

IMPACT-RESISTANT, UNCLIPPED, ALUMINUM TUBE MULLIONS

- 1) MULLIONS AND CLIPS HAVE BEEN DESIGNED & TESTED TO COMPLY WITH THE REQUIREMENTS OF THE FLORIDA BUILDING CODE, AND ARE APPROVED FOR IMPACT AND NON-IMPACT APPLICATIONS . MULLIONS ARE ONLY TO BE USED WITH THE MANUFACTURER'S FENESTRATION PRODUCTS.
- 2) INSTALLATION DETAILS SHOWN ARE FOR THE MULLION ONLY. ANCHORS SHOWN ARE IN ADDITION TO ANY ANCHORS REQUIRED FOR THE FENESTRATION PRODUCT INSTALLATION. TYPICAL APPLICATIONS ARE SHOWN. EACH SITUATION IS UNIQUE AND SHOULD BE EVALUATED BY AN EXPERIENCED INSTALLER FOR THE BEST INSTALLATION METHOD. OPTIONAL 1X OR 2X WOOD BUCKS IF USED, MUST BE ANCHORED PROPERLY TO TRANSFER LOADS AND ARE TO BE DESIGNED BY OTHERS.
- 3) THE TYPE AND NUMBER OF ANCHORS IS CRITICAL TO THE STRUCTURAL PERFORMANCE OF THE MULLED UNITS.
- 4) THE ANCHORAGE METHODS SHOWN HAVE BEEN DESIGNED TO RESIST THE WINDLOADS CORRESPONDING TO THE REQUIRED DESIGN PRESSURE. MULLIONS ARE CALCULATED TO DEFLECT NO MORE THAN L/180. THE 1/3 STRESS INCREASE WAS NOT USED IN THIS ANCHOR EVALUATION. THE 1.6 LOAD DURATION FACTOR WAS USED FOR THE EVALUATION OF WOOD SCREWS. DESIGN LOADS ARE BASED ON ALLOWABLE STRESS DESIGN, ASD.
- 5) PROPER SEALING OF ENTIRE ASSEMBLY IS THE RESPONSIBILITY OF OTHERS AND IS BEYOND THE SCOPE OF THESE INSTRUCTIONS.
- 6) USE THE COMBINED WIDTH OR HEIGHT OF ONLY TWO ADJACENT FENESTRATION PRODUCTS TO DETERMINE PRESSURES AND ANCHORAGE FOR THE COMMON MULLION. FOR MULTIPLE UNITS, CONSIDER ONLY TWO ADJACENT UNITS AT A TIME WHEN USING THE DESIGN PRESSURE AND ANCHORAGE TABLES. THE LOWEST DESIGN PRESSURE OF MULTIPLE MULLIONS OR FENESTRATION PRODUCTS SHALL APPLY.
- 7) ANCHOR EMBEDMENT TO BASE MATERIAL SHALL BE BEYOND WALL DRESSING OR STUCCO. WOOD BUCKS BY OTHERS, MUST BE ANCHORED PROPERLY TO TRANSFER LOADS TO THE STRUCTURE. ANCHORS SHALL BE COATED OR CORROSION RESISTANT AS APPROPRIATE FOR SUBSTRATE MATERIAL. DISSIMILAR MATERIALS SHALL BE PROTECTED AS REQUIRED TO PREVENT REACTIONS.
- 8) QUANTITY OF UNITS WITHIN A MULTIPLE MULLED ASSEMBLY IS UNLIMITED PROVIDED THAT THE SPAN AND OPENING WIDTH/HEIGHT OF EACH INDIVIDUAL MULLION COMPLIES WITH THE REQUIREMENTS OF THIS APPROVAL.
- 9) SUBSTRATES: CONCRETE SHALL CONFORM TO ACI 301 SPECIFICATIONS. HOLLOW AND GROUT-FILLED CONCRETE BLOCK UNIT (CMU) SHALL CONFORM TO ASTM C-90. WOOD SHALL HAVE A MIN. SG OF 0.55. ALUMINUM SHALL BE 6063-T5 AND BE A MINIMUM OF 0.125" THICK. STEEL STUDS TO BE A MINIMUM GRADE 33 AND .045" THICK (18 GAUGE). STRUCTURAL STEEL TO BE AT LEAST 0.125" THICK AND A36. ALL ANCHORS INTO METAL SHALL EXTEND AT LEAST 3 SCREW THREADS BEYOND THE MATERIAL. #10 & #12 ANCHORS INTO WOOD MAY BE STEEL, 18-8 S.S. OR 410 S.S.
- 10) MULLIONS HAVE BEEN TESTED AS "FREE- FLOATING" AND DO NOT NEED TO BE DIRECTLY ATTACHED TO THE MULLION CLIPS, BUT SHALL NOT HAVE A GAP OF MORE THAN 1/4" FROM THE CLIP.

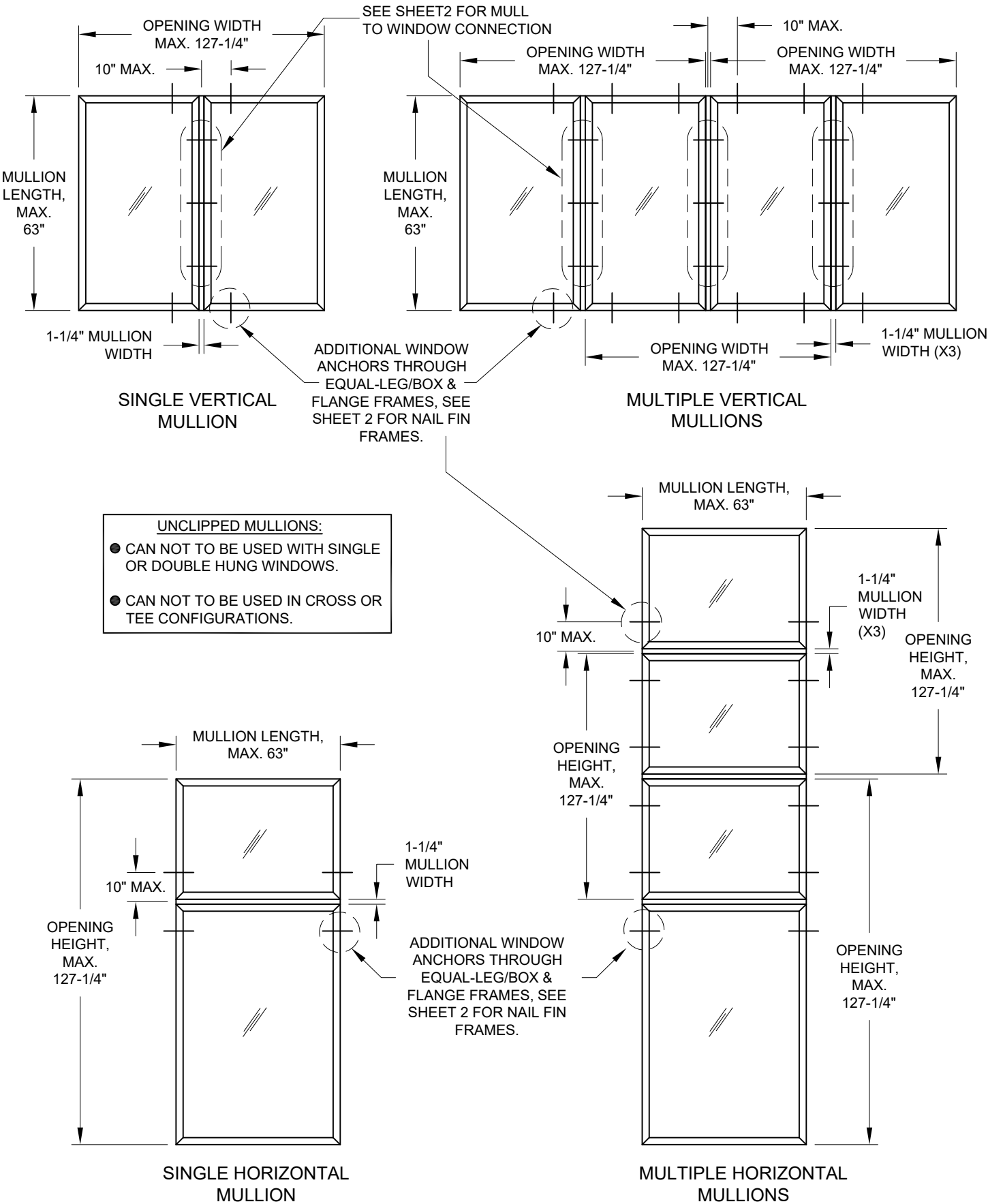
TABLE 1

Mullion Design Pressure (lbs/ft ²)	
	Opening Width or Height up to 127-1/4"
Mull Length up to 63"	+/-70.0 lbs/ft²

INSTALL 2 ADDITIONAL WINDOW ANCHORS THROUGH THE WINDOW FRAMES AT 10" MAX. ON EACH SIDE OF THE MULLION CENTERLINE. (4 ANCHORS TOTAL PER MULLION)

WHERE THE PRODUCT WILL BE INSTALLED WITHIN 3,000 FEET OF A SALTWATER COASTLINE, IT MUST COMPLY WITH SECTION 1711 OF THE FBC, BUILDING OR R332 OF THE FBC, RESIDENTIAL.

FLORIDA PRODUCT APPROVAL #17519

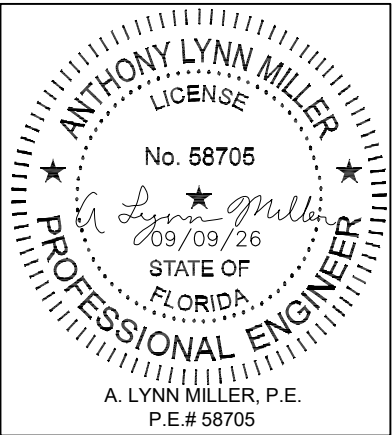


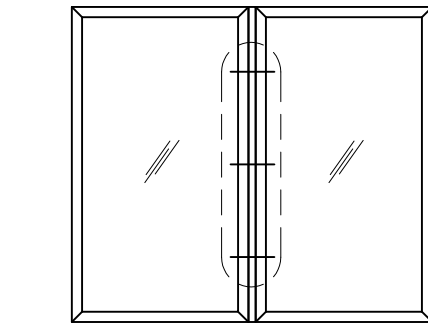
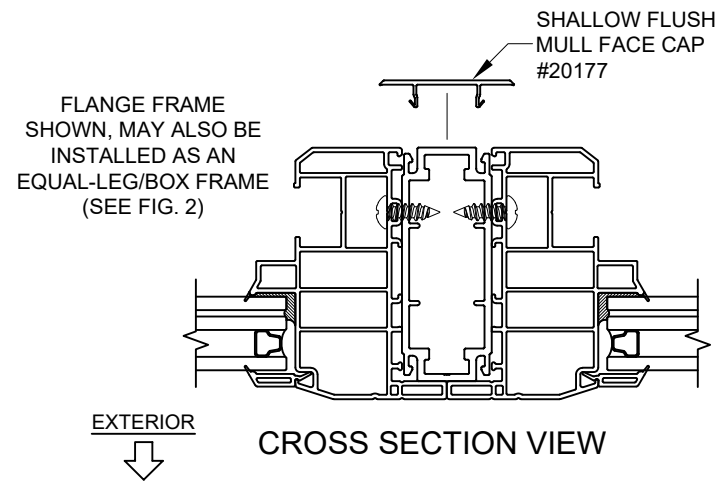
UNCLIPPED MULLIONS:

- CAN NOT TO BE USED WITH SINGLE OR DOUBLE HUNG WINDOWS.
- CAN NOT TO BE USED IN CROSS OR TEE CONFIGURATIONS.

DESIGN PRESSURE RATING
VARIABLES
IMPACT RATING
LARGE AND SMALL MISSILE IMPACT RESISTANT MISSILE LEVEL D, WIND ZONES 1, 2 & 3
MULLIONS ARE RATED TO THE AAMA-450 STANDARD

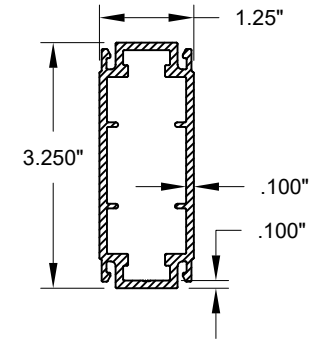
PREPARED BY A. LYNN MILLER 3400 PRECISION DRIVE N. VENICE, FL 34275 (941) 480-1600		COPYRIGHT © 2026 PGT INDUSTRIES, LLC LIMITED LICENSE TO MAKE COPIES FOR PERMITTING.		09/09/26		JENS ROSOWSKI		5KMULL-LM-UNCLIPPED	
PGT [®] WINDOWS and DOORS		3400 PRECISION DRIVE N. VENICE, FL 34275 (941) 480-1600		REGISTRATION #29296		ALUMINUM UNCLIPPED MULLIONS		ELEVATION & GENERAL NOTES	
1 OF 2		5000 MULLIONS		Sheet		DWG No.		1 OF 2	
5000 MULLIONS		ELEVATION & GENERAL NOTES		By		JENS ROSOWSKI		5KMULL-LM-UNCLIPPED	
5000 MULLIONS		ELEVATION & GENERAL NOTES		Date		09/09/26		5KMULL-LM-UNCLIPPED	



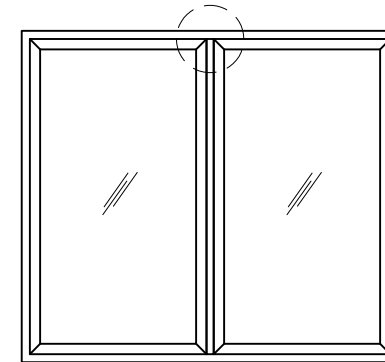
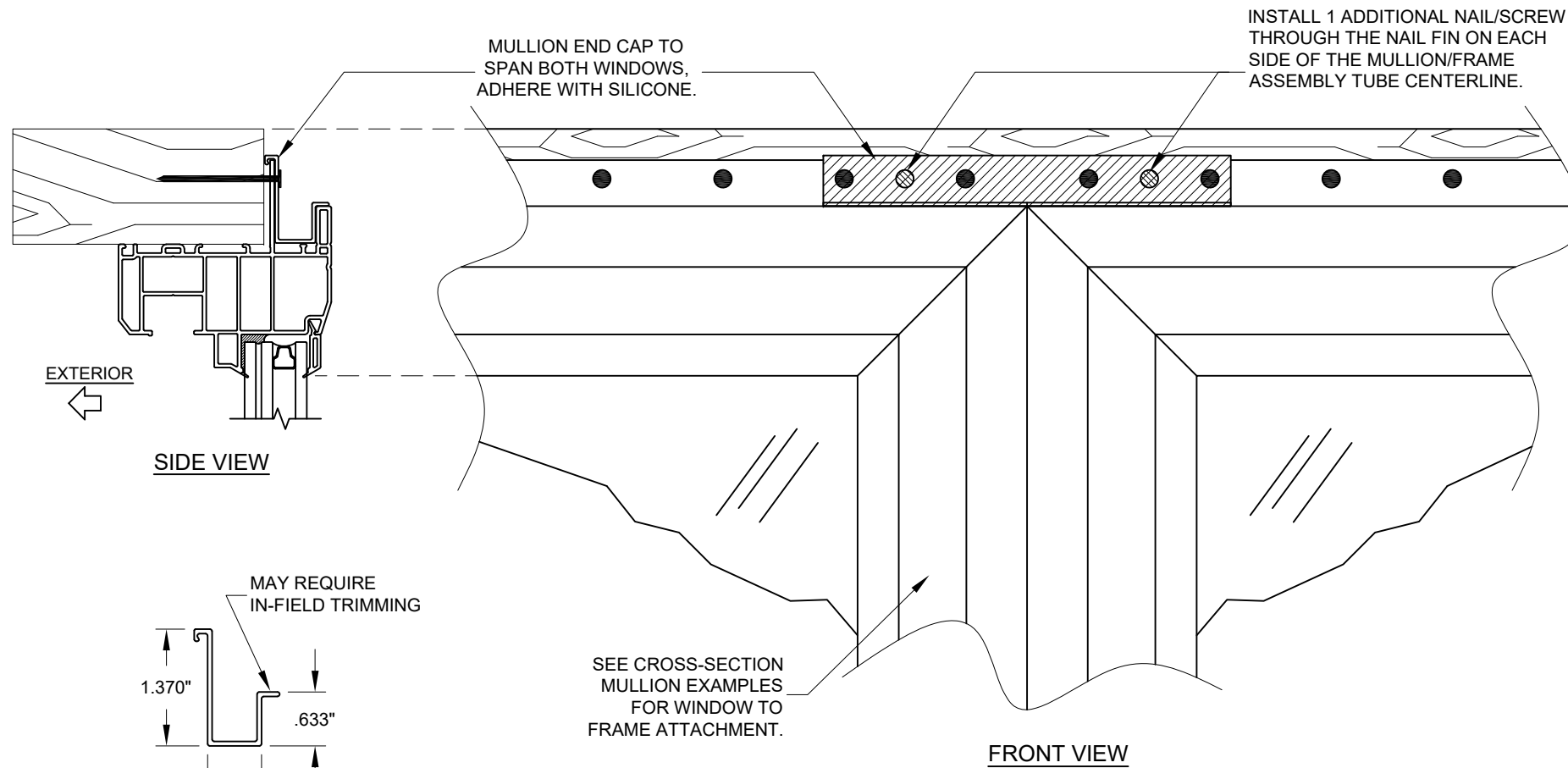


NOTES FOR MULLION TO WINDOW ATTACHMENT:

- 1) APPLIES TO ALL FRAME TYPES. MINIMUM ANCHOR LENGTH = 3/4"
- 2) USE ANCHOR TYPE AND SPACING AS PER THE WINDOW'S APPROVAL.
- 3) PICTURE WINDOW WITH VERTICAL MULLION SHOWN, ALL WINDOW TYPES AND MULLION ORIENTATIONS APPLICABLE.
- 4) IF APPLICABLE, NAIL FIN AND/OR FLANGE MAY BE REMOVED FROM THE WINDOW FRAME MEMBER BEING MULLED.



1.25" X 3.25" X .100"
MULLION
6005-T5 ALUMINUM



NOTES FOR MULLION END CAP:

- 1) APPLIES TO FIN OR J-CHANNEL FRAMES ONLY.
- 2) REQUIRED AT HEADER AND JAMBS.
- 3) PICTURE WINDOW WITH VERTICAL MULLION SHOWN, ALL WINDOW TYPES AND MULLION ORIENTATIONS APPLICABLE.

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5000 MULLIONS		2 OF 2		JENS ROSOWSKI	
5KMULL-LM-UNCLIPPED		DWG No.		By	
Sheet		Title		Installation	

ANTHONY LYNN MILLER
LICENSE
No. 58705
09/09/26
STATE OF FLORIDA
PROFESSIONAL ENGINEER
A. LYNN MILLER, P.E.
P.E.# 58705