755.7019 768027.5919

Radius: 995.0000

Design Speed(mph): 50.0000

Cant(inches): 2.000

Delta: 26^07'13.8134" Right

Degree of Curvature(Chord): 5^45'30.1387"

Length: 453.6093

Length(Chord): 453.6093

Tangent: 230.8162

Chord: 449.6914

Middle Ordinate: 25.7377

External: 26.4211

**Element: Circular**

SC ( ) 124+40.58 2922908.7777 767485.4670

PI ( ) 125+4.72 2922918.6448 767422.1093

CC ( ) 2923841.9552 767533.4556

CS ( ) 125+68.85 2922924.1227 767358.2222

Radius: 930.0000

Design Speed(mph): 50.0000

Cant(inches): 2.000

Delta: 7^54'8.6503" Left

Degree of Curvature(Chord): 6^09'39.0194"

Length: 128.2683

Length(Chord): 128.2683

Tangent: 64.2360

Chord: 128.1667

Middle Ordinate: 2.2105

External: 2.2158

**Element: Linear**

PI ( ) 40+1.63 2925222.7047 775261.7818

PI ( ) 44+29.56 2924934.7791 774945.2120

Tangent Direction: S 47^42'46.6202" W

Tangent Length: 427.9224

**Element: Linear**

PI ( ) 45+77.53 2924834.4082 774836.4829



PI ( )      46+93.02    2924755.4463    774752.2052

Tangent Direction: S 46°51'54.4083" W

Tangent Length:      115.4890

**Element: Linear**

PI ( )      48+34.66    2924659.3421    774648.1643

PI ( )      49+87.78    2924556.2405    774534.9499

Tangent Direction: S 47°40'35.8680" W

Tangent Length:      153.1256

**Element: Linear**

PI ( )      51+21.57    2924466.8214    774435.4309

PI ( )      52+28.76    2924395.7164    774355.2217

Tangent Direction: S 48°26'35.5068" W

Tangent Length:      107.1889

**Element: Linear**

PI ( )      53+20.73    2924334.3918    774286.6826

PI ( )      54+72.88    2924232.4183    774173.7620

Tangent Direction: S 47°54'58.5017" W

Tangent Length:      152.1501

**Element: Linear**

PI ( )      58+97.11    2924002.7610    773820.1315

PI ( )      59+86.79    2923965.6710    773738.4802

Tangent Direction: S 65°34'12.5927" W

Tangent Length:      89.6805

**Element: Linear**

PI ( )      66+45.87    2923820.2571    773102.2919

PI ( )      66+84.49    2923819.4196    773063.6834

Tangent Direction: S 88^45'26.6719" W

Tangent Length: 38.6175

**Element: Linear**

PI ( ) 68+97.41 2923817.0688 772850.7766

PI ( ) 71+43.17 2923816.9718 772605.0189

Tangent Direction: S 89^58'38.5406" W

Tangent Length: 245.7577

**Element: Linear**

PI ( ) 76+17.88 2923785.0741 772132.0931

PI ( ) 82+37.60 2923688.8063 771519.8990

Tangent Direction: S 81^03'48.2099" W

Tangent Length: 619.7170

**Element: Linear**

PI ( ) 82+89.90 2923680.5465 771468.2529

PI ( ) 83+28.79 2923674.3042 771429.8661

Tangent Direction: S 80^45'49.3939" W

Tangent Length: 38.8910

**Element: Linear**

PI ( ) 83+79.09 2923666.3553 771380.1956

PI ( ) 85+35.30 2923642.0596 771225.8937

Tangent Direction: S 81^03'6.9591" W

Tangent Length: 156.2029

**Element: Linear**

PI ( ) 89+99.01 2923533.8216 770775.8246

PI ( ) 112+63.43 2922810.3142 768630.1036

Tangent Direction: S 71^21'59.7802" W

Tangent Length: 2264.4164

**Element: Linear**

PI ( ) 120+47.03 2922800.7086 767863.7154

PI ( ) 122+40.58 2922857.2596 767678.6115

Tangent Direction: N 73^00'41.7770" W

Tangent Length: 193.5496

**Element: Linear**

PI ( ) 128+18.85 2922914.4931 767108.6086

TS ( ) 128+22.57 2922914.1838 767104.9068

Tangent Direction: S 85^13'26.7970" W

Tangent Length: 3.7147

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Circular**

SC ( )     44+29.56   2924934.7791   774945.2120  
PI ( )     45+3.54   2924884.7948   774890.6618  
CC ( )                2932232.6424   768107.6584  
CS ( )     45+77.53   2924834.4082   774836.4829  
Radius:    10000.0000  
Design Speed(mph):     50.0000  
Cant(inches):        2.000  
Delta: 0^50'52.2119" Left  
Degree of Curvature(Chord): 0^34'22.6488"  
Length:        147.9754  
Length(Chorded):        147.9754  
Tangent:        73.9891  
Chord:        147.9741  
Middle Ordinate:        0.2737

External: 0.2737

**Element: Circular**

SC ( ) 46+93.02 2924755.4463 774752.2052

PI ( ) 47+63.84 2924707.2100 774700.3549

CC ( ) 2917361.5126 781485.6869

CS ( ) 48+34.66 2924659.3421 774648.1643

Radius: 10000.0000

Design Speed(mph): 50.0000

Cant(inches): 2.000

Delta: 0°48'41.4597" Right

Degree of Curvature(Chord): 0°34'22.6488"

Length: 141.6364

Length(Chord): 141.6364

Tangent: 70.8194

Chord: 141.6352

Middle Ordinate: 0.2508

External: 0.2508

**Element: Circular**

SC ( ) 49+87.78 2924556.2405 774534.9499

PI ( ) 50+54.68 2924511.3645 774485.3400

CC ( ) 2917072.9233 781168.8714

CS ( ) 51+21.57 2924466.8214 774435.4309

Radius: 10000.0000

Design Speed(mph): 50.0000

Cant(inches): 2.000

Delta: 0°45'59.6388" Right

Degree of Curvature(Chord): 0°34'22.6488"

Length: 133.7911

Length(Chord): 133.7911

Tangent: 66.8965

Chord: 133.7901

Middle Ordinate: 0.2237

External: 0.2238

**Element: Circular**

SC ( ) 52+28.76 2924395.7164 774355.2217

PI ( ) 52+74.75 2924365.1329 774320.8817

CC ( ) 2931817.5336 767652.9192

CS ( ) 53+20.73 2924334.3918 774286.6826

Radius: 10000.0000

Design Speed(mph): 50.0000

Cant(inches): 2.000

Delta: 0°31'37.0051" Left

Degree of Curvature(Chord): 0°34'22.6488"

Length: 91.9694

Length(Chord): 91.9694

Tangent: 45.9850

Chord: 91.9691

Middle Ordinate: 0.1057

External: 0.1057

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Circular**

SC ( ) 66+84.49 2923819.4196 773063.6834

PI ( ) 67+90.95 2923817.6776 772957.2363

CC ( ) 2913818.2871 773067.6452

CS ( ) 68+97.41 2923817.0688 772850.7766

Radius: 10000.0000

Design Speed(mph): 50.0000

Cant(inches): 2.000  
Delta: 1^13'11.8688" Right  
Degree of Curvature(Chord): 0^34'22.6488"  
Length: 212.9238  
Length(Chorded): 212.9238  
Tangent: 106.4659  
Chord: 212.9198  
Middle Ordinate: 0.5667  
External: 0.5667

**Element: Circular**

SC ( ) 82+37.60 2923688.8063 771519.8990  
PI ( ) 82+63.75 2923684.7102 771494.0705  
CC ( ) 2933559.2221 769914.8261  
CS ( ) 82+89.90 2923680.5465 771468.2529  
Radius: 10000.0000  
Design Speed(mph): 50.0000  
Cant(inches): 2.000  
Delta: 0^17'58.8161" Left  
Degree of Curvature(Chord): 0^34'22.6488"  
Length: 52.3025  
Length(Chorded): 52.3025  
Tangent: 26.1513  
Chord: 52.3024  
Middle Ordinate: 0.0342  
External: 0.0342

**Element: Circular**

SC ( ) 83+28.79 2923674.3042 771429.8661  
PI ( ) 83+53.94 2923670.2985 771405.0358  
CC ( ) 2913795.9445 772985.2676  
CS ( ) 83+79.09 2923666.3553 771380.1956

Radius: 10000.0000  
Design Speed(mph): 50.0000  
Cant(inches): 2.000  
Delta: 0°17'17.5652" Right  
Degree of Curvature(Chord): 0°34'22.6488"  
Length: 50.3026  
Length(Chord): 50.3026  
Tangent: 25.1513  
Chord: 50.3025  
Middle Ordinate: 0.0316  
External: 0.0316

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Clothoid**

Unable to read spiral data for this alignment element.

**Element: Circular**

SC ( ) 0+0.00 2928734.9878 774242.6170  
PI ( ) 0+55.80 2928763.5125 774288.5954  
CC ( ) 2928828.0310 774280.4059  
CS ( ) 1+11.61 2928747.3795 774340.2422  
Radius: 65.0363  
Design Speed(mph): 50.0000  
Cant(inches): 2.000  
Delta: 98°19'29.7539" Right  
Degree of Curvature(Chord): 88°05'53.6680"  
Length: 111.6083  
Length(Chord): 111.6083  
Tangent: 75.2455



Chord: 98.4086

Middle Ordinate: 22.5080

External: 34.4203

**Element: Clothoid**

Unable to read spiral data for this alignment element.