

CONTRACT NO. R-34467

INDIANA DEPARTMENT OF TRANSPORTATION

ROAD PLANS

PROJECT DESCRIPTION

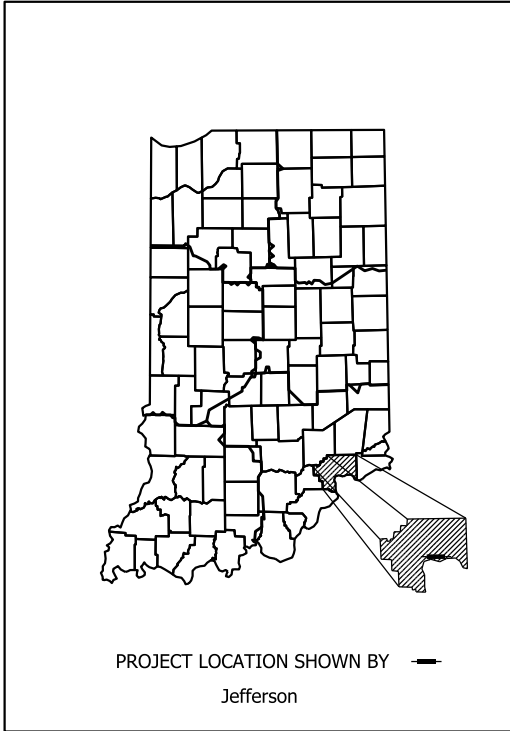
HMA Overlay, Preventive Maintenance

PROJECT LOCATION

This project consists of a HMA Overlay (Preventative Maintenance) on S.R. 7, from a pavement break north of S.R. 56 (RP 0+00) to a pavement break north of Industrial Drive (RP 3+42) in Jefferson County.

Gross Length 3.40 MI.

Net Length 3.40 MI.

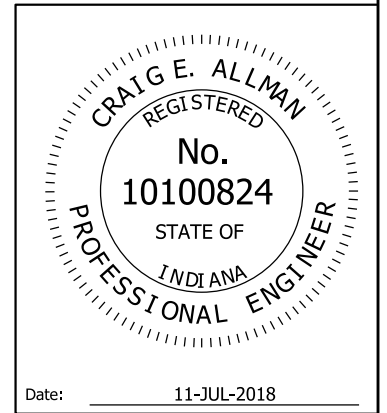
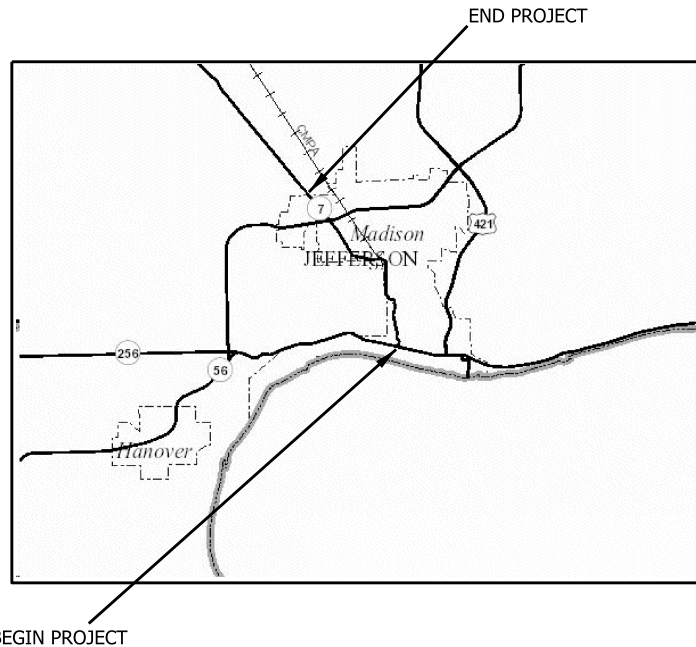


Federal Road Region 5	
TRAFFIC DATA	
A.A.D.T. (2010)	9130 V.P.D.
A.A.D.T. (2030) Proj.	10900 V.P.D.
D.H.V. (2030)	8%
Directional Distribution	50.00
Trucks 1% D.H.V.	1% A.A.D.T.
DESIGN DATA	
Design Speed	55
Project Design Criteria	PARTIAL 3R (NON-FREEWAY)
Functional Class	PRINCIPAL ARTERIAL
Rural/Urban	URBAN (BUILT-UP)
Terrain	ROLLING

LATITUDE:	38°46'20.03"
LONGITUDE:	85°24'55.45"

PLANS PREPARED BY: Craig E. Allman, P.E.

DES. NO. 0900259



CERTIFIED BY: *Craig E. Allman*

APPROVED FOR LETTING: *Jon P. Furdol* 07/11/2018
INDIANA DEPARTMENT OF TRANSPORTATION

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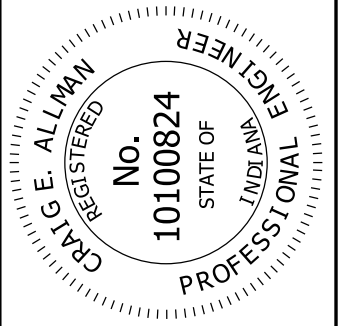
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REVISIONS	
DATE	ITEM

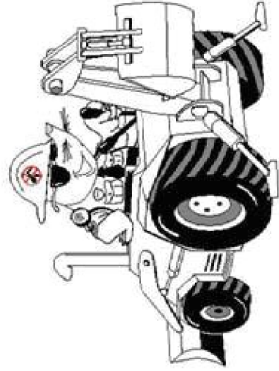
INDEX SHEET	Recommended for Approval:  Date: 11-JUL-2018
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GENERAL NOTES:

1. Locations and stationing are provided for information only. All widths and distances shall be field verified.
2. Undistributed quantities of centerline and edgeline markings are given to maintain existing centerline and edgeline markings. INDOT personnel will provide actual marking locations and quantity.
3. Maintain positive drainage at all curb lines.
4. Maintain a 50' clearance from either side of the railroad tracks.

INDIANA UNDERGROUND PLANT PROTECTION SERVICE, INC.



**Know what's below.
Call before you dig.**

Per Indiana State Law IC-8-1-26-16, It is against the law to excavate without notifying the underground location service two (2) working days before commencing work.

INDIANA UNDERGROUND
1-800-382-5544 OR CALL 811
24 HOURS A DAY 7 DAYS A WEEK

Note: Utility Locations are shown based upon information (maps and paint marks) supplied by others, and there is no guarantee of the accuracy or completeness of said locations

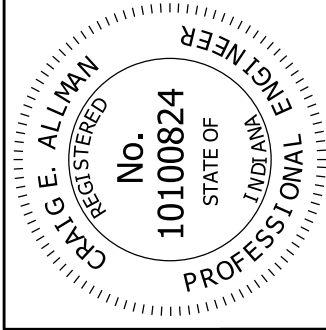
GENERAL NOTES & UTILITY INFORMATION

Recommended for Approval:

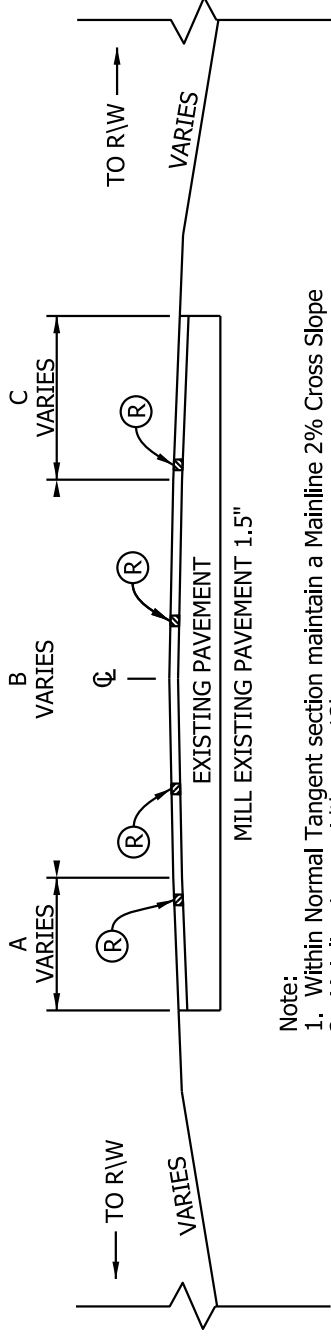
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Date:

11-JUL-2018



TYPICAL SECTION WITH PAVED SHOULDER



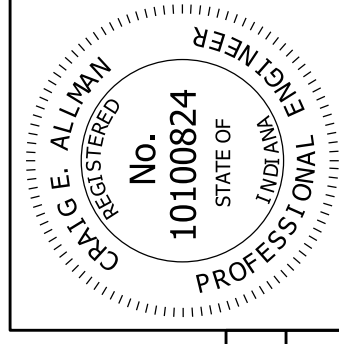
Note:

1. Within Normal Tangent section maintain a Mainline 2% Cross Slope
2. Mainline Lane widths are 12'

STATION	A	B	C	NOTES
10+00 TO 21+42	Detail Sheet - Construction Detail (Includes Bridge Exception)			
21+42 TO 27+30	10.0'	24.0'	10.0'	
27+30 TO 29+35	2.0'	24.0'	2.0'	
29+35 TO 36+59	Slide Project Exception - Des. 1173314			
36+59 TO 37+63	2.0'	24.0'	19.0'	
37+63 TO 61+33	2.0'	24.0'	2.0'	
61+33 TO 74+35	2.0'	24.0'	2.0'	
74+35 TO 113+00	0.0'	24.0'	0.0'	
113+00 TO 116+15	6.0'	24.0'	6.0'	
116+15 TO 117+00	0.0'	24.0'	6.0'	
117+00 TO 132+50	0.0'	24.0'	0.0'	
132+50 TO 136+13	8.0'	24.0'	2.0'	
136+13 TO 139+60	0.0'	24.0'	6.0'	
139+60 TO 164+10	10.0'	24.0'	10.0'	
164+10 TO 166+32	5.0'	24.0'	5.0'	
166+32 TO 167+70	0.0'	36.0'	0.0'	
167+70 TO 169+70	0.0'	48.0'	0.0'	
169+70 TO 170+90	Paving Exception for S.R. 62			
170+90 TO 173+20	1.0'	36.0'	1.0'	
173+20 TO 184+65	2.0'	24.0'	2.0'	

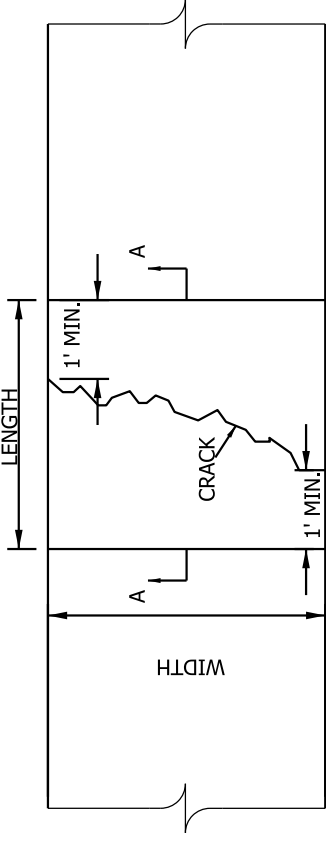
Note: After milling, any cracks that remain visible with 1/4" width or greater shall be sealed before tack coat. The materials used to fill the cracks shall be PG 64-22 or hot-pour materials only; no emulsion shall be used. The sealed cracks shall not be overbanded. An undistributed quantity has been provided.

Ⓡ 165 lbs./yd.² QC/QA HMA 3, 64 Surface, 9.5 mm.

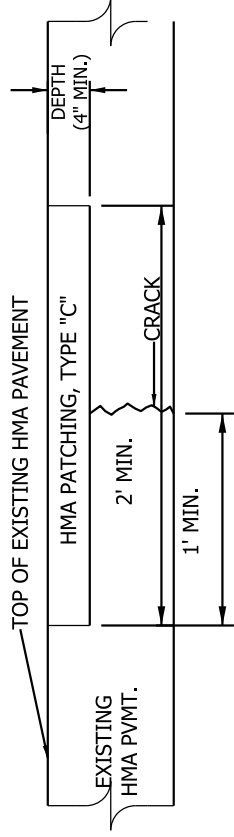


TYPICAL SECTION	Recommended for Approval:
	Date: 11-JUL-2018

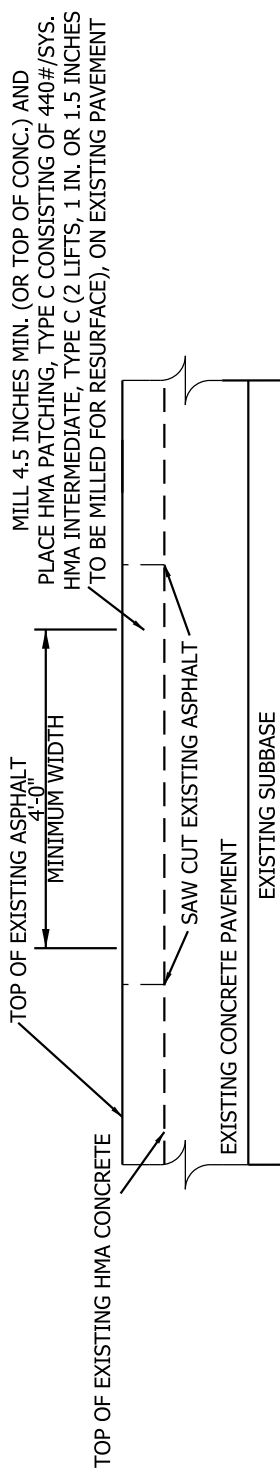
HMA PATCHING DETAIL - PLAN



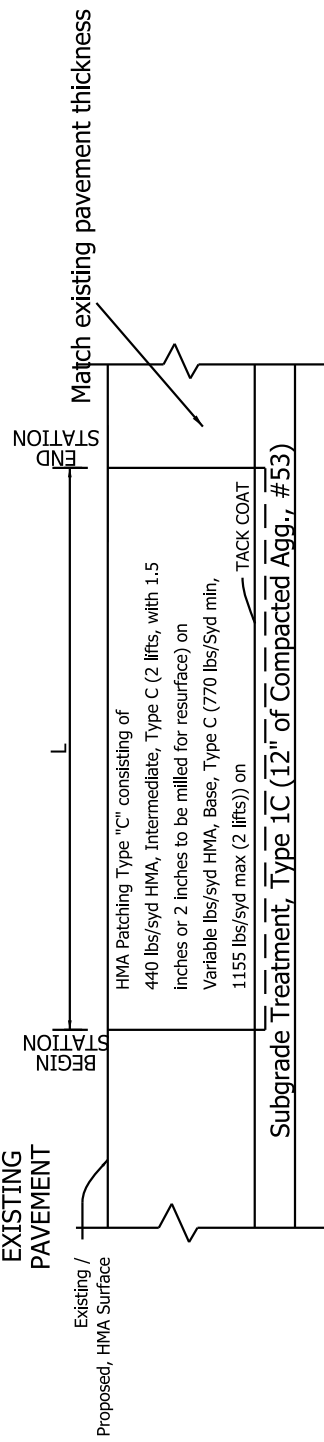
HMA PARTIAL DEPTH PATCHING DETAIL - SECTION A-A



HMA PARTIAL DEPTH PATCHING DETAIL ON PCCP - SECTION A-A



HMA FULL DEPTH PATCHING DETAIL - SECTION A-A



NOTES:

1. ASPHALT MILLING TO BE PERFORMED AFTER PATCHING IS COMPLETED.
2. PATCHING LOCATIONS FROM DETAILS ARE SHOWN FOR INFORMATION ONLY. ACTUAL LOCATIONS, DIMENSIONS, AND TYPE OF PATCHING WILL BE DETERMINED BY PROJECT ENGINEER.
3. AN UNDISTRIBUTED QUANTITY OF HMA PATCHING, TYPE C = 200 TONS IS PROVIDED AND IS TO BE PLACED AT THE DISCRETION OF THE PROJECT ENGINEER.
4. UNDISTRIBUTED QUANTITIES OF THE FOLLOWING ITEMS WILL BE PROVIDED TO REMEDIATE UNSUITABLE MATERIALS FOUND WITH FULL DEPTH PATCHING AREAS USING THE DYNAMIC CONE PENETROMETER (DCP) TEST: COMMON EXCAVATION, GEOTEXTILE, COMPACTED AGGREGATE #53, AND COMPACTED AGGREGATE #2.

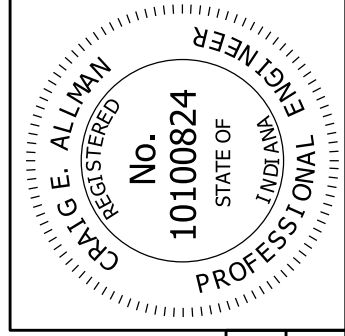
PATCHING SECTIONS

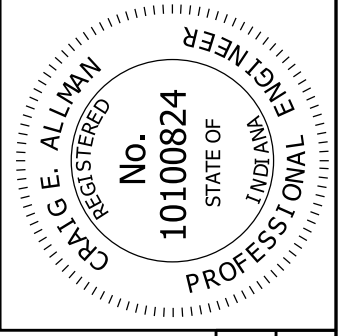
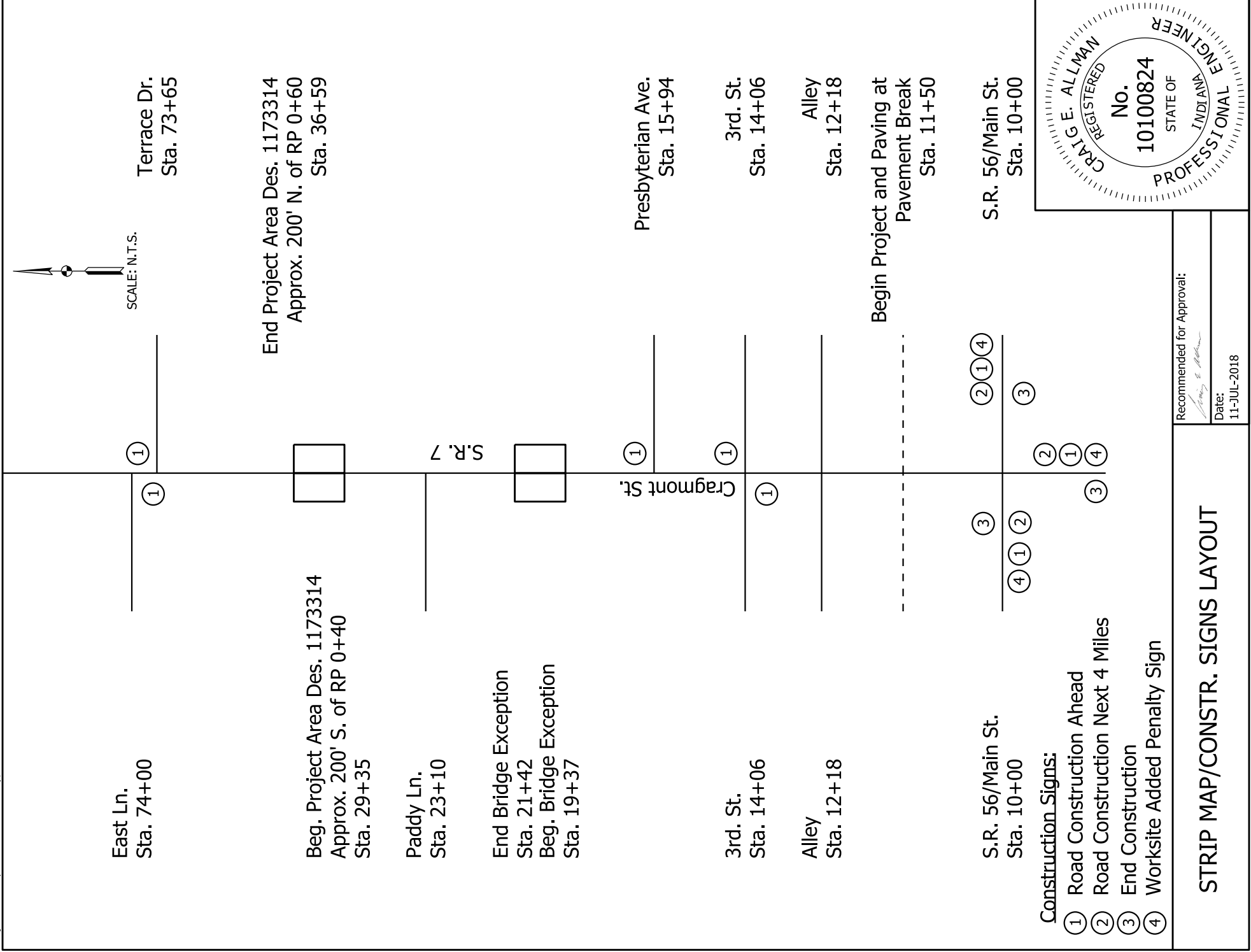
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11-JUL-2018





Taylor St.
Sta. 109+50

Allen St.
Sta. 104+35

C/L of Railroad
Sta. 104+15

Allen St.
Sta. 104+03

Green Rd.
Sta. 102+13

Cragmont St.
Sta. 98+07

State St.
Sta. 98+07

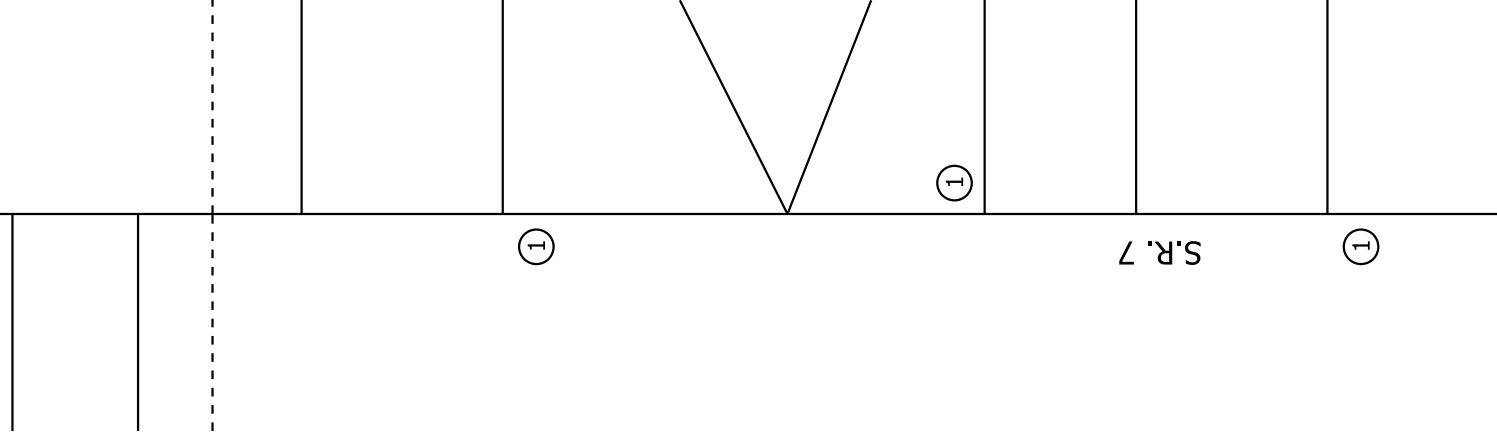
Fayette St.
Sta. 88+79

Bassett St.
Sta. 84+55

Harris St.
Sta. 82+30



SCALE: N.T.S.



Construction Signs:

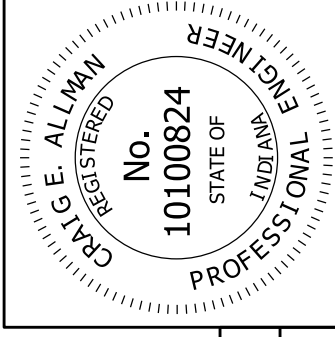
- ① Road Construction Ahead
- ② Road Construction Next 4 Miles
- ③ End Construction
- ④ Worksite Added Penalty Sign

STRIP MAP/CONSTR. SIGNS LAYOUT

Recommended for Approval:

[Signature]

Date:
11-JUL-2018



Duffy Dr.
Sta. 150+08
Wells Dr.
Sta. 142+86
Rabbit Ln.
Sta. 139+40

Pinehurst Ave.
Sta. 132+20
Lanham St.
Sta. 130+70

Green Rd.
Sta. 114+85
Madison State House
Sta. 114+10
Wood St.
Sta. 113+05

Orchard St.
Sta. 111+33
Taylor Ave.
Sta. 109+50

①

①

①

①

①

S.R. 7

K of C Rd.
Sta. 158+64

Cross Ave.
Sta. 136+05

Wilson Ave.
Sta. 125+75
Shelton St.
Sta. 123+56
Seminary St.
Sta. 121+10

Brown St.
Sta. 116+80

Orchard St.
Sta. 111+33

Construction Signs:

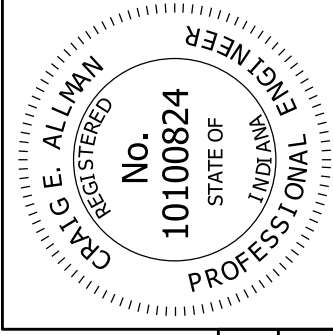
- ① Road Construction Ahead
- ② Road Construction Next 4 Miles
- ③ End Construction
- ④ Worksite Added Penalty Sign

STRIP MAP/CONSTR. SIGNS LAYOUT

Recommended for Approval:

[Signature]

Date:
11-JUL-2018





SCALE: N.T.S.

- ④
- ①
- ②
- ③

End Proj @ Pvmnt Break
Sta. 184+45

Crozier Ave.
Sta. 179+73

Bear St.
Sta. 176+65

Pavement Break
Sta. 172+80

S.R. 62
Sta. 170+32

①

N. Rose Way
Sta. 167+67

S.R. 62
Sta. 170+32
N. Rose Way
Sta. 167+67

Ostage St.
Sta. 163+84

S.R. 7

①

Primrose
Sta. 163+63

Construction Signs:

- ① Road Construction Ahead
- ② Road Construction Next 4 Miles
- ③ End Construction
- ④ Worksite Added Penalty Sign

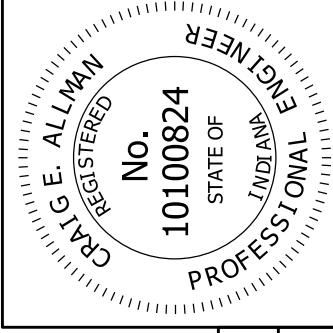
STRIP MAP/CONSTR. SIGNS LAYOUT

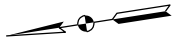
Recommended for Approval:

Craig E. Allman

Date:

11-JUL-2018





STATION	Description	Qua.
11+50 to 13+14	Solid White 4" Edge Lines - Both Sides	328
11+50 to 13+14	Solid Yellow 4" Center Lines	328
12+18	Manhole, Do Not Disturb (Right Side)	1
13+14 to 13+92	Solid White 4" Line, Parking	78

STA. 13+14
BEGIN W.L.

38'

STA. 12+18
ALLEY

STA. 12+18
ALLEY, MANHOLE

S.R. 7

CURB

CURB

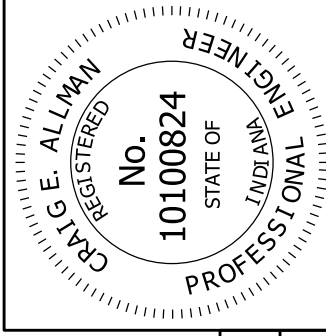
STA. 11+50
BEGIN PAVING

STA. 11+50
BEGIN PAVING

STA. 10+00
S.R. 56

STA. 10+00
S.R. 56

S.R. 56



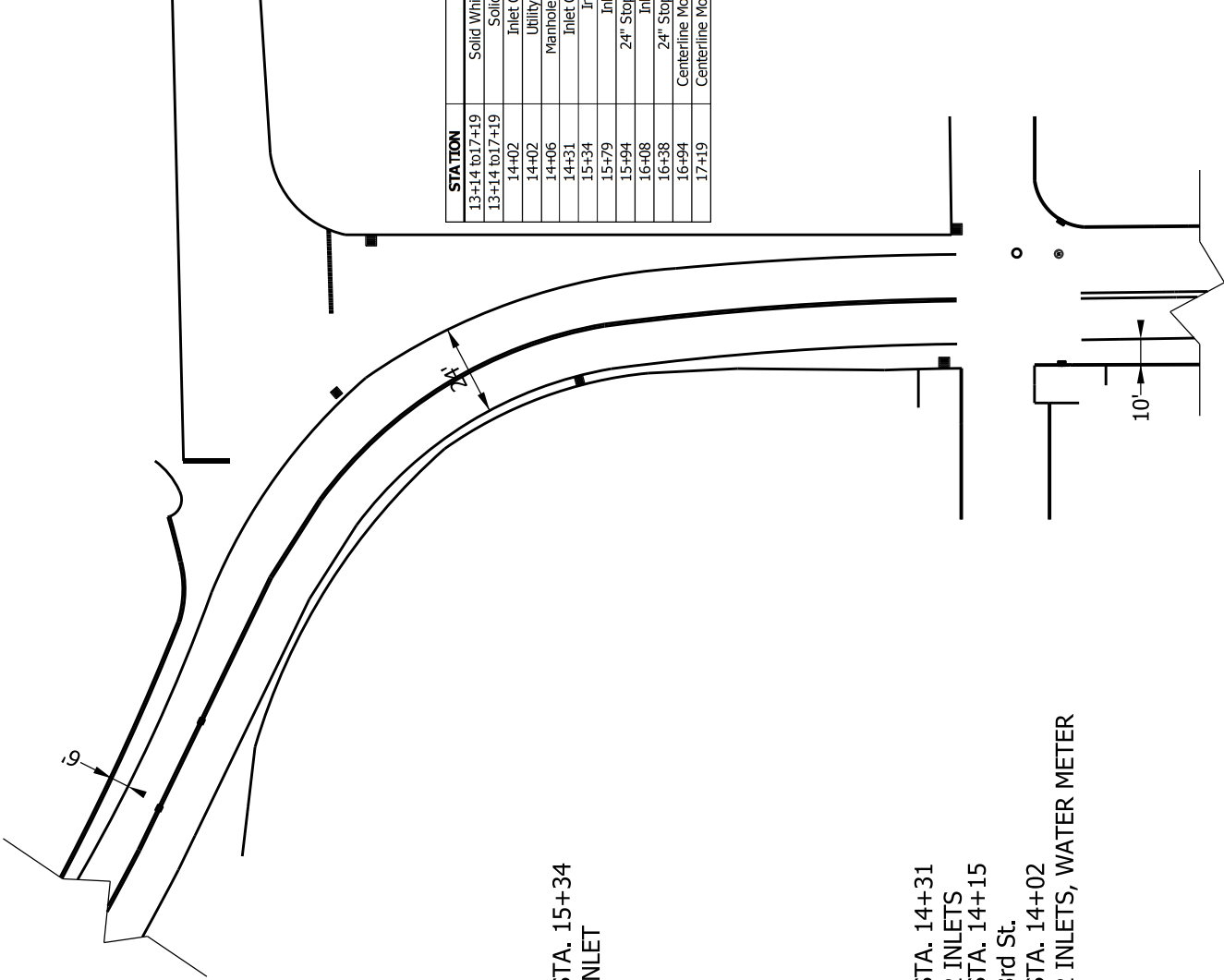
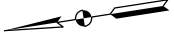
Recommended for Approval:

[Signature]

Date:
11-JUL-2018

DETAIL - CONSTR. DETAIL (Sta. 10+00 - 13+14)

STA. 17+19
MONUMENT
STA. 16+94
MONUMENT
STA. 16+82
CURB AND GUTTER
STA. 16+60
STA. 16+38
STOP BAR



16+08
PRESBYTARIAN, INLET
STA. 15+94
STOP BAR

STA. 15+79
INLET

STATION	Description	Qty.	Unit
13+14 to 17+19	Solid White 4" Edge Lines - Both Sides	810	Lft.
13+14 to 17+19	Solid Yellow 4" Center Lines	810	Lft.
14+02	Inlet Casting, Left & Right Side	2	Lft.
14+02	Utility Meter/Valve (Right Side)	1	Lft.
14+06	Manhole, Do Not Disturb (Right Side)	1	Ea.
14+31	Inlet Casting, Left & Right Side	2	Ea.
15+34	Inlet Casting, Left Side	1	Ea.
15+79	24" Stop Bar, Thermoplastic, White	18	Lft.
16+08	Inlet Casting, Right Side	1	Ea.
16+38	24" Stop Bar, Thermoplastic, White	15	Lft.
16+94	Centerline Monument Type "B", Raise to Grade	1	Ea.
17+19	Centerline Monument Type "B", Raise to Grade	1	Ea.

STA. 15+34
INLET

STA. 14+31
2 INLETS
STA. 14+15
3rd St.

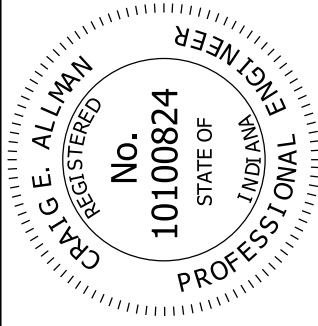
STA. 14+02
2 INLETS, WATER METER

STA. 14+15
3rd St.
STA. 14+06
MANHOLE
STA. 14+02
STA. 13+92

Recommended for Approval:

[Signature]

Date:
11-JUL-2018



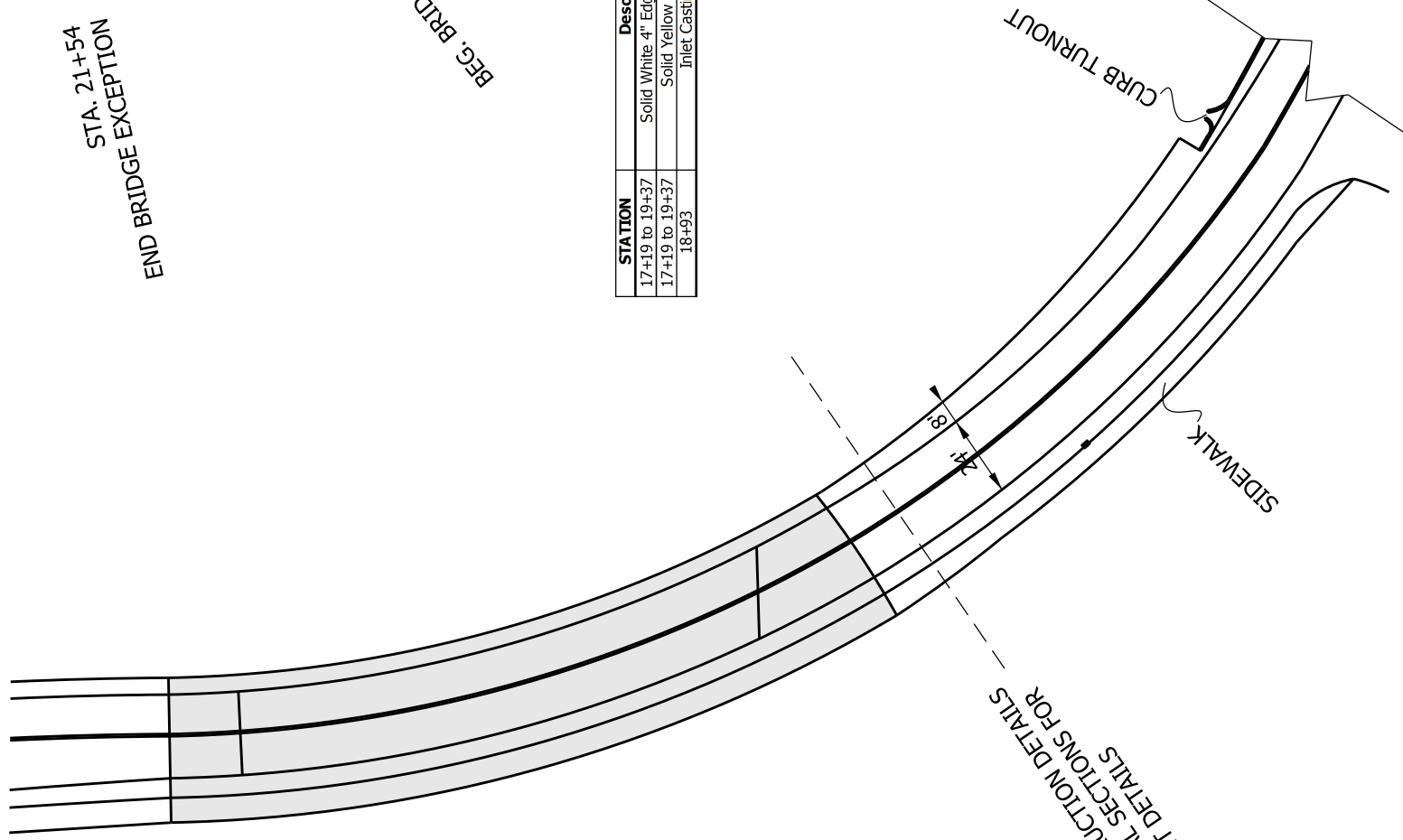
DETAIL - CONSTR. DETAIL (Sta. 13+14 - 17+19)



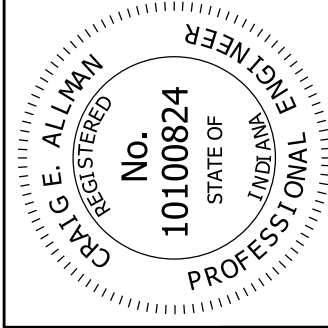
STA. 21+54
END BRIDGE EXCEPTION

STA. 19+54
BEG. BRIDGE EXCEPTION

STA. 18+93
STA. 18+93
INLET



STATION	Description	QTY.	Unit
17+19 to 19+37	Solid White 4" Edge Lines - Both Sides	436	Lft.
17+19 to 19+37	Solid Yellow 4" Center Lines	436	Lft.
18+93	Inlet Casting, Left Side	1	Ea.



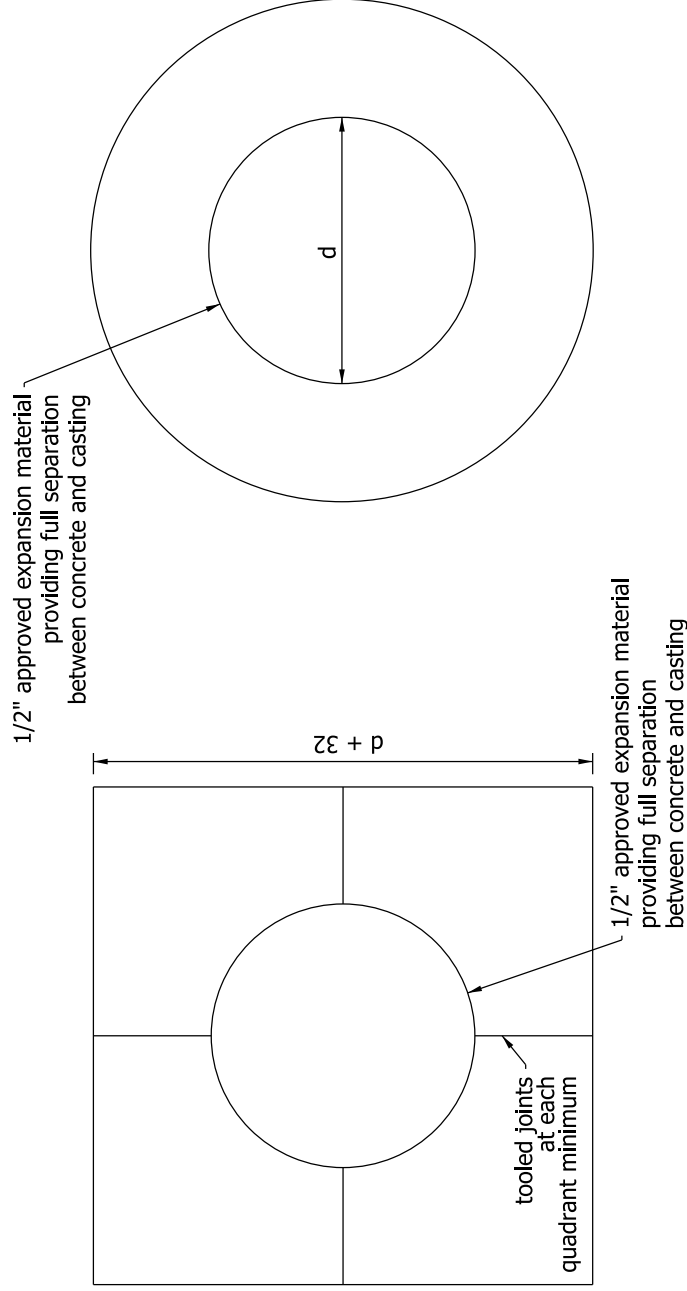
Recommended for Approval:

Craig E. Allman

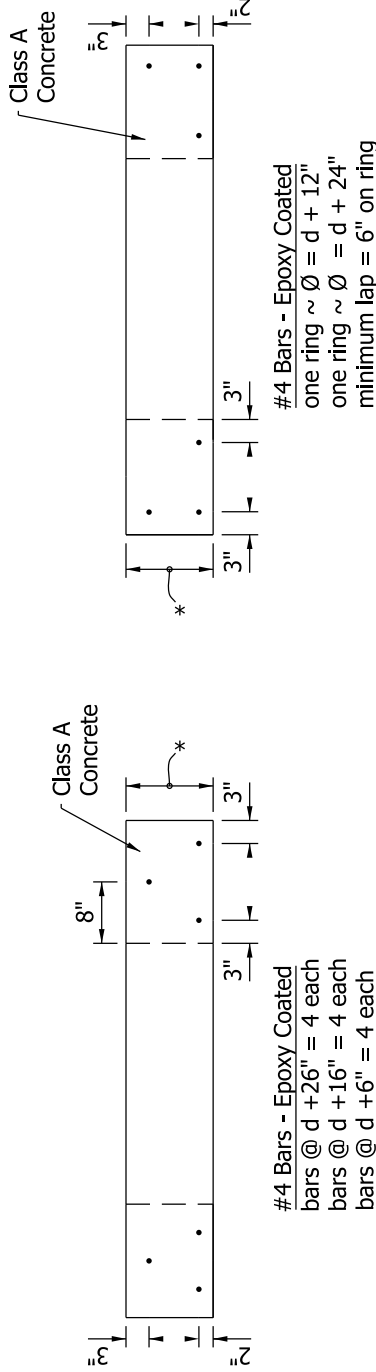
Date:
11-JUL-2018

DETAIL - CONSTR. DETAIL (Sta. 17+19 - 21+54)

ADJUST CASTING DETAIL



Plan Views



Section Views

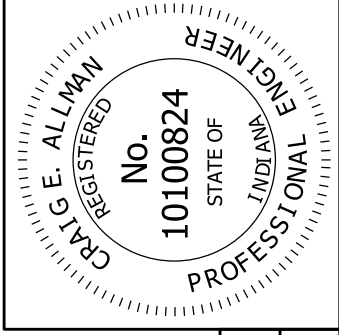
* Thickness of slab = the lesser of 12 inches or the vertical distance from the top of the structure to the top of the casting ring.

CASTING DETAIL

Recommended for Approval:

Craig E. Allman

Date:
11-JUL-2018

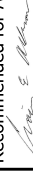
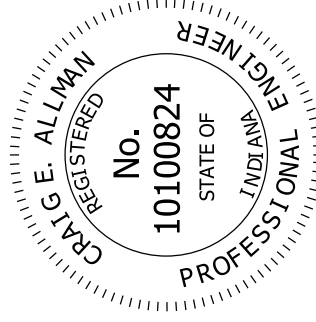


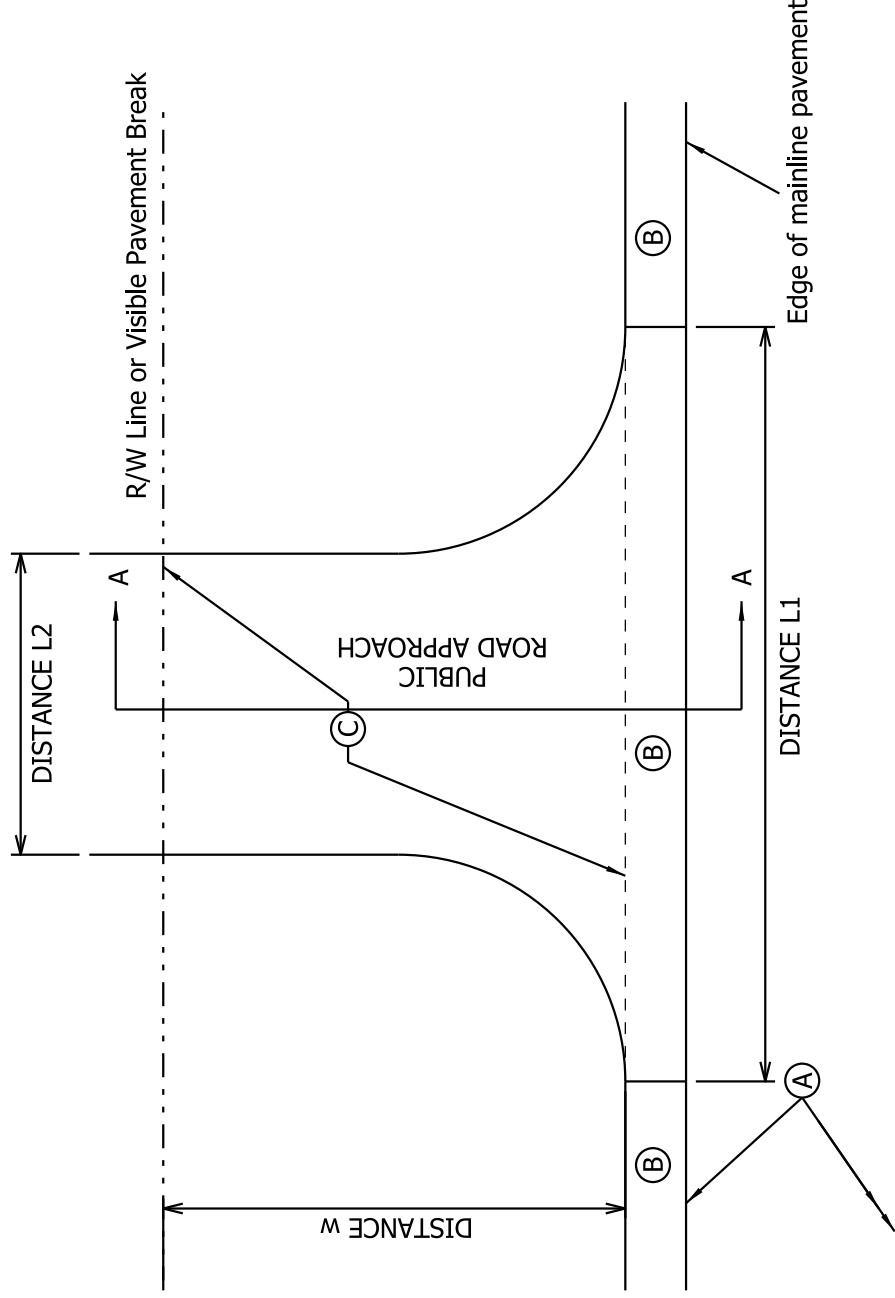
DETAIL PAVEMENT MARKINGS AND TRAFFIC ITEMS TOTALS

STATION	Description	Qua.	Unit
11+50 to 19+37	Solid White 4" Edge Lines - Both Sides	1652	Lft.
11+50 to 19+37	Solid Yellow 4" Center Lines	1574	Lft.
12+18	Manhole, Do Not Disturb (Right Side)	1	Ea.
14+02	Inlet Casting, Left & Right Side	2	Lft.
14+02	Utility Meter/Valve (Right Side)	1	Lft.
14+06	Manhole, Do Not Disturb (Right Side)	1	Ea.
14+31	Inlet Casting, Left & Right Side	2	Ea.
15+34	Inlet Casting, Left Side	1	Ea.
15+79	Inlet Casting, Right Side	1	Ea.
15+94	24" Stop Bar, Thermoplastic, White	18	Lft.
16+08	Inlet Casting, Right Side	1	Ea.
16+38	24" Stop Bar, Thermoplastic, White	15	Lft.
16+94	Centerline Monument Type "B", Raise to Grade	1	Ea.
17+19	Centerline Monument Type "B", Raise to Grade	1	Ea.
18+93	Inlet Casting, Left Side	1	Ea.

CONSTRUCTION DETAIL SUMMARY TABLE

Recommended for Approval:

Date:
11-JUL-2018



SECTION A-A
NOT TO SCALE

LEGEND

- (A) Typical QC/QA HMA overlay, mainline
- (B) Typical QC/QA HMA overlay, shoulder
- (C) HMA for approaches

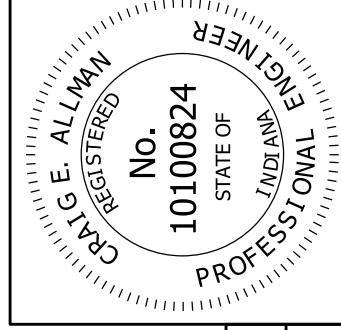
Note: Measurements were calculated to a visible pavement break, if a pavement break is not visible, the apparent right-of-way shall be used.

PUBLIC ROAD APPROACH DETAIL

Recommended for Approval:

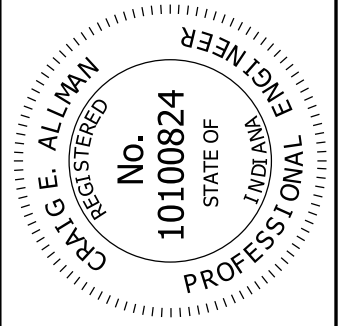
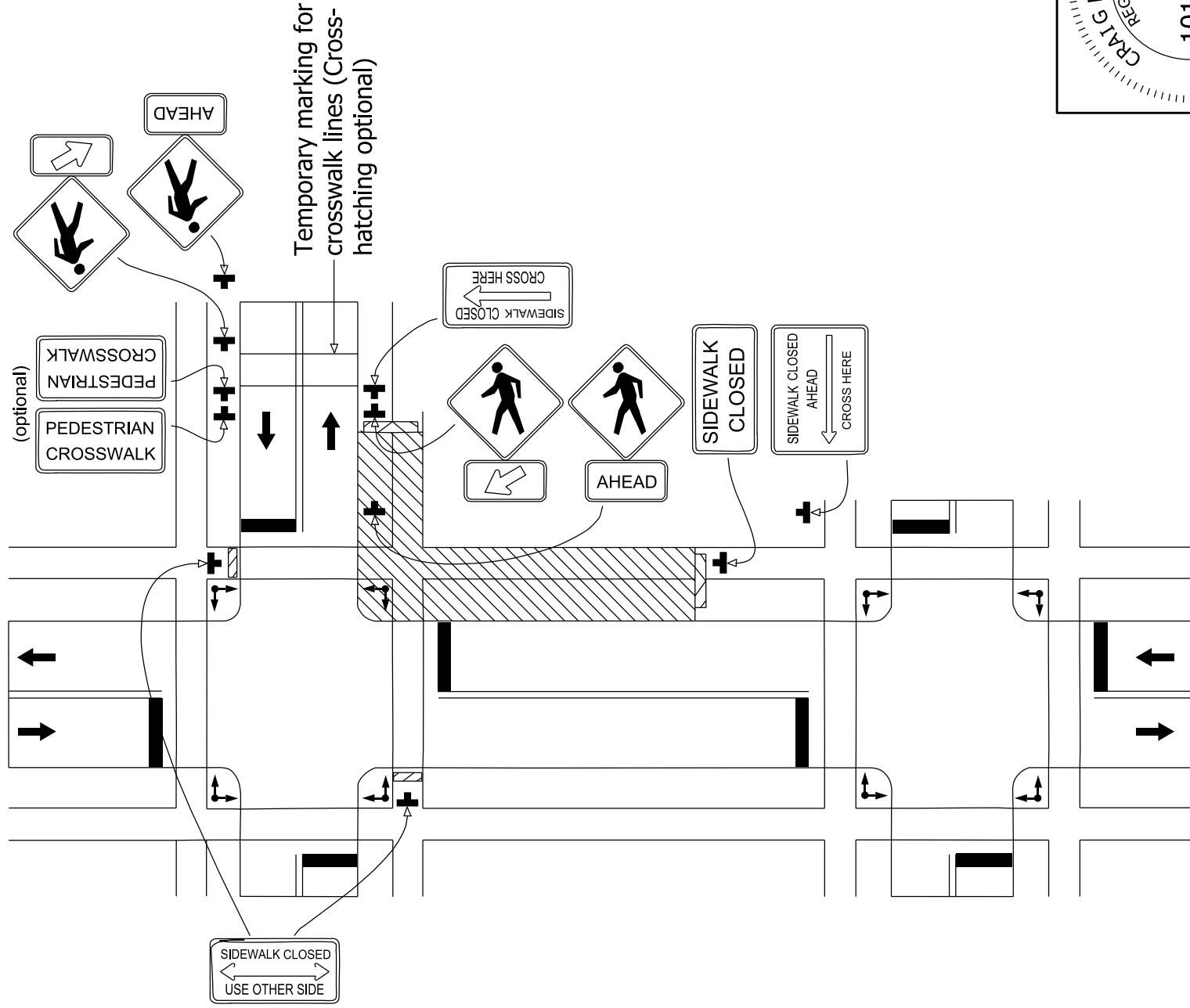
Craig E. Allman

Date:
11-JUL-2018



Notes:

- 1. This plan is provided as an example setup to use for pedestrian maintenance of traffic. Contractor shall set up phasing for construction of curb ramps to allow for maintaining pedestrian traffic within project limits.



Recommended for Approval:

Craig E. Allman

Date:
11-JUL-2018

PEDESTRIAN MAINTENANCE OF TRAFFIC

Curb Ramps and Blended Transitions**General Notes:**

There are three types of curb ramps: Perpendicular, Parallel, and Blended Transitions

Perpendicular Curb Ramps

Perpendicular curb ramps have a running slope that cuts through or is built up to the curb at right angles or meets the gutter break at right angles where the curb is curved. On large corner radiuses, it will be necessary to indent the gutter break on one side of the curb ramp in order for the curb ramp to meet the gutter break at right angles.

Parallel curb ramps have a running slope that is in-line with the direction of sidewalk travel and lower the sidewalk to a level turning space where a turn is made to enter the pedestrian street crossing.

Perpendicular curb ramps can be provided where the sidewalk is at least 12.0 ft wide. Parallel curb ramps can be provided where the sidewalk is at least 4.0 ft wide. Parallel and perpendicular curb ramps can be combined. A parallel curb ramp is used to lower the sidewalk to a mid-landing and a short perpendicular curb ramp connects the landing to the street. Combination curb ramps can be provided where the sidewalk is at least 6.0 ft wide.

Blended transitions are raised pedestrian street crossings, depressed corners, or similar connections between pedestrian access routes at the level of the sidewalk and the level of the pedestrian street crossing that have a grade of 5 percent or less. Blended transitions are suitable for a range of sidewalk conditions.

Turning Space. A turning space 4.0 ft minimum by 4.0 ft minimum shall be provided at the top of the curb ramp and shall be permitted to overlap other turning spaces and clear spaces. Where the turning space is constrained at the back-of-sidewalk, the turning space shall be 4.0 ft minimum by 5.0 ft minimum. The 5.0 ft dimension shall be provided in the direction of the ramp run. **(See Turning Space Detail (Perpendicular))**

Running Slope. The running slope of the curb ramp shall cut through or shall be built up to the curb at right angles or shall meet the gutter grade break at right angles where the curb is curved. The running slope of the curb ramp shall be 5 percent minimum and 8.3 percent maximum but shall not require the ramp length to exceed 15.0 ft. The running slope of the turning space shall be 2 percent maximum.

Flared Sides. Where a pedestrian circulation path crosses the curb ramp, flared sides shall be sloped 10 percent maximum, measured parallel to the curb line. The flared sides are part of the pedestrian circulation path, but are not part of the pedestrian access route. Curb ramps whose sides have returned curbs provide useful directional cues where they are aligned with the pedestrian street crossing and are protected from cross travel by landscaping, street furniture, chains, fencing, or railings. **(See Flared Sides Detail)**

Parallel Curb Ramps

Turning Space. A turning space 4.0 ft minimum by 4.0 ft minimum shall be provided at the bottom of the curb ramp and shall be permitted to overlap other turning spaces and clear spaces. If the turning space is constrained on 2 or more sides, the turning space shall be 4.0 ft minimum by 5.0 ft. The 5.0 ft dimension shall be provided in the direction of the pedestrian street crossing. **(See Turning Space Detail (Parallel))**

Running Slope. The running slope of the curb ramp shall be in-line with the direction of sidewalk travel. The running slope of the curb ramp shall be 5 percent minimum and 8.3 percent maximum but shall not require the ramp length to exceed 15.0 ft minimum. The running slope of the turning space shall be 2 percent maximum.

Blended Transitions.

Running Slope. The running slope of blended transitions shall be 5 percent maximum.

Common Requirements.

Width. The clear width of curb ramp runs (excluding any flared sides), blended transitions, and turning spaces shall be 4.0 ft minimum. **(See Width Detail)**

Grade Breaks. Grade breaks at the top and bottom of curb ramp runs shall be perpendicular to the direction of the ramp run. Grade breaks shall not be permitted on the surface of ramp runs and turning spaces. Surface slopes that meet at grade breaks shall be flush. **(See Grade Breaks Detail)**

Cross Slope. The cross slope of curb ramps, blended transitions, and turning spaces shall be 2 percent maximum. At pedestrian street crossings without yield or stop control and at midblock pedestrian street crossings, the cross slope shall be permitted to equal the street or highway grade. Pedestrian street crossings without yield or stop control are crossings where there is no yield or stop sign, or where there is a traffic signal that is designed for the green phase. At pedestrian street crossings without yield or stop control, vehicles can proceed through the intersection without slowing or stopping.

Counter Slope. The counter slope of the gutter or street at the foot of curb ramp runs, blended transitions, and turning spaces shall be 5 percent maximum.

Clear Space. Beyond the bottom grade break, a clear space 4.0 ft minimum by 4.0 ft minimum shall be provided within the width of the pedestrian street crossing and wholly outside the parallel vehicle travel lane.

Detectable Warning Surfaces

Size. Detectable warning surfaces shall extend 2.0 ft minimum in the direction of pedestrian travel. At curb ramps and blended transitions, detectable warning surfaces shall extend the full width of the ramp run (excluding any flared sides), blended transition, or turning space. At pedestrian at-grade rail crossings not located within a street or highway, detectable warnings shall extend the full width of the crossing. At boarding platforms for buses and rail vehicles, detectable warning surfaces shall extend the full length of the public use areas of the platform. At boarding and alighting areas at sidewalk or street level transit stops for rail vehicles, detectable warning surfaces shall extend the full length of the transit stop.

Placement. Some detectable warning products require a concrete border for proper installation. The concrete border should not exceed 2 in. Where the back of curb edge is tooled to provide a radius, the border dimension should be measured from the end of the radius. **(See Detectable Warning Border Detail)**

Perpendicular Curb Ramps. On perpendicular curb ramps, detectable warning surfaces shall be placed as follows: Where the ends of the bottom grade break are in front of the back of curb, detectable warning surfaces shall be placed at the back of curb. Where the ends of the bottom grade break are behind the back of curb and the distance from either end of the bottom grade break to the back of curb is 5.0 ft or less, detectable warning surfaces shall be placed on the ramp run within one dome spacing of the bottom grade break. Where the ends of the bottom grade break are behind the back of curb and the distance from either end of the bottom grade break to the back of curb is more than 5.0 ft, detectable warning surfaces shall be placed on the lower landing at the back of curb. Detectable warning surfaces are intended to provide a tactile equivalent underfoot of the visible curb line. If detectable warning surfaces are placed too far from the curb line because of a large curb radius, the location may compromise effective crossing. Detectable warning surfaces should not be placed on paving or expansion joints.

The rows of truncated domes in detectable warning surfaces should be aligned perpendicular to the grade break between the ramp run and the street so pedestrians who use wheelchairs can "track" between the domes. Where detectable warning surfaces are provided on a surface with a slope that is less than 5 percent, dome orientation is less critical.

(See Detectable Warning Placement Detail (Perp.))

Parallel Curb Ramps. On parallel curb ramps, detectable warning surfaces shall be placed on the turning space at the flush transition between the street and sidewalk.

Blended Transitions. On blended transitions, detectable warning surfaces shall be placed at the back of curb. Where raised pedestrian street crossings, depressed corners, or other level pedestrian street crossings are provided, detectable warning surfaces shall be placed at the flush transition between the street and the sidewalk.

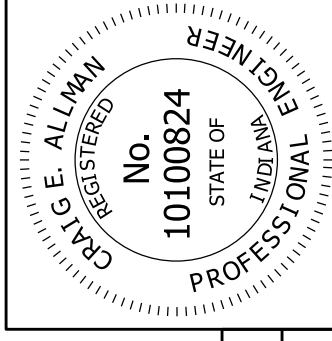
NOTES FOR CURB RAMP DETAILS

Recommended for Approval:

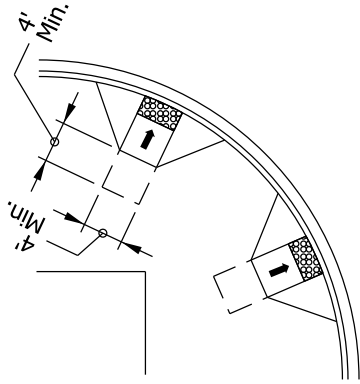
Chris E. Allman

Date:

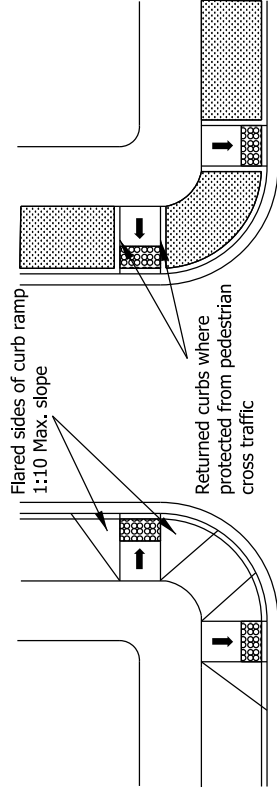
11-JUL-2018



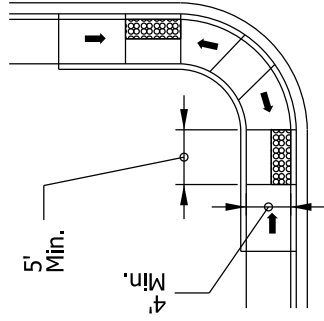
DETAILS FOR CURB RAMP



TURNING SPACE DETAIL (PERPENDICULAR)



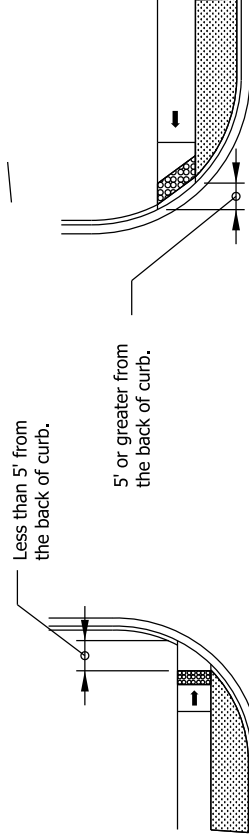
FLARED SIDES DETAIL



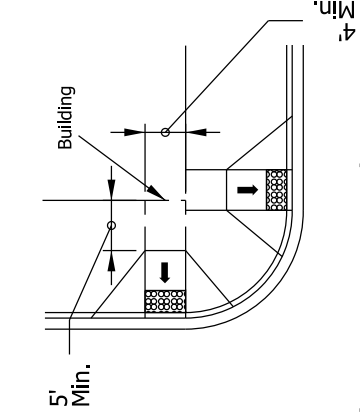
TURNING SPACE DETAIL (PARALLEL)

Less than 5' from the back of curb.

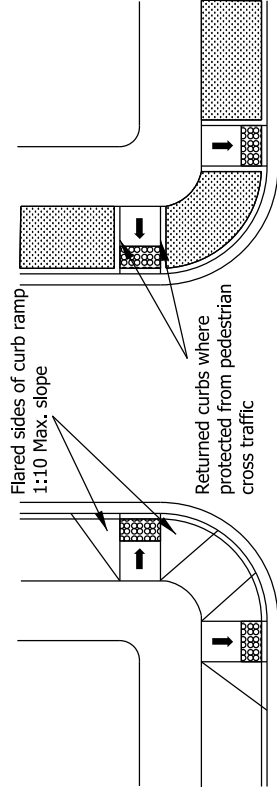
5' or greater from the back of curb.



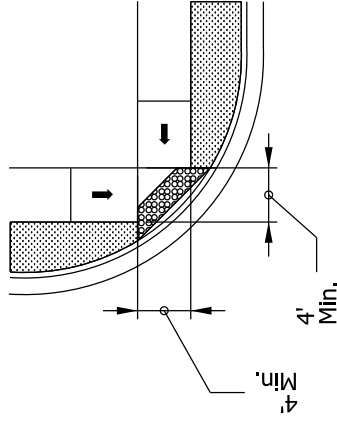
DETECTABLE WARNING PLACEMENT DETAIL (PERP.)



TURNING SPACE DETAIL (PERPENDICULAR)



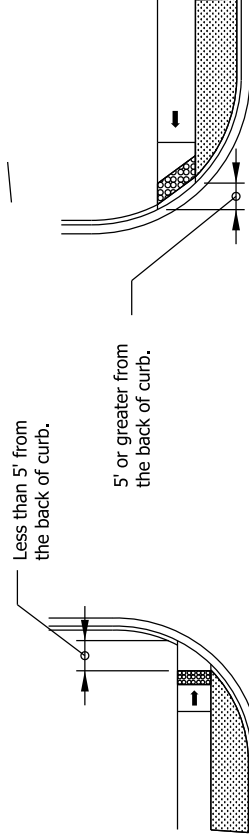
FLARED SIDES DETAIL



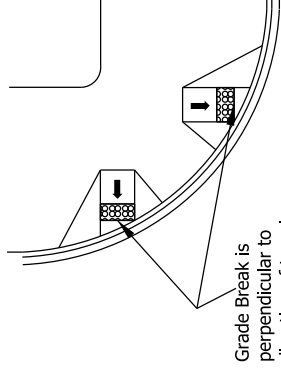
TURNING SPACE DETAIL (PARALLEL)

Less than 5' from the back of curb.

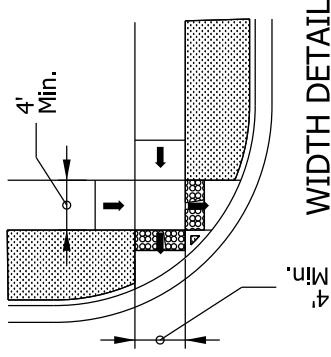
5' or greater from the back of curb.



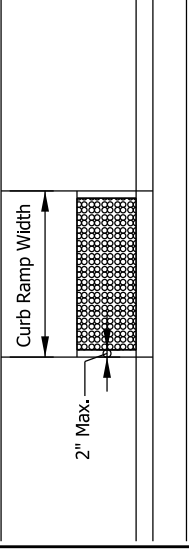
DETECTABLE WARNING PLACEMENT DETAIL (PERP.)



GRADE BREAKS DETAIL



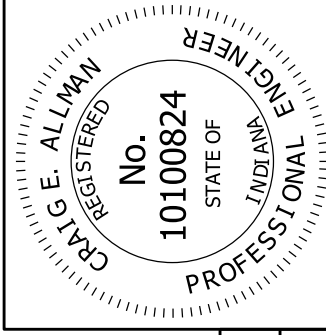
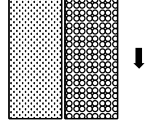
WIDTH DETAIL



DETECTABLE WARNING BORDER DETAIL

LEGEND

- Grass or Landscaped Area
- Detectable Warning Elements
- Direction of Travel



Recommended for Approval:

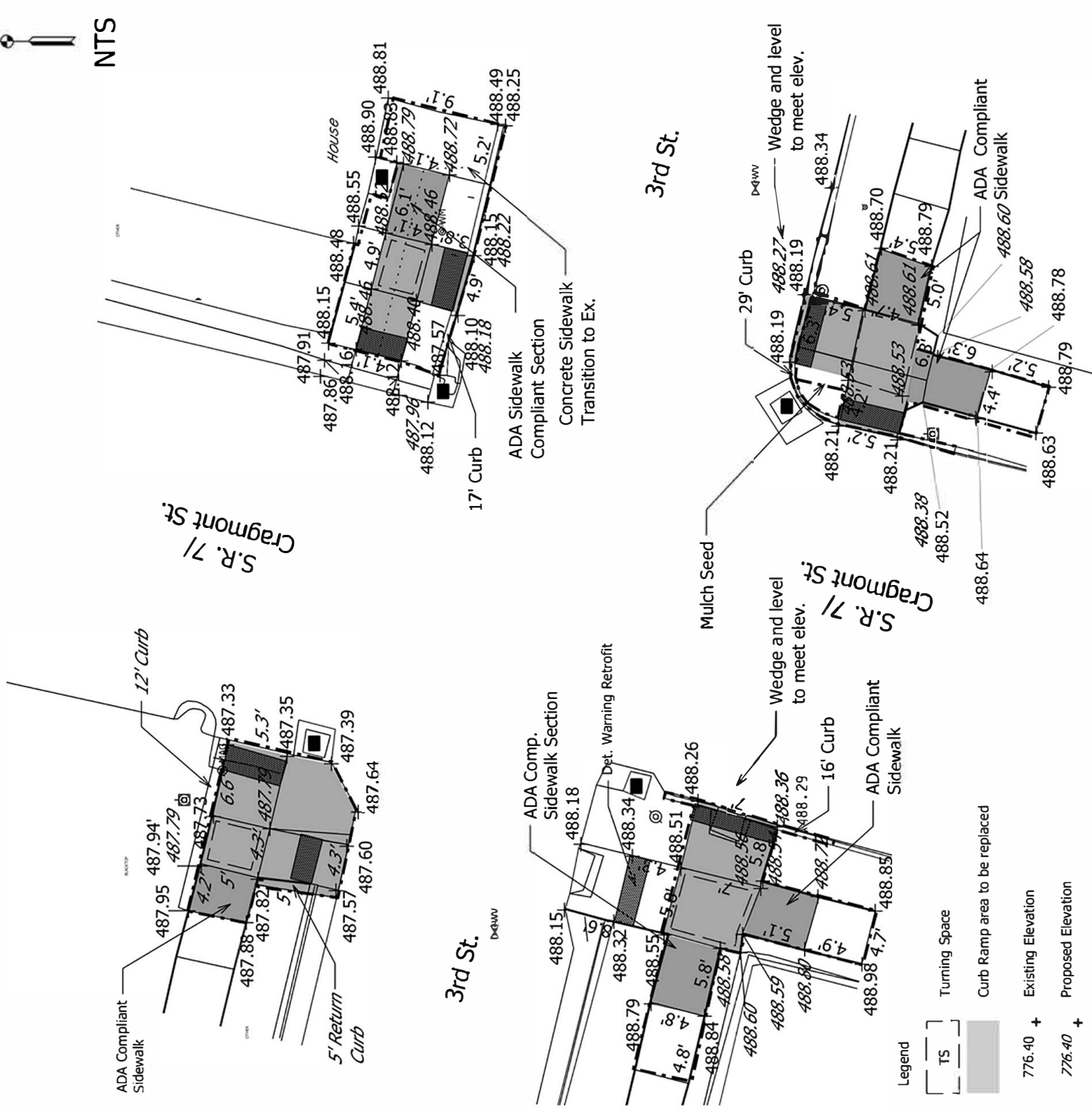
Craig E. Allman

Date:
11-JUL-2018

DETAIL SHEET - CURB RAMP DETAILS (CONT.)

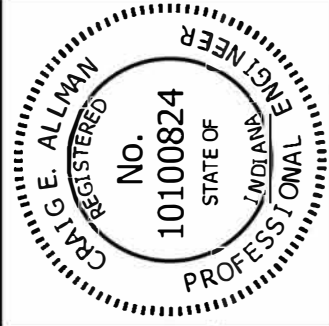


NTS



Legend

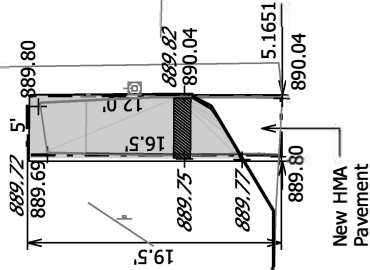
- TS Turning Space
- Curb Ramp area to be replaced
- 776.40 + Existing Elevation
- 776.40 + Proposed Elevation
- Detectable Warning Surface
- Existing Concrete Joint
- Sidewalk, Concrete
- Concrete Removal Boundary Curb included



Recommended for Approval:
[Signature]
 Date: 11-JUL-2018

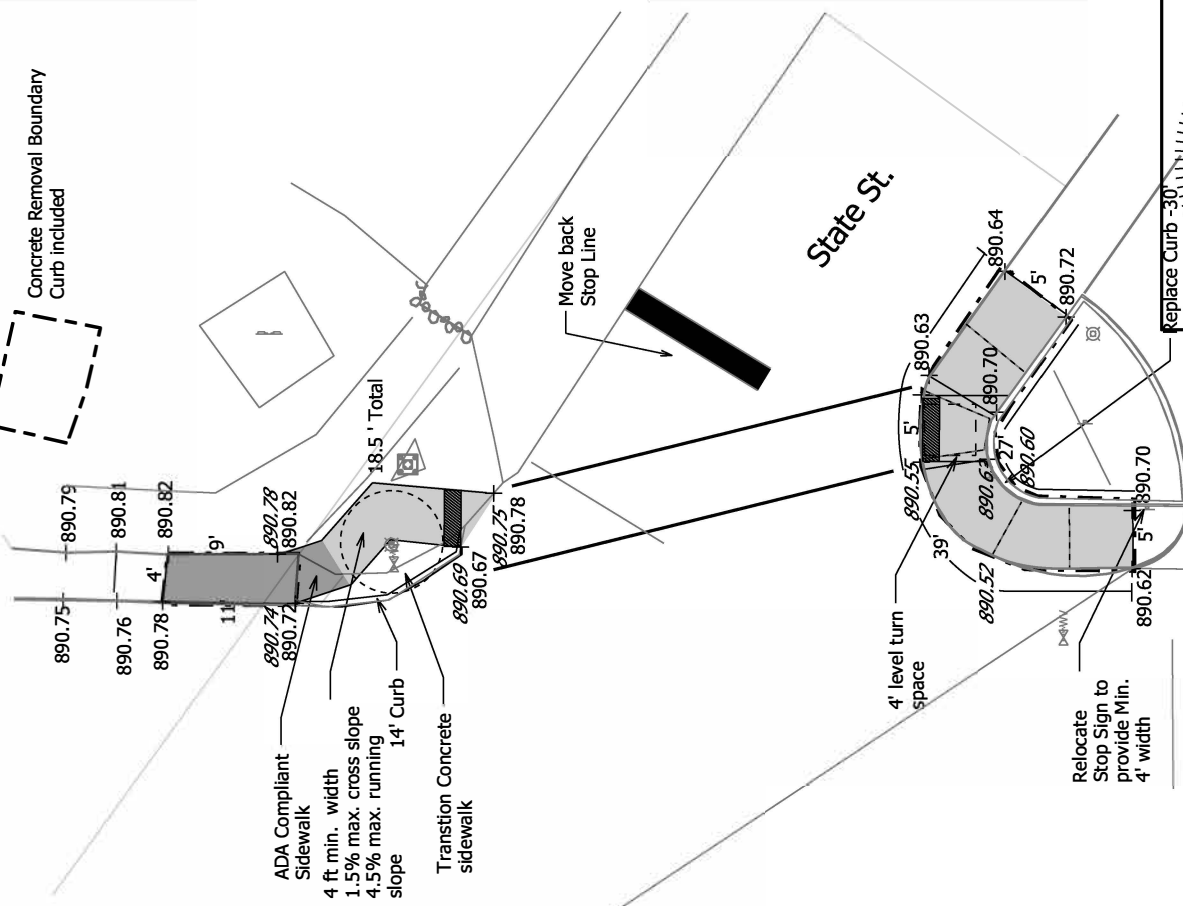
DETAIL SHEET - CURB RAMP PLAN DETAILS
3rd Street

- Legend**
- TS Turning Space
 - Curb Ramp area to be replaced
 - Existing Elevation 776.40 +
 - Proposed Elevation 776.40 +
 - Detectable Warning Surface
 - Existing Concrete Joint
 - Sidewalk, Concrete ADA Compliant
 - Concrete Removal Boundary Curb Included



Cragmont St.

S.R. 7



State St.

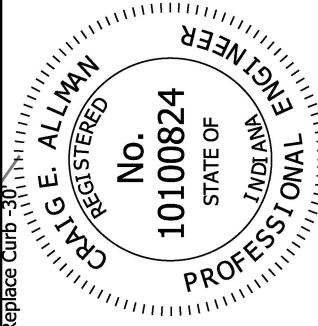


1"=15'

Relocate Stop Sign to provide Min. 4' width

Replace Curb - 30'

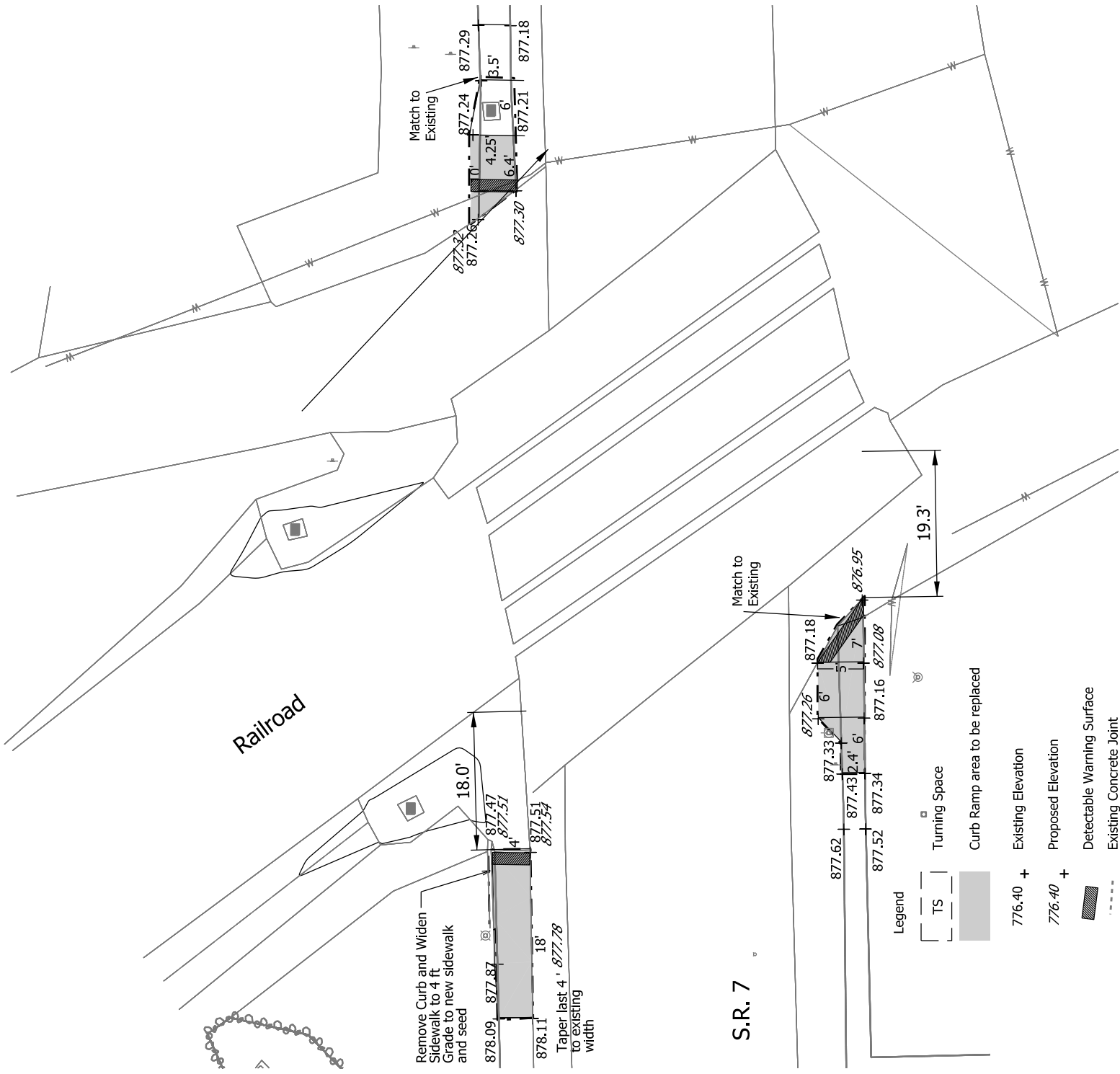
S.R. 7



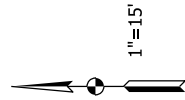
Recommended for Approval:

Date: 11-JUL-2018

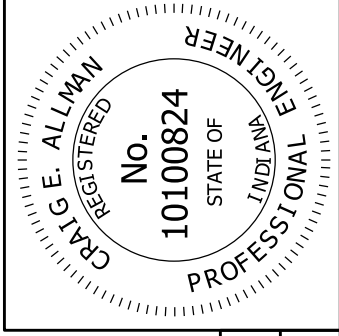
DETAIL SHEET - CURB RAMP PLAN DETAILS
State Street



S.R. 7



- Legend
- TS
 - Curb Ramp area to be replaced
 - 776.40 + Existing Elevation
 - 776.40 + Proposed Elevation
 - Detectable Warning Surface
 - - - - Existing Concrete Joint
 - Sidewalk, Concrete ADA Compliant
 - Concrete Removal Boundary Curb Included

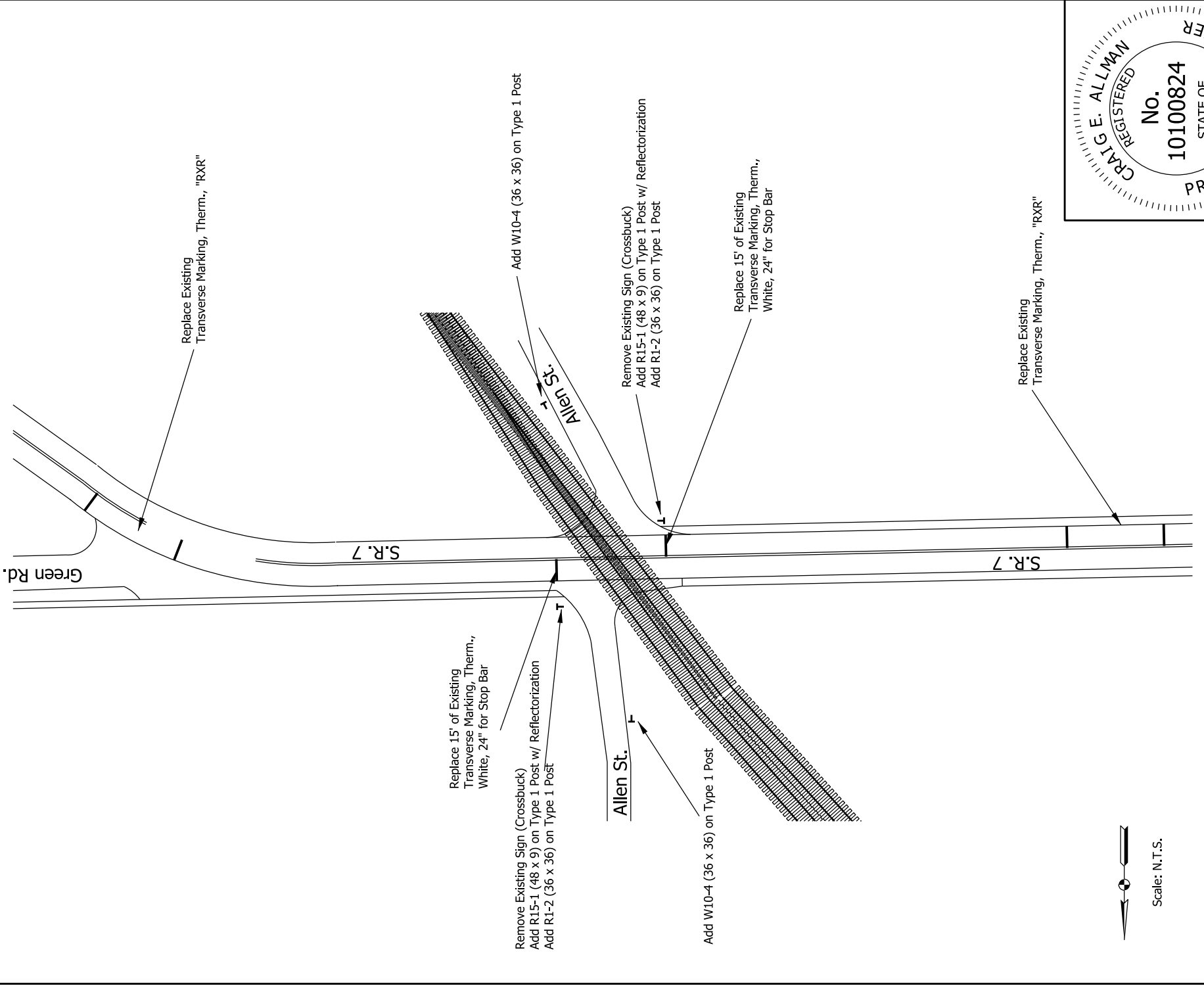


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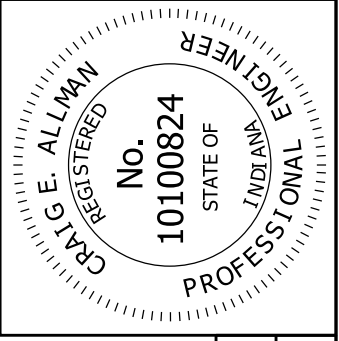
Craig E. Allman

Date:
11-JUL-2018

**DETAIL SHEET - CURB RAMP PLAN DETAILS
SR7 and RR**



Scale: N.T.S.

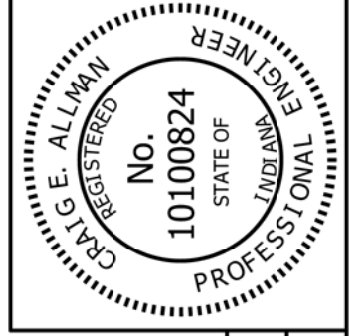


Recommended for Approval:

Craig E. Allman

Date:
11-JUL-2018

DETAIL SHEET - RAILROAD SIGNAGE



Location	Common Excavation	HMA Approach Mill	HMA Approach	HMA Wedge and Level Type C	Transition Mill	MULCHED SEEDING, U	CURB RAMP, CONCRETE	BED COURSE MATERIAL	DETECTABLE WARNING SURFACE	SIDEWALK, CONCRETE,	SIDEWALK, REMOVE	CURB AND GUTTER	CURB AND GUTTER, REMOVE	CURB	CURB, REMOVE	DWS, RETROFIT
	CYS	L.F.	Tons	Tons	SYS	SYS	SYS	TON	SYS	SYS	SYS	L.F.	L.F.	L.F.	L.F.	SYS
SR 7 and Main NE	16	14*	1.5*				10.4	0.75	2.5	58	47	39	36	25		
SR 7 and Main SE				1	8	2	15	0.75	2.5	36	51					
SR7 and 3rd St. NW	0.3						14.6	0.5	2.5	2.4	17			12		
SR7 and 3rd St. NE	0.4	3		1**			6.8	0.5	2	18.5	25.3			17	17	
SR7 and 3rd St. SE				1	8	10	9.5	0.5	2.6	6.1	16			29	29	
SR7 and 3rd St. SW				0.5		5	10	0.5	3	11	19.5			16	16	1.3
SR7 and State St. NW			3*	***		5	8	0.5	1.2		11					
SR7 and State St. NE						5	9.4	0.5	1	9.3	4.9			14		
SR7 and State St. SE							21	1	1.2		22			27	27	
SR 7 and RR NW						5	8.8	0.5	1		9				10	
SR 7 and RR NE						5	3.9	0.5	1	2.5	6.6					
SR 7 and RR SW						5	7.7	0.5	2.2		5.6					
Subtotal	16.7	3	4.5	3.5	16	42	125.1	7	22.7	143.8	234.9	39	36	140	99	1.3
Undistributed				2		10	10			10	20			20		
	16.7	3	4.5	5.5	16	52	135.1	7	22.7	153.8	254.9	39	36	160	99	1.3
	* Does not Include qty in SR 7 Approach Tables															
	** Grade Drainage Ditch for traversability															
	*** HMA Patching, Type C - 1 Ton															

Recommended for Approval:

Craig E. Allman

Date:
11-JUL-2018

CURB RAMP SUMMARY TABLE

APPROACH TABLE

Station		Description	L1 (ft)	L2 (ft)	W (ft)	Area (sys)
LEFT	RIGHT					
2+18		Alley	20.00	15.00	15.00	29.17
	2+18	Alley	20.00	15.00	15.00	29.17
4+15		3rd St.	35.00	20.00	20.00	61.11
	4+15	3rd St.	35.00	20.00	20.00	61.11
23+10		Presbyterian Ave.	110.00	35.00	48.00	386.67
		Paddy Ln.	40.00	30.00	30.00	116.67
	73+69	Terrace Dr.	20.00	30.00	20.00	55.56
74+00		East Ln.	50.00	20.00	30.00	116.67
	82+30	Harris St.	20.00	20.00	20.00	44.44
	84+55	Bassett St.	20.00	20.00	20.00	44.44
	88+79	Fayette St.	50.00	30.00	30.00	133.33
	98+07	State St.	65.00	30.00	30.00	158.33
	98+07	Cragmont St.	65.00	30.00	30.00	158.33
	102+13	Green Rd.	60.00	60.00	30.00	200.00
	104+03	Allen St.	20.00	20.00	20.00	44.44
	104+35	Allen St.	20.00	20.00	20.00	44.44
109+50		Taylor Ave.	30.00	30.00	30.00	100.00
111+33		Orchard St.	60.00	30.00	30.00	150.00
	111+33	Orchard St.	60.00	30.00	30.00	150.00
113+05		Wood St.	20.00	20.00	20.00	44.44
114+10		Madison State Hospital Entrance	85.00	30.00	30.00	191.67
114+87		Green Rd.	75.00	25.00	40.00	222.22
	116+80	Brown St.	35.00	30.00	30.00	108.33
		Seminary St.	71.00	40.00	20.00	123.33
123+56		Shelton Ln.	55.00	30.00	30.00	141.67
125+79		Wilson Ave.	75.00	30.00	30.00	175.00
130+70		Lanham St.	85.00	30.00	40.00	255.56
132+20		Pinehurst Ave.	65.00	30.00	30.00	158.33
	136+05	Cross Ave.	35.00	20.00	20.00	61.11
139+40		Rabbit Ln.	55.00	30.00	20.00	94.44
142+85		Wells Dr.	75.00	30.00	20.00	116.67
150+08		Duffy Dr.	60.00	30.00	20.00	100.00
	158+64	K of C Rd.	75.00	60.00	30.00	225.00
	163+63	Primrose Ln.	75.00	60.00	10.00	75.00
	163+84	Osage St.	60.00	30.00	30.00	150.00
167+67		N. Rose Way	65.00	30.00	30.00	158.33
	167+67	N. Rose Way	65.00	30.00	30.00	158.33
170+32		S.R. 62				0.00
	170+32	S.R. 62				0.00
176+65		Bear St.	50.00	25.00	25.00	104.17
179+73		Crozier Ave.	65.00	30.00	30.00	158.33
						0.00

NOTE: SEE PUBLIC ROAD APPROACH DETAIL

SUBTOTAL (SYS) = 4,905.83

DRIVE TABLE

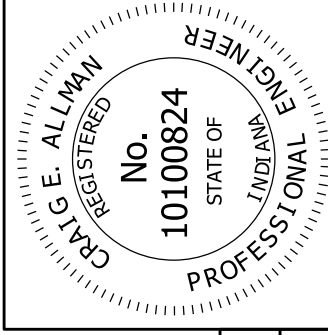
Description	Number	Size (sys)	Area (sys)
PRIVATE DRIVES	23.00	20.00	460.00
MAILBOX APPROACH	16.00	40.00	640.00
COMBINATION DRIVES	40.00	48.00	1,920.00
COMMERCIAL DRIVES	55.00	28.00	1,540.00
CONCRETE DRIVES	6.00	10.00	60.00
FIELD ENTRANCE	1.00	20.00	20.00

APPROACH TABLE

Recommended for Approval:

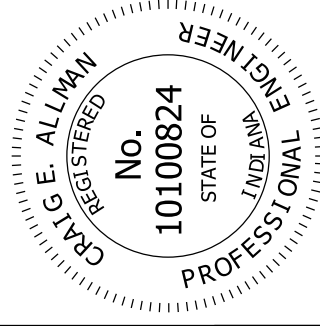
Greg E. Allman

Date:
11-JUL-2018



PAVEMENT MARKINGS AND TRAFFIC ITEMS TABLE

STATION	Description	Qua.	Unit
11+50 to 184+45	Solid White 4" Edge Lines - Both Sides	36525	Lft.
11+50 to 184+45	Solid Yellow 4" Center Lines	26370	Lft.
11+50 to 184+45	Broken Yellow 4" Center Lines	1770	Lft.
11+50 to 19+37	For Traffic Items and Markings - See Detail Sheets	--	
21+50	Inlet Casting, Left Side	1	Ea.
26+20	Centerline Monument Type "B", Raise to Grade	1	Ea.
28+67	Inlet Casting, Left Side	1	Ea.
35+05	Manhole, Do Not Disturb (Right Side)	--	Ea.
97+55	24" Stop Bar, Thermoplastic, White	15	Lft.
98+64	24" Stop Bar, Thermoplastic, White	15	Lft.
101+69	Pavement Message, Thermoplastic RXR	1	Ea.
103+85	24" Stop Bar, Thermoplastic, White	15	Lft.
104+47	24" Stop Bar, Thermoplastic, White	15	Lft.
105+70	Manhole, Raise to Grade (Right Side)	1	Ea.
108+75	Pavement Message, Thermoplastic RXR	1	Ea.
111+58	Utility Meter/Valve	--	Ea.
113+08	Manhole, Raise to Grade (Right Side)	1	Ea.
116+10	Utility Meter/Valve	--	Ea.
117+00	Utility Meter/Valve	--	Ea.
121+20	Utility Meter/Valve	--	Ea.
135+80	Utility Meter/Valve	--	Ea.
168+65	Pavement Message, Thermo., Lane Indication Arrow	1	Ea.
168+65 to 169+60	Solid White 4" Lane Line - Right Side	95	Lft.
168+65 to 169+60	Solid White 8" Gore Striping - Right Side	95	Lft.
168+65 to 169+60	Trans. Marking, 12" Solid White Line, Thermo.	60	Lft.
169+04	Pavement Message, Thermo. Word "ONLY"	1	Ea.
169+30	Detector Housing, Remove and Install	2	Ea.
169+40	Pavement Message, Thermo., Lane Indication Arrow	2	Ea.
169+60	24" Stop Bar, Thermoplastic, White	15	Lft.
171+00	24" Stop Bar, Thermoplastic, White	15	Lft.
171+00 to 172+10	Solid White 4" Lane Line - Left Side	110	Lft.
171+20	Pavement Message, Thermo., Lane Indication Arrow	2	Ea.
171+20	Detector Housing, Remove and Install	2	Ea.
171+70	Pavement Message, Thermo. Word "ONLY"	1	Ea.
184+35	Centerline Monument Type "B", Raise to Grade	1	Ea.



Recommended for Approval:

Date:
11-JUL-2018**PAVEMENT MARKING TABLE**

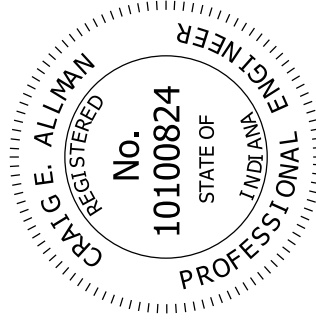
Description	Quantity	Unit
LINE, THERMOPLASTIC, SOLID, YELLOW, 4"	26,370	LFT.
LINE, THERMOPLASTIC, SOLID, WHITE, 4"	35,078	LFT.
LINE, THERMOPLASTIC, BROKEN, YELLOW, 4"	1,770	LFT.
TRANSVERSE MARKING, THERMOPLASTIC, STOP LINE, WHITE, 24"	90	LFT.
TRANSVERSE MARKINGS, THERMOPLASTIC, "RXR"	2	LFT.
TRANSVERSE MARKINGS, THERMOPLASTIC, LANE INDICATION ARROW	4	EA.
TEMPORARY PAVEMENT MARKINGS, REMOVABLE	5,274	LFT.
TEMPORARY PAVEMENT MARKINGS, 4"	5,274	LFT.
LINE, THERMOPLASTIC, SOLID, WHITE, GORE STRIPING, 8"	95	LFT.
MONUMENT, TYPE B	2	EA.
SIGNAL DETECTOR HOUSING	4	EA.
SAWCUT FOR ROADWAY LOOP DETECTOR AND SEALANT	640	LFT.
SIGNAL CABLE, ROADWAY LOOP, COPPER, 1C/14 GA	500	LFT.
SIGNAL CABLE, DETECTOR LEAD-IN, COPPER, 2C/16 GA	50	LFT.
CASTING, ADJUSTED TO GRADE (UNDISTRIBUTED)	3	EA.
SNOWPLOWABLE RAISED PAVEMENT MARKER, REMOVE	392	EA.
SNOWPLOWABLE RAISED PAVEMENT MARKER	392	EA.

PAVEMENT MARKING TOTAL SUMMARY

Recommended for Approval:



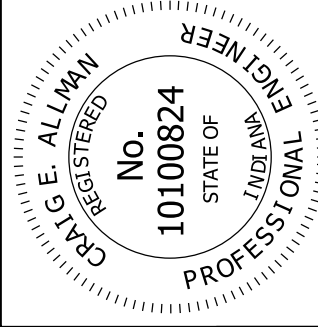
Date:
11-JUL-2018



Partial Depth HMA Patching

Location	Length	Width	Area	Lane
10+00	12	24	32.0	Both
13+75	12	12	16.0	R
16+55	50	6	33.3	R
29+40	200	6	133.3	R
36+65	250	6	166.7	L
40+80	274	24	730.7	Both
44+45	530	6	353.3	L
47+75	10	24	26.7	Both
55+00	400	24	1066.7	Both
62+20	110	6	73.3	R
64+30	290	6	193.3	L
68+75	145	6	96.7	L
70+85	50	24	133.3	Both
83+55	50	6	33.3	R
87+40	110	6	73.3	R
92+75	50	6	33.3	R
111+10	50	12	66.7	L
113+50	100	6	66.7	R
116+05	20	6	13.3	R
124+45	10	6	6.7	R
126+10	210	6	140.0	R
141+80	10	24	26.7	Both
156+50	20	6	13.3	R
165+50	80	6	53.3	R

Total (SYS) = 3582.0
Tons = 789.0
Undistributed Tons = 250.0
1039.0



Recommended for Approval:

Date:
11-JUL-2018

PARTIAL DEPTH PATCHING TABLE

QUANTITIES FOR MILLING AND RESURFACING ROADWAY

DESCRIPTION	MILLING, ASPHALT, 1.5" (yd ²)	165 LBS/YD ² QC/QA HMA, 3, 64, SURFACE, 9.5 mm (TONS)	TACK COAT (TONS)
MAINLINE- FROM DETAIL	3,973.33	327.80	1.09
LEFT SHOULDER- FROM DETAIL	333.33	27.50	0.09
RIGHT SHOULDER- FROM DETAIL	570.67	47.08	0.16
MAINLINE	42,301.33	3,489.86	11.63
LEFT SHOULDER	5,529.56	456.19	1.52
RIGHT SHOULDER	6,009.33	495.77	1.65
TOTALS	58,717.56	4,844.20	16.15

QUANTITIES FOR MILLING AND RESURFACING APPROACHES AND DRIVES

DESCRIPTION	APPROACH MILLING, (yd ²)	HMA FOR APPROACHES, TYPE C (TONS)	TACK COAT (TONS)
DRIVES	4,640.00	382.80	1.28
STREET APPROACHES	4,905.83	404.73	1.35
TOTALS	9,545.83	787.53	2.63

PAVEMENT QUANTITIES TOTALS

QC/QA HMA, 3, 64, SURFACE, 9.5 mm	4,844	TONS
HMA FOR APPROACHES, TYPE C	793	TONS
MILLING, ASPHALT, 1.5"	58,718	SYS.
APPROACH MILLING	9,563	SYS.
TRANSITION MILLING (UNDISTRIBUTED)	216	SYS.
TACK COAT	19	TONS
CONSTRUCTION SIGNS, TYPE A	33	EA.
HMA PATCHING, TYPE C	1,039	TONS
SIGN SHEET REMOVE	2	EA.
SIGN SHEET WITH LEGEND (0.08 IN.)	448	SFT.
CONCRETE, CLASS, A (ADJUST TO GRADE)	4.0	CYS.
REINFORCING BARS, EPOX COATED	218	LBS.
SIGN POST, SQUARE TYPE 1, UNREINFORCED ANCHOR	36	LFT.
SUBGRADE TREATMENT, TYPE IC (UNDISTRIBUTED)	200	SYS.

PAVEMENT QUANTITY TABLE

Recommended for Approval:

[Signature]

Date:
11-JUL-2018

