

SECTOR 5 DUNE RESTORATION PROJECT CONSTRUCTION PLANS

INDIAN RIVER COUNTY, FLORIDA

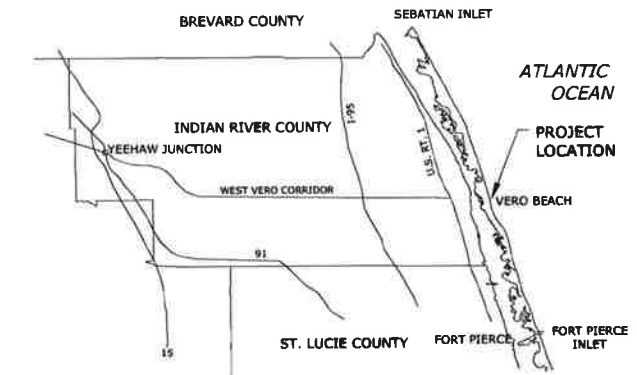


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- 3-15 PLAN VIEW
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PLAN VIEW LEGEND

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- MEAN HIGH WATER LINE 2019-FDEP NO. 7174
- PROJECT BASELINE
- 2020 DUNE FILL PLACEMENT
- CONSTRUCTION ACCESS
- 2017 HARDBOTTOM
- DUNE VEGETATION AREA



CERTIFICATION:
I CERTIFY THAT THESE PLANS ARE IN COMPLIANCE WITH THE APPLICABLE SECTIONS OF § 649.49, F.A.C.

10/4/21
DATE

NICOLE S. SHARP P.E. NO. 74708

APTIM ENVIRONMENTAL & INFRASTRUCTURE, LLC
PH: (861) 391-8102
FAX: (861) 391-8116
C.O.A. FL #2537
C.O.A. LA #2531

6401 CONGRESS AVENUE, SUITE 140
BOCA RATON, FLORIDA 33484
www.APTIM.com

REVISIONS	No.	Date	Description

Designed by: NS	Checked by: NS	Comm. No.: 631015993
Drawn by: JEB	Reviewed by: NS	AS NOTED
Date: 09/15/21	Submitted by: NS	
Proj. Scale: AS NOTED		

SECTOR 5
DUNE RESTORATION PROJECT
CONSTRUCTION PLANS
INDIAN RIVER COUNTY, FLORIDA
COVER SHEET

DRAWING NO.
C-1

SHEET 1 OF 16



- NOTES:**
1. COORDINATES ARE IN FEET BASED ON FLORIDA STATE PLANE COORDINATE SYSTEM, EAST ZONE, NORTH AMERICAN DATUM 1983, (NAD83).
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 5. SITE SPECIFIC FIELD ADJUSTMENTS TO THE PLANTING AREAS MAY BE NECESSARY AT LOCATIONS SUCH AS PIERS, OUTFALLS, BEACH ACCESS POINTS AND DUNE OVERWALKS.



CERTIFICATION:
 I CERTIFY THAT THESE PLANS ARE IN COMPLIANCE WITH THE APPLICABLE SECTIONS OF 62B-41, F.A.C.

NICOLE S. SHARP P.E. NO. 4708
 DATE 10/4/21

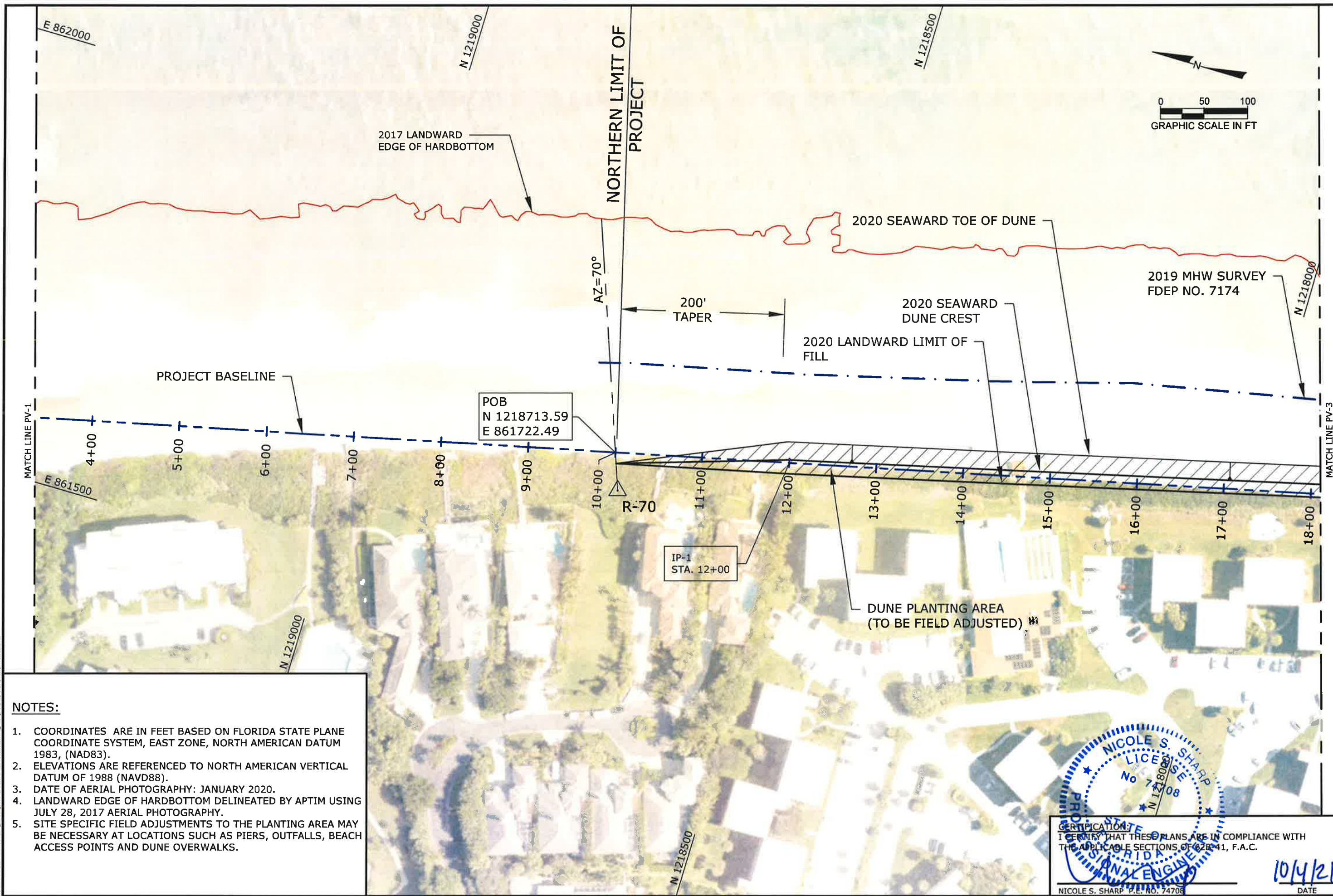
APTIM ENVIRONMENTAL & INFRASTRUCTURE, LLC
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SECTOR 5
 DUNE RESTORATION PROJECT
 CONSTRUCTION PLANS
 INDIAN RIVER COUNTY, FLORIDA
 PLAN VIEW

DRAWING NO.
PV-1
 SHEET 3 OF 16



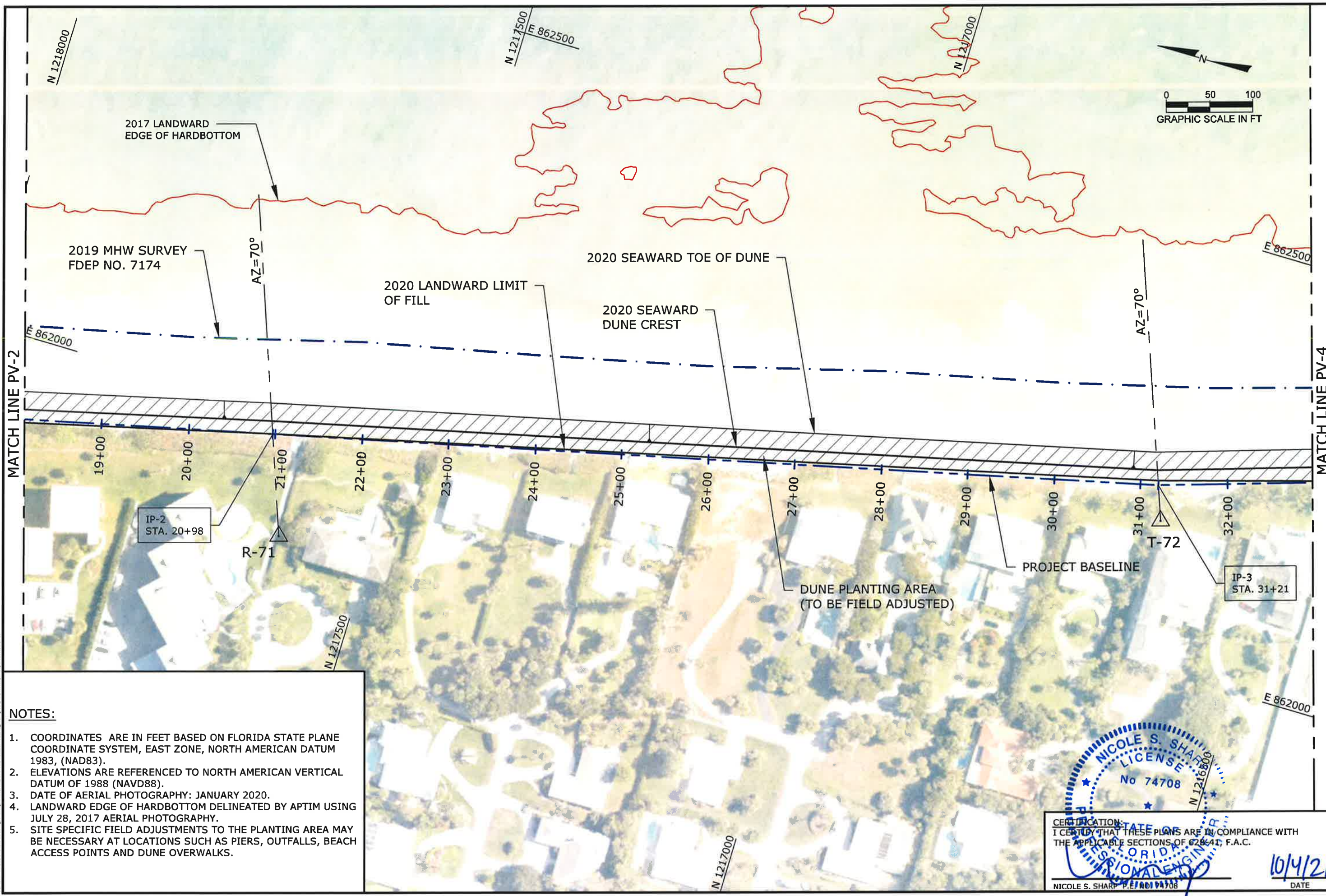
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DATE 10/4/21

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<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="width: 5%;">No.</th> <th style="width: 15%;">Date</th> <th style="width: 80%;">Description</th> </tr> </thead> <tbody> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> </tbody> </table>	No.	Date	Description													<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 25%;">Designed by:</td> <td>NS</td> </tr> <tr> <td>Drawn by:</td> <td>JEB</td> </tr> <tr> <td>Date:</td> <td>09/15/21</td> </tr> <tr> <td>Proj. Scale:</td> <td>AS NOTED</td> </tr> <tr> <td>Comm. No.:</td> <td>631015993</td> </tr> </table>	Designed by:	NS	Drawn by:	JEB	Date:	09/15/21	Proj. Scale:	AS NOTED	Comm. No.:	631015993
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PV-2																										
SHEET 4 OF 16																										



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NICOLE S. SHARP, P.E. #74708

CERTIFICATION:
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10/4/21
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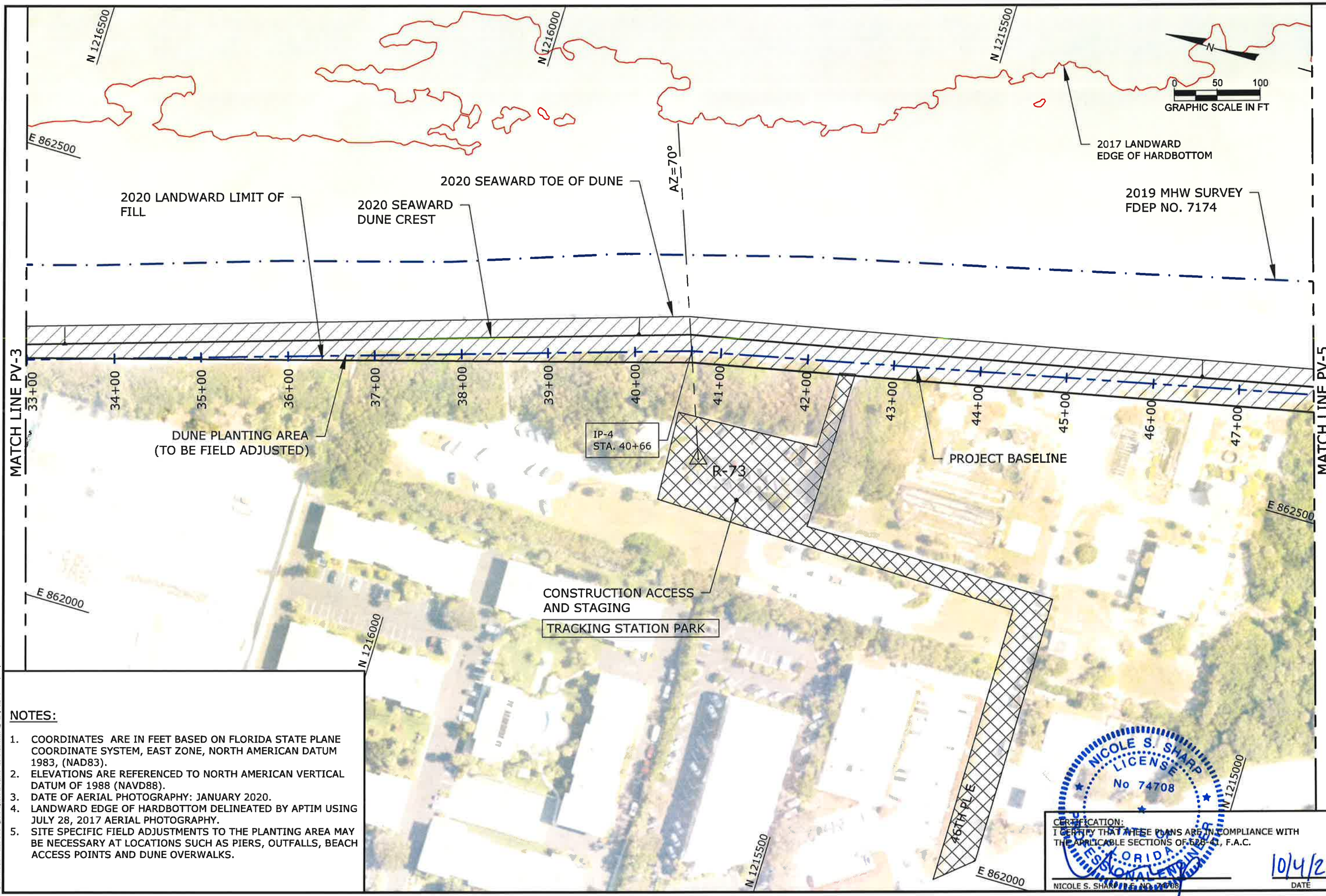
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SECTOR 5
 DUNE RESTORATION PROJECT
 CONSTRUCTION PLANS
 INDIAN RIVER COUNTY, FLORIDA
 PLAN VIEW

DRAWING NO. **PV-3**

SHEET 5 OF 16



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NICOLE S. SHARP
 LICENSE
 No 74708
 STATE OF FLORIDA
 PROFESSIONAL ENGINEER

CERTIFICATION:
 I CERTIFY THAT THESE PLANS ARE IN COMPLIANCE WITH
 THE APPLICABLE SECTIONS OF 625.01, F.A.C.

DATE: 10/4/21

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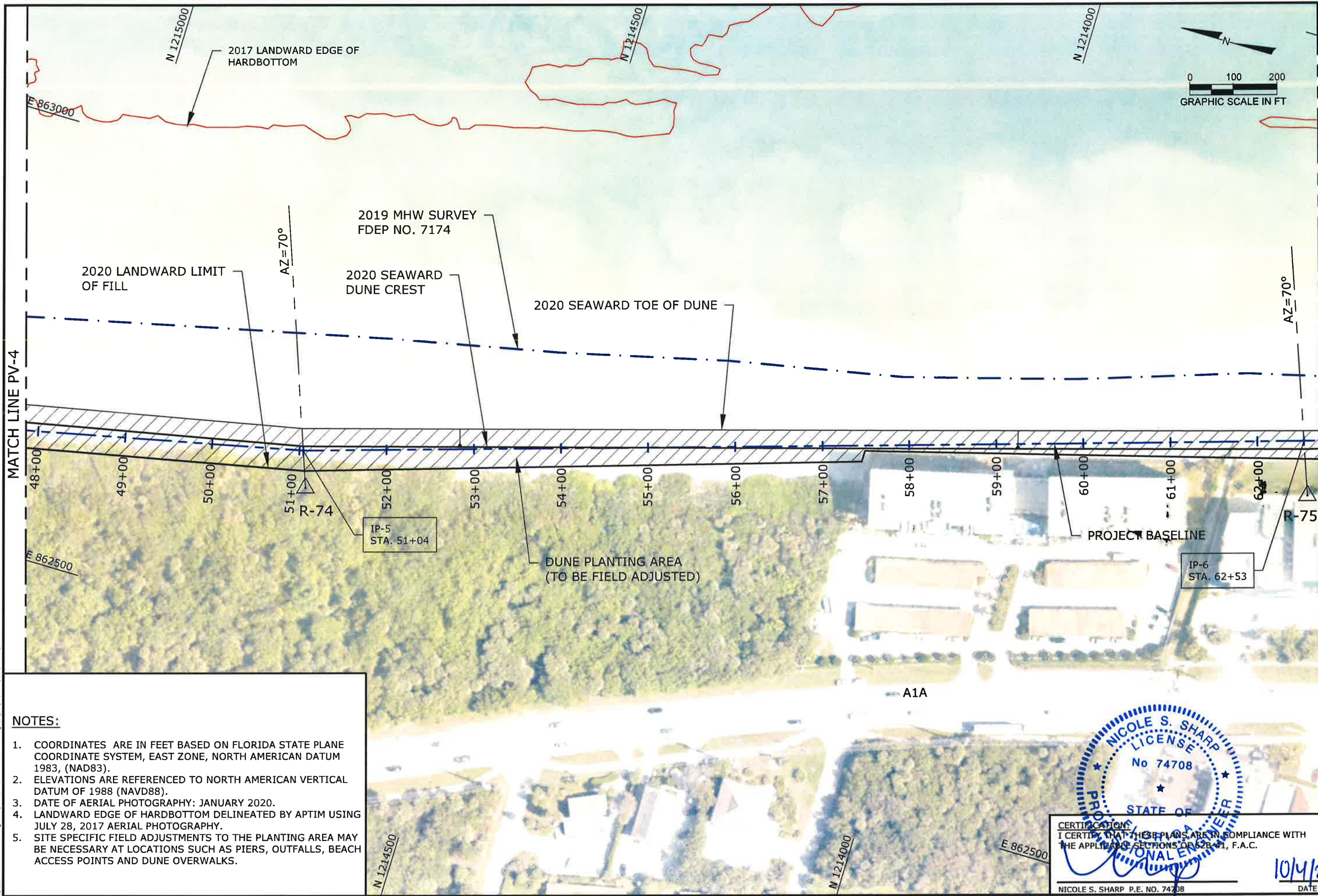
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SECTOR 5
 DUNE RESTORATION PROJECT
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 INDIAN RIVER COUNTY, FLORIDA
 PLAN VIEW

DRAWING NO. **PV-4**

SHEET 6 OF 16



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NICOLE S. SHARP P.E. NO. 74708

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10/4/21
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SECTOR 5
 DUNE RESTORATION PROJECT
 CONSTRUCTION PLANS
 INDIAN RIVER COUNTY, FLORIDA
 PLAN VIEW

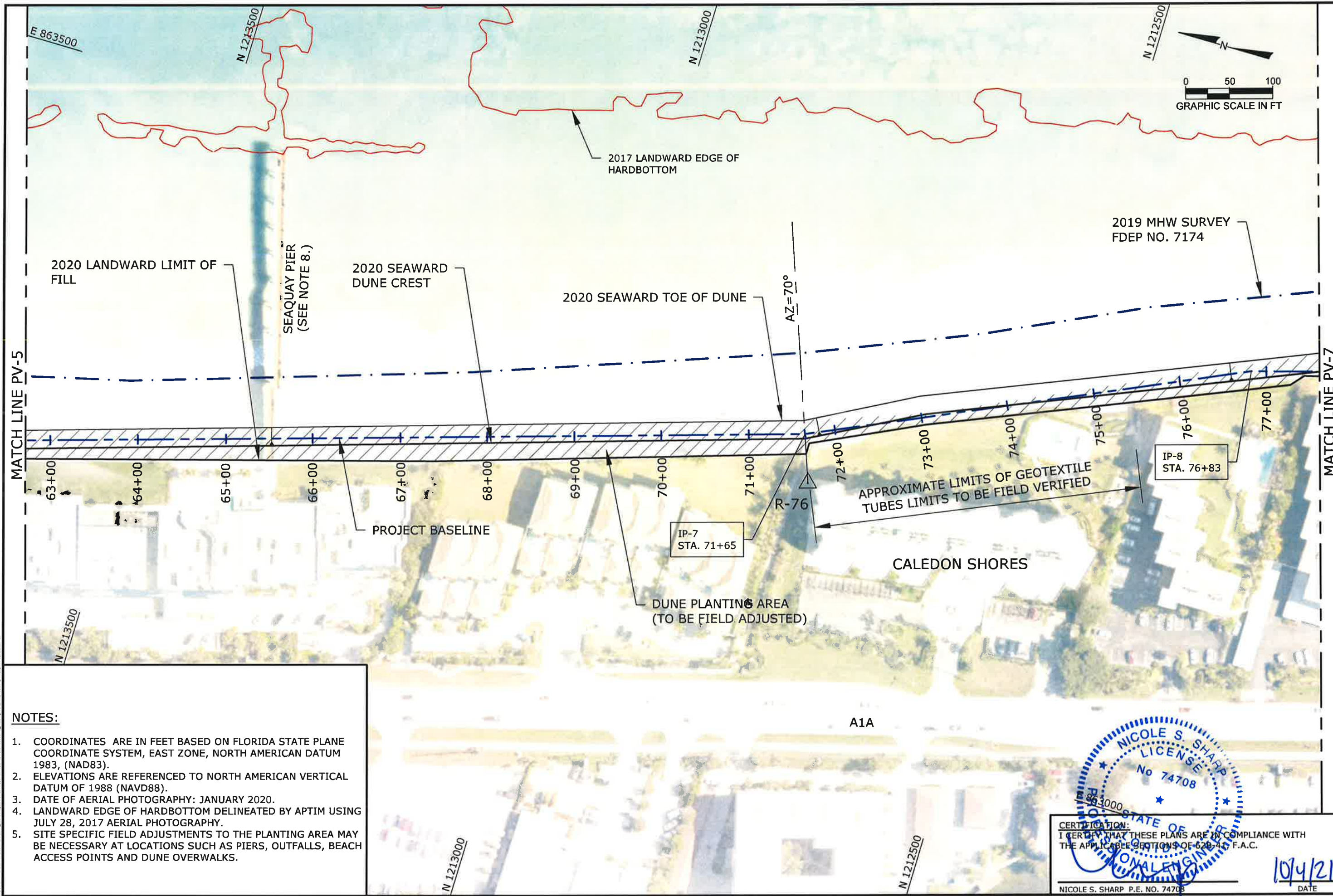
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Reviewed by:	Drawn by:	
NS	JEB	
Submitted by:	Date:	
NS	09/15/21	
Comm. No.:	Proj. No.:	
631015993	AS NOTED	

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DRAWING NO.
 PV-5
SHEET 7 OF 16

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 C.O.A. #L#9317
 C.O.A. #L#9331



- NOTES:**
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CERTIFICATION:
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NICOLE S. SHARP P.E. NO. 74708

10/4/21
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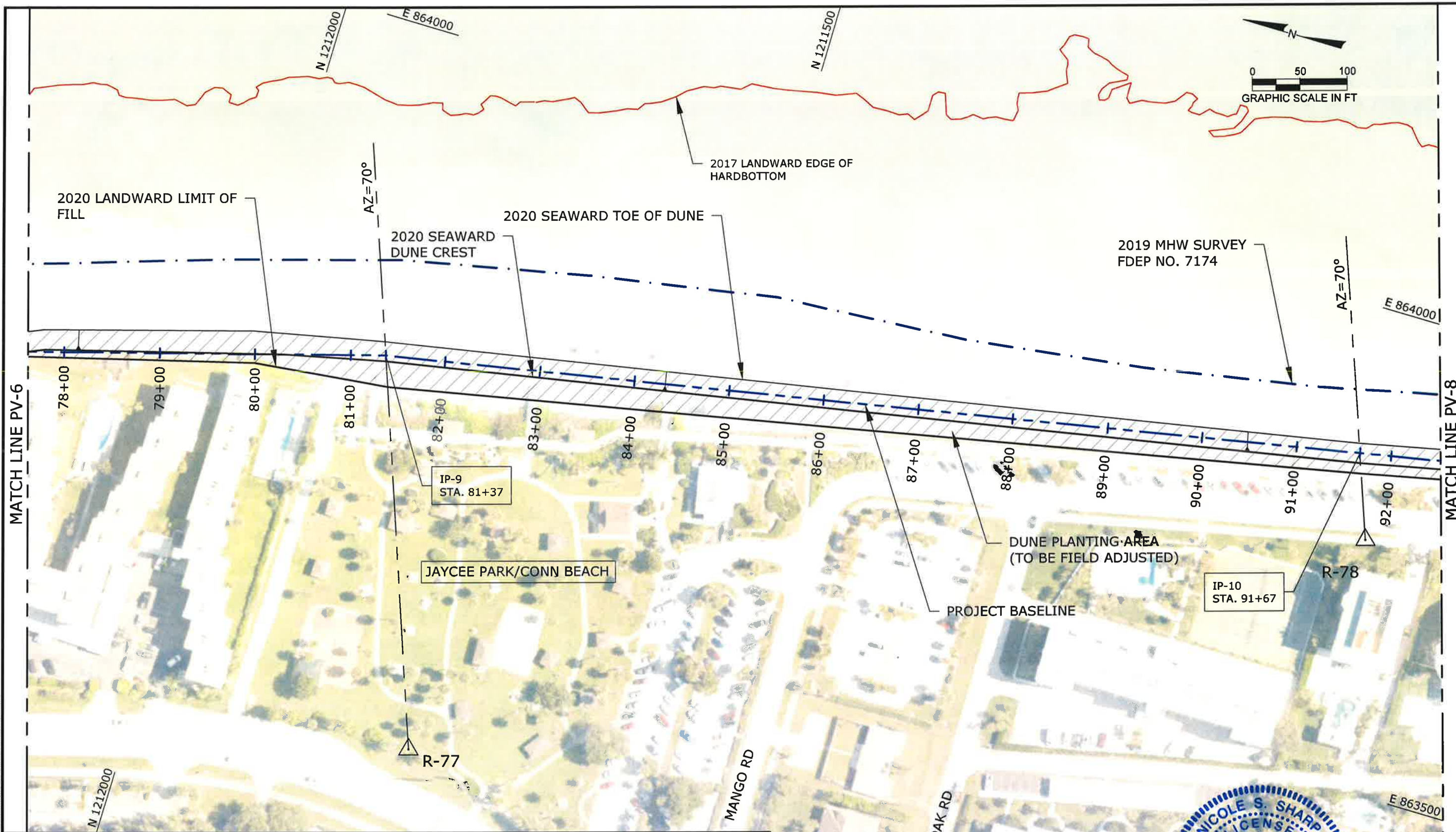
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	NS	NS
	Drawn by:	Reviewed by:
	JEB	NS
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	09/15/21	NS
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	AS NOTED	631015993

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SECTOR 5
 DUNE RESTORATION PROJECT
 CONSTRUCTION PLANS
 INDIAN RIVER COUNTY, FLORIDA
 PLAN VIEW

DRAWING NO.
PV-6

SHEET 8 OF 16



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NICOLE S. SHARP
 LICENSE
 No 74708
 PROFESSIONAL ENGINEER
 STATE OF FLORIDA

CERTIFICATION STATE OF FLORIDA
 I CERTIFY THAT THESE PLANS ARE IN COMPLIANCE WITH
 THE APPLICABLE SECTIONS OF 620-43, F.A.C.

DATE 10/4/21

NICOLE S. SHARP P.E. NO. 74708

APTIM ENVIRONMENTAL & INFRASTRUCTURE, LLC

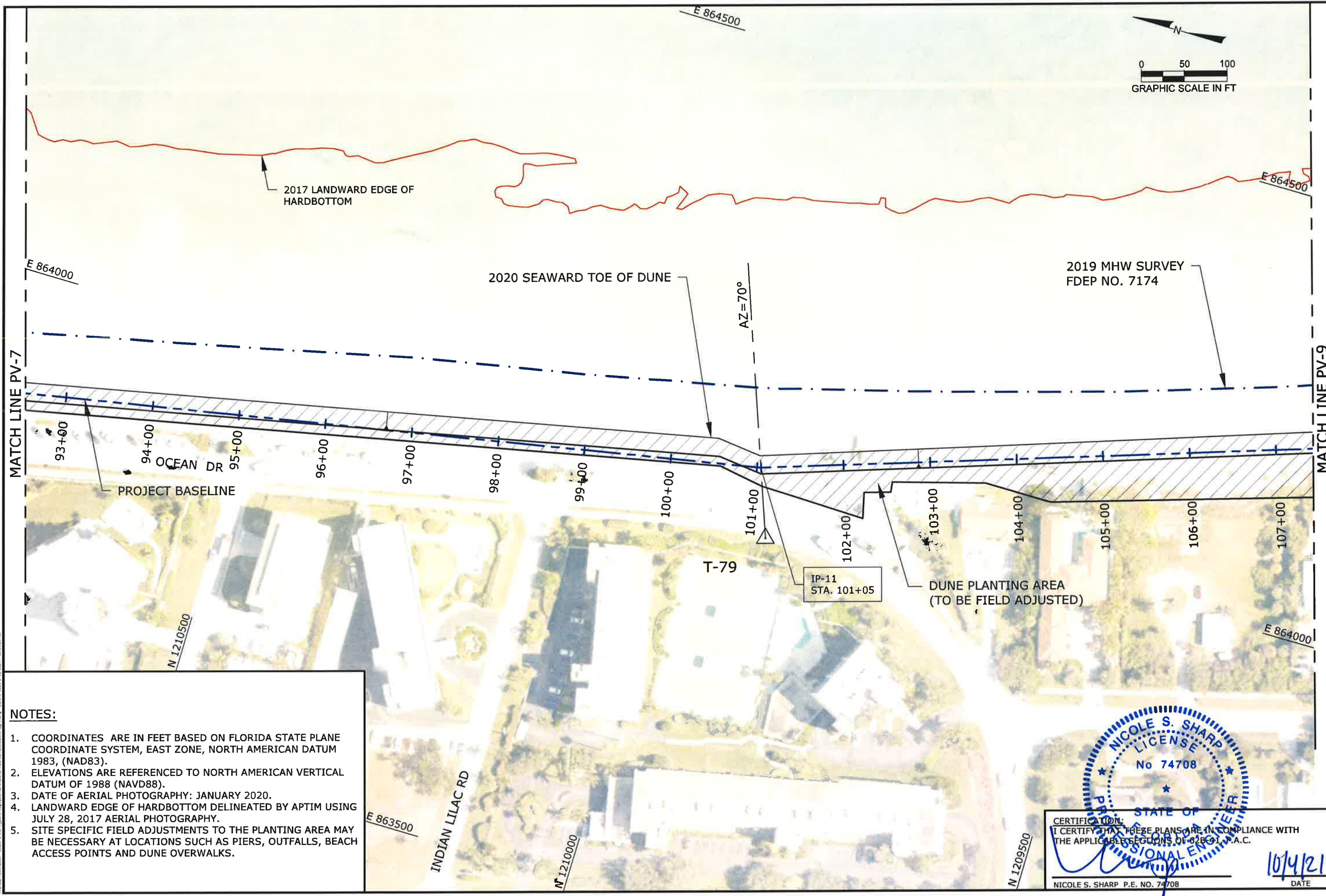
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SECTOR 5
 DUNE RESTORATION PROJECT
 CONSTRUCTION PLANS
 INDIAN RIVER COUNTY, FLORIDA
 PLAN VIEW

DRAWING NO.
PV-7
 SHEET 9 OF 16



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SECTOR 5

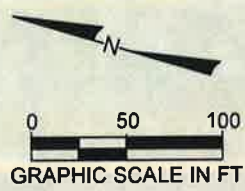
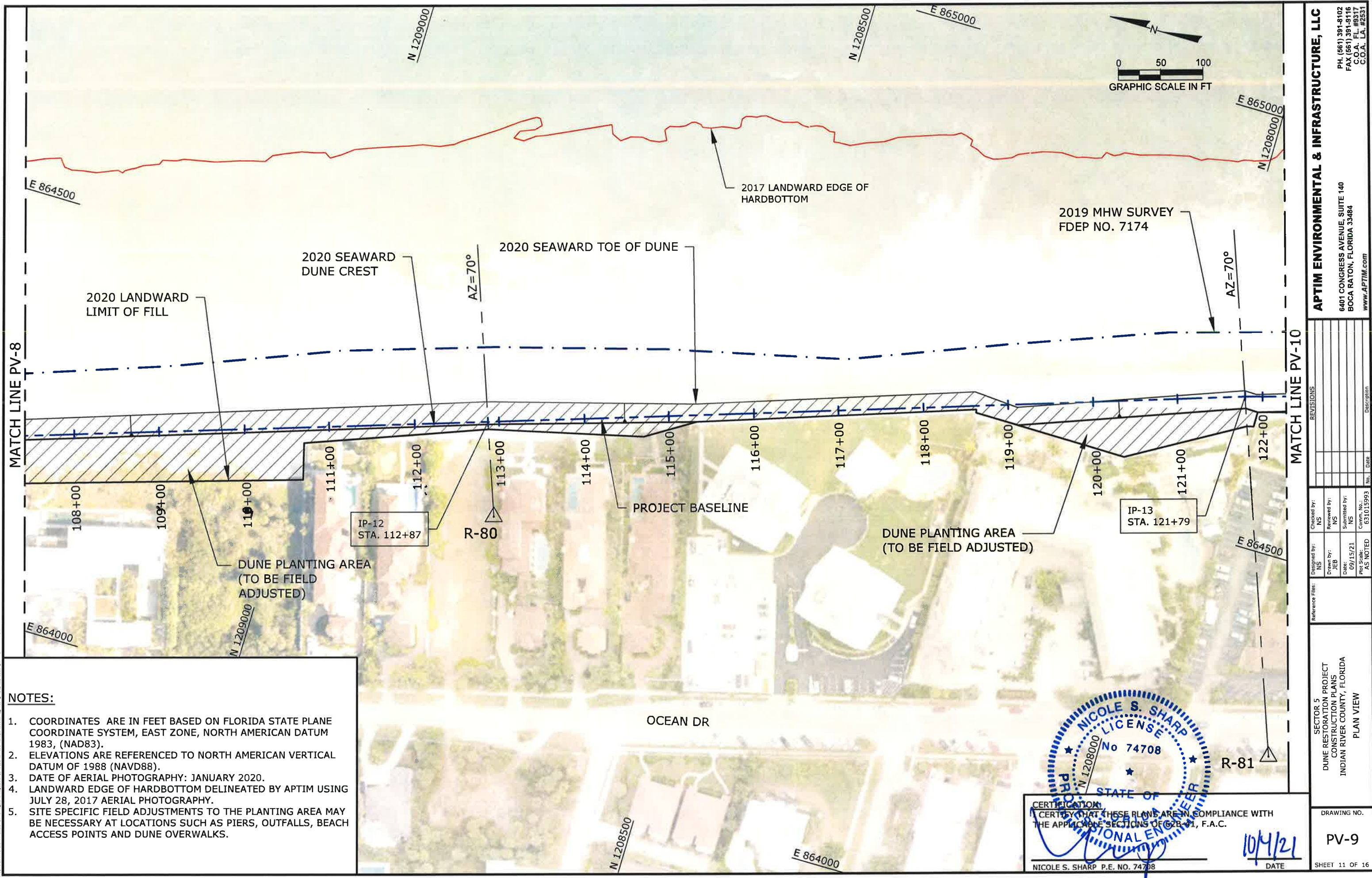
DUNE RESTORATION PROJECT
CONSTRUCTION PLANS
INDIAN RIVER COUNTY, FLORIDA
PLAN VIEW

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 BOCA RATON, FLORIDA 33484
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DRAWING NO.
PV-8
 SHEET 10 OF 16



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CERTIFICATION
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NICOLE S. SHARP
 LICENSE No 74708
 PROFESSIONAL ENGINEER
 STATE OF FLORIDA

10/4/21
 DATE

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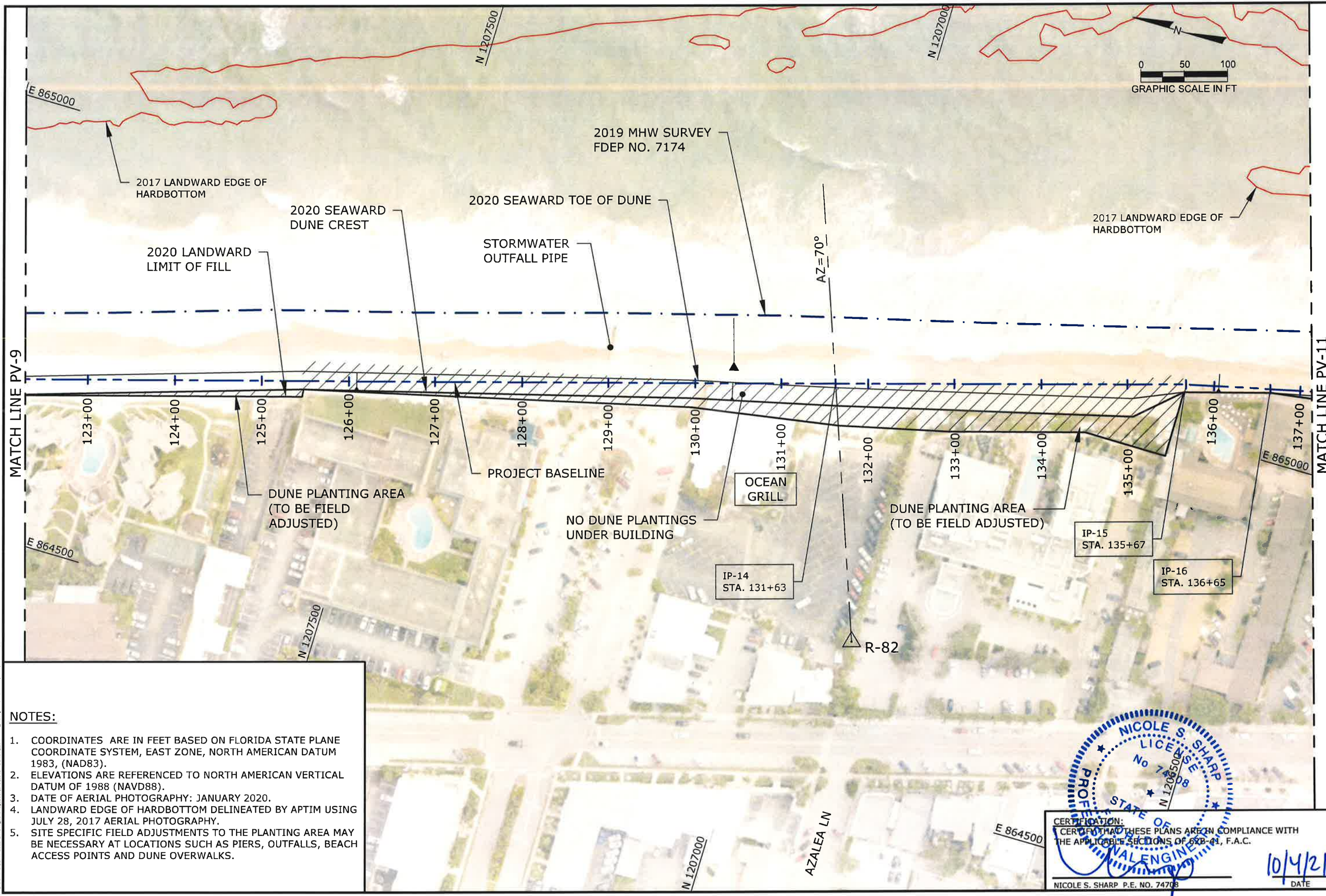
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SECTOR 5
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 INDIAN RIVER COUNTY, FLORIDA
 PLAN VIEW

DRAWING NO.
PV-9
 SHEET 11 OF 16



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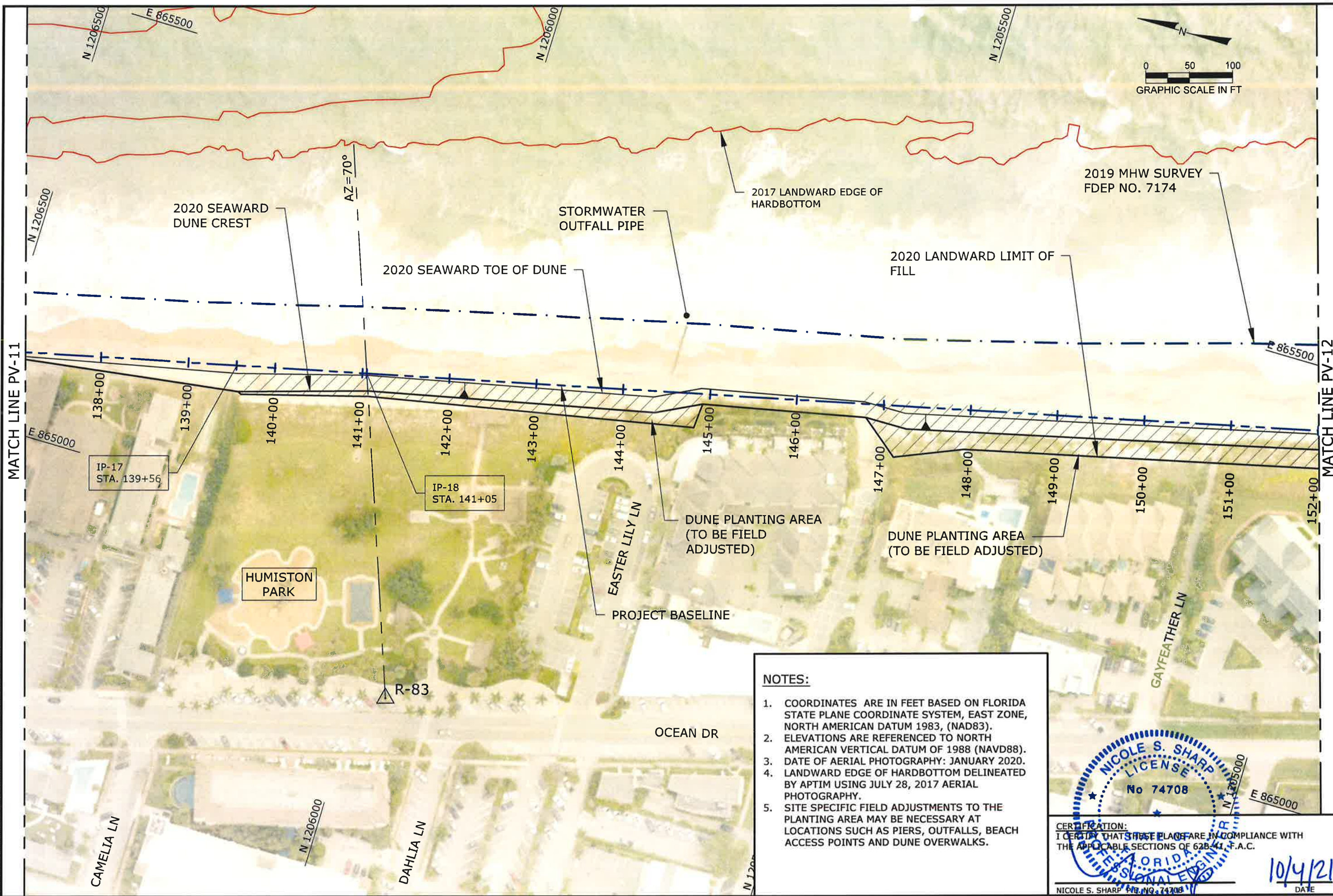
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SECTOR 5
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 INDIAN RIVER COUNTY, FLORIDA
 PLAN VIEW

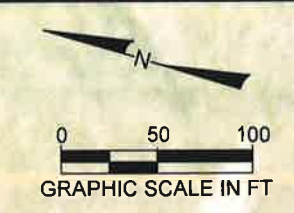
DRAWING NO.
PV-10

SHEET 12 OF 16



MATCH LINE PV-11

MATCH LINE PV-12



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NICOLE S. SHARP
 LICENSE
 No 74708
 PROFESSIONAL ENGINEER

DATE: 10/4/21

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REVISIONS	No.	DATE	DESCRIPTION
1	1/2/21		REVISED CONSTRUCTION ACCESS PER COUNTY COMMENTS

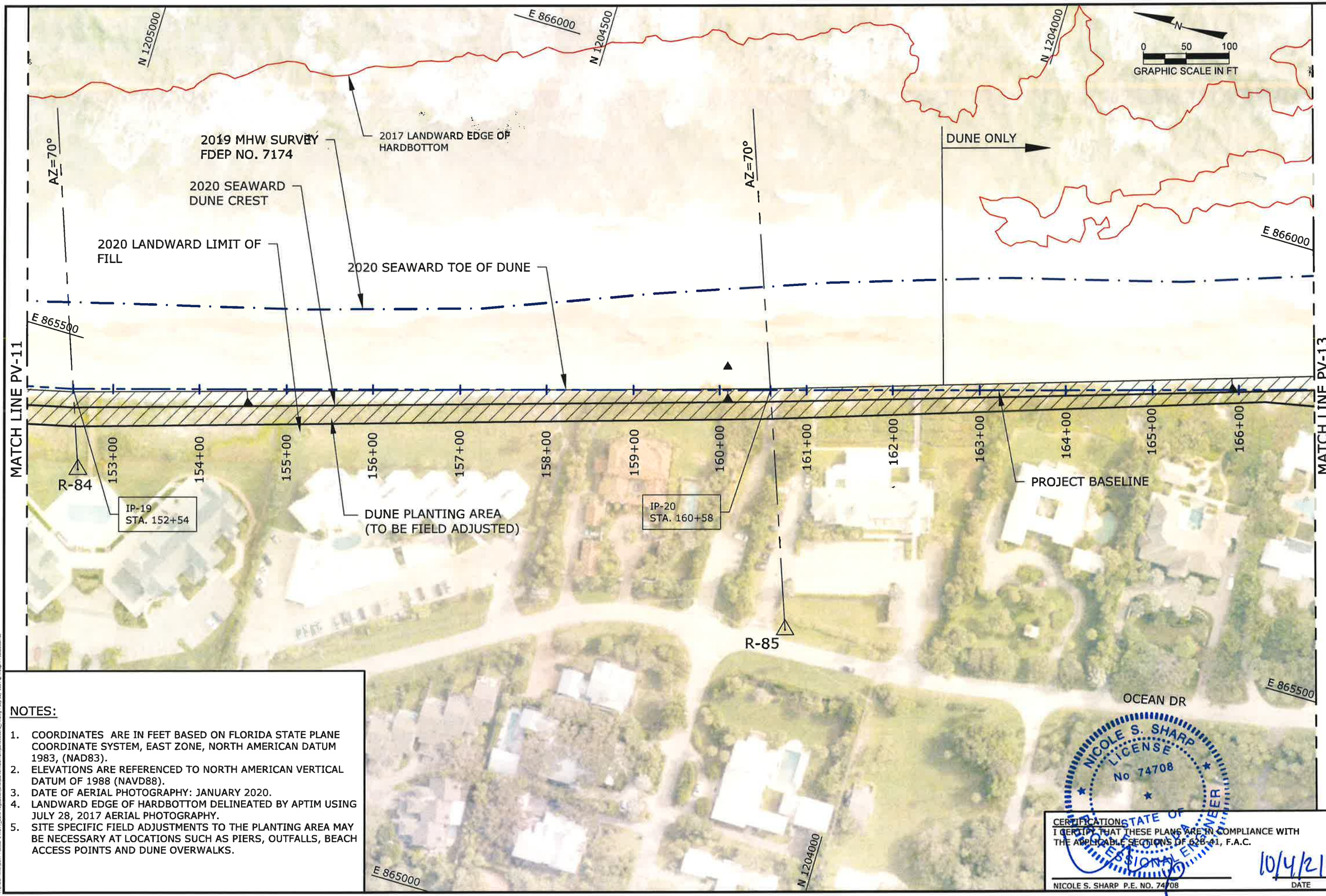
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 INDIAN RIVER COUNTY, FLORIDA
 PLAN VIEW

DRAWING NO.
PV-11

SHEET 13 OF 16



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OCEAN DR

NICOLE S. SHARP
LICENSE
No 74708

STATE OF FLORIDA
PROFESSIONAL ENGINEER

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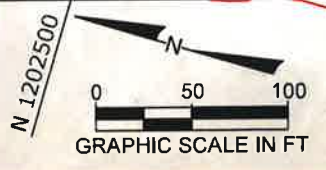
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PLAN VIEW

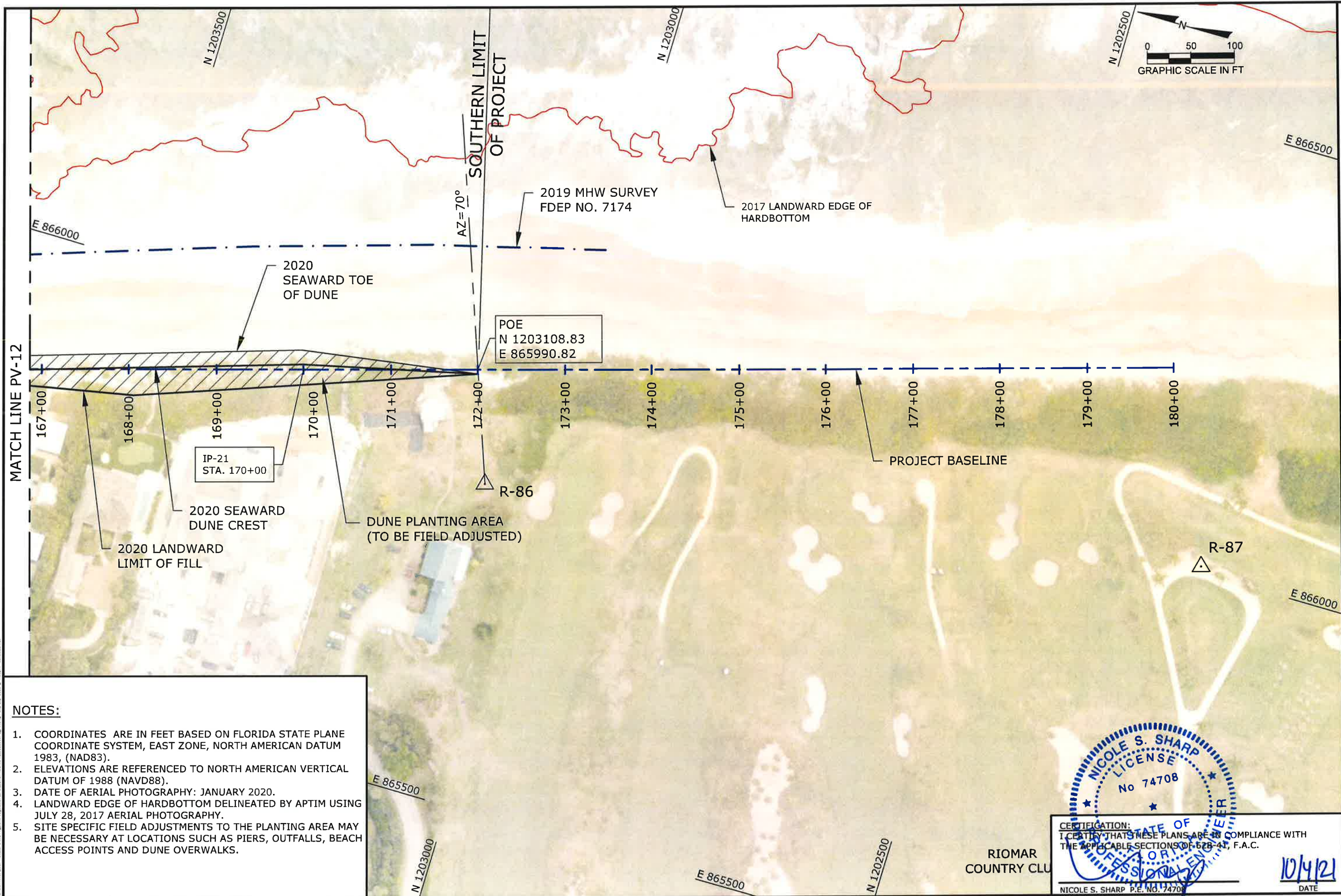
DRAWING NO.	SHEET 14 OF 16
PV-12	

MATCH LINE PV-12



PH: (561) 391-8102
 FAX: (561) 391-9116
 C.O.A. FL #9317
 C.O.A. LA #2531

APTIM ENVIRONMENTAL & INFRASTRUCTURE, LLC
 6401 CONGRESS AVENUE, SUITE 140
 BOCA RATON, FLORIDA 33484
 www.APTIM.com



NOTES:

1. COORDINATES ARE IN FEET BASED ON FLORIDA STATE PLANE COORDINATE SYSTEM, EAST ZONE, NORTH AMERICAN DATUM 1983, (NAD83).
2. ELEVATIONS ARE REFERENCED TO NORTH AMERICAN VERTICAL DATUM OF 1988 (NAVD88).
3. DATE OF AERIAL PHOTOGRAPHY: JANUARY 2020.
4. LANDWARD EDGE OF HARDBOTTOM DELINEATED BY APTIM USING JULY 28, 2017 AERIAL PHOTOGRAPHY.
5. SITE SPECIFIC FIELD ADJUSTMENTS TO THE PLANTING AREA MAY BE NECESSARY AT LOCATIONS SUCH AS PIERS, OUTFALLS, BEACH ACCESS POINTS AND DUNE OVERWALKS.

REVISIONS	No.	Date	Description

Designed by:	NS	Checked by:	NS
Drawn by:	JEB	Reviewed by:	NS
Date:	09/15/21	Submitted by:	NS
Plot Scale:	AS NOTED	Comm. No.:	631015993

SECTOR 5
 DUNE RESTORATION PROJECT
 CONSTRUCTION PLANS
 INDIAN RIVER COUNTY, FLORIDA
 PLAN VIEW

DRAWING NO.
PV-13
 SHEET 15 OF 16

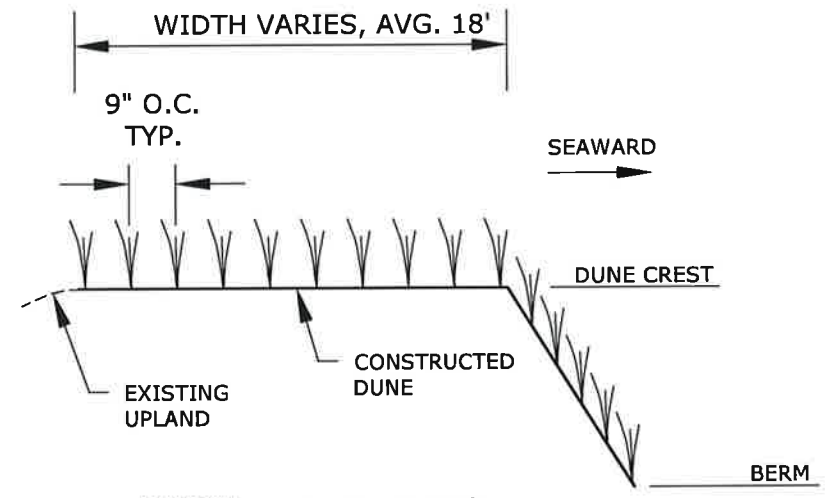
CERTIFICATION:
 I CERTIFY THAT THESE PLANS ARE IN COMPLIANCE WITH THE APPLICABLE SECTIONS OF 62B-41, F.A.C.

NICOLE S. SHARP
 LICENSE No 74708
 PROFESSIONAL ENGINEER

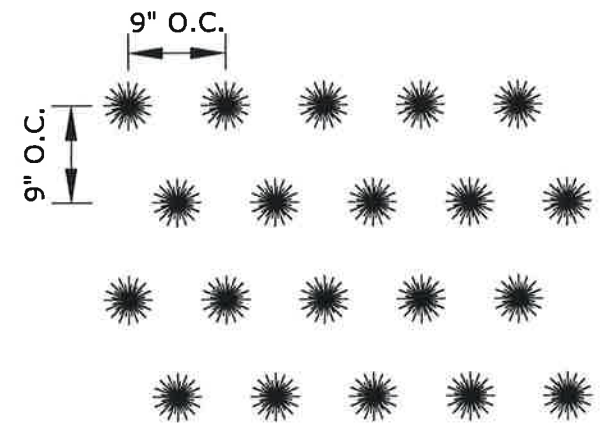
NICOLE S. SHARP P.E. NO. 74708
 DATE **10/4/21**

RIOMAR COUNTRY CLUB

PLANTING DETAIL				
PLANT TYPE	SCIENTIFIC NAME	QUANTITY	SIZE (MIN.)	SPACING
SEA OATS	UNIOLA PANICULATA	130,000	1" LINER	9" O.C.
SEA OATS	UNIOLA PANICULATA	5,000	1" GALLON	9" O.C.



TYPICAL DUNE PLANTING
CROSS SECTION
NOT TO SCALE

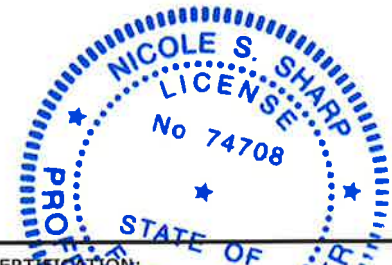


TYPICAL DUNE PLANTING
STAGGERED LAYOUT
NOT TO SCALE

NOTES:

- CONTRACTOR SHALL FIELD LOCATE DUNE AREA PRIOR TO PLANTING. TEMPORARY STAKES DENOTING SEAWARD LIMITS SHALL BE PROVIDED. OBTAIN APPROVAL OF LOCATION FROM COUNTY OR ENGINEER PRIOR TO PLANTING.
- PLANTS SHALL BE INSTALLED FOLLOWING GOOD HORTICULTURE PRACTICES WITH A SLOW RELEASE FERTILIZER IN EACH HOLE.
- CONTRACTOR SHALL PROVIDE WATERING. CONTRACTOR SHALL COORDINATE WITH COUNTY REGARDING USE OF LOCAL COUNTY SOURCES, OTHERWISE CONTRACTOR SHALL PROVIDE WATER. CONTRACTOR SHALL PROVIDE SUPPLEMENTAL WATERING AS NEEDED FOR 90 DAYS DEPENDING ON RAINFALL.
- CONTRACTOR SHALL WARRANTY PLANTS AT THE FOLLOWING SCHEDULE:

0-14 DAYS	100% SURVIVING
14-30 DAYS	80% SURVIVING
30-90 DAYS	80% SURVIVING
- CONTRACTOR SHALL MONITOR PLANTING MONTHLY FOR 3 MONTHS. AT THE END OF 3 MONTHS, A SUMMARY REPORT OF SURVIVAL AND RECOMMENDATION FOR MAINTENANCE SHALL BE PROVIDED TO COUNTY.
- ALL DUNE VEGETATION WORK SHALL BE IN COMPLIANCE WITH ALL FDEP PERMIT REQUIREMENTS.
- NO EXISTING VEGETATION TO BE REMOVED.



CERTIFICATION:
I CERTIFY THAT THESE PLANS ARE IN COMPLIANCE WITH THE APPLICABLE SECTIONS OF 82B-41, F.A.C.

NICOLE S. SHARP P.E. NO. 74708

10/4/21
DATE

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 BOCA RATON, FLORIDA 33484
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REVISIONS	BID ADDENDUM #1	Description	No.	Date
1	10/2/21			

Checked by:	NS	Reviewed by:	NS	Submitted by:	NS	Comm. No.:	631015993
Designed by:	NS	Drawn by:	JEB	Date:	09/15/21	Plot Scale:	AS NOTED

SECTOR 5
 DUNE RESTORATION PROJECT
 CONSTRUCTION PLANS
 INDIAN RIVER COUNTY, FLORIDA
 DUNE PLANTING DETAILS

DRAWING NO.

D-1

SHEET 16 OF 16

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