

FLOOD INSURANCE STUDY

FEDERAL EMERGENCY MANAGEMENT AGENCY

VOLUME 4 OF 8



PINELLAS COUNTY, FLORIDA AND INCORPORATED AREAS

COMMUNITY NAME	NUMBER	COMMUNITY NAME	NUMBER
BELLEAIR, TOWN OF	125088	REDINGTON SHORES, TOWN OF	125141
BELLEAIR BEACH, CITY OF	125089	SAFETY HARBOR, CITY OF	125143
BELLEAIR BLUFFS, CITY OF	120239	SEMINOLE, CITY OF	120257
BELLEAIR SHORE, TOWN OF	125090	SOUTH PASADENA, CITY OF	125151
CLEARWATER, CITY OF	125096	ST. PETE BEACH, CITY OF	125149
DUNEDIN, CITY OF	125103	ST. PETERSBURG, CITY OF	125148
GULFPORT, CITY OF	125108	TARPON SPRINGS, CITY OF	120259
INDIAN ROCKS BEACH, CITY OF	125117	TREASURE ISLAND, CITY OF	125153
INDIAN SHORES, TOWN OF	125118		
KENNETH CITY, TOWN OF	120245		
LARGO, CITY OF	125122		
MADEIRA BEACH, CITY OF	125127		
NORTH REDINGTON BEACH, TOWN OF	125133		
OLDSMAR, CITY OF	120250		
PINELLAS COUNTY, UNINCORPORATED AREAS	125139		
PINELLAS PARK, CITY OF	120251		
REDINGTON BEACH, TOWN OF	125140		

**REVISED:
AUGUST 24, 2021**

FLOOD INSURANCE STUDY NUMBER
12103CV004D
Version Number 2.4.3.2



FEMA

TABLE OF CONTENTS

Volume 1

	<u>Page</u>
SECTION 1.0 – INTRODUCTION	1
1.1 The National Flood Insurance Program	1
1.2 Purpose of this Flood Insurance Study Report	2
1.3 Jurisdictions Included in the Flood Insurance Study Project	2
1.4 Considerations for using this Flood Insurance Study Report	9
SECTION 2.0 – FLOODPLAIN MANAGEMENT APPLICATIONS	20
2.1 Floodplain Boundaries	20
2.2 Floodways	30
2.3 Base Flood Elevations	31
2.4 Non-Encroachment Zones	31
2.5 Coastal Flood Hazard Areas	31
2.5.1 Water Elevations and the Effects of Waves	32
2.5.2 Floodplain Boundaries and BFEs for Coastal Areas	33
2.5.3 Coastal High Hazard Areas	34
2.5.4 Limit of Moderate Wave Action	35
SECTION 3.0 – INSURANCE APPLICATIONS	36
3.1 National Flood Insurance Program Insurance Zones	36
SECTION 4.0 – AREA STUDIED	37
4.1 Basin Description	37
4.2 Principal Flood Problems	37
4.3 Non-Levee Flood Protection Measures	38
4.4 Levees	39
SECTION 5.0 – ENGINEERING METHODS	39
5.1 Hydrologic Analyses	39
5.2 Hydraulic Analyses	51

Figures

	<u>Page</u>
Figure 1: FIRM Index	11
Figure 2: FIRM Notes to Users	13
Figure 3: Map Legend for FIRM	16
Figure 4: Floodway Schematic	30
Figure 5: Wave Runup Transect Schematic	33
Figure 6: Coastal Transect Schematic	35
Figure 7: Frequency Discharge-Drainage Area Curves	46

Tables

	<u>Page</u>
Table 1: Listing of NFIP Jurisdictions	2
Table 2: Flooding Sources Included in this FIS Report	22
Table 3: Flood Zone Designations by Community	36
Table 4: Basin Characteristics	37
Table 5: Principal Flood Problems	38
Table 6: Historic Flooding Elevations	38
Table 7: Non-Levee Flood Protection Measures	38
Table 8: Levees	39
Table 9: Summary of Discharges	40
Table 10: Summary of Non-Coastal Stillwater Elevations	47
Table 11: Stream Gage Information used to Determine Discharges	51
Table 12: Summary of Hydrologic and Hydraulic Analyses	52
Table 13: Roughness Coefficients	58

Volume 2

	<u>Page</u>
SECTION 5.0 – ENGINEERING METHODS (continued)	
5.3 Coastal Analyses	59
5.3.1 Total Stillwater Elevations	64
5.3.2 Waves	67
5.3.3 Coastal Erosion	67
5.3.4 Wave Hazard Analyses	67
5.4 Alluvial Fan Analyses	110
SECTION 6.0 – MAPPING METHODS	110
6.1 Vertical and Horizontal Control	110
6.2 Base Map	111
6.3 Floodplain and Floodway Delineation	112

Figures

	<u>Page</u>
Figure 8: 1% Annual Chance Total Stillwater Elevations for Coastal Areas	65
Figure 9: Transect Location Map	104

Tables

	<u>Page</u>
Table 14: Summary of Coastal Analyses	59
Table 15: Tide Gage Analysis Specifics	66
Table 16: Coastal Transect Parameters	69
Table 17: Summary of Alluvial Fan Analyses	110

Table 18: Results of Alluvial Fan Analyses	110
Table 19: Countywide Vertical Datum Conversion	110
Table 20: Stream-Based Vertical Datum Conversion	110
Table 21: Base Map Sources	111
Table 22: Summary of Topographic Elevation Data used in Mapping	113
Table 23: Floodway Data	115
Table 24: Flood Hazard and Non-Encroachment Data for Selected Streams	134

Volume 3

	<u>Page</u>
SECTION 6.0 – MAPPING METHODS (continued)	
6.4 Coastal Flood Hazard Mapping	135
6.5 FIRM Revisions	149
6.5.1 Letters of Map Amendment	149
6.5.2 Letters of Map Revision Based on Fill	150
6.5.3 Letters of Map Revision	150
6.5.4 Physical Map Revisions	151
6.5.5 Contracted Restudies	151
6.5.6 Community Map History	151
SECTION 7.0 – CONTRACTED STUDIES AND COMMUNITY COORDINATION	156
7.1 Contracted Studies	156
7.2 Community Meetings	161
SECTION 8.0 – ADDITIONAL INFORMATION	166
SECTION 9.0 – BIBLIOGRAPHY AND REFERENCES	169

Tables

	<u>Page</u>
Table 25: Summary of Coastal Transect Mapping Considerations	136
Table 26: Incorporated Letters of Map Change	150
Table 27: Community Map History	152
Table 28: Summary of Contracted Studies Included in this FIS Report	156
Table 29: Community Meetings	162
Table 30: Map Repositories	166
Table 31: Additional Information	168
Table 32: Bibliography and References	170

Exhibits

Flood Profiles

	<u>Panel</u>
Alligator Creek Channel A	01-03 P
Alligator Creek Channel B	04-06 P
Alligator Creek Channel C	07 P
Alligator Creek Channel E	08-09 P
Alligator Creek Channel G	10 P
Alligator Creek Channel H	11 P
Brooker Creek Tributary A	12 P
Brooker Creek Tributary B	13 P
Channel 1	14-15 P
Channel 2	16 P
Channel 3	17 P
Curlew Creek	18 P
Flagler Drive Tributary	19 P
Hammond Creek	20 P
Hollin Creek Tributary A	21-23 P
Hollin Creek Tributary A-2	24 P
Hollin Creek Tributary B	25 P
Jeffords Street Tributary	26 P
Jerry Branch	27 P
Joe's Creek	28-31 P
Joe's Creek Tributary No. 4	32-33 P
Joe's Creek Tributary No. 5	34-35 P
Miles Creek	36 P
Spring Branch	37 P
Stevenson Creek	38-39 P

Volume 4

Exhibits

Transect Profiles

	<u>Panel</u>
Transect 1	01-03 T
Transect 2	04 T
Transect 3	05 T
Transect 4	06 T
Transect 5	07 T
Transect 6	08-10 T
Transect 7	11-12 T
Transect 8	13-14 T
Transect 9	15-17 T
Transect 10	18-19 T
Transect 11	20 T
Transect 12	21 T
Transect 13	22 T
Transect 14	23 T
Transect 15	24 T
Transect 16	25 T

Transect 17	26 T
Transect 18	27 T
Transect 19	28 T
Transect 20	29-30 T
Transect 21	31-32 T
Transect 22	33-34 T
Transect 23	35 T
Transect 24	36 T
Transect 25	37 T
Transect 26	38 T
Transect 27	39-40 T
Transect 28	41-42 T
Transect 29	43-45 T
Transect 30	46-47 T
Transect 31	48-49 T
Transect 32	50-51 T
Transect 33	52-53 T
Transect 34	54-55 T
Transect 35	56-57 T
Transect 36	58-59 T
Transect 37	60-61 T
Transect 38	62-63 T
Transect 39	64-66 T
Transect 40	67-68 T
Transect 41	69-70 T
Transect 42	71-72 T
Transect 43	73-74 T
Transect 44	75-77 T
Transect 45	78-79 T
Transect 46	80-81 T
Transect 47	82-84 T
Transect 48	85-86 T
Transect 49	87-88 T

Volume 5
Exhibits

Transect Profiles	<u>Panel</u>
Transect 50	89-90 T
Transect 51	91-92 T
Transect 52	93-94 T
Transect 53	95-96 T
Transect 54	97-98 T
Transect 55	99-100 T
Transect 56	101-103 T
Transect 57	104-106 T
Transect 58	107-109 T
Transect 59	110-112 T
Transect 60	113-115 T

Transect 61	116-118 T
Transect 62	119-121 T
Transect 63	122-123 T
Transect 64	124-126 T
Transect 65	127 T
Transect 66	128 T
Transect 67	129-130 T
Transect 68	131-132 T
Transect 69	133-134 T
Transect 70	135-136 T
Transect 71	137-139 T
Transect 72	140-142 T
Transect 73	143-144 T
Transect 74	145-147 T
Transect 75	148-149 T
Transect 76	150-151 T
Transect 77	152 T
Transect 78	153-154 T
Transect 79	155 T
Transect 80	156 T
Transect 81	157 T
Transect 82	158 T
Transect 83	159-160 T
Transect 84	161-162 T
Transect 85	163-164 T
Transect 86	165-166 T
Transect 87	167-168 T
Transect 88	169 T
Transect 89	170-171 T
Transect 90	172-173 T
Transect 91	174-175 T
Transect 92	176-177 T

Volume 6
Exhibits

Transect Profiles	<u>Panel</u>
Transect 93	178-179 T
Transect 94	180-181 T
Transect 95	182-183 T
Transect 96	184-185 T
Transect 97	186-187 T
Transect 98	188 T
Transect 99	189-190 T
Transect 100	191-192 T
Transect 101	193-194 T
Transect 102	195-196 T
Transect 103	197-198 T
Transect 104	199-200 T

Transect 105	201-202 T
Transect 106	203-204 T
Transect 107	205-206 T
Transect 108	207-209 T
Transect 109	210-212 T
Transect 110	213-214 T
Transect 111	215-216 T
Transect 112	217-218 T
Transect 113	219-220 T
Transect 114	221-222 T
Transect 115	223-224 T
Transect 116	225-226 T
Transect 117	227 T
Transect 118	228-229 T
Transect 119	230-231 T
Transect 120	232-234 T
Transect 121	235-237 T
Transect 122	238-240 T
Transect 123	241-243 T
Transect 124	244-246 T
Transect 125	247-248 T
Transect 126	249-250 T
Transect 127	251-252 T
Transect 128	253-254 T
Transect 129	255 T
Transect 130	256 T
Transect 131	257 T
Transect 132	258-260 T
Transect 133	261-262 T
Transect 134	263 T
Transect 135	264-265 T

Volume 7
Exhibits

Transect Profiles	<u>Panel</u>
Transect 136	266-267 T
Transect 137	268-269 T
Transect 138	270-272 T
Transect 139	273 T
Transect 140	274-275 T
Transect 141	276-277 T
Transect 142	278-279 T
Transect 143	280 T
Transect 144	281 T
Transect 145	282 T
Transect 146	283-284 T
Transect 147	285 T
Transect 148	286 T

Transect 149	287 T
Transect 150	288 T
Transect 151	289-290 T
Transect 152	291 T
Transect 153	292-293 T
Transect 154	294 T
Transect 155	295-296 T
Transect 156	297-298 T
Transect 157	299-300 T
Transect 158	301 T
Transect 159	302-303 T
Transect 160	304 T
Transect 161	305-306 T
Transect 162	307-308 T
Transect 163	309 T
Transect 164	310-311 T
Transect 165	312-313 T
Transect 166	314-315 T
Transect 167	316-317 T
Transect 168	318-319 T
Transect 169	320 T
Transect 170	321-322 T
Transect 171	323-324 T
Transect 172	325-326 T
Transect 173	327-328 T
Transect 174	329-330 T
Transect 175	331 T
Transect 176	332 T
Transect 177	333 T
Transect 178	334-335 T
Transect 179	336 T
Transect 180	337 T
Transect 181	338-339 T
Transect 182	340-341 T
Transect 183	342-343 T
Transect 184	344-345 T
Transect 185	346-347 T
Transect 186	348 T
Transect 187	349-350 T
Transect 188	351-352 T
Transect 189	353 T

Volume 8
Exhibits

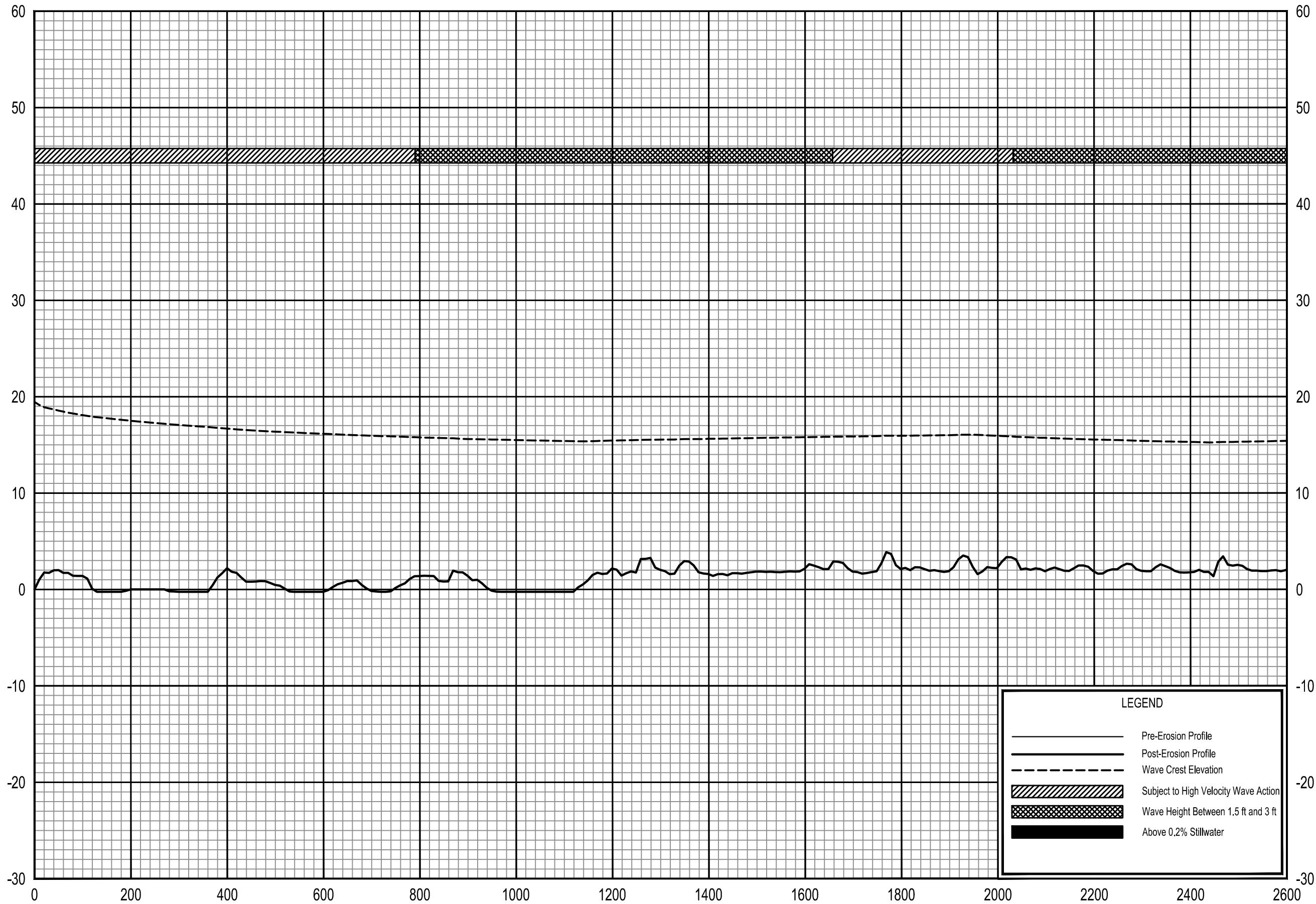
Transect Profiles	<u>Panel</u>
Transect 190	354-355 T
Transect 191	356 T
Transect 192	357-358 T
Transect 193	359 T
Transect 194	360-361 T
Transect 195	362-363 T
Transect 196	364 T
Transect 197	365-366 T
Transect 198	367 T
Transect 199	368-369 T
Transect 200	370 T
Transect 201	371 T
Transect 202	372 T
Transect 203	373 T
Transect 204	374 T
Transect 205	375 T
Transect 206	376 T
Transect 207	377 T
Transect 208	378 T
Transect 209	379 T
Transect 210	380 T
Transect 211	381 T
Transect 212	382 T
Transect 213	383-384 T
Transect 214	385 T
Transect 215	386 T
Transect 216	387 T
Transect 217	388 T
Transect 218	389 T
Transect 219	390 T
Transect 220	391-392 T
Transect 221	393-394 T
Transect 222	395-396 T
Transect 223	397-398 T
Transect 224	399-400 T
Transect 225	401-402 T
Transect 226	403-404 T
Transect 227	405-406 T
Transect 228	407-408 T
Transect 229	409-410 T
Transect 230	411-412 T
Transect 231	413 T
Transect 232	414-415 T
Transect 233	416-417 T
Transect 234	418-419 T
Transect 235	420-422 T

Transect 236	423-425 T
Transect 237	426-428 T
Transect 238	429-430 T
Transect 239	431-433 T
Transect 240	434-436 T
Transect 241	437-438 T
Transect 242	439-440 T

Published Separately

Flood Insurance Rate Map (FIRM)

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

TRANSECT DISTANCE IN FEET FROM SHORELINE

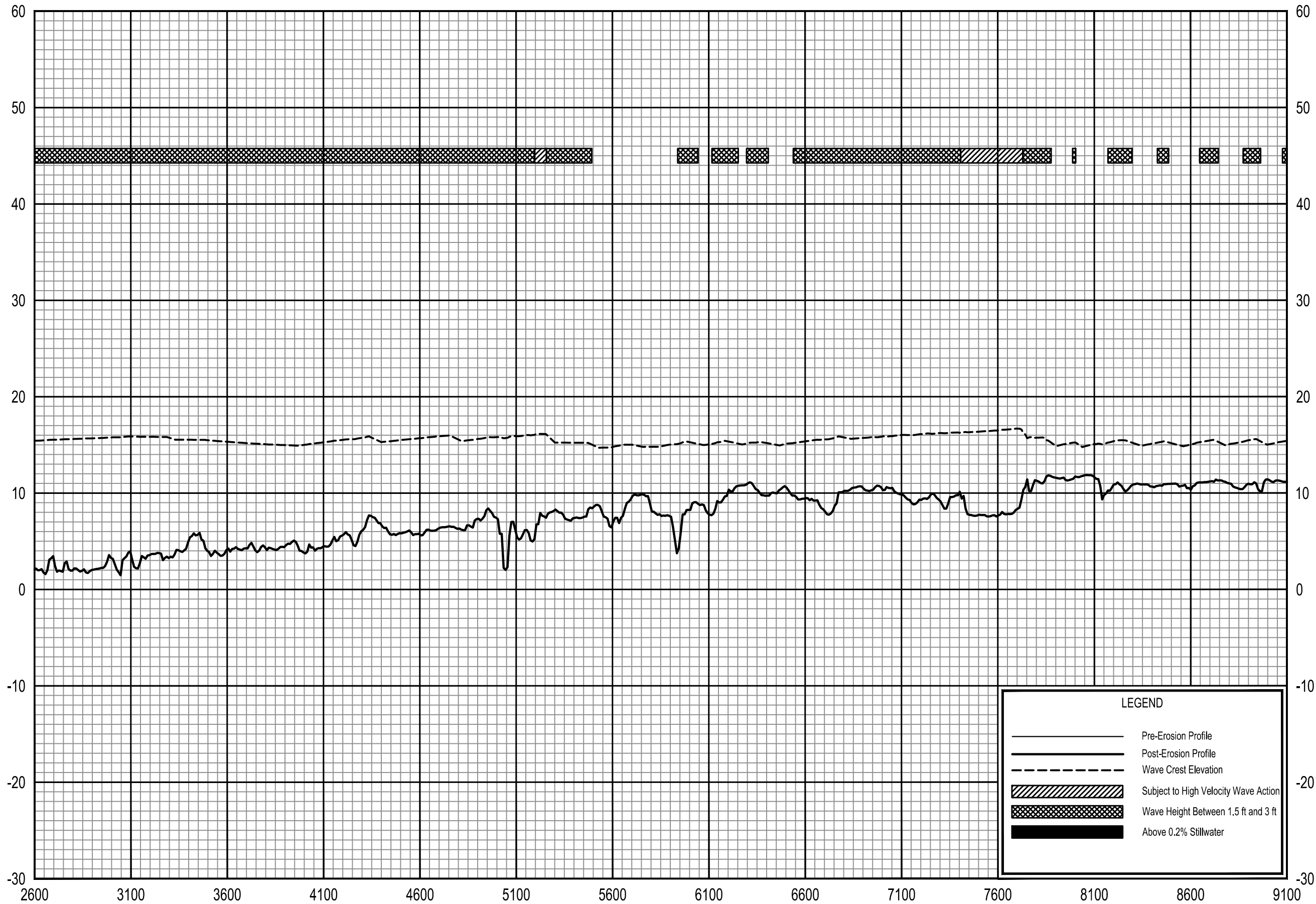
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 1

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

1 T

ELEVATION IN FEET (NAVD 88)



LEGEND

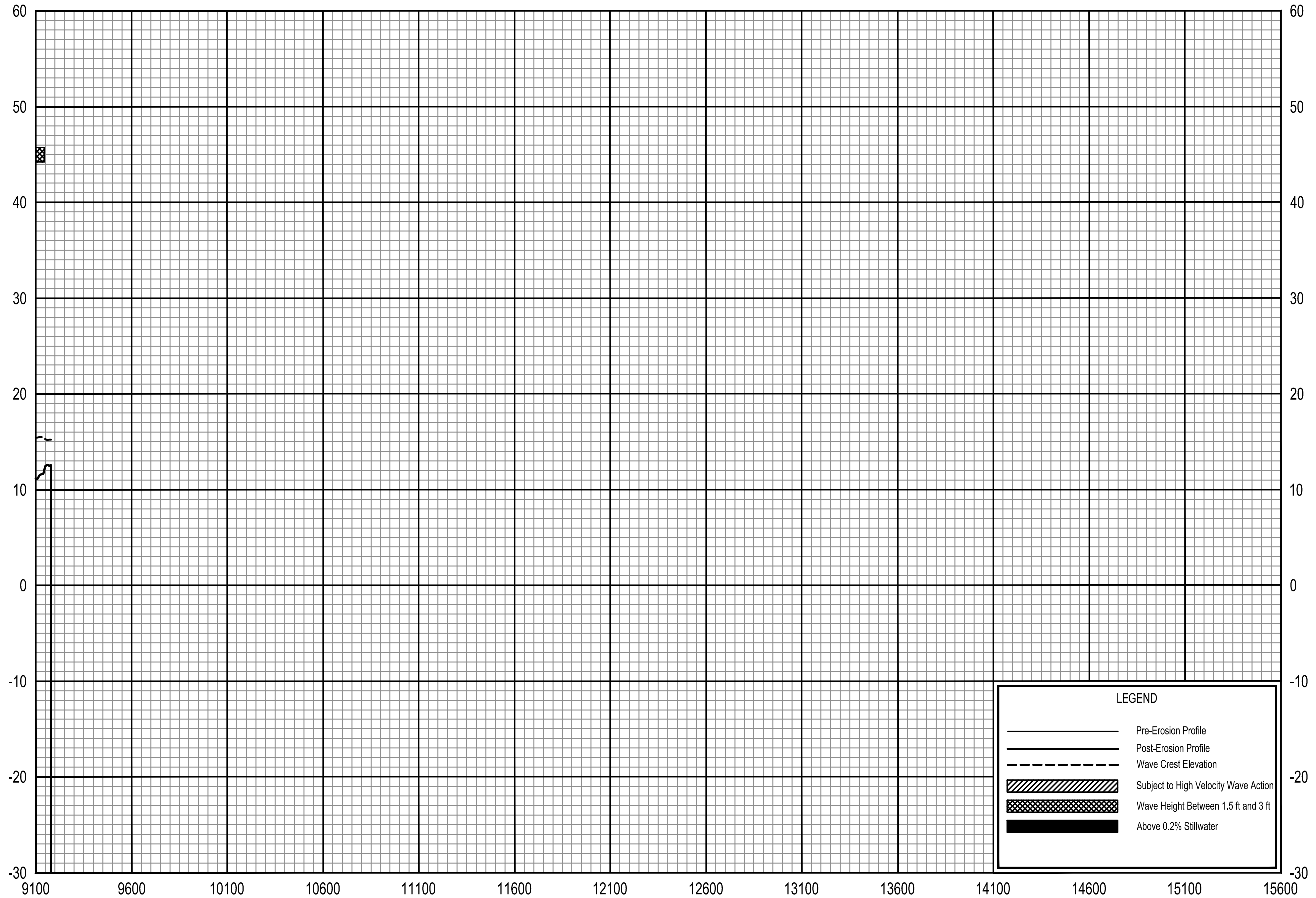
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 1

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



TRANSECT DISTANCE IN FEET FROM SHORELINE

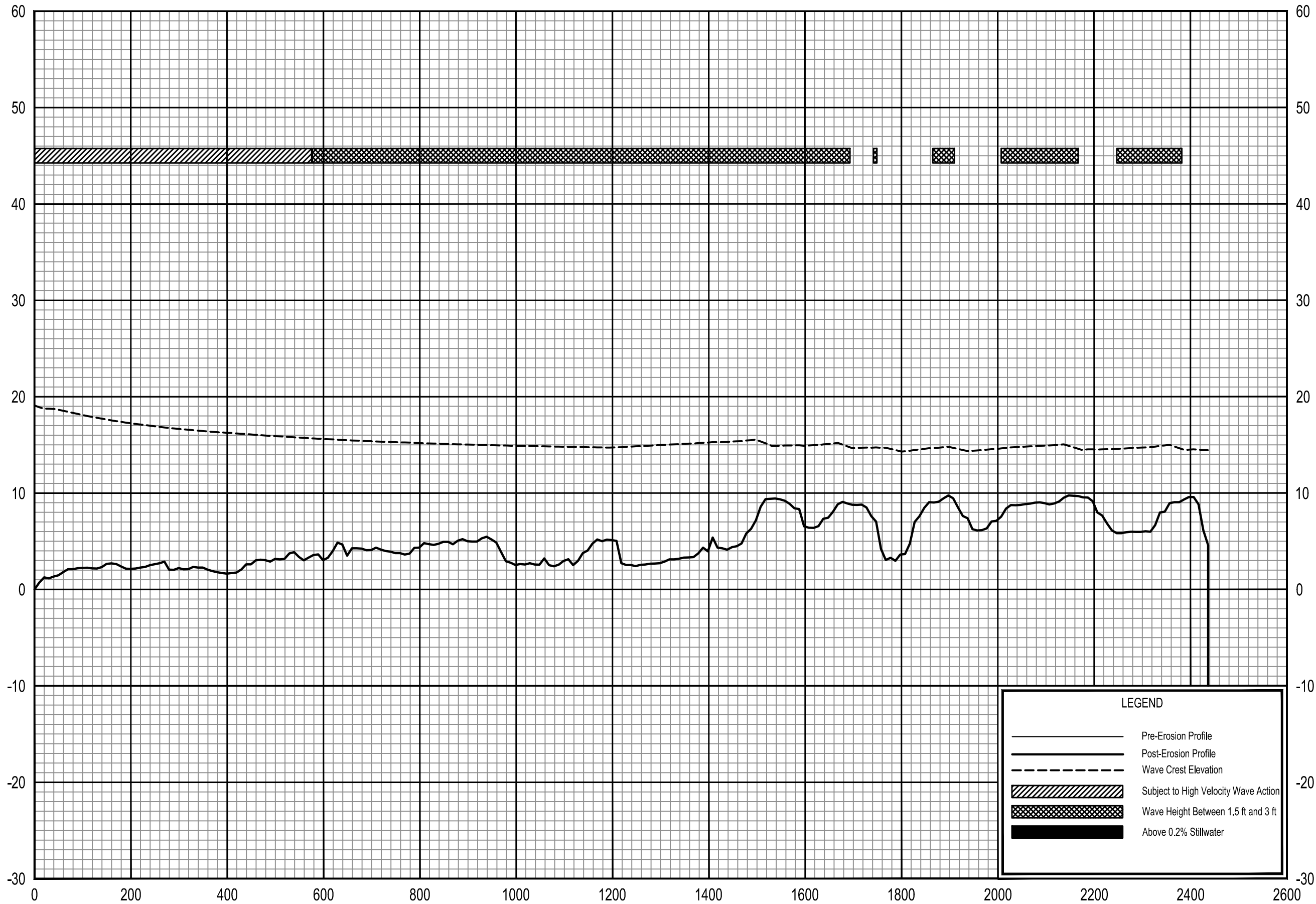
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 1

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

3 T

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

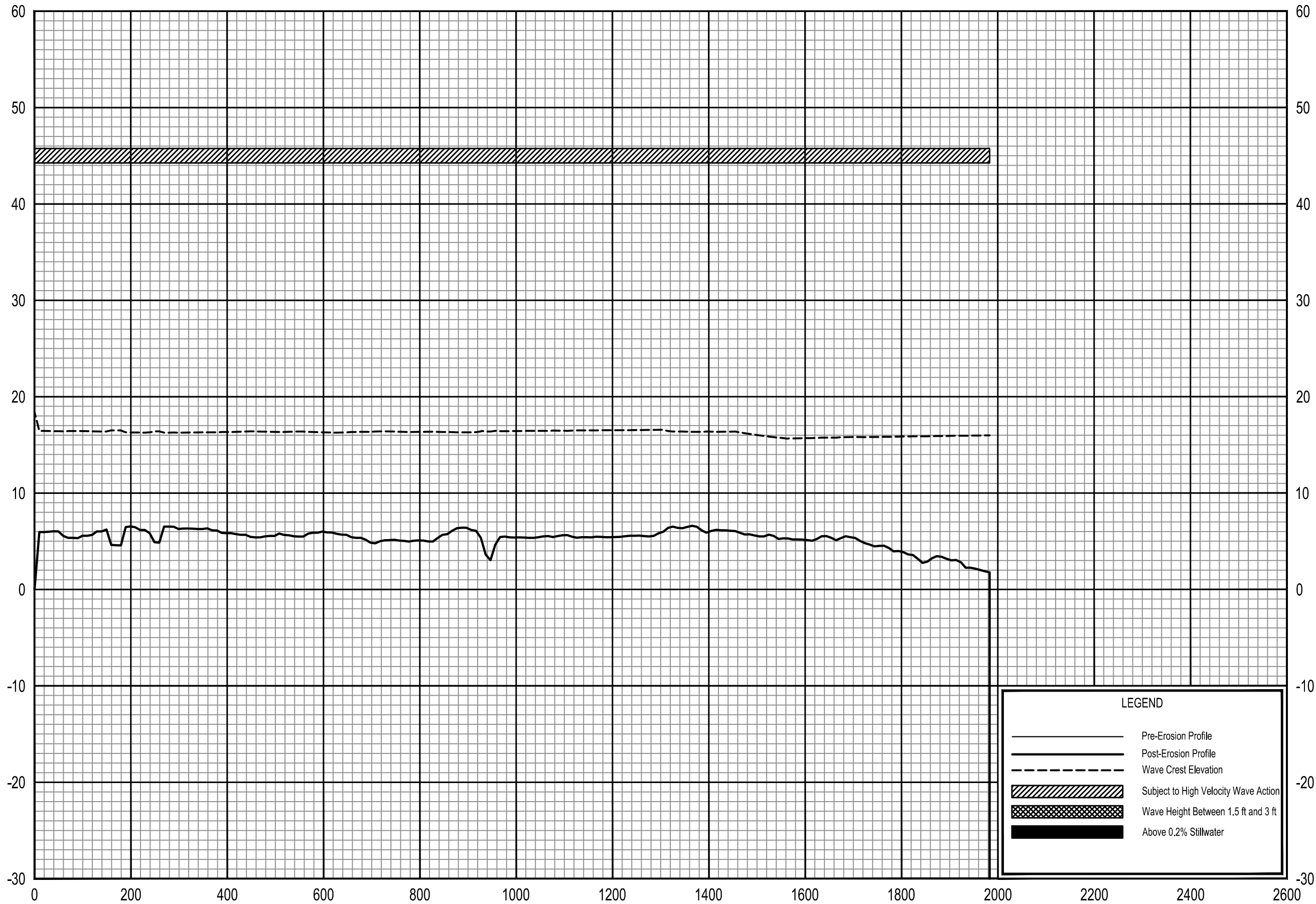
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 2

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



TRANSECT DISTANCE IN FEET FROM SHORELINE

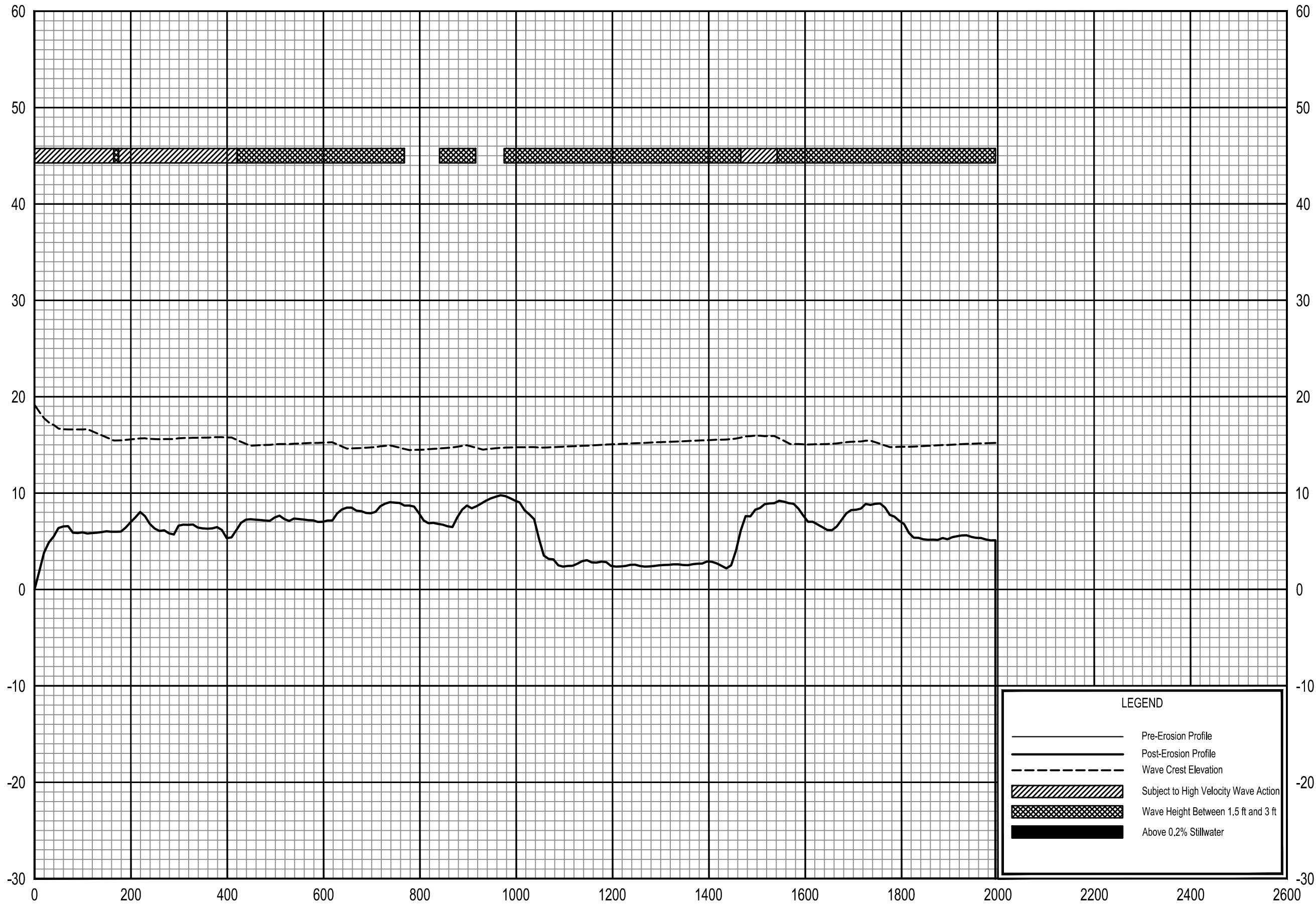
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 3

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

5 T

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

TRANSECT DISTANCE IN FEET FROM SHORELINE

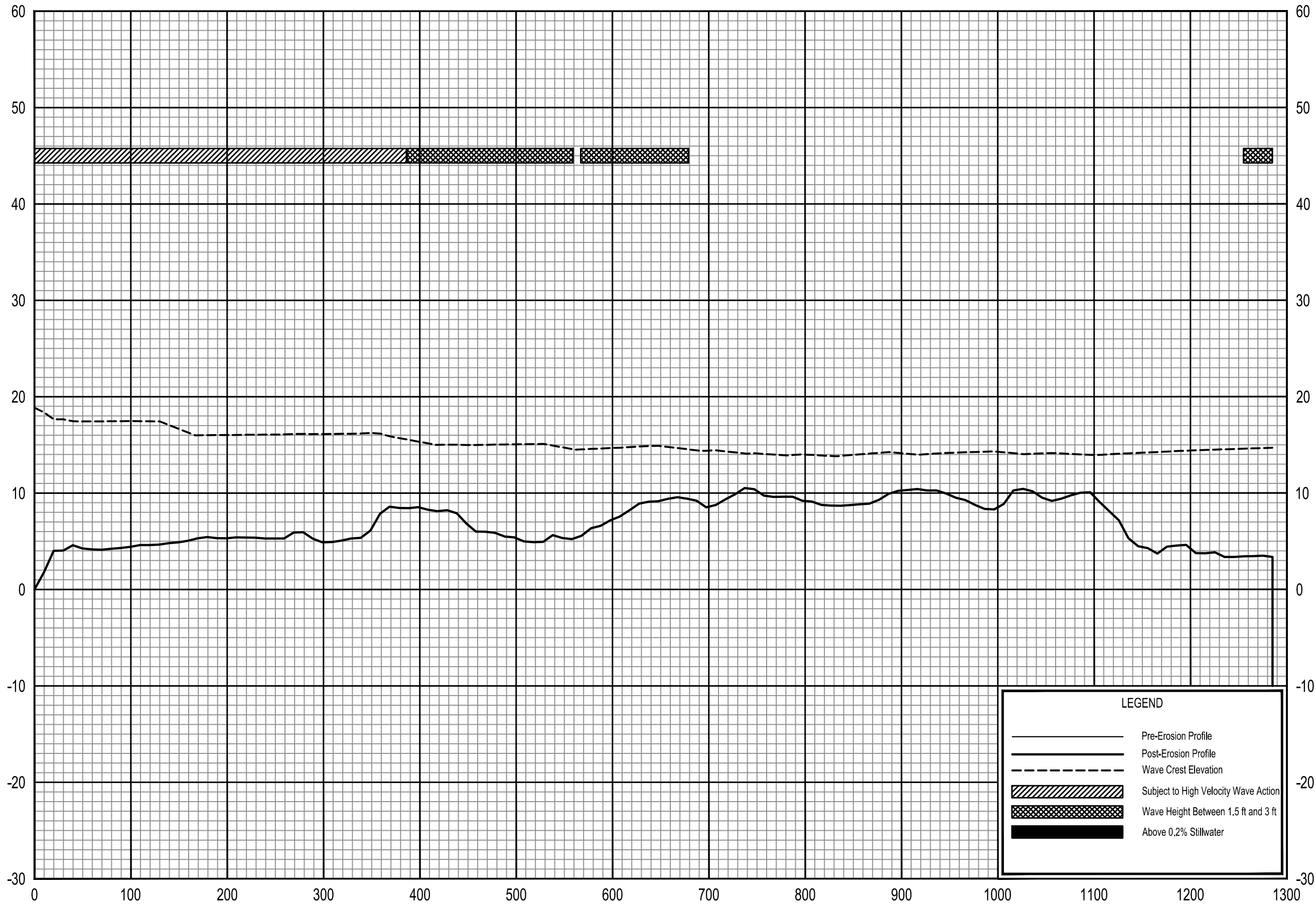
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 4

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

6 T

ELEVATION IN FEET (NAVD 88)



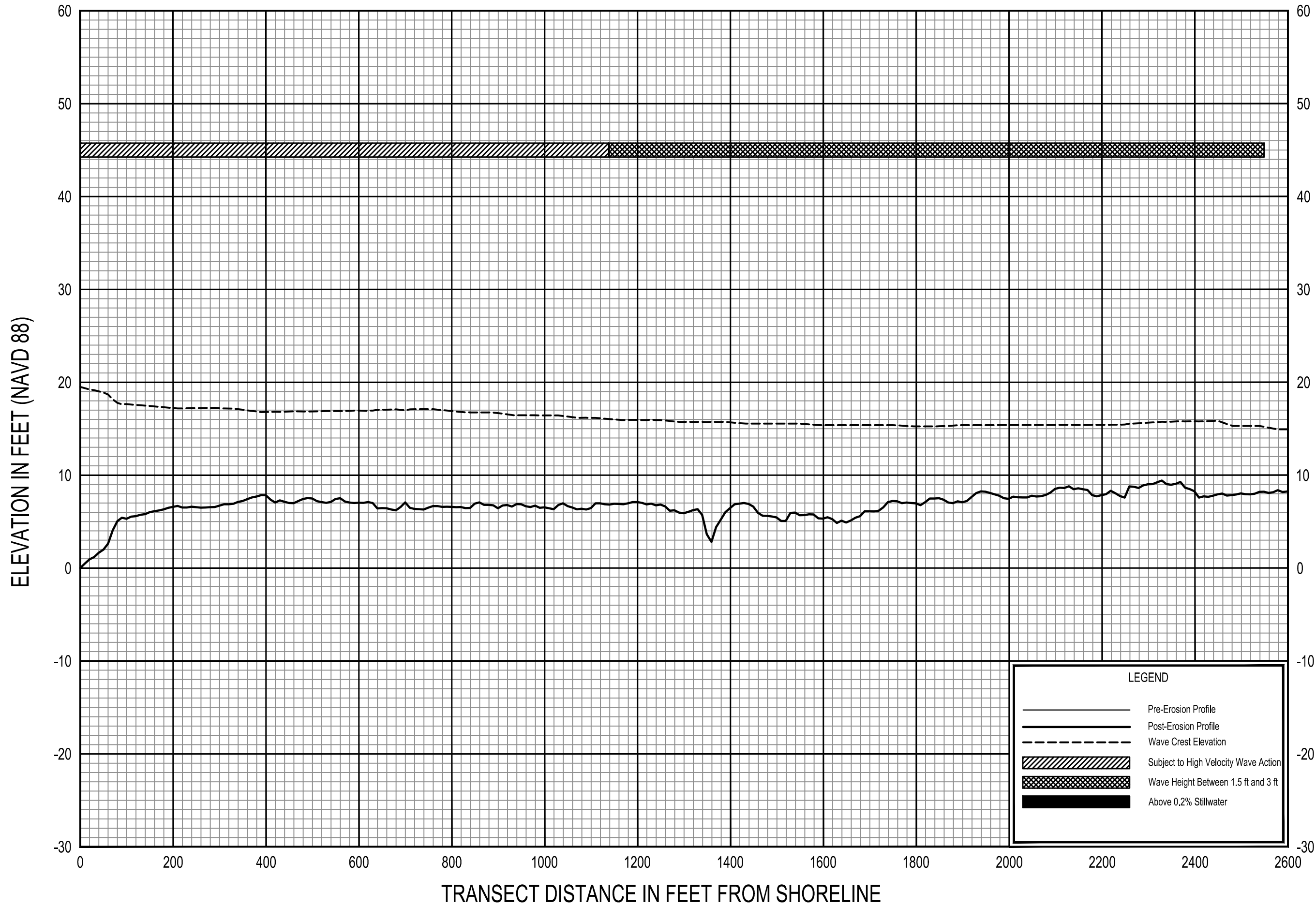
LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 5

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS



LEGEND

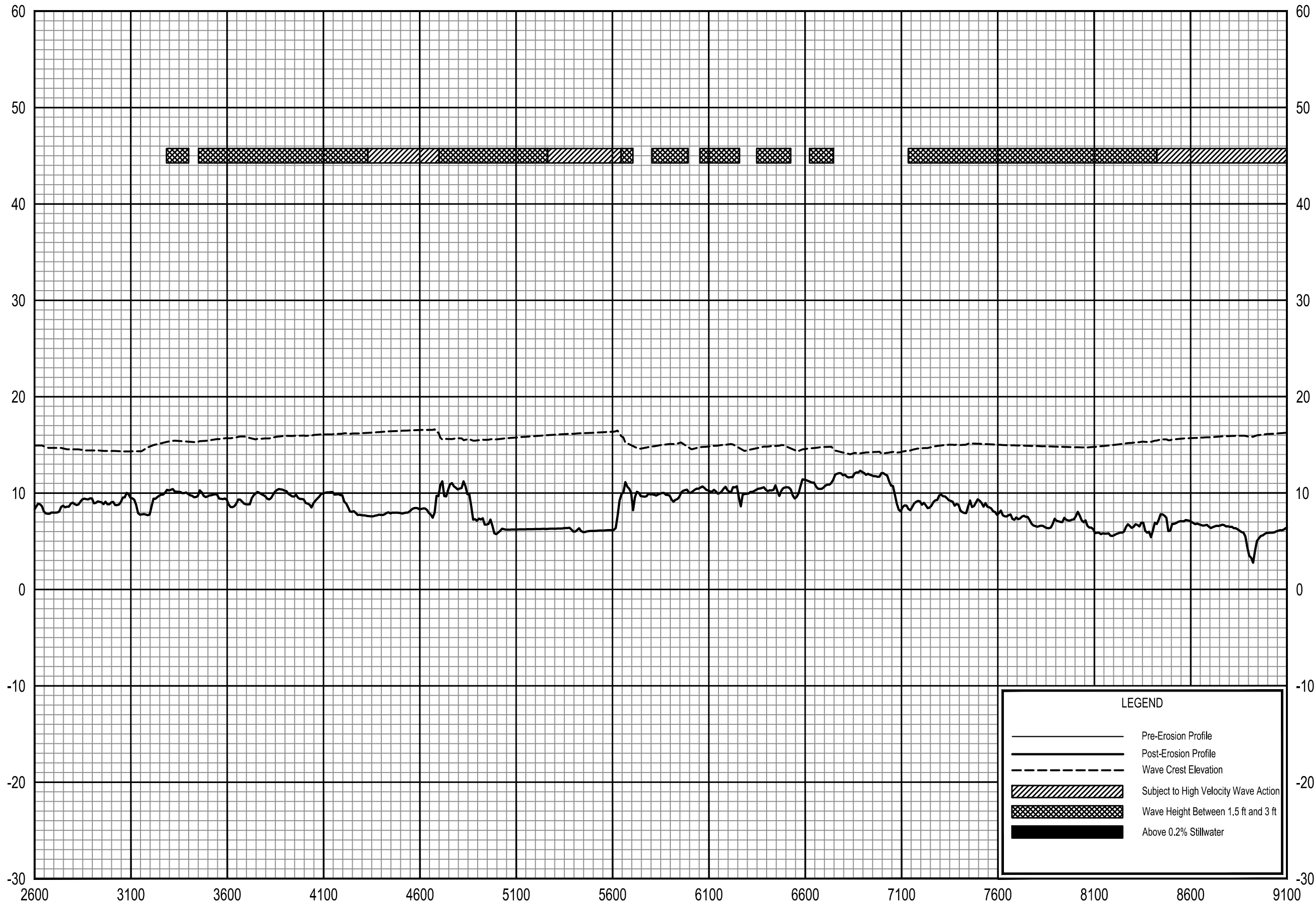
	Pre-Erosion Profile
	Post-Erosion Profile
	Wave Crest Elevation
	Subject to High Velocity Wave Action
	Wave Height Between 1.5 ft and 3 ft
	Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 6

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

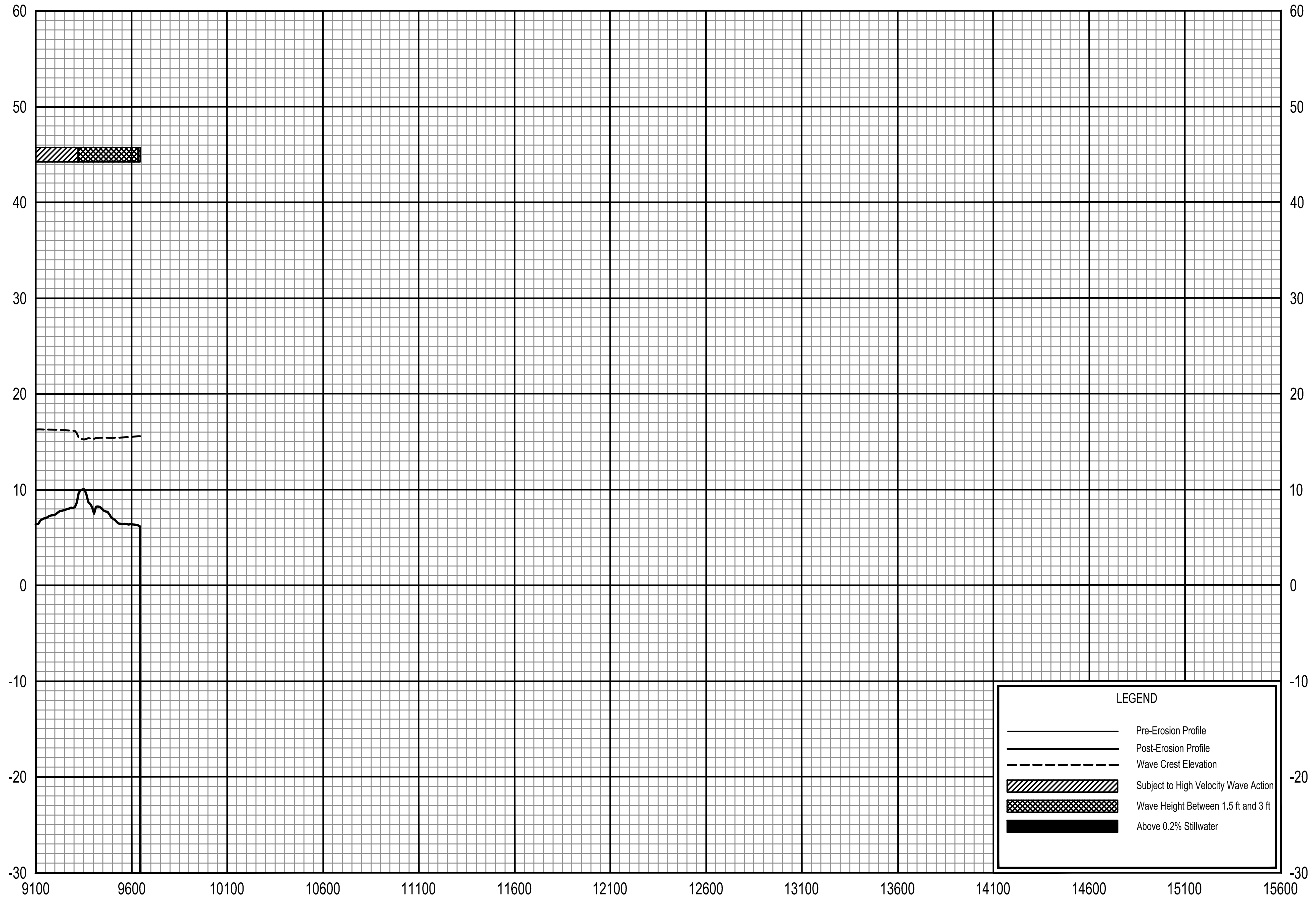
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 6

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

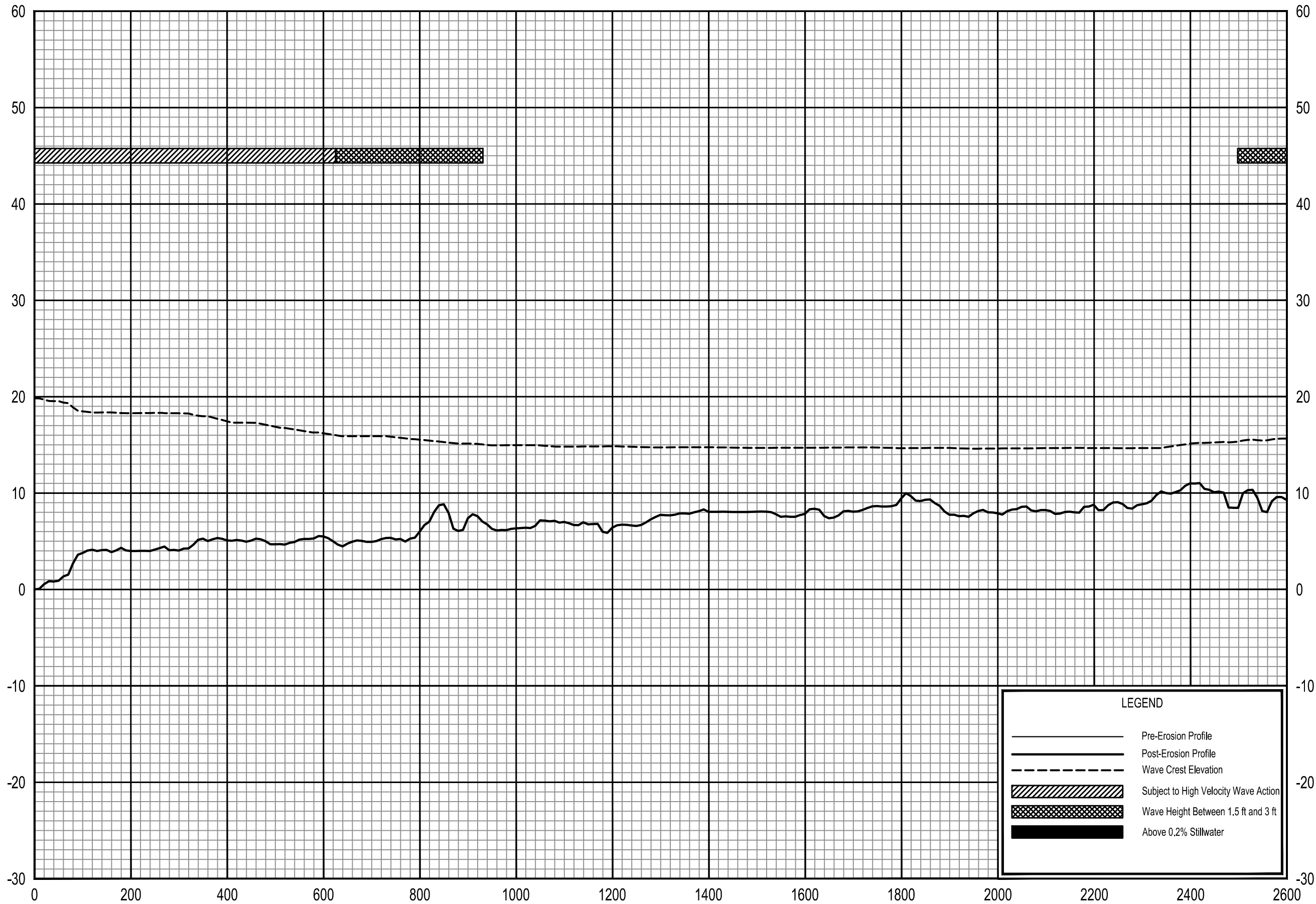
- Pre-Erosion Profile
- Post-Erosion Profile
- Wave Crest Elevation
- Subject to High Velocity Wave Action
- Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 6

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

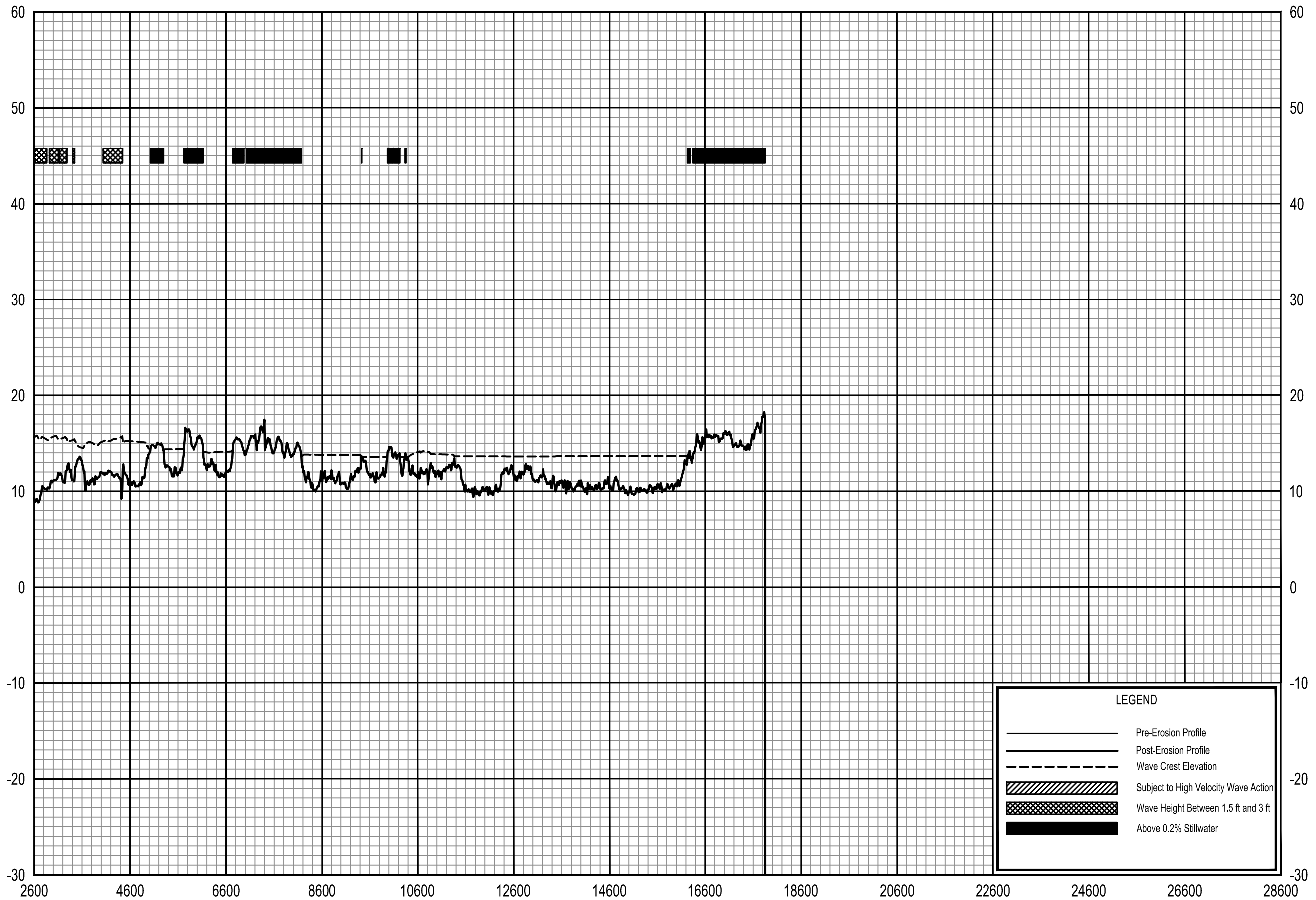
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 7

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

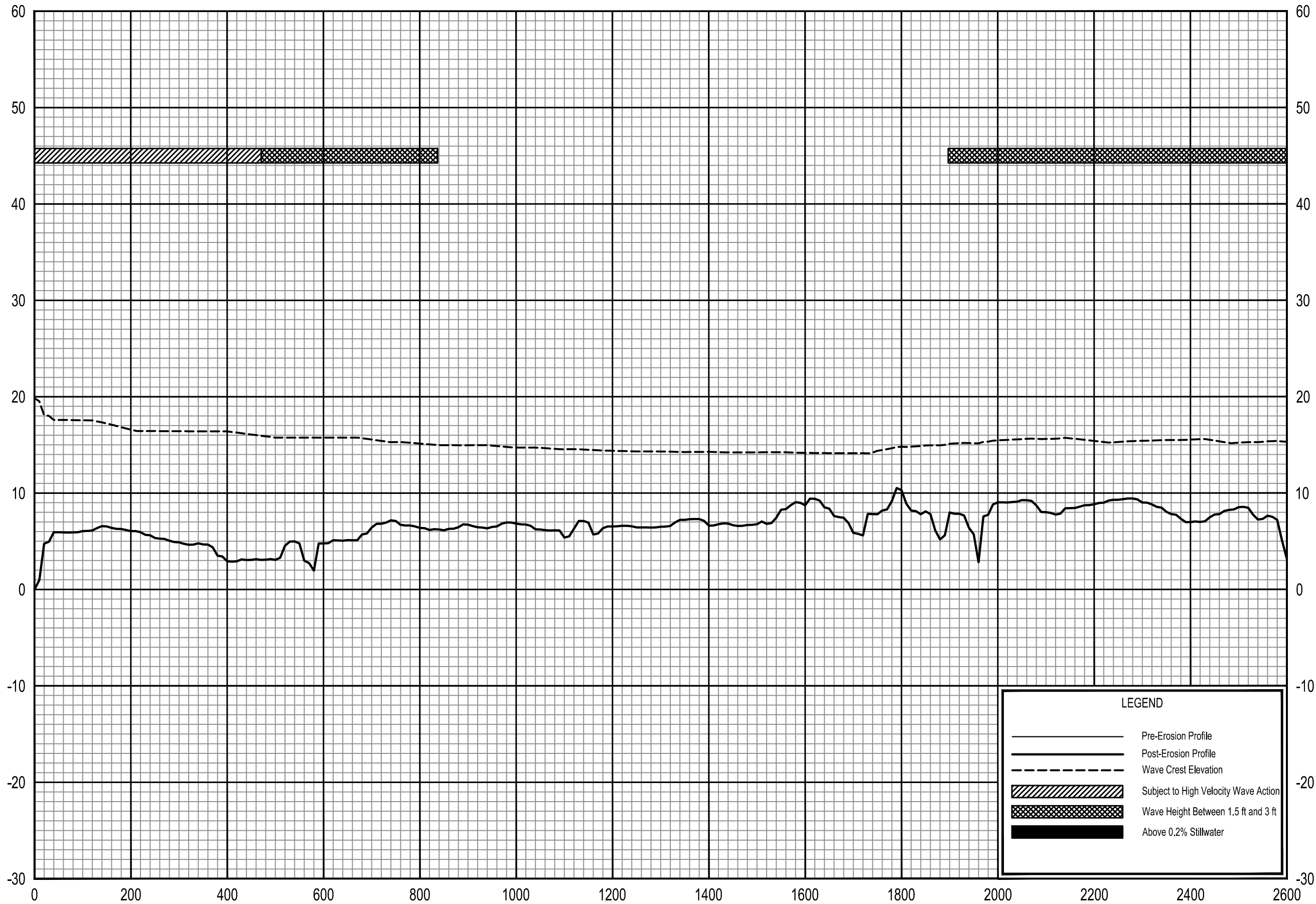
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 7

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

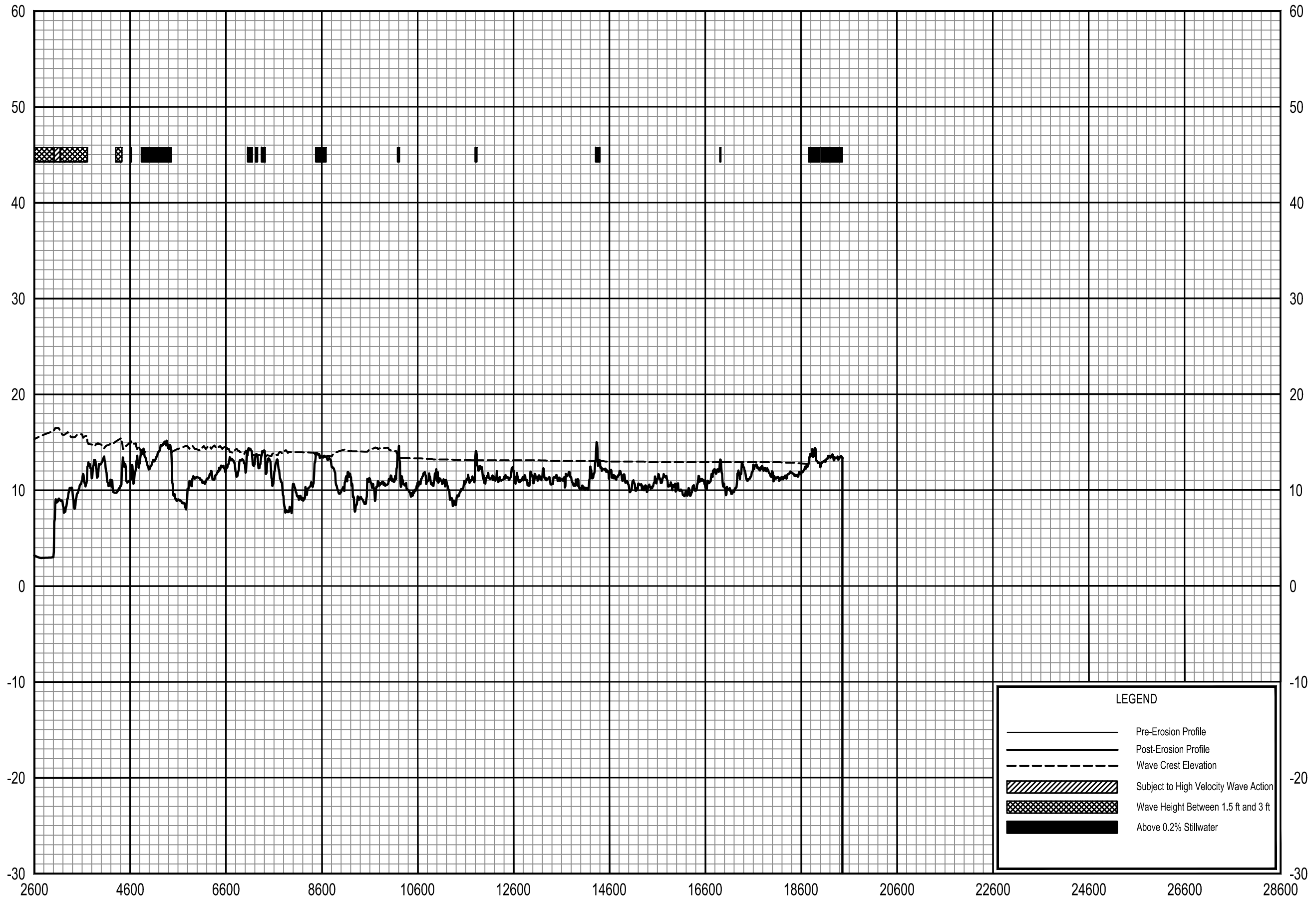
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 8

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

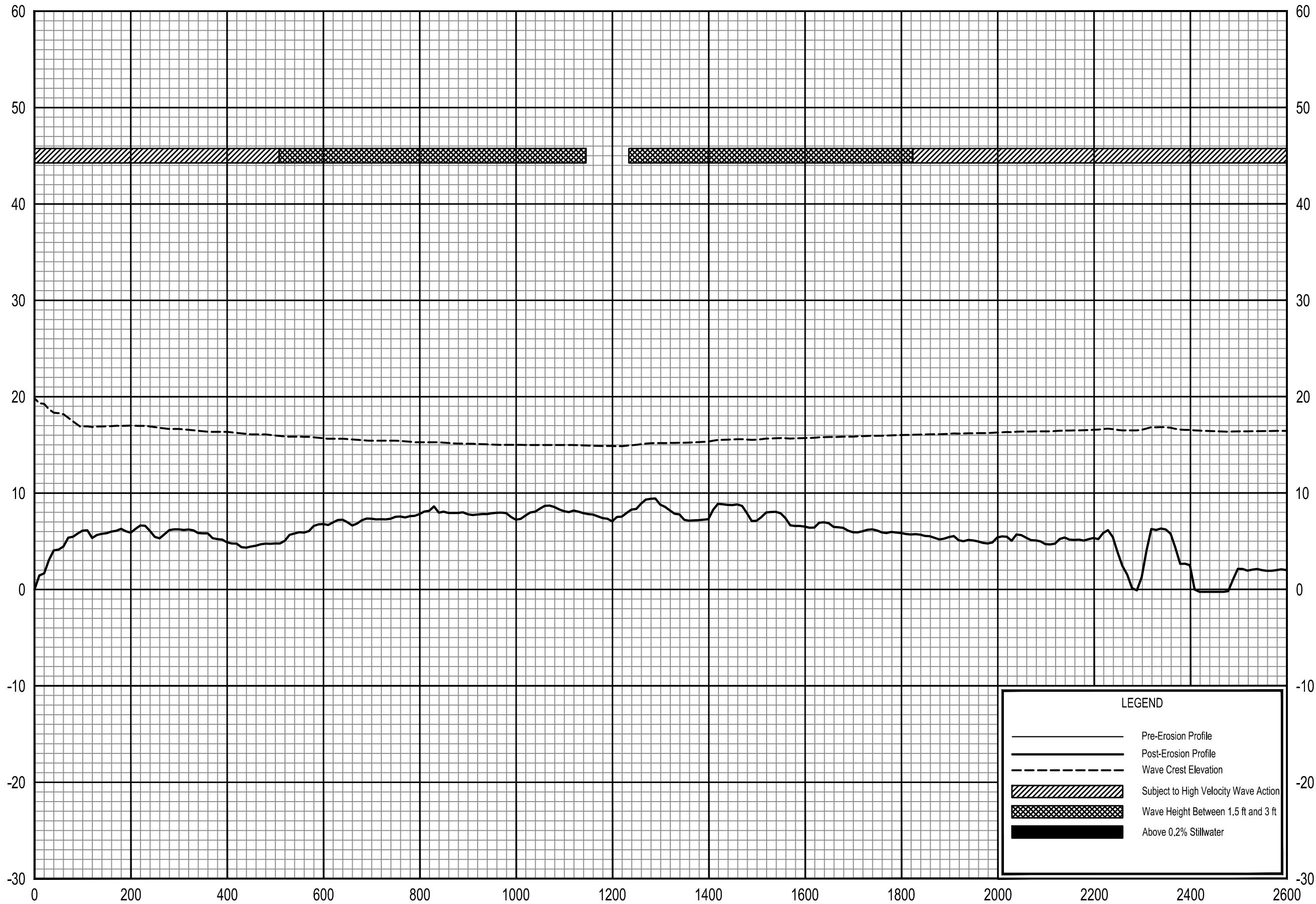
- Pre-Erosion Profile
- - - Post-Erosion Profile
- · · Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 8

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

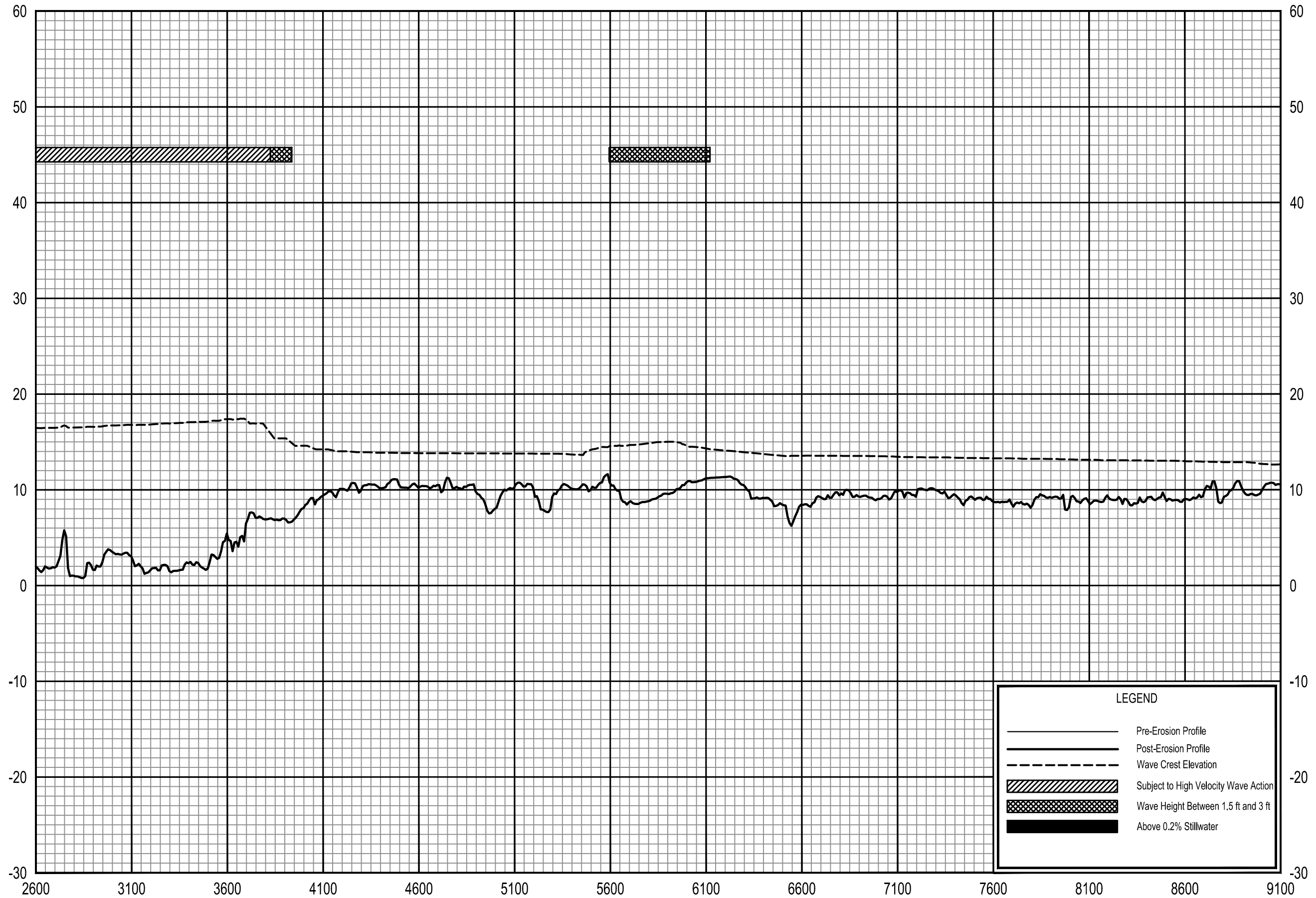
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 9

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

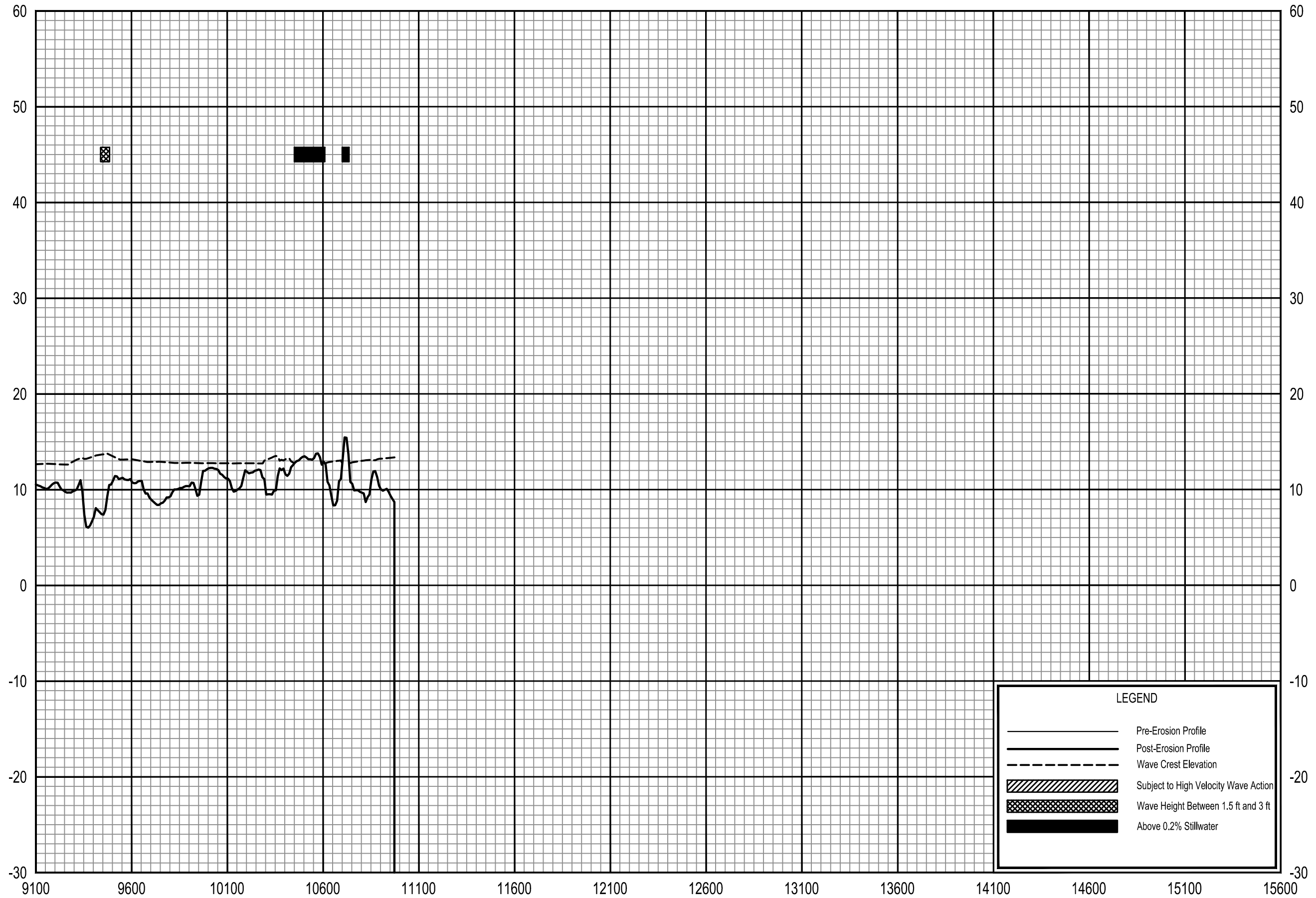
- Pre-Erosion Profile
- - - Post-Erosion Profile
- · · Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 9

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



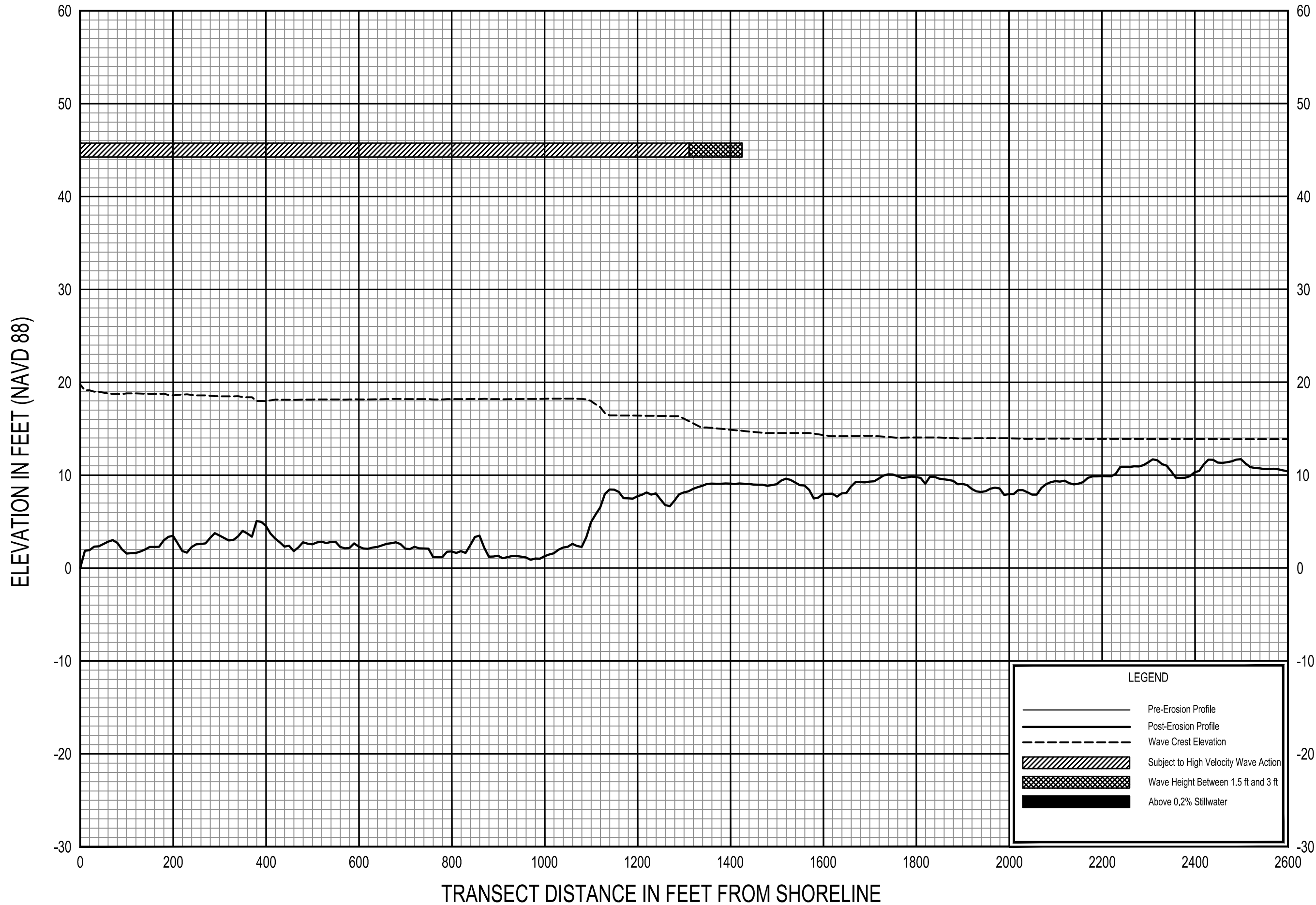
LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 9

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

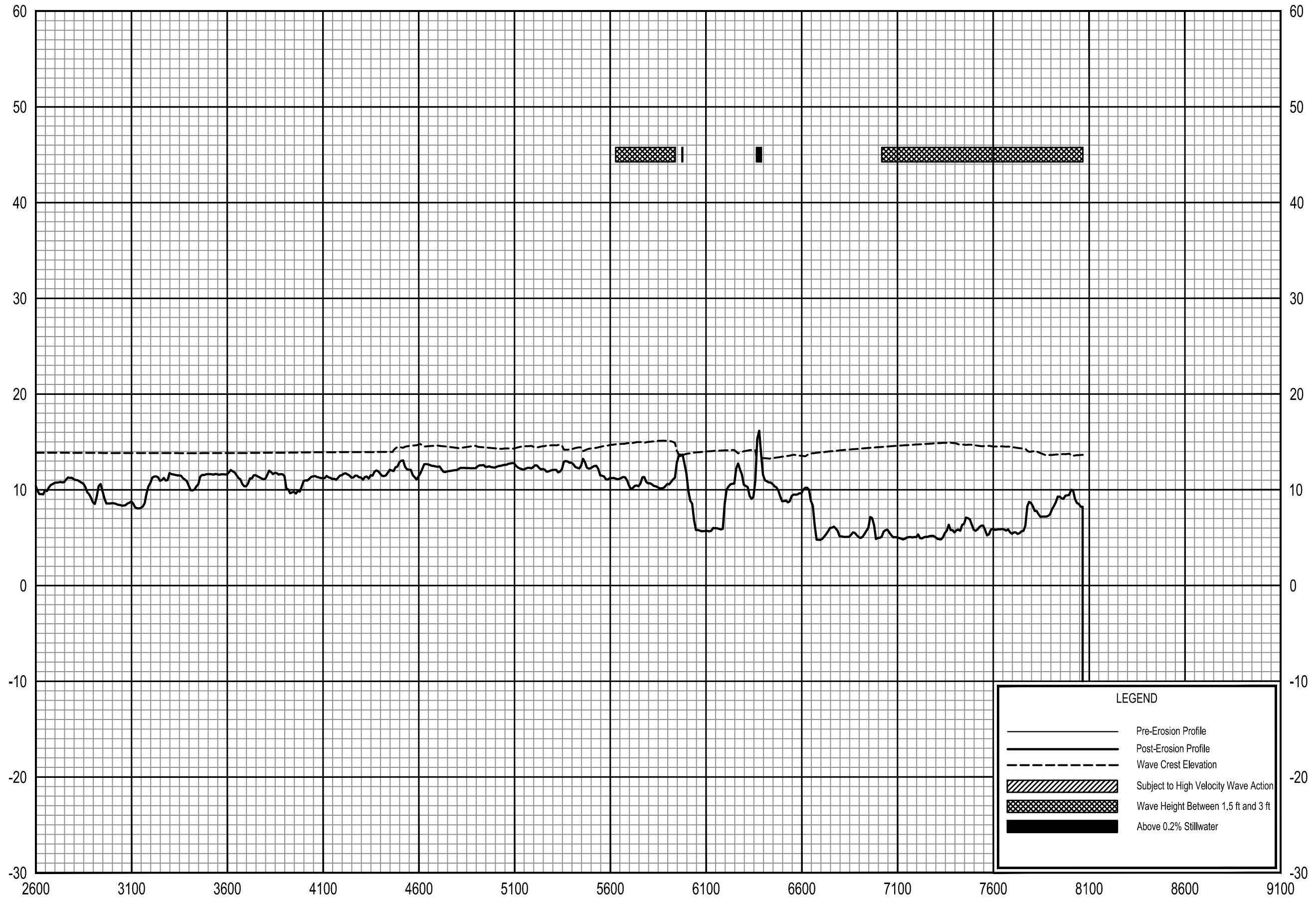


0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 10

FEDERAL EMERGENCY MANAGEMENT AGENCY
 PINELLAS COUNTY, FL
 AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



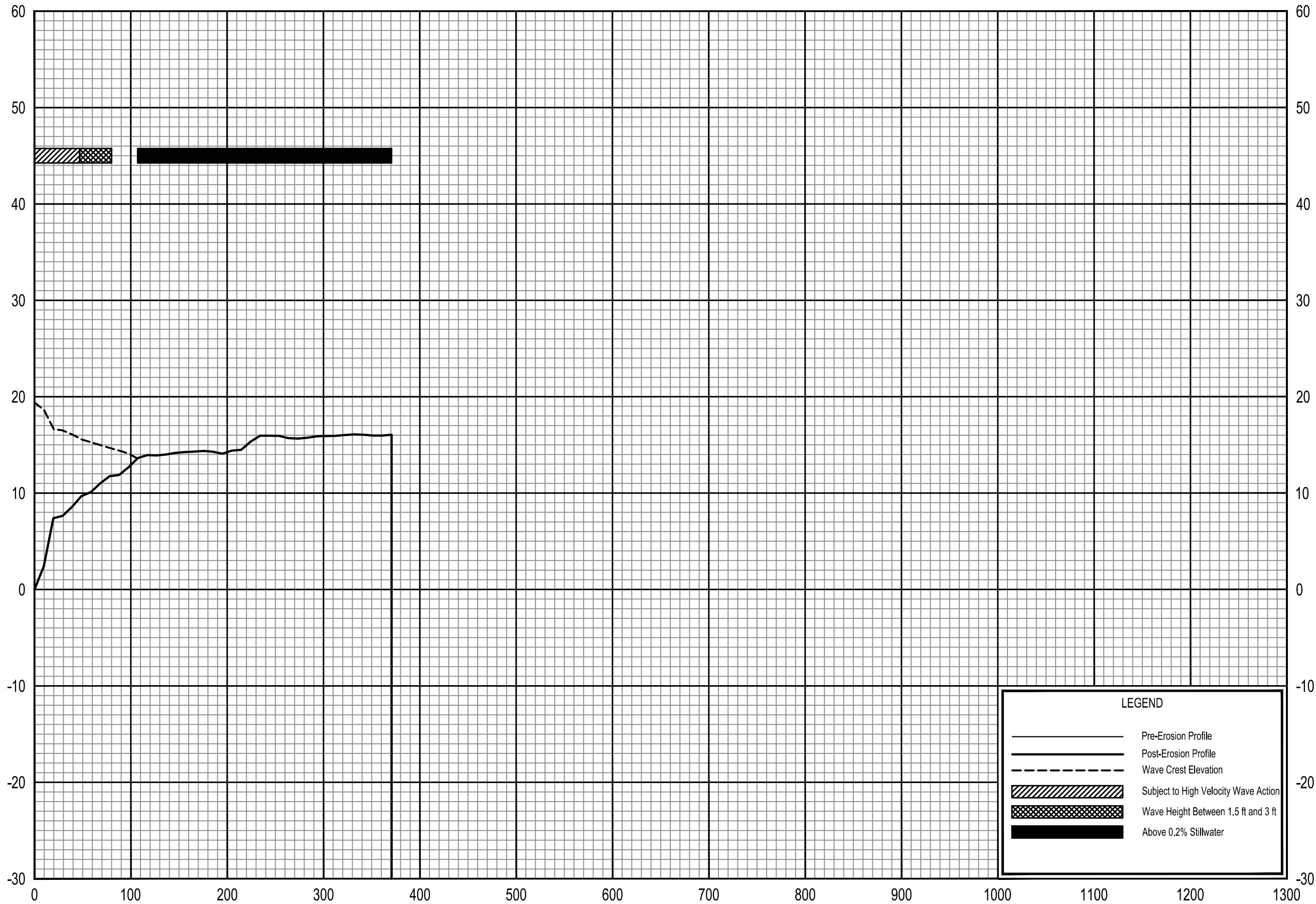
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 10

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

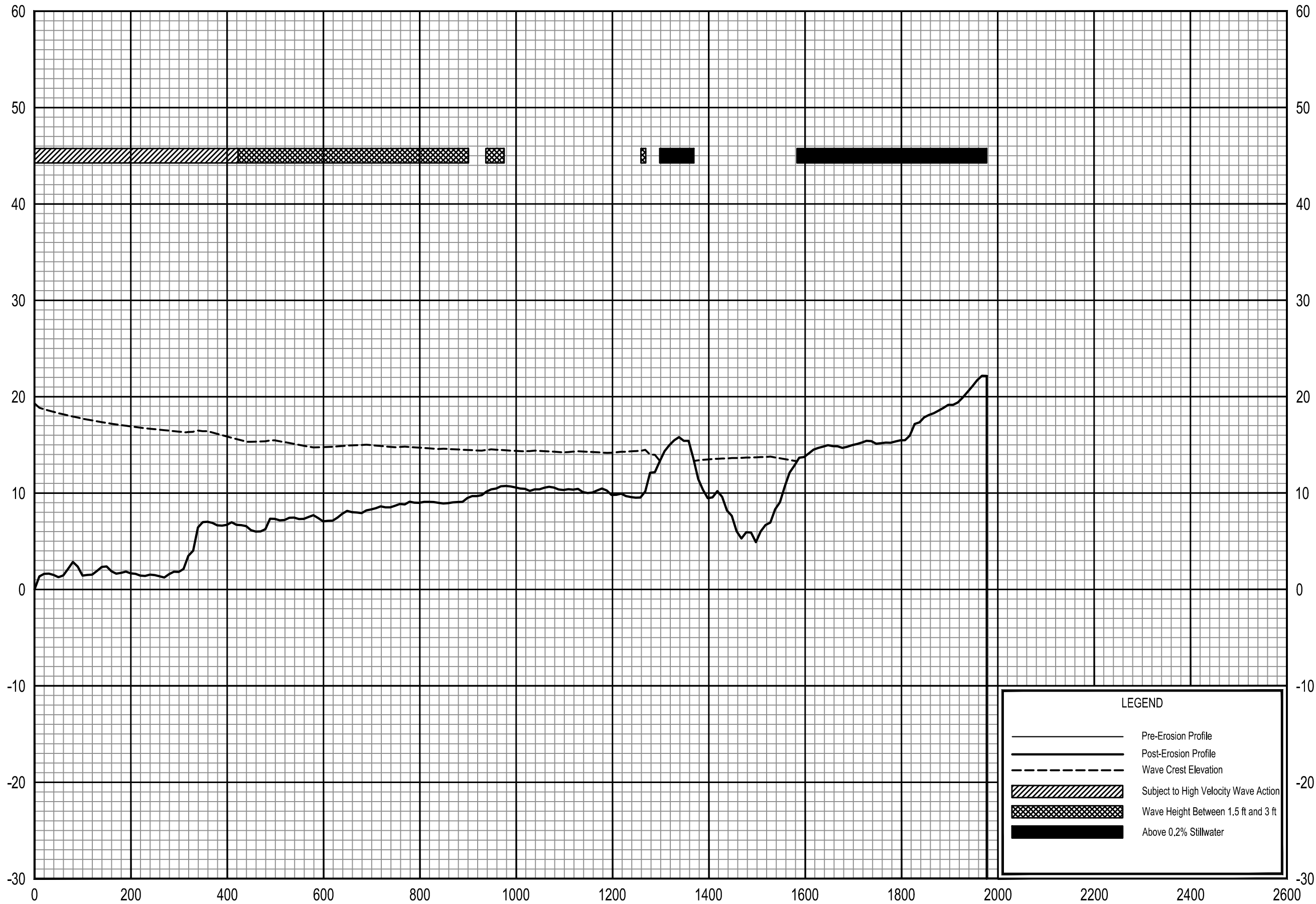
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 11

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

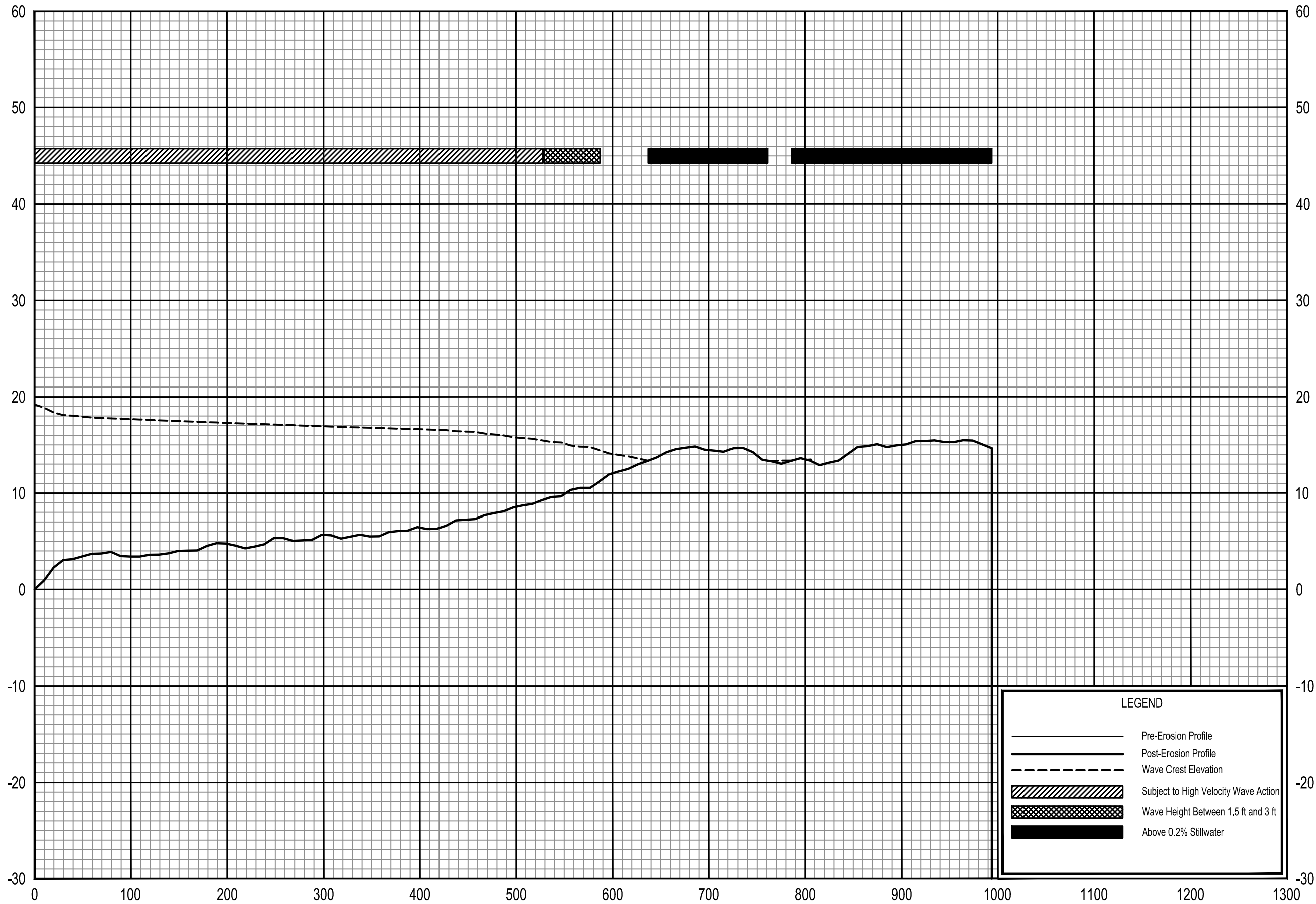
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 12

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

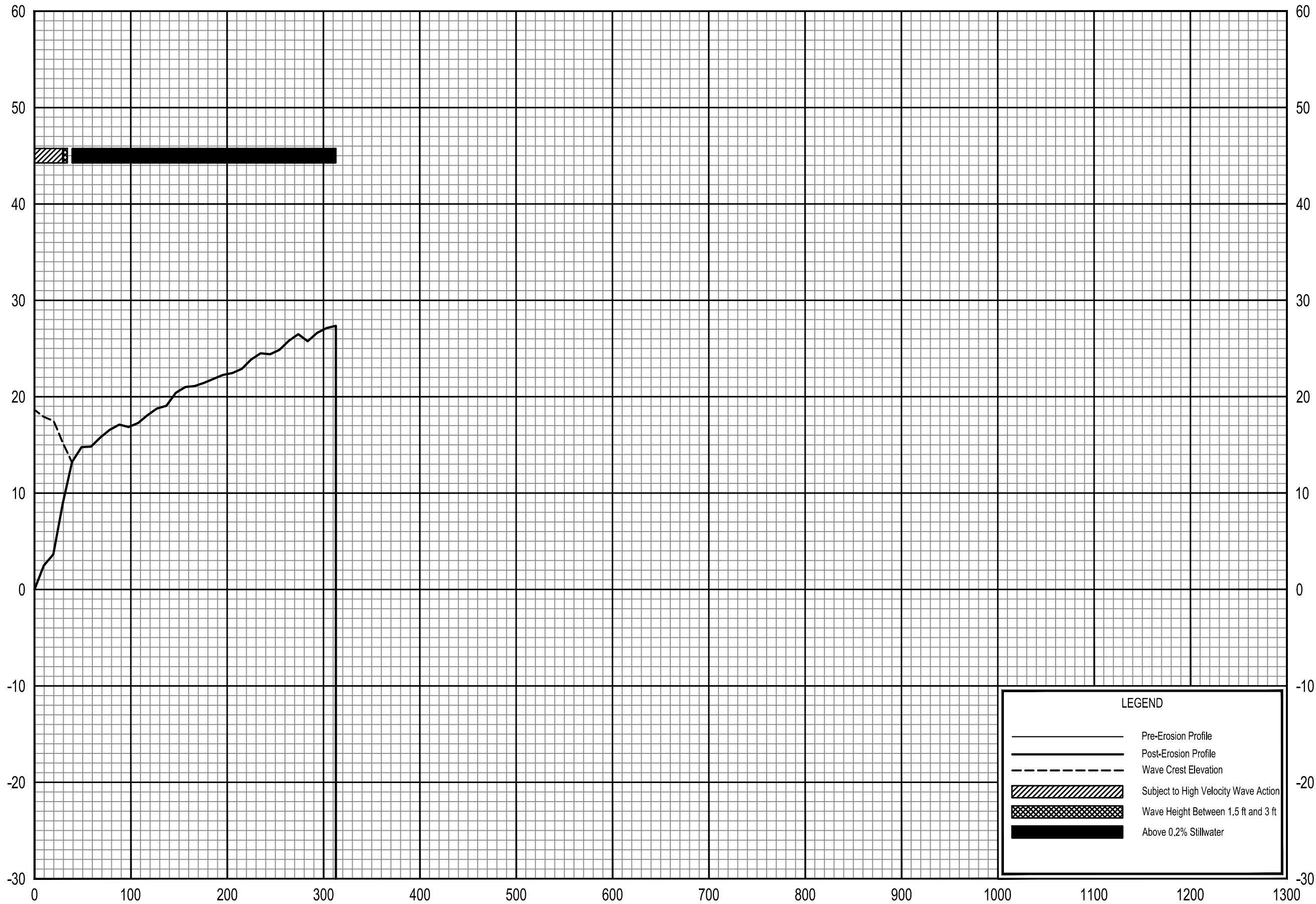
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 13

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

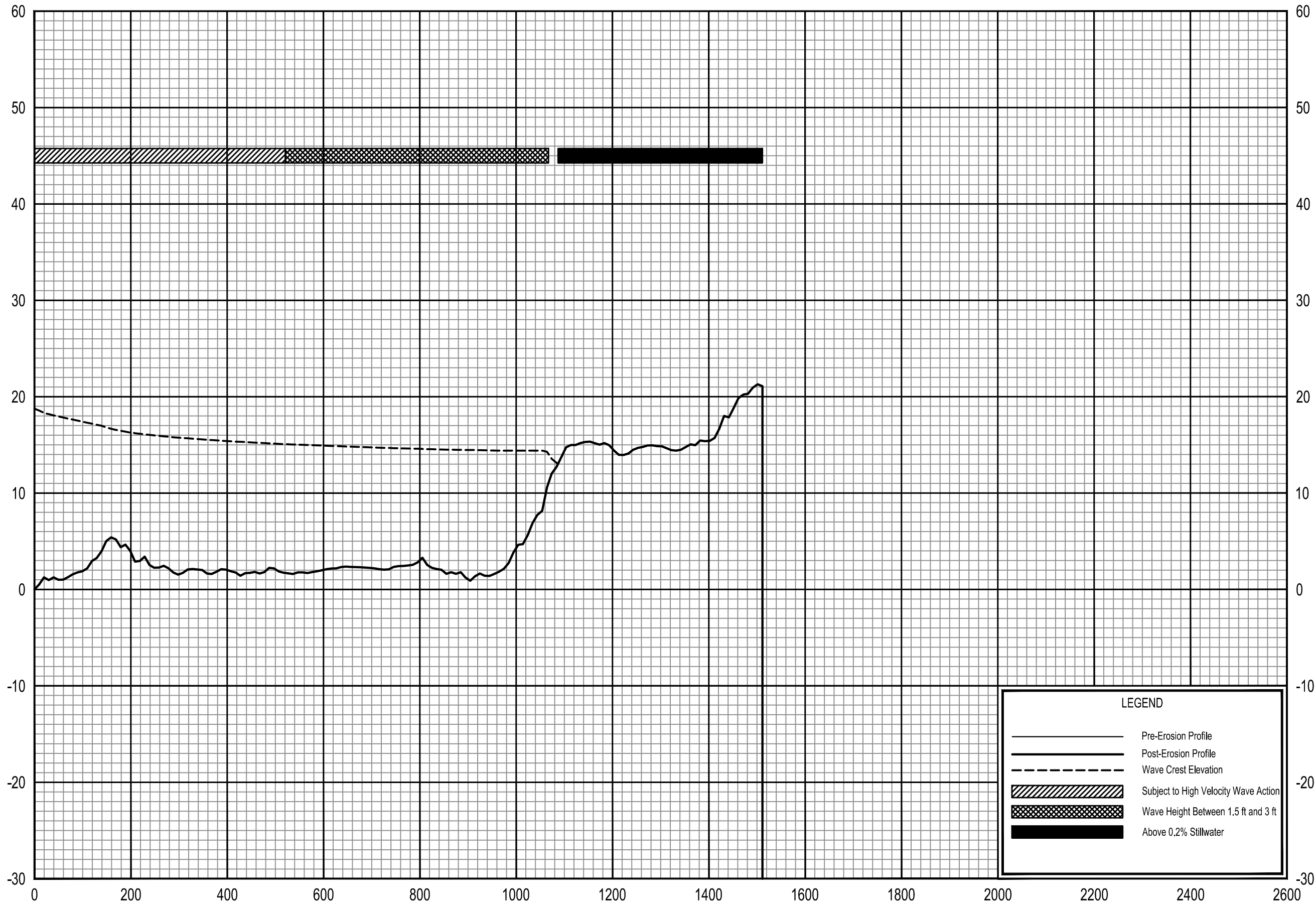
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 14

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

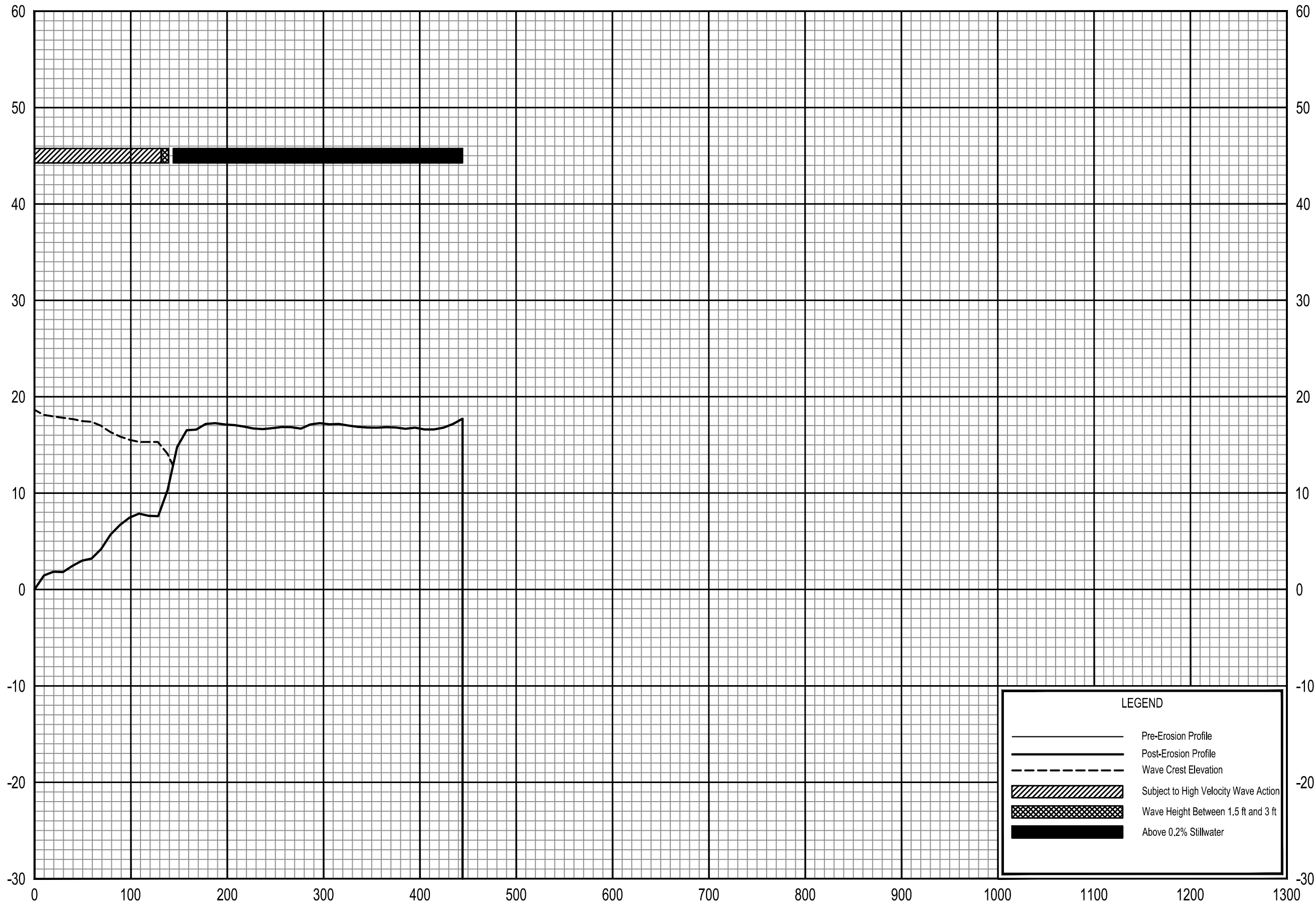
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 15

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

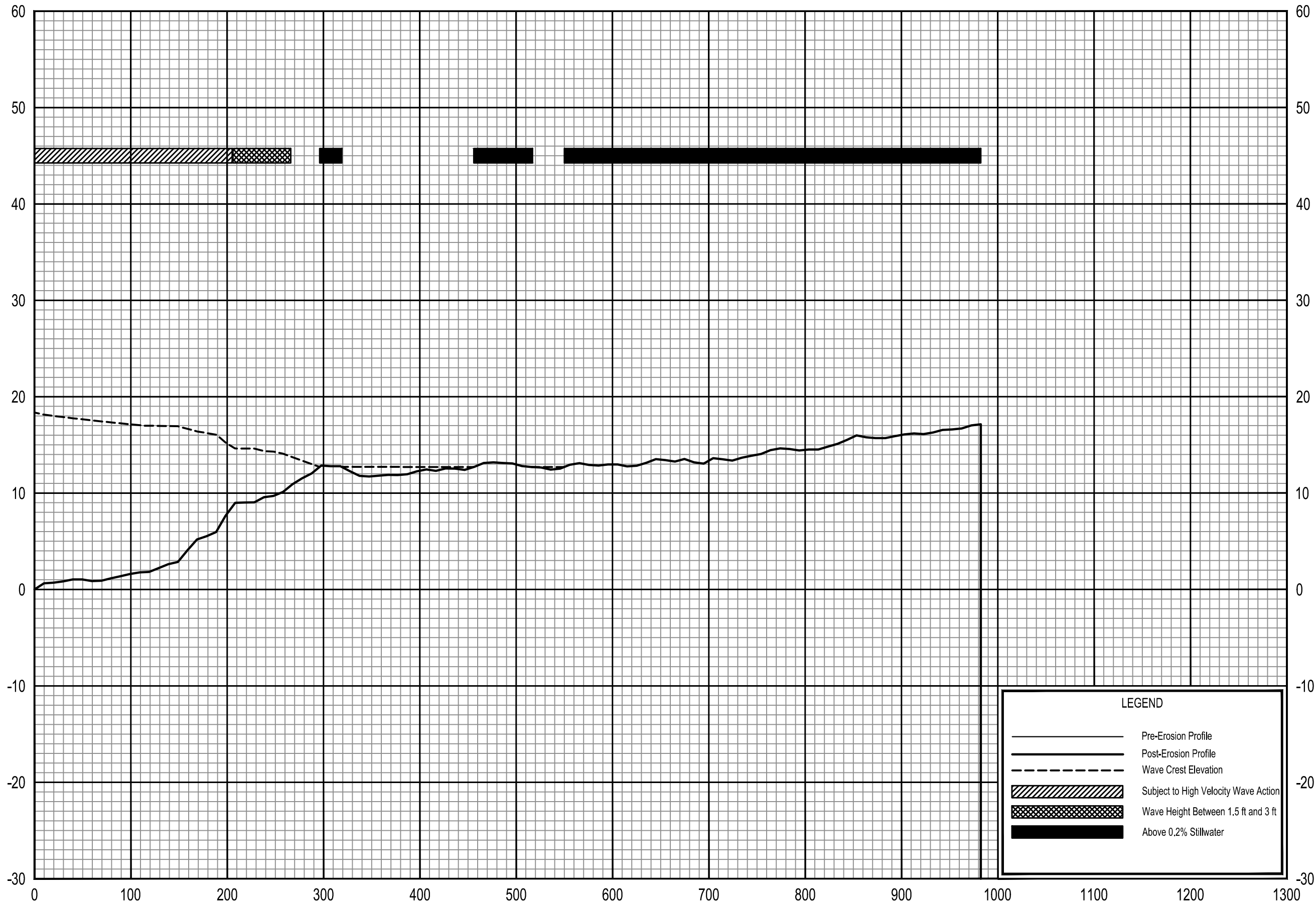
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 16

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

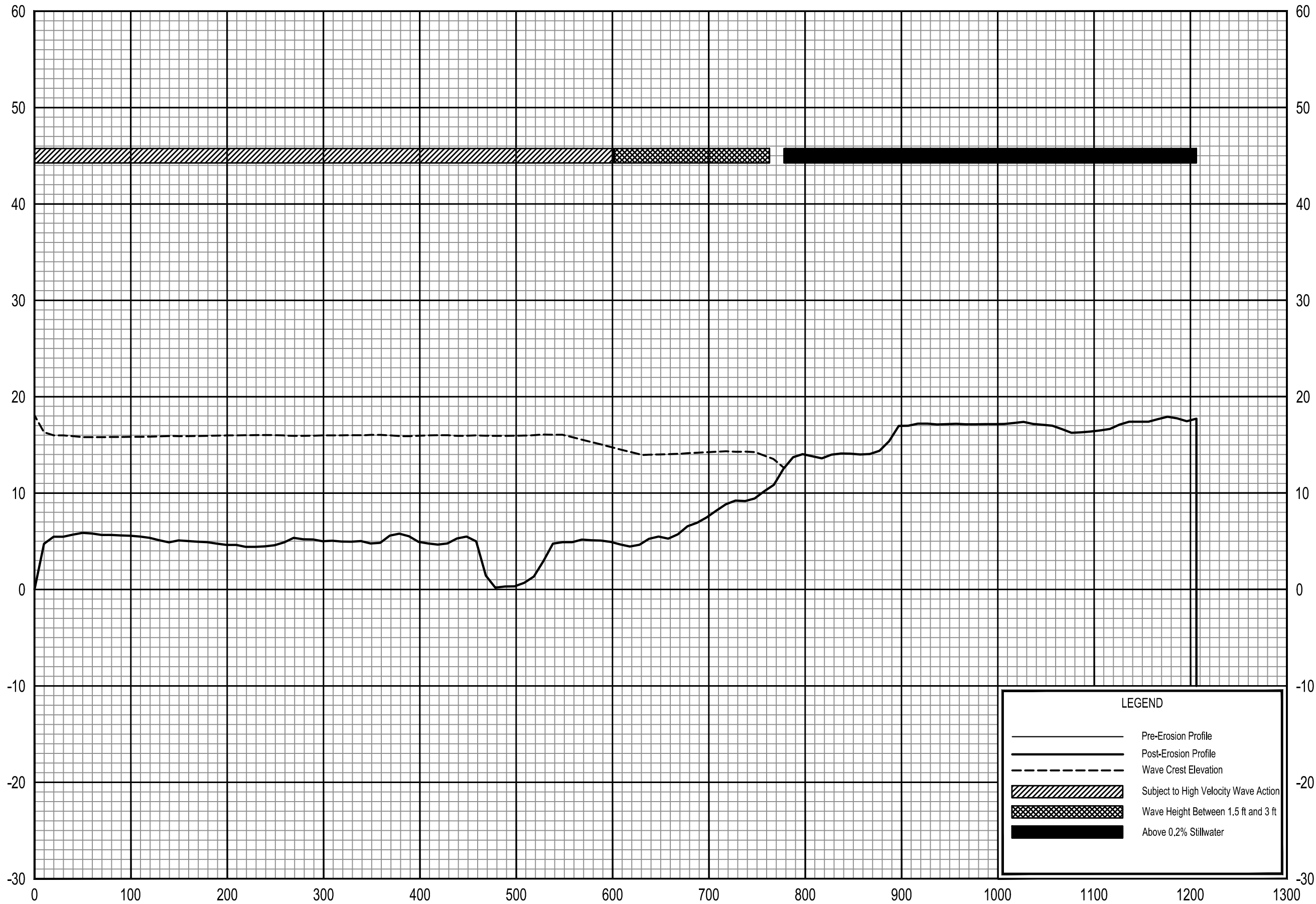
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 17

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

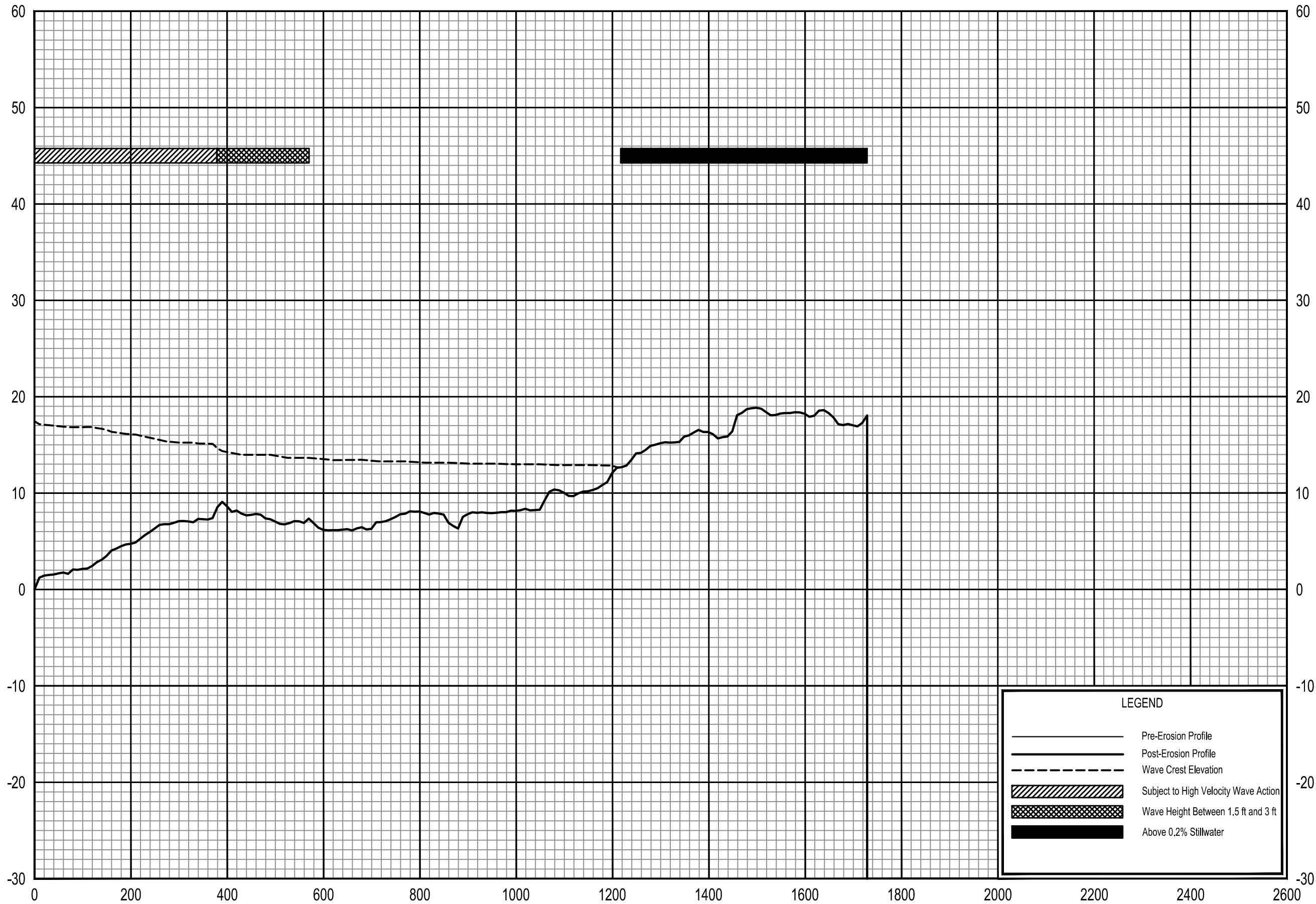
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 18

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

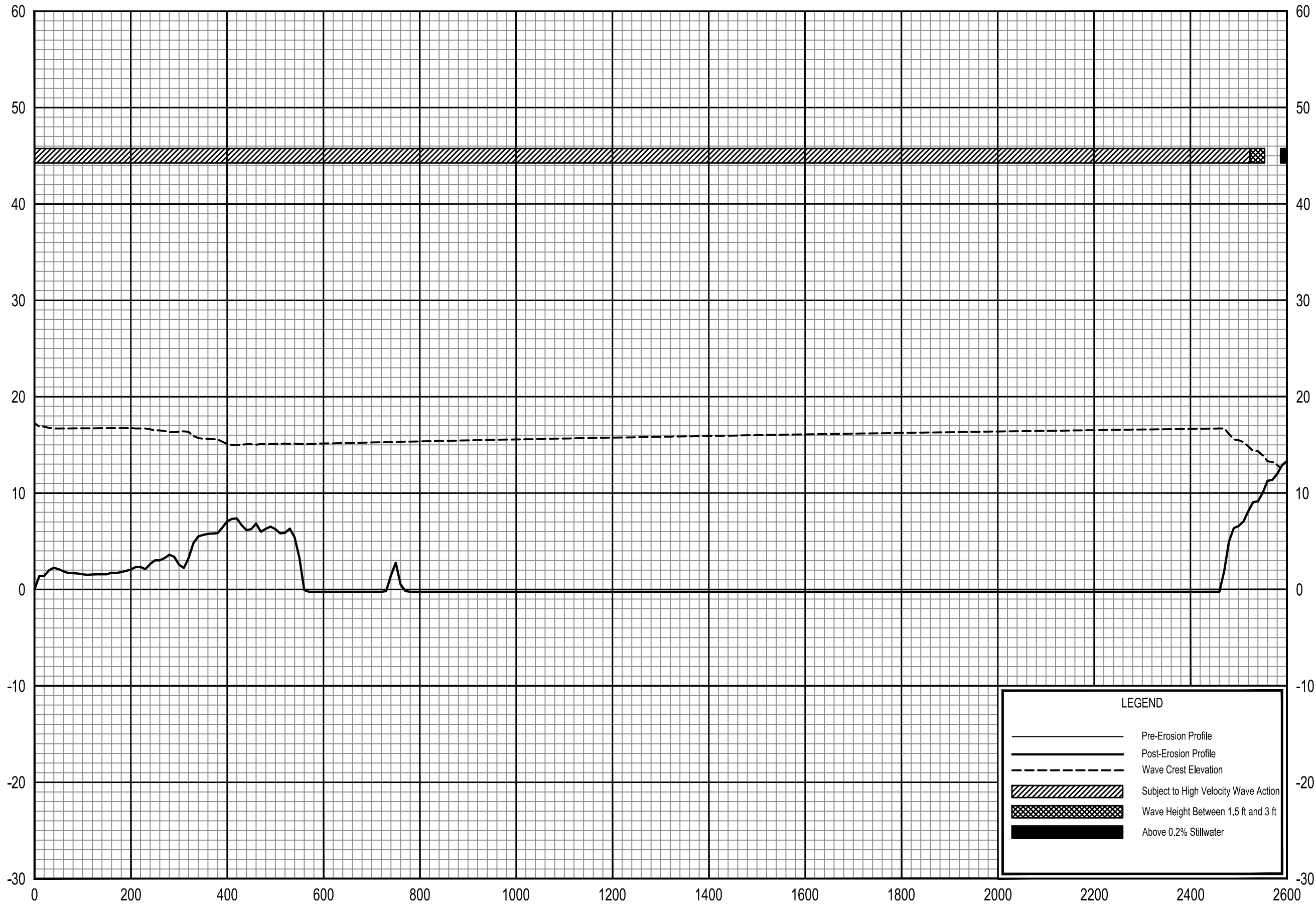
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 19

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



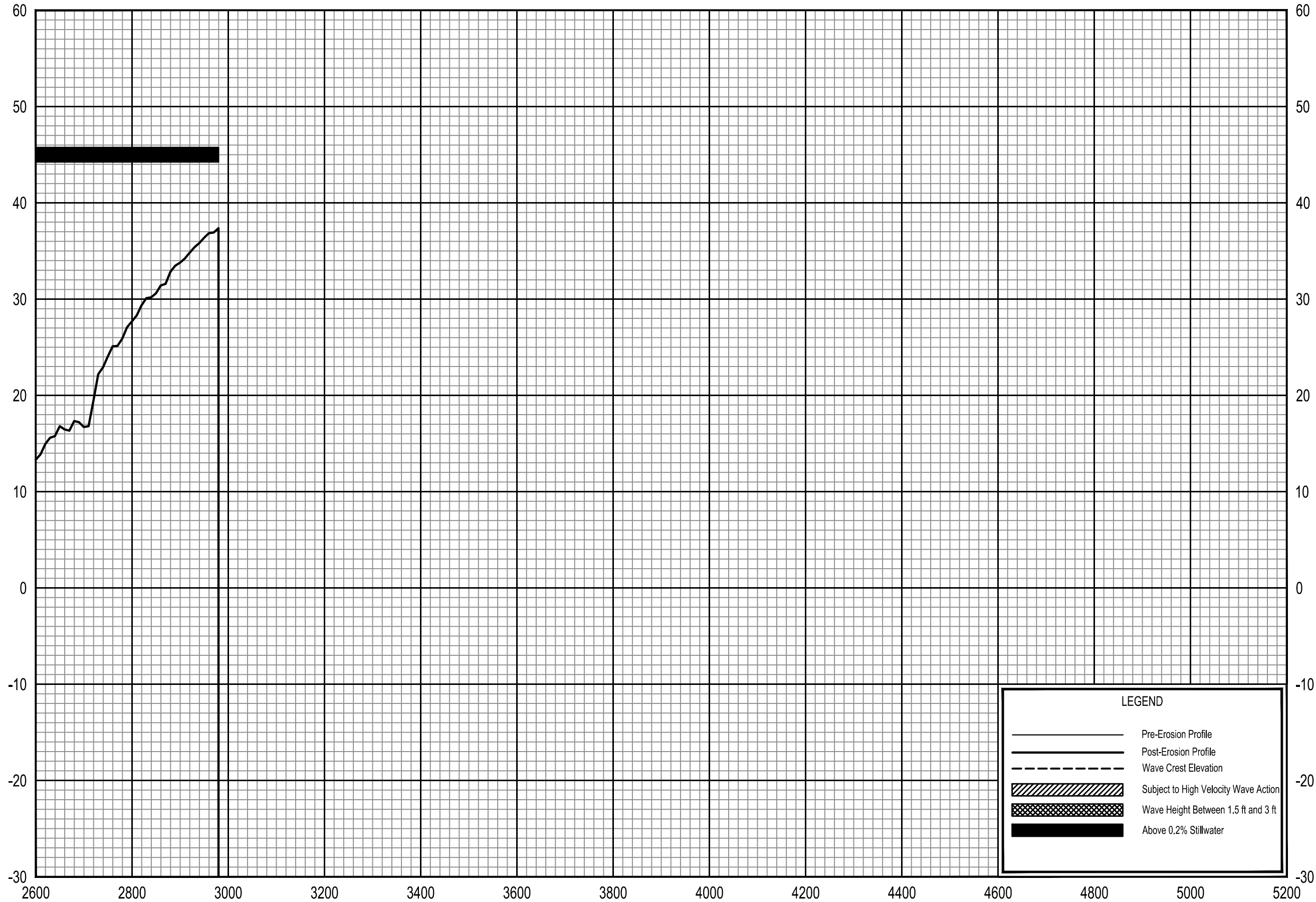
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 20

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



TRANSECT DISTANCE IN FEET FROM SHORELINE

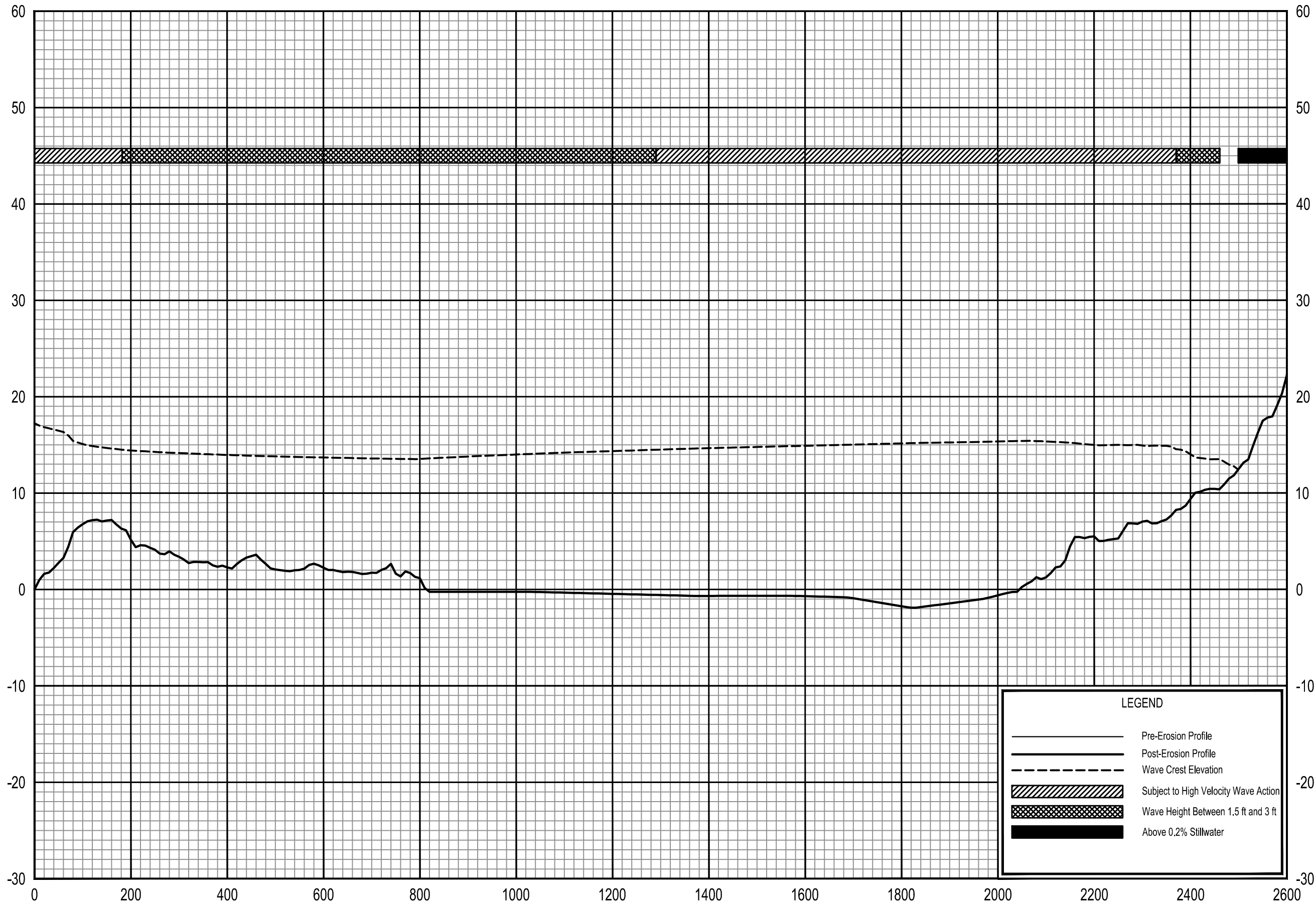
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 20

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

30 T

ELEVATION IN FEET (NAVD 88)



LEGEND

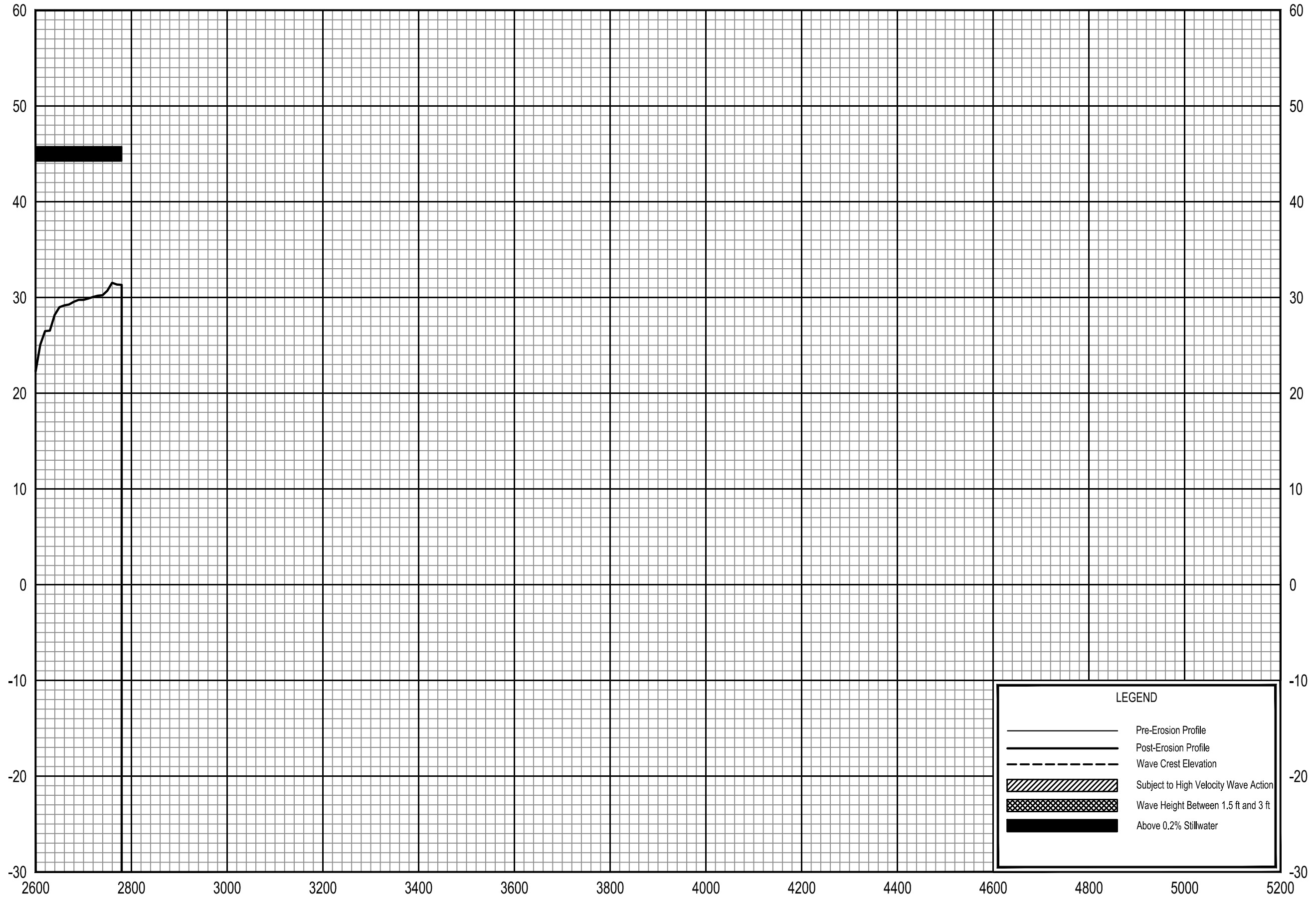
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 21

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



TRANSECT DISTANCE IN FEET FROM SHORELINE

LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

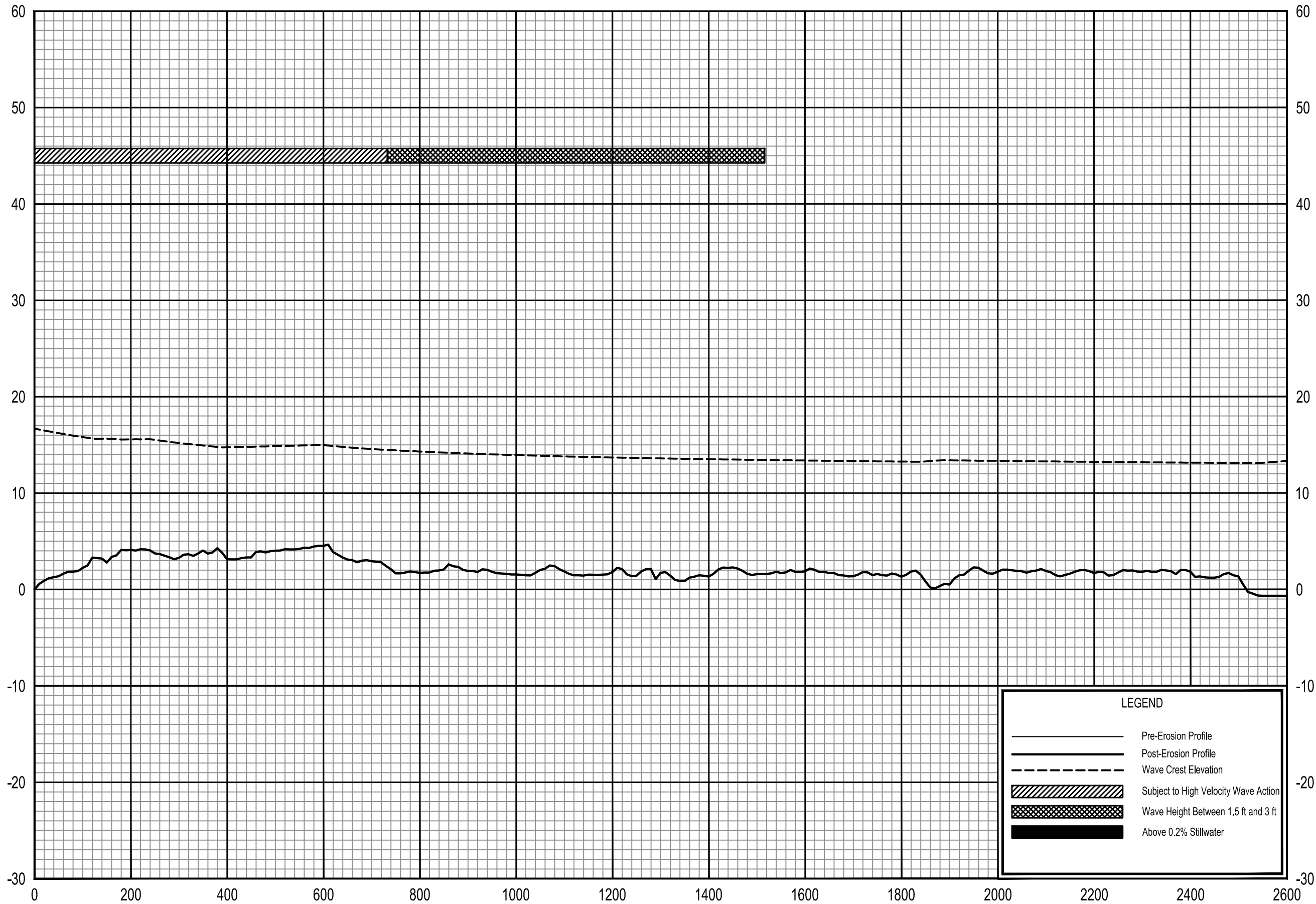
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 21

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

32 T

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

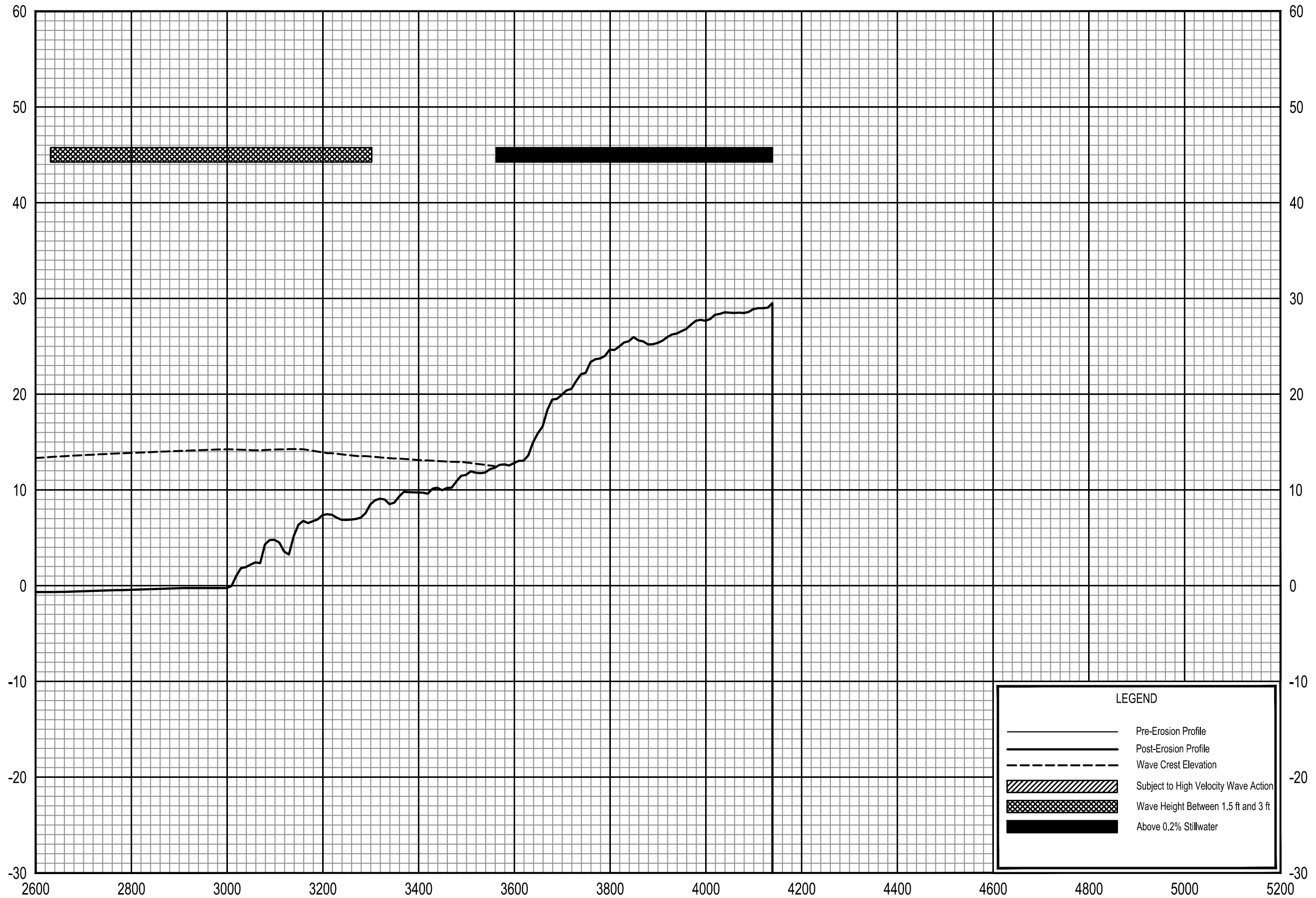
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 22

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

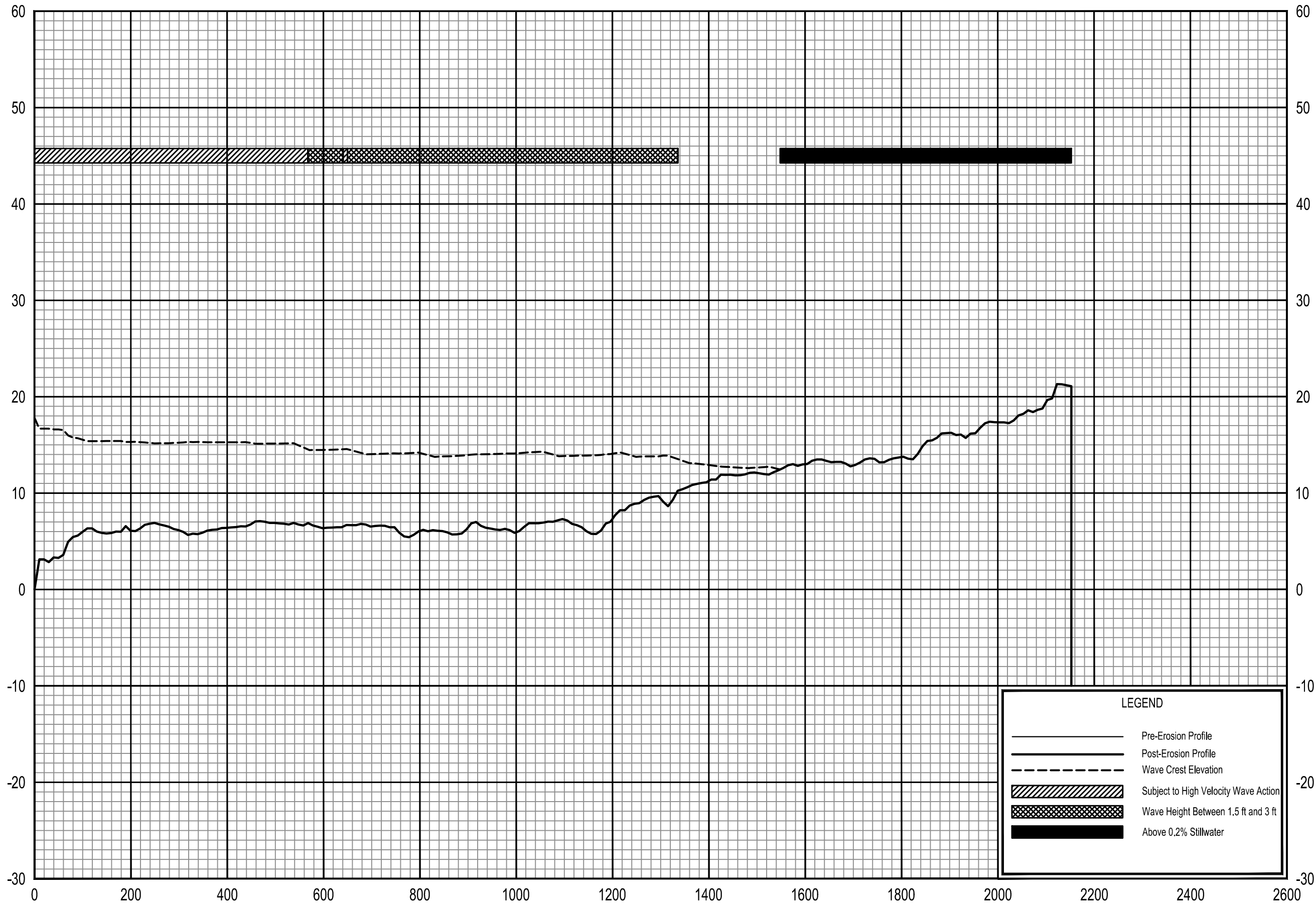
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 22

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

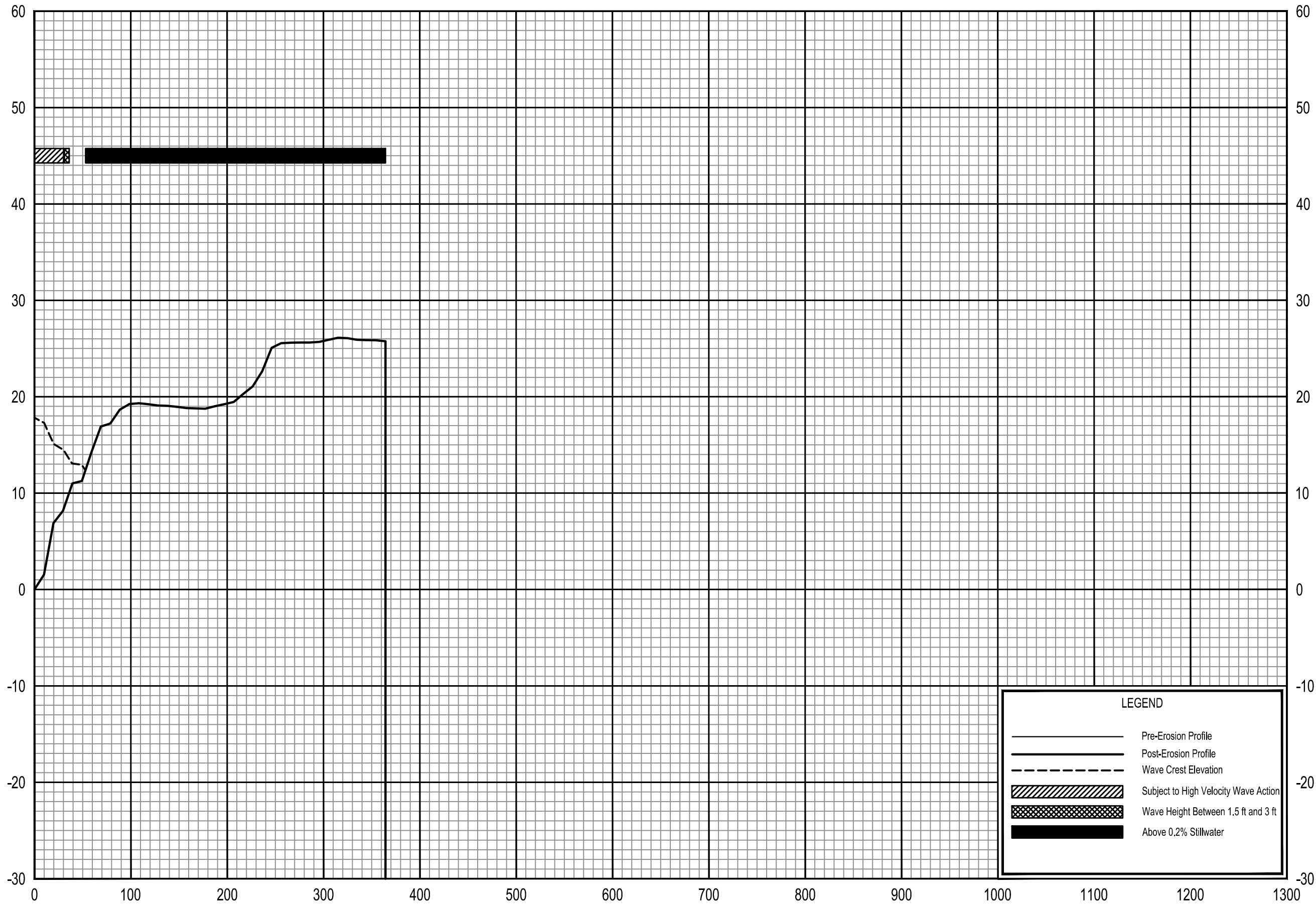
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 23

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

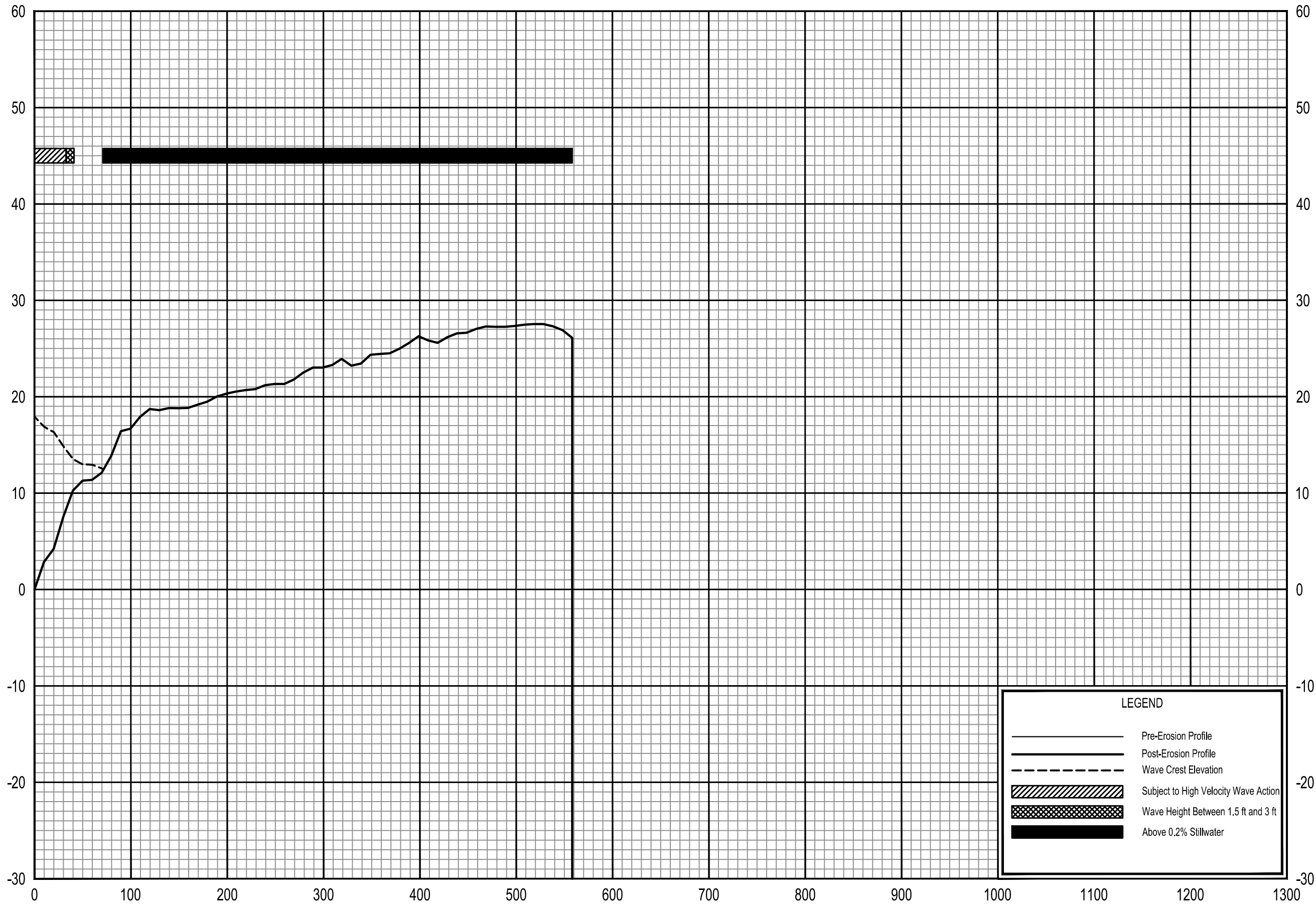
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 24

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

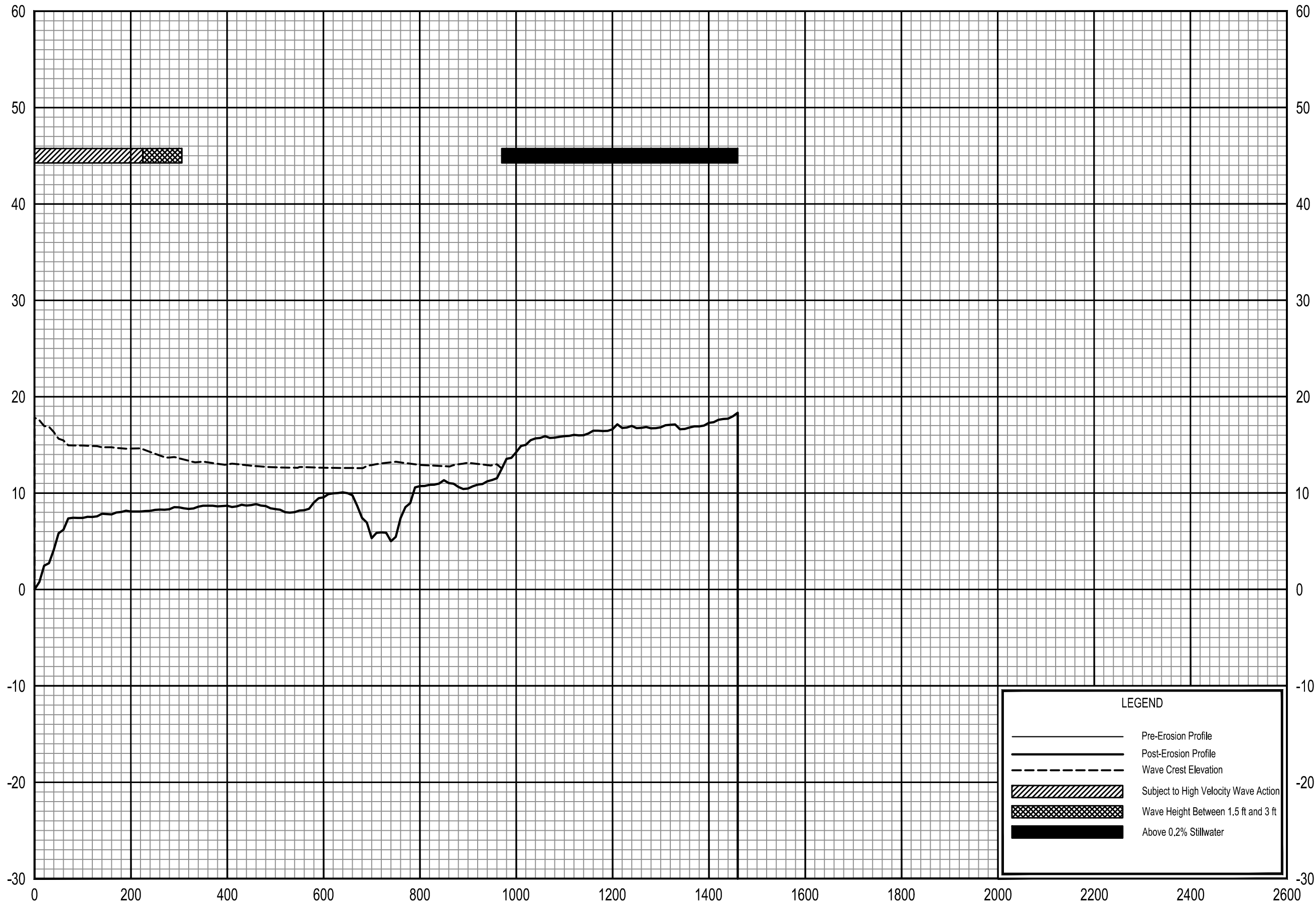
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 25

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



TRANSECT DISTANCE IN FEET FROM SHORELINE

LEGEND

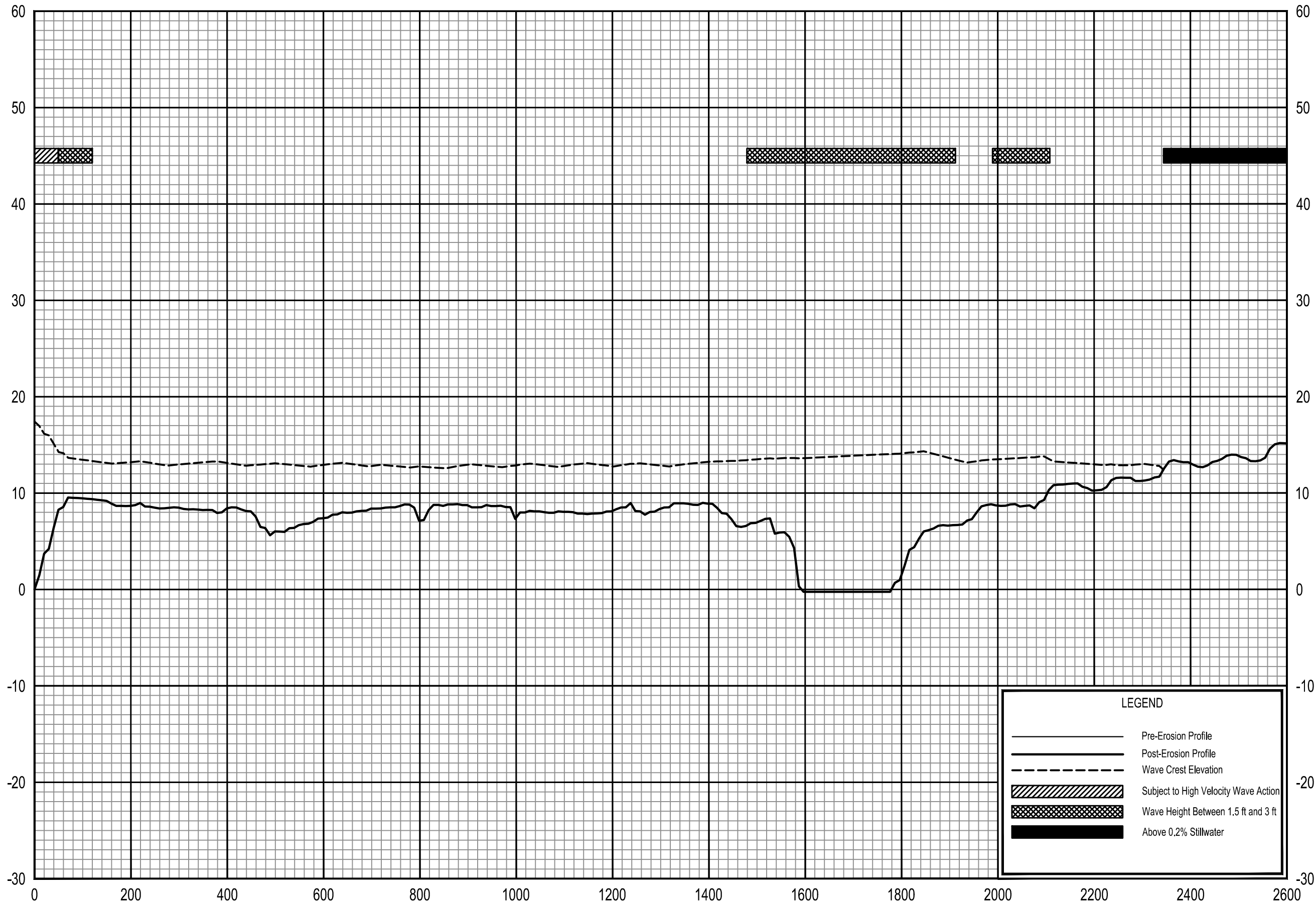
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 26

ELEVATION IN FEET (NAVD 88)



LEGEND

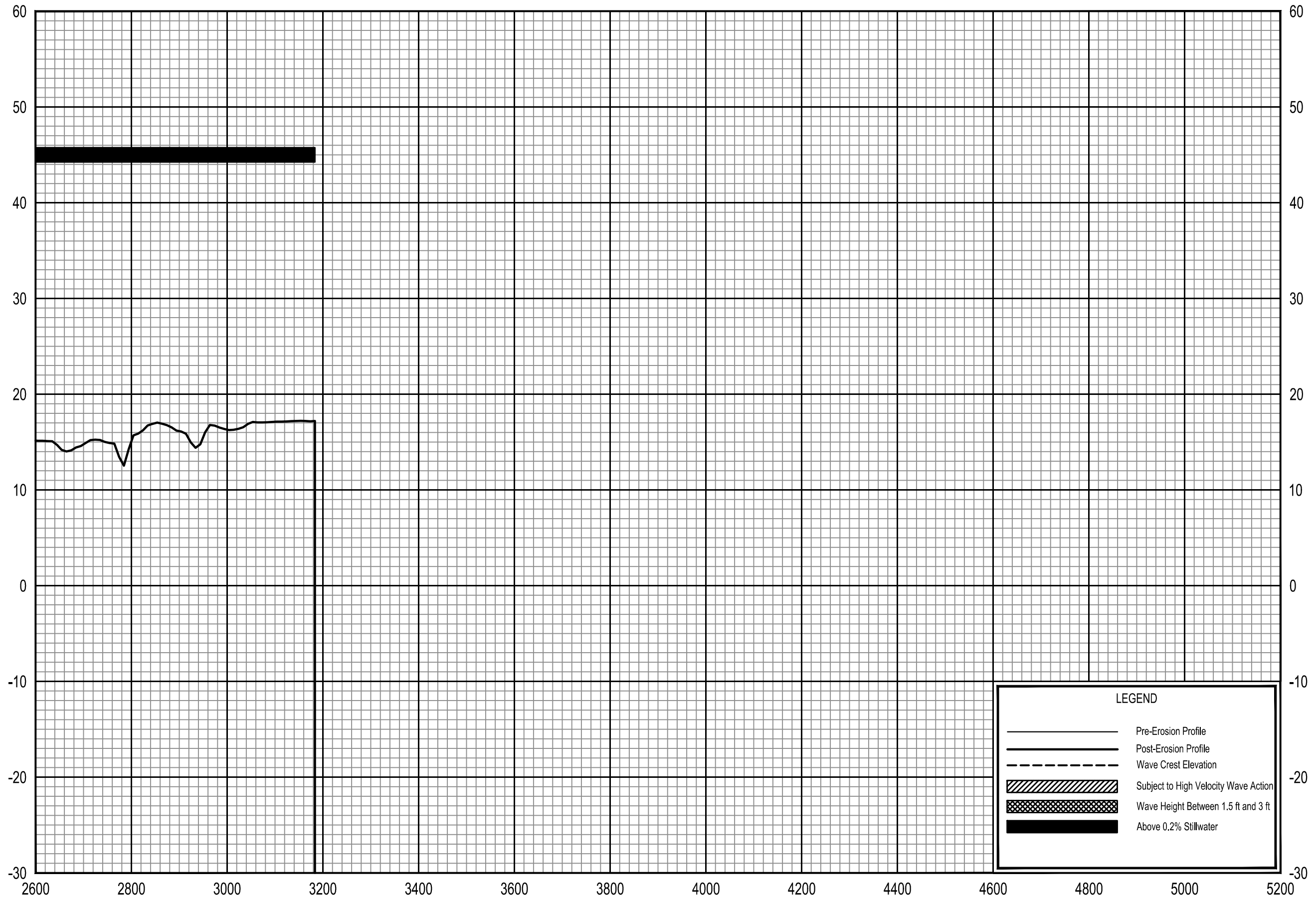
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 27

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



TRANSECT DISTANCE IN FEET FROM SHORELINE

LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- █ Above 0.2% Stillwater

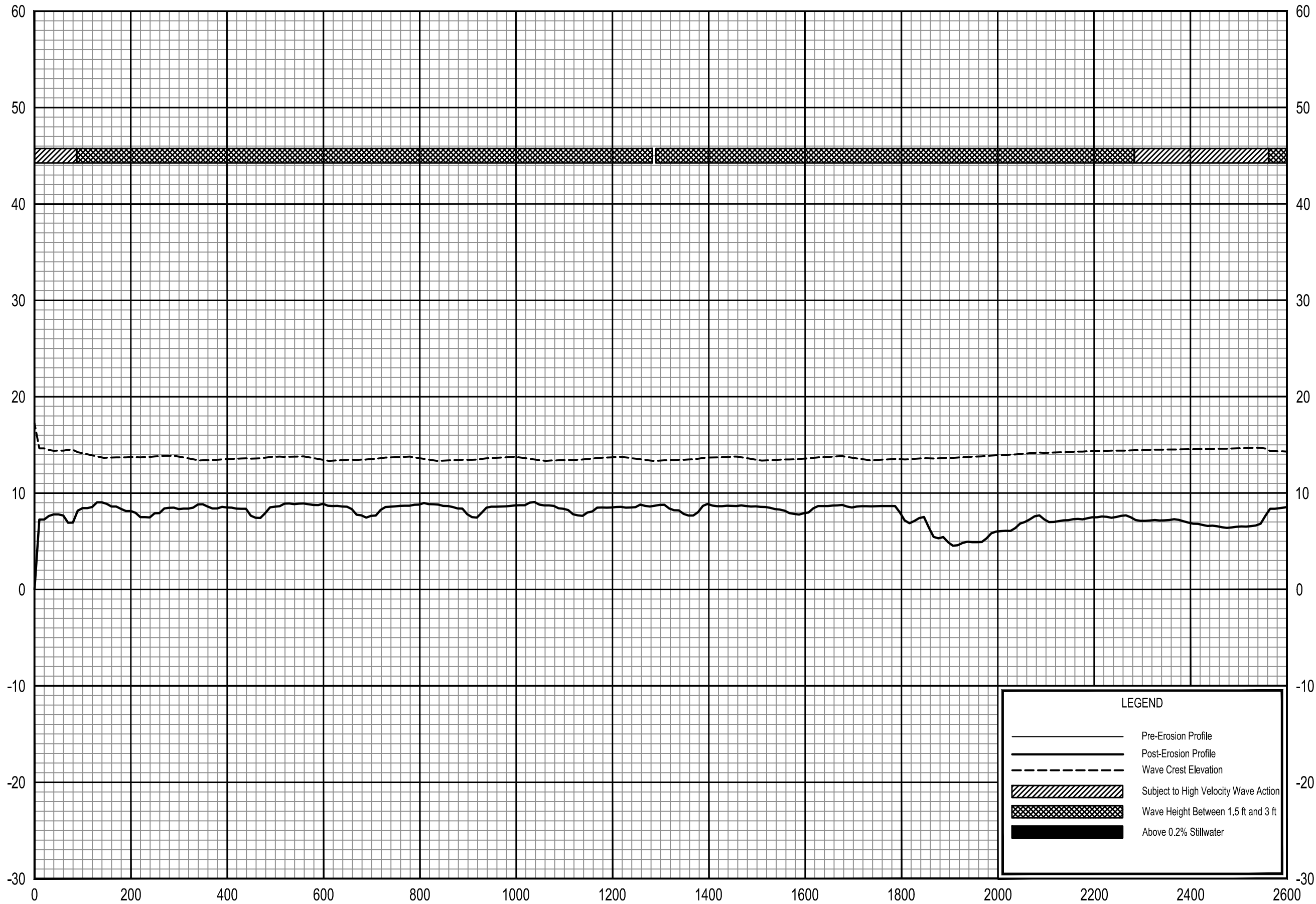
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 27

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

40 T

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

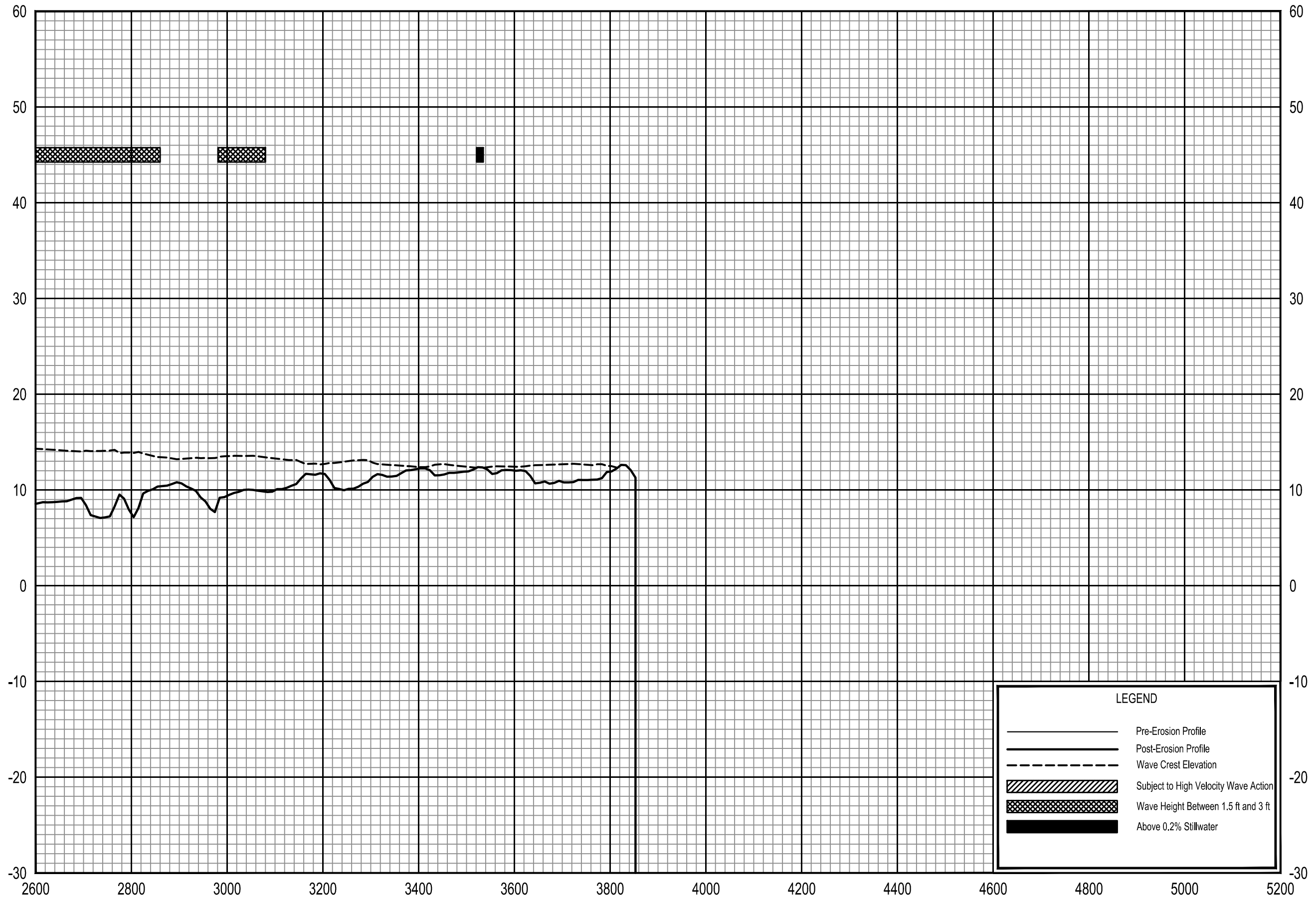
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 28

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

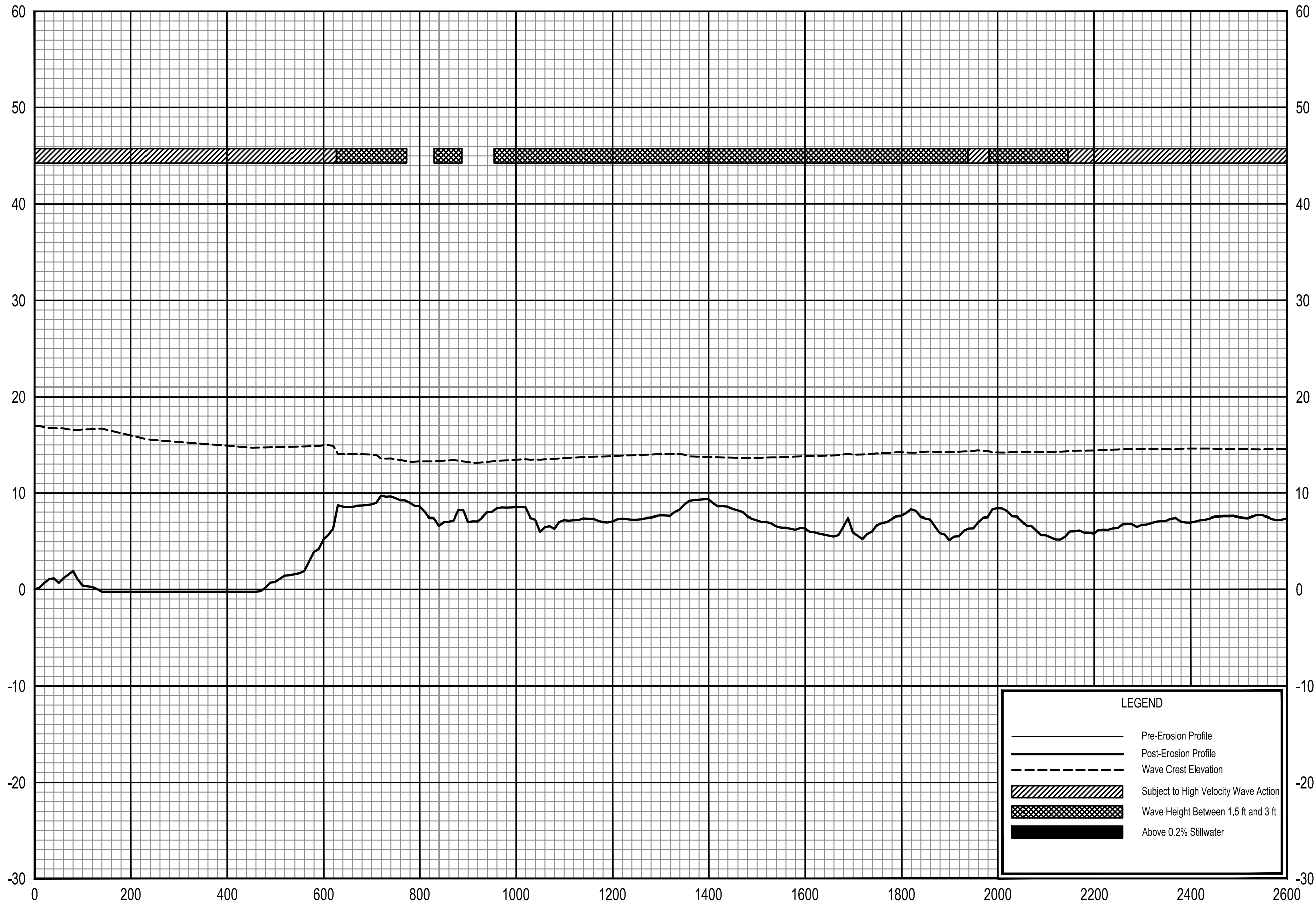
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 28

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



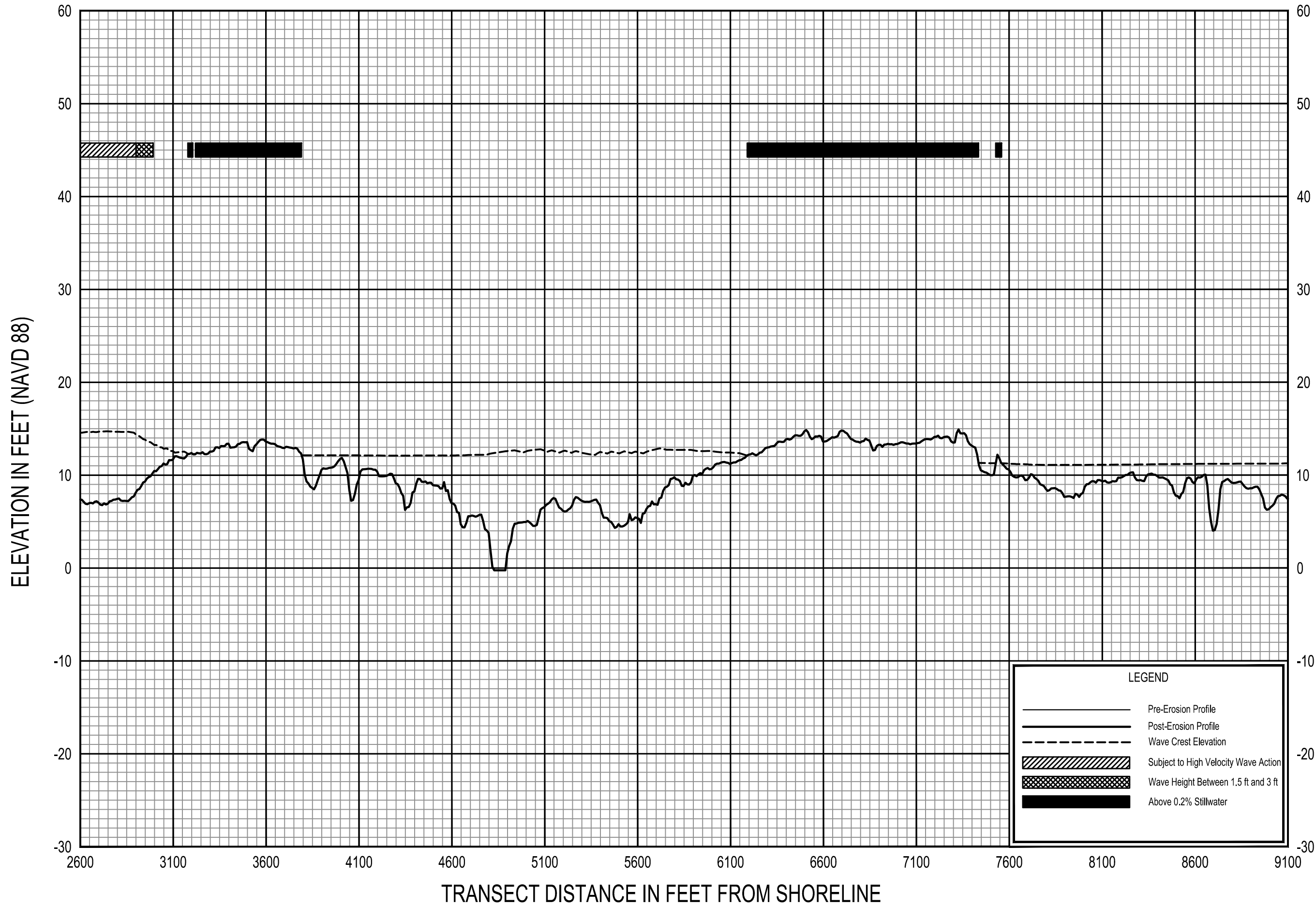
LEGEND

- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 29

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS



ELEVATION IN FEET (NAVD 88)

TRANSECT DISTANCE IN FEET FROM SHORELINE

LEGEND

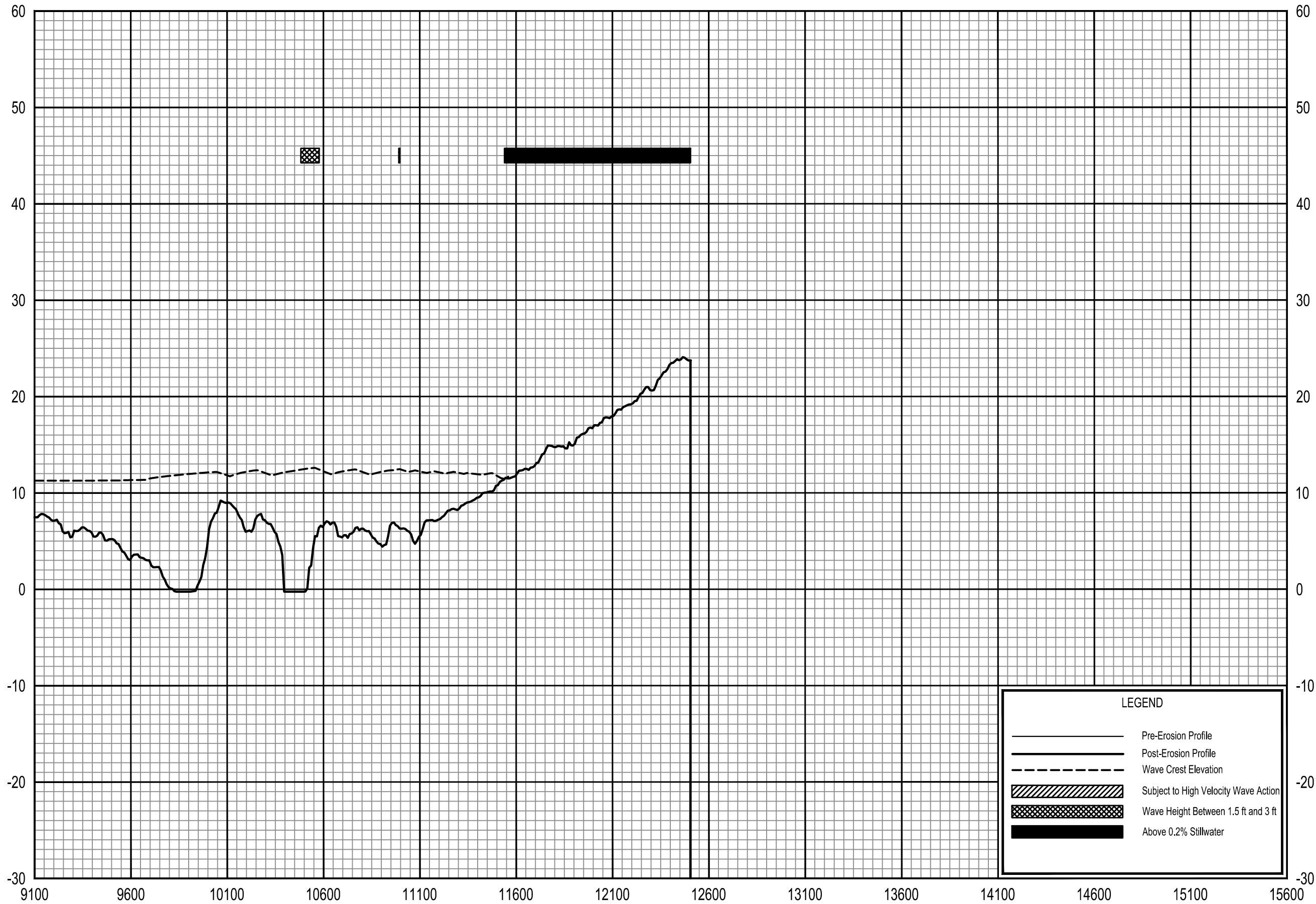
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 29

FEDERAL EMERGENCY MANAGEMENT AGENCY
 PINELLAS COUNTY, FL
 AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

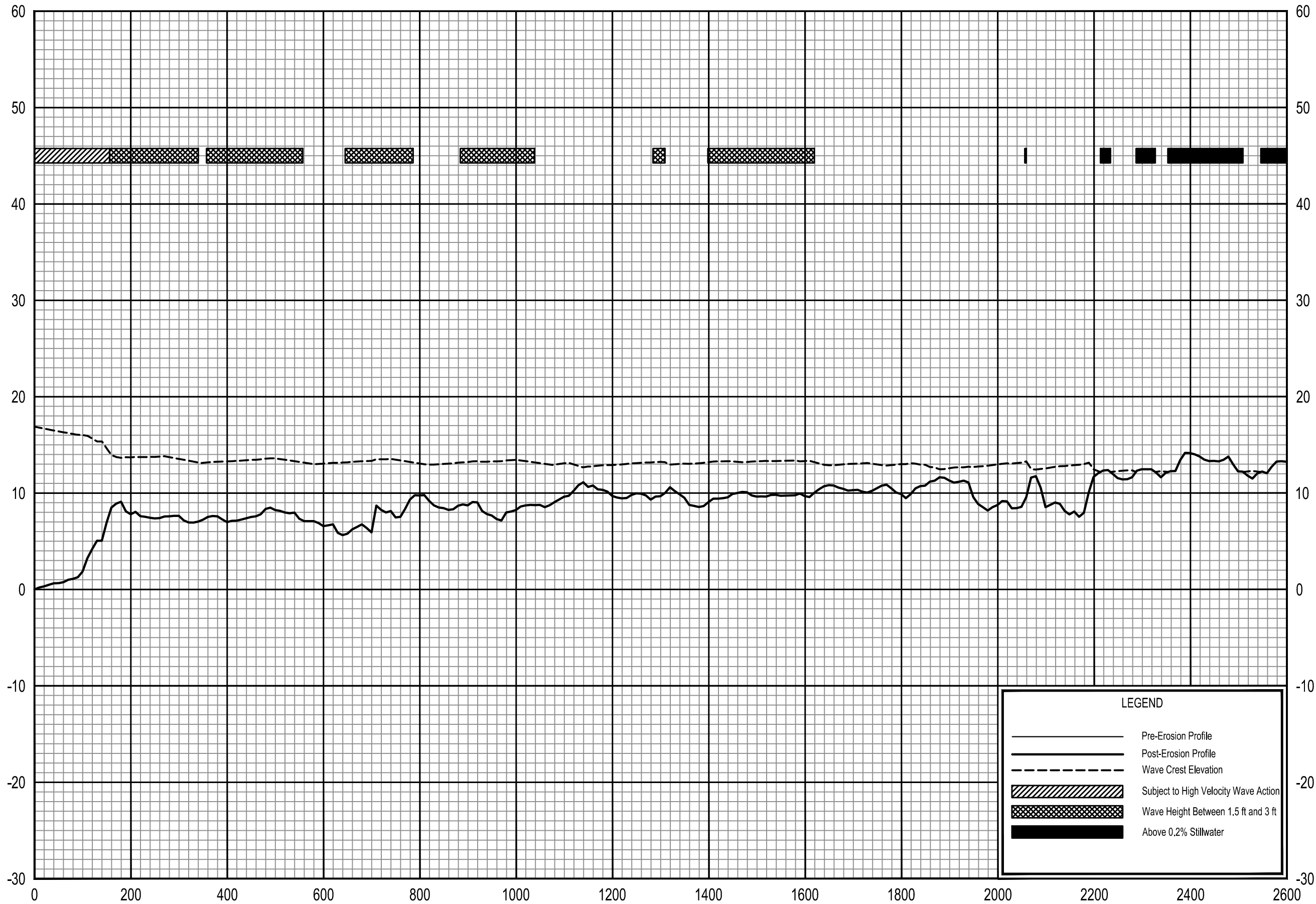
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 29

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

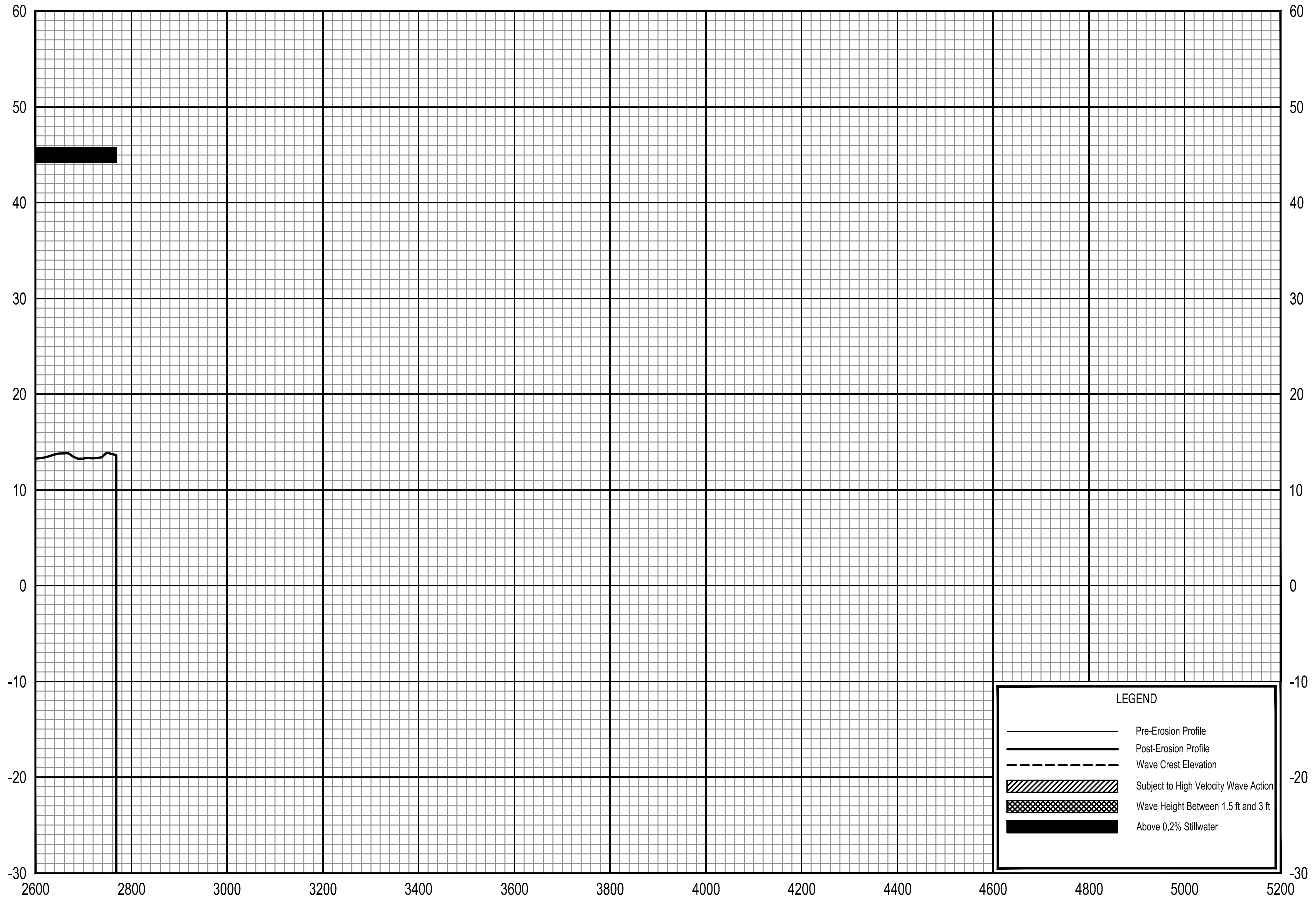
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 30

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



TRANSECT DISTANCE IN FEET FROM SHORELINE

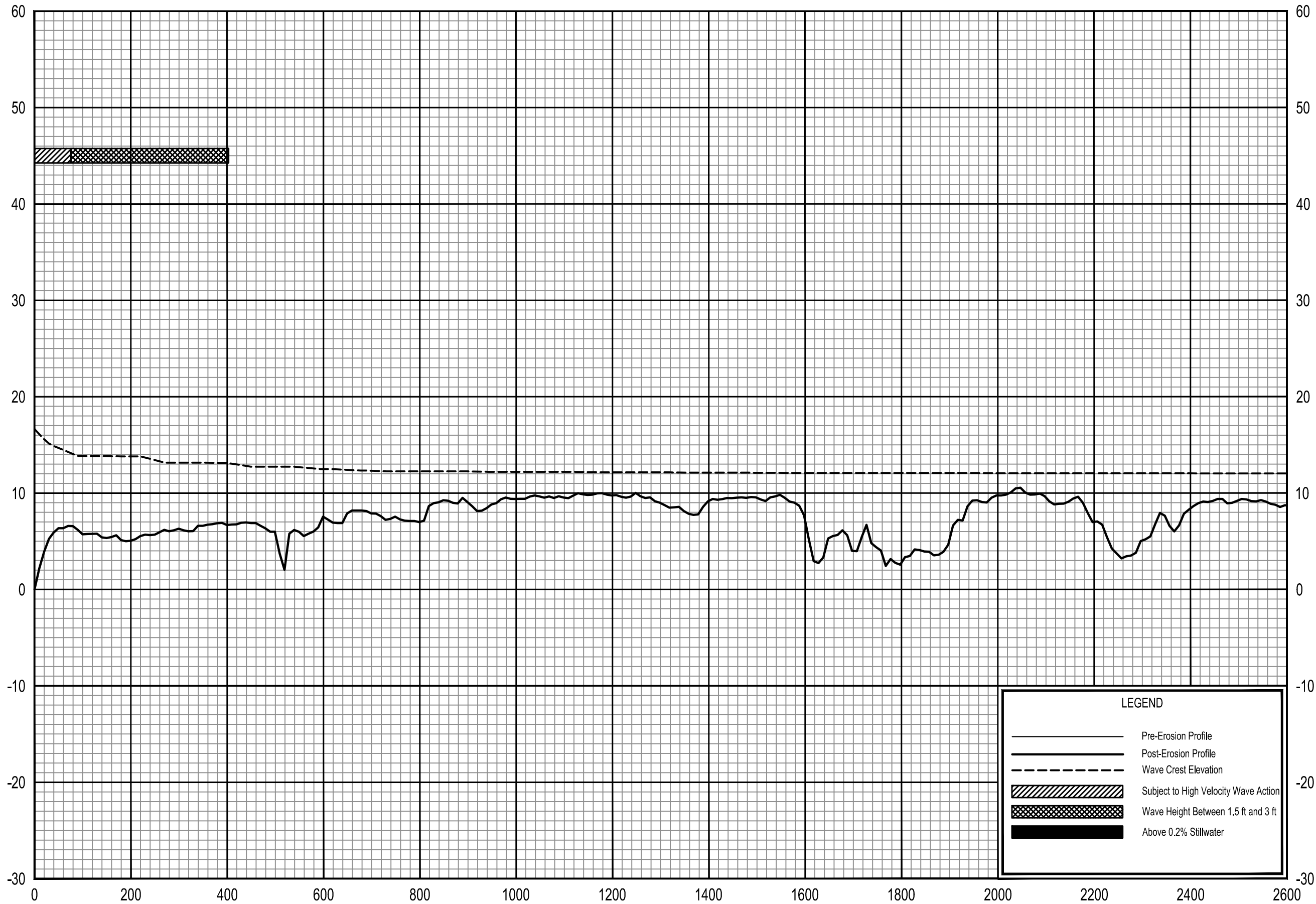
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 30

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

47 T

ELEVATION IN FEET (NAVD 88)



LEGEND

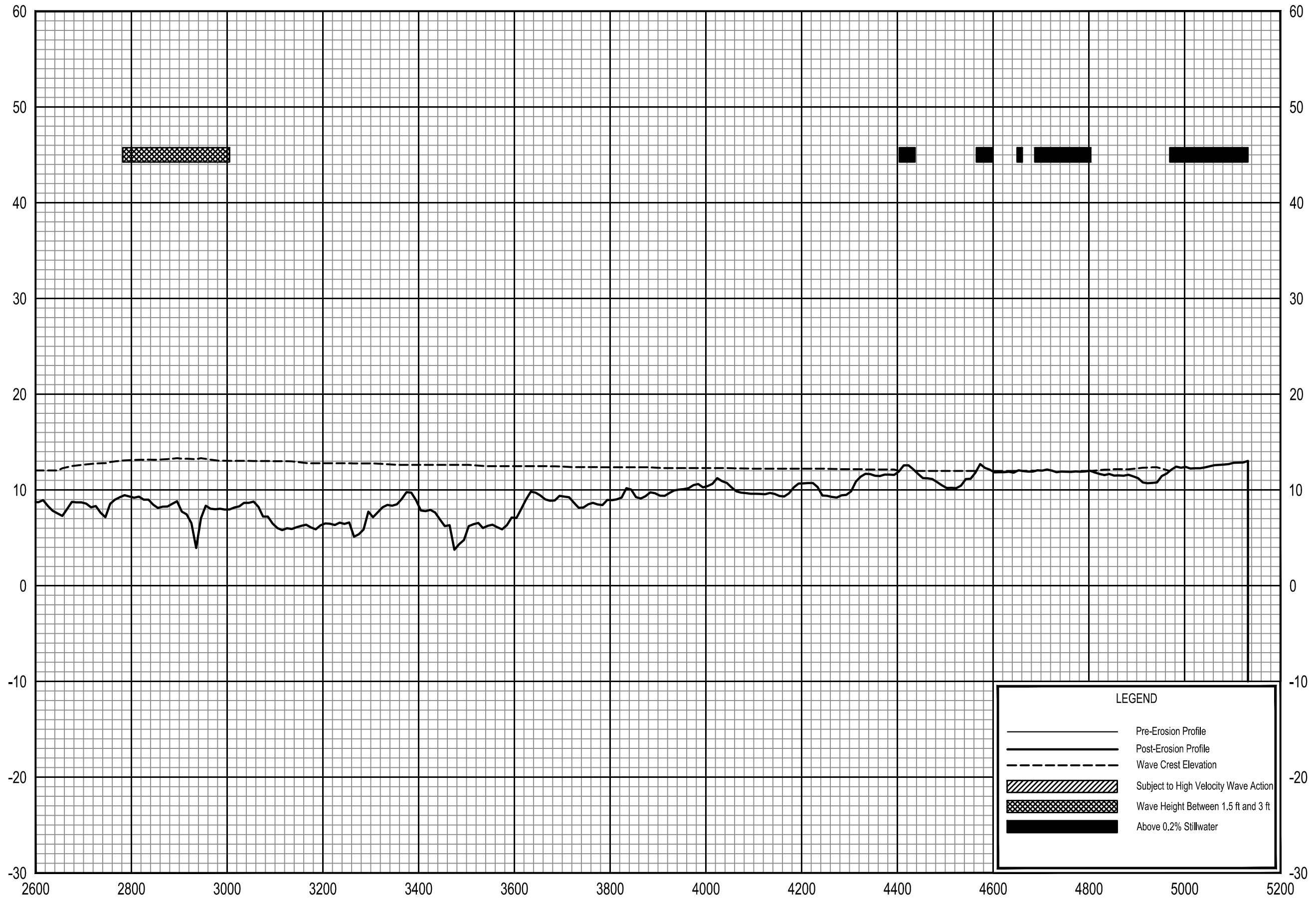
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 31

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

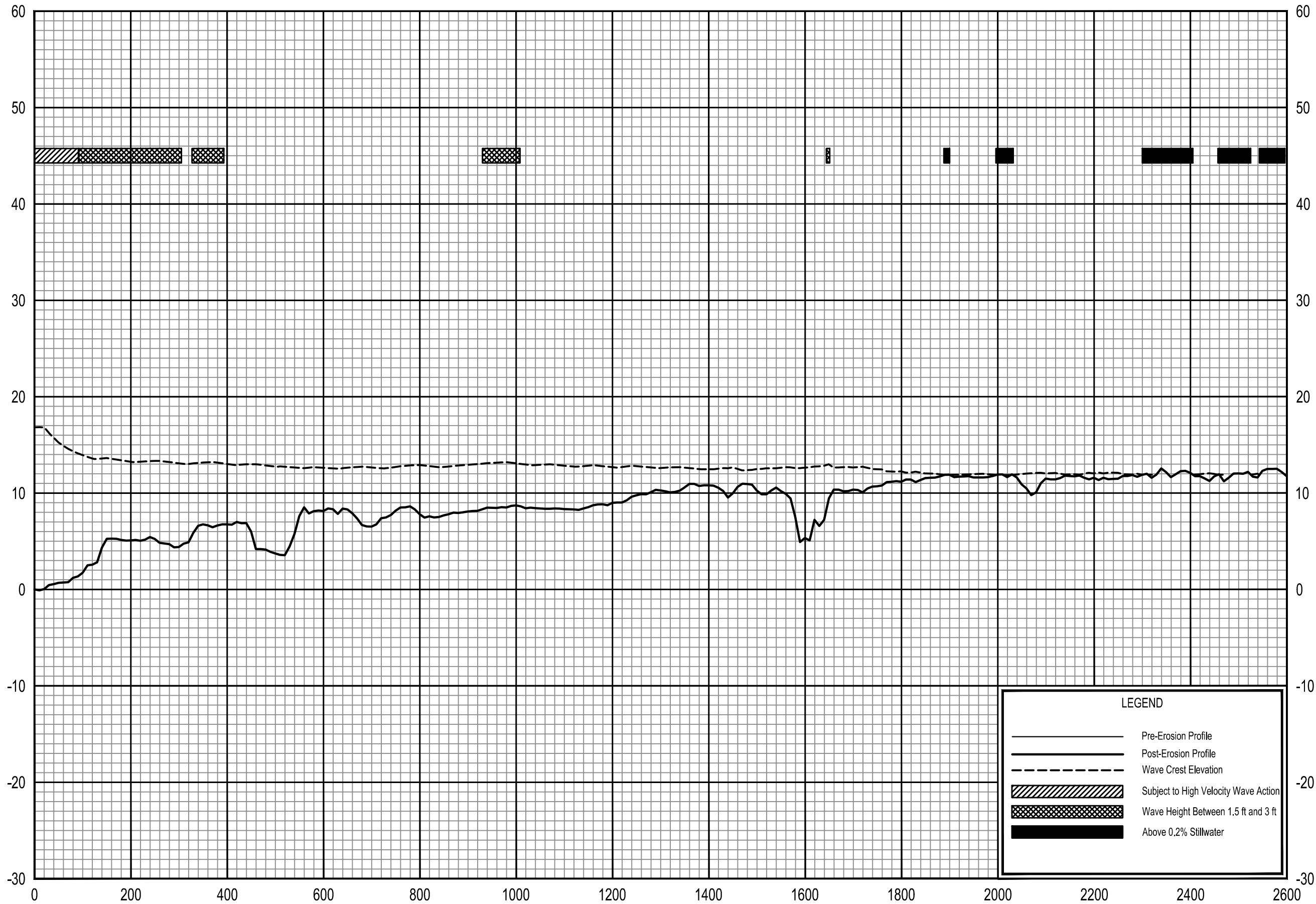
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 31

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

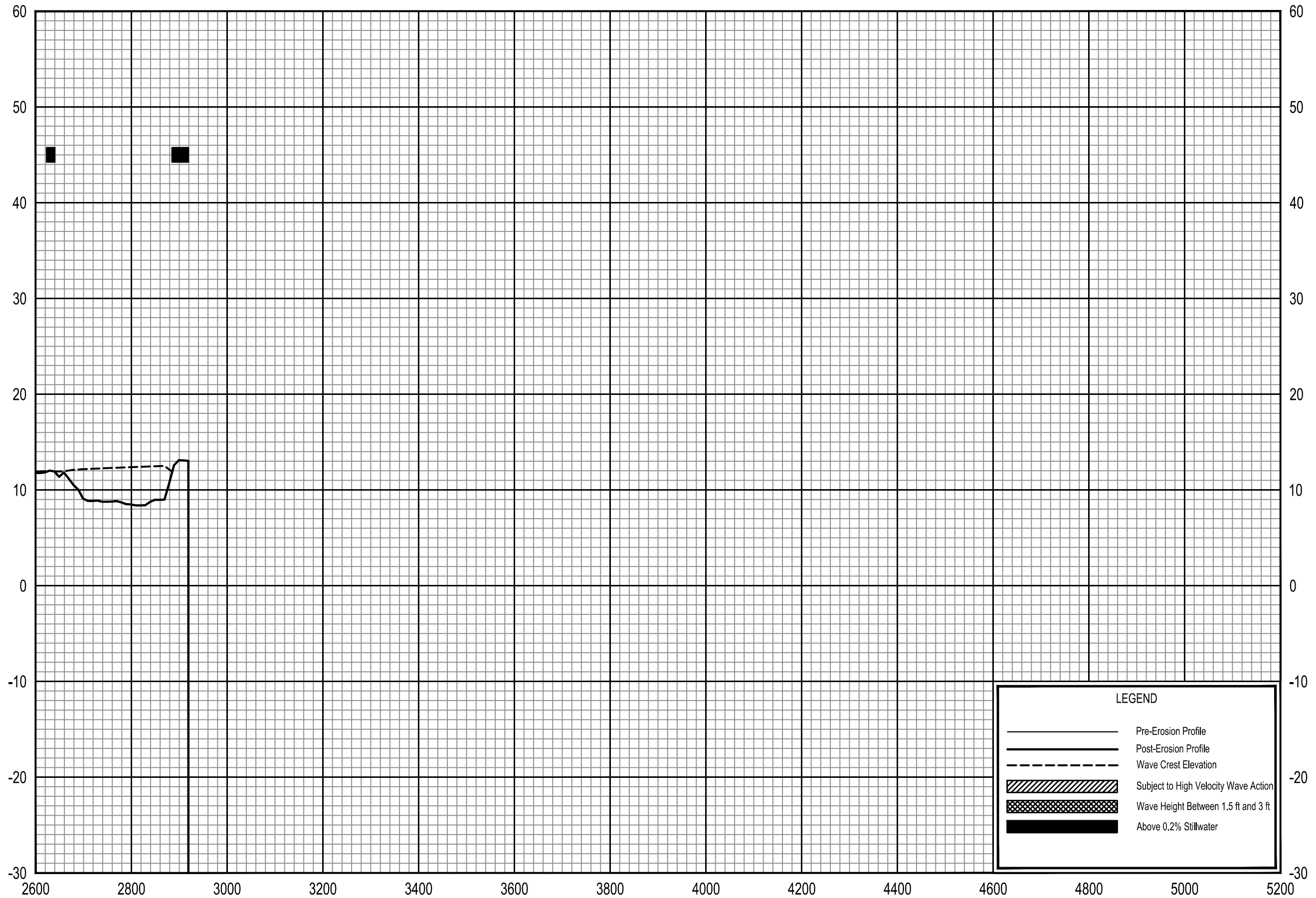
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 32

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

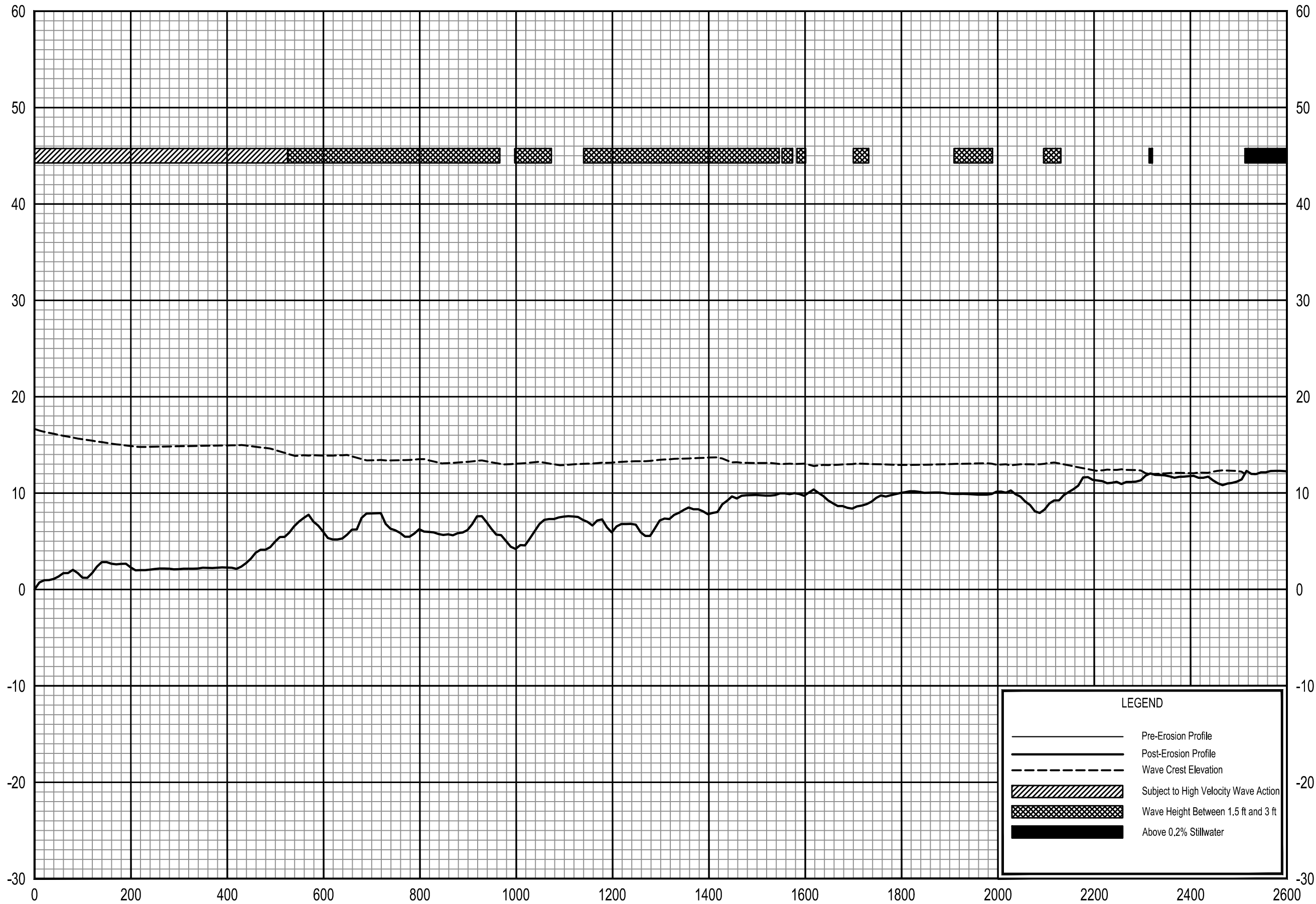
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 32

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

51 T

ELEVATION IN FEET (NAVD 88)



LEGEND

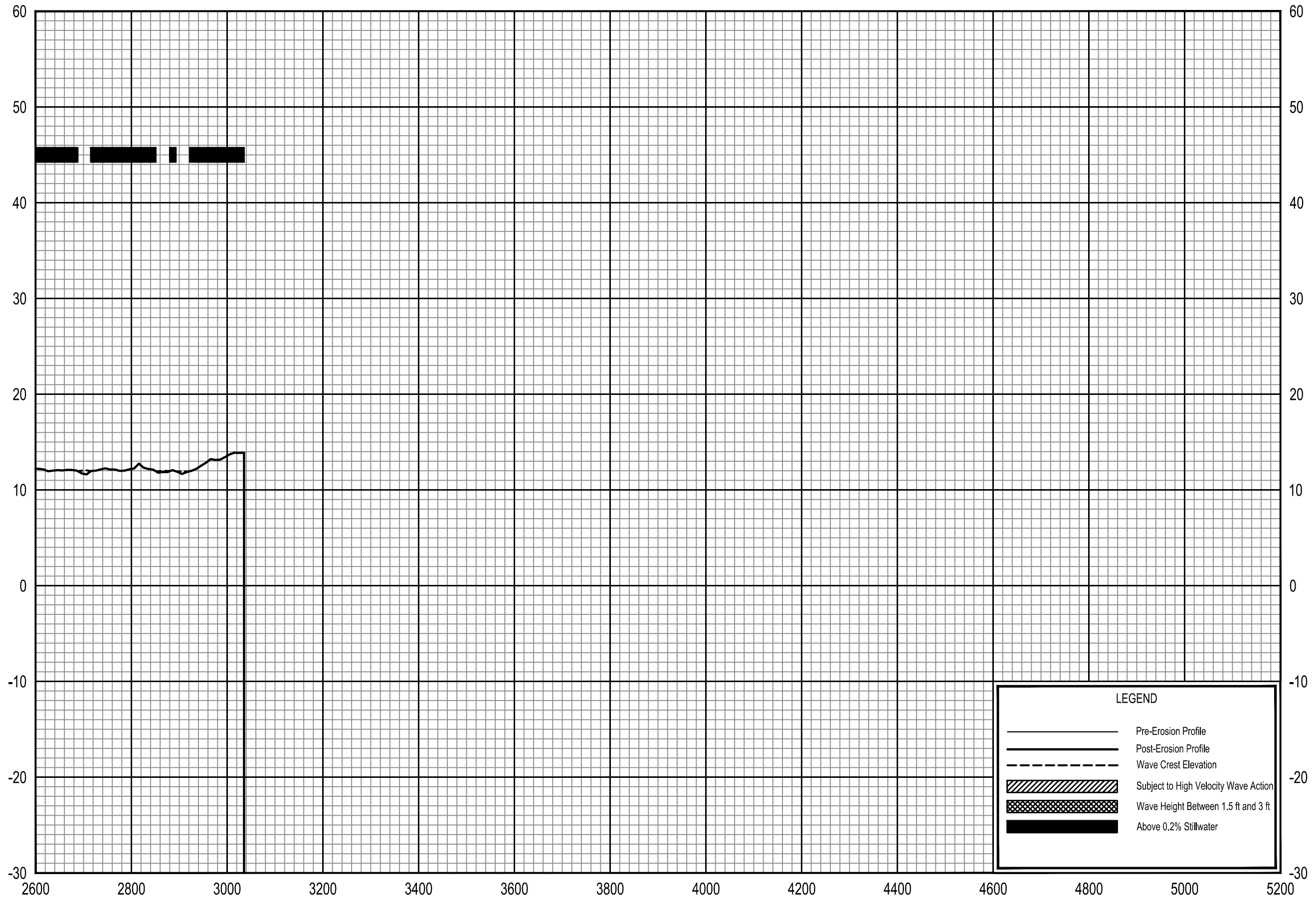
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 33

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



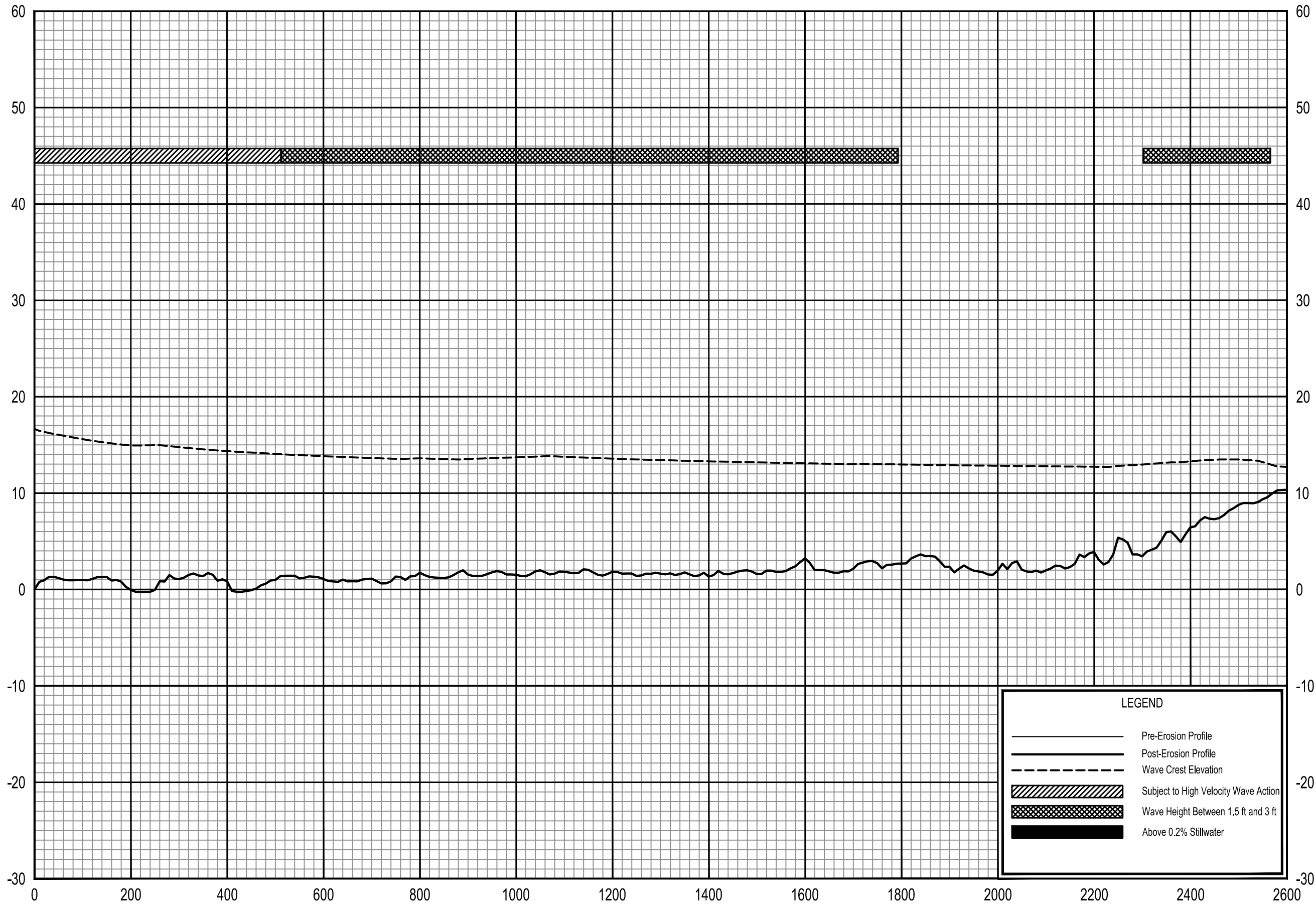
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 33

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

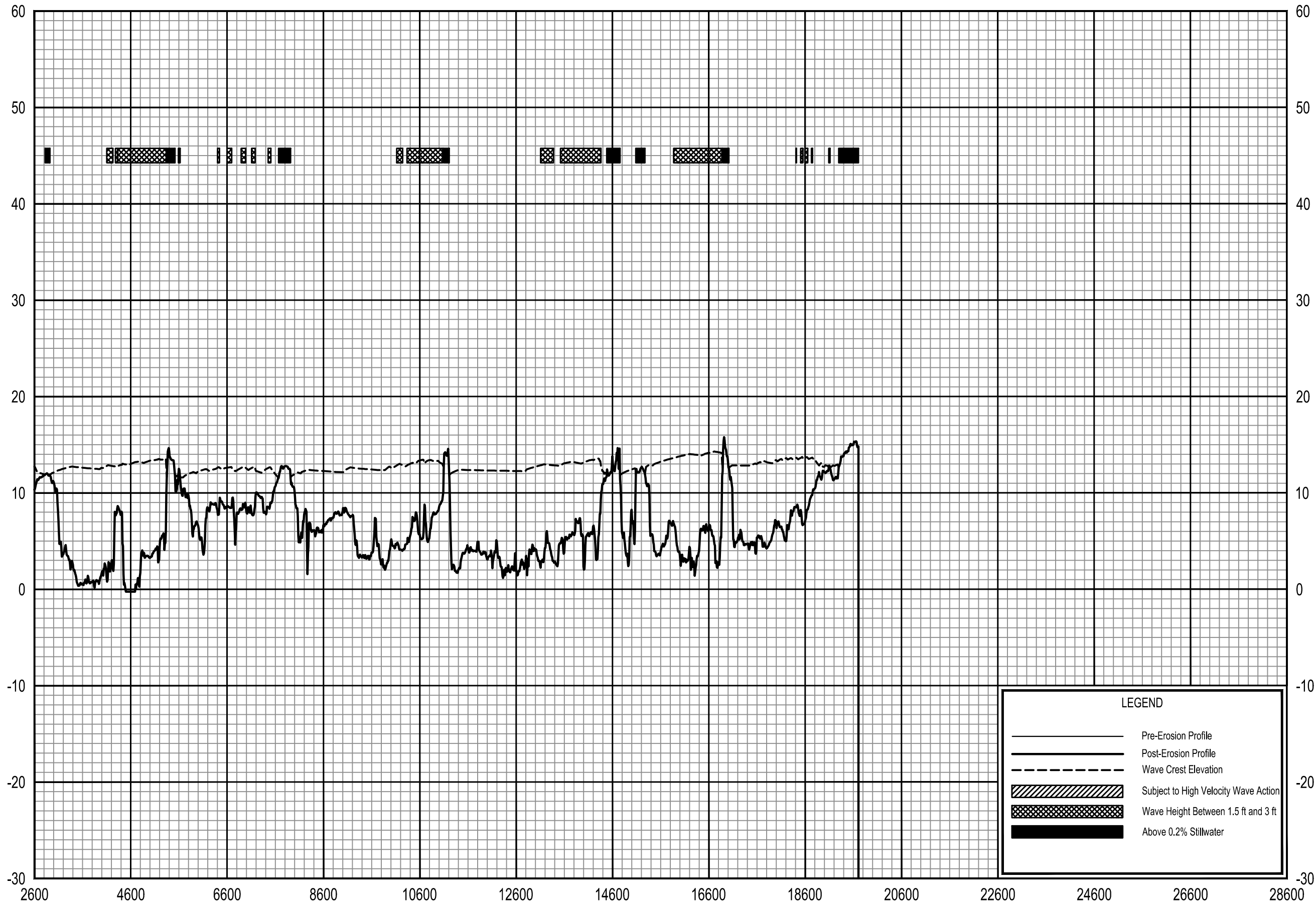
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 34

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

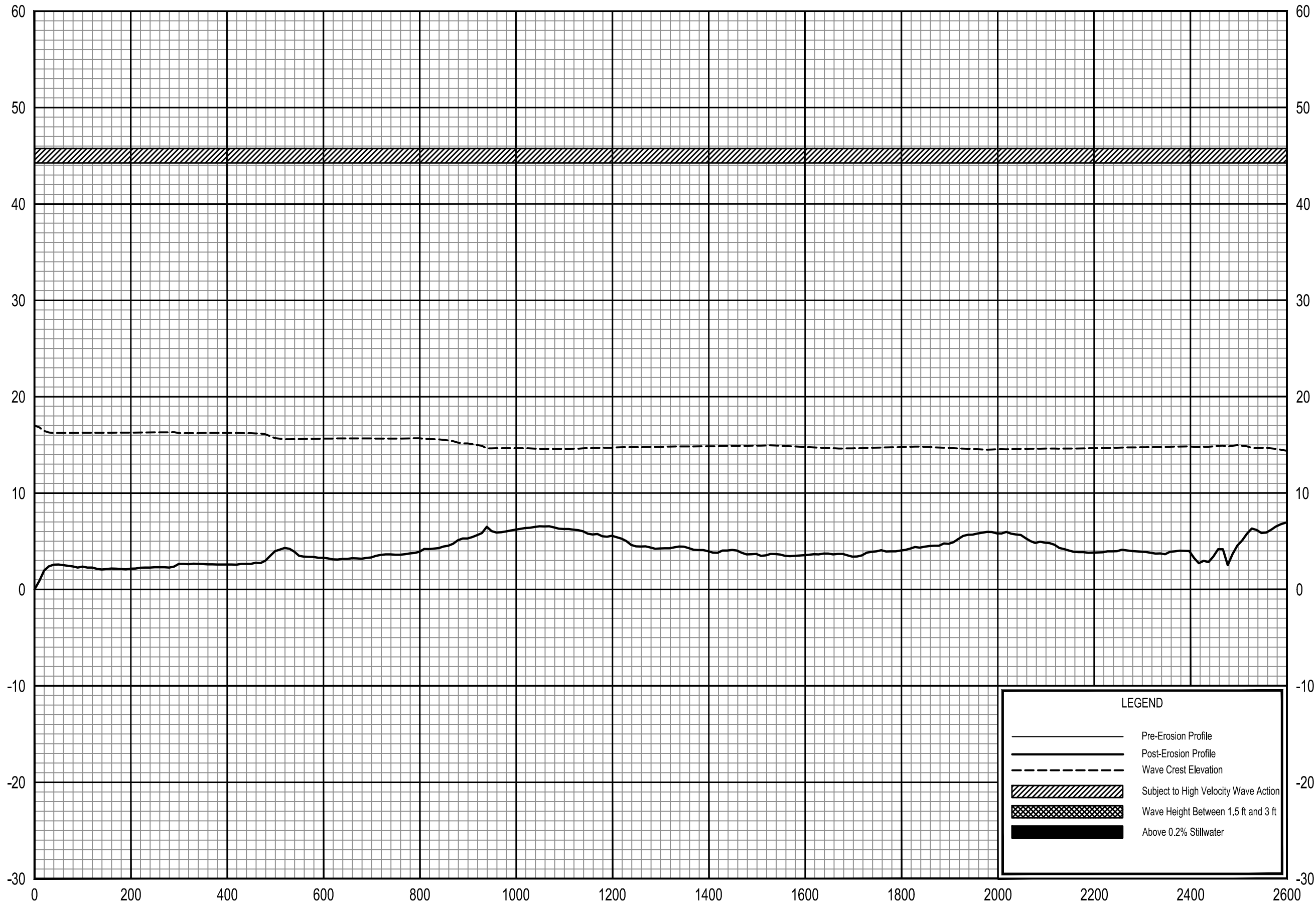
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 34

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

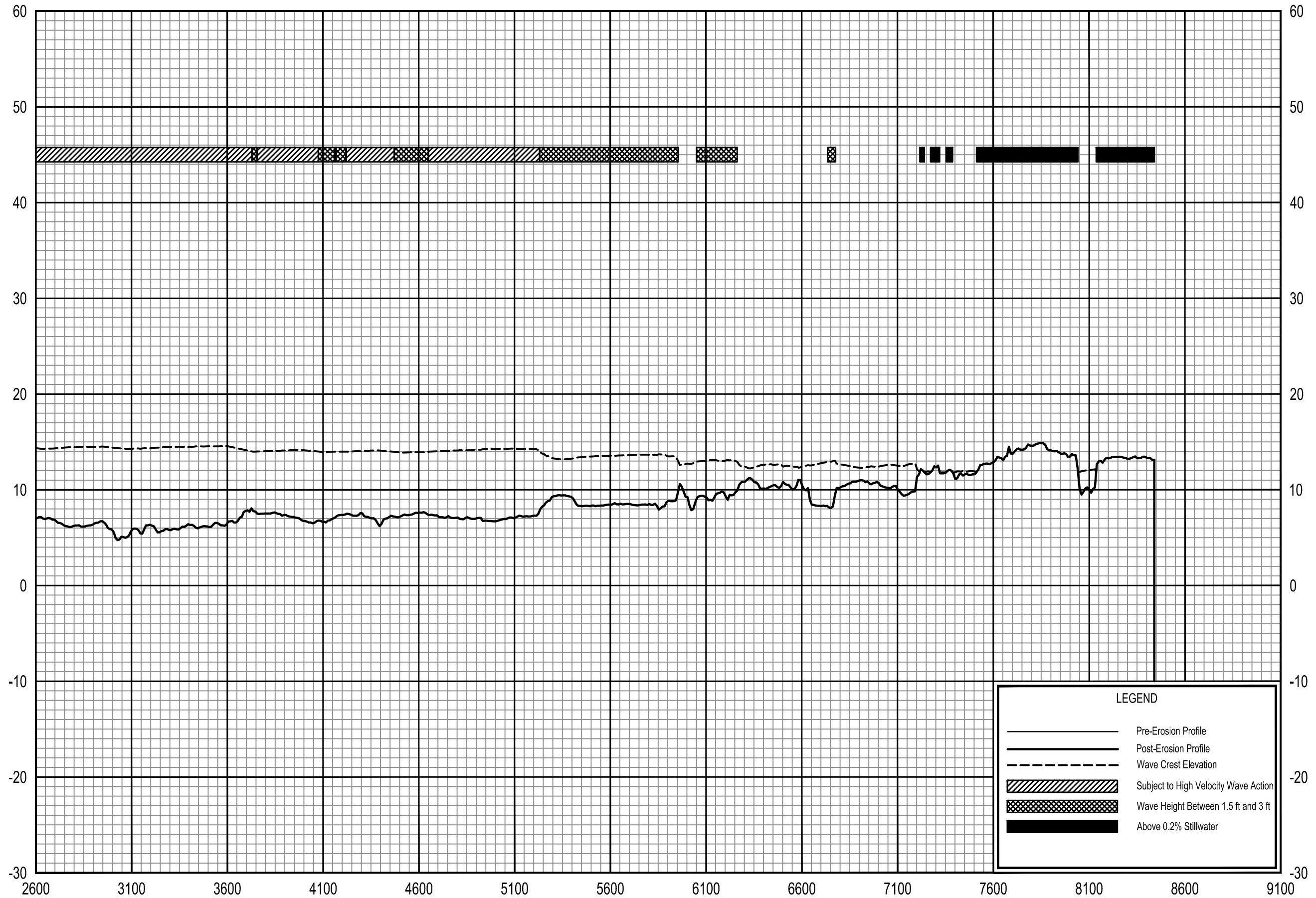
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 35

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

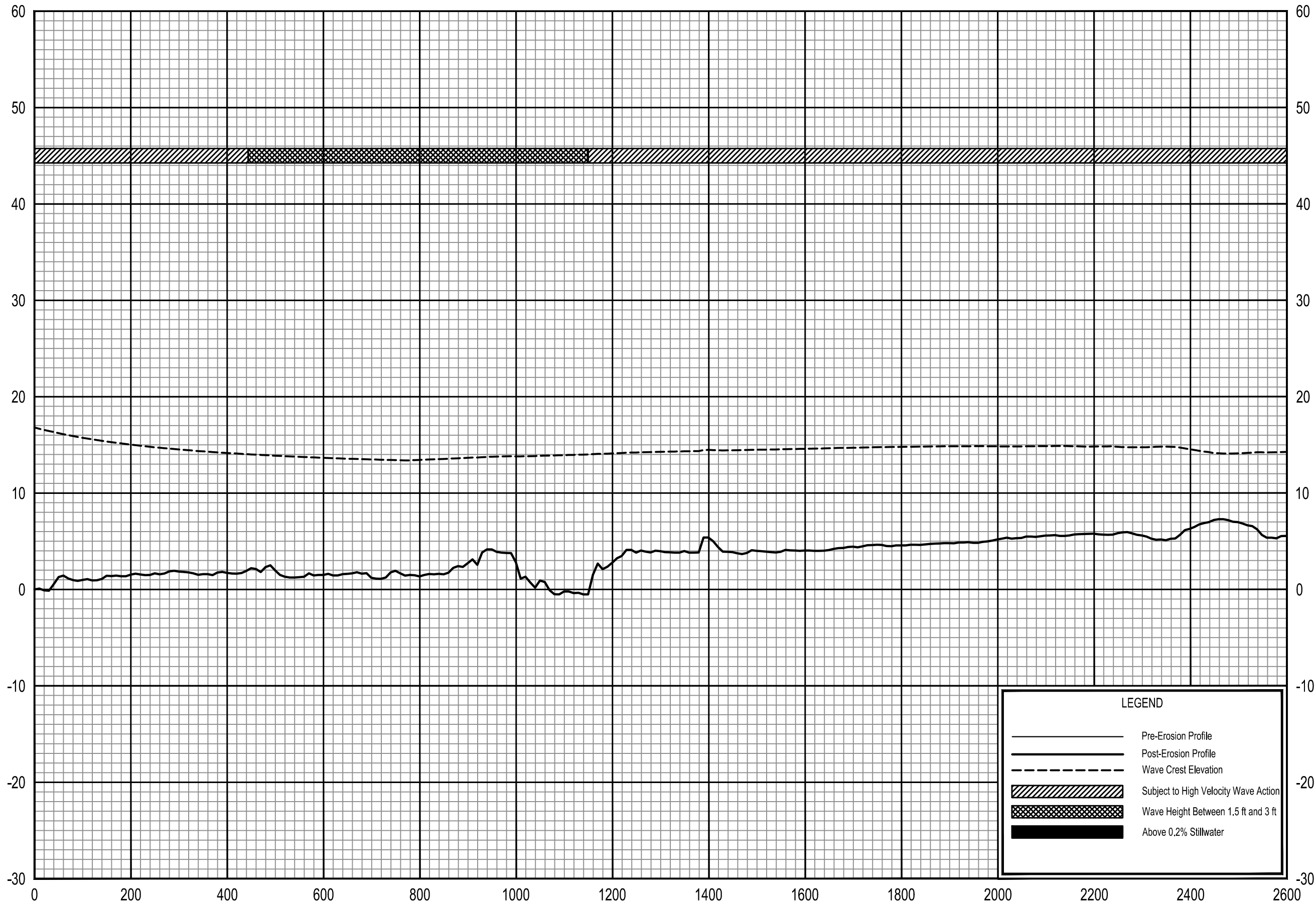
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 35

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

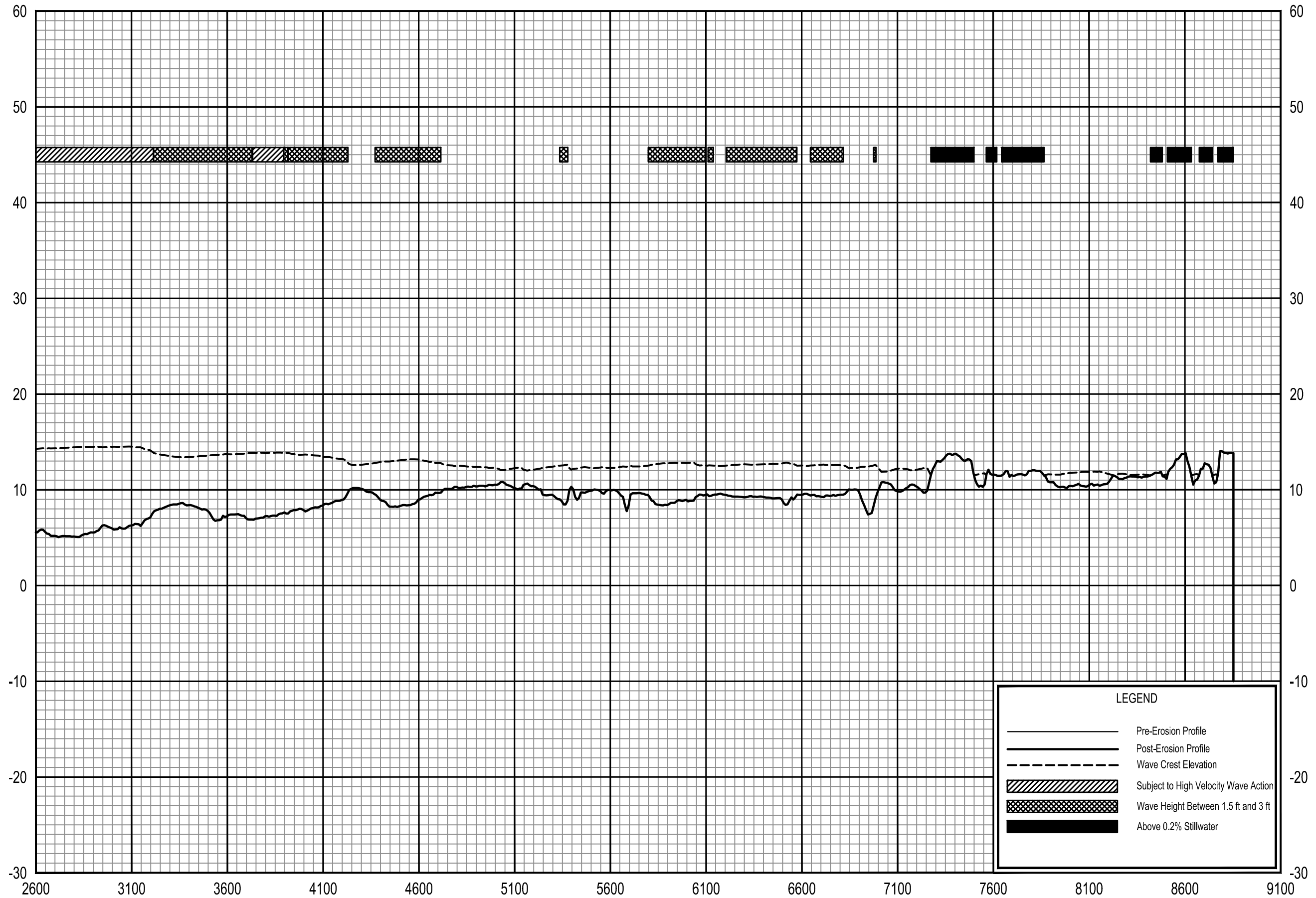
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 36

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

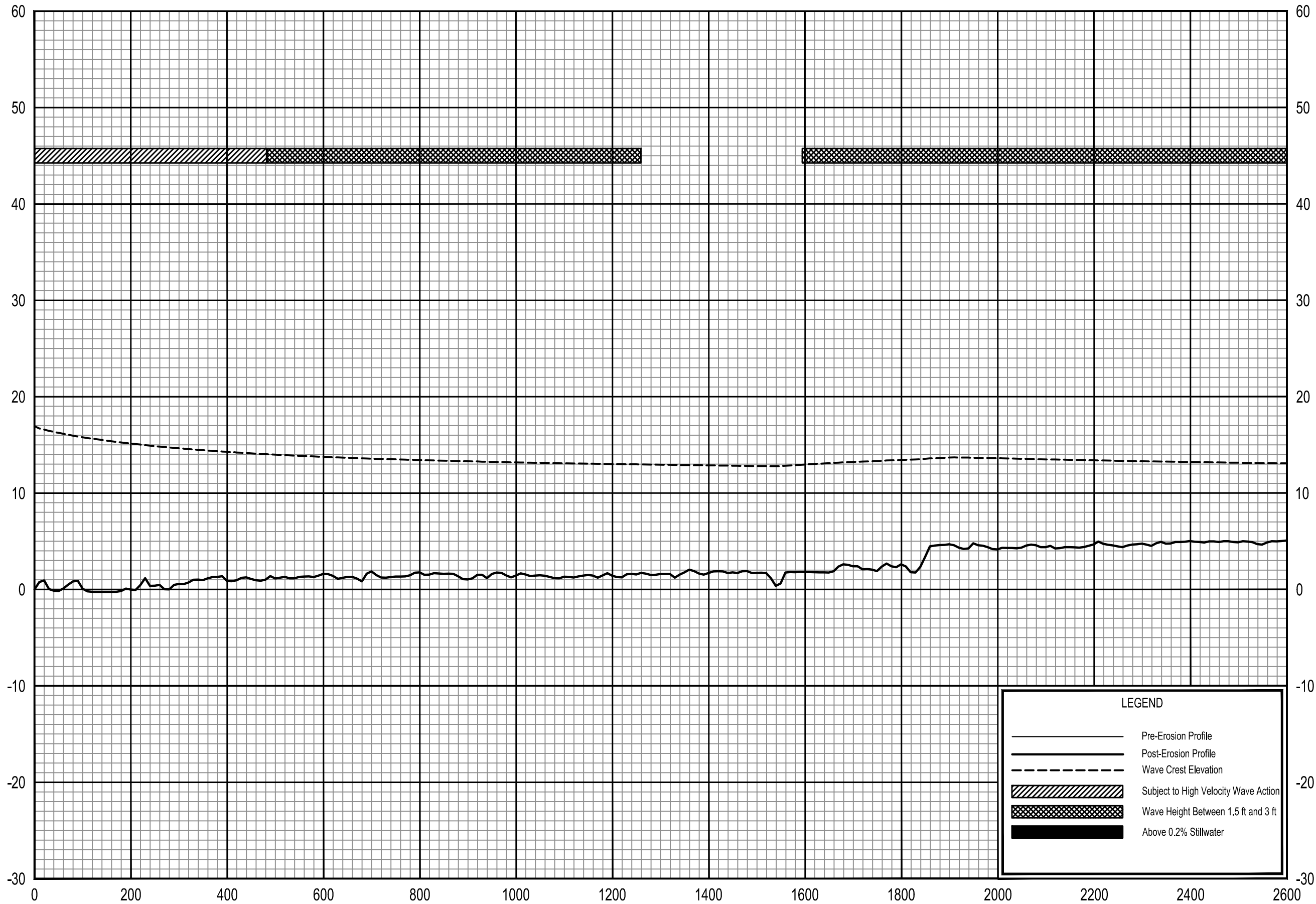
- Pre-Erosion Profile
- - - Post-Erosion Profile
- · · Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 36

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

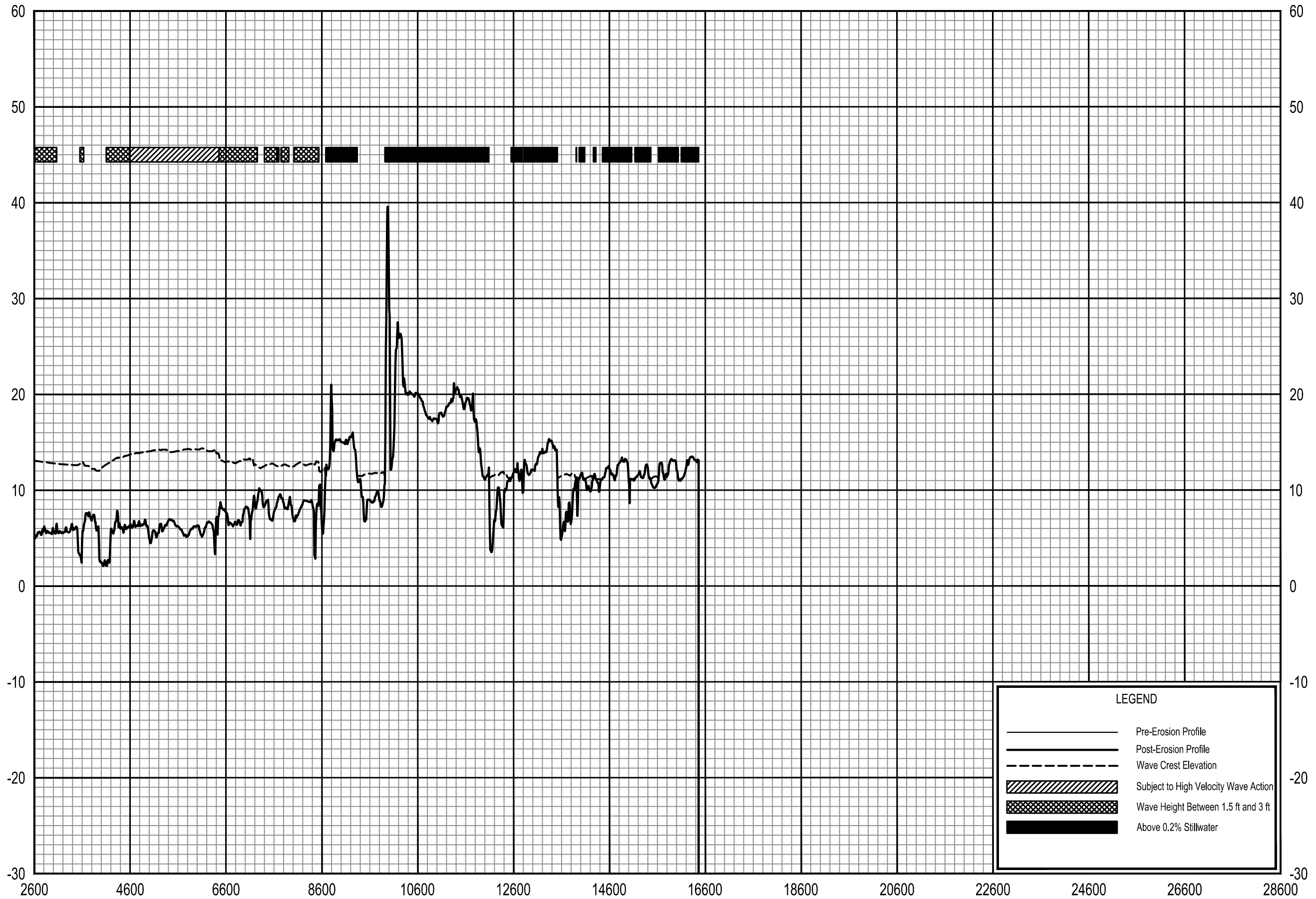
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 37

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



TRANSECT DISTANCE IN FEET FROM SHORELINE

LEGEND

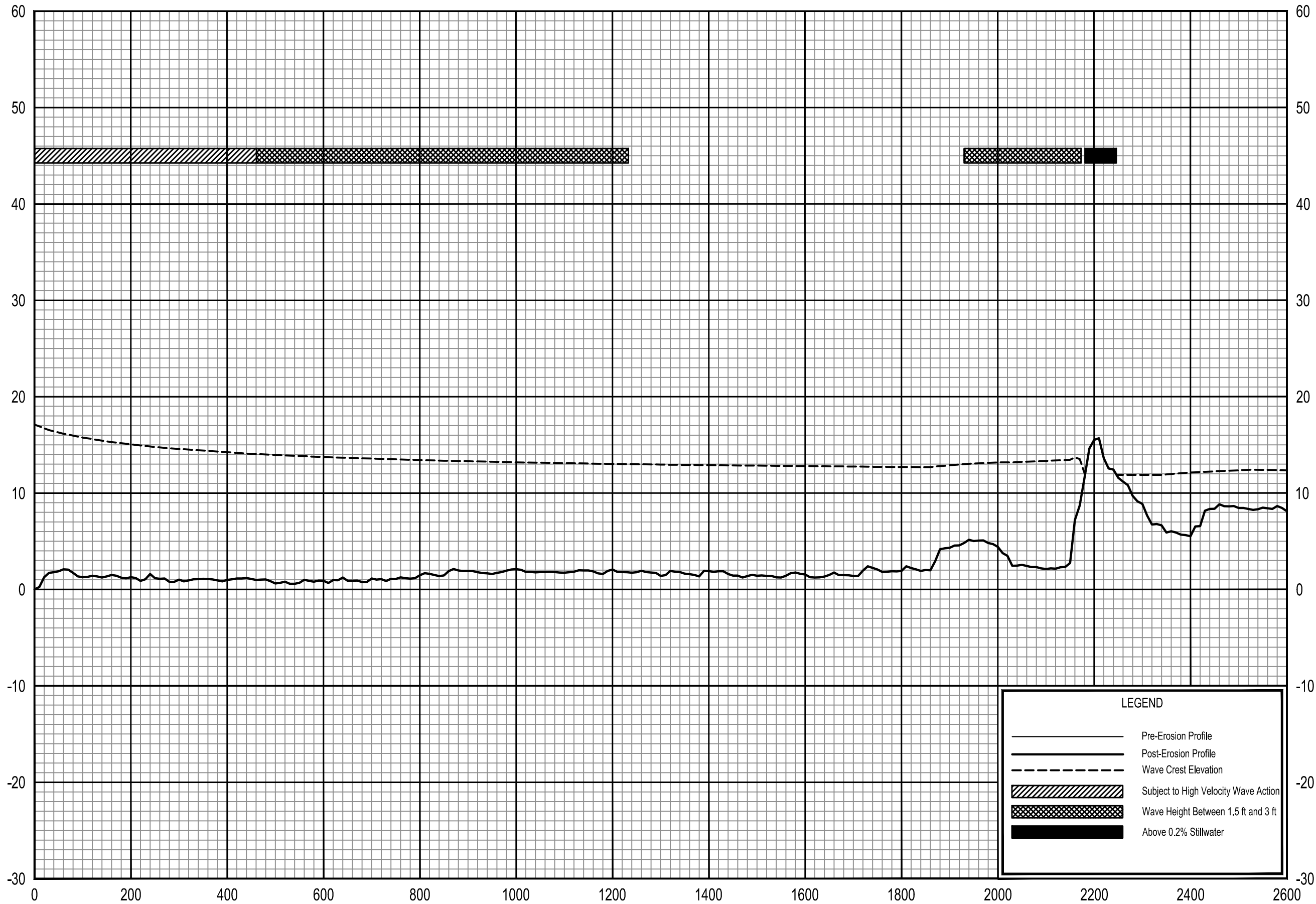
- Pre-Erosion Profile
- Post-Erosion Profile
- Wave Crest Elevation
- Subject to High Velocity Wave Action
- Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 37

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

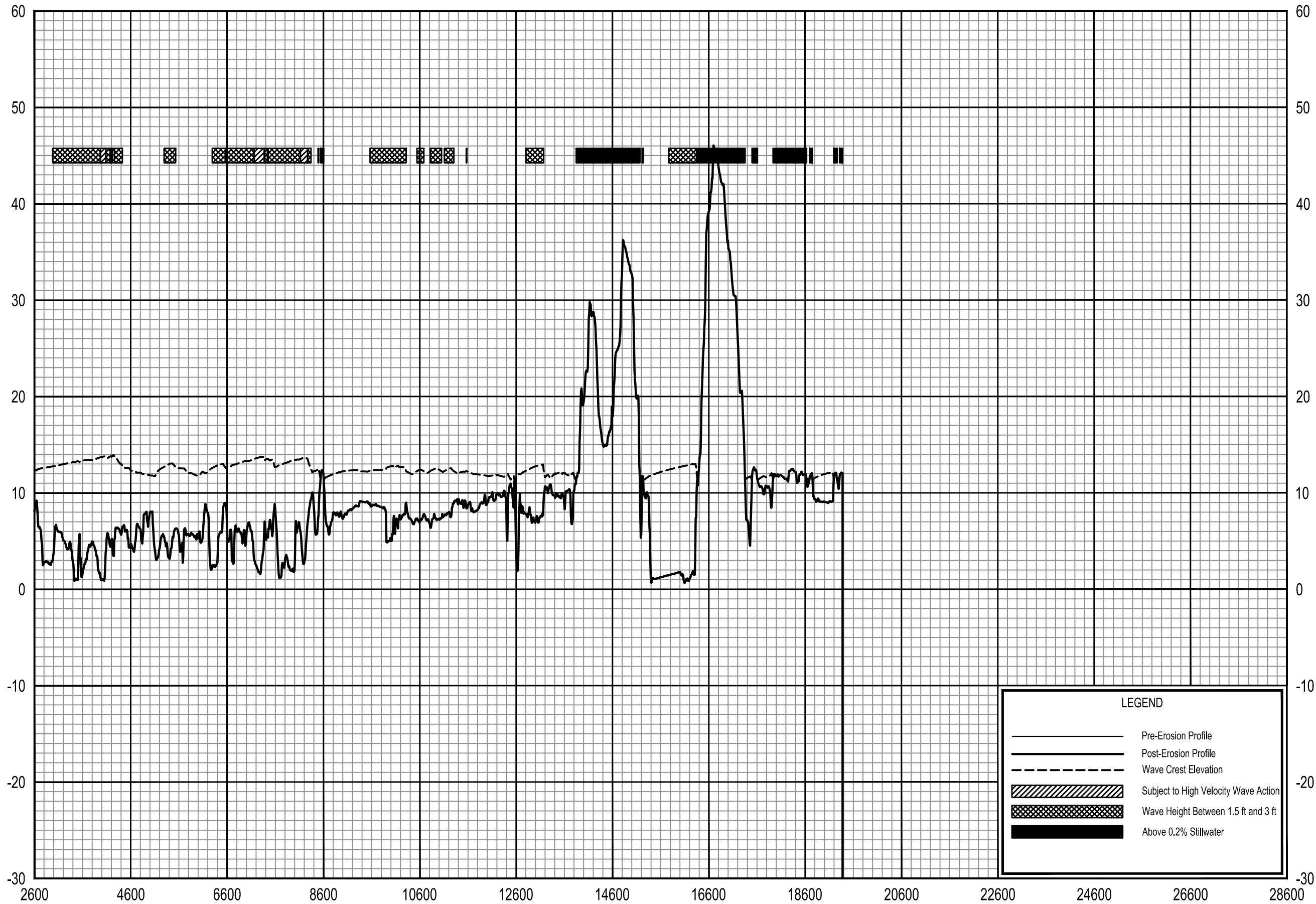
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 38

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

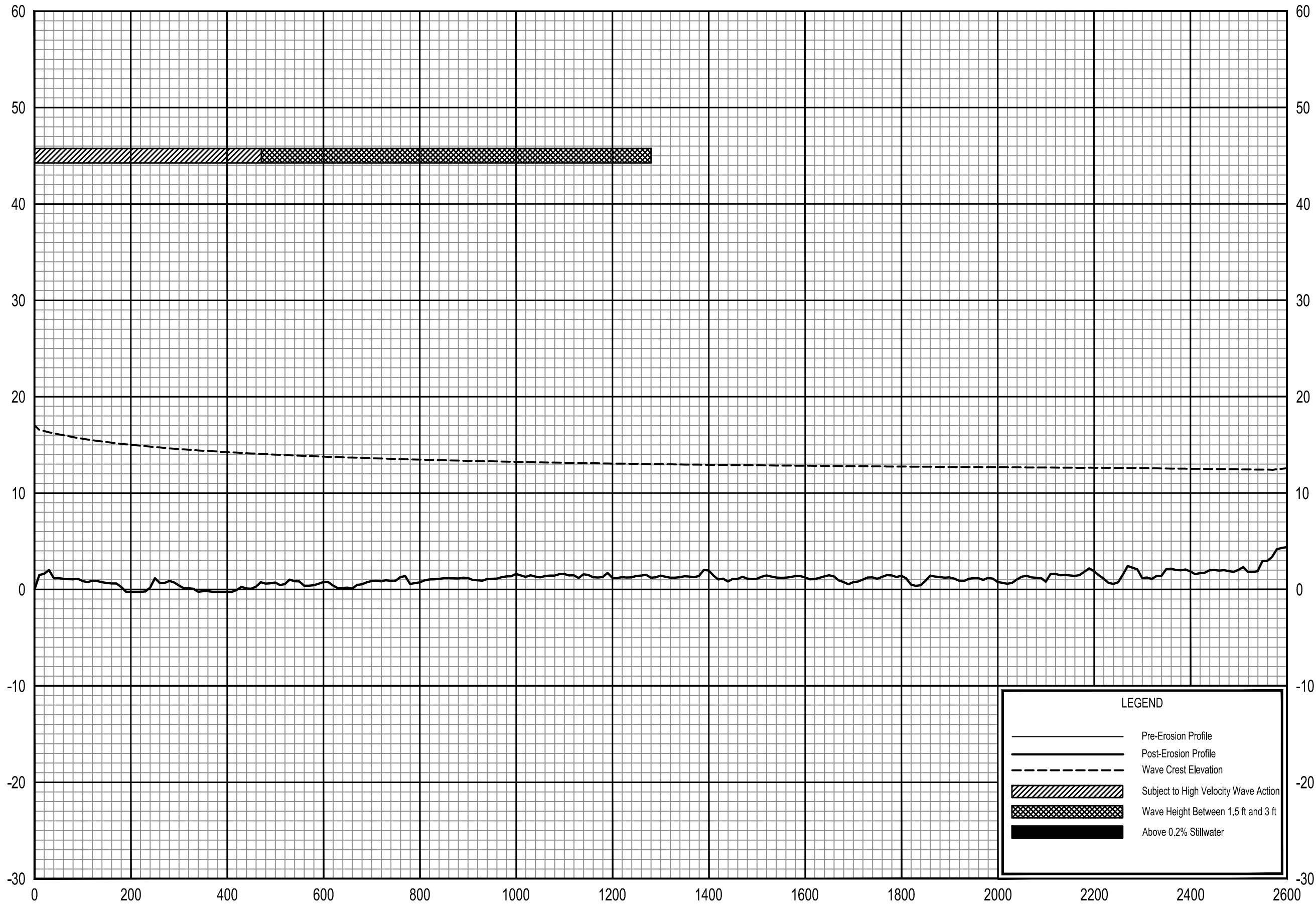
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 38

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

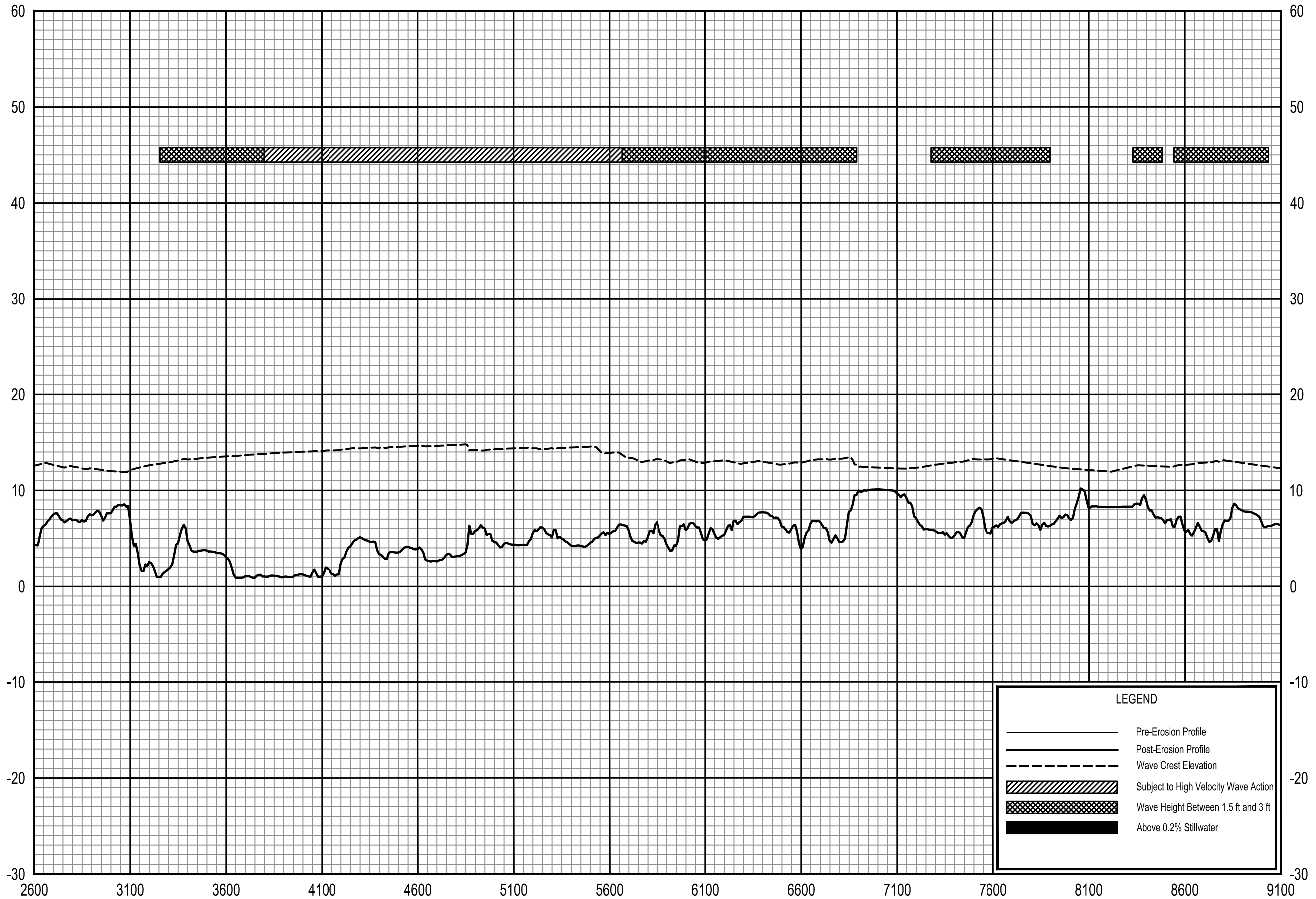
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 39

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 39

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

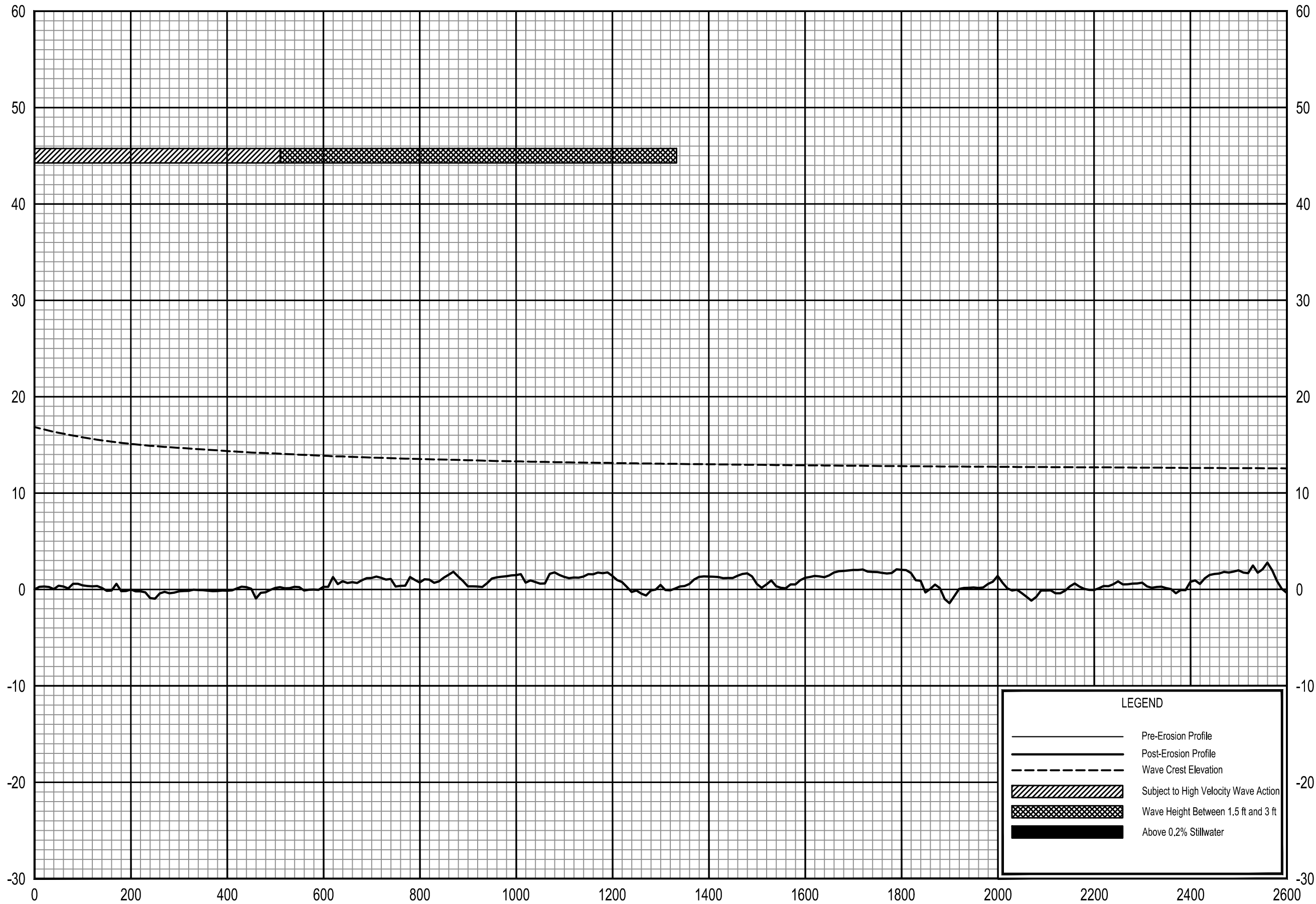
- Pre-Erosion Profile
- Post-Erosion Profile
- Wave Crest Elevation
- Subject to High Velocity Wave Action
- Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 39

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

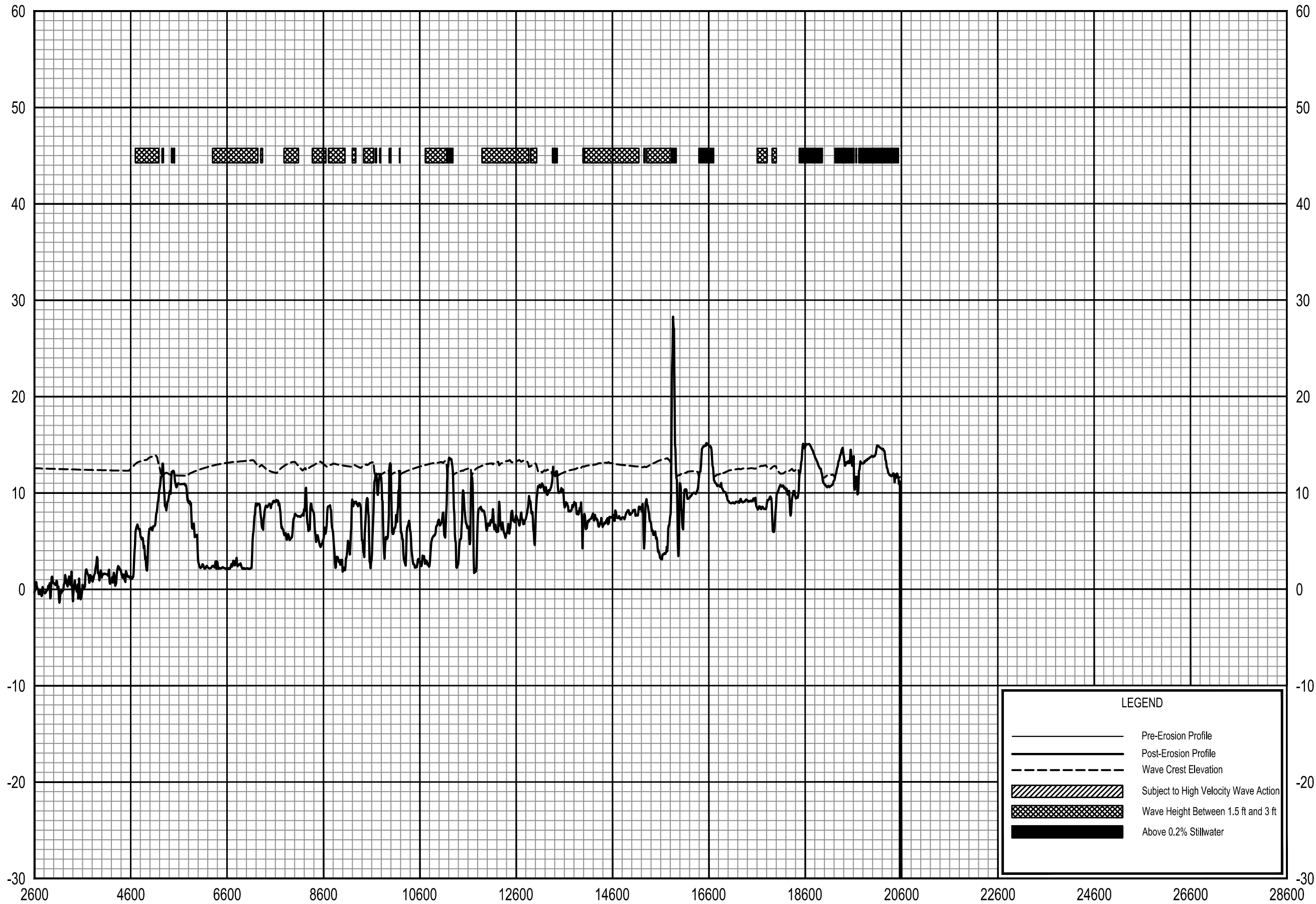
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 40

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

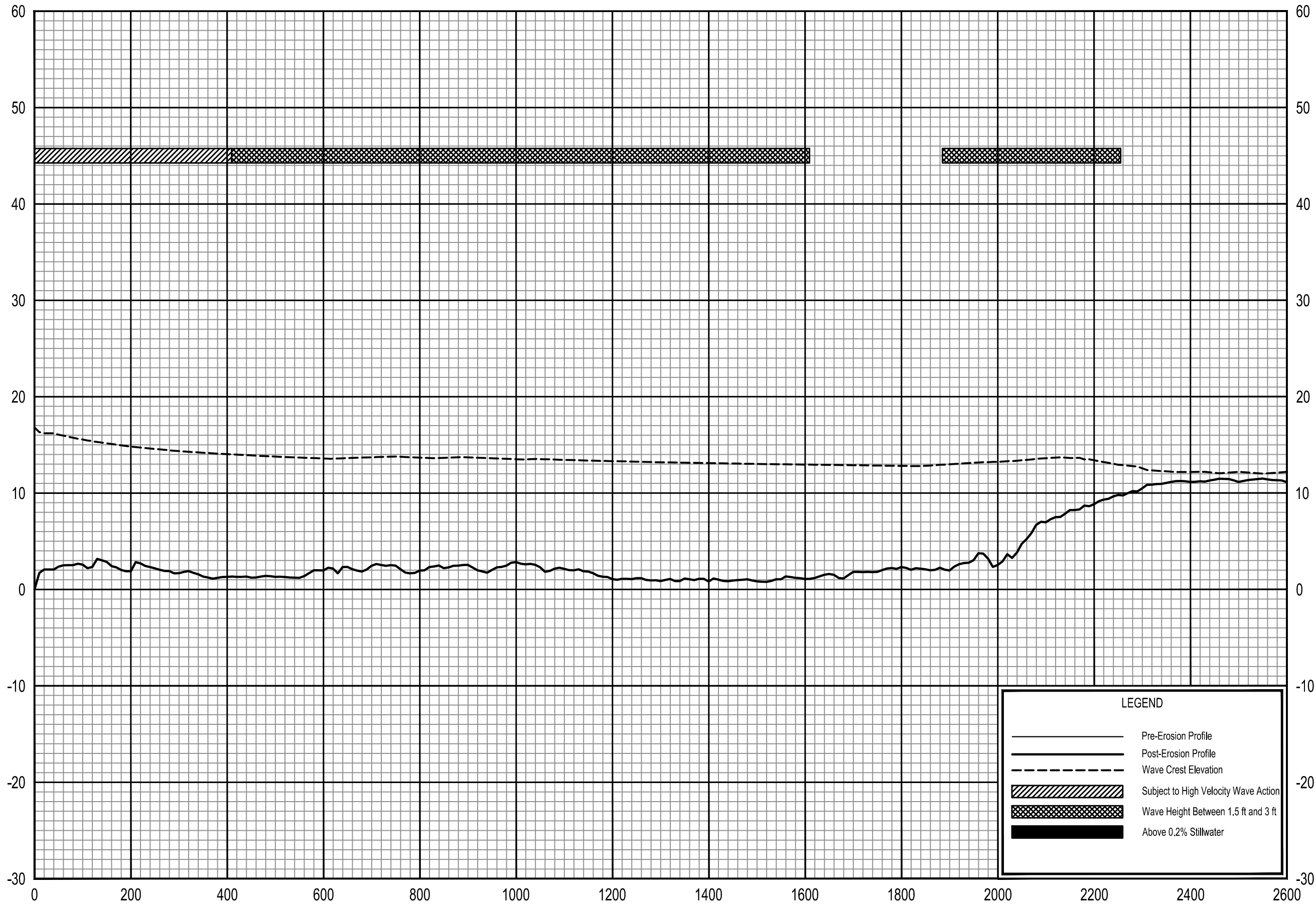
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 40

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

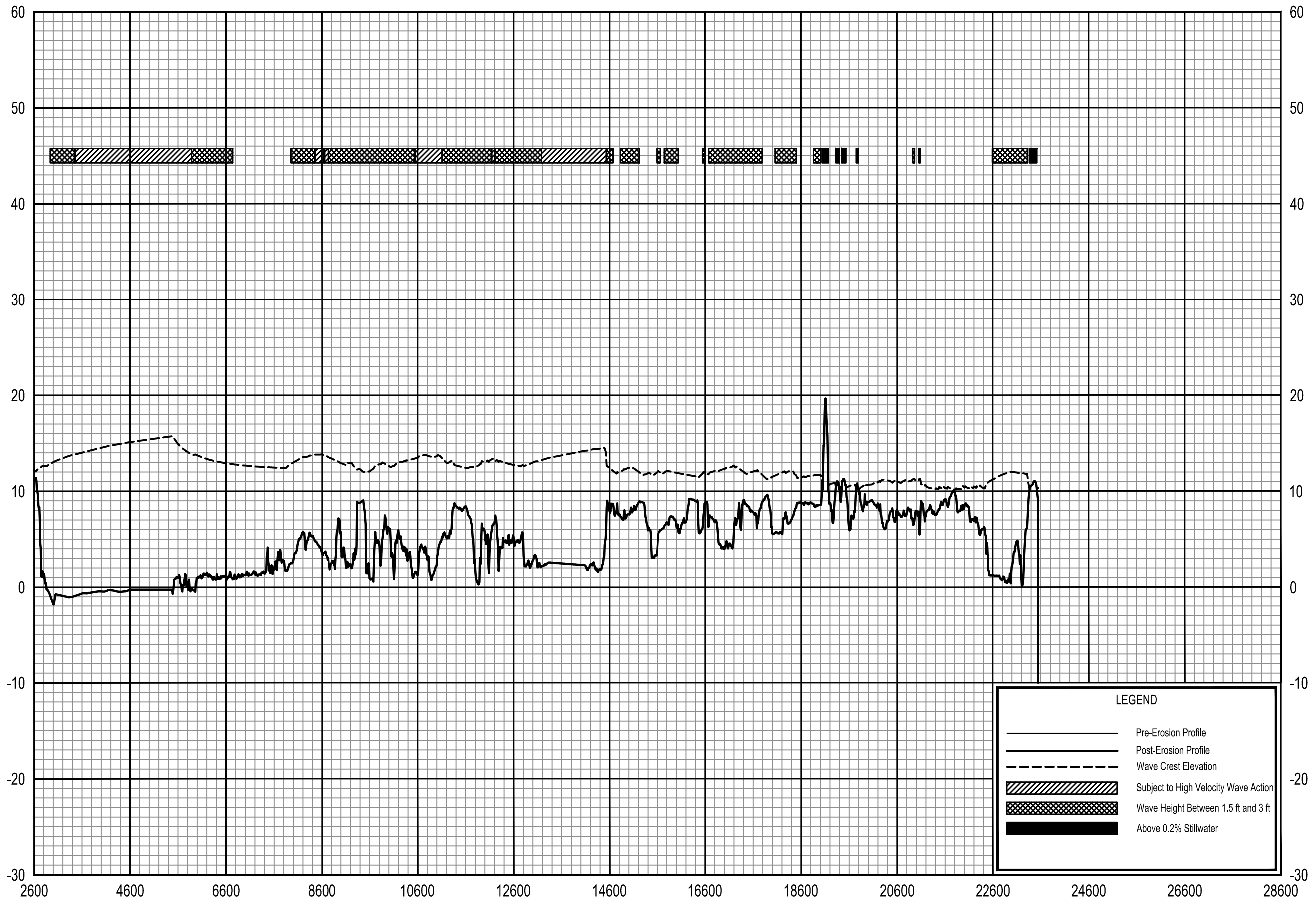
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 41

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

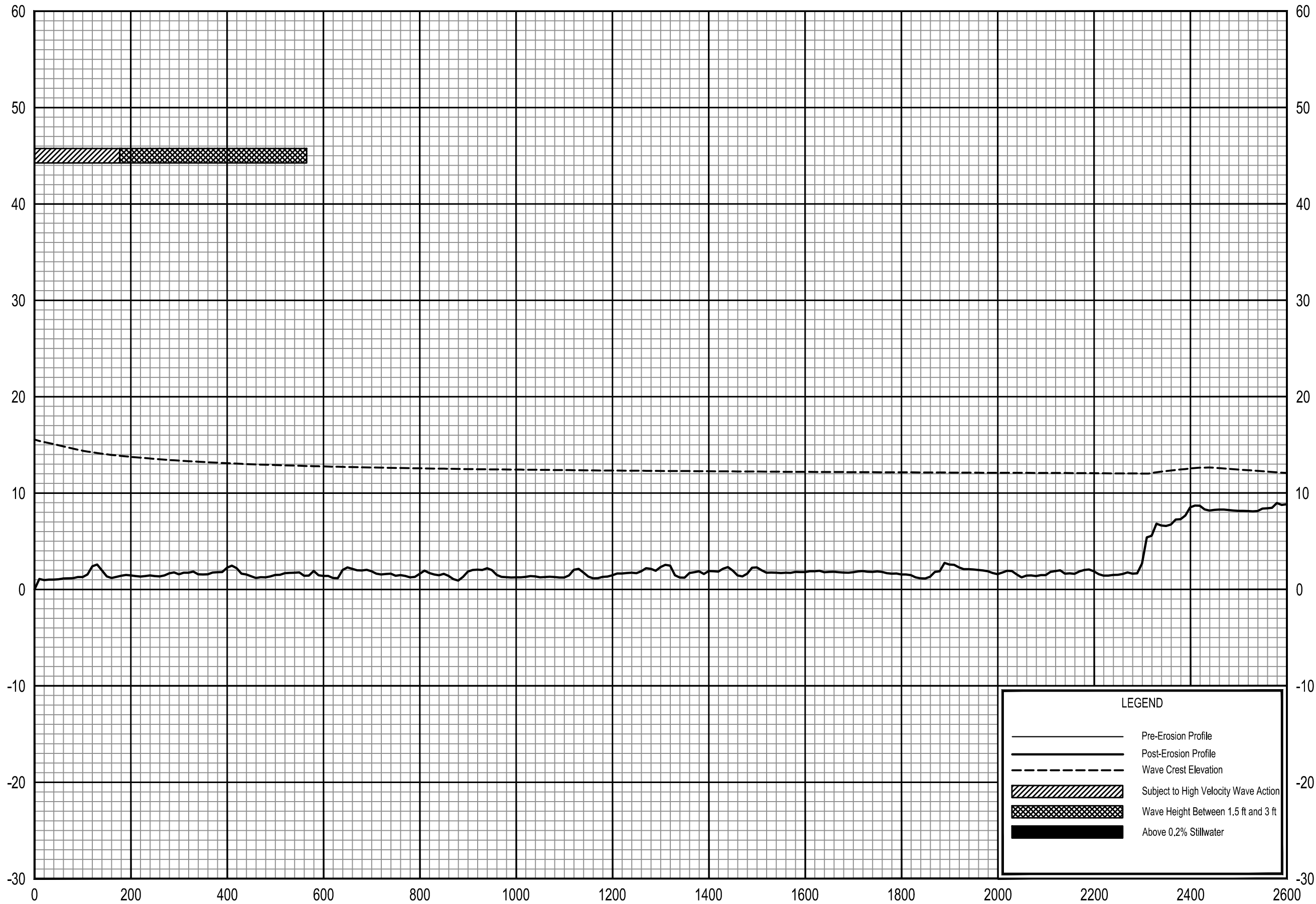
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 41

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

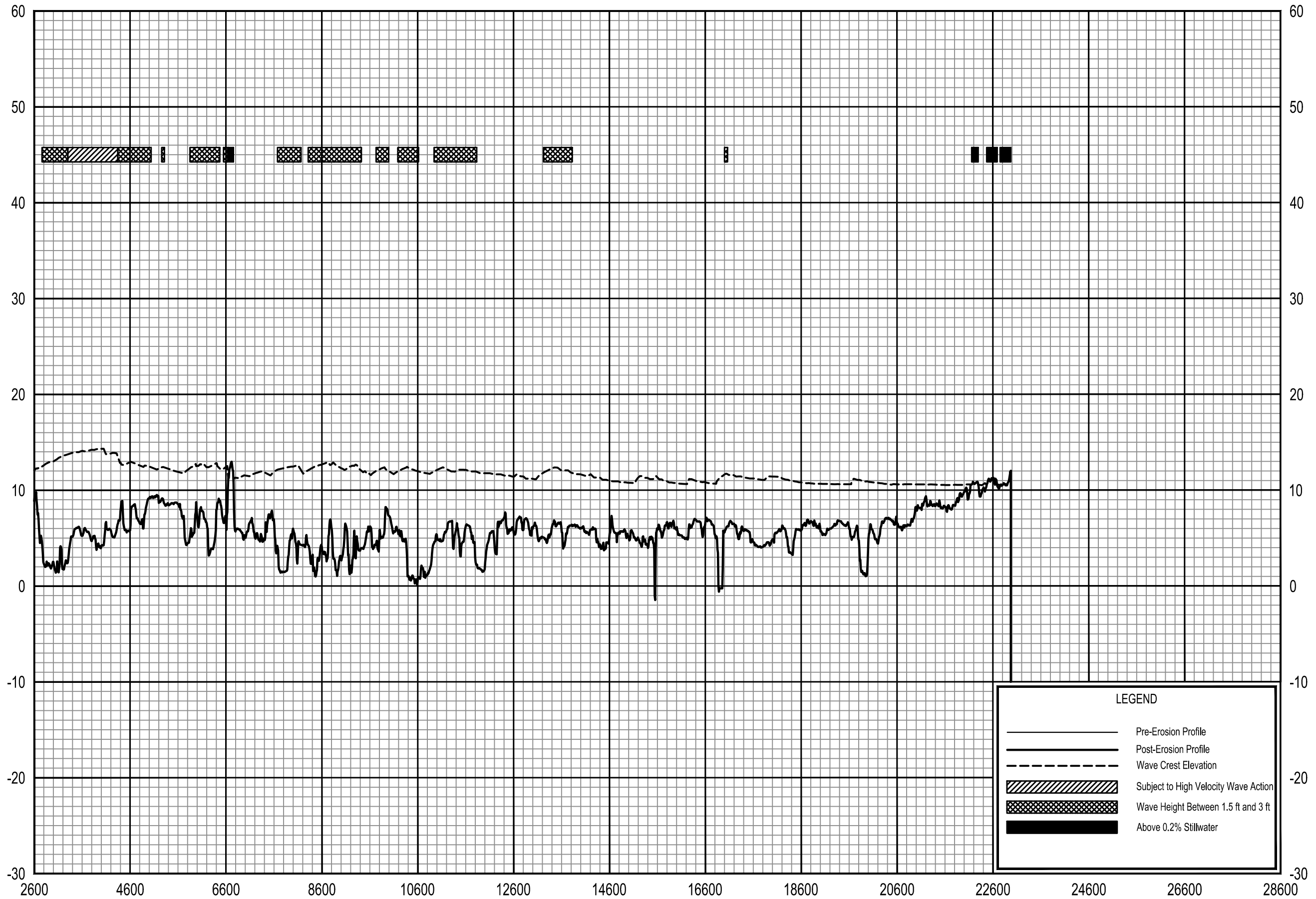
- Pre-Erosion Profile
- Post-Erosion Profile
- Wave Crest Elevation
- Subject to High Velocity Wave Action
- Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 42

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

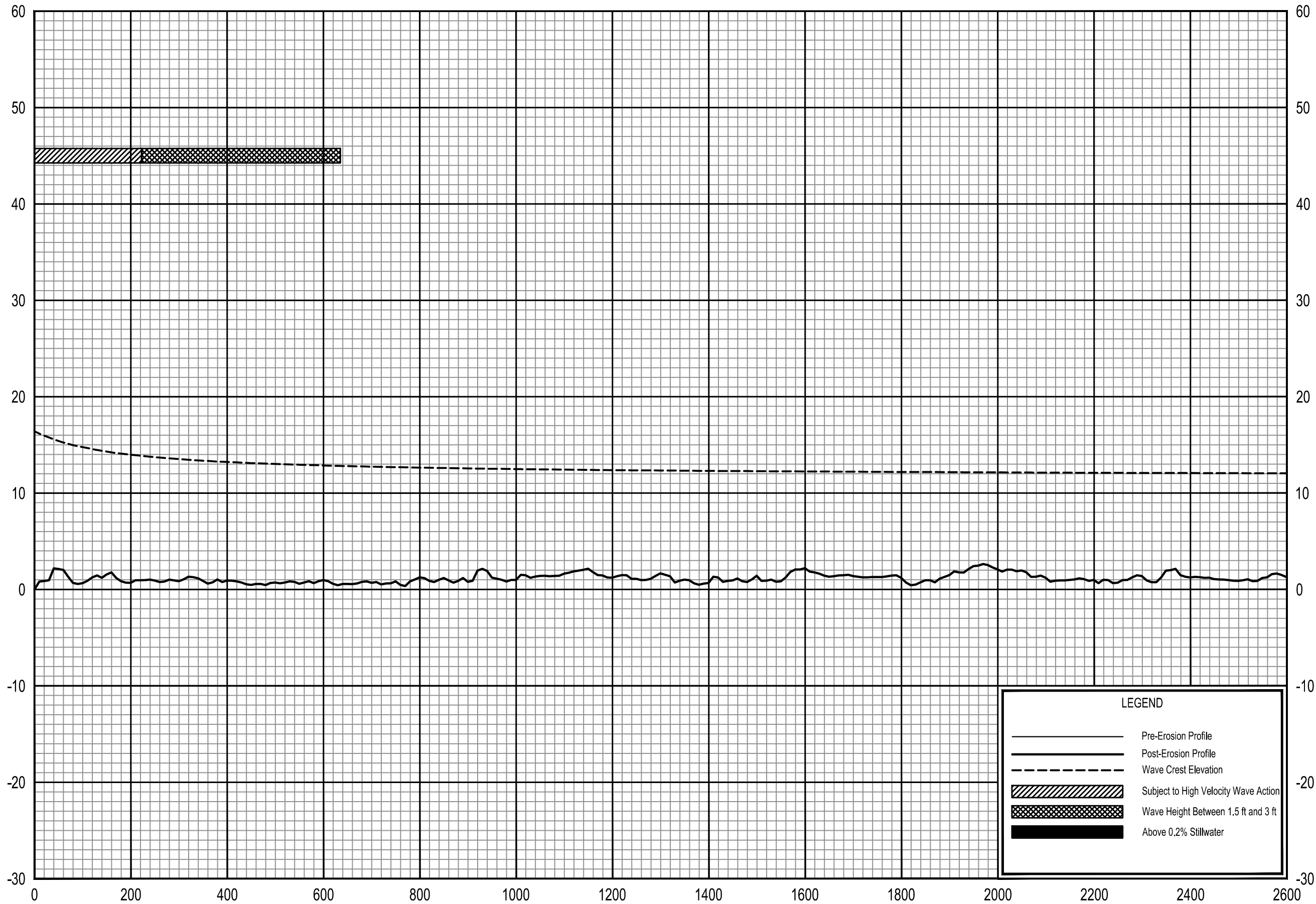
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 42

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

72 T

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

TRANSECT DISTANCE IN FEET FROM SHORELINE

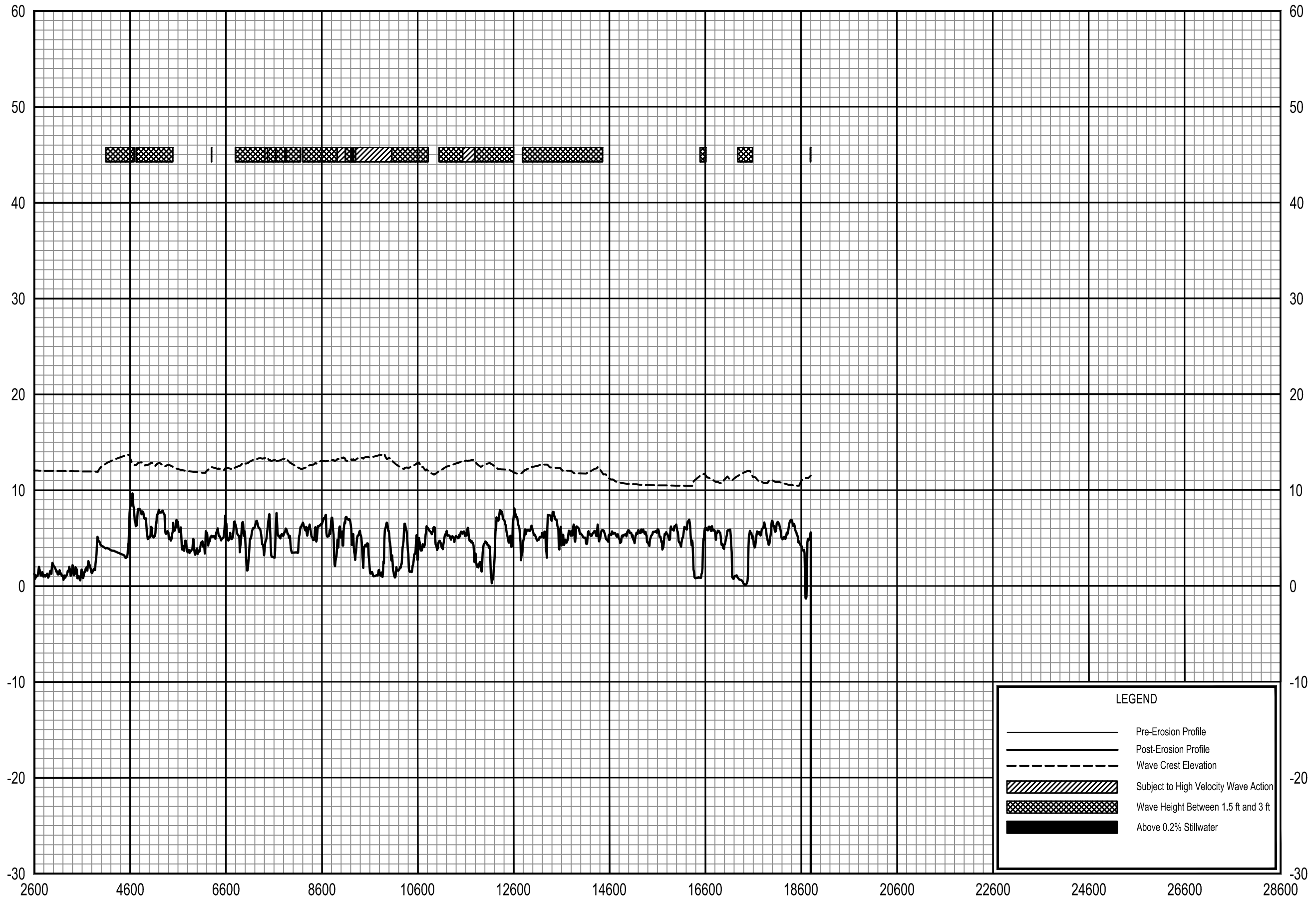
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 43

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

73 T

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

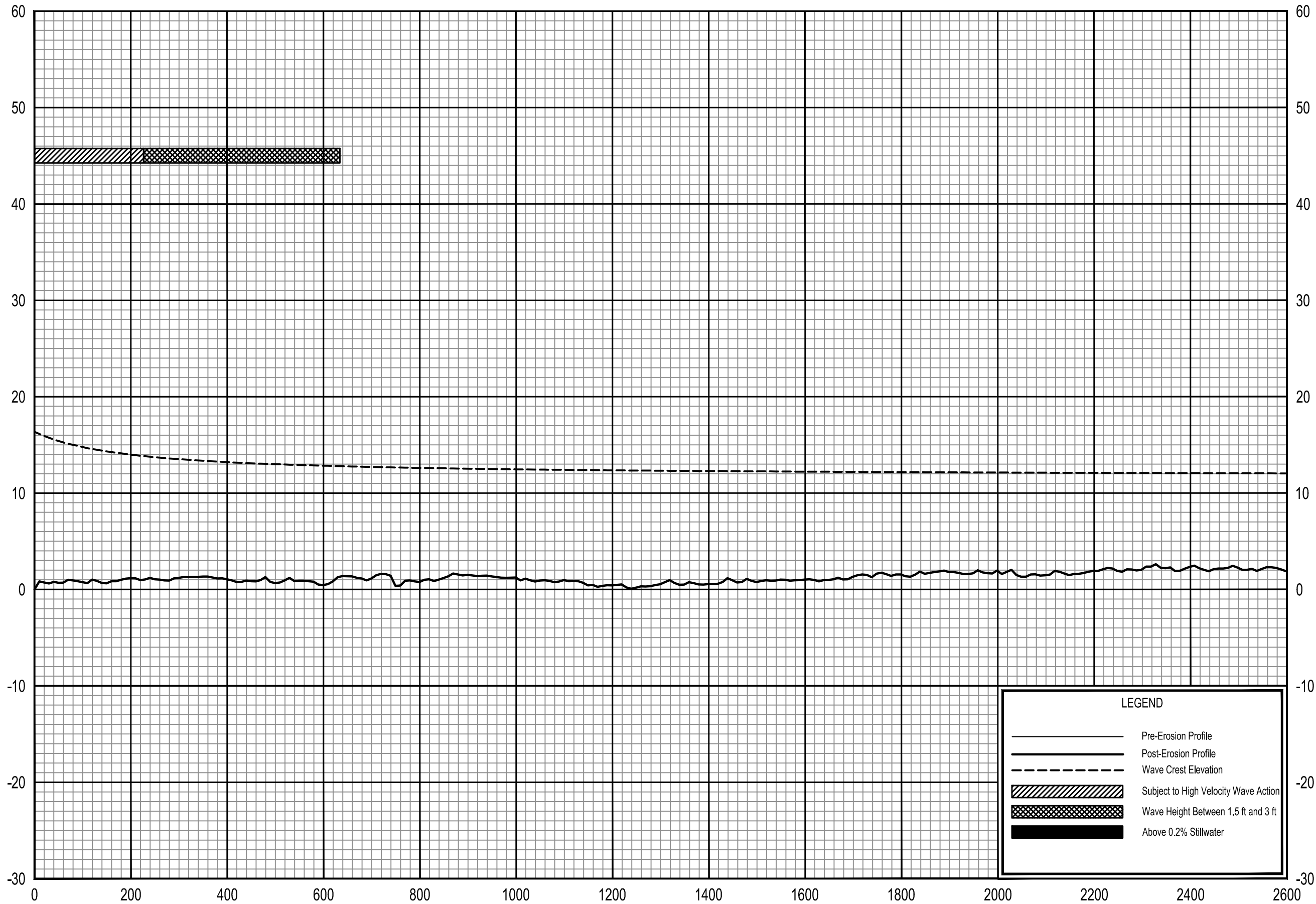
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 43

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

74 T

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

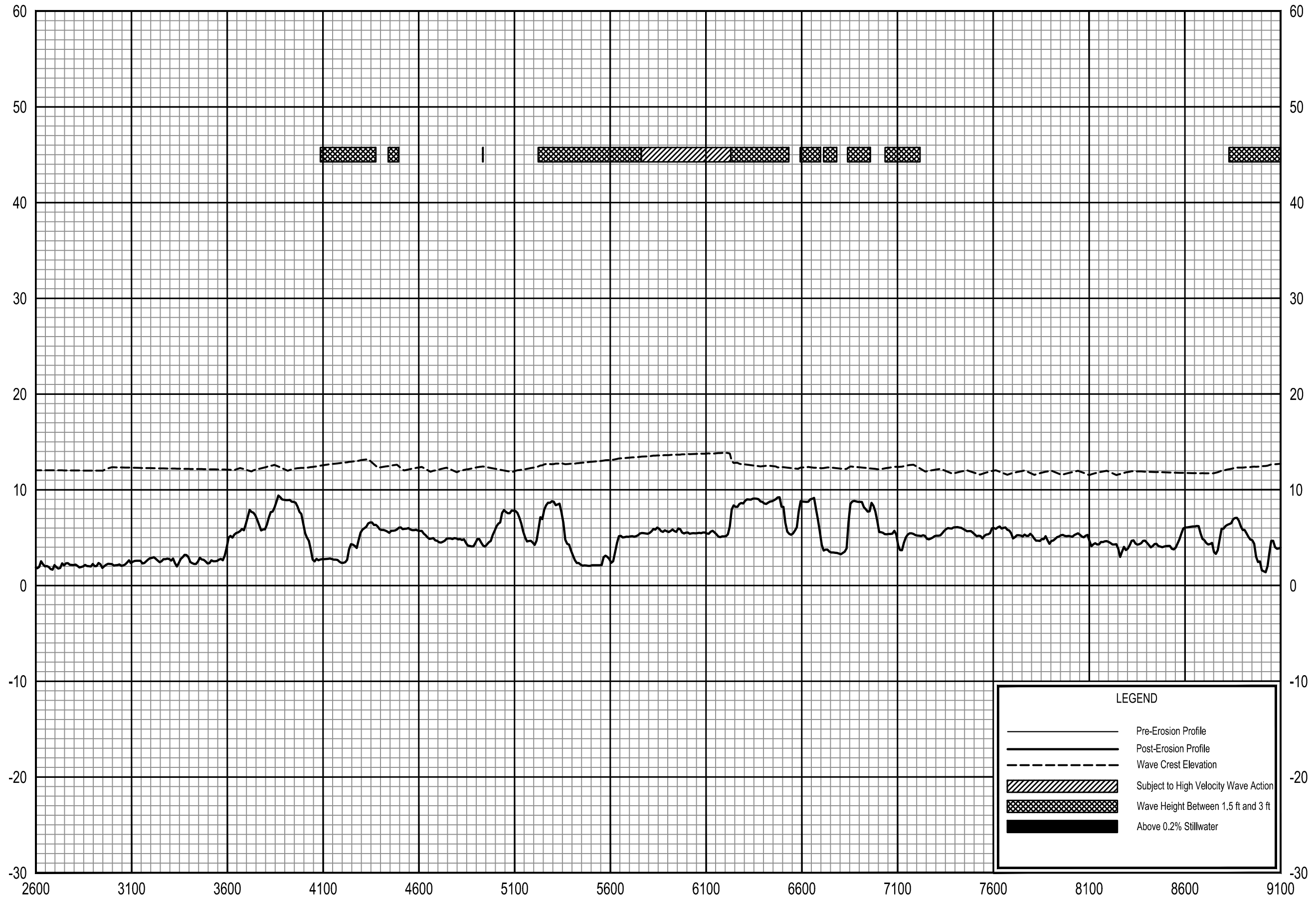
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 44

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

75 T

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

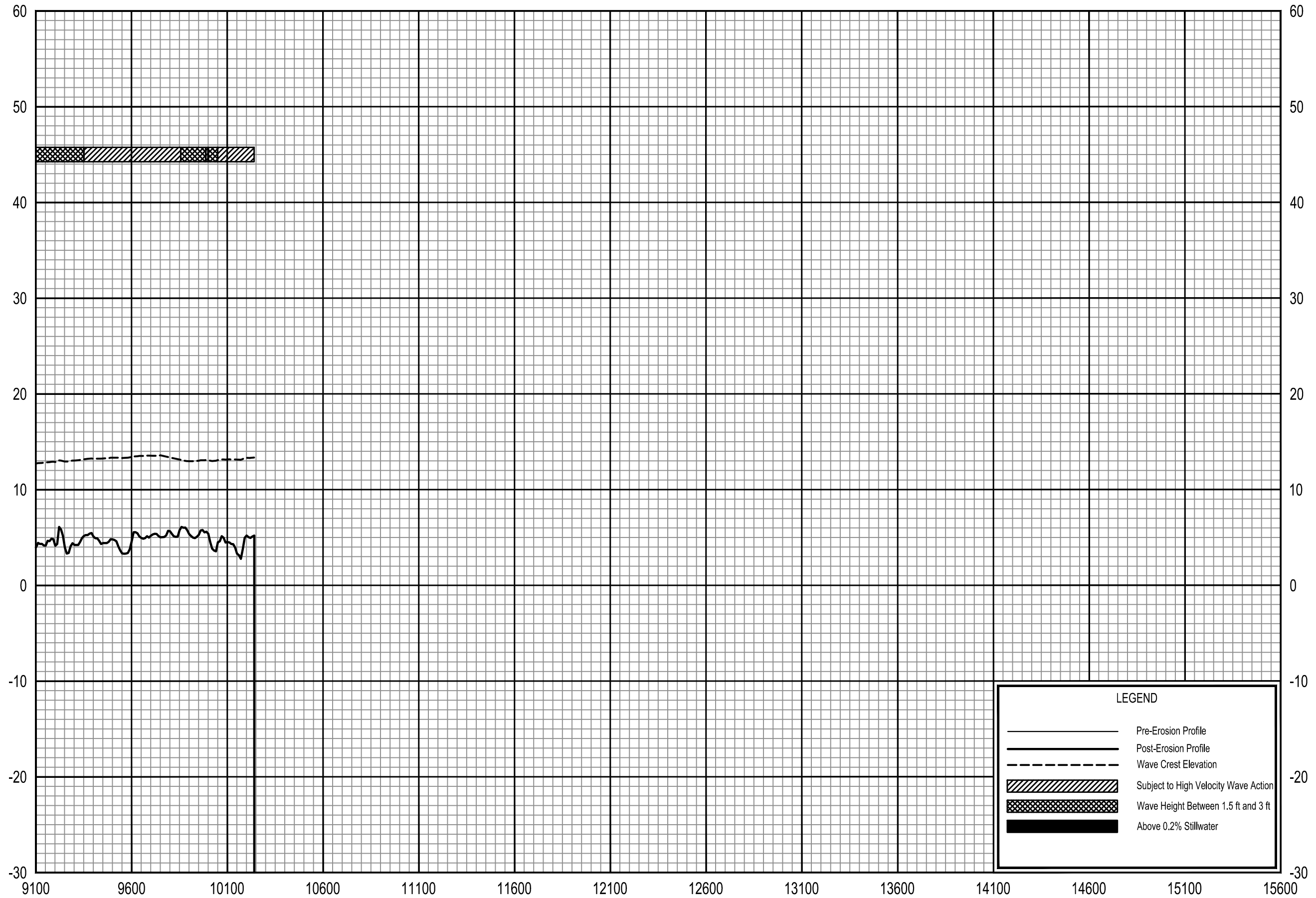
0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 44

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

76 T

ELEVATION IN FEET (NAVD 88)



LEGEND

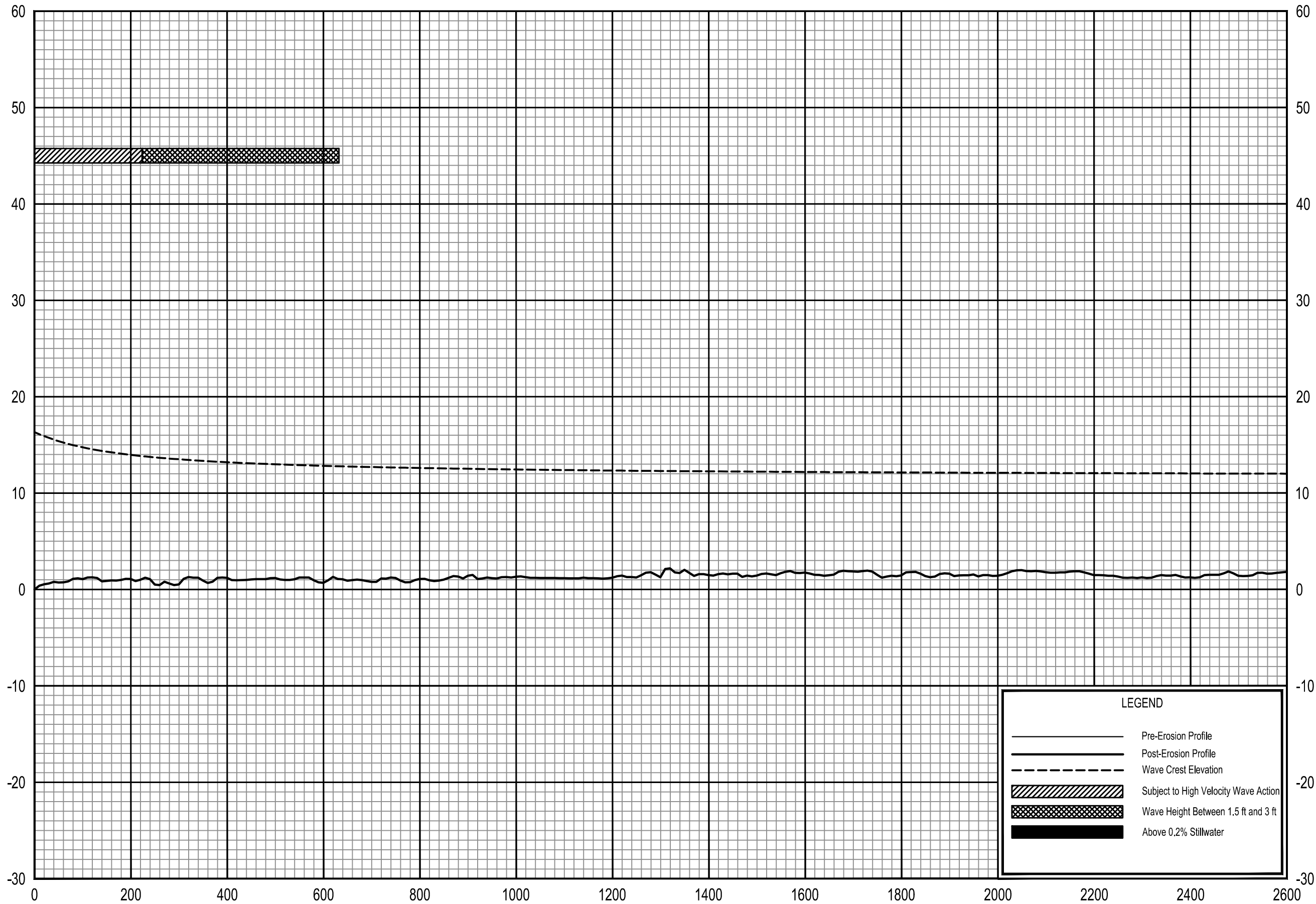
- Pre-Erosion Profile
- - - Post-Erosion Profile
- · · Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 44

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

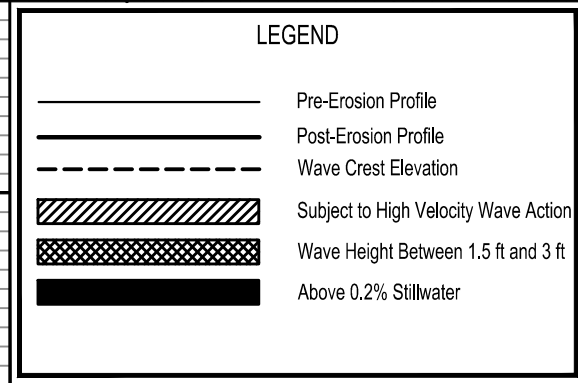
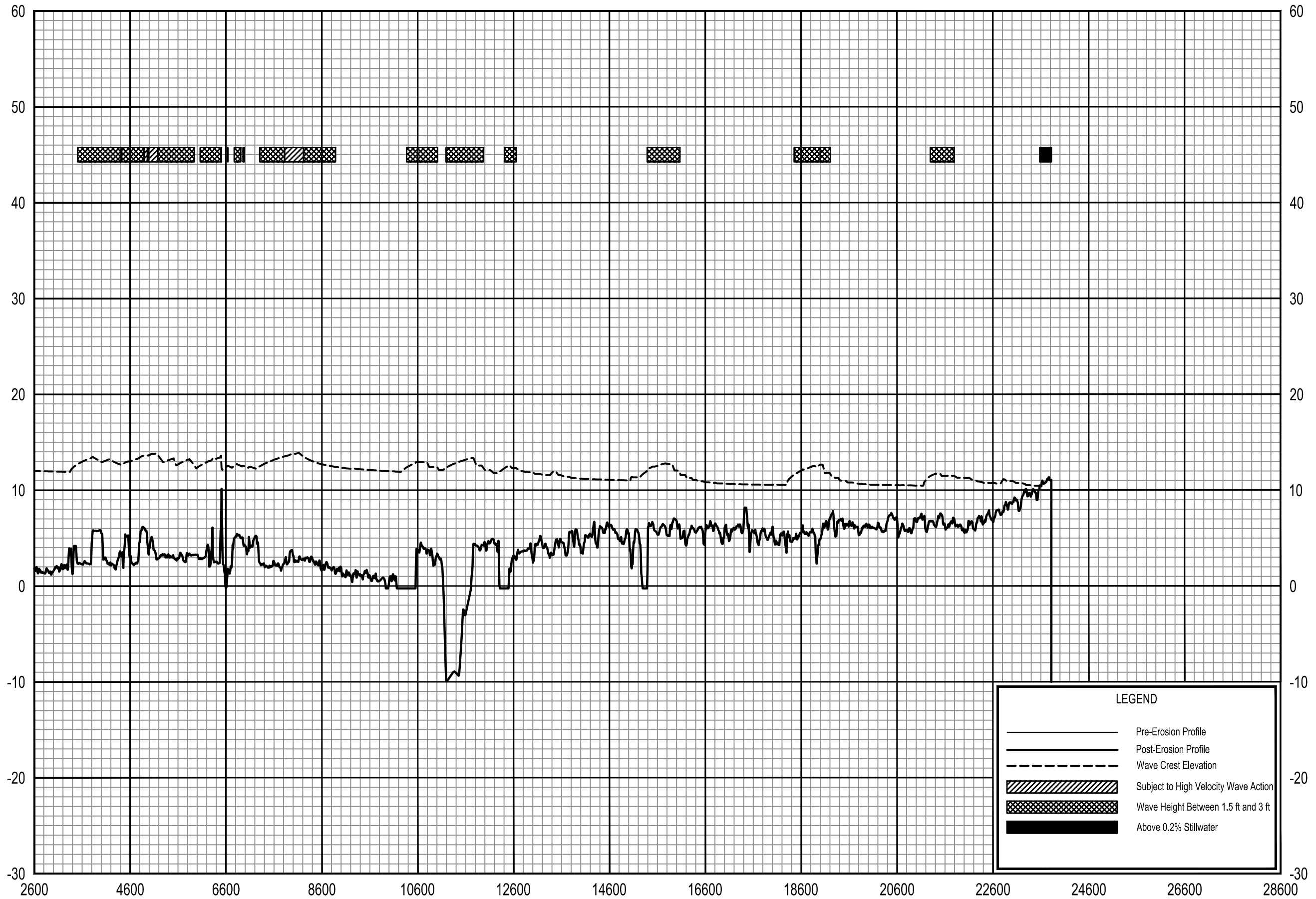
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 45

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)

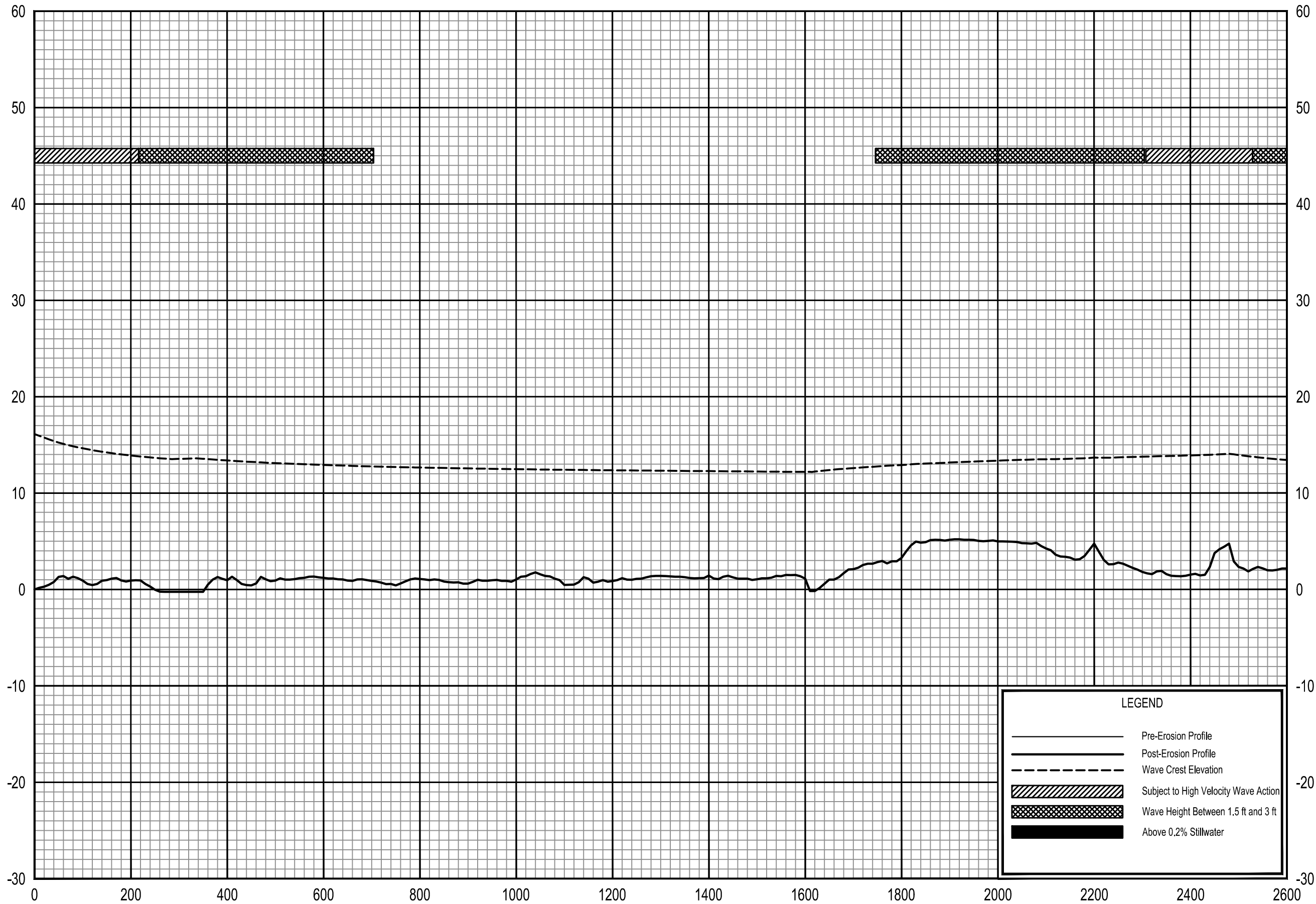


0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 45

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

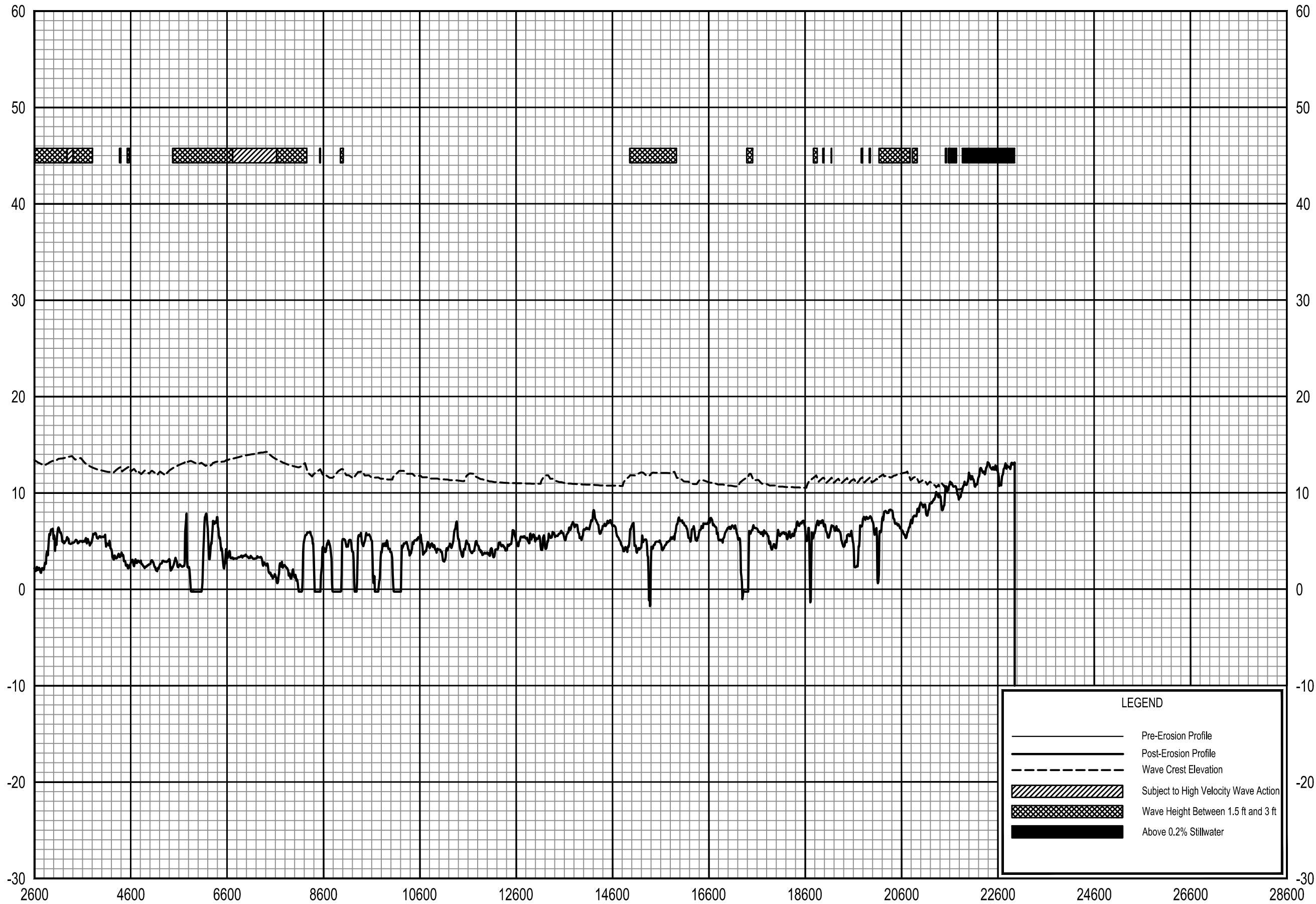
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 46

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

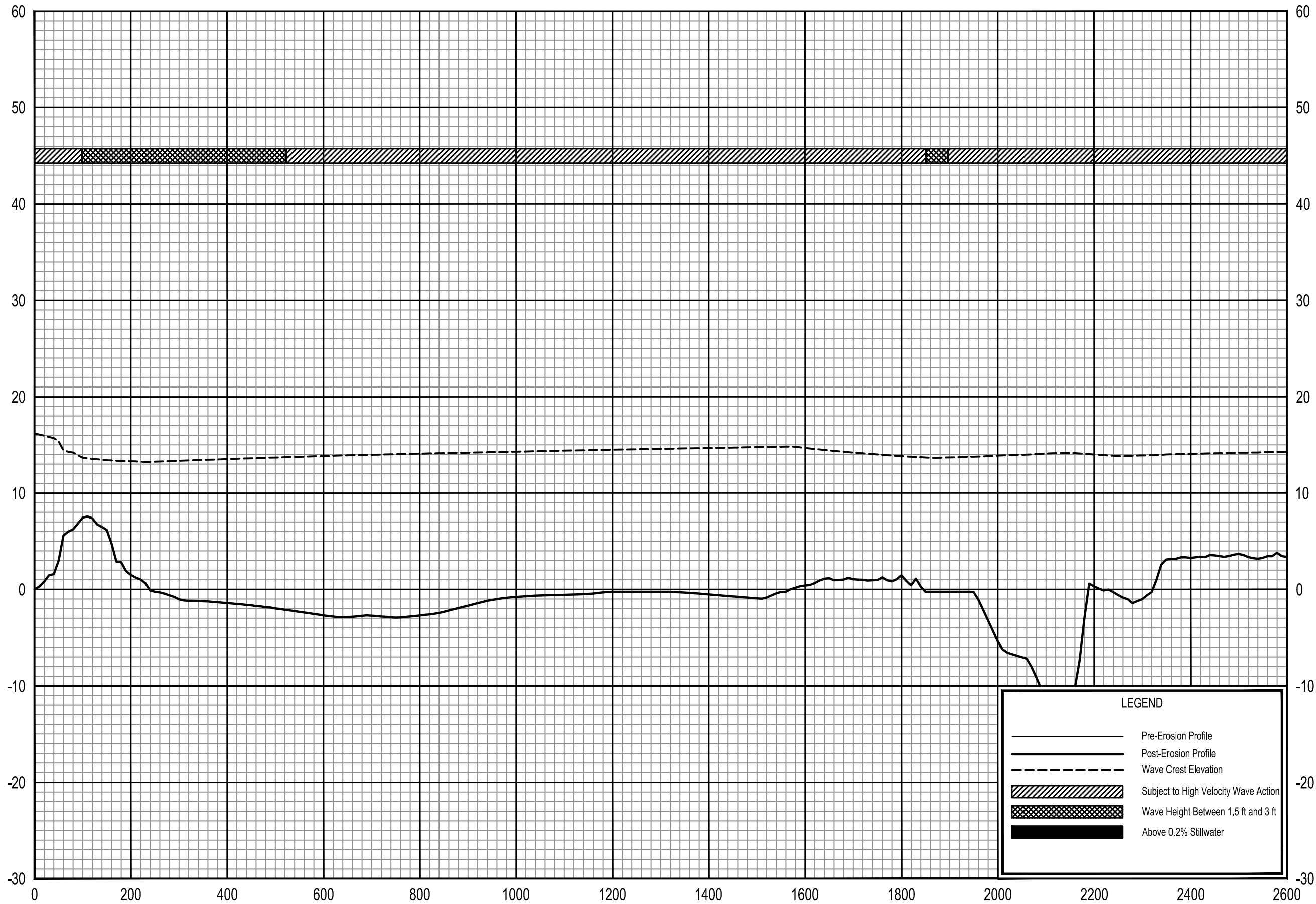
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 46

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

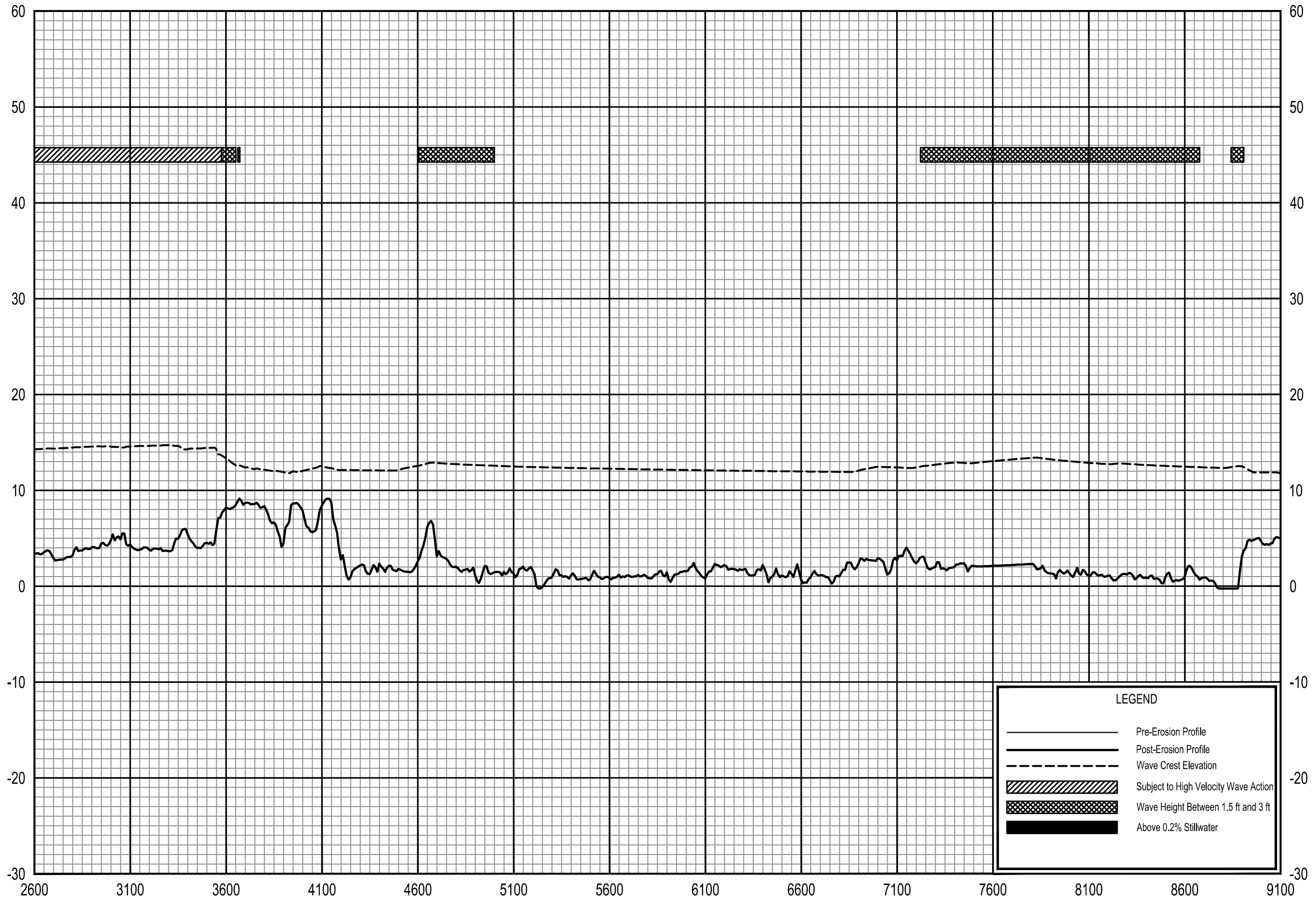
TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 47

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

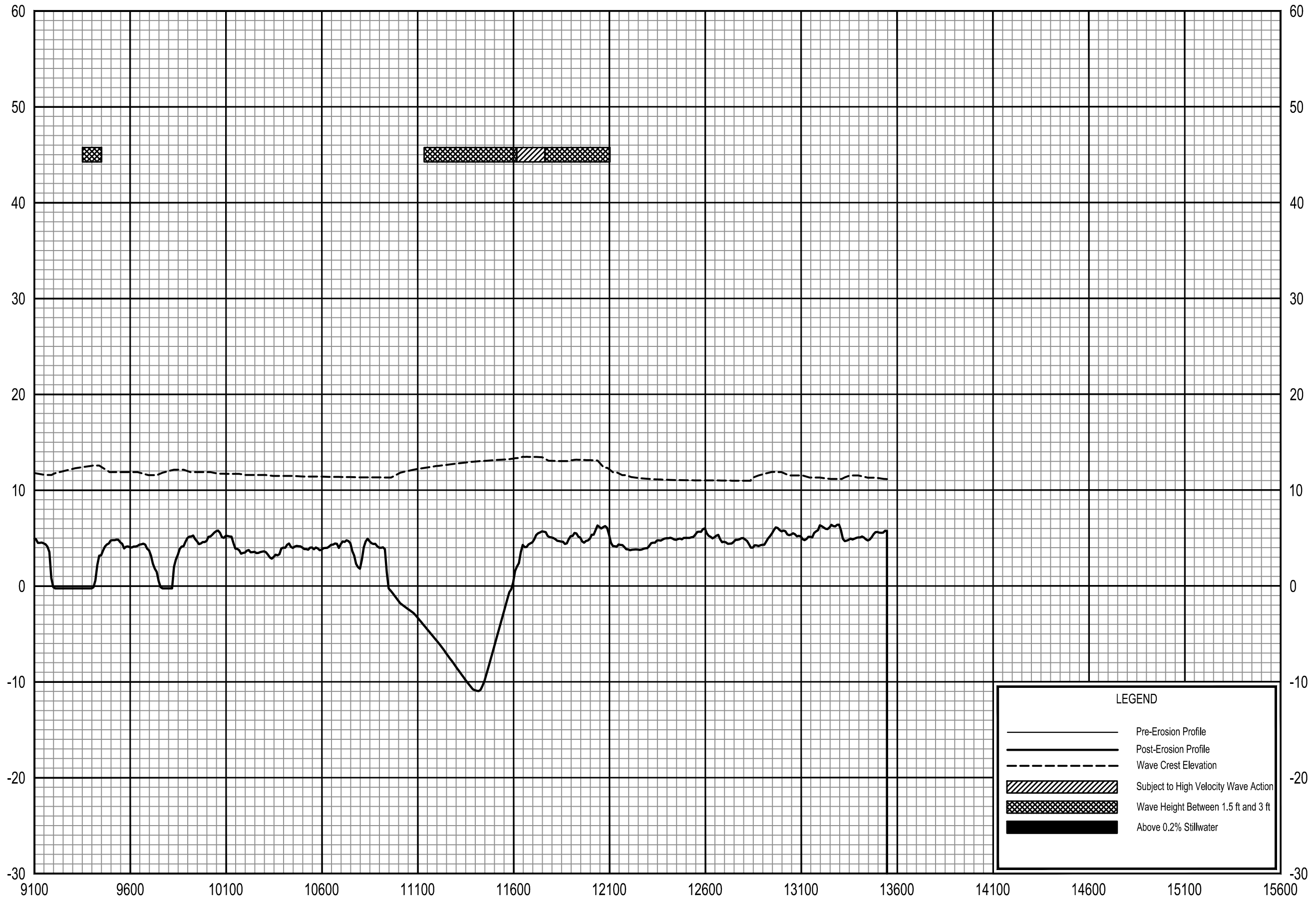
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 47

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

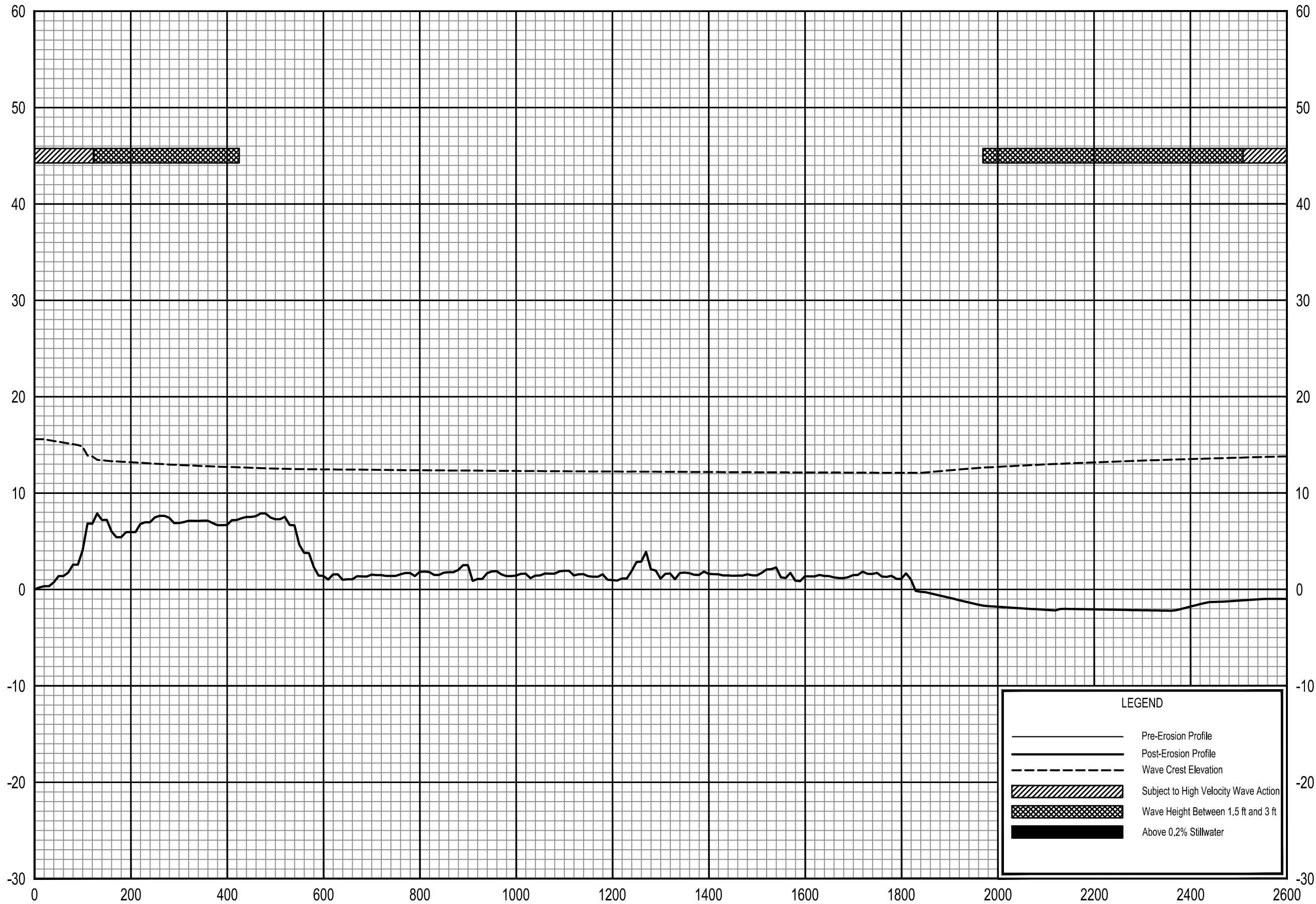
- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 47

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



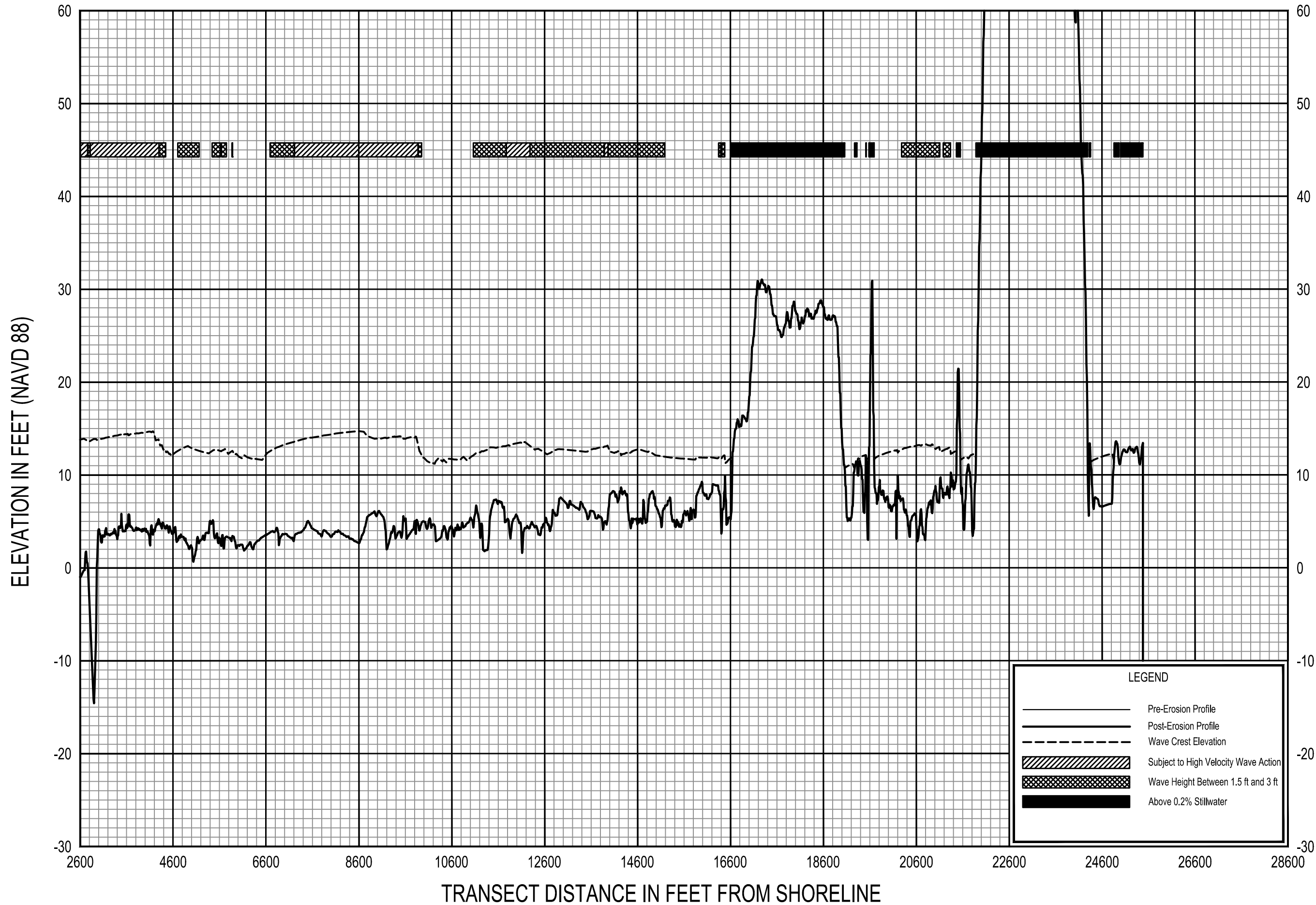
LEGEND

- Pre-Erosion Profile
- Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 48

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS



LEGEND

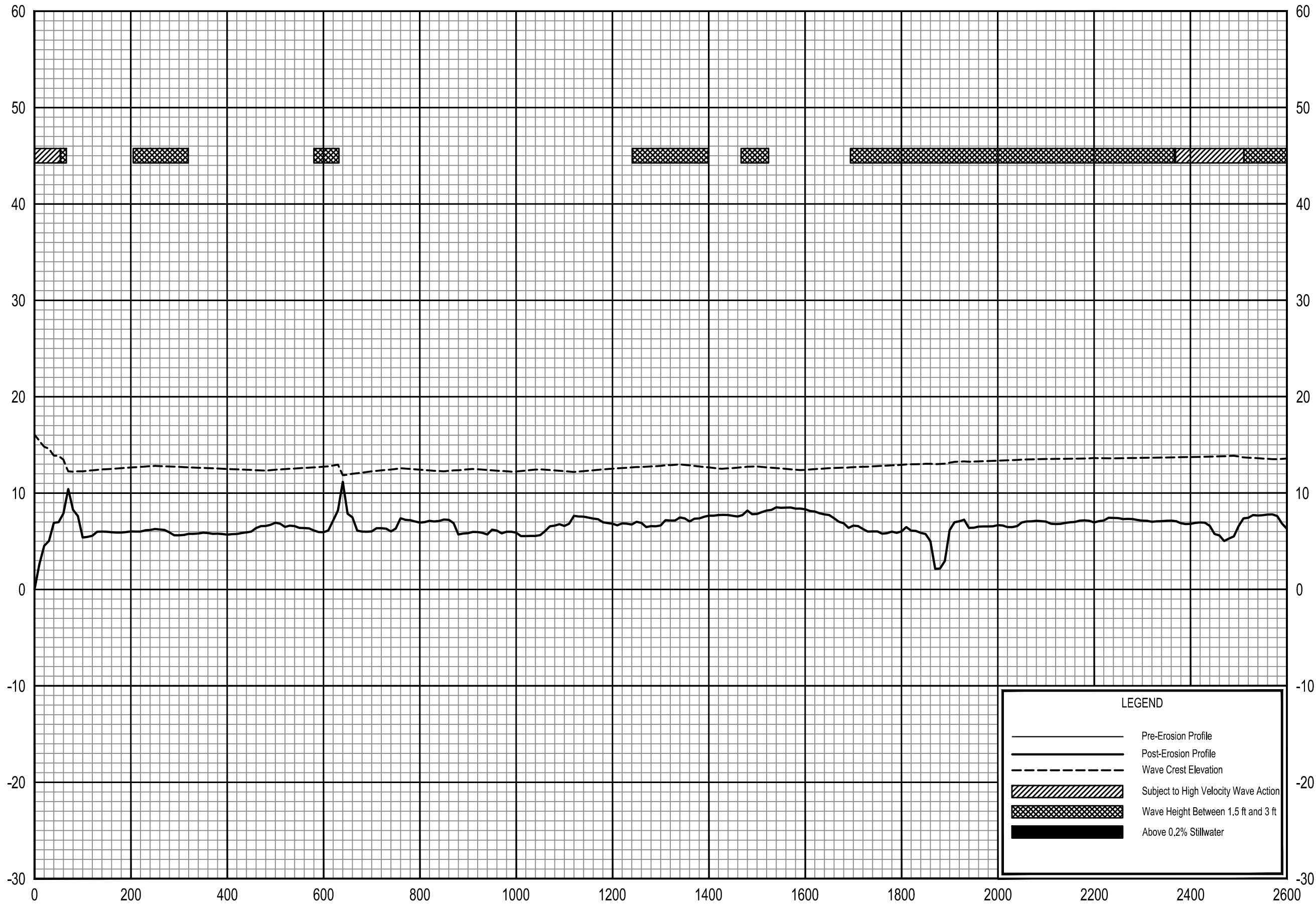
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 48

FEDERAL EMERGENCY MANAGEMENT AGENCY
 PINELLAS COUNTY, FL
 AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

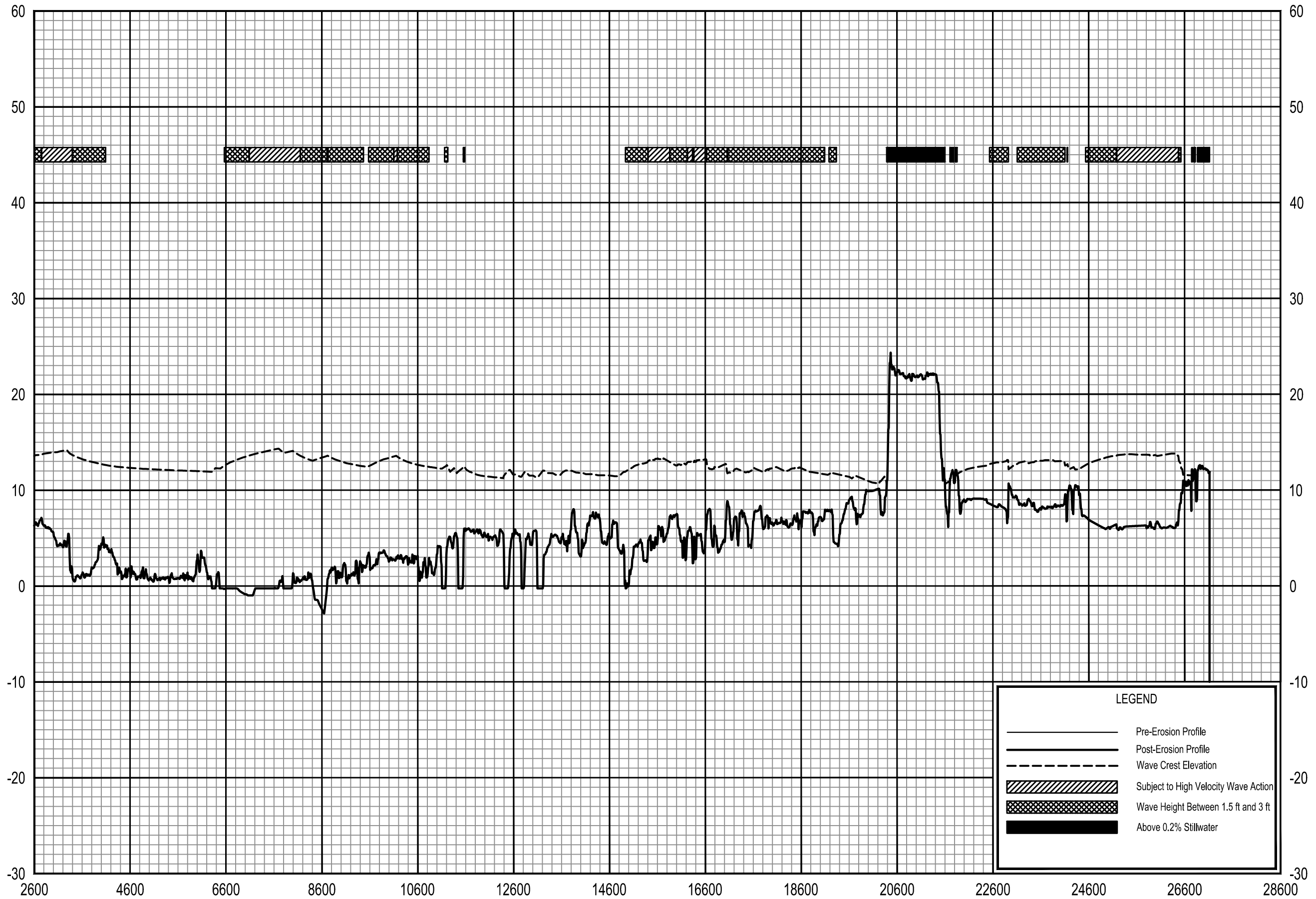
- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 49

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD 88)



LEGEND

- Pre-Erosion Profile
- - - Post-Erosion Profile
- - - Wave Crest Elevation
- ▨ Subject to High Velocity Wave Action
- ▩ Wave Height Between 1.5 ft and 3 ft
- Above 0.2% Stillwater

TRANSECT DISTANCE IN FEET FROM SHORELINE

0.2% ANNUAL CHANCE WAVE ENVELOPE

TRANSECT 49

FEDERAL EMERGENCY MANAGEMENT AGENCY
PINELLAS COUNTY, FL
AND INCORPORATED AREAS

88 T