CONSTRUCTION PLANS
FOR
ELM STREET AREA
DRAINAGE IMPROVEMENTS
TOWNSHIP OF CRANFORD
COUNTY OF UNION
NEW JERSEY

UTILITIES/AUTHORITIES

GAS SERVICE
ELIZABETHTOWN GAS COMPANY
520 GREEN LANE, UNION, NJ 7083
PHONE: (908) 662-8321
CONTACT: GREGORY J. BALINT

CABLE SERVICE
COMCAST CABLEVISION OF NJ
800 RAHWAY AVENUE, UNION, NJ 07083
PHONE: (908) 851-2258
CONTACT: GEORGE PALYCA

ELECTRIC SERVICE
PUBLIC SERVICE ELECTRIC AND GAS COMPANY
472 WESTON CANAL ROAD, SOMERSET, NJ 08873
PHONE: (732) 764-3067
CONTACT: JOHN GRABENSTEIN

WATER SERVICE
NEW JERSEY AMERICAN WATER COMPANY
1341 NORTH AVENUE, PLAINFIELD, NJ 07061
PHONE: (908) 791-3456
CONTACT: MICHAEL F. BANGE

TELEPHONE SERVICE
VERIZON COMMUNICATIONS
290 W. MT PLEASANT AVENUE, LIVINGSTON, NJ 07039
PHONE: (973) 422-5156
CONTACT: DARREN CRAY

SEWER SERVICES
TWP OF CRANFORD SEWER DEPARTMENT
ROUND HOUSE, 364 NORTH AVENUE
PHONE: (908) 709-7217
CONTACT: ERIK HASTRUP

RAHWAY VALLEY SEWERAGE AUTHORITY
1050 EAST HAZELWOOD AVENUE, RAHWAY, NJ 07065
PHONE: (732) 388-0868
CONTACT: JOHN BUONOCORE

INDEX OF SHEETS

SHT. No.	DESCRIPTION	LATEST REVISION
1	COVER	
2	GENERAL NOTES AND QUANTITIES	
3	EXISTING CONDITIONS PLAN (MANSION TERRACE)	
4	EXISTING CONDITIONS PLAN (BROAD STREET)	
5	EXISTING CONDITIONS PLAN (STRATFORD TERRACE)	
6	EXISTING CONDITIONS PLAN (LAWN TERRACE)	
7	DIMENSION PLAN (MANSION TERRACE)	
8	DIMENSION PLAN (BROAD STREET)	
9	DIMENSION PLAN (STRATFORD TERRACE)	
10	DIMENSION PLAN (LAWN TERRACE)	
11-12	DIMENSION PLAN (ELM STREET)	
13	DIMENSION PLAN (ALTERNATE A - BLUFF STREET)	
14-16	GRADING & DRAINAGE PLAN (MANSION TERRACE)	
17-19	GRADING & DRAINAGE PLAN (BROAD STREET)	
20-22	GRADING & DRAINAGE PLAN (STRATFORD TERRACE)	
23-24	GRADING & DRAINAGE PLAN (LAWN TERRACE)	
25	STORM PROFILES (MANSION TERRACE)	
26	STORM PROFILES (BROAD STREET)	
27	STORM PROFILES (STRATFORD TERRACE)	
28	STORM PROFILES (LAWN TERRACE)	
29	ADA CURB RAMP DETAILS	
30	SOIL EROSION & SEDIMENT CONTROL NOTES AND DETAILS	
31	SOIL EROSION & SEDIMENT CONTROL NOTES	
32-35	CONSTRUCTION DETAILS	
36-39	NJDOT TRAFFIC CONTROL DETAILS	
40-43	NJDOT CONSTRUCTION DETAILS	

KEY MAP

* THE NEW JERSEY DEPARTMENT OF TRANSPORTATION "STANDARD ROADWAY CONSTRUCTION/TRAFFIC CONTROL/BRIDGE CONSTRUCTION DETAILS" BOOKLET DATED (2016) AND "ELECTRICAL BUREAU STANDARD DETAILS" (2007) TO GOVERN, EXCEPT FOR THOSE DETAILS CONTAINED HEREIN.

NEW JERSEY DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION 2019 AND AS AMENDED BY THE SUPPLEMENTAL SPECIFICATION SHALL GOVERN THIS CONSTRUCTION.

TOWNSHIP OF CRANFORD

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BRIAN ANDREWS, DEPUTY MAYOR/COMMISSIONER

THOMAS H. HANNEN, JR., COMMISSIONER
JASON GAREIS, COMMISSIONER
MARY O'CONNOR, COMMISSIONER

PATRICIA DONAHUE, TOWNSHIP CLERK
JAMIE CRYAN, TOWNSHIP ADMINISTRATOR

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REV	DATE	DRAWN BY	DESCRIPTION

Carl P. O'Brien
NEW JERSEY LICENSED PROFESSIONAL ENGINEER
LICENSE NUMBER: GE45154
COLLIERS ENGINEERING & DESIGN, INC.
N.J. C.O.A. #: 24GA27986500

CONSTRUCTION PLANS
FOR
ELM STREET AREA
DRAINAGE
IMPROVEMENTS

TOWNSHIP OF CRANFORD
UNION COUNTY
NEW JERSEY

Colliers Engineering & Design
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PROJECT NUMBER: CDT071
DRAWING NAME: C-COVER

SHEET TITLE: COVER

SHEET NUMBER: 1 of 43

C:\CDT071\Engineering\Site Plan\C-COVER.dwg\C-1-COVER By: MIBRIXELMAN

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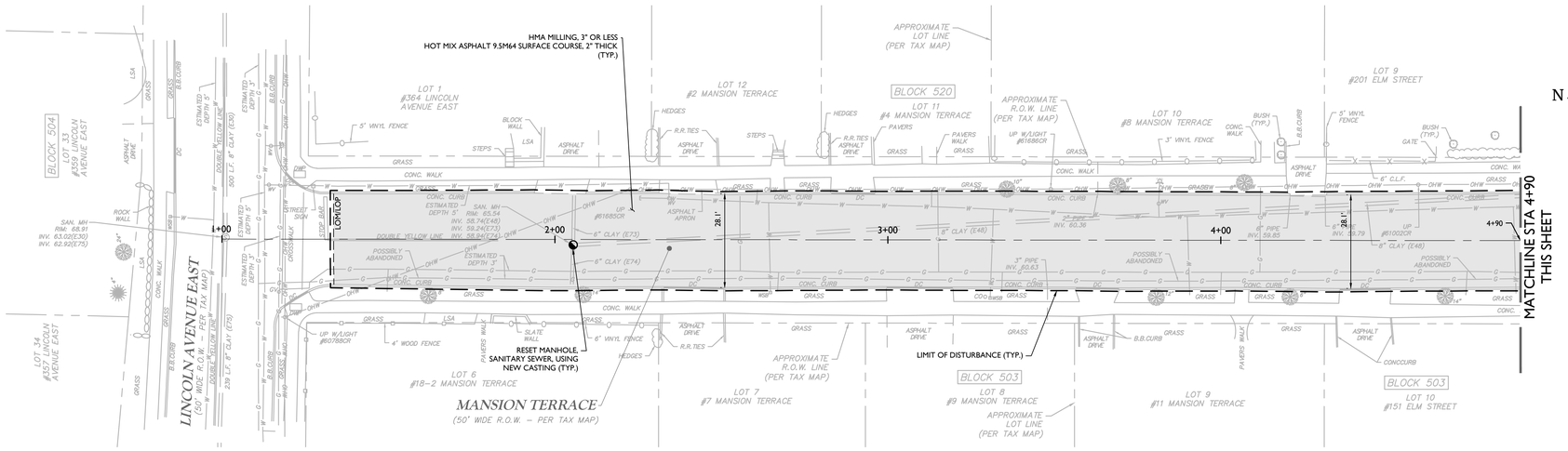

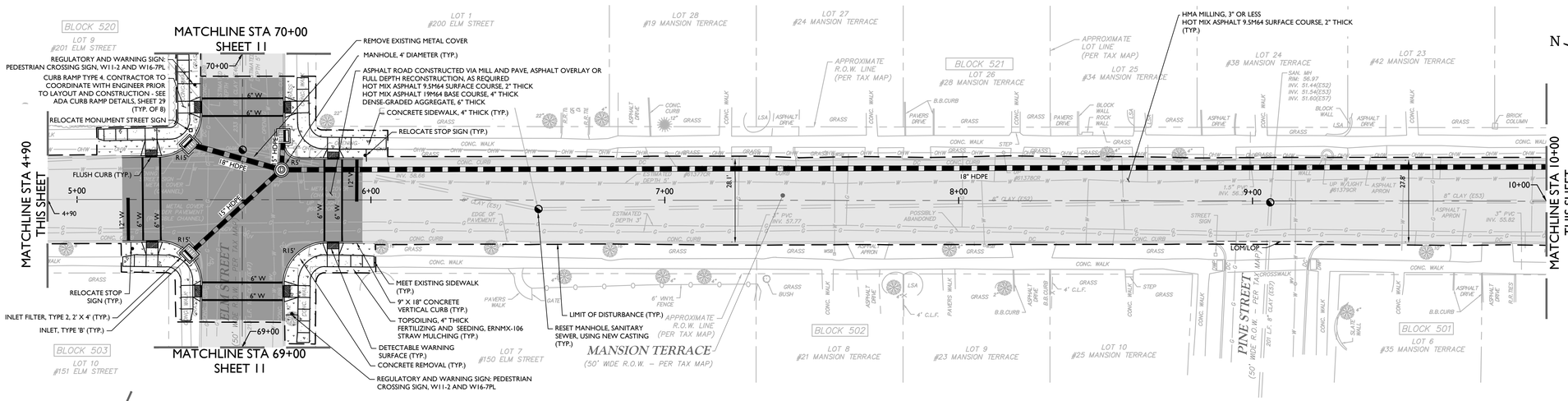

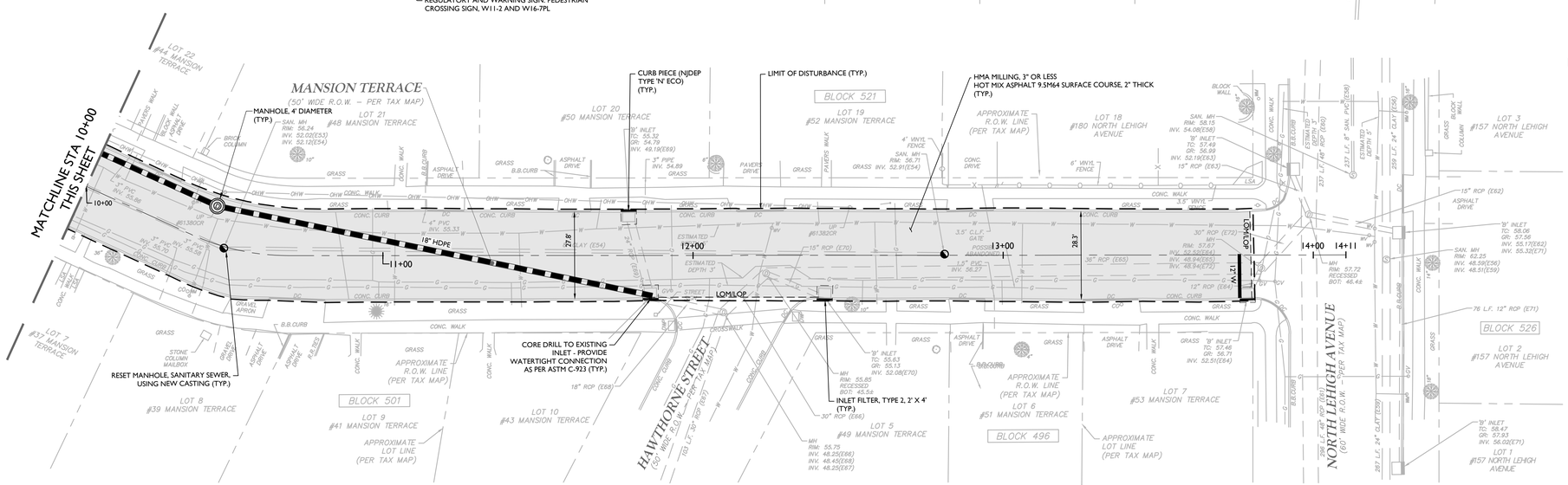

LEGEND

- HMA MILLING, 3" OR LESS, AND INSTALLATION OF HOT MIX ASPHALT 9.5M64 SURFACE COURSE, 2" THICK
- ASPHALT ROAD CONSTRUCTED VIA MILL AND PAVE, ASPHALT OVERLAY OR FULL DEPTH RECONSTRUCTION, AS REQUIRED
- CONCRETE SIDEWALK, 4" THICK
- RESTORATION USING TOPSOILING, 4" THICK FERTILIZING AND SEEDING, ERNMX-106 STRAW MULCHING

20 0 20 40

SCALE : 1" = 20'

THIS PROJECT IS EXEMPT FROM SOIL COMPACTION TESTING AND REMEDIATION AS IT IS LOCATED IN AN URBAN REDEVELOPMENT AREA

SOIL EROSION & SEDIMENT CONTROL PLAN

C:\CDT071\Engineering\Site Plans\C-LAYT-MANS-TERR.dwg\C-2.DIM PLAN-MANSION TERRACE By: MBEKKEDMAN

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CONSTRUCTION PLANS

FOR

ELM STREET AREA DRAINAGE IMPROVEMENTS

TOWNSHIP OF CRANFORD
UNION COUNTY
NEW JERSEY

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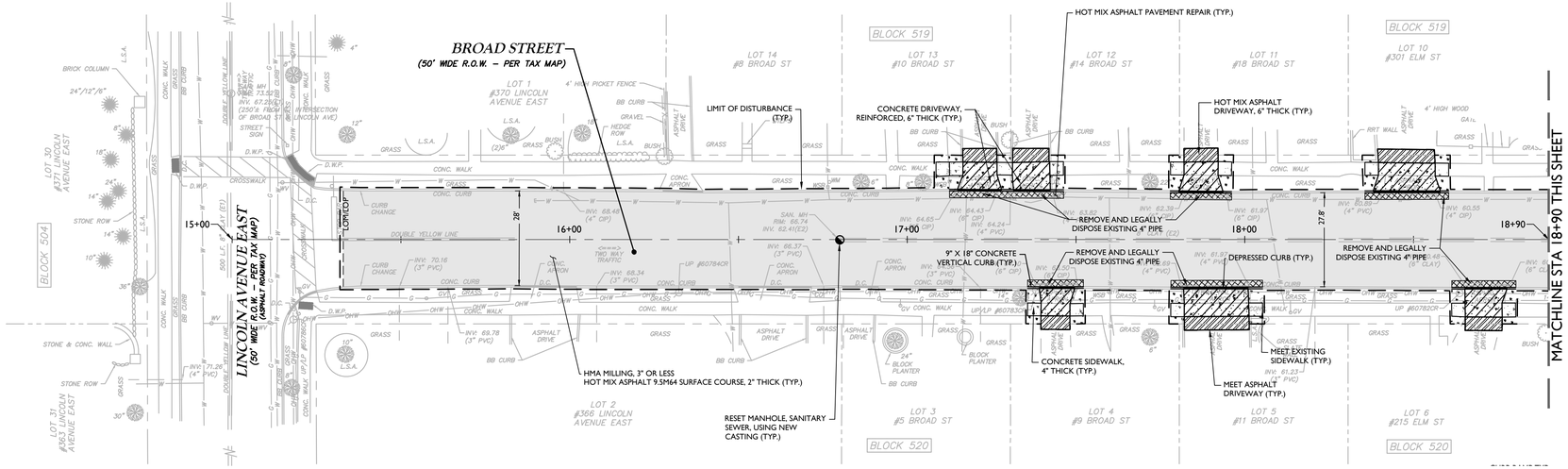
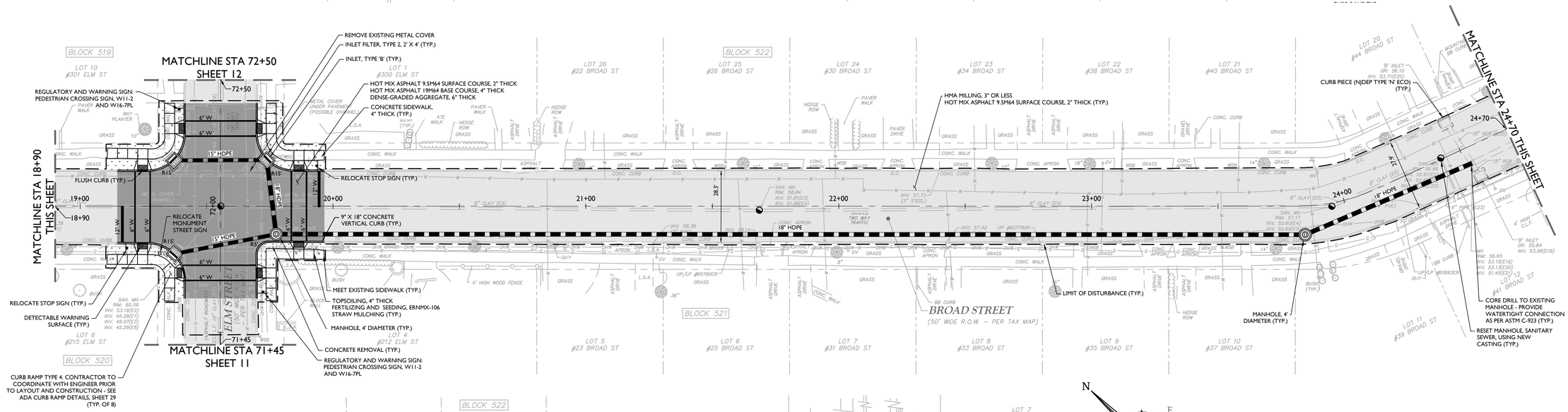
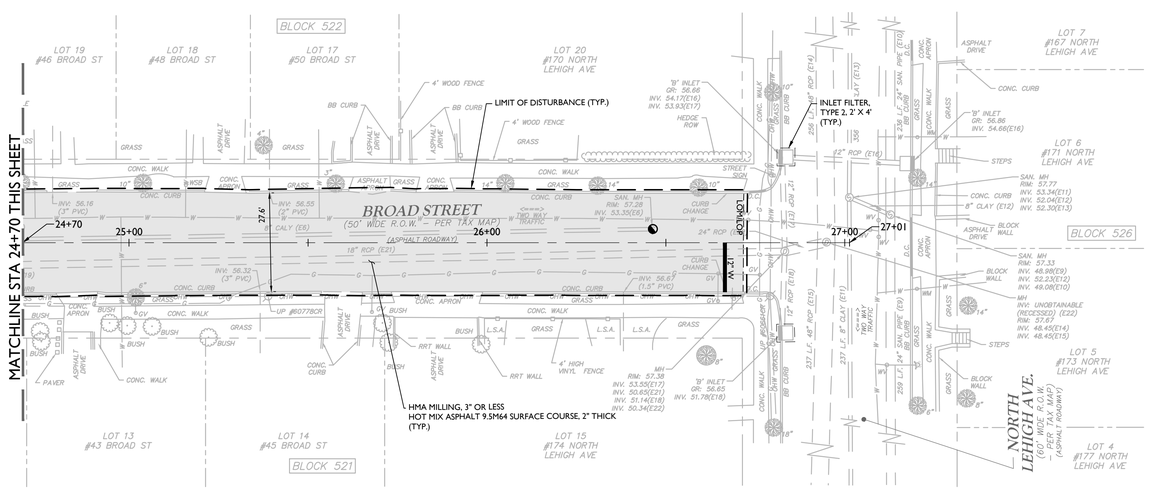
PROJECT NUMBER:	DRAWING NAME:
CDT071	C-LAYT-MANS-TERR

SHEET TITLE:
DIMENSION PLAN (MANSION TERRACE)

NOTE: DO NOT SCALE DRAWINGS FOR CONSTRUCTION.







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- ASPHALT ROAD CONSTRUCTED VIA MILL AND PAVE, ASPHALT OVERLAY OR FULL DEPTH RECONSTRUCTION, AS REQUIRED
- HOT MIX ASPHALT PAVEMENT REPAIR
- HOT MIX ASPHALT DRIVEWAY, 6" THICK
- CONCRETE DRIVEWAY, REINFORCED, 6" THICK
- CONCRETE SIDEWALK, 4" THICK
- RESTORATION USING TOPSOILING, 4" THICK FERTILIZING AND SEEDING, ERNMX-106 STRAW MULCHING

20 0 20 40

SCALE : 1" = 20'

SOIL EROSION & SEDIMENT CONTROL PLAN

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CONSTRUCTION PLANS

FOR

ELM STREET AREA DRAINAGE IMPROVEMENTS

TOWNSHIP OF CRANFORD
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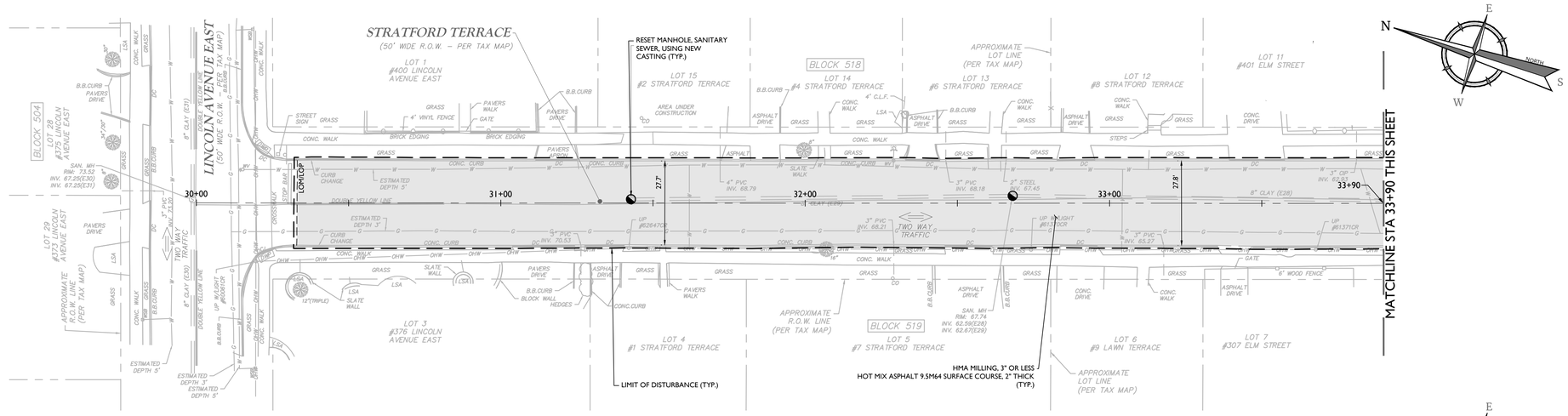
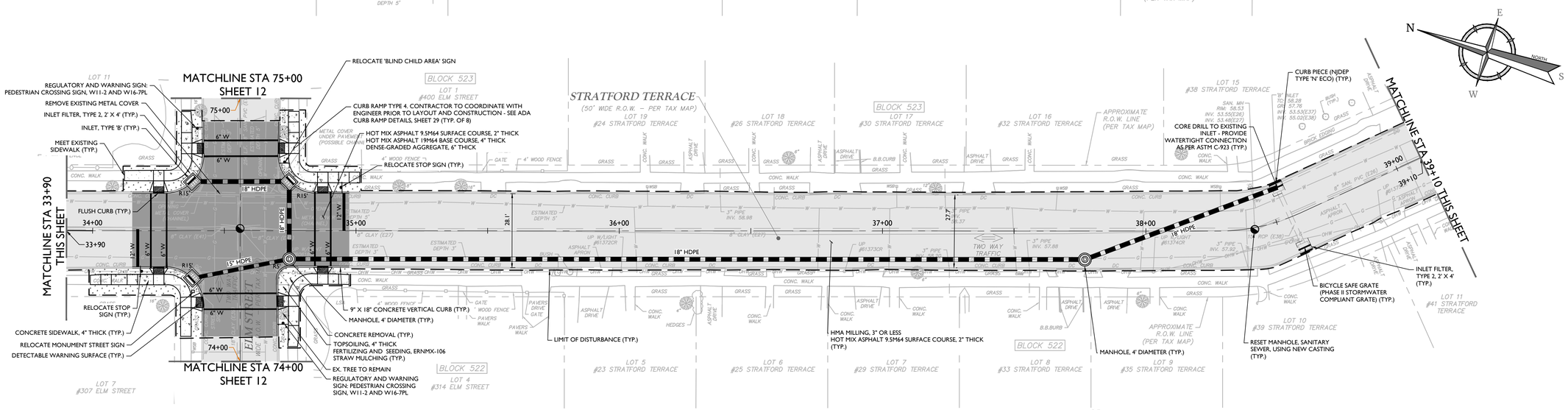
PROJECT NUMBER: CDT071
DRAWING NAME: C-LAYT-BROD-STRT

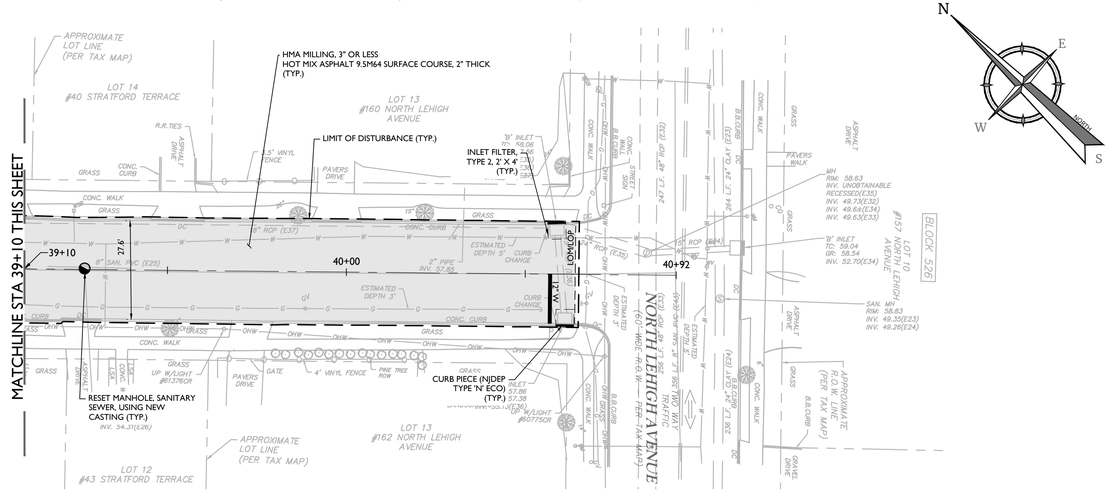
SHEET TITLE:
DIMENSION PLAN (BROAD STREET)

NOTE: DO NOT SCALE DRAWINGS FOR CONSTRUCTION.

CCDT071 Engineering\Site Plans\C-LAYT-BROD-STRT.dwg\C-8-DIM PLAN-BROAD STREET By: MBRKEEMAN







LEGEND

- HMA MILLING, 3" OR LESS, AND INSTALLATION OF HOT MIX ASPHALT 9.5 M 64 SURFACE COURSE, 2" THICK
- ASPHALT ROAD CONSTRUCTED VIA MILL AND PAVE, ASPHALT OVERLAY OR FULL DEPTH RECONSTRUCTION, AS REQUIRED
- CONCRETE SIDEWALK, 4" THICK
- RESTORATION USING TOPSOILING, 4" THICK FERTILIZING AND SEEDING, ERNMX-106 STRAW MULCHING

20 0 20 40
SCALE : 1" = 20'

SOIL EROSION & SEDIMENT CONTROL PLAN

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CONSTRUCTION PLANS
FOR
ELM STREET AREA DRAINAGE IMPROVEMENTS

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PROJECT NUMBER: CDT071
DRAWING NAME: C-LAYT-STRA-TERR

SHEET TITLE:
DIMENSION PLAN (STRATFORD TERRACE)

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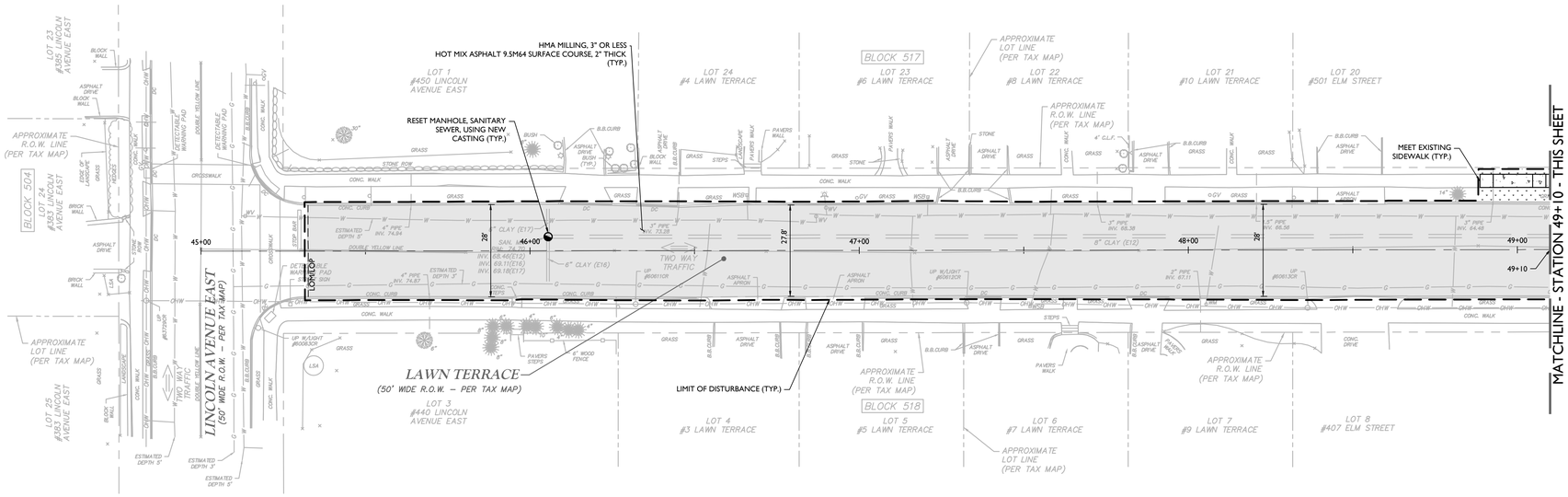
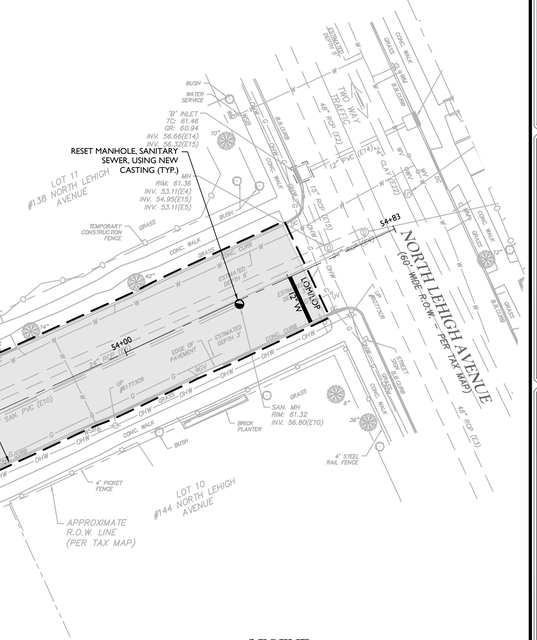
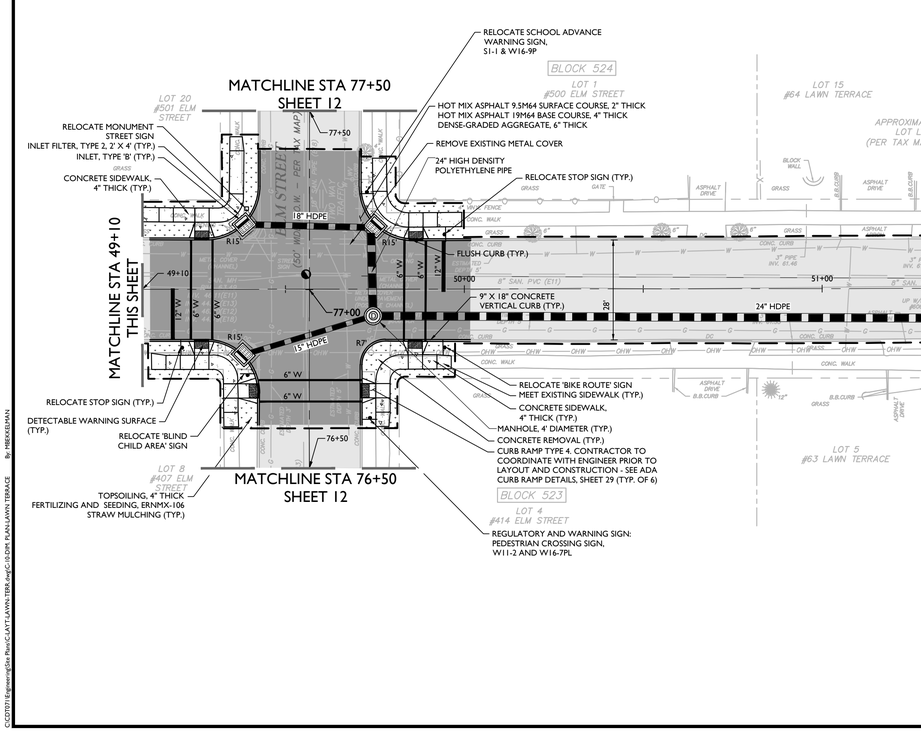
C:\CD071\Engineering\Site Plan\C-LAYT-STRA-TERR.dwg\C-DIM PLAN-STRATFORD TERRACE By: MBERKELMAN







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20 0 20 40

SCALE : 1" = 20'

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N.J. C.O.A. #: 24GA27986500

CONSTRUCTION PLANS FOR ELM STREET AREA DRAINAGE IMPROVEMENTS

TOWNSHIP OF CRANFORD
UNION COUNTY
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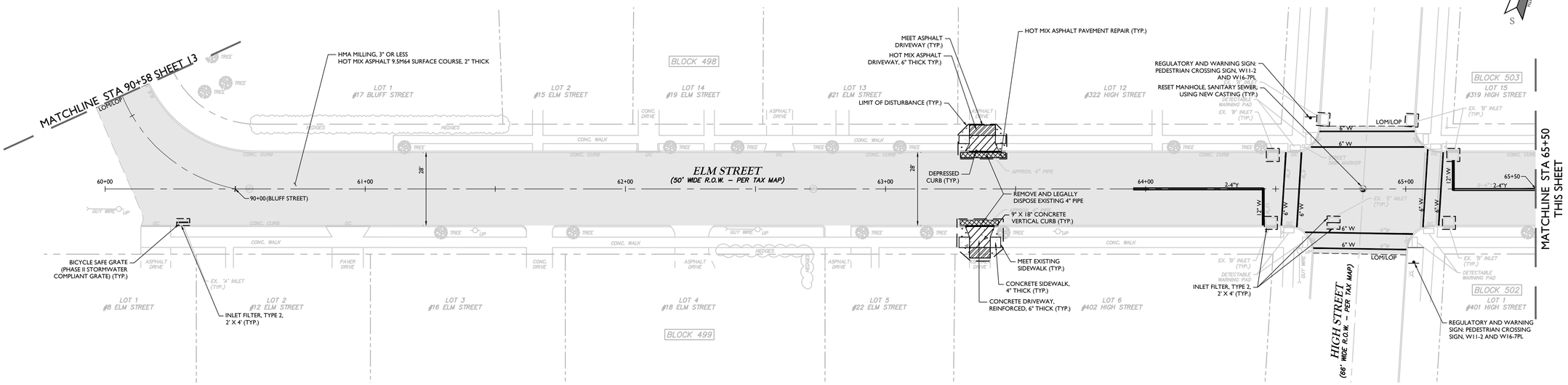
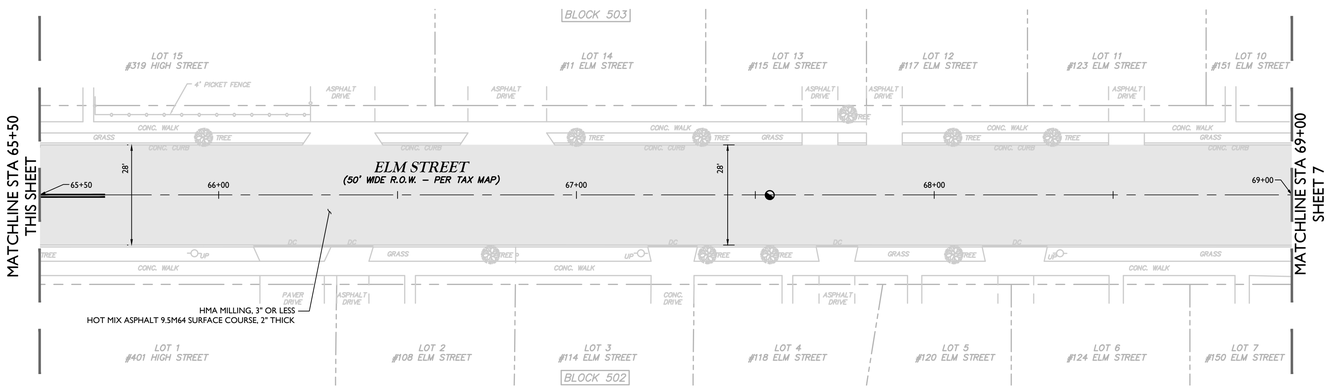
PROJECT NUMBER:	DRAWING NAME:
CDT071	C-LAYT-LAWN-TERR

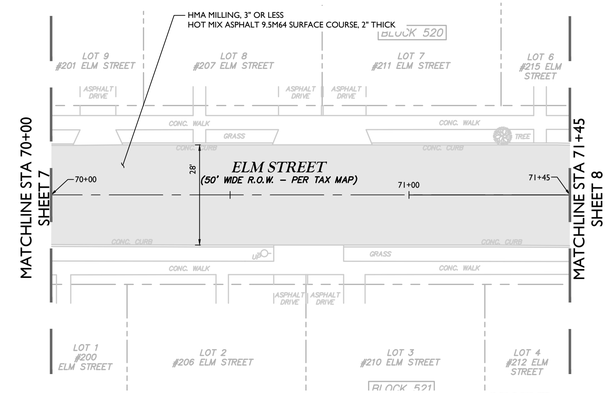
SHEET TITLE:
DIMENSION PLAN (LAWN TERRACE)

SHEET NUMBER:
10 of 43

By: MBERGEMAN
CCDT071\Engineering\Site Plans\C-LAYT-LAWN-TERR.dwg\C-10-DIM-PLAN-LAWN TERRACE







LEGEND

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- HOT MIX ASPHALT PAVEMENT REPAIR
- HOT MIX ASPHALT DRIVEWAY, 6" THICK
- CONCRETE DRIVEWAY, REINFORCED, 6" THICK
- CONCRETE SIDEWALK, 4" THICK
- RESTORATION USING TOPSOILING, 4" THICK FERTILIZING AND SEEDING, ERNMX-106 STRAW MULCHING

20 0 20 40

SCALE : 1" = 20'

NOTES:

1. ALL EXISTING FEATURES DEPICTED ON THIS PLAN WERE BASED ON AERIAL IMAGERY AND UTILITY MARKOUTS OBSERVED IN THE FIELD. ALL INFORMATION DEPICTED ON THE PLAN SHOULD BE VERIFIED IN THE FIELD BY THE CONTRACTOR. THE LOCATION OF ALL UNDERGROUND UTILITIES AS SHOWN HEREON ARE APPROXIMATE AND ARE BASED ON VISIBLE ABOVE GROUND STRUCTURES AND UTILITY MARK OUTS. NO EXCAVATIONS WERE MADE. ADDITIONAL BURIED UTILITIES/STRUCTURES MAY BE ENCOUNTERED. THE CONTRACTOR SHALL HAVE ALL UNDERGROUND UTILITIES FIELD VERIFIED BY THE PROPER UTILITY COMPANIES BEFORE ANY CONSTRUCTION BEGINS.
2. AFTER MILLING AND PRIOR TO PAVING, THE CONTRACTOR SHALL PROOF ROLL THE ROAD TO DETERMINE THE CONDITION OF THE BASE COURSE. SOFT SPOTS AND UNSUITABLE ROAD BASE SHALL BE REPAIRED. IF & WHERE DIRECTED BY THE ENGINEER, SAWCUT, REMOVE, REPLACE HMA AND AGGREGATE AS REQUIRED. CONSTRUCT NEW AGGREGATE AND BASE COURSE TO MEET EXISTING DEPTHS. SEE FULL DEPTH REPAIR DETAIL.

SOIL EROSION & SEDIMENT CONTROL PLAN

THIS PROJECT IS EXEMPT FROM SOIL COMPACTION TESTING AND REMEDIATION AS IT IS LOCATED IN AN URBAN REDEVELOPMENT AREA

C:\CDT071\Engineering\Site Plans\C-LAYT-ELM-STRT.dwg\C-11-ELM-ST By: MIBERKEEMAN

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CONSTRUCTION PLANS

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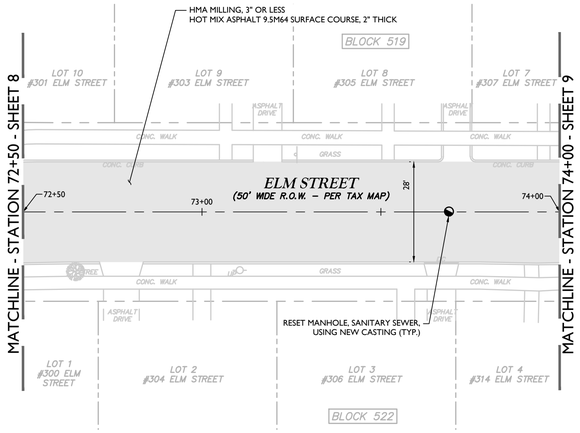
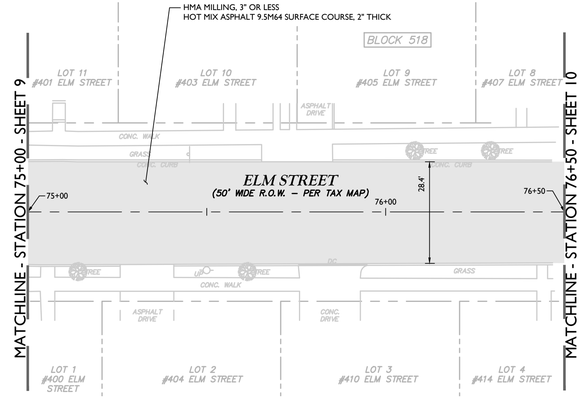
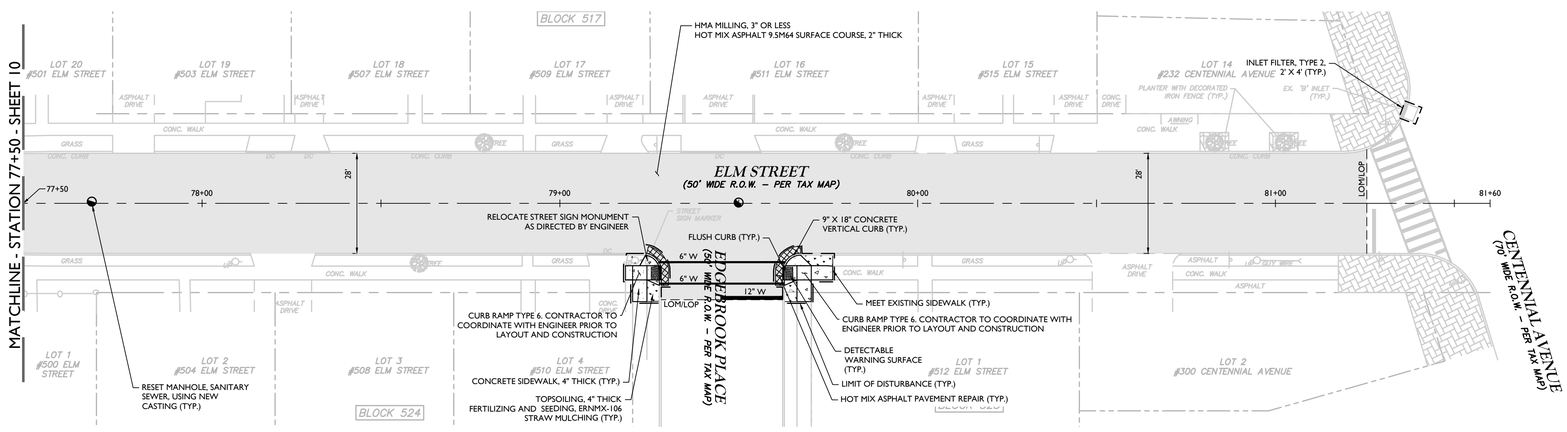
PROJECT NUMBER: CDT071
DRAWING NAME: C-LAYT-ELM-STRT

SHEET TITLE: DIMENSION PLAN (ELM STREET) (STA. 60+00 TO STA. 69+00) (STA. 70+00 TO STA. 71+45)

NOTE: DO NOT SCALE DRAWINGS FOR CONSTRUCTION.







LEGEND

- HMA MILLING, 3" OR LESS, AND INSTALLATION OF HOT MIX ASPHALT 9.5M64 SURFACE COURSE, 2" THICK
- HOT MIX ASPHALT PAVEMENT REPAIR
- HOT MIX ASPHALT DRIVEWAY, 6" THICK
- CONCRETE DRIVEWAY, REINFORCED, 6" THICK
- CONCRETE SIDEWALK, 4" THICK
- RESTORATION USING TOPSOILING, 4" THICK FERTILIZING AND SEEDING, ERNMX-106 STRAW MULCHING

20 0 20 40

SCALE : 1" = 20'

NOTES:

1. ALL EXISTING FEATURES DEPICTED ON THIS PLAN WERE BASED ON AERIAL IMAGERY AND UTILITY MARKOUTS OBSERVED IN THE FIELD. ALL INFORMATION DEPICTED ON THE PLAN SHOULD BE VERIFIED IN THE FIELD BY THE CONTRACTOR. THE LOCATION OF ALL UNDERGROUND UTILITIES AS SHOWN HEREON ARE APPROXIMATE AND ARE BASED ON VISIBLE ABOVE GROUND STRUCTURES AND UTILITY MARK OUTS. NO EXCAVATIONS WERE MADE. ADDITIONAL BURIED UTILITIES/STRUCTURES MAY BE ENCOUNTERED. THE CONTRACTOR SHALL HAVE ALL UNDERGROUND UTILITIES FIELD VERIFIED BY THE PROPER UTILITY COMPANIES BEFORE ANY CONSTRUCTION BEGINS.
2. AFTER MILLING AND PRIOR TO PAVING, THE CONTRACTOR SHALL PROOF ROLL THE ROAD TO DETERMINE THE CONDITION OF THE BASE COURSE. SOFT SPOTS AND UNSUITABLE ROAD BASE SHALL BE REPAIRED. IF & WHERE DIRECTED BY THE ENGINEER, SAWCUT, REMOVE, REPLACE HMA AND AGGREGATE AS REQUIRED. CONSTRUCT NEW AGGREGATE AND BASE COURSE TO MEET EXISTING DEPTHS. SEE FULL DEPTH REPAIR DETAIL.

SOIL EROSION & SEDIMENT CONTROL PLAN

THIS PROJECT IS EXEMPT FROM SOIL COMPACTION TESTING AND REMEDIATION AS IT IS LOCATED IN AN URBAN REDEVELOPMENT AREA

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REV	DATE	DRAWN BY	DESCRIPTION

Carl P. O'Brien
NEW JERSEY LICENSED PROFESSIONAL ENGINEER
LICENSE NUMBER: GE45154
COLLIERS ENGINEERING & DESIGN, INC.
N.J. C.O.A. #: 24GA27986500

CONSTRUCTION PLANS

FOR

ELM STREET AREA DRAINAGE IMPROVEMENTS

TOWNSHIP OF CRANFORD
UNION COUNTY
NEW JERSEY

Colliers Engineering & Design
MT. ARLINGTON
400 Valley Road, Suite 304
Mt. Arlington, NJ 07856
Phone: 973.398.3110
COLLIERS ENGINEERING & DESIGN, INC. DOING BUSINESS AS MASER CONSULTING

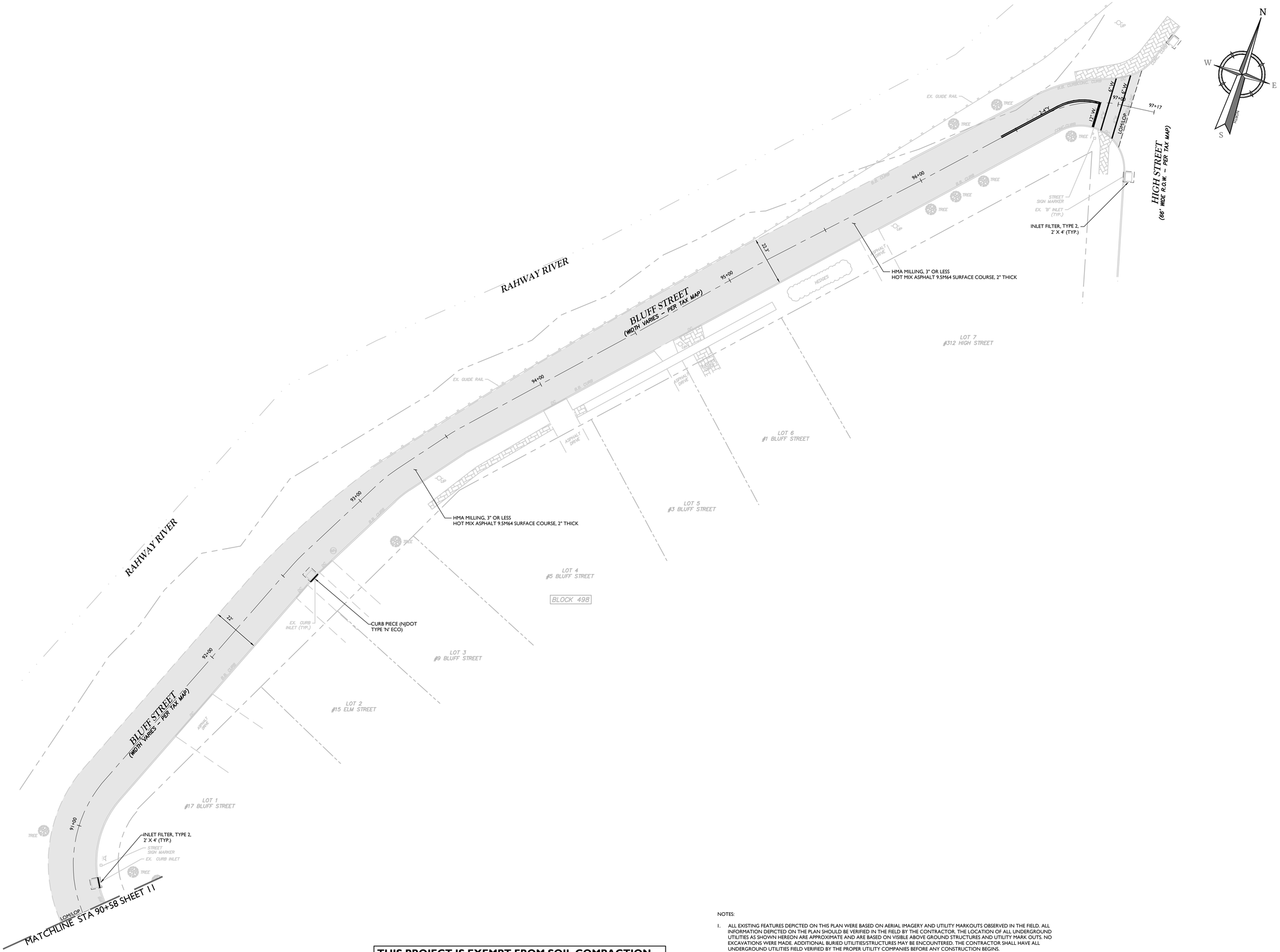
SCALE:	DATE:	DRAWN BY:	CHECKED BY:
AS SHOWN	12/23/20	MIB	PWJ

PROJECT NUMBER:	DRAWING NAME:
CDT071	C-LAYT-ELM-STRT

SHEET TITLE: DIMENSION PLAN (ELM STREET) (STA. 72+50 TO STA. 74+00) (STA. 75+00 TO STA. 76+50) (STA. 77+50 TO CENTENNIAL AVENUE)

NOTE: DO NOT SCALE DRAWINGS FOR CONSTRUCTION.

CCDT071\Engineering\Site Plans\C-LAYT-ELM-STRT.dwg\C-12-ELM-ST By: PWEBKEEMAN



SOIL EROSION & SEDIMENT CONTROL PLAN

THIS PROJECT IS EXEMPT FROM SOIL COMPACTION TESTING AND REMEDIATION AS IT IS LOCATED IN AN URBAN REDEVELOPMENT AREA

NOTES:

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20 0 20 40

SCALE : 1" = 20'

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REV	DATE	DRAWN BY	DESCRIPTION
-	-	-	-

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CONSTRUCTION PLANS

FOR

ELM STREET AREA DRAINAGE IMPROVEMENTS

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SCALE:	DATE:	DRAWN BY:	CHECKED BY:
AS SHOWN	12/23/20	MIB	PWJ

PROJECT NUMBER:	DRAWING NAME:
CDT071	C-LAYT-ELM-STRT

SHEET TITLE:
DIMENSION PLAN
ALTERNATE A
(BLUFF STREET)

SHEET NUMBER:
13 of 43

NOTE: DO NOT SCALE DRAWINGS FOR CONSTRUCTION.

C:\CDT071\Engineering\Site Plans\C-LAYT-ELM-STRT.dwg\C-13-DIMENSION ALT A By: MIBENKESMAN