PRELIMINARY/CONSTRUCTION/ STORMWATER PLANS FOR AERONAUTICAL SYSTEMS SYSTEMS, INC.

14,400 SQUARE FEET OF OFFICE/WAREHOUSE ON 0.99 ACRES
ON THE WEST SIDE OF DESTINY WAY IN WEST PASCO INDUSTRIAL PARK, PHASE I
SECTION 29, TOWNSHIP 26 SOUTH, RANGE 17 EAST, PASCO COUNTY, FLORIDA.

SITE DATA

EXISTING LAND USE:
VACANT
PROPOSED LAND USE:
14,400 SQ.FT. WAREHOUSE
EXISTING ZONING/ FUTURE LAND USE:
I-1 (RZ3954 10/25/88) / IH

PARCEL INFORMATION:
29-26-17-0010-00000-0210
PROPERTY CALCULATIONS:

SITE DATA				
CRITERIA	EXISTING	PROPOSED	REQUIRED	VARIANCE % REQUIRED
SITE AREA	43,200 SQ.FT.	.99 ACRES	N/A	
OFFICE / WAREHOUSE LAND USE	N/A	14,400 SQ.FT.	N/A	
FLOOR-AREA RATIO (FAR)	N/A	0.333	0.50(MAX)	
PAVED VEHICULAR USE (PVU)	N/A	10,120 SQ.FT.	N/A	
PAVED VEHICULAR USE %	N/A	23.4%	N/A	
INTERIOR LANDSCAPE AREA	N/A	1,260 SQ.FT.	N/A	
INTERIOR LANDSCAPE AREA % OF PVU	N/A	12.4%	N/A	
TOTAL SITE IMPERVIOUS	N/A	25,000 SQ.FT.	N/A	
TOTAL SITE IMPERVIOUS %	N/A	57.9%	N/A	

SETBACKS			
CRITERIA	EXISTING	PROPOSED	REQUIRED
DESTINY WAY (FRONT)	N/A	54' MIN	20'
SIDE	N/A	10' MIN	5'
REAR	N/A	15' MIN.	15'

PROPOSED BUILDINGS:
OFFICE/WAREHOUSE - 14,400 SQ.FT.
FLOOR/AREA RATIO - 8,928/43,200 = 0.298
PROPOSED BUILDING HEIGHT - 43.0 FEET (1 STORY)
MAXIMUM BUILDING HEIGHT - 60 FEET (4 STORIES)

ALLOWABLE BUILDING AREA
SITE AREA = 0.99 ACRES
DEVELOPABLE AREA = 0.99 ACRES
ALLOWABLE BUILDING AREA
=50% OF DEVELOPABLE AREA
=43,200*0.50 = 21,600 SQ. FT.
(NO WETLANDS ON-SITE)
PARKING REQUIREMENTS:
MANUFACTURING - 9,600 SQ.FT. *1/700=14
ADMIN. OFFICE - 4,800 SQ.FT.*1/300 = 16
5 VISITOR SPACES
TOTAL REQUIRED=35 SPACES, INCL. 2 HANDICAP
41 PARKING SPACES PROVIDED, INCL. 2 HANDICAP, 4 COMAPCT
SPACE DIMENSIONS - 9'x20' REG., 8'x20' COMPACT, 12'x20' HANDICAP

CONSTRUCTION SCHEDULE:
START 2014 AND COMPLETE IN EARLY 2015

FLOOD ZONE:
FLOOD ZONE "A" PER FIRM PANEL #120230 0360 D (9/30/92)
BASE FLOOD ELEV. = 40.5 NGVD (39.68 NAVD)
SITE MASS GRADED WITH W.P.I.P. PHASE I CONSTRUCTION

NOTES:
IF DURING CONSTRUCTION ACTIVITIES ANY EVIDENCE OF HISTORIC RESOURCES, INCLUDING BUT NOT LIMITED TO ABORIGINAL OR HISTORIC POTTERY, PREHISTORIC STONE TOOLS, BONE OR SHELL TOOLS, HISTORIC TRASH PITS, OR HISTORIC BUILDING FOUNDATION, ARE DISCOVERED, WORK SHALL COME TO AN IMMEDIATE STOP AND THE FLORIDA DEPARTMENT OF HISTORIC RESOURCES (STATE HISTORIC PRESERVATION OFFICER) AND PASCO COUNTY SHALL BE NOTIFIED WITHIN TWO WORKING DAYS OF THE RESOURCES FOUND ON THE SITE. IF DURING CONSTRUCTION ACTIVITIES ANY EVIDENCE OF THE PRESENCE OF STATE OR FEDERALLY-PROTECTED PLANT AND/OR ANIMAL SPECIES IS DISCOVERED, WORK SHALL COME TO AN IMMEDIATE STOP AND PASCO COUNTY SHALL BE NOTIFIED WITHIN TWO WORKING DAYS OF FINDING THE PLANT AND/OR ANIMAL SPECIES ON THE SITE.

FIRE PROTECTION BY PASCO CO. FIRE RESCUE STATION #15 WITH HYDRANTS.

SITE PREVIOUSLY CLEARED AND FILLED WITH W.P.I.P. PHASE I IMPROVEMENTS.

THERE ARE NO KNOWN HISTORICAL RESOURCES ON SITE.

ALL ELEVATIONS ARE NAVD 1988.

ALL UNDERGROUND PIPING PRIVATELY OWNED-NO EASEMENTS REQUIRED.

DRAINAGE DESIGN BASED ON PROPOSED LOT 21 AND EXISTING CONDITIONS OF OTHER ABUTTING SITES.

THERE IS NO IMPORT OR EXPORT OF FILL ANTICIPATED FOR THIS PROJECT.

NO ON-SITE BURN IS ALLOWED WITHOUT APPROVAL OF DEPT. OF FORESTRY.

SITE LIES OUTSIDE ALL WELLHEAD PROTECTION ZONES.

UTILITY COMPANIES

SEWER AND WATER:
FL. GOVERMENTAL UTILITY AUTHORITY
PHONE (727) 372-0115
REUSE WATER:
NOT AVAILABLE

ELECTRIC:
PROGRESS ENERGY
PHONE: (727) 372-5167
CONTACT: JASON MEDLAR
TELEPHONE:
VERIZON
PHONE (727) 562-1215
CONTACT: ZUYIN SALGADO

CABLE:
BRIGHTHOUSE NETWORKS
PHONE (863) 965-7733

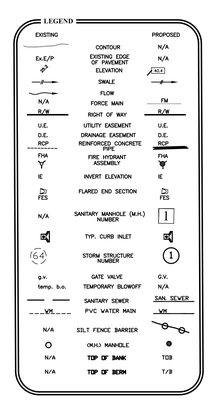
PREPARED FOR OWNER/DEVELOPER:

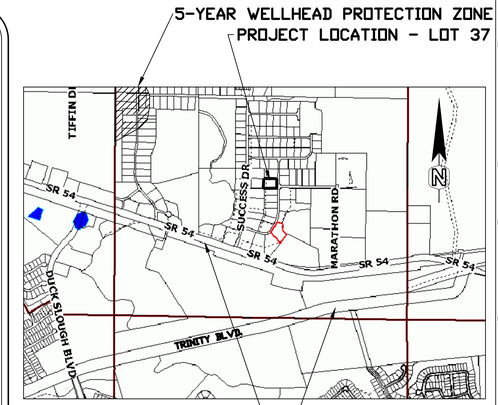
Aeronautical Systems Engineering, Inc.
2448 DESTINY WAY
ODESSA, FLORIDA 33556
PH.: (727) 409-8416

PREPARED BY:

GUSTAFSON ENGINEERING COMPANY
15030 SURREY BEND, BROOKSVILLE, FL. 34609
PH: (727) 992-0759 email: ray@gustafsonengineering.com

LEGAL DESCRIPTION:
LOT 21, WEST PASCO INDUSTRIAL PARK PHASE I REPLAT, AS PER PLAT THEREOF RECORDED IN PLAT BOOK 27, PAGE 49, OF THE PUBLIC RECORDS OF PASCO COUNTY, FLORIDA.





LOCATION MAP

SHEET INDEX

1. KEY SHEET
2. SITE PLAN
3. GRADING & UTILITY PLAN
4. LANDSCAPE PLAN
5. DETAILS
6. GENERAL NOTES
7. EROSION CONTROL PLAN

PROJECT GEOTECH:

BTL ENGINEERING SERVICES, INC.
1502 NORTH OCCIDENT STREET
TAMPA, FLORIDA 33684
PHONE: (813) 884-0755
FAX: (813) 886-5377
CONTACT: STEPHEN WEST

PROJECT SURVEYOR:

WILLIAMSON & ASSOCIATES, INC.
5020 GUNN HWY, SUITE 220A
TAMPA, FLORIDA 33624
PHONE: (813) 265-4795
FAX: (813) 264-6062

AERONAUTICAL SYSTEMS SYSTEMS, INC.

KEY SHEET

GUSTAFSON
ENGINEERING COMPANY
SITE DEVELOPMENT • HIGHWAY DESIGN
LAND PLANNING • PERMITTING
15030 SURREY BEND
BROOKSVILLE, FLORIDA 34609
PHONE (727) 992-0759 E.B.#8970

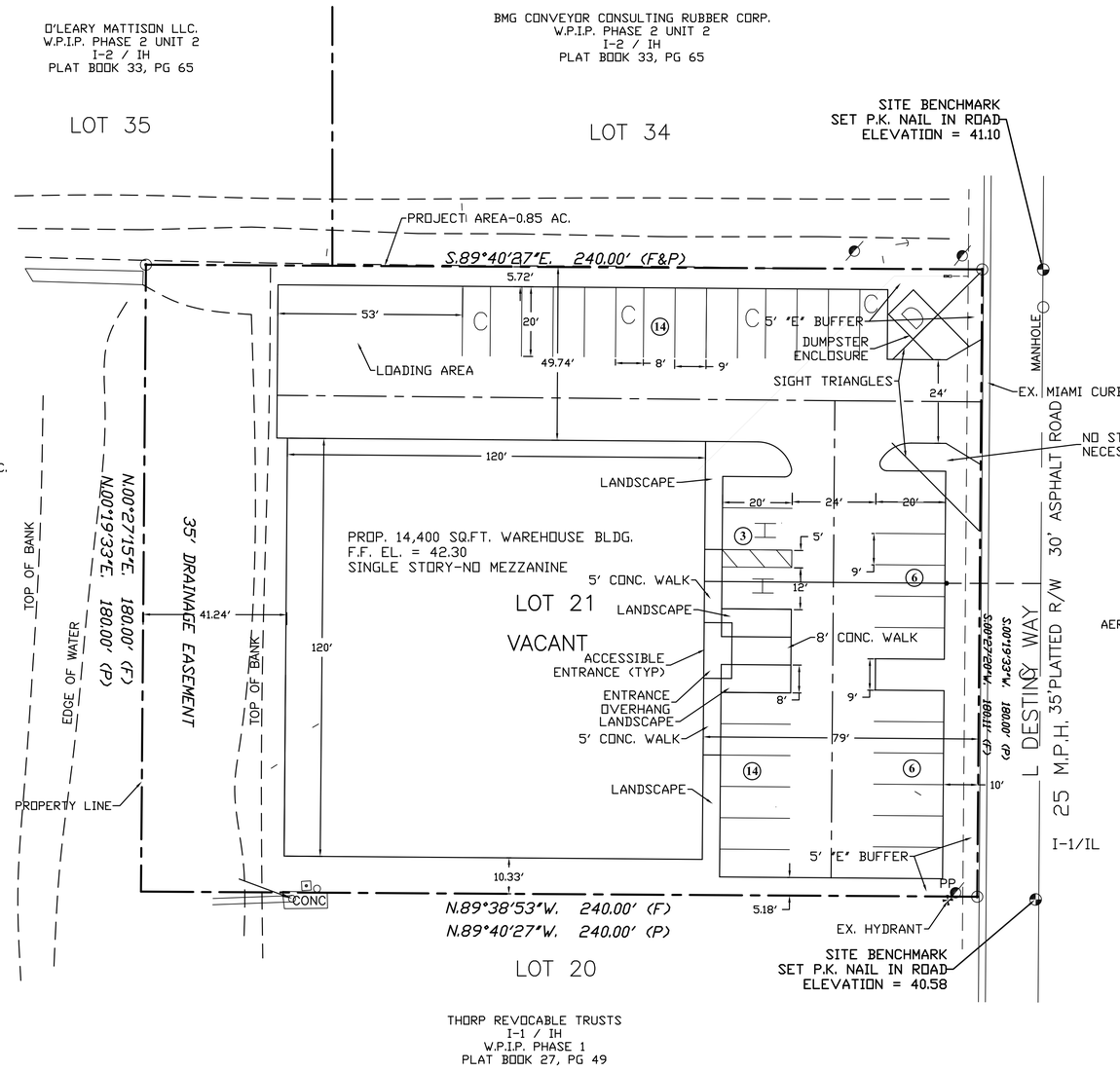
MARK	REV

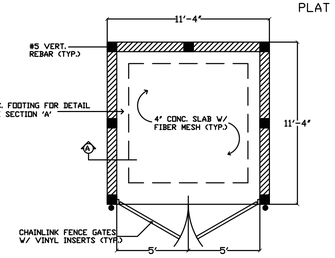
APPR BY	RDG
DESIGN BY	RDG
DRAWN BY	CAD
DATE	8/14
SCALE	NTS

PROJECT NUMBER
14005

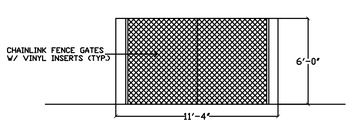
RAY D. GUSTAFSON
NO. 37565
STATE OF FLORIDA
PROFESSIONAL ENGINEER
RAY D. GUSTAFSON
P.E. NO. 37565

SHEET NUMBER
1 OF **7**

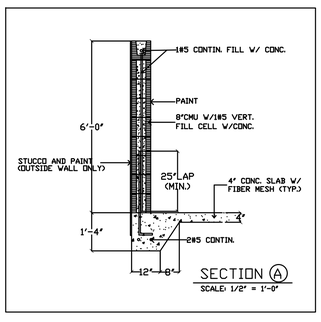




FLOOR PLAN
SCALE: 1/4" = 1'-0"



FRONT ELEVATION
SCALE: 1/4" = 1'-0"



SECTION (A)
SCALE: 1/2" = 1'-0"

DUMPSTER ENCLOSURE DETAIL

48 HOURS
BEFORE YOU DIG
"CALL SUNSHINE"
1-800-432-4770

20 15 0 20
SCALE:1"= 20

NOTE TO CONTRACTOR:
SEDIMENT CONTROLS TO BE INSTALLED AROUND PERIMETER OF PROPERTY PRIOR TO THE START OF CONSTRUCTION AND REMAIN IN PLACE DURING CONSTRUCTION. CONTRACTOR TO PERFORM DAILY INSPECTIONS OF THESE SYSTEMS AND PROVIDE MAINTENANCE AS REQUIRED FOR CONTINUOUS PROPER FUNCTIONING.

NOTES:
1. NO CANOPIES, BALCONY, ETC. ARE PROPOSED FOR THIS PROJECT.
2. ALL BUILDINGS TO BE SINGLE STORY.
3. ALL BUILDINGS TO HAVE A MAXIMUM HEIGHT OF 43'.
4. THE PROJECT WILL BE COMPLETED IN ONE PHASE.
5. PARKING AISLE RADII ARE 2' TO EP UNLESS OTHERWISE NOTED.
6. FILL REQUIRED WILL BE COMPACTED TO A 95% MODIFIED PROCTOR.
7. THERE ARE NO WETLANDS ON SITE.
8. NO LIGHT SPILLAGE OR GLARE ALLOWED BEYOND PROJECT SITE.

PASCO COUNTY SITE PLAN NOTES:
1. ALL UTILITY CONSTRUCTION SHALL COMPLY WITH THE PASCO COUNTY STANDARDS FOR DESIGN AND CONSTRUCTION OF WATER AND WASTEWATER FACILITIES SPECIFICATIONS, LATEST EDITION.
2. ALL ON-SITE WATER AND SEWER FACILITIES SHALL BE OWNED AND MAINTAINED BY THE OWNER-DEVELOPER.
3. INSTALLATION OF FUEL STORAGE TANKS REQUIRES REVIEW AND APPROVAL BY THE FIRE MARSHALL AND ISSUANCE OF A SEPARATE BUILDING PERMIT. aPPROVAL OF THE SITE PLAN DOES NOT CONSTITUTE APPROVAL OF THE LOCATION OF THE FUEL TANKS.
4. ALL PROPOSED SIGNS MUST BE APPLIED FOR, AND PERMITTED ON AN INDIVIDUAL BASIS APART FROM ANY ULTIMATELY APPROVED SITE PLAN. APPROVAL OF THIS SITE PLAN DOES NOT CONSTITUTE APPROVAL OF ANY SIGNAGE.
5. HANDICAP PARKING SPACES WILL BE PROPERLY SIGNED AND STRIPED IN ACCORDANCE WITH FLORIDA STATUTE 316, THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES, OR OTHER APPLICABLE STANDARDS.
6. THE ARCHITECT/ENGINEER CERTIFIES THAT THE SITE HAS BEEN DESIGNED IN ACCORDANCE WITH THE AMERICANS WITH DISABILITIES ACT.
7. ALL ON-SITE PARKING SPACES WILL BE STRIPED AND SIGNED IN ACCORDANCE WITH THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES, LATEST EDITION. PARKING SPACES, DIRECTIONAL ARROWS, AND STOP BARS SHALL BE STRIPED WHITE. IT SHALL BE THE OWNER/DEVELOPER'S RESPONSIBILITY TO PROPERLY SIGN AND STRIPE IN ACCORDANCE WITH APPLICABLE STANDARDS.
8. THE OWNER/DEVELOPER ACKNOWLEDGES THAT THIS APPROVAL DOES NOT INCLUDE ANY WORK IN THE COUNTY RIGHT-OF-WAY. ALL RIGHT-OF-WAY WORK SHALL BE A FUNCTION OF AS APPROVED PASCO RIGHT-OF-WAY USE PERMIT.
9. ALL CLEAR-SITE AREAS SHALL BE KEPT FREE OF ANY SIGNAGE, PLANTINGS, TREES, ETC.. IN EXCESS OF THREE-AND-A-HALF (3-1/2) FEET IN HEIGHT.
10. NO IRRIGATION SYSTEM OR LANDSCAPING SHALL BE INSTALLED IN ANY COUNTY OR STATE RIGHT-OF-WAY WITHOUT ISSUANCE OF APPROPRIATE RIGHT-OF-WAY USE PERMIT.
11. THE OWNER/DEVELOPER ACKNOWLEDGES THAT THE SITE AND ITS SUBSEQUENT BUILDING PERMITS SHALL COMPLY WITH ALL REZONING/MPUD/PUD CONDITIONS.
12. ALL STRUCTURES, INCLUDING BUFFER WALLS, RETAINING WALLS. SIGNAGE, ETC.. REQUIRE BUILDING PERMITS.

AERONAUTICAL SYSTEMS SYSTEMS, INC.
PRELINIARY PLAN

GUSTAFSON
ENGINEERING COMPANY
SITE DEVELOPMENT • HIGHWAY DESIGN
LAND PLANNING • PERMITTING
15030 SURREY BEND
BROOKSVILLE, FLORIDA 34609
PHONE (727) 992-0759 E.B.#8970

MARK	REV

APPR BY	RDG
DESIGN BY	RDG
DRAWN BY	CAD
DATE	8/14
SCALE	NTS

PROJECT NUMBER
14005

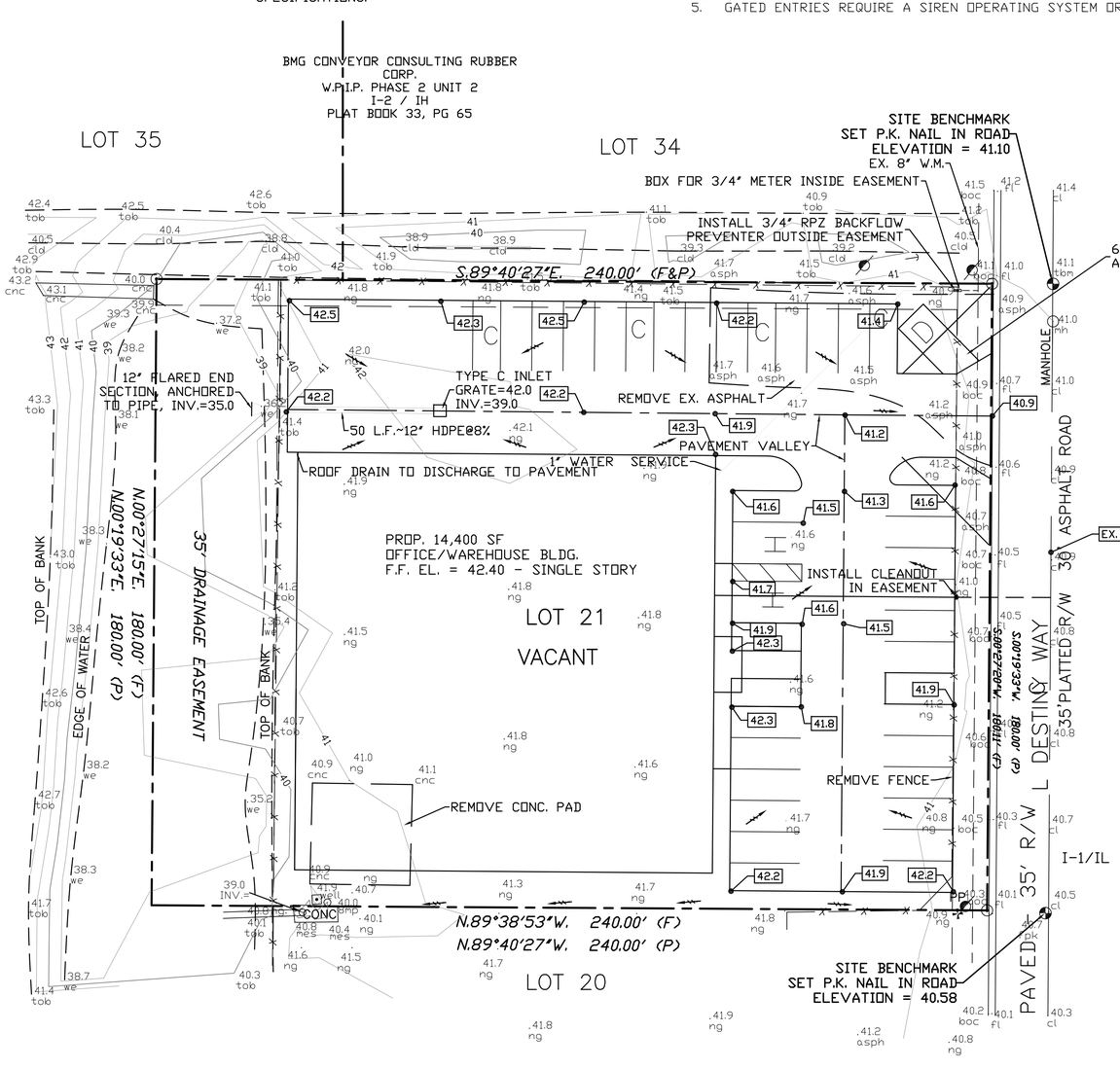
RAY D. GUSTAFSON
NO. 37565
STATE OF FLORIDA
PROFESSIONAL ENGINEER

RAY D. GUSTAFSON
P.E. NO. 37565

SHEET NUMBER
2 OF **7**

UTILITY NOTES:
1. PROPERTY OWNER SHALL BE RESPONSIBLE FOR MAINTENANCE AND OPERATION OF ALL FACILITIES ON THEIR SIDE OF THE SEWER CLEANOUT AND WATER METER IN THE UTILITY EASEMENT.
2. ALL UTILITY CONSTRUCTION SHALL BE IN ACCORDANCE WITH FGUA AND PASCO COUNTY POLICY, STANDARDS, AND SPECIFICATIONS.

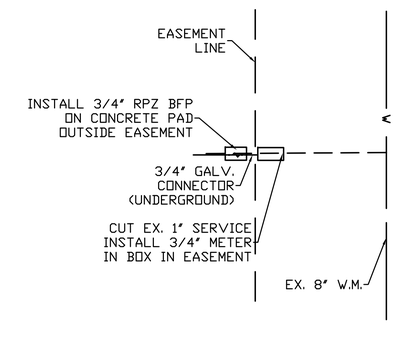
UTILITY NOTES:
1. ALL PROJECTS MUST COMPLY WITH PASCO COUNTY FIRE HYDRANT ORDINANCE NO. 46_51.
2. FIRE HYDRANTS SHALL BE INSTALLED AND IN SERVICE PRIOR TO THE ACCUMULATION OF COMBUSTIBLES.
3. PER THE NATIONAL FIRE PROTECTION ASSOCIATION, NFPA_1, 16.4.3.1.3: WHERE UNDERGROUND WATER MAINS AND HYDRANTS ARE TO BE PROVIDED, THEY SHALL BE INSTALLED, COMPLETED, AND IN SERVICE PRIOR TO CONSTRUCTION WORK.
4. PER NFPA_1, 18.3.4.1: CLEARANCES OF 7½ FEET IN FRONT OF AND TO THE SIDES OF THE FIRE HYDRANT WITH A 4_FOOT CLEARANCE TO THE REAR MUST BE MAINTAINED AT ALL TIMES.
5. GATED ENTRIES REQUIRE A SIREN OPERATING SYSTEM OR A 3M OPTICOM SYSTEM FOR EMERGENCY ACCESS.



DRAINAGE NOTES:
1. ROOF DRAINS TO DISCHARGE TO PAVEMENT OR ENRGY DISSIPATORS AND SWALE DISCHARGING TO POND.
2. ALL SITE DRAINAGE DRAINS TO STREET OR POND.

SITE PREPARATION:
1. SITE TO BE PROOF-ROLLED WITH 5-TON ROLLER AFTER STRIPPING AND REMOVAL OF UNSUITABLE MATERIALS.
2. SOFT AREAS AND AREAS OF DEFLECTION SHALL BE EXCAVATED AND REPLACE WITH COMPACTED GRANULAR MATERIAL.
3. SITE SHALL BE COMPACTED TO 98% ASTM D 1557 AND TESTED EVERY 2,500 SQ.FT.
4. FILL SHALL BE PLACED IN MAXIMUM 12" LIFTS AND COMPACTED AND TESTED AS ABOVE.
5. REGARDLESS OF DEGREE OF COMPACTION ACHIEVED, A MINIMUM OF 6 PERPENDICULAR OVERLAPPING PASSES SHALL BE MADE WITH THE COMPACTION EQUIPMENT; MORE AS NECESSARY TO ACHIEVE REQUIRED COMPACTION.
6. BTL REPORT FOR JOB NO. 5059-14-1144, INCORPORATED BY REFERENCE. ALL RECOMMENDATOINS SHALL BE FOLLOWED BY SITE CONTRACTOR.

UTILITY NOTES:
1. UTILITY WORK SHALL BE DONE WITH INSPECTION COORDINATED WITH FGUA. PHONE 727-372-0115.
2. CONTRACTOR TO PREPARE SITE FOR METER INSTALLATION. FGUA TO INSTALL METER.



WATER CONNECTION

UTILITY NOTES:
1. CONNECTIONS INTO EXISTING SYSTEMS SHALL BE VIA WET TAP. WET TAPS SHALL BE PERFORMED BY FGUA AT THE DEVELOPER'S EXPENSE. EXCAVATION, BACKFILL AND SURFACE RESTORATION SHALL BE THE CONTRACTOR'S RESPONSIBILITY. MATERIALS FOR WET TAPS LARGER THAN 2" SHALL BE PROVIDED AND INSTALLED BY THE PROJECT CONTRACTOR.
2. PROPERTY OWNER SHALL BE RESPONSIBLE FOR MAINTENANCE AND OPERATION OF ALL FACILITIES ON THEIR SIDE OF THE SEWER CLEANOUT AND WATER METER IN THE UTILITY EASEMENT.
3. ALL UTILITY CONSTRUCTION SHALL BE IN ACCORDANCE WITH FGUA AND PASCO COUNTY POLICY, STANDARDS, AND SPECIFICATIONS.

AERONAUTICAL SYSTEMS SYSTEMS, INC.

GRADING & UTILITY PLAN

GUSTAFSON ENGINEERING COMPANY
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MARK	REV

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14005

RAY D. GUSTAFSON
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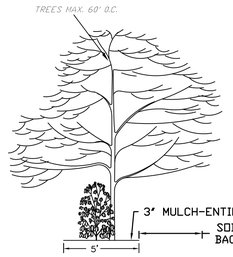
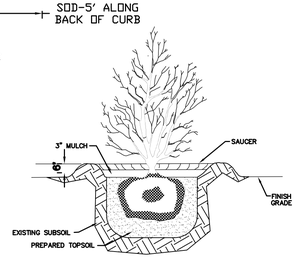
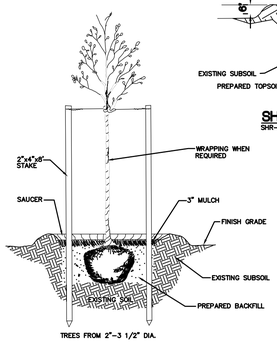
SHEET NUMBER
3 OF **7**



TYPICAL TYPE "E" BUFFER



SHRUB PLANTING DETAIL
SHR-DTL.DWG N.T.S.



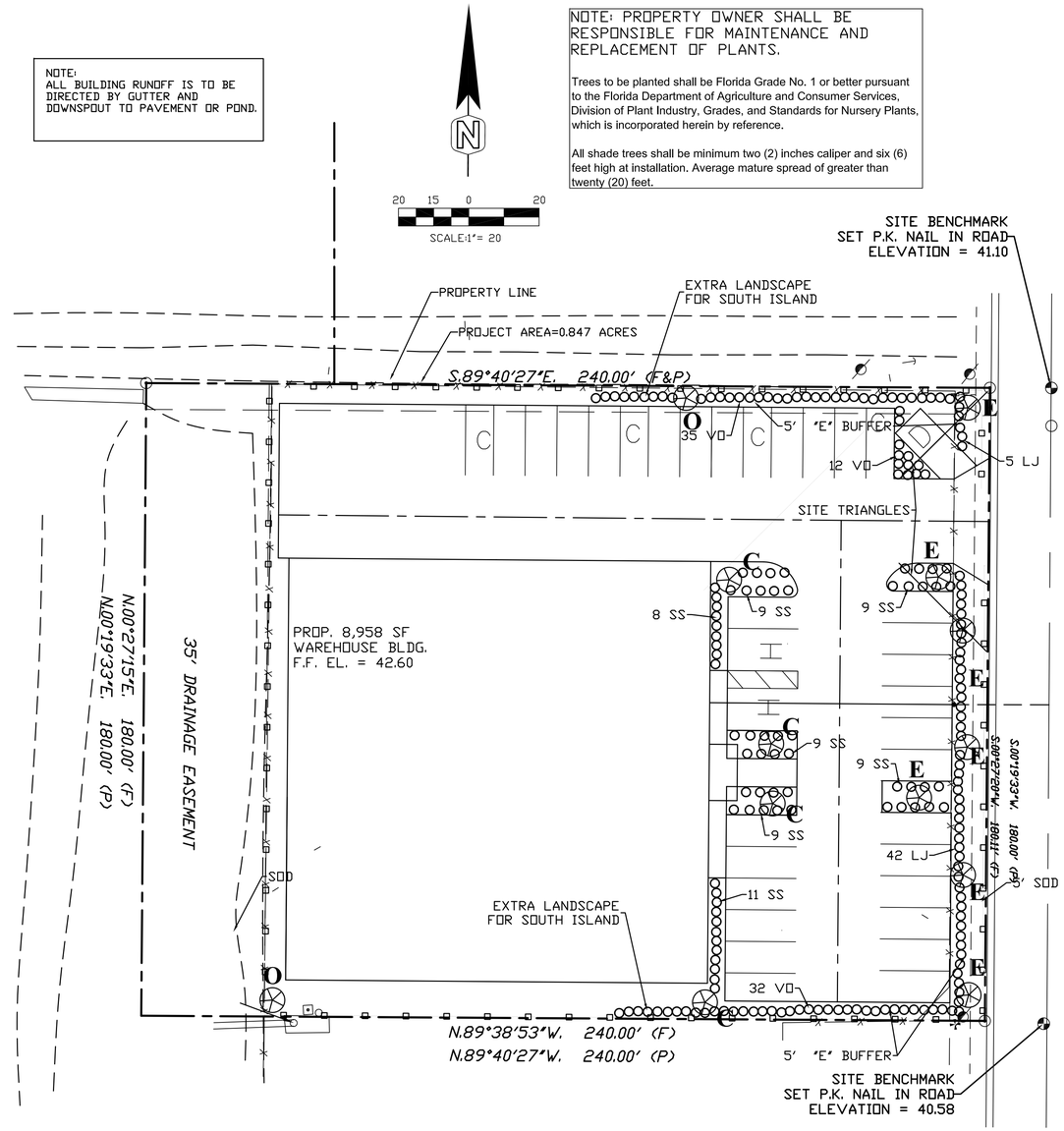
TREE PLANTING DETAIL
TREEDTL.DWG N.T.S.

NOTE:
ALL BUILDING RUNOFF IS TO BE DIRECTED BY GUTTER AND DOWNSPOUT TO PAVEMENT OR POND.

NOTE: PROPERTY OWNER SHALL BE RESPONSIBLE FOR MAINTENANCE AND REPLACEMENT OF PLANTS.

Trees to be planted shall be Florida Grade No. 1 or better pursuant to the Florida Department of Agriculture and Consumer Services, Division of Plant Industry, Grades, and Standards for Nursery Plants, which is incorporated herein by reference.

All shade trees shall be minimum two (2) inches caliper and six (6) feet high at installation. Average mature spread of greater than twenty (20) feet.



GENERAL LANDSCAPE NOTES:

1. ALL PLANT MATERIALS SHALL BE FLORIDA #1 OR BETTER AND INSTALLED TO HIGHEST NURSERY STANDARDS. PLANTS SHALL BE HEALTHY, FREE OF PESTS AND DISEASE.
2. ALL PLANTS SHALL BE CONTAINER GROWN EXCEPT AS NOTED ON PLAN.
3. ALL PLANTS AND TREES SHALL HAVE STRAIGHT TRUNKS WITH NO TWISTS, KNOTTING OR OTHER DEFECTIVE CHARACTERISTICS.
4. MULCH SHALL BE 100% PINE BARK, INSTALLED TO A MINIMUM THICKNESS OF 3".
5. SOD SHALL BE 95% WEED FREE BAHIA, INSTALLED WITH TIGHT JOINTS.
6. ALL DIMENSIONS SHALL BE FIELD CHECKED BY THE LANDSCAPE CONTRACTOR PRIOR TO CONSTRUCTION WITH ANY DISCREPANCIES REPORTED TO THE CONTRACTOR.
7. ALL MATERIALS SHALL BE SPECIFIED ON THE PLANS. IF MATERIALS, LABOR OR INSTALLIATION TECHNIQUES DO NOT ADHERE TO THE SPECIFICATIONS, THEY WILL BE REJECTED BY THE CONTRACTOR WITH SPECIFIED MATERIALS AND INSTALLATION CARRIED OUT BY THE LANDSCAPE CONTRACTOR AT NO ADDITIONAL COST.
8. NO SUBSTITUTIONS OF MATERIALS OR CHANGES TO THE DRAWINGS OR SPECIFICATIONS SHALL BE MADE.
9. ALL REQUIRED PERMITS ARE TO BE PROVIDED BY THE INSTALLING CONTRACTOR UNLESS SPECIFICALLY STATED OTHERWISE IN THE SPECIFICATIONS.
10. CONTRACTOR IDENTIFICATION SIGNS SHALL NOT BE ALLOWED ON THE PROJECT.
11. CONTRACTOR SHALL BE RESPONSIBLE FOR ALL ITEMS AS SHOWN OR DESCRIBED ON THIS PLAN AND SPECIFICATIONS.
12. LANDSCAPE CONTRACTOR SHALL PROVIDE ALL NECESSARY SITE PREPARATION REQUIRED TO READY THE SITE FOR PLANTING AS SPECIFIED.
13. THE LANDSCAPE CONTRACTOR SHALL WARRANTY AND GUARANTEE ALL MATERIALS AND LABOR FOR A PERIOD OF 90 DAYS FOR SHRUBS AND GROUND COVER, PALMS AND TREES. WARRANTY AND GUARANTEE PERIOD SHALL BEGIN UPON DATE OF COMPLETION.
14. ALL REPAIRS AND/OR REPLACEMENTS SHALL BE MADE BY THE LANDSCAPE CONTRACTOR WITHIN 10 WORKING DAYS UPON NOTIFICATION OF ANY DEFICIENCIES BY THE OWNER OR THEIR REPRESENTATIVE.

FERTILIZATION:

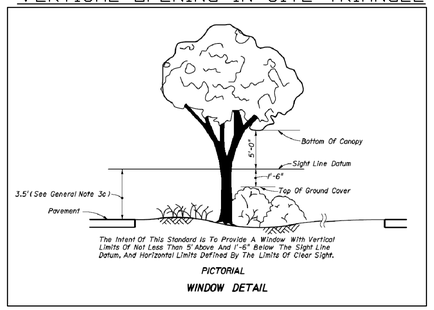
SHRUBS AND TREES

ALL TREES AND SHRUBS SHALL BE FERTILIZED WITH "AGRIFORM" 20-15-5 PLANTING TABLETS AT TIME OF PLANTING AND PRIOR TO INSTALLATION OF PLANT BACK FILL. TABLETS SHALL BE PLACED UNIFORMLY AROUND THE ROOT BALL AT A DEPTH THAT IS BETWEEN THE MIDDLE AND THE BOTTOM OF THE ROOT BALL.

GROUND COVER AREAS

ALL GROUND COVER AREAS SHALL RECEIVE FERTILIZATION WITH "OZMOCOTE" TIME RELEASE FERTILIZER PER MANUFACTURER'S SPECIFICATIONS.

VERTICAL OPENING IN SITE TRIANGLE



TREES - 100% NATIVE & DROUGHT TOLERANT
SHRUBS - 42% NATIVE, 100% DROUGHT TOLERANT

PLANT LIST

Symbol	No.	Scientific Name	Common Name	Size Requirements	Native Florida	Drought Tolerant
SHADE TREES						
O	3	Quercus Virginiana	Live Oak	Min. 2" caliper	y	y
C	3	Ligerstroemia Indica	Crepe Myrtle	Min. 6' height	y	y
E	2	Ulmus Alata	Winged Elm	(At installation)	y	y
SHRUBS						
SS	64	Myrcianthes Fragrans	Simpsons Stopper	Min. 18" height	n	y
VO	79	Viburnum Obovatum	Vibumum	3 gallon	y	y
LJ	47	Ligustrum Japonicum	Ligustrum		n	y

UTILITY NOTES:

1. FIRE HYDRANTS MUST BE FLOW TESTED AND COLOR-CODED BASED ON FLOW RESULTS.
2. CONNECTIONS INTO EXISTING FGUA-OWNED SYSTEMS SHALL BE VIA WET TAP. WET TAPS SHALL BE PERFORMED BY ALOHA UTILITIES SERVICES BRANCH AT THE DEVELOPER'S EXPENSE. EXCAVATION, BACKFILL AND SURFACE RESTORATION SHALL BE THE CONTRACTOR'S RESPONSIBILITY. MATERIALS FOR WET TAPS LARGER THAN 2" SHALL BE PROVIDED AND INSTALLED BY THE PROJECT CONTRACTOR.
3. FGUAA UTILITIES SHALL NOT OWN OR MAINTAIN WATER AND SEWER LINES OR FACILITIES ON-SITE.
4. ALL UTILITY MATERIAL AND WORKMANSHIP MUST COMPLY WITH PASCO COUNTY'S STANDARDS FOR DESIGN AND CONSTRUCTION OF WATER, WASTEWATER AND RECLAIMED WATER FACILITIES SPECS, LATEST EDITION.

TREE CALCULATIONS
310 L.F. "E" BUFFER÷60'= 5 TREES
LANDSCAPE ISLANDS - 6 TREES
BUILDING - 2 TREES
TOTAL TREES REQUIRED = 13
TOTAL TREES PROVIDED=11

SHRUB CALCULATIONS
TOTAL SITE LANDSCAPING = 5,830 SQ.FT.
VIBURNUM AREA = 1,185 SQ.FT.-LESS THAN 25%
LIGUSTRUM AREA= 705 SQ.FT.-LESS THAN 25%
SIMPSON STOPPER AREA= 1,152 SQ.FT.-LESS THAN 25%

LANDSCAPE NOTES:
1. ALL PLANTS SHALL BE FLORIDA GRADE #1 OR BETTER.
2. APPLY A 3" LAYER OF MULCH LAYER TO ALL PROPOSED TREE, SHRUB, GROUND COVER AND VINE PLANTINGS.
3. ALL REQUIRED TREES TO BE PLANTED SHALL BE A MINIMUM OF 2" CALIPER OR LARGER, MULTI-TRUNCK TREES SHALL BE A MINIMUM OF 3" CALIPER OR LARGER WITH A MINIMUM OF THREE (3) TRUNKS.
4. NO REFERENCE TO ENGINEERING SHOULD BE MADE FROM THIS SHEET. IT IS FOR LANDSCAPE REFERENCE ONLY.
5. ANY DEVIATION FROM PLANT QUANTITY, SIZE OR GRADE MAY JEOPARDIZE THE CERTIFICATE OF OCCUPANCY. ADDITIONAL PLANTS MAY BE ADDED, BUT MUST COMPLY WITH PASCO COUNTY REQUIREMENTS.
6. PROPERTY OWNER WILL MAINTAIN ALL TREES WITHIN COMMON AREAS.
7. ALL TREES MUST BE GUARANTEED FOR A PERIOD OF ONE YEAR FROM THE DATE OF INSPECTION.
8. AN UNDERGROUND IRRIGATION SYSTEM SHALL BE INSTALLED FOR ALL REQUIRED LANDSCAPING, EXCEPT IN AREAS WHERE XERISCAPING IS USED. XERISCAPE PLANTINGS TO BE WATERED WITH HOSES UNTIL ESTABLISHED AND AS NECESSARY.
9. THIS IS A "TREE PLAN" AND WAS PREPARED TO MEET MINIMUM PASCO COUNTY TREE PLANTING REQUIREMENTS. ADDITIONAL TREES AND SHRUBS MAY BE ADDED FOR AESTHETIC AND ENVIRONMENTAL BENEFITS.
10. SHRUBS ARE TO BE 3 GALLON CONTAINER, 18" IN HEIGHT AT TIME OF INSTALLATION, SPACED 30" ON CENTER.
11. ALL DISTURBED AREAS NOT LANDSCAPED SHALL BE GRASSED.
14. OWNER OF PROPERTY SHALL BE RESPONSIBLE FOR UPKEEP AND MAINTENANCE OF LANDSCAPING AND IRRIGATION.

AERONAUTICAL SYSTEMS SYSTEMS, INC.

LANDSCAPE PLAN

GUSTAFSON
ENGINEERING COMPANY
SITE DEVELOPMENT • HIGHWAY DESIGN
LAND PLANNING • PERMITTING
15030 SURREY BEND
BROOKSVILLE, FLORIDA 34609
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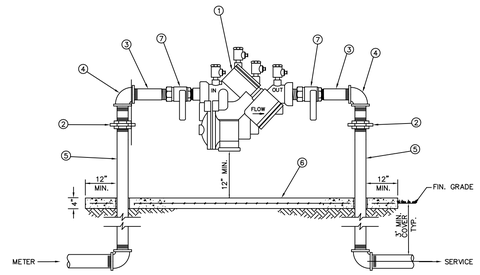
MARK	REV

APPR BY	RDG
DESIGN BY	RDG
DRAWN BY	CAD
DATE	8/14
SCALE	NTS

PROJECT NUMBER
14005

RAY D. GUSTAFSON
P.E. NO. 37565

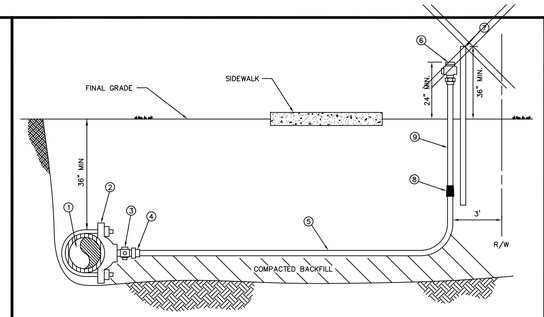
SHEET NUMBER
4 OF **7**



MATERIALS		
ITEM	QUANT.	DESCRIPTION
1	1	BACKFLOW PREVENTER ASSEMBLY, REDUCED PRESSURE ZONE
2	2	UNIONS – GALV.
3	2	NIPPLES – BRASS
4	2	ELBOWS – GALV. 90°
5	2	RISER – GALV.
6	*	CONCRETE SLAB
7	2	BALL VALVES – BRASS OR S.S. (PROVIDED WITH BFP ASS'Y)

NOTE:
- FIELD ADJUST AND CUT ITEM 5 TO THE PROPER LENGTH.
- MINIMUM CLEARANCE OF 24" TO BE MAINTAINED AROUND DEVICE FOR TESTING.
- ENTIRE ASSEMBLY TO BE PAINTED SAFETY BLUE.
- CONCRETE SLAB TO EXTEND 12" MIN. AROUND ENTIRE DEVICE.
- DEVICE MUST BE LISTED WITH THE UNIVERSITY OF SOUTHERN CALIFORNIA FOUNDATION FOR CROSS CONNECTION CONTROL AND HYDRAULIC RESEARCH.

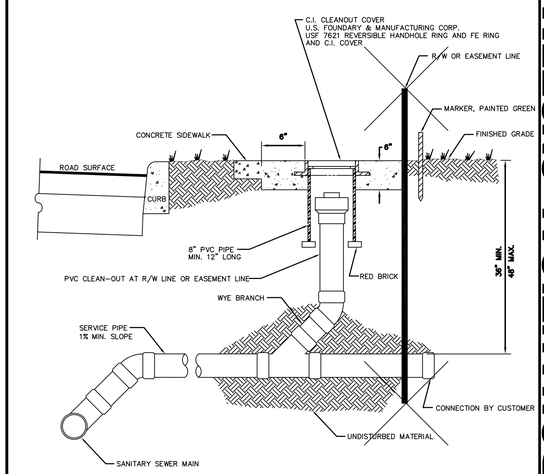
CREATED 02/24/03 REVISED	REDUCED PRESSURE BACKFLOW PREVENTER (SINGLE SERVICE: 3/4", 1", 1-1/2", 2")	PROVIDED FOR INFORMATIONAL PURPOSES ONLY. NO MODIFICATIONS WITHOUT WRITTEN PCU APPROVAL
	PASCO COUNTY UTILITIES	DETAIL 12



MATERIALS		
ITEM	QUANT.	DESCRIPTION
1	*	PIPE, PVC (DR-18) OR D.I.P.
2	1	SADDLE, SERVICE W/ 1" F.I.P. THREAD
3	1	1" CORPORATION (M.I.P. x COMP.)
4	1	1" INSERT (STAINLESS STEEL)
5	*	1" TUBING, POLYETHYLENE
6	1	3/4" WATER OR 1" REUSE CURB STOP BALL VALVE W/ LOCK WINGS (F.I.P. x COMP.)
7	1	2' x 4" P.T. MARKER STAKE
8	1	1" x 3/4" COUPLING (COMP. x COMP.) WATER ONLY
9	1	3/4" WATER OR 1" REUSE TUBING, POLYETHYLENE 4'

NOTES:
- ALL FITTINGS FOR POLYETHYLENE TUBING ARE BRASS COMPRESSION TYPE.
- A VALVE BOX MAY BE REQUIRED AS SPECIFIED BY THE ENGINEER.
- CURB STOP TO TERMINATE 24" ABOVE GROUND AT R/W LINE.
- REUSE CURB STOPS = 1" / WATER CURB STOPS = 3/4"
- TUBING TO BE YARDLEY 3406 OR EQUAL.
- SADDLES 2" – 3" TO BE BRASS FULL CIRCLE TYPE.
- SADDLES 4" AND LARGER TO BE D.I. DUAL STRAP TYPE.
- CURB STOPS TO BE TIED TO MARKER STAKE.
- SADDLE MAY BE INSTALLED AT ANGLE (WITHIN 45° OF HORIZONTAL).
- MARKER STAKES PAINTED SAFETY BLUE FOR WATER, PURPLE FOR REUSE.

CREATED 02/24/03 REVISED	SINGLE NEAR SIDE WATER SERVICE – 3/4" SINGLE NEAR SIDE REUSE SERVICE – 1" POLYETHYLENE TUBING	PROVIDED FOR INFORMATIONAL PURPOSES ONLY. NO MODIFICATIONS WITHOUT WRITTEN PCU APPROVAL
	PASCO COUNTY UTILITIES	DETAIL 17



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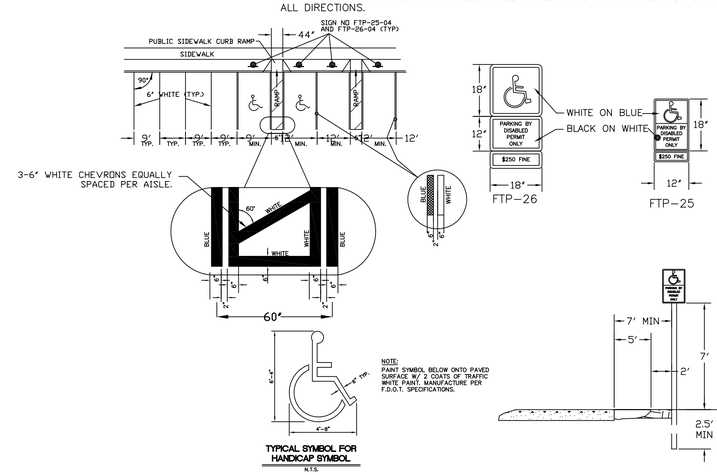
CREATED 02/24/03 REVISED	SANITARY SEWER – SINGLE WYE CONNECTION AND TYPICAL CLEAN-OUT	PROVIDED FOR INFORMATIONAL PURPOSES ONLY. NO MODIFICATIONS WITHOUT WRITTEN PCU APPROVAL
	PASCO COUNTY UTILITIES	DETAIL 45

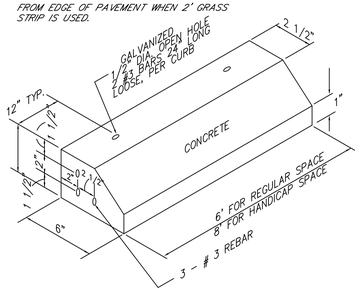
NOTES:
1. DIMENSIONS ARE TO THE CENTERLINE OF MARKINGS.
2. AN ACCESS AISLE IS REQUIRED FOR EACH ACCESSIBLE SPACE WHEN ANGLE PARKING IS USED.
3. CRITERIA FOR PAVEMENT MARKINGS ONLY, NOT PUBLIC SIDEWALK CURB RAMP LOCATIONS. FOR RAMP LOCATION REFER TO PLANS
4. BLUE PAVEMENT MARKINGS SHALL BE TINTED TO MATCH SHADE 15180 OF FEDERAL STANDARDS 595A.
5. HANDICAP PARKING AND ACCESS AISLE SHALL HAVE MAXIMUM 2% SLOPE IN ALL DIRECTIONS.



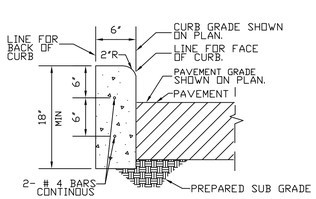
NOTE:
PAINT SYMBOL BELOW ONTO PAVED SURFACE W/ 2 COATS OF TRAFFIC WHITE PAINT. MANUFACTURE PER F.D.O.T. SPECIFICATIONS.

HANDICAP PARKING DETAIL
SCALE: NTS

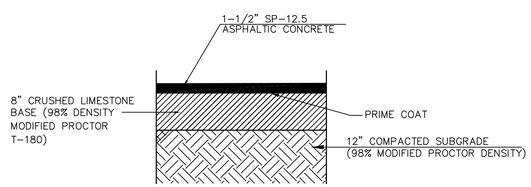
NOTES:
1. LOCATE CENTERLINE OF PARKING CURB 30" FROM FACE OF SIDEWALK OF EDGE OF PAVEMENT.
2. LOCATE CENTERLINE OF PARKING CURB 6" FROM EDGE OF PAVEMENT WHEN 2' GRASS STRIP IS USED.



WHEEL STOP DETAIL
N.T.S



14 C0.0 VERTICAL CURB
N.T.S.



ASPHALT PAVMENT DETAIL
N.T.S.

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DETAILS

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ASPHALTIC CONCRETE PAVING SUB-BASE:

1. ENSURE GRADING OF SUBGRADE TO REQUIRED ELEVATION. BRING SUB-BASE COURSE TO REQUIRED DEPTH AND PROFILES INDICATED. EXTEND SUB-BASE COURSE MINIMUM SIX (6) INCHES BEYOND ASPHALT PAVEMENT WIDTH.
2. PLACE IN LAYERS NOT EXCEEDING FOUR (4) INCHES IN DEPTH. COMPACT EACH LAYER 98% MODIFIED PROCTOR. COMPACT SUBGRADE, WHERE ASPHALT PAVEMENT IS TO BE PLACED, A MINIMUM DEPTH OF TWELVE (12) INCHES. PROPERLY COMPACT AREAS ADJACENT TO CURBS, CATCH BASINS, MANHOLES, AND OTHER AREAS NOT ACCESSIBLE TO ROLLERS WITH MECHANICAL OR HAND-TAMPING DEVICES. INSURE SUB-BASE COURSE MATERIALS ARE NOT CONTAMINATED WITH DELETERIOUS MATERIALS. SEE PLANS FOR STABILIZATION OF SUB-BASE IF REQUIRED.
3. ADD WATER DURING COMPACTION TO BRING GRANULAR MATERIAL TO OPTIMUM MOISTURE CONTENT.
4. BEFORE FINAL ROLLING, SHAPE ENTIRE SECTION, ADD ADDITIONAL SUB-SOIL AS REQUIRED, AND COMPACT SUBGRADE TO PROVIDE GRADES, ELEVATION AND CROSS-SECTION INDICATED. POINTS OF FINISHED SUBGRADING SURFACE SHALL BE WITHIN ONE (1) INCH OF ELEVATIONS INDICATED.
5. NOTIFY CONTRACTOR OF UNSATISFACTORY CONDITIONS. DO NOT BEGIN PAVING WORK UNTIL DEFICIENT SUB-BASE AREAS HAVE BEEN CORRECTED AND ARE READY TO RECEIVE BASE AND PAVING.

BASE:

1. SPREAD BASE COURSE MATERIALS OVER PREPARED SUB-BASE TO A SIX (6) INCH COMPACTED DEPTH FOR LIMEROCK OR A SEVEN (7) INCH COMPACTED DEPTH FOR CRUSHED CONCRETE. COMPACT TO 98% MODIFIES PROCTOR. ENSURE TOP SURFACE OF BASE COURSE IS TRUE TO LINES AND GRADE INDICATED, WITH ALL POINTS WITHIN 1/2 INCH OF ELEVATIONS, INDICATED.
2. ADD WATER DURING COMPACTION TO BRING STABILIZING BASE COURSE MATERIALS TO OPTIMUM MOISTURE CONTENT. WHEN AN EXCESS MOISTURE EXISTS, REWORK STABILIZING BASE COURSE MATERIALS UNTIL OPTIMUM MOISTURE CONTENT IS OBTAINED.
3. REMOVE LOOSE MATERIAL FROM COMPACTED BASE COURSE SURFACE IMMEDIATELY BEFORE APPLYING PRIME COAT.

PRIMING PREPARED STABILIZED BASE COURSE:

1. ENSURE STABILIZED BASE COURSE IS DRY, COMPACTED, AND FREE OF LOOSE OR FOREIGN MATERIAL BEFORE PRIMING. DO NOT BEGIN PRIMING UNTIL DEFICIENT BASE COURSE AREAS HAVE BEEN CORRECTED AND ARE READY TO RECEIVE PRIMER. BEGINNING OF PRIME WORK INDICATES ACCEPTANCE OF BASE COURSE.
2. APPLY PRIMER OVER PREPARED STABILIZING BASE COURSE AT A UNIFORM RATE OF 1/2 GALLON PER SQUARE YARD. ENSURE PRIMER IS AT TEMPERATURE RECOMMENDED BY MANUFACTURER. USE CLEAN NATURAL SAND TO BLOT EXCESS PRIMER. APPLY MATERIAL TO PENETRATE AND SEAL, BUT DO NOT FLOOD SURFACE.
3. SIMILARLY PRIME SURFACES OF CURBS AND GUTTERS WHICH WILL BE IN CONTACT WITH ASPHALT PAVEMENT.
4. CURE AND DRY AS LONG AS NECESSARY TO ATTAIN PENETRATION AND EVAPORATION OF VOLATILE.
5. COAT SURFACES OF MANHOLES AND CATCH BASINS WHICH ARE TO REMAIN FREE OF ASPHALT WITH OIL TO PREVENT ASPHALT ADHESION. REMOVE ASPHALT FROM SURFACES UPON COMPLETION AND CURING OF ASPHALT SURFACE.

PLACEMENT OF ASPHALT PAVEMENT:

1. PLACE ASPHALT WITHIN 24 HOURS OF PRIMING STABILIZING BASE COURSE.
2. PLACE ASPHALT PAVEMENT TO COMPACTED DEPTH INDICATED OF ONE AND ONE HALF (1-1/2) INCH MINIMUM, IN STRIPS NOT LESS THAN 10 FEET WIDE, UNLESS OTHERWISE ACCEPTABLE TO ARCHITECT. AFTER FIRST STRIP HAS BEEN PLACED AND ROLLED, PLACE SUCCEEDING STRIPS AND EXTEND ROLLING TO OVERLAP PERVIOUS STRIPS. COMPLETE BASE COURSE FOR A SECTION BEFORE PLACING SURFACE COURSE.
3. DO NOT PLACE ASPHALT PAVEMENT WHEN SURFACE TEMPERATURE IS 40 DEGREES F. OR LOWER. ENSURE ASPHALT PAVEMENT IS MINIMUM RECOMMENDED TEMPERATURE IMMEDIATELY AFTER PLACING AND PRIOR TO INITIAL ROLLING, BUT NOT LOWER THAN 225 DEGREES F.
4. COMPACT ASPHALT PAVING COURSE TO REQUIRED DENSITY WITH APPROVED ROLLING EQUIPMENT. START COMPACTION AS SOON AS PAVEMENT WILL BEAR EQUIPMENT WITHOUT CHECKING OR UNDUE DISPLACEMENT.
5. COMPLETE BASE COURSE PLACEMENT FOR A SECTION PRIOR TO PLACING SURFACE COURSE.
6. CARRY OUT COMPACTION IN THREE (3) OPERATIONS IN PASS SEQUENCE. ENSURE EACH PASS OF ROLLER OVERLAPS PREVIOUS PASSES TO ENSURE SMOOTH SURFACE FREE OF ROLLER MARKS. KEEP ROLLER WHEELS SUFFICIENTLY MOIST SO AS TO NOT TO PICK UP MATERIAL. CHECK SURFACE AFTER ROLLING AND REPAIR WITH HOT MATERIAL. CONTINUE FINAL ROLLING UNTIL ALL ROLLER MARKS ARE ELIMINATED AND COURSE HAS ATTAINED MAXIMUM DENSITY.
7. PERFORM HAND-PLACEMENT AND HAND-TAMPERING IN AREAS NOT ACCESSIBLE TO ROLLING EQUIPMENT.
8. ENSURE JOINTS MADE DURING PAVING OPERATIONS ARE STRAIGHT, CLEAN, VERTICAL, AND FREE OF BROKEN OR LOOSE MATERIAL. PRIME VERTICAL SURFACES OF JOINTS TO ENSURE TIGHT BOND. MAKE JOINTS BETWEEN OLD AND NEW PAVEMENTS, OR BETWEEN SUCCESSIVE DAYS WORK, TO ENSURE CONTINUOUS BOND BETWEEN ADJOINING WORK. CONSTRUCT JOINTS TO HAVE SAME TEXTURE, DENSITY AND SMOOTHNESS AS OTHER SECTIONS OF ASPHALTIC CONCRETE COURSE. CLEAN CONTACT SURFACES AND APPLY TACK COAT PRIOR TO INSTALLING NEW OF ADJOINING SECTIONS.
9. ENSURE SURFACE OF COMPLETED ASPHALT PAVEMENT IS TRUE TO LINES, PROFILES AND ELEVATIONS INDICATED, AND IS FREE FROM DEPRESSIONS EXCEEDING 1/4 INCH WHEN MEASURED WITH A TEN (10) FOOT STRAIGHT-EDGE.
10. PATCHING: REMOVE AND REPLACE PAVING AREAS MIXED WITH FOREIGN MATERIALS AND DEFECTIVE AREAS. CUT OUT SUCH AREAS AND FILL WITH FRESH, HOT ASPHALT CONCRETE. COMPACT BY ROLLING TO MAXIMUM SURFACE DENSITY AND SMOOTHNESS.
11. AFTER FINAL ROLLING, DO NOT ALLOW VEHICULAR TRAFFIC ON NEWLY PAVED AREAS UNTIL SURFACE HAS COOLED TO ATMOSPHERIC TEMPERATURE AND HARDENED.
12. TEST IN-PLACE ASPHALT CONCRETE COURSES FOR COMPLIANCE WITH REQUIREMENTS FOR THICKNESS AND SURFACE SMOOTHNESS. REPAIR OF REMOVE AND REPLACE UNACCEPTABLE PAVING AS DIRECTED BY ARCHITECT/ENGINEER.
13. THICKNESS: IN-PLACE COMPACTED THICKNESS WILL NOT BE ACCEPTABLE IF EXCEEDING THE FOLLOWING ALLOWABLE VARIATION FROM REQUIRED THICKNESS:
    - 13.1. BASE COURSE: 1/2", PLUS OR MINUS
    - 13.2. SURFACE COURSE: 1/4" PLUS OR MINUS

PERFORM ONE TEST FOR THICKNESS FOR EVERY 10,000 SQUARE FEET OF PAVED AREA.

EROSION AND SEDIMENT CONTROL:

ALL PRACTICABLE AND NECESSARY MEASURES SHALL BE TAKEN BY THE CONTRACTOR DURING ALL PHASES OF CONSTRUCTION TO CONTROL AND PREVENT EROSION AND TRANSPORT OF SEDIMENT TO SURFACE DRAINS, SURFACE WATERS OR ONTO ADJACENT PUBLIC OR PRIVATE PROPERTY. RE-VEGETATION AND OR STABILIZATION OF DISTURBED GROUND SURFACES SHALL BE ACCOMPLISHED AS RAPIDLY AS POSSIBLE TO PREVENT EROSION FROM OCCURRING AND REDUCE THE SEDIMENT LOAD IN THE DISCHARGED WATER.

AS A MINIMUM, THE EROSION AND SEDIMENTATION CONTROLS SHALL CONSIST OF, BUT NOT BE LIMITED TO:

1. ON-SITE GRADING TO ROUTE ALL PRACTICABLE STORMWATER RUN-OFF THROUGH THE DESIGNATED DRAINAGE SYSTEM.
2. TEMPORARY CONTROLS SHALL BE PLACED ALONG THE PERIMETER OF THE CONSTRUCTION AREA TO BLOCK THE FLOW OF RUN-OFF. (I.E. HAY BALES, SILT FENCES, SODDED BERMS, ETC.)
3. HAY BALES SHALL BE INSTALLED AROUND STORM SEWER INLETS IN THE VICINITY OF THE SITE PRIOR TO, AND REMOVED FOLLOWING, ALL PAVING OR GRADING ACTIVITIES.
4. THE CONTRACTOR SHALL KEEP ROADS CONTIGUOUS TO THE PROJECT CLEAN AND FREE OF DIRT AND DEBRIS. THE TIRES ON ALL CONSTRUCTION EQUIPMENT SHALL BE WASHED PRIOR TO LEAVING SITE (DAILY IF NECESSARY). IN ADDITION, THE ROADWAY PAVEMENT SHALL BE SWEPT WHEN NECESSARY.
5. THE SOIL EROSION AND SEDIMENT CONTROL MEASURES SHALL BE IN PLACE PRIOR TO THE START OF CONSTRUCTION, REMAIN IN PLACE THROUGH CONSTRUCTION, INSPECTED AND MAINTAINED BI-WEEKLY AND REMAIN UNTIL SITE IS PERMANENTLY STABILIZED.
6. REQUIRED EROSION CONTROL MEASURES MUST REMAIN INTACT THROUGHOUT CONSTRUCTION. THE CONTRACTOR IS TO PROVIDE HAY BALES OR SILT SCREENS FOR EROSION AND SEDIMENT CONTROL DURING ALL PHASES OF CONSTRUCTION TO PREVENT TRANSPORT OF SEDIMENT TO SURFACE DRAINS, SURFACE WATERS OR ONTO ADJACENT PUBLIC OR PRIVATE PROPERTY. THIS INCLUDES AREA AROUND PONDS, OUTFALL PIPES AND CONTROL STRUCTURES.
7. ALL FUGITIVE DUST WILL BE CONTROLLED BY SPRINKLING WITH WATER UNTIL SITE IS STABILIZED.

EARTHWORK:

1. GENERAL: CONTROL SOIL COMPACTION DURING CONSTRUCTION PROVIDING MINIMUM PERCENTAGE OF DENSITY SPECIFIED FOR EACH AREA CLASSIFICATION INDICATED BELOW.
2. PERCENTAGE OF MAXIMUM DENSITY REQUIREMENTS: COMPACT SOIL TO NOT LESS THAN THE FOLLOWING PERCENTAGED OF MAXIMUM DRY DENSITY DETERMINED IN ACCORDANCE WITH ASTM D1557/AASHTO T180:
    - 2.1. CONDUIT TRENCHES: COMPACT EACH LAYER OF BACKFILL OF FILL MATERIAL AT 95% OF MAXIMUM DRY DENSITY.
    - 2.2. CONCRETE PAVEMENT: COMPACT TOP 12-INCHES OF SUBGRADE AND EACH LAYER OF BACKFILL OR FILL AT 98% MAXIMUM DRY DENSITY.
    - 2.3. ASPHALT PAVEMENTS: COMPACT SUBGRADE AND EACH LAYER OF BACKFILL OF FILL AT 95% MAXIMUM DRY DENSITY.
    - 2.4. LAWN OR UNPAVE AREAS: COMPACT TOP 6-INCHES OF SUBGRADE AND EACH LAYER OF BACKFILL OR FILL MATERIAL AT 85% MAXIMUM DRY DENSITY.
    - 2.5. WALKWAYS: COMPACK TOP 6-INCHES OF SUBGRADE AND EACH LAYER OF BACKFILL OR FILL MATERIAL AT 95% OF MAXIMUM DRY DENSITY.
3. MOISTURE CONTROL:
    - 3.1. WHERE SUBGRADE OF LAYER OF SOIL MATERIAL MUST BE MOISTURE CONDITIONED BEFORE COMPACTION, UNIFORMLY APPLY WATER TO SURFACE OF SUBGRADE, OR LAYER OF SOIL MATERIAL, TO PREVENT FREE WATER APPEARING ON SURFACE DURING OR SUBSEQUENT TO COMPACTION OPERATIONS.
    - 3.2. REMOVE AND REPLACE, OR SCARIFY AND AIR DRY, SOIL MATERIAL THAT IS TOO WET TO PERMIT COMPACTION TO SPECIFIED DENSITY.
        - 3.2.A. SOIL MATERIAL THAT HAS BEEN REMOVED BECAUSE IT IS TOO WET TO PERMIT COMPACTION MAY BE STOCKPILED OR SPREAD AND ALLOWED TO DRY. ASSIST DRYING BY DISCING, HARROWING OR PULVERIZING UNTIL MOISTURE CONTENT IS REDUCED TO A SATISFACTORY VALUE.
4. GENERAL: PLACE ACCEPTABLE SOIL MATERIAL IN LAYERS TO REQUIRED SUBGRADE ELEVATIONS, FOR EACH AREA CLASSIFICATION LISTED BELOW.
    - 4.1. IN EXCAVATIONS, USE SATISFACTORY EXCAVATED OR BORROW MATERIAL.
    - 4.2. UNDER GRASSED AREAS, USE SATISFACTORY EXCAVATED OR BORROW MATERIAL.
    - 4.3. UNDER WALKS AND PAVEMENTS, USE SUB-BASE MATERIAL, OR SATISFACTORY EXCAVATED OR BORROW MATERIAL, OR COMBINATION OF BOTH.
    - 4.4. UNDER PIPING AND CONDUIT, USE SATISFACTORY BORROW MATERIAL UNLESS OTHERWISE INDICATED; SHAPE TO FIT BOTTOM 90 DEGREES OF CYLINDER.
5. PLACEMENT AND COMPACTION:
    - 5.1. PLACE BACKFILLAND FILL MATERIALS IN LAYERS NOT MORE THAT 12" IN LOOSE DEPTH FOR MATERIAL COMPACTED BY HEAVY COMPACTION EQUIPMENT, AND NOT MORE THAT 4" IN LOOSE DEPTH FOR MATERIAL COMPACTED BY HAND-OPERATED TAMPERS.
    - 5.2. BEFORE COMPACTION, MOISTEN OR AERATE EACH LAYER AS NECESSARY TO PROVIDE OPTIMUM MOISTURE CONTENT. COMPACT EACH LAYER TO REQUIRED PERCENTAGE OF MAXIMUM DRY DENSITY FOR EACH AREA CLASSIFICATION. DO NOT PLACE BACKFILL OR FILL MATERIAL ON SURFACES THAT ARE MUDDY.
    - 5.3. PLACE BACKFILL AND FILL MATERIALS EVENLY ADJACENT TO STRUCTURES, PIPING OR CONDUIT TO REQUIRED ELEVATIONS. TAKE CARE TO PREVENT WEDGING ACTION OF BACKFILL AGAINST STRUCTURES OF DISPLACEMENT OF PIPING OR CONDUIT BY CARRING MATERIAL UNIFORMLY AROUND STRUCTURE, PIPING OR CONDUIT TO APPROXIMATELY SAME ELEVATION IN EACH LIFT.
6. UNIFORMLY GRADE AREA WITHIN LIMITS OF GRADING UNDER THIS SECTION, INCLUDING ADJACENT TRANSITION AREAS. SMOOTH FINISHED SURFACE WITHIN SPECIFIED TOLERANCES, COMPACT WITH UNIFORM LEVELS OR SLOPES BETWEEN POINTS WHERE ELEVATIONS ARE INDICATED, OR BETWEEN SUCH PONTS AND EXISTING GRADES. GRADE ALL SURFACES TO PROVIDE POSITIVE DRAINAGE.
7. GRADING OUTSIDE BUILDING LINES: GRADE AREA ADJACENT TO BUILDING LINES TO DRAIN AWAY FROM STRUCTURES AND TO PREVENT PONDING.
8. FINISH SURFACES FREE FROM IRREGULAR SURFACE CHANGES, AND AS FOLLOWS:
    - 8.1. LAWN OR UNPAVED AREAS: FINISH AREAS TO RECEIVE TOPSOIL TO WITHIN NO MORE 0.10' ABOVE OR BELOW REQUIRED SUBGRADE ELEVATIONS.
    - 8.2. WALKS: SHAPE SURFACE OF AREAS UNDER WALKS TO LINE, GRADE AND CROSS-SECTION, WITH FINISH SURFACE NOT MORE THAN 0.10' ABOVE OR BELOW REQUIRED SUBGRADE ELEVATION.
    - 8.3. PAVEMENTS: SHAPE SURFACE OF AREAS UNDER PAVEMENT TO LINE, GRADE AND CROSS-SECTION, WITH FINISH SURFACE NOT MORE THAN 1/2" ABOVE OR BELOW SUBGRADE ELEVATION.
9. COMPACTION: AFTER GRADING, COMPACT SUBGRADE SURFACES TO THE DEPTH AND INDICATED PERCENTAGE OF MAXIMUM DENSITY FOR EACH AREA CLASSIFICATION.

SITE CLEARING:

1. GENERAL- REMOVE VEGETATION, IMPROVEMENTS, OF OBSTRUCTIONS INTERFERING WITH INSTALLATION OF NEW CONSTRUCTION. REMOVE SUCH ITEMS ELSEWHERE ON-SITE OR PREMISES AS SPECIFICALLY DESIGNATED. REMOVAL INCLUDES DIGGING OUT STUMPS AND ROOTS.
2. PROTECTION OF EXISTING TREES AND VEGETATION: PROTECT EXISTING TREES AND OTHER VEGETATION DESIGNATED TO REMAIN IN PLACE AGAINST UNNECESSARY CUTTING, BREAKING OF SKINNING OF ROOTS, SKINNING OR BRUISING OF BARK, SMOTHERING OF TREES BY STOCKPILING CONSTRUCTION MATERIALS OF EXCAVATED MATERIALS WITHIN DRIP LINE, EXCESS FOOT OR VEHICULAR TRAFFIC, OR PARKING OF VEHICLES WITHIN DRIP LINE. PROVIDE TEMPORARY GUARDS AS APPROVED BE LANDSCAPE ARCHITECT TO PROTECT TREES AND VEGETATION TO BE LEFT STANDING IN APPROVED LOCATIONS AND DISTANCES AWAY FROM PLANTS UNTIL AUTHORIZED RELEASE BE LANDSCAPE ARCHITECT.
3. THE AREA TO REMAIN UNDISTURBED SHALL BE PROTECTED FROM CONSTRUCTION ACTIVITIES BEFORE SITE CLEARING COMMENCES.
4. CAREFULLY AND CLEANLY CUT ROOTS AND BRANCHES OF TREES DESIGNATED TO BE LEFT STANDING, WHERE SUCH ROOTS AND BRANCHES OBSTRUCT NEW CONSTRUCTION.
5. GRADING AND STOCKPILING OF EQUIPMENT OF PLACEMENT OF CONSTRUCTION TRAILER AND ASSOCIATED MATERIALS SHALL NOT BE PERMITTED IN THE AREAS INDICATED ON PLANS AS TO REMAIN UNDISTURBED.
6. REMOVE ABOVE-GRADE AND BELOW-GRADE IMPROVEMENTS NECESSARY TO PERMIT CONSTRUCTION, AND OTHER WORK AS INDICATED ON THE DRAWINGS. ABANDONMENT OR REMOVAL OF CERTAIN UNDERGROUND PIPE OF CONDUITS MAY BE SHOWN ON IRRIGATION OF ENGINEERING DRAWINGS, AND IS INCLUDED UNDER WORK OF THIS SECTION. REMOVAL OF ABANDONED UNDERGROUND PIPING OF CONDUIT INTERFERING WITH CONSTRUCTION IS INCLUDED UNDER THIS SECTION.
7. TOPSOIL IS DEFINED AS FRIABLE CLAY LOAM SURFACE SOIL FOUND IN A DEPTH OF NOT LESS THAN 4". SATISFACTORY TOPSOIL IS REASONABLY FREE OF SUBSOIL, CLAY LUMPS, STONES, AND OTHER OBJECTS OVER 2" IN DIAMETER, AND WITHOUT WEEDS, ROOTS, AND OTHER OBJECTIONABLE MATERIAL. STRIP TOPSOIL TO WHATEVER DEPTHS ENCOUNTERED IN A MANNER TO PREVENT INTERMINGLING WITH UNDERLYING SUBSOIL OR OTHER OBJECTIONABLE MATERIAL. STRIPPING SHALL EXTEND AT LEAST FIVE (5) FEET BEYOND THE LIMITS OF THE PROPOSED BUILDING AREAS AND AT LEASE TO THE LIMITS OF PROPOSED EMBANKMENT SLOPES, BUT SHALL NOT EXTEND PAST PROPERTY LINE, EXCEPT WHERE APPROVED BE APPROPRIATE REGULATORY AGENCIES. REMOVE HEAVY GROWTHS OF GRASS FROM AREAS BEFORE STRIPPING. WHERE TREES ARE INDICATED TO BE LEFT STANDING, STOP TOPSOIL STRIPPING A SUFFICIENT DISTANCE FROM TREES TO PREVENT DAMAGE TO MAIN ROOT SYSTEM. DISPOSE OF UNSUITABLE TOPSOIL SAME AS WASTE MATERIAL, HEREIN SPECIFIED.
8. SHOULD UNCHARTED, OR INCORRECTLY CHARTED, PIPING OR OTHER UTILITIES BE ENCOUNTERED DURING EXCAVATION, CONSULT UTILITY OWNER IMMEDIATELY FOR DIRECTIONS. COOPERATE WITH OWNER AND UTILITY COMPANIES IN KEEPING RESPECTIVE SERVICES AND FACILITIES IN OPERATION. REPAIR DAMAGED UTILITIES TO SATISFACTION OF UTILITY OWNER.
9. DO NOT INTERRUPT EXISTING UTILITIES SERVING FACILITIES OCCUPIED AND USED BY OWNER OF OTHERS DURING OCCUPIED HOURS EXCEPT WITHIN PERMITTED IN WRITING BE ARCHITECT/ENGINEER AND THEN ONLY AFTER ACCEPTABLE TEMPORARY UTILITY SERVICES HAVE BEEN APPROVED.
10. PROVIDE MINIMUM OF 48-HOUR NOTICE TO ARCHITECT/ENGINEER, AND RECEIVE WRITTEN NOTICE TO PROCEED BEFORE INTERRUPTING ANY UTILITY.
11. DEMOLISH AND COMPLETELY REMOVE FROM SITE EXISTING- UNDERGROUND UTILITIES INDICATED TO BE REMOVED. COORDINATE WITH UTILITY COMPANIES FOR SHUT-OFF OF SERVICES IF LINES ARE ACTIVE.

GRASS & SOD:

1. ALL SODDED SLOPES STEEPER THAN 4 TO 1, SHALL BE INSTALLED WITH SOD PEGS. ALL SOD IN SWALES TO BE SAND GROWN.
2. GRASSING SHALL INCLUDE SEEDING, MULCHING, AND WATERING UNTIL A FULL STAND OF GRASS IS ACHIEVED.

WATER DISTRIBUTION SYSTEM:

1. THE WORK COVERED BY THIS SECTION CONSISTS OF FURNISHING ALL LABOR, EQUIPMENT AND MATERIALS, AND IN PERFORMING ALL OPERATIONS IN CONNECTION WITH CONSTRUCTION OF A WATER DISTRIBUTION SYSTEM, COMPLETE AND READY FOR USE IN ACCORDANCE WITH THE SPECIFICATIONS AND DRAWINGS.
2. THE CONTRACTOR SHALL PROVIDE A COMPLETE DISINFECTED, TESTED AND OPERATING SYSTEM INCLUDING PIPE, PIPE FITTINGS, AND THRUST BLOCKS, VALVES, VALVE BOXES AND FIRE HYDRANTS.
3. ALL WATER SYSTEM CONSTRUCTION SHALL BE IN ACCORDANCE WITH WATER SYSTEM REQUIREMENTS. IN THE EVENT THERE IS A CONFLICT BETWEEN THESE SPECIFICATIONS AND THOSE OF WATER SYSTEM, THE SPECIFICATIONS OF THAT AGENCY PREVAIL.
4. POLYVINYL CHLORIDE (PVC) PIPE SHALL BE IN ACCORDANCE WITH THE AMERICAN WATER WORKS ASSOCIATION (AWWA) STANDARD C-900-75 AND THE AMERICAN SOCIETY FOR TESTING AND MATERIALS (ASTM) STANDARD D2241.
5. POLYVINYL CHLORIDE (PVC) PIPE SHALL HAVE THE SAME O.D. AS CAST AND DUCTILE IRON PIPE AND BE COMPATIBLE FOR USE WITHOUT SPECIAL ADAPTERS WITH CAST IRON FITTINGS.
6. PIPE DIMENSION RATIO OF 18, AND A WORKING PRESSURE OF 150PSI.
7. DUCTILE-IRON PIPE SHALL BE AWWA C151, WITH CEMENT MORTAR LINING COMPLYING WITH AWWA C104; CLASS 51 UNLESS OTHERWISE INDICATED. FITTINGS SHALL BE DUCTILE-IRON, AVWWA C110; CEMENT LINED, AWWA C104; AND RUBBER-GASKET JOINTS, AWWA C111.
8. PROPER AND SUITABLE TOOLS AND EQUIPMENT SHALL BE USED IN HANDLING ALL PIPE FITTINGS AND SPECIAL CARE SHALL BE TAKEN TO PREVENT DAMAGE TO THE PIPE. ALL PIECES SHALL BE CAREFULLY EXAMINED FOR DEFECTS AND NO PIPE SHALL BE LAID WHICH IS KNOW TO BE DEFECTIVE. SHOULD A DEFECTIVE PIECE OF PIPE BE DISCOVERED AFTER BEING LAID, IT SHALL BE REMOVED AND REPLACED WITH SOUND MATERIAL IN A SATISFACTORY MANNER BY THE CONTRACTOR AT HIS EXPENSE.
9. ALL PIPE SHALL BE THOROUGHLY CLEANED INSIDE AS WORK PROGRESSES AND SHALL BE KEPT CLEAN UNTIL THEY ARE ACCEPTED IN THE COMPLETE WORK. MAINTAIN SWAB OR DRAG IN LINE AND PULL PAST EACH JOINT AS IT IS COMPLETED. A SUITABLE PLUG SHALL BE PLACED AT THE END OF THE PIPE AT THE END OF EACH DAYS WORK TO KEEP WATER, SAND, TRASH, ETC., FROM GETTING INTO PIPE ALREADY LAID. ALL PIPE SHALL BE LAIN ACCORDING TO LINE AND GRADE AS SET BY THE ENGINEER.
10. PIPE SHALL BE LAID SO THAT IT RESTS ENTIRELY ON THE BARREL. SUBGRADE SHALL BE LEVELED AND COMPACTED SO THAT THE PIPE IS EVENLY SUPPORTED THROUGHOUT ITS LENGTH.
11. THE CONTRACTOR SHALL MAKE ALL CONNECTIONS TO EXISTING LINES SHOWN ON THE PLANS AND SHALL FURNISH ALL LABOR AND NECESSARY MATERIALS TO COMPLETE WORK. THE COST OF MAKING THESE CONNECTION SHALL BE INCLUDED IN THE UNIT PRICE BIDS.
12. ALL PIPES, FITTINGS, SPECIAL, INCLUDING SERVICE LINES, ETC., SHALL BE TESTED UNDER A PRESSURE OF 150 LBS. PER SQUARE INCH AND SHALL SHOW NO LEAKAGE. DURATION OF TEST SHALL BE NOT LESS THAN TWO (2) HOURS. VERIFY WITH AUTHORITIES HAVING JURISDICTION ANY ADDITIONAL REQUIREMENTS NOT HEREIN DESCRIBED. NOTIFY ARCHITECT/ENGINEER MINIMUM OF 24 HOURS IN ADVANCE OF TESTS.
13. STERILIZATION OF THE PIPE LINE AND APPURTENANCES SHALL BE ACCOMPLISHED AFTER COMPLETION OF CONSTRUCTION AND IMMEDIATELY BEFORE SYSTEM IS PLACED INTO OPERATION. ALL WATER PIPES, OF WHATEVER SIZE AND HOWEVER INSTALLED, SHALL BE STERILIZED PRIOR TO BRING PLACED IN SERVICE, TO THE SATISFACTION OF THE LOCAL AUTHORITIES HAVING JURISDICTION. STERILIZATION SHALL FOLLOW ALL APPLICABLE PROVISIONS OF THE PROCEDURES ESTABLISHED FOR THE STERILIZATION OF CAST IRON PIPE AS SET FORTH IN AWWA SPECIFICATIONS C601 ENTITLED "A STANDARD FOR DISINFECTING WATER MAINS". UPON COMPLETION OF STERILIZING AND FLUSHING, THE CONTRACTOR SHALL PROVIDE THE ENGINEER WITH SAMPLES FOR BACTERIAL EXAMINATION. THE STERILIZATION SHALL NOT BE CONSIDERED COMPLETE UNTIL BACTERIOLOGICAL CLEARANCE IS OBTAINED FORM THE ENGINEER AND LOCAL AUTHORITIES HAVING JURISDICTION. THE COST OF THE BACTERIAL EXAMINATION SHALL BE AT THE EXPENSE OF THE CONTRACTOR. COPIES OF TEST REPORTS SHALL BE SUBMITTED TO THE ARCHITECT AND ENGINEER.
14. IN THE EVENT OF PRODUCTION FAILURE OR SHORTFALL BY TAMPA BAY WATER, AS SET FORTH IN SECTION 3.19 OF THE INTERLOCAL AGREEMENT CREATING TAMPA BAY WATER, DEVELOPER/OWNER SHALL TRANSFER TO PASCO COUNTY ANY AND ALL WATER USE PERMITS OR WATER USE RIGHTS THE DEVELOPER/OWNER MAY HAVE TO USE OR CONSUME SURFACE OR GROUND WATER WITHIN PASCO COUNTY.
15. PRIOR TO DEVELOPER/OWNER SELLING WATER OR WATER USE PERMITS OR WATER USE RIGHTS, DEVELOPER/OWNER SHALL NOTIFY PASCO COUNTY, AND PASCO COUNTY SHALL HAVE A RIGHT OF FIRST REFUSAL TO PURCHASE SUCH WATER OR WATER USE PERMITS OR WATER USE RIGHTS."
16. CONNECTIONS INTO AN EXISTING COUNTY-OWNED SYSTEM SHALL BE VIA WET TAP. WET TAPS SHALL BE PERFORMED EXCLUSIVELY BY THE UTILITIES SERVICES BRANCH AT THE DEVELOPER'S EXPENSE. EXCAVATION, BACKFILL, AND SURFACE RESTORATION SHALL BE THE CONTRACTOR'S RESPONSIBILITY. MATERIAL FOR WET TAPS LARGER THAN TWO INCHES SHALL BE PROVIDED AND INSTALLED BY THE PROJECT CONTRACTOR.

GENERAL NOTES:
ALL ELEVATIONS REFER TO N.A.V.D. 1988

1. LOCATIONS, ELEVATIONS AND DIMENSIONS OF EXISTING UTILITIES, STRUCTURES AND OTHER FEATURES ARE SHOWN ACCORDING TO THE BEST INFORMATION AVAILABLE AT THE TIME OF THE PREPARATION OF THESE PLANS BUT DO NOT PURPORT TO BE ABSOLUTELY CORRECT. THE CONTRACTOR SHALL VERIFY THE LOCATIONS, ELEVATIONS, AND DIMENSIONS OF ALL EXISTING UTILITIES, STRUCTURES AND OTHER FEATURES AFFECTING HIS WORK PRIOR TO CONSTRUCTION.
2. THE CONTRACTOR SHALL PROVIDE AT LEAST 48 HOURS NOTICE TO THE VARIOUS UTILITY COMPANIES PRIOR TO EXCAVATION IN ORDER TO PERMIT THE LOCATION OF EXISTING UNDERGROUND UTILITIES IN THE ADVANCE OF CONSTRUCTION. INCLUDING "SUNSHINE" 1-800-432-4770.
3. THE CONTRACTOR SHALL REPLACE ALL PAVING, STABILIZED EARTH, DRIVEWAYS, SIDEWALKS, ETC. WITH THE SAME TYPE OF MATERIAL THAT WAS REMOVED DURING CONSTRUCTION, OR AS DIRECTED BY THE ENGINEER.
4. THE CONTRACTOR SHALL CONTACT THE ENGINEER'S OFFICE IMMEDIATELY ON ANY CONFLICTS ARISING DURING CONSTRUCTION OF ANY IMPROVEMENTS SHOWN ON THESE DRAWINGS.
5. THE CONTRACTOR SHALL BE RESPONSIBLE FOR FURNISHING ALL FIELD INFORMATION TO THE ENGINEER FOR THE PREPARATION OF AS-BUILT DRAWINGS AS REQUIRED BY THE APPLICABLE GOVERNING AGENCIES OR THE OWNER.
6. NO ON-SITE BURNING WITHOUT DEPARTMENT OF FORESTRY APPROVAL.
7. AS APPLICABLE, THE OWNER/DEVELOPER WILL PROVIDE COPIES OF REQUIRED PERMITS FROM THE RESPECTIVE GOVERNING AGENCIES PRIOR TO ISSUANCE OF THE SITE DEVELOPMENT PERMIT.

PASCO COUNTY SITE PLAN NOTES:

1. HANDICAP PARKING SPACES WILL BE PROPERLY SIGNED AND STRIPED IN ACCORDANCE WITH FLORIDA DEPARTMENT OF TRANSPORTATION STANDARDS INDEX, THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES, OR OTHER APPLICABLE STANDARDS.
2. ALL ON-SITE PARKING SPACES WILL BE STRIPED WHITE AND SIGNED IN ACCORDANCE WITH THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES, LATEST EDITION. PARKING SPACES, DIRECTIONAL ARROWS, AND STOP BARS SHALL BE STRIPED WHITE. IT SHALL BE THE OWNER/DEVELOPER'S RESPONSIBILITY TO PROPERLY SIGN AND STRIPE IN ACCORDANCE WITH APPLICABLE STANDARDS.
3. FLORIDA STATE STATUTE 316.0745 REQUIRES THAT ALL TRAFFIC CONTROL SIGNING AND MARKINGS ON PRIVATE PROPERTY OPEN TO THE GENERAL PUBLIC BE IN CONFORMANCE WITH THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES AND FLORIDA DEPARTMENT OF TRANSPORTATION STANDARDS.
4. PRIOR TO CONSTRUCTION, A BUILDING PERMIT SHALL BE OBTAINED FOR ALL STRUCTURES THAT HAVE A FOOTER, REGARDLESS OF SIZE, THROUGH PASCO COUNTY CENTRAL PERMITTING. (I.E. INCLUDING BUT NOT INCLUSIVE BUILDINGS, ACCESSORIES, AND RETAINING WALL.)
5. IT IS THE OWNERS RESPONSIBILITY OR HIS DESIGNEE TO INSPECT AND MAINTAIN THE WATER RETENTION SYSTEM ON A REGULAR BASIS.
6. ALL FIRST FLOOR ELEVATION (FF) SHALL BE A MINIMUM OF 1' ABOVE THE BASE FLOOD ELEVATION OR AS REQUIRED BY THE LDC SECTIONR
7. ALL CONSTRUCTION SHALL BE IN ACCORDANCE WITH THE PASCO COUNTY CODES AND STANDARDS. IT SHALL BE THE SOLE RESPONSIBILITY OF THE APPLICANT AND THE PROFESSIONAL CIVIL ENGINEER TO CORRECT ANY ERROR, OMISSION OR VARIATION FROM THE ABOVE REQUIREMENTS FOUND IN THESE PLANS. ALL CORRECTIONS SHALL BE AT NO ADDITIONAL COST OR LIABILITY TO PASCO COUNTY.
8. NO EXCAVATION, TREE REMOVAL, OR UNDERGROUND UTILITY WORK (INCLUDING DRAINAGE TILES OR BURIED UTILITY SERVICE LINES) NOT SHOWN ON THESE PLANS SHALL BE ALLOWED.
9. THE DESIGN ELEMENTS WITHIN THESE PLANS HAVE BEEN REVIEWED ACCORDING TO PASCO COUNTY CHECKLISTS. SOME ELEMENTS MAY HAVE BEEN OVERLOOKED OR MISSED BY THE PLAN REVIEWER. ANY VARIANCE FROM ADOPTED STANDARDS IS NOT ALLOWED UNLESS SPECIFICALLY APPROVED BY PASCO COUNTY, PRIOR TO CONSTRUCTION.
10. A COPY OF THE APPROVED PLANS AND ISSUED PERMITS MUST BE ON THE JOB SITE AT ALL TIMES DURING CONSTRUCTION PROGRESS.
11. THE CONTRACTOR SHALL HAVE AN UNDERGROUND UTILITY LOCATE PERFORMED PRIOR TO ANY EXCAVATION COMMENCING (1-800-432-4770).
12. ALL PROPOSED STORM SEWERS, SWALES OR OTHER DRAINAGE IMPROVEMENTS SHALL BE CONSTRUCTED AND IN OPERATION PRIOR TO VERTICAL CONSTRUCTION.
13. THE OWNER/DEVELOPER ACKNOWLEDGES THAT THIS APPROVAL DOES NOT INCLUDE ANY WORK IN THE COUNTY OR STATE RIGHT-OF-WAY. IT SHALL BE THE APPLICANT'S/CONTRACTOR'S RESPONSIBILITY TO OBTAIN ALL CONSTRUCTION EASEMENTS NECESSARY BEFORE INITIATING OFFSITE WORK WITHIN THE ROAD RIGHT-OF-WAY FROM THE GOVERNING AUTHORITY
14. OPEN CUTTING OF EXISTING ROADWAYS IS NOT ALLOWED UNLESS SPECIFICALLY APPROVED BY PASCO COUNTY AND NOTED ON THESE APPROVED PLANS. ANY OPEN CUT SHALL BE RESTORED IN ACCORDANCE WITH PASCO COUNTY STANDARDS.
15. THE CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING ADEQUATE SAFEGUARDS, SAFETY DEVICES, PROTECTIVE EQUIPMENT, FLAGGERS, AND ANY OTHER NEEDED ACTIONS TO PROTECT THE LIFE, HEALTH AND SAFETY OF THE PUBLIC, AND TO PROTECT PROPERTY IN CONNECTION WITH THE PERFORMANCE OF WORK COVERED BY THE CONTRACTOR. ANY WORK WITHIN THE TRAVELED RIGHT-OF-WAY THAT MAY INTERRUPT TRAFFIC FLOW SHALL REQUIRE AT LEAST ONE FLAGGER FOR EACH LANE OF TRAFFIC AFFECTED.
16. ALL DRAINAGE STRUCTURES, SUCH AS CATCH BASINS AND MANHOLES, NOT LOCATED WITHIN A TRAVELED ROADWAY OR SIDEWALK SHALL HAVE SOLID LOCKING LIDS. ALL DRAINAGE STRUCTURES ASSOCIATED WITH PERMANENT DETENTION/RETENTION FACILITIES SHALL HAVE SOLID LOCKING LIDS.
17. ALL UTILITY CONSTRUCTION SHALL COMPLY WITH THE PASCO COUNTY STANDARDS FOR DESIGN AND CONSTRUCTION OF WATER, WASTEWATER AND RECLAIMED FACILITIES SPECIFICATIONS, LATEST EDITION.
18. ALL ON-SITE WATER AND SEWER FACILITIES SHALL BE OWNED AND MAINTAINED BY THE OWNER-DEVELOPER.
19. INSTALLATION OF FUEL STORAGE TANKS REQUIRES REVIEW AND APPROVAL BY THE FIRE MARSHAL AND THE ISSUANCE OF A SEPARATE BUILDING PERMIT. APPROVAL OF THE SITE PLAN DOES NOT CONSTITUTE APPROVAL OF THE LOCATION OF THE FUEL TANKS.
20. ALL PROPOSED SIGNS MUST BE APPLIED FOR, APPROVED, AND PERMITTED ON AN INDIVIDUAL BASIS APART FROM ANY ULTIMATELY-APPROVED SITE PLAN. APPROVAL OF THIS SITE PLAN DOES NOT CONSTITUTE APPROVAL OF ANY SIGNAGE.
21. THE ARCHITECT/ENGINEER CERTIFIES THAT THE SITE HAS BEEN DESIGNED IN ACCORDANCE WITH THE AMERICANS WITH DISABILITIES ACT.
22. ERECTING OR GROWING ANY OBSTRUCTIONS OVER THREE AND ONE-HALF FEET IN HEIGHT ABOVE THE ELEVATION OF THE LOWEST POINT ON THE CROWN OF THE ADJACENT ROADWAY WITHIN THE SIGHT TRIANGLE SHALL BE PROHIBITED.
23. ROCKS FOR EROSION PROTECTION OF ROADWAY DITCHES, WHERE REQUIRED, MUST BE OF SOUND QUARRY ROCK, PLACED TO A DEPTH OF 1 FOOT, AND MUST MEET THE FOLLOWING SPECIFICATIONS 4 – 8 INCHES/40–70% PASSING; 2 – 4 INCHES/30–40% PASSING; AND 2 INCHES OR LESS/10–20% PASSING.
24. NO IRRIGATION SYSTEM OR LANDSCAPING SHALL BE INSTALLED IN ANY COUNTY OR STATE RIGHT-OF-WAY WITHOUT ISSUANCE OF APPROPRIATE RIGHT-OF-WAY USE PERMIT.
25. THE OWNER/DEVELOPER ACKNOWLEDGES THAT THE SITE AND ITS SUBSEQUENT BUILDING PERMITS SHALL COMPLY WITH ALL REZONING/MPUD CONDITIONS.
26. ALL STRUCTURES, INCLUDING BUFFER WALLS, RETAINING WALLS, SIGNAGE, ETC. REQUIRE BUILDING PERMITS.
27. DURING CONSTRUCTION IF SOMETHING IS UNCOVERED, PARTICULARLY OF AN ARCHEOLOGICAL NATURE, ALL WORK SHALL STOP AND THE STATE ARCHEOLOGICAL OFFICE AND THE COUNTY ARE TO BE NOTIFIED.
28. IF DURING CONSTRUCTION ACTIVITIES ANY EVIDENCE OF THE PRESENCE OF STATE AND FEDERALLY PROTECTED PLANT AND/OR ANIMAL SPECIES IS DISCOVERED, WORK SHALL COME TO AN IMMEDIATE STOP AND PASCO COUNTY SHALL BE NOTIFIED WITHIN TWO WORKING DAYS OF THE PLANT AND/OR ANIMAL SPECIES FOUND ON THE SITE.
29. ALL LANDSCAPING SHALL CONFORM TO THE GRADES SHOWN HEREON AND SHALL BE LIMITED TO THE AREA WITHIN THE CONSTRUCTION LIMITS SHOWN.
30. EXISTING VEGETATION WHICH IS TO REMAIN IN PLACE SHALL BE PROTECTED AGAINST UNNECESSARY CUTTING, BREAKING OR SKINNING OF ROOTS, SKINNING AND BRUISING OF BARK, SMOTHERING BY STOCKPILING OF CONSTRUCTION MATERIALS OR EXCAVATED MATERIALS WITHIN THE DRIP LINE, EXCESS FOOT OR VEHICLE TRAFFIC OR PARKING OF VEHICLES WITHIN THE DRIP LINE.
31. ALL TREES TO REMAIN SHALL BE PROTECTED WITH A FENCE.
32. EXISTING VEGETATION WHICH IS TO REMAIN IN PLACE SHALL BE WATERED AS REQUIRED TO MAINTAIN ITS HEALTH DURING THE COURSE OF CONSTRUCTION OPERATIONS.
33. PROTECTION SHALL BE PROVIDED FOR ROOTS OVER 1.5 INCHES IN DIAMETER WHICH ARE CUT DURING CONSTRUCTION OPERATIONS. WHENEVER SUCH A ROOT IS CUT, THE CUT FACES SHALL BE COATED WITH EMULSIFIED ASPHALT OR OTHER ACCEPTABLE COATING SPECIALLY FORMULATED FOR HORTICULTURAL USE ON DAMAGED OR CUT PLANT TISSUES. ALL EXPOSED ROOTS SHALL BE TEMPORARILY COVERED WITH WET BURLAP TO PREVENT THE ROOTS FROM DRYING OUT. EXPOSED ROOTS SHALL BE PROVIDED WITH EARTH COVER AS SOON AS POSSIBLE.
34. VEGETATION THAT BECOMES DAMAGED BY CONSTRUCTION SHALL BE REPAIRED OR REPLACED IN A MANNER ACCEPTABLE TO PASCO COUNTY.
35. DAMAGED TREES SHALL BE REPAIRED BY A CERTIFIED ARBORIST. DAMAGED TREES WHICH CANNOT BE REPAIRED AND RESTORED TO FULL GROWTH STATUS, AS DETERMINED BY AN ARBORIST SHALL BE REPLACED.
36. NO CONSTRUCTION EQUIPMENT SHALL BE OPERATED OR CONSTRUCTION MATERIAL OR EXCAVATED MATERIAL STORED INSIDE OF THE PROTECTIVE FENCING OR IN AREAS OF EXISTING TREES.
37. ALL TREE AND BRUSH REMOVAL SHALL BE DONE BY HAND AND ALL STUMPS ARE TO BE GROUND OUT NOT BULLDOZED.
38. ALL CONSTRUCTION DEBRIS AND NON-HAZARDOUS WASTE MATERIALS SHALL BE REMOVED AND DISPOSED OF IN COMPLIANCE WITH ALL CURRENT LOCAL, STATE AND FEDERAL CODES AND REGULATIONS.
39. CONTRACTOR AND ITS SUBCONTRACTORS SHALL USE, HANDLE, TRANSPORT, AND DISPOSE OF ALL HAZARDOUS MATERIALS IN COMPLIANCE WITH ALL CURRENT FEDERAL, STATE AND LOCAL ENVIRONMENTAL, HEALTH OR SAFETY CODES AND REGULATIONS
40. ALL SLOPES WITHIN THE RIGHT-OF-WAY SHALL BE A MAXIMUM OF 4 TO 1.
41. ALL SODDED SLOPES OUTSIDE OF THE RIGHT-OF-WAY GREATER THAN 4 TO 1 SHALL HAVE THE SOD INSTALLED WITH SOD PEGS.
42. ALL RETENTION/DETENTION PONDS SLOPES GREATER THAN 3:1 SHALL BE ENCLOSED IN A CHAIN LINK FENCE.
43. IT IS THE POLICY OF PASCO COUNTY THAT IT DOES NOT AND WILL NOT ASSUME LIABILITY FOR THE DRAINAGE FACILITIES DESIGNED AND/OR CERTIFIED BY (DEVELOPER'S ENGINEER). PASCO COUNTY REVIEWS DRAINAGE PLANS, BUT CANNOT, ON BEHALF OF ____(OWNER)____ GUARANTEE THAT THE FINAL DRAINAGE DESIGN REVIEW WILL ABSOLVE ______(OWNER)_______ AND/OR THEIR SUCCESSORS AND/OR ASSIGNS OF FUTURE LIABILITY FOR IMPROPER DESIGN. IT IS THE POLICY OF PASCO COUNTY THAT APPROVAL OF THE FINAL DEVELOPMENT PLANS DOES NOT IMPLY APPROVAL OF (ENGINEER AND/OR FIRM'S NAME) DRAINAGE DESIGN.
44. ALL TEMPORARY SEDIMENT AND EROSION CONTROL DEVICES SHALL BE INSTALLED PRIOR TO COMMENCEMENT OF CONSTRUCTION ACTIVITIES AND MAINTAINED UNTIL PERMANENT STABILIZATION IS COMPLETE.
45. THE IMPLEMENTATION OF THE EROSION AND SEDIMENT CONTROL (ESC) PLANS AND THE CONSTRUCTION, MAINTENANCE, REPLACEMENT, AND UPGRADING OF THESE ESC FACILITIES IS THE RESPONSIBILITY OF THE APPLICANT UNTIL ALL CONSTRUCTION IS APPROVED.
46. THE BOUNDARIES OF THE CLEARING LIMITS SHOWN ON THE ESC PLANS SHALL BE CLEARLY FLAGGED BY A CONTINUOUS LENGTH OF SURVEY TAPE (OR FENCING, IF REQUIRED) PRIOR TO CONSTRUCTION. DURING THE CONSTRUCTION PERIOD, NO DISTURBANCE BEYOND THE CLEARING LIMITS SHALL BE PERMITTED. THE CLEARING LIMITS SHALL BE MAINTAINED BY THE APPLICANT/APPLICANT'S CONSTRUCTION REPRESENTATIVE FOR THE DURATION OF CONSTRUCTION.
47. THE ESC FACILITIES SHOWN ON THIS PLAN MUST BE CONSTRUCTED PRIOR TO OR IN CONJUNCTION WITH ALL CLEARING AND GRADING SO AS TO ENSURE THAT THE TRANSPORT OF SEDIMENT TO SURFACE WATERS, DRAINAGE SYSTEMS, AND ADJACENT PROPERTIES IS MINIMIZED.
48. THE ESC FACILITIES SHOWN ON THIS PLAN ARE THE MINIMUM REQUIREMENTS FOR ANTICIPATED SITE CONDITIONS. DURING THE CONSTRUCTION PERIOD, THESE ESC FACILITIES SHALL BE UPGRADED AS NEEDED FOR UNEXPECTED STORM EVENTS AND MODIFIED TO ACCOUNT FOR CHANGING SITE CONDITIONS (I.E. ADDITIONAL SUMP PUMPS, RELOCATION OF DITCHES AND SILT FENCE, ETC.).
49. THE ESC FACILITIES SHOWN ON THIS PLAN SHALL BE INSPECTED MINIMALLY, ONCE PER WEEK AND WITHIN 24 HOURS OF A 0.5 INCH RAIN EVENT. WRITTEN RECORDS OF THE INSPECTIONS SHALL BE MAINTAINED ON THE SITE.
50. CLEARED AREAS THAT ARE TO BE LEFT UNTOUCHED FOR FOURTEEN (14) DAYS OR LONGER, SHALL BE ADDRESSED IMMEDIATELY.
51. THE ESC FACILITIES ON INACTIVE SITES SHALL BE MAINTAINED THE SAME AS ACTIVE SITES.
52. CATCH BASINS AND SEDIMENT TRAPS SEDIMENT LOADING SHALL NOT EXCEED 50% OF THE BASIN OR TRAP CAPACITY.
53. STABILIZED CONSTRUCTION MATS AND ROADS SHALL BE INSTALLED AT THE BEGINNING OF CONSTRUCTION AND MAINTAINED FOR THE DURATION OF THE PROJECT. ADDITIONAL MEASURES SUCH AS WASH PADS MAY BE REQUIRED TO ENSURE THAT ALL PAVED AREAS ARE KEPT CLEAN FOR THE DURATION OF THE PROJECT.
54. WHERE STRAW MULCH IS UTILIZED FOR TEMPORARY EROSION CONTROL, IT SHALL BE APPLIED AT A MINIMUM RATE OF 1.5 – 2 TONS PER ACRE.
55. ALL EFFORTS MUST BE UNDERTAKEN TO PREVENT ANY EROSION OR TURBID WATER FROM BEING DISCHARGED OFF SITE, INTO WETLANDS AND/OR WATERS OF THE COUNTY. TURBID DISCHARGES THAT EXCEED 50 JTUS (JACKSON TURBIDITY UNITS) OR 29 NTUS (NEPHELOMETRIC TURBIDITY UNITS) ABOVE BACKGROUND LEVELS ARE NOT ACCEPTABLE.
56. ALL DEMOLITION DEBRIS SHALL BE REMOVED FROM THE SITE AND LEGALLY DISPOSED OF.

ALLOWABLE WATER, SANITARY SEWER, FORCE MAINS AND STORM PIPE MATERIALS:

WATER:
DUCTILE IRON, PVC PIPE, 2-INCH AND UNDER PVC SCHEDULE 80
SANITARY SEWER:
DUCTILE IRON, PVC PIPE
FORCE MAINS:
DUCTILE IRON, PVC PIPE, 2-INCH AND UNDER PVC SCHEDULE 80
STORM PIPE:
RCP, ERCP, A2000, ADS, AND HARDI PIPE

POLYVINYL CHLORIDE (PVC) PIPE: ANSI/ASTM D3034, TYPE PSM, SDR-35. PIPE JOINTS SHALL HAVE RUBBER GASKETS PER ASTM D3212.

DUCTILE IRON PIPE: ANSI 21.51, CLASS 54 DURALINED. EXTERIOR COATING ANSI 21.6 AND 21.8. FLEXIBLE COMPRESSION COUPLINGS MEETING REQUIREMENTS OF ASTM C425 WITH STAINLESS STEEL COMPRESSION BANDS SHALL BE USED FOR CONNECTING PVC PIPE TO DUCTILE IRON PIPE. JOINTS SHALL COMPLY WITH ANSI 21.11.

AERONAUTICAL SYSTEMS
SYSTEMS, INC.
GENERAL NOTES

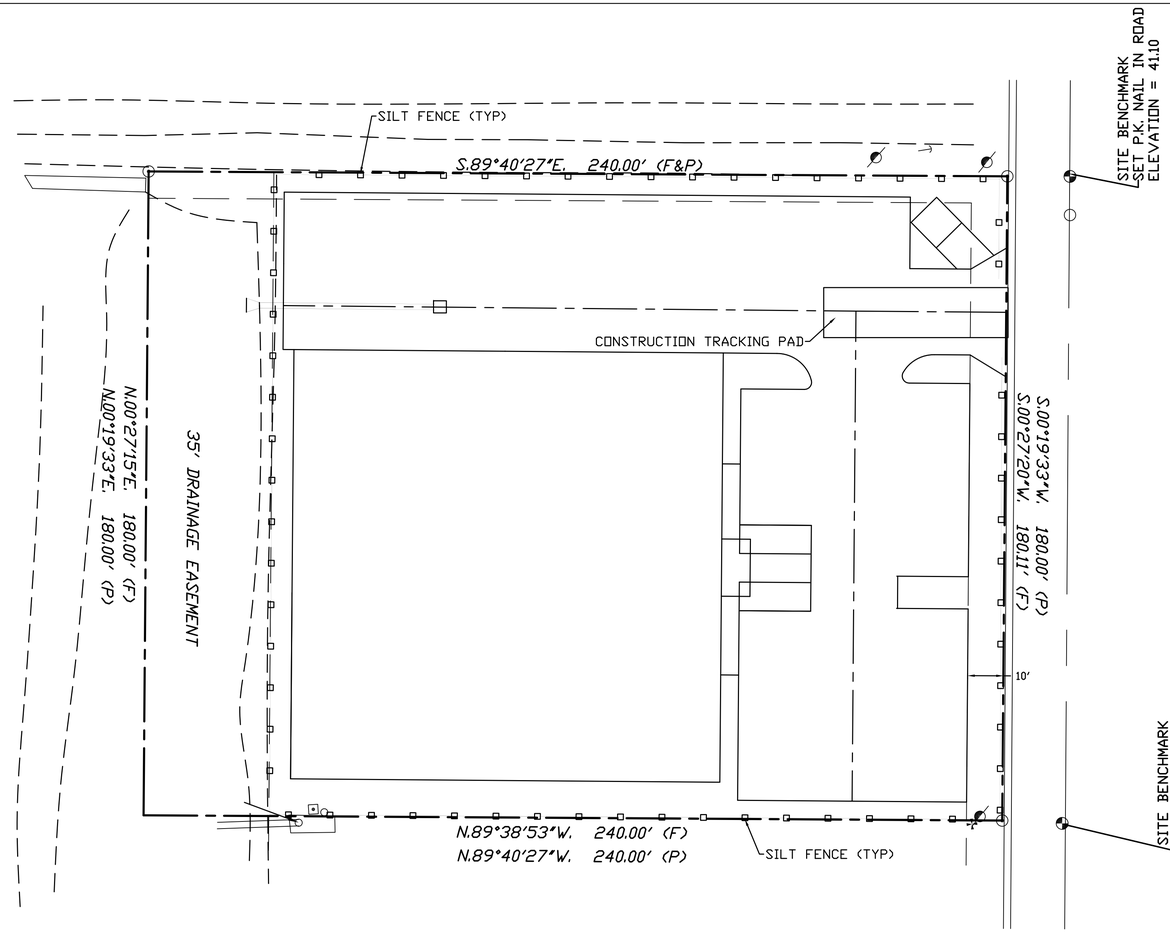
GUSTAFSON
ENGINEERING COMPANY
SITE DEVELOPMENT • HIGHWAY DESIGN
LAND PLANNING • PERMITTING
15030 SURREY BEND
BROOKSVILLE, FLORIDA 34609
PHONE (727) 992-0759 E.B.#8970

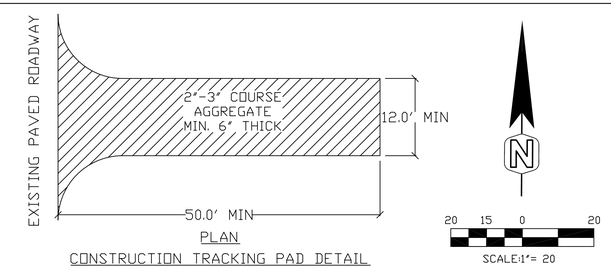
MARK	REV

APPR BY	RDG
DESIGN BY	RDG
DRAWN BY	CAD
DATE	8/14
SCALE	NTS

PROJECT NUMBER
14005

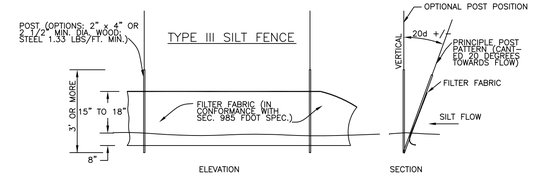
RAY D. GUSTAFSON
P.E. NO. 37565





CONSTRUCTION TRACKING PAD DETAIL

NOTES:
1. THE ENTRANCE SHALL BE MAINTAINED IN A CONDITION THAT WILL PREVENT TRACKING OR FLOWING OF SEDIMENT ONTO PUBLIC RIGHTS-OF-WAY. THIS MAY REQUIRE TOP DRESSING, REPAIR AND/OR CLEANOUT OF ANY MEASURES USED TO TRAP SEDIMENT.
2. WHEN NECESSARY, WHEELS SHALL BE CLEANED PRIOR TO ENTRANCE ONTO PUBLIC RIGHT-OF-WAY.
3. WHEN WASHING IS REQUIRED, IT SHALL BE DONE ON AN AREA STABILIZED WITH CRUSHED STONE THAT DRAINS INTO AN APPROVED SEDIMENT TRAP OR SEDIMENT BASIN.



SILT SCREEN BARRIER DETAIL

NTS

MAINTENANCE OF SILT SCREENS

SILT SCREENS SHALL BE INSPECTED AFTER EACH RAINFALL EVENT FOR SIGNS OF DETERIORATION OR FAILURE. DETERIORATION OF A SILT SCREEN SHALL BE CONSTRUED TO MEAN THAT THE SILT SCREEN HAS LIMITED EFFECTIVENESS OR CAPACITY FOR THE FUNCTION OF TRAPPING SEDIMENT, DUE TO PROBLEMS SUCH AS, BUT NOT LIMITED TO, EXCESSIVE BUILDUP OF SEDIMENT OR CONSTRUCTION ACCIDENT. WHEN A SILT SCREEN BECOMES DETERIORATED, IT SHALL BE IMMEDIATELY REMEDIED AT THE DIRECTION OF THE ENGINEER BY SUCH MEANS AS REMOVAL OF THE EXCESSIVE BUILDUP OF SILT, STRAIGHTENING AND TIGHTENING OF THE SCREEN, OR ANY OTHER SUCH MEASURE DEEMED NECESSARY. FAILURE OF A SILT SCREEN SHALL BE CONSTRUED TO MEAN THAT THE SILT SCREEN IS NO LONGER CAPABLE OF FUNCTIONING TO TRAP SEDIMENT DUE TO A RIP (TEAR) ACCIDENT, OR ANY OTHER SUCH MEANS. WHEN A SILT SCREEN IS DEEMED BY THE ENGINEER TO HAVE FAILED, IT SHALL BE IMMEDIATELY REPLACED WITH NEW SILT SCREEN WITHIN THE LIMITS DIRECTED BY THE ENGINEER. PREVENTATIVE MAINTENANCE OF THE SILT SCREEN SHALL BE ACCOMPLISHED BY WEEKLY INSPECTION FOR SIGNS OF DETERIORATION OR FAILURE DURING PERIODS OF NO RAINFALL EVENT.

STORMWATER SYSTEM
OPERATION/MAINTENANCE:
1. INSPECT AND MAINTAIN BI-WEEKLY. POSITIVE EFFORTS SHALL BE MADE TO PRECLUDE THE DEPOSIT OF ACCUMULATION OF GRASS CLIPPINGS, LEAVES, ORGANIC MATTER OR ANY MATERIAL WHICH WILL BE DETRIMENTAL TO THE FUNCTIONING OF THE INFILTRATION.
2. CHECK WEIR OR ORIFICE IN ALL CONTROL STRUCTURES PERIODICALLY TO ASSURE THAT THEY ARE FREE OF DEBRIS WHICH MAY HAVE AN EFFECT ON THEIR HYDRAULIC FUNCTION.

EROSION AND SEDIMENT CONTROL:
ALL PRACTICABLE AND NECESSARY MEASURES SHALL BE TAKEN BY THE CONTRACTOR DURING ALL PHASES OF CONSTRUCTION TO CONTROL AND PREVENT EROSION AND TRANSPORT OF SEDIMENT TO SURFACE DRAINS, SURFACE WATERS OF ONTO ADJACENT PUBLIC OR PRIVATE PROPERTY. RE-VEGITATION AND OR STABILIZATION OF DISTURBED GROUNDSURFACES SHALL BE ACCOMPLISHED AS RAPIDLY AS POSSIBLE TO PREVENT EROSION FROM OCCURRING AND REDUCE THE SEDIMENT LOAD IN THE DISCHARGED WATER. AS A MINIMUM, THE EROSIONS SEDIMENTATION CONTROLS SHALL CONSIST OF, BUT NOT BE LIMITED TO:
1. ON-SITE GRADING TO ROUTE ALL PRACTICABLE STORMWATER RUN-OFF THROUGH THE DESIGNATED DRAINAGE SYSTEM.
2. TEMPORARY CONTROLS SHALL BE PLACED ALONG THE PERIMETER OF THE CONSTRUCTION AREA TO BLOCK THE FLOW OF RUN-OFF. (I.E. HAY BALES, SILT FENCES, SODDED BERMS, ETC.)
3. HAY BALES SHALL BE INSTALLED AROUND STORM SEWER INLETS IN THE VICINITY OF THE SITE PRIOR TO, AND REMOVED FOLLOWING, ALL PAVING AND GRADING ACTIVITIES.
4. THE CONTRACTOR SHALL KEEP ROADS CONTIGUOUS TO THE PROJECT CLEAN AND FREE OF DIRT AND DEBRIS. THE TIRES ON ALL CONSTRUCTION EQUIPMENT SHALL BE WASHED PRIOR TO LEAVING THE SITE (DAILY IF NECESSARY). IN ADDITION, THE ROADWAY PAVEMENT SHALL BE SWEPT WHEN NECESSARY.
5. THE SOIL EROSION AND SEDIMENT CONTROL MEASURES SHALL BE IN PLACE PRIOR TO THE START OF CONSTRUCTION, REMAIN IN PLACE THROUGH CONSTRUCTION AND REMAIN UNTIL THE SITE IS PERMANENTLY STABILIZED.
6. REQUIRED EROSION CONTROL MEASURES MUST REMAIN INTACT THROUGHOUT CONSTRUCTION. THE CONTRACTOR IS TO PROVIDE HAY BALES OR SILT SCREENS FOR EROSION AND SEDIMENT CONTROL DURING ALL PHASED OF CONSTRUCTION TO PREVENT TRANSPORT OF SEDIMENT TO SURFACE DRAINS, SURFACE WATERS OR ONTO ADJACENT PUBLIC OR PRIVATE PROPERTY. THIS INCLUDED AREAS AROUND THE POND, OUTFALL PIPE AND CONTROL STRUCTURES.
7. ALL FUGITIVE DUST WILL BE CONTROLLED BY WAY OF WATER.

AERONAUTICAL SYSTEMS SYSTEMS, INC.

EROSION CONTROL PLAN

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DESIGN BY	RDG
DRAWN BY	CAD
DATE	8/14
SCALE	NTS

PROJECT NUMBER
14005

RAY D. GUSTAFSON
P.E. NO. 37565

SHEET NUMBER
7 OF **7**