HYDRAULIC ELEVATOR MODERNIZATION AND NEW INSTALLATION
USPS SEATTLE NDC - 34301 NINTH AVENUE SOUTH, FEDERAL WAY, WASHINGTON

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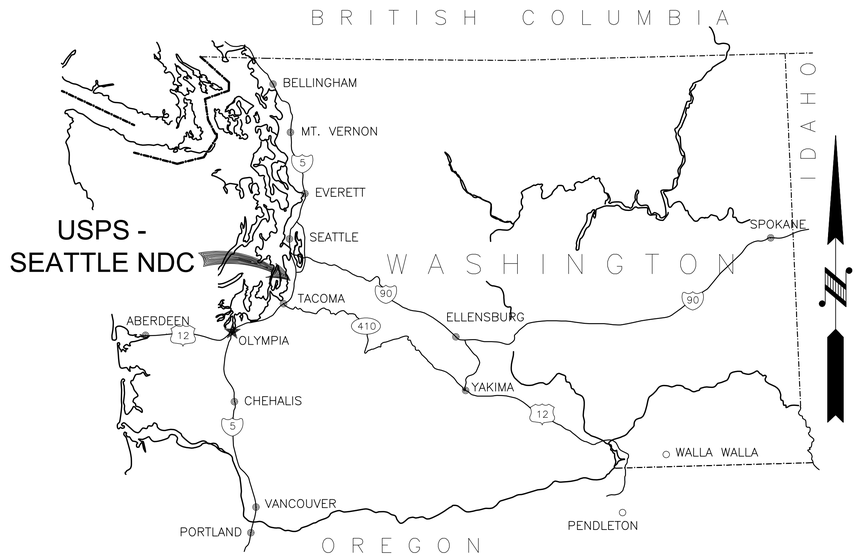

WASHINGTON STATE MAP

COURTESY OF BING MAPS

PROJECT SITE

VICINITY MAP

SHEET INDEX

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NO.	DATE	REVISION
1	09-04-19	BID DOCUMENTS

Sheet Contents: COVER SHEET
Project: HYDRAULIC ELEVATOR MODERNIZATION
USPS SEATTLE NDC
34301 NINTH AVENUE SOUTH, FEDERAL WAY, WASHINGTON

Designed By: MJL
Drawn By: SOG
Checked By: MJL
Date: 09-04-19

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09-04-19

Project Number: 19031
Sheet Number: S0.1
1 of 6

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GENERAL NOTES

BIDDERS WARRANTY

BY THE ACT OF SUBMITTING A BID FOR THE PROPOSED CONTRACT, THE CONTRACTOR WARRANTS THAT:

A. THE CONTRACTOR AND ALL SUBCONTRACTORS HE INTENDS TO USE HAVE CAREFULLY AND THOROUGHLY REVIEWED THE DRAWINGS AND NOTES AND HAVE FOUND THEM COMPLETE AND FREE FROM AMBIGUITIES AND SUFFICIENT FOR THE PURPOSE INTENDED; FURTHER THAT,

B. THE CONTRACTOR HAS CAREFULLY EXAMINED THE SITE OF THE WORK AND THAT FROM HIS OWN INVESTIGATIONS, HE HAS SATISFIED HIMSELF AS TO THE NATURE AND LOCATION OF THE WORK, AS TO THE CHARACTER, QUALITY, QUANTITIES OF MATERIAL AND DIFFICULTIES TO BE ENCOUNTERED, AS TO THE EXTENT OF EQUIPMENT AND OTHER FACILITIES NEEDED FOR THE PERFORMANCE OF THE WORK AND AS TO THE GENERAL AND LOCAL CONDITIONS, AND OTHER ITEMS WHICH MAY IN ANY WAY AFFECT THE WORK OR ITS PERFORMANCE, FURTHER THAT,

C. THE CONTRACTOR AND ALL WORKMEN HE INTENDS TO USE ARE SKILLED AND EXPERIENCED IN THE TYPE OF CONSTRUCTION REPRESENTED BY THE DRAWINGS AND DOCUMENTS BID UPON; FURTHER THAT,

D NEITHER THE CONTRACTOR NOR ANY OF HIS EMPLOYEES, AGENTS, INTENDED SUPPLIERS, OR SUBCONTRACTORS HAVE RELIED UPON ANY VERBAL REPRESENTATIONS ALLEGEDLY AUTHORIZED OR UNAUTHORIZED FROM THE OWNER OR HIS EMPLOYEES OR AGENTS, INCLUDING THE ARCHITECT OR ENGINEERS, IN ASSEMBLING THE BID FIGURES; FURTHER THAT,

E. THE BID FIGURE IS BASED SOLELY UPON THE CONSTRUCTION CONTRACT DOCUMENTS AND PROPERLY ISSUED WRITTEN ADDENDA AND NOT UPON ANY OTHER WRITTEN OR VERBAL REPRESENTATIONS.

STRUCTURAL NOTES

THESE GENERAL NOTES ARE TO BE USED AS A SUPPLEMENT TO THE SPECIFICATIONS. ANY DISCREPANCIES FOUND AMONG THE DRAWINGS, THE SPECIFICATIONS, THESE GENERAL NOTES AND THE SITE CONDITIONS SHALL BE REPORTED TO THE ARCHITECT, WHO SHALL CORRECT SUCH DISCREPANCY IN WRITING. ANY WORK DONE BY THE GENERAL CONTRACTOR AFTER DISCOVERY OF SUCH DISCREPANCY SHALL BE DONE AT THE GENERAL CONTRACTOR'S RISK. THE GENERAL CONTRACTOR SHALL VERIFY AND COORDINATE DIMENSIONS AMONG ALL DRAWINGS PRIOR TO PROCEEDING WITH ANY WORK OR FABRICATION. THE STRUCTURE HAS BEEN DESIGNED TO RESIST CODE SPECIFIED VERTICAL AND LATERAL FORCES AFTER THE CONSTRUCTION OF ALL STRUCTURAL ELEMENTS HAS BEEN COMPLETED. STABILITY OF THE STRUCTURE PRIOR TO COMPLETION IS THE SOLE RESPONSIBILITY OF THE GENERAL CONTRACTOR. THIS RESPONSIBILITY INCLUDES BUT IS NOT LIMITED TO JOB SITE SAFETY; ERECTION MEANS, METHODS, AND SEQUENCES; TEMPORARY SHORING, FORMWORK, BRACING; USE OF EQUIPMENT AND CONSTRUCTION PROCEDURES. PROVIDE ADEQUATE RESISTANCE TO LOADS ON THE STRUCTURES DURING CONSTRUCTION PER SEI/ASCE STANDARD NO. 37-02 "DESIGN LOADS ON STRUCTURES DURING CONSTRUCTION."

CONSTRUCTION OBSERVATION BY THE STRUCTURAL ENGINEER IS FOR GENERAL CONFORMANCE WITH DESIGN ASPECTS ONLY AND IS NOT INTENDED IN ANY WAY TO REVIEW THE CONTRACTOR'S CONSTRUCTION PROCEDURES.

STANDARDS

ALL METHODS, MATERIALS AND WORKMANSHIP SHALL CONFORM TO THE LATEST ADOPTEED EDITION (2015) INTERNATIONAL BUILDING CODE (IBC) AS AMENDED AND ADOPTED BY THE LOCAL BUILDING OFFICIAL OR APPLICABLE JURISDICTION.

CONTRACT DRAWINGS / DIMENSIONS

ARCHITECTURAL DRAWINGS ARE THE PRIME CONTRACT DRAWINGS. CONSULTANT DRAWINGS BY OTHER DISCIPLINES ARE SUPPLEMENTARY TO ARCHITECTURAL DRAWINGS. REPORT DIMENSIONAL OMISSIONS OR DISCREPANCIES BETWEEN ARCHITECTURAL DRAWINGS AND STRUCTURAL, MECHANICAL, ELECTRICAL OR CIVIL DRAWINGS TO ARCHITECT PRIOR TO PROCEEDING WITH WORK.

STRUCTURAL DRAWINGS SHALL BE USED IN CONJUNCTION WITH ARCHITECTURAL DRAWINGS. PRIMARY STRUCTURAL ELEMENTS ARE DIMENSIONED ON STRUCTURAL PLANS AND DETAILS AND OVERALL LAYOUT OF STRUCTURAL PORTION OF WORK. SOME SECONDARY ELEMENTS ARE NOT DIMENSIONED SUCH AS, WALL CONFIGURATIONS. INCLUDING EXACT DOOR AND WINDOW LOCATIONS, ALCOVES, SLAB SLOPES AND DEPRESSIONS, CURBS, ETC. VERTICAL DIMENSIONAL CONTROL IS DEFINED BY ARCHITECTURAL WALL SECTIONS AND BUILDING SECTIONS. STRUCTURAL DETAILS SHOW DIMENSIONAL RELATIONSHIPS TO CONTROL DIMENSIONS DEFINED BY ARCHITECTURAL DRAWINGS. DETAILING AND SHOP DRAWING PRODUCTION FOR STRUCTURAL ELEMENTS WILL REQUIRE DIMENSIONAL INFORMATION CONTAINED IN BOTH ARCHITECTURAL AND STRUCTURAL DRAWINGS.

DESIGN CRITERIA

AREA	DEAD LOAD	LIVE LOAD	SNOW *	PARTITION LOAD	CONCENTRATED LOAD
ROOF	SEE ORIGINAL BUILDING DESIGN DOCUMENTS				
FLOOR	SEE ORIGINAL BUILDING DESIGN DOCUMENTS				
ELEVATOR					ACTUAL WEIGHT

*SNOW: (MINIMUM ROOF SNOW LOAD = 25 PSF, NON-REDUCIBLE)

LATERAL FORCES

LATERAL FORCES ARE TRANSMITTED BY DIAPHRAGM ACTION OF ROOF AND FLOORS TO SHEAR WALLS OR FRAMES. LOADS ARE THEN TRANSFERRED TO FOUNDATION BY SHEAR WALL OR FRAME ACTION WHERE ULTIMATE DISPLACEMENT IS RESISTED BY PASSIVE PRESSURE OF EARTH AND/OR SLIDING FRICTION. OVERTURNING IS RESISTED BY DEAD LOAD OF THE STRUCTURE.

WIND:

INTERNAL DESIGN OF NON BUILDING STRUCTURE, NOT SUBJECTED TO WIND LOADS - NOT APPLICABLE THIS PROJECT.

SEISMIC:

SEE ORIGINAL BUILDING DESIGN DOCUMENTS

PIPES, DUCTS AND MECHANICAL EQUIPMENT SUPPORTED OR BRACED FROM STRUCTURE SHALL CONFORM TO SHEET METAL AND AIR CONDITIONING CONTRACTORS' NATIONAL ASSOCIATION, INC. PUBLICATION "SEISMIC RESTRAINT MANUAL: GUIDELINES FOR MECHANICAL SYSTEMS". SPRINKLER LINE ATTACHMENTS SHALL CONFORM TO NFPA PAMPHLET 13.

FOUNDATION DESIGN CRITERIA

SOILS REPORT BY A GEOTECHNICAL ENGINEER IS RECOMMENDED. SEE PRELIMINARY GEOTECHNICAL MEMORANDUM PROVIDED BY HWA GEOSCIENCES, INC. (GEOTECHNICAL ENGINEERING REPORT update pending) DATED MARCH 5, 2014.

ALLOWABLE BEARING PRESSURE (ASD) QA = 1500 PSF
AT REST PRESSURE - RESTRAINED: 60 PCF +12H SEISMIC SURCHARGE
ACTIVE PRESSURE - UNRESTRAINED: 40 PCF +6H SEISMIC SURCHARGE
PASSIVE RESISTANCE: 300 PCF (INCLUDES F.O.S. ≥ 1.5)
COEFFICIENT OF FRICTION: .35 (INCLUDES F.O.S. ≥ 1.5)
*1/3 INCREASE ALLOWED FOR SEISMIC OR WIND LOADING

ASSUMED VALUES USED IN LIEU OF REPORT ARE ACCEPTABLE IF FAVORABLE CONDITIONS ARE FOUND. IF SOFT SOILS OR SOILS DIFFERING FROM IBC TABLE 1806.2 CLASS & SOIL ARE FOUND, CONSULT GEOTECHNICAL ENGINEER FOR REPORT AND COMPLY WITH RECOMMENDATIONS.

IN LIEU OF UPDATED GEOTECHNICAL REPORT, QA = 1500 PSF, ASSUMED BEARING CAPACITY.

ALL FOOTINGS SHALL BEAR ON FIRM, UNDISTURBED EARTH OR "STRUCTURAL BACKFILL". NATIVE EARTH BEARING SHALL BE SURFACE COMPACTED. AREAS OVER-EXCAVATED SHALL BE BACKFILLED WITH LEAN CONCRETE (F'c= 2000 PSI) OR "STRUCTURAL BACKFILL". AREAS DESIGNATED "STRUCTURAL BACKFILL" SHALL BE FILLED WITH APPROVED WELL-GRADED BANKRUN MATERIAL. MAXIMUM SIZE OF ROCK 4". FROZEN SOIL, ORGANIC MATERIAL AND DELETERIOUS MATTER NOT ALLOWED. COMPACT TO AT LEAST 95% OF ITS MAXIMUM DENSITY AS DETERMINED BY ASTM D1557. CONTRACTOR SHALL EXERCISE EXTREME CARE DURING EXCAVATION TO AVOID DAMAGE TO BURIED LINES, TANKS, AND OTHER CONCEALED ITEMS. UPON DISCOVERY, DO NOT PROCEED WITH WORK UNTIL RECEIVING WRITTEN INSTRUCTIONS FROM ARCHITECT OR ENGINEER. A COMPETENT REPRESENTATIVE OF THE OWNER SHALL INSPECT ALL FOOTING EXCAVATIONS FOR SUITABILITY OF BEARING SURFACES PRIOR TO PLACEMENT OF REINFORCING STEEL. PROVIDE DRAINAGE AND DEWATERING AROUND ALL WORK TO AVOID WATER-SOFTENED FOOTINGS.

FREE DRAINING BACKFILL MATERIAL FOR RETAINING & BASEMENT WALLS

PROVIDE A CLEAN, FREE DRAINING, WELL GRADED GRANULAR MATERIAL CONFORMING TO ASTM D2487 GW OR SW WHOSE MAXIMUM PARTICLE SIZE DOES NOT EXCEED 3/4" AND WHOSE FINES CONTENT (MATERIAL PASSING THE NO. 200 SIEVE) DOES NOT EXCEED 5%, WITH A MAXIMUM DUST RATIO OF THE % PASSING U.S. NO. 200 SIEVE DIVIDED BY THE % PASSING U.S. NO. 40 SIEVE = 2/3 MAX.

CONCRETE

CAST IN PLACE CONCRETE

MIX DESIGNS: THE CONTRACTOR SHALL DESIGN CONCRETE MIXES THAT MEET OR EXCEED THE REQUIREMENTS OF THE CONCRETE MIX TABLE. THE MIX DESIGNS SHALL FACILITATE ANTICIPATED PLACEMENT METHODS, WEATHER, REBAR CONGESTION, ARCHITECTURAL FINISHES, CONSTRUCTION SEQUENCING, STRUCTURAL DETAILS, AND ALL OTHER FACTORS REQUIRED TO PROVIDE A STRUCTURALLY SOUND, AESTHETICALLY ACCEPTABLE FINISHED PRODUCT. WATER REDUCING ADMIXTURES WILL LIKELY BE REQUIRED TO MEET THESE REQUIREMENTS. CONCRETE MIX DESIGNS SHALL CLEARLY INDICATE THE TARGET SLUMP. SLUMP TOLERANCE SHALL BE ± 1-1/2 INCHES.

AGGREGATE: COARSE AND FINE AGGREGATE SHALL CONFORM TO ASTM C33

CEMENT: CEMENT SHALL CONFORM TO ASTM C150, TYPE II PORTLAND CEMENT, UNLESS NOTED OTHERWISE.

FLYASH: SHALL CONFORM TO ASTM C618 CLASS C OR F, MAXIMUM LOSS OF IGNITION SHALL BE 1.0%.

SLAG: GROUND GRANULATED BLAST-FURNACE (GGBF) SLAG SHALL CONFORM TO ASTM C989 GRADE 100 OR 120.

ALTERNATE MIX DESIGNS: VARIATIONS TO THE MIX DESIGN PROPORTIONS MAY BE ACCEPTED IF SUBSTANTIATED IN ACCORDANCE WITH ACI 318, CHAPTER 5. PROVIDE SUBMITTALS A MINIMUM OF TWO WEEKS PRIOR TO BID FOR DETERMINATION OF ACCEPTABILITY.

ADMIXTURES: ADMIXTURES SHALL BE BY MASTER BUILDERS, W.R. GRACE, OR PRE-APPROVED EQUAL. ALL MANUFACTURER'S RECOMMENDATIONS SHALL BE FOLLOWED.

WATER: SHALL BE CLEAN AND POTABLE.

MAXIMUM CHLORIDE CONTENT: THE MAXIMUM WATER SOLUBLE CHLORIDE CONTENT SHALL NOT EXCEED 0.15% BY WEIGHT OF CEMENTITIOUS MATERIAL UNLESS NOTED OTHERWISE.

CONCRETE EXPOSED TO WEATHER: PROVIDE 5.0% TOTAL AIR CONTENT FOR ALL CONCRETE EXPOSED TO WEATHER. TOTAL AIR CONTENT IS THE SUM OF ENTRAINED AIR PROVIDED BY ADMIXTURES AND NATURALLY OCCURRING ENTRAPPED AIR. AIR CONTENT SHALL BE TESTED PRIOR TO BEING PLACED IN THE PUMP HOPPER OR BUCKET; IT IS NOT REQUIRED TO BE TESTED AT THE DISCHARGE END OF THE PUMP HOSE. THE TOLERANCE ON ENTRAPPED AIR SHALL BE +2.0% AND -1.5% WITH THE AVERAGE OF ALL TESTS NOT LESS THAN THE SPECIFIED AMOUNT.

TOTAL CEMENTITIOUS MATERIAL: THE SUM OF ALL CEMENT PLUS FLYASH AND SLAG. AT THE CONTRACTORS OPTION FLYASH OR SLAG MAY BE SUBSTITUTED FOR CEMENT BUT SHALL NOT EXCEED 25% BY WEIGHT OF TOTAL CEMENTITIOUS MATERIAL. IN NO CASE SHALL THE AMOUNT OF FLYASH OR SLAG BE LESS THAN REQUIRED BY THE CONCRETE MIX DESIGN TABLE. FOOTING MIXES SHALL CONTAIN NOT LESS THAN 5 SACKS OF CEMENTITIOUS MATERIAL PER CUBIC YARD, ALL OTHER MIXES SHALL CONTAIN NOT LESS THAN 5-1/2 SACKS OF CEMENTITIOUS MATERIAL PER CUBIC YARD, UNLESS NOTED OTHERWISE.

ITEM	DESIGN f'c (PSI) (AT 28 DAYS U.N.O.)	MAX. W/C RATIO	MIN. FLYASH OR SLAG(PCY)	AGGREGATE GRADING ASTM/AASHTO	NOTES
SLABS ON GRADE - UNO	4000	0.45	100	57 OR 67	1
ARCHITECTURALLY EXPOSED SLABS ON GRADE	4000	0.45	100	57 OR 67	1,2,3
FOUNDATIONS	3000	0.5	-	57 OR 67	-
STEMWALLS AND OTHER WALLS	4000	0.5	100	57 OR 67	-
ALL OTHER CONCRETE	4000	0.5	-	57 OR 67	-

CONCRETE MIX NOTES:

1. FIBROUS CONCRETE REINFORCEMENT SHALL BE "FIBERMESH" MANUFACTURED BY PROPEX CONCRETE SYSTEMS OR PRE-APPROVED EQUAL AND SHALL CONFORM TO ASTM C1116 TYPE III 4.1.3, PERFORMANCE LEVEL 1, AND SHALL BE 100 PERCENT VIRGIN POLYPROPYLENE, FIBRILLATED FIBERS CONTAINING NO REPROCESSED OLEFIN MATERIALS AND SPECIFICALLY MANUFACTURED FOR USE AS CONCRETE SECONDARY REINFORCEMENT. DOSAGE SHALL FOLLOW MANUFACTURER'S RECOMMENDATION BUT NOT LESS THAN 1.5 LB/CU. YD.
2. MAXIMUM WATER CONTENT 240 PCY.
3. THIS MIX SHALL CONTAIN 1 GALLON PER CY OF 'ECLIPSE' SHRINKAGE REDUCING ADD MIXTURE BY W.R. GRACE OR APPROVED ALTERNATE. FOR CONCRETE REQUIRING AN AIR ENTRAINMENT ADMIXTURE, 'ECLIPSE PLUS' SHALL BE USED.
4. POUNDS PER CUBIC YARD IS ABBREVIATED PCY.

CONCRETE PLACEMENT

PLACE CONCRETE FOLLOWING ALL APPLICABLE ACI RECOMMENDATIONS. CONCRETE SHALL BE PROPERLY CONSOLIDATED PER ACI 309 USING INTERIOR MECHANICAL VIBRATORS, DO NOT OVER-VIBRATE. CONCRETE SHALL BE POURED MONOLITHICALLY BETWEEN CONSTRUCTION OR EXPANSION JOINTS. IF CONCRETE IS PLACED BY THE PUMP METHOD, HORSES SHALL BE PROVIDED TO SUPPORT THE HOSE, THE HOSE SHALL NOT BE ALLOWED TO RIDE ON THE REINFORCING. WEATHER FORECASTS SHALL BE MONITORED AND ACI RECOMMENDATIONS FOR HOT AND COLD WEATHER CONCRETING SHALL BE FOLLOWED AS REQUIRED. CONCRETE SHALL NOT FREE FALL MORE THAN 5 FEET DURING PLACEMENT WITHOUT WRITTEN APPROVAL OF STRUCTURAL ENGINEER.

FLOATING & FINISHING OPERATIONS

WATER SHALL NOT BE ADDED TO THE CONCRETE SURFACE DURING FLOATING & FINISHING OPERATIONS. PRE-APPROVED EVAPORATION RETARDER SPECIFICALLY DESIGNED FOR FLOATING & FINISHING OPERATIONS ARE ACCEPTABLE.

FORMED SURFACES:

FORMWORK CLASS OF SURFACE PER ACI 347 TABLE 3.1

ITEM	CLASS OF FINISH
ALL SURFACES EXPOSED TO PUBLIC VIEW, UNLESS NOTED OTHERWISE	A
ALL SURFACES RECEIVING A COURSE TEXTURED COATING SUCH AS PLASTER OR STUCCO, UNLESS NOTED OTHERWISE	B
ALL OTHER SURFACES, UNLESS NOTED OTHERWISE	C

FORMWORK STRIPPING:

SLABS: SLABS MAY BE STRIPPED AND BECOME SELF SUPPORTING AS SOON AS THEIR COMPRESSIVE STRENGTH REACHES 75% OF THE SPECIFIED DESIGN STRENGTH. RESHORING SHALL BE PROVIDED FOR ALL CONSTRUCTION LOADS THEREAFTER PER THE GENERAL CONTRACTOR.

COLD WEATHER PLACEMENT:

1. COLD WEATHER IS DEFINED BY ACI 306 AS "A PERIOD WHEN FOR MORE THAN 3 SUCCESSIVE DAYS THE MEAN DAILY TEMPERATURE DROPS BELOW 40° F."
2. NO CONCRETE SHALL BE PLACED ON FROZEN OR PARTIALLY FROZEN GROUND. THAWING THE GROUND WITH HEATERS IS PERMISSIBLE.
3. CONCRETE MIX TEMPERATURES SHALL BE AS SHOWN BELOW. HEATING OF WATER AND/OR AGGREGATES MAY BE REQUIRED TO ATTAIN THESE TEMPERATURES.
4. THE CONCRETE MAY REQUIRE PROTECTION FOR 4-7 DAYS AFTER POURING. IF TEMPERATURES REMAIN BELOW FREEZING, INSULATING BLANKET COVERAGE IS REQUIRED. IF TEMPERATURES ARE SLIGHTLY BELOW FREEZING (30° F MIN.) AT NIGHT AND ABOVE FREEZING DURING THE DAY, KRAFT PAPER WITH COMPLETE COVERAGE MAY BE USED IN LIEU OF INSULATED BLANKETS.
5. NO ADDITIVES CONTAINING CHLORIDES SHALL BE USED. USE "POZZUTEC 20+" BY MASTER BUILDERS OR "POLARSET" BY W.R. GRACE OR PRE-APPROVED EQUAL.

CONDITION OF PLACEMENT AND CURING *	WALLS & SLABS	FOOTINGS
ABOVE 30° F. *	60°	55°
0° TO 30° F. *	65°	60°
BELOW 0° F. *	70°	65°
MIN. TEMP. FRESH CONCRETE AS PLACED AND MAINTAINED, DEGREES F.	55°	50°
MAX. ALLOWABLE GRADUAL DROP IN TEMP. THROUGHOUT FIRST 24 HOURS AFTER END OF PROTECTION, DEGREES F.	50°	40°

*MIN. TEMP. FRESH CONCRETE AS MIXED FOR WEATHER INDICATED, DEGREES F.

HOT OR WINDY WEATHER PLACEMENT:

HOT WEATHER IS DEFINED BY ACI 305 AS "ANY COMBINATION OF HIGH AIR TEMPERATURE, LOW RELATIVE HUMIDITY, AND WIND VELOCITY, TENDING TO IMPAIR THE QUALITY OF FRESH HARDENED CONCRETE. ACI 305 FIGURE 2.1.5 SHALL BE USED BY THE CONTRACTOR TO ESTIMATE THE RATE OF EVAPORATION. WHEN THE ESTIMATED RATE OF EVAPORATION IS GREATER THAN O.2 PSF/HOUR THE PLACEMENT SHALL BE CONSIDERED A HOT WEATHER PLACEMENT. PRECAUTIONS AGAINST PLASTIC SHRINKAGE CRACKING ARE NECESSARY. PRECAUTIONS TAKEN BY THE CONTRACTOR VARY DEPENDING UPON THE FACTORS ASSOCIATED WITH WATER EVAPORATION AND INCLUDE BUT ARE NOT LIMITED TO:

1. LIMITING CONCRETE TEMPERATURE TO 100°F AT TIME OF PLACEMENT.
2. APPLICATION OF AN EVAPORATION RETARDER.
3. USE OF FOG SPRAY.
4. REDUCTION OF POUR SIZE.
5. PLACING CONCRETE AT NIGHT.

CONTROL AND CONSTRUCTION JOINTS

CONSTRUCTION JOINTS SHALL MEET THE REQUIREMENTS OF ACI 301 SECTIONS 2.2.2.5 AND 5.3.2.6. SPECIAL BONDING METHODS PER SECTION 5.3.2.6 SHALL BE SATISFIED BY ITEM 4 BELOW UNLESS OTHERWISE DETAILED ON THE STRUCTURAL DRAWINGS. WHERE CONSTRUCTION JOINTS ARE NOT SHOWN ON PLAN OR ADDITIONAL CONSTRUCTION JOINTS ARE REQUIRED SUBMIT PROPOSED JOINTING FOR STRUCTURAL ENGINEERS APPROVAL. PROVIDE CONSTRUCTION JOINTS AS INDICATED BELOW UNLESS NOTED OTHERWISE ON THE PLANS:

1. SLABS ON GRADE: PROVIDE CONSTRUCTION AND/OR CONTROL JOINTS AT 16 FEET O.C. MAXIMUM FOR UNEXPOSED SLABS ON GRADE AND 12 FEET O.C. FOR EXPOSED SLABS ON GRADE. COORDINATE JOINTS WITH ARCHITECTURAL DRAWINGS.
2. TOPPING OVER WOOD FRAMING: PROVIDE JOINTS AT 12' O.C. MAXIMUM.
3. BONDING AGENT: WHERE BONDING AGENT IS SPECIFICALLY CALLED OUT ON THE STRUCTURAL DRAWINGS USE "WELD CRETE" BY LARSON PRODUCTS CORPORATION OR PRE-APPROVED EQUAL. FOLLOW ALL MANUFACTURERS RECOMMENDATIONS.
4. ATTACHMENT OF NEW CONCRETE TO EXISTING: WHERE SHOWN, ROUGHEN CONCRETE TO A MINIMUM AMPLITUDE OF 1/4" USING IMPACT HAMMER. REMOVE ALL LOOSE OR DAMAGED CONCRETE, THOROUGHLY FLUSH ALL SURFACES WITH POTABLE WATER, AIR BLAST WITH OIL FREE COMPRESSED AIR TO REMOVE ALL WATER.

EMBEDDED ITEMS

1. NO ALUMINUM ITEMS SHALL BE EMBEDDED IN ANY CONCRETE.
2. ALL EMBED PLATES SHALL BE SECURELY FASTENED IN PLACE.
3. ALL EMBEDDED STEEL ITEMS EXPOSED TO EARTH SHALL BE GALVANIZED.
4. ALL EMBEDDED STEEL ITEMS EXPOSED TO WEATHER SHALL BE PAINTED UNLESS NOTED AS GALVANIZED. SEE DRAWINGS AND SPECIFICATIONS FOR PAINT, PRIMER, AND GALVANIZING REQUIREMENTS.
5. EMBEDDED CONDUIT IS NOT PERMITTED IN CONCRETE SLABS ON METAL DECK UNLESS SPECIFICALLY NOTED ON THE STRUCTURAL DRAWINGS.
6. EMBEDDED FLEXIBLE CONDUIT IS PERMITTED IN OTHER CAST IN PLACE CONCRETE SLABS WITH A THICKNESS GREATER OR EQUAL TO 5-1/2 INCHES. WHERE PERMITTED IT MAY BE PLACED ON TOP OF THE BOTTOM MAT OF REINFORCING. THE OUTSIDE DIAMETER OF THE CONDUIT SHALL NOT BE GREATER THAN 1-INCH. A MINIMUM OF 2-INCHES CLEAR SHALL BE PROVIDED BETWEEN CONDUIT AND PARALLEL REINFORCING. SPACE CONDUITS A MINIMUM OF 12-INCHES APART, WHERE THIS IS NOT POSSIBLE NOTIFY ENGINEER FOR ADDITIONAL REINFORCING REQUIREMENTS.

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NO.	DATE	REVISION
1	09-04-19	BID DOCUMENTS

Sheet Contents: STRUCTURAL NOTES

Project: HYDRAULIC ELEVATOR MODERNIZATION
USPS SEATTLE NDC
34301 NINTH AVENUE SOUTH, FEDERAL WAY, WASHINGTON

Designed By	MJL
Drawn By	SOG
Checked By	MJL
Date	09-04-19

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GENERAL NOTES , STRUCTURAL NOTES, CONTINUED FROM SHEET S1.0.

CONCRETE, CONTINUED:

CONCRETE CURING AND SEALING

CURING PROCEDURES SHALL COMMENCE IMMEDIATELY AFTER FINISHING CONCRETE TO MAINTAIN CONCRETE IN A MOIST CONDITION. VERIFY CURING AND/OR SEALING PRODUCTS ARE COMPATIBLE WITH FLOOR COVERINGS SHOWN ON THE ARCHITECTURAL DRAWINGS. FOLLOW ALL MANUFACTURER'S RECOMMENDATIONS. SLABS ARE DEFINED AS SLABS ON GRADE, CONCRETE ON METAL DECK, ELEVATED POST-TENSIONED OR MILD REINFORCED DECKS, AND TOPPING SLABS.

ITEM	CONCRETE CURING NOTES
SLABS EXPOSED TO EARTH OR WEATHER OR VEHICLE OR FORKLIFT	1, (3 OR 4 OR 5), 6
TRAFFIC INCLUDING LOADING DOCKS	1, (3 OR 4 OR 5)
ALL OTHER SLABS	2
FORMED SURFACES EXCLUDING FOUNDATIONS ALL OTHER CONCRETE, UNLESS NOTED OTHERWISE	NONE

CONCRETE CURING NOTES:

1. WHEN THE ESTIMATED EVAPORATION RATE IS GREATER THAN 0.2 PSF/HOUR PROVIDE A SPRAY APPLIED EVAPORATION RETARDER IMMEDIATELY AFTER CONCRETE PLACEMENT. THE EVAPORATION RATE MAY BE CALCULATED PER ACI 305 FIGURE 2.1.5.
2. APPLY A LIQUID MEMBRANE FORMING CURING COMPOUND, CONFORMING TO ASTM C309 TYPE 1 CLASS B SPECIFICATIONS, PER MANUFACTURER'S RECOMMENDATIONS TO ALL FORMED SURFACES IMMEDIATELY AFTER FINAL FORM REMOVAL. NOT REQUIRED IF FORMWORK REMAINS IN PLACE FOR MORE THAN 7 DAYS.
3. PROVIDE PRE-APPROVED CONTINUOUS WET CURE METHOD FOR A MINIMUM OF 14 DAYS.
4. APPLY A LIQUID MEMBRANE FORMING CURING COMPOUND, CONFORMING TO ASTM C309 TYPE 1 CLASS B SPECIFICATIONS OR ASTM C1315 TYPE 1 CLASS A SPECIFICATIONS, PER MANUFACTURER'S RECOMMENDATIONS IMMEDIATELY AFTER FINAL FINISHING. CURING COMPOUND SHALL BE COMPATIBLE WITH ARCHITECTURAL FLOOR COVERINGS AND SEALERS.
5. PROVIDE 'ULTRACURE MAX' MOISTURE RETAINING COVER BY MCTECH GROUP, OR APPROVED EQUAL, FOR A MINIMUM OF 14 DAYS.
6. APPLY A SILANE SEALER WITH MINIMUM SOLIDS CONTENT OF 40% PER MANUFACTURER'S RECOMMENDATIONS.

GROUT

NON-SHRINK GROUT:
PROVIDE MASTER BUILDERS "MASTERFLOW 555" OR PRE-APPROVED EQUAL. GROUT SHALL CONFORM TO CRD-C621 AND ASTM C1107 WHEN TESTED AT A FLUID CONSISTENCY PER CRD-C611-85 FOR 30 MINUTES. GROUT MAY BE PLACED FROM A 25 SECOND FLOW TO A STIFF PACKING CONSISTENCY. FILL OR PACK ENTIRE SPACE UNDER PLATES OR SHAPES. FOLLOW MANUFACTURER'S RECOMMENDATIONS FOR PREPARATION, INSTALLATION, AND CURING.

REINFORCING STEEL

REINFORCING STEEL SHALL CONFORM TO:

ASTM A615, GRADE 60 TYPICAL UNLESS NOTED OTHERWISE.
ASTM A706 GRADE 60 FOR ALL WELDED BARS.

DETAIL, FABRICATE AND PLACE PER ACI 315 AND ACI 318.

WELDED WIRE REINFORCEMENT SHALL CONFORM TO A185. LAP ONE FULL MESH ON SIDES AND ENDS BUT NOT LESS THAN 8 INCHES. WELDED WIRE REINFORCING SHALL BE SUPPORTED TO WITHSTAND CONCRETE PLACEMENT. PULLING OF MESH INTO PLACE AFTER PLACEMENT IS NOT ALLOWED.

REINFORCING SPLICE AND DEVELOPMENT LENGTH SCHEDULE, Fy=60 KSI (UNLESS NOTED OTHERWISE)

	MINIMUM LAP SPLICE LENGTHS ("Ls")		MINIMUM DEVELOPMENT LENGTHS ("Ld")		MINIMUM EMBEDMENT LENGTH FOR STANDARD END HOOKS ("Ldh")
BAR SIZE	TOP BARS (1)	OTHER BARS	TOP BARS (1)	OTHER BARS	
#3	2'-0"	1'-6"	1'-6"	1'-3"	0'-7"
#4	2'-8"	2'-0"	2'-0"	1'-7"	0'-9"
#5	3'-4"	2'-7"	2'-7"	2'-0"	1'-0"
#6	4'-0"	3'-1"	3'-1"	2'-4"	1'-2"
#7	5'-10"	4'-6"	4'-6"	3'-6"	1'-5"
#8	6'-8"	5'-2"	5'-2"	3'-11"	1'-7"

SPLICE TABLE NOTES:
1. "TOP BARS" ARE HORIZONTAL BARS WITH MORE THAN 12" DEPTH OF CONCRETE CAST BELOW THEM.

FORM SAVERS: PROVIDE "LENTON" BY ERICO THREADED FORM SAVERS TYPE FS OR APPROVED EQUAL.

REINFORCING STEEL COVER

PROVIDE CONCRETE COVER OVER REINFORCEMENT AS FOLLOWS, UNLESS NOTED OTHERWISE:

CONCRETE CAST AGAINST EARTH	3"
EXPOSED TO WEATHER OR EARTH	2"
TIES ON BEAMS AND COLUMNS	1-1/2"
WALLS AND SLABS NOT EXPOSED TO WEATHER	3/4"

ARCHITECTURAL PRECAST CONCRETE CLADDING PANELS: (IF USED)
PANEL SUPPLIER SHALL COORDINATE PANEL LOAD LOCATIONS AND MAGNITUDES INDUCED ON THE BUILDING STRUCTURE WITH THE STRUCTURAL ENGINEER FOR APPROVAL. DESIGN OF PANELS AND THEIR CONNECTIONS, INCLUDING EMBEDDED ITEMS IN THE STRUCTURE, SHALL COMPLY WITH ALL APPLICABLE CODES AND DESIGN CRITERIA LISTED IN THE GENERAL NOTES. SUPPLIER SHALL PROVIDE CALCULATIONS AND SHOP DRAWINGS SHOWING DETAILS OF THE PANELS, THEIR REINFORCING, AND THEIR CONNECTION TO THE BUILDING STRUCTURE FOR APPROVAL BY THE PROFESSIONAL ENGINEER AND THE LOCAL BUILDING OFFICIAL OR APPLICABLE JURISDICTION PRIOR TO FABRICATION. PANEL SHOP DRAWINGS AND CALCULATIONS SHALL BE PREPARED UNDER THE SUPERVISION OF, AND BE STAMPED BY, A REGISTERED PROFESSIONAL ENGINEER LICENSED AS SUCH IN THE STATE OF PROJECT.

POST-INSTALLED ANCHORS:
SHALL ONLY BE USED WHERE SPECIFIED ON THE CONSTRUCTION DOCUMENTS. THE CONTRACTOR SHALL OBTAIN APPROVAL FROM THE STRUCTURAL ENGINEER PRIOR TO INSTALLING POSTINSTALLED ANCHORS IN PLACE OF MISSING OR MISPLACED CAST-IN-PLACE ANCHORS. CARE SHALL BE TAKEN IN PLACING POST-INSTALLED ANCHORS TO AVOID CONFLICTS WITH REBAR. SUBSTITUTION REQUESTS, FOR PRODUCTS OTHER THAN THOSE SPECIFIED BELOW, SHALL BE SUBMITTED BY THE CONTRACTOR TO THE STRUCTURAL ENGINEER ALONG WITH CALCULATIONS THAT ARE PREPARED AND SEALED BY A REGISTERED PROFESSIONAL ENGINEER (LICENSED IN THE STATEOF WASHINGTON) DEMONSTRATING THAT THE SUBSTITUTED PRODUCT IS CAPABLE OF ACHIEVING EQUIVALENT PERFORMANCE VALUES (MINIMUM) OF THE SPECIFIED PRODUCT USING THE APPROPRIATE DESIGN PROCEDURE AND/OR STANDARD(S) AS REQUIRED BY THE BUILDING CODE. INSTALL IN ACCORDANCE WITH THE MANUFACTURER'S PUBLISHED INSTALLATION INSTRUCTIONS. INSTALLER SHALL BE QUALIFIED AND TRAINED BY THE MANUFACTURER. HOLES SHALL BE HAMMER DRILLED ONLY (ROTARY DRILLED ONLY AT UNREINFORCED MASONRY - NO HAMMER TOOLS).

CONCRETE ANCHORS:

- ADHESIVE ANCHORS: SIMPSON SET - XP (ICC ESR-2508) OR HILTI HIT-HY 200 (ICC-ESR-3187)
*CONCRETE SHALL BE A MINIMUM OF 21 DAYS OLD AT TIME OF INSTALLATION.
*CONCRETE SHALL BE IN THE TEMPERATURE RANGE AS REQUIRED BY THE CONCRETE MANUFACTURER.
*HOLE SHALL BY HAMMER-DRILLED ONLY.
*HOLE SHALL BE DRY AT TIME OF INSTALLATION.
*INSTALLER OF HORIZONTAL OR UPWARDLY INCLINED (ANY POSITION EXCEPT DIRECTLY DOWNWARD) ANCHORS SHALL ALSO BE CERTIFIED BY THE ACI/CRSI ADHESIVE ANCHOR INSTALLER CERTIFICATION PROGRAM.
- EXPANSION ANCHORS: KWIKBOLT TZ (ICC ESR-1917) BY HILTI, INC., OR STRONG-BOLT 2 (ICC ESR-3037) BY SIMPSON STRONG TIE, INC.

MASONRY ANCHORS (SOLID GROUTED MASONRY):

- ADHESIVE ANCHORS: HILTI HIT-HY 70 (ICC-ESR-2682) OR SIMPSON SET-XP (IAPMO ER-265)
- EXPANSION ANCHORS: KWIKBOLT III (ICC ESR-1385) BY HILTI, INC., OR STRONG-BOLT 2 (IAPMO ER-240) BY SIMPSON STRONG TIE, INC.
-

MASONRY ANCHORS (HOLLOW MASONRY):

- ADHESIVE ANCHORS: HILTI HIT-HY 70 WITH SCREEN TUBES (ICC-ESR-2682 & ICC-ESR-3342) BY HILTI, INC. USING THE APPROPRIATE SIZE SCREEN TUBE REQUIRED BY THE MANUFACTURER.

MASONRY

MORTAR:
1. GENERAL: CONFORM TO ASTM C270.
2. TYPE: "S" PER IBC. CONFORM TO ASTM C270. MINIMUM COMPRESSIVE STRENGTH: F' M=1800 PSI AT (28) DAYS.

GROUT:
1. GENERAL: CONFORM TO ASTM C476 & ACI 531.1. SHALL BE FLUID CONSISTENCY FOR POURING.
2. COMPRESSIVE STRENGTH: F'C=2000 PSI AT (28) DAYS.
3. CMU CONSTRUCTION SHALL BE SOLID GROUTED UNLESS SPECIFICALLY NOTED OTHERWISE.

REINFORCEMENT:

ALL REINFORCING SHALL BE ASTM A615 GRADE 60 EXCEPT AS SHOWN ON THE PLANS.

CONCRETE MASONRY UNITS (CMU):

1. GENERAL: MINIMUM FACE SHELL THICKNESS SHALL BE 1 1/2 INCHES.
2. MANUFACTURER: MUTUAL MATERIALS, INC., OR EQUAL.
3. COMPRESSIVE STRENGTH: F'M = 1800 PSI, MINIMUM.
4. SIZE: AS NOTED ON DRAWINGS.
5. GRADE: "N".
6. TEXTURE: SMOOTH.

INSTALLATION OF HOLLOW UNIT MASONRY:

INSTALL PER THE IBC SECTION 2104 FOR REINFORCED HOLLOW UNIT MASONRY.

SPECIAL INSPECTION:

SPECIAL INSPECTION SHALL ONLY BE REQUIRED IN AREAS DESIGNATED ON THE DRAWINGS, OR AS REQUIRED BY SECTION 1704 PER THE IBC. SEE SCHEDULE OF SPECIAL INSPECTIONS.

STRUCTURAL STEEL

DETAILING, FABRICATION AND ERECTION

DETAILING, FABRICATION AND ERECTION ALL WORKMANSHIP SHALL CONFORM TO THE 2015 INTERNATIONAL BUILDING CODE, CHAPTER 22, AISC MANUAL OF STEEL CONSTRUCTION, 14TH EDITION, THE AISC SPECIFICATION FOR STRUCTURAL STEEL BUILDINGS JUNE 22, 2010, THE AISC CODE OF STANDARD PRACTICE, APRIL 14, 2010 AND THE AISC SEISMIC PROVISIONS FOR STRUCTURAL STEEL BUILDINGS, JUNE 22, 2010. STEEL MEMBERS ARE EQUALLY SPACED BETWEEN COLUMNS AND/OR DIMENSION POINTS UNLESS NOTED OTHERWISE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ALL ERECTION AIDES AND JOINT PREPARATIONS THAT INCLUDE BUT ARE NOT LIMITED TO, ERECTION ANGLES, LIFT HOLES, AND OTHER AIDES, WELDING PROCEDURES, REQUIRED ROOT OPENINGS, ROOT FACE DIMENSIONS, GROOVE ANGLES, BACKING BARS, WELD EXTENSION TABS, COPES, SURFACE ROUGHNESS VALUES AND TAPERS OF UNEQUAL PARTS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE COMPLIANCE WITH ALL CURRENT OSHA REQUIREMENTS.

HOLES, COPES OR OTHER CUTS OR MODIFICATIONS OF THE STRUCTURAL STEEL MEMBERS SHALL NOT BE MADE IN THE FIELD WITHOUT WRITTEN APPROVAL FROM THE STRUCTURAL ENGINEER.

STEEL FABRICATORS

ALL STEEL FABRICATION SHALL BE PERFORMED BY A FABRICATOR CERTIFIED BY THE AMERICAN INSTITUTE OF STEEL CONSTRUCTION. THE FABRICATOR SHALL BE DESIGNATED AN AISC CERTIFIED PLANT, CATEGORY STD AT THE TIME OF BID AND SHALL MAINTAIN THIS CERTIFICATION FOR THE DURATION OF THE PROJECT. NON-AISC CERTIFIED STEEL FABRICATORS SHALL HAVE FIVE YEARS MINIMUM EXPERIENCE ON SIMILAR PROJECTS OF EQUAL OR LARGER COMPLEXITY AND SCOPE. QUALIFICATIONS SHALL BE SUBMITTED TWO WEEKS PRIOR TO BID.

STEEL ERECTORS

ALL STEEL ERECTION SHALL BE PERFORMED BY AN ERECTOR CERTIFIED BY THE AMERICAN INSTITUTE OF STEEL CONSTRUCTION. THE ERECTOR SHALL BE DESIGNATED AN AISC CERTIFIED ERECTOR, CATEGORY CSE AT THE TIME OF BID AND SHALL MAINTAIN THIS CERTIFICATION FOR THE DURATION OF THE PROJECT. NON-AISC CERTIFIED STEEL ERECTORS SHALL HAVE FIVE YEARS MINIMUM EXPERIENCE ON SIMILAR PROJECTS OF EQUAL OR LARGER COMPLEXITY AND SCOPE. QUALIFICATIONS SHALL BE SUBMITTED TWO WEEKS PRIOR TO BID.

STEEL DETAILERS

ALL STEEL DETAILING SHALL BE PERFORMED BY A DETAILER WITH FIVE YEARS MINIMUM EXPERIENCE ON SIMILAR PROJECTS OF EQUAL OR LARGER COMPLEXITY AND SCOPE. QUALIFICATIONS SHALL BE SUBMITTED TWO WEEKS PRIOR TO BID.

MATERIAL PROPERTIES

WIDE FLANGE SECTIONS:	ASTM A992 (Fy = 50 KSI)
OTHER SHAPES AND PLATES:	ASTM A36 (Fy = 36 KSI) TYP. U.N.O.
HOLLOW STRUCTURAL SECTIONS:	
RECTANGULAR & SQUARE :	ASTM A500 GRADE B (Fy = 46 KSI)
ROUND :	ASTM A500 GRADE B (Fy = 42 KSI)
STRUCTURAL STEEL PIPES:	ASTM A53, GRADE B, TYPE E OR S (Fy = 35 KSI)
MACHINE BOLTS (M.B.):	ASTM A307, GRADE A
HIGH-STRENGTH BOLTS:	A325-ASTM F1852, A490-ASTM F2280
ANCHOR BOLTS (A.B.):	ASTM F1554, GRADE 36, UNLESS OTHERWISE NOTED.

WELDING

STRUCTURAL STEEL: WELD IN ACCORDANCE WITH "STRUCTURAL WELDING CODE" AWS D1.1. LATEST EDITION.

REINFORCING STEEL: WELD IN ACCORDANCE WITH "REINFORCING STEEL WELDING CODE" AWS D1.4. LATEST EDITION.
WELD ONLY WITH SPECIFIC APPROVAL OF THE STRUCTURAL ENGINEER. IN NO CASE SHALL A WELD BE MADE WITHIN 6 BAR DIAMETERS OF A "COLD BEND".

CERTIFICATION: ALL WELDING SHALL BE PERFORMED BY WABQ/AWS CERTIFIED WELDERS. WELDERS SHALL BE PREQUALIFIED FOR EACH POSITION AND WELD TYPE WHICH THE WELDER WILL BE PERFORMING. WELD TABS (ALSO KNOWN AS WELD "EXTENSION" TABS OR "RUN OFF" TABS) SHALL BE USED. AFTER THE WELD HAS BEEN COMPLETED THE WELD TABS SHALL BE REMOVED AND THE WELD END GROUND TO A SMOOTH CONTOUR. WELD "DAMS" OR "END DAMS" SHALL NOT BE USED.

THE PROCESS CONSUMABLES FOR ALL WELD FILLER METAL INCLUDING TACK WELDS, ROOT PASS AND SUBSEQUENT PASSES DEPOSITED IN A JOINT SHALL BE COMPATIBLE.

GRAVITY(NON-SEISMIC OR LATERAL) FRAMING:

WELD TYPE	FILLER METAL TENSILE STRENGTH	CHARPY V-NOTCH (CVN) RATING
FILLET	70 KSI	-
PARTIAL PENETRATION	70 KSI	-
COMPLETE PENETRATION	70 KS	I20 FT-LBS @ -20 DEG F

WELDED CONNECTIONS INSPECTION:

1. ALL WELDING SHALL BE CHECKED BY VISUAL MEANS AND BY OTHER METHODS DEEMED NECESSARY BY THE WELDING INSPECTOR.
2. ALL FULL PENETRATION WELDS TO MEMBERS WHICH FORM A PORTION OF THE LATERAL LOAD RESISTING FRAME SHALL BE CHECKED 100 PERCENT BY ULTRASONIC TESTING.
3. THE CONTRACTOR SHALL SUBMIT A WRITTEN WELDING PROCEDURE SPECIFICATION FOR SHOP AND FIELD WELDING OF ALL LATERAL LOAD RESISTING FRAME CONNECTIONS FOR APPROVAL TO THE STRUCTURAL ENGINEER OF RECORD PRIOR TO FABRICATION.

THE STANDARDS OF ACCEPTANCE FOR WELDS TESTED BY ULTRASONIC METHODS SHALL CONFORM TO AWS D1.1.

ALL WELDS FOUND TO BE DEFECTIVE SHALL BE REPAIRED AND REINSPECTED BY THE SAME METHODS ORIGINALLY USED, AND THIS REPAIR AND REINSPECTION SHALL BE PAID FOR BY THE CONTRACTOR.

STEEL GENERAL REQUIREMENTS

HIGH-STRENGTH BOLTS:

ALL A325 HIGH-STRENGTH BOLTS (HSB) SHALL BE ASTM F1852, UNLESS OTHERWISE DESIGNATED AS A490. ALL HSB DESIGNATED AS A490 SHALL BE ASTM F2280. ALL HSB SHALL BE BY "LEJEUNE BOLT COMPANY" OR PRE-APPROVED EQUAL AND SHALL BE INSTALLED PER SECTION 8.2 OF THE "SPECIFICATION FOR STRUCTURAL JOINTS USING ASTM A325 OR A490 BOLTS", JUNE 2004 BY THE RESEARCH COUNCIL ON STRUCTURAL CONNECTIONS (RCSC SPECIFICATION). ALL BOLT HOLES SHALL BE STANDARD ROUND HOLES UNLESS NOTED OTHERWISE. THE FAYING SURFACES OF ALL PLIES WITHIN THE GRIP OF SLIP-CRITICAL BOLTS (A325SC OR A490SC) SHALL MEET THE REQUIREMENTS FOR A CLASS A SURFACE PER SECTION 3.2 OF THE RCSC SPECIFICATION.

BOLTED CONNECTIONS INSPECTION:

CONNECTIONS MADE WITH BEARING TYPE BOLTS SHALL BE INSPECTED PER SECTION 9.1 AND CONNECTIONS MADE WITH SLIP-CRITICAL TYPE BOLTS (A325SC OR A490SC) SHALL BE INSPECTED PER SECTION 9.3 OF RCSC SPECIFICATION.

EPOXY GROUTED ANCHORS: "ALL-THREAD" - ASTM A36 (FY = 36 KSI) UNLESS NOTED OTHERWISE.

HEADED STUDS:

SHALL BE "H4L HEADED CONCRETE ANCHORS" FOR STUDS 5/8" DIAMETER AND SMALLER AND "S3L SHEAR CONNECTORS" FOR STUDS 3/4" DIAMETER AND LARGER AS MANUFACTURED BY NELSON STUD WELDING, INC. OR PRE-APPROVED EQUAL AND SHALL CONFORM TO AWS D1.1. ALL HEADED STUDS SHALL BE INSTALLED PER MANUFACTURER'S RECOMMENDATIONS USING A NELSON WELD GUN, UNLESS NOTED OTHERWISE ON DETAILS. ALL WELDS SHALL BE MADE AND INSPECTED IN ACCORDANCE WITH AWS D1.1.

FINISH:

STRUCTURAL STEEL SHALL BE PRIMED, UNLESS NOTED OTHERWISE, AND SHALL BE CLEAN OF LOOSE RUST, LOOSE MILL SCALE, OIL, GREASE AND OTHER FOREIGN SUBSTANCES AND SHALL MEET THE REQUIREMENTS OF SSPC-SP1. WHERE STRUCTURAL STEEL IS NOTED TO BE PAINTED, ALL AREAS COMPRISING THE FAYING SURFACES OF BOLTED CONNECTIONS MADE WITH SLIP-CRITICAL TYPE BOLTS (A325SC OR A490SC) SHALL COMPLY WITH THE REQUIREMENTS OF THE RCSC SPECIFICATION. WHERE STRUCTURAL STEEL IS NOTED TO BE GALVANIZED, IT SHALL BE HOT-DIP GALVANIZED IN ACCORDANCE WITH ASTM A153, A384, AND A385. ALL SURFACES WITHIN TWO INCHES OF ANY FIELD WELD LOCATION SHALL BE FREE OF MATERIALS THAT WOULD PREVENT PROPER WELDING OR PRODUCE OBJECTIONABLE FUMES. FIELD TOUCH-UP OF PRIMED, PAINTED, AND GALVANIZED SURFACES SHALL BE PERFORMED
TO REPAIR COATING ABRASIONS, AS WELL AS TO PROTECT ALL AREAS AT CONNECTIONS.

METAL JOISTS: (IF CALLED ON PLANS)

SHALL BE MANUFACTURED BY CANAM STEEL CORPORATION, VULCRAFT A DIVISION OF NUCOR CORPORATION OR PRE-APPROVED EQUAL, AND SHALL CONFORM TO THE STEEL JOIST INSTITUTE (SJI) AND AMERICAN INSTITUTE OF STEEL CONSTRUCTION (AISC) STANDARDS AND CRITERIA LISTED IN THE CONTRACT DOCUMENTS AND SHALL BE DESIGNED TO CARRY THE LOADS LISTED IN THE DESIGN CRITERION AND THOSE INDICATED ON THE FRAMING PLANS. JOIST MANUFACTURER SHALL VERIFY AND INCLUDE FIRE RATING STRESS REDUCTIONS AND SIZE LIMITATIONS IN ORDER TO CONFORM TO THE ASSEMBLY REQUIREMENTS AS SHOWN ON THE ARCHITECTURAL DRAWINGS. AT A MINIMUM PROVIDE BRACING TO WITHSTAND A NET WIND UPLIFT OF 7 PSF AND/OR 12 PSF WITHIN 10' OF ALL RIDGES, EAVES, ENDWALLS AND ROOF STEPS. FOR OTHER SPECIAL REQUIREMENTS, SEE STRUCTURAL DRAWINGS. ALL LOADS INDICATED ON THE FRAMING PLANS THAT ARE NOT DIMENSIONED ARE TO BE DESIGNATED AS ADLOADS BY THE METAL JOIST MANUFACTURER. JOISTS SHALL BE DESIGNED AND DETAILED TO MEET ALL CURRENT OSHA STANDARDS. THE GENERAL CONTRACTOR SHALL COORDINATE ALL OSHA REQUIREMENTS BETWEEN THE STEEL DETAILER AND JOIST MANUFACTURER. SEE ADDITIONAL INFORMATION IN THE STRUCTURAL STEEL "DETAILING, FABRICATION, AND ERECTION" SECTION. THE ENGINEER OF RECORD FOR THE METAL JOIST DESIGN SHALL HAVE A MINIMUM OF (5) YEARS EXPERIENCE IN THE DESIGN OF METAL JOISTS OF SIMILAR SIZE PROJECTS AND BE LICENSED AS A PROFESSIONAL ENGINEER IN THE STATE OF PROJECT. THE ENGINEER OF RECORD FOR THE JOIST DESIGN SHALL SUBMIT A STAMPED LETTER OF COMPLIANCE INDICATING YEARS OF EXPERIENCE. THE LETTER SHALL ALSO STATE THAT THEY HAVE REVIEWED THE JOIST PLACEMENT DRAWINGS AND BILLS OF MATERIAL FOR COMPLIANCE WITH THE CONTRACT DOCUMENTS, ALONG WITH VERIFICATION THAT THE JOISTS CONFORM TO THE DESIGN CRITERIA AND ADDITIONAL LOADING REQUIREMENTS LISTED IN THE CONTRACT DOCUMENTS (INCLUDING BUT NOT LIMITED TO WIND UPLIFT, JOIST AXIAL LOADS AND MECHANICAL UNIT LOADING).

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NO.	DATE	REVISION
1	09-04-19	BID DOCUMENTS

Sheet Contents
STRUCTURAL NOTES

Project
HYDRAULIC ELEVATOR MODERNIZATION
USPS SEATTLE NDC
34301 NINTH AVENUE SOUTH, FEDERAL WAY, WASHINGTON

Designed By: MJL
Drawn By: SOG
Checked By: MJL
Date: 09-04-19

MARK J. LEJEUNE — STATE OF WASHINGTON — 23424 — REGISTERED PROFESSIONAL ENGINEER
09-04-19

Project Number: 19031

Sheet Number: S1.1
3 of 6

IF SHEET MEASURES LESS THAN 22"X34" IT IS A REDUCED PRINT. REDUCE SCALE ACCORDINGLY.

GENERAL NOTES , STRUCTURAL NOTES, CONTINUED FROM SHEETS S1.0 AND S1.1.

CARPENTRY:

GENERAL REQUIREMENTS:

PROVIDE MINIMUM NAILING PER IBC TABLE 2304.9.1 OR MORE, AS OTHERWISE SHOWN. STAGGER ALL NAILING TO PREVENT SPLITTING OF WOOD MEMBERS. ALL WOOD IN CONTACT WITH CONCRETE OR MASONRY SHALL BE PRESERVATIVE TREATED WITH THE EXCEPTION OF INTERIOR CONCRETE TOPPINGS ON WOOD FLOOR SYSTEMS. HOLES AND CUTS IN 3x OR 4x PLATES SHOULD BE TREATED WITH A 9% SOLUTION OF COPPER NAPHTHENATE. BOLT HOLES IN WOOD MEMBERS SHALL BE A MINIMUM OF 1/32" TO A MAXIMUM OF 1/16" LARGER THAN THE BOLT DIAMETER. PROVIDE CUT WASHERS WHERE BOLT HEADS, NUTS AND LAG SCREW HEADS BEAR ON WOOD. PROVIDE A MINIMUM 3"x3"x0.229" PLATE WASHER ON ALL ANCHOR BOLTS WHICH CONNECT MUD SILLS TO FOUNDATION. DO NOT NOTCH OR DRILL STRUCTURAL MEMBERS, EXCEPT AS ALLOWED BY IBC SECTIONS 2308.9.10, 2308.9.11, AND 2308.10.4.2 OR AS RESTRICTED BY PLANS OR DETAILS, OR AS APPROVED PRIOR TO INSTALLATION. REFER TO PRESERVATIVE TREATED WOOD REQUIREMENTS IN THESE GENERAL NOTES FOR GALVANIZING REQUIREMENTS FOR CONNECTORS AND FASTENERS.

FRAMING CONNECTORS:
SHALL CONFORM TO CURRENT EVALUATION REPORT AND BE MANUFACTURED BY SIMPSON STRONG-TIE COMPANY, SAN LEANDRO, CA., OR PRE-APPROVED EQUAL. PROVIDE MAXIMUM SIZE AND QUANTITY OF NAILS OR BOLTS PER MANUFACTURER, EXCEPT AS NOTED OTHERWISE. PROVIDE LEAD HOLES AS REQUIRED TO PREVENT SPLITTING OF WOOD MEMBERS. REFER TO PRESERVATIVE TREATED WOOD REQUIREMENTS IN THESE GENERAL NOTES FOR GALVANIZING REQUIREMENTS FOR CONNECTORS AND FASTENERS.

LAG SCREWS:
SHALL CONFORM TO ANSI/ASME STANDARD B18.2.1. LAG SCREWS SHALL BE OF A DIAMETER INDICATED ON DRAWINGS WITH A MINIMUM OF 8x DIA. EMBEDMENT IN SUPPORTING MEMBER UNLESS NOTED OTHERWISE. CLEARANCE HOLE FOR THE SHANK SHALL BE THE SAME DIAMETER AS THE SHANK AND THE SAME DEPTH OF PENETRATION AS THE UNTHREADED PORTION OF THE SHANK. THE LEAD HOLE FOR THE THREADED PORTION SHALL HAVE A DIAMETER EQUAL TO 60 TO 75 PERCENT OF THE SHANK DIAMETER AND A LENGTH EQUAL TO AT LEAST THE LENGTH OF THE THREADED PORTION. THE THREADED PORTION OF THE SCREW SHALL BE INSERTED IN ITS LEAD HOLE BY TURNING WITH A WRENCH. SOAP OR OTHER LUBRICANT SHALL BE USED ON THE SCREWS OR IN THE LEAD HOLE TO FACILITATE INSERTION AND PREVENT DAMAGE TO THE SCREW. LAG SCREWS SHALL NOT BE DRIVEN WITH A HAMMER.

REFER TO PRESERVATIVE TREATED WOOD REQUIREMENTS IN THESE GENERAL NOTES FOR GALVANIZING
REQUIREMENTS FOR CONNECTORS AND FASTENERS.

OPEN-WEB TRUSSES AND I-JOISTS: (IF CALLED ON PLANS)

SHALL BE MANUFACTURED BY BOISE CASCADE, LOUISIANA PACIFIC, REDBUILT LLC, TRUS-JOIST, OR PRE-APPROVED EQUAL IN ACCORDANCE WITH APPROVED SHOP AND INSTALLATION DRAWINGS. MEMBERS SHALL BE DESIGNED UNDER THE DIRECT SUPERVISION OF A PROFESSIONAL ENGINEER LICENSED IN THE STATE OF PROJECT. THE ENTIRE OPENWEB TRUSS/I-JOIST ASSEMBLY SHALL BE AS APPROVED BY CURRENT EVALUATION REPORT. MEMBERS SHALL BE DESIGNED TO CARRY THE LOADS LISTED IN THE DESIGN CRITERION AND ANY ADDITIONAL LOADS INDICATED ON THE FRAMING PLANS AND DETAILS. THE TRUSS ENGINEER SHALL ASSUME ALL RESPONSIBILITY FOR THE WORK OF ALL SUBORDINATES INVOLVED IN THE PREPARATION OF THE TRUSS PLACEMENT PLANS AND TRUSS DESIGN DRAWINGS. TRUSSES/I-JOISTS SHALL BE PROVIDED TO COMPLETE THE ROOF AND/OR FLOOR FRAMING FROM THE SHEATHING TO THE SUPPORTING MEMBERS BELOW. MEMBER DESIGNATIONS ON PLANS ARE FOR TYPICAL UNIFORMLY LOADED CONDITIONS. MANUFACTURER SHALL PROVIDE ADDITIONAL MEMBERS AS REQUIRED TO SUPPORT SPECIAL LOADING CONDITIONS INDICATED ON DRAWINGS. TOP CHORD AT STRAP CONNECTIONS TO CONCRETE OR MASONRY WALLS SHALL BE COMPOSED OF A STRUCTURAL COMPOSITE LUMBER MEMBER APPROVED BY A CURRENT EVALUATION REPORT FOR SUCH A USE OR AT CONTRACTORS OPTION, STRAP NAIL HOLES SHALL BE PRE-DRILLED IN CHORD. PROVIDE SHOP AND INSTALLATION DRAWINGS AND CALCULATIONS PRODUCED UNDER THE SUPERVISION OF AND BEARING THE STAMP OF A PROFESSIONAL ENGINEER REGISTERED IN THE STATE OF WASHINGTON.

DETAIL DRAWINGS TO INDICATE MEMBER TYPES, SIZE, SPACING, BRIDGING, BLOCKING, CONNECTIONS, ANCHORING, BEARING PLATE AND OTHER PERTINENT DETAILS. PROVIDE 1 1/2" DIA. OPEN KNOCKOUTS AT 12" O.C. ON ALL ROOF I-JOISTS.

MEMBER DESIGN CALCULATIONS SHALL BE PROVIDED FOR STANDARD LOADING ALONG WITH DESIGN CHECKS FOR SPECIAL LOADING CONDITIONS WHICH INCLUDE FREE BODY DIAGRAMS, LOADING BREAK DOWN, DESCRIPTION OF LOADS (I.E. MECH UNIT, SUSPENDED WALL, ETC.) AND THE RATIONALE FOR LOADING DISTRIBUTION ON MULTIPLE MEMBERS. SUBMITTAL SHALL ALSO PROVIDE ANY DOCUMENTATION NECESSARY TO INTERPRET DATA INDICATED ON CALCULATIONS.

MEMBERS HAVE BEEN DESIGNED TO MEET SERVICEABILITY AND OTHER PERFORMANCE BASED REQUIREMENTS, WHICH MAY EXCEED MINIMUM DESIGN LOADS AND CODE REQUIREMENTS. SUBSTITUTIONS MUST MEET OR EXCEED MOMENT, SHEAR, AND STIFFNESS OF THOSE MEMBERS SPECIFIED AT THE SAME DEPTH AND SPACING. REFER TO THE FRAMING CONNECTORS SECTION OF THESE GENERAL NOTES FOR REQUIREMENTS PLACED UPON CONNECTOR HARDWARE SPECIFIED BY TRUSS ENGINEER AND/OR PROVIDED BY TRUSS MANUFACTURER.

SPRINKLER LINE ATTACHMENTS SHALL CONFORM TO NFPA PAMPHLET 13 AND COMMERCIAL PUBLICATION "SPRINKLER SYSTEM INSTALLATION WITH GUIDELINES FOR REDBUILT OPEN-WEB TRUSSES AND I-JOISTS". LOADS HUNG FROM JOIST NOT SPECIFICALLY IDENTIFIED ON STRUCTURAL DRAWINGS SHALL NOT EXCEED 30 POUNDS AT ANY ONE POINT, NOR SHALL TOTAL LOADS IN POUNDS ON ANY ONE JOIST EXCEED 8 TIMES THE JOIST SPAN IN FEET, UNLESS DETAILED OTHERWISE ON THE DRAWINGS. ATTACHMENT OF LOADS EXCEEDING 90 POUNDS SHALL BE APPROVED PRIOR TO INSTALLATION. DO NOT NOTCH OR DRILL THRU TRUSS MEMBERS.

METAL PLATE CONNECTED WOOD TRUSSES:

SHALL BE MANUFACTURED BY AN APPROVED TRUSS MANUFACTURER IN ACCORDANCE WITH APPROVED SHOP AND INSTALLATION DRAWINGS. TRUSS CALCULATION PACKAGE SHALL BE DESIGNED UNDER THE DIRECT SUPERVISION OF A PROFESSIONAL ENGINEER LICENSED IN THE STATE OF PROJECT PER IBC SECTION 2303.4 TO CARRY THE LOADS LISTED IN THE DESIGN CRITERION AND ANY ADDITIONAL LOADS INDICATED ON THE FRAMING PLANS AND DETAILS. THE TRUSS ENGINEER SHALL ASSUME ALL RESPONSIBILITY FOR THE WORK OF ALL SUBORDINATES INVOLVED IN THE PREPARATION OF THE TRUSS PLACEMENT PLANS AND TRUSS DESIGN DRAWINGS. ALL ROOF TRUSSES ARE TO BE PRE-ENGINEERED. ROOF TRUSSES SHALL BE PROVIDED TO COMPLETE THE ROOF FRAMING FROM THE ROOF SHEATHING TO THE SUPPORTING MEMBERS BELOW. TRUSSES DESIGNATED ON PLANS ARE FOR TYPICAL UNIFORMLY LOADED CONDITIONS. TRUSS ENGINEER SHALL PROVIDE ADDITIONAL TRUSSES AS REQUIRED TO SUPPORT SPECIAL LOADING CONDITIONS INDICATED ON DRAWINGS. PROVIDE SHOP AND INSTALLATION DRAWINGS AND CALCULATIONS PRODUCED UNDER THE SUPERVISION OF AND BEARING THE STAMP OF A PROFESSIONAL ENGINEER REGISTERED IN THE STATE OF PROJECT. DETAIL DRAWINGS TO INDICATE ALL INFORMATION AS REQUIRED IN IBC SECTION 2303.4.1. ALONG WITH THE FOLLOWING:

*KEY PLAN SHOWING EACH TRUSS
*INDIVIDUAL TRUSS DESIGNS
*PERMANENT BRACING REQUIREMENTS INCLUDING PLACEMENT AND CONNECTIONS DETAILS
*TRUSS DRAWINGS SHALL SPECIFY ALL TRUSS CONNECTIONS/HARDWARE TO MEET THE
REQUIREMENTS OF THE PLAN.

TRUSS DESIGN CALCULATIONS SHALL BE PROVIDED FOR STANDARD LOADING ALONG WITH DESIGN CHECKS FOR SPECIAL LOADING CONDITIONS WHICH INCLUDE FREE BODY DIAGRAMS, LOADING BREAK DOWN, DESCRIPTION OF LOADS (I.E. MECH UNIT, SUSPENDED WALL, ETC.) AND THE RATIONALE FOR LOADING DISTRIBUTION ON MULTIPLE MEMBERS. SUBMITTAL SHALL ALSO PROVIDE ANY DOCUMENTATION NECESSARY TO INTERPRET DATA INDICATED ON CALCULATIONS.

REFER TO THE FRAMING CONNECTORS SECTION OF THESE GENERAL NOTES FOR REQUIREMENTS PLACED UPON CONNECTOR HARDWARE SPECIFIED BY TRUSS ENGINEER AND/OR PROVIDED BY TRUSS MANUFACTURER.

PROVIDE CERTIFICATE OF CONFORMANCE FROM AN INDEPENDENT TESTING LABORATORY OR A LICENSED PROFESSIONAL ENGINEER CERTIFYING THAT THEY HAVE INSPECTED THE FINISHED TRUSSES AND THAT ALL TRUSSES ARE CONSTRUCTED IN CONFORMANCE WITH THE TRUSS DESIGN DRAWINGS.

NAILS:

CONNECTION DESIGNS ARE BASED ON "COMMON WIRE" NAILS WITH THE FOLLOWING PROPERTIES:

PENNYWEIGHT	DIAMETER (INCHES)	LENGTH (INCHES)	TRACKER** EMBOSSED HEAD / COLOR
8d	0.131	2-1/2	3 / BLUE
10d	0.148	3	4 / WHITE
16d	0.162	3-1/2	6 / ORANGE
20d	0.192	4	-

FOR DIAPHRAGM OR SHEAR WALL NAILING THE FOLLOWING FASTENER TYPES MUST BE USED AS SPECIFIED ON PLANS AND NOTES:

FASTENER TYPE	DIAMETER(INCHES)	LENGTH (INCHES)	TRACKER** EMBOSSED HEAD / COLOR
8d COMMON	0.131	2-1/2	3/ BLUE
10d COMMON	0.148	3	4 / WHITE

*BASED ON 15/32" PLYWOOD OR 7/16" OSB.
**REFERENCE TO EMBOSSED HEAD / COLOR CODED NAILS PER TRACKERS SYSTEM OR PRE-APPROVED EQUAL.

WOOD SHEATHING (RATED):

SHEATHING ON ROOF SURFACES SHALL BE PLYWOOD ONLY. SHEATHING ON FLOOR AND WALLS SHALL BE PLYWOOD OR ORIENTED STRAND BOARD (OSB). PLYWOOD SHEATHING SHALL BE 5-PLY MINIMUM WHERE INDICATED AS PERFORMANCE CATEGORY 3/4" OR THICKER. WOOD SHEATHING SHALL BE "RATED" CONFORMING TO PS1-09 AND/OR PS2-10. ALL PANELS SHALL BEAR THE STAMP OF AN APPROVED GRADING AGENCY. SPAN RATING SHALL BE PROVIDED AS FOLLOWS:
ROOF FRAMING AT 32"O.C. (48/24);
ROOF FRAMING AT 24"O.C. (32/16);
WALLS (32/16);
FLOORS (48/24)

ALL WOOD SHEATHED WALLS SHALL BE BLOCKED AT ALL PANEL EDGES UNLESS NOTED OTHERWISE.

GLUE-LAMINATED MEMBERS:
CONFORM TO ANSI/AITC A190.1. MEMBERS SHALL BE COMBINATION 24F-V4 DOUGLAS FIR (DF) FOR SIMPLE SPANS AND 24F-V8 DF FOR CANTILEVERED SPANS (Fb=2400 PSI, Fv=265 PSI, E= 1.8X10^6 PSI) AND DF COMBINATION 2 FOR COLUMNS.

MEMBERS INDICATED IN STRUCTURAL DRAWINGS AS "PPT" SHALL BE PRESERVATIVE PRESSURE TREATED COMBINATION 24F-V5 SOUTHERN PINE (SP) (Fb=2400 PSI, Fv=300 PSI, E=1.7X10^6 PSI) AND SP COMBINATION 2 FOR COLUMNS.

ARCHITECTURAL APPEARANCE GRADE WHERE EXPOSED TO VIEW; INDUSTRIAL APPEARANCE WHERE NOT EXPOSED TO VIEW. ALL MEMBERS TO HAVE EXTERIOR GLUE AND HAVE AN APPROVED GRADE STAMP.

CAMBER AS SHOWN ON STRUCTURAL DRAWINGS.

FRAMING LUMBER:

STANDARDS. EACH PIECE SHALL BEAR THE GRADE TRADEMARK OF THE WEST COAST LUMBER INSPECTION BUREAU (WCLIB), WESTERN WOOD PRODUCTS ASSOCIATION (WWPA), OR OTHER AGENCY ACCREDITED BY THE AMERICAN LUMBER STANDARD COMMITTEE (ALSC) TO GRADE UNDER ALSC CERTIFIED GRADING RULES.

SPECIES AND GRADE (BASE DESIGN VALUE)

1. 6x BEAMS AND HEADERS. "DOUG FIR-LARCH" NO. 1 (Fb=1350 PSI, Fv=170 PSI)
2. 2x TO 4x JOISTS, PURLINS AND HEADERS. "DOUG FIR-LARCH" NO. 2 (Fb=900 PSI, Fv=180 PSI) OR "HEM-FIR" NO. 1, (Fb=975 PSI, Fv=150 PSI)
3. 6x POSTS AND COLUMNS. "DOUG FIR-LARCH" NO. 1 (Fc=1000 PSI)
4. EXTERIOR STUDS, INTERIOR BEARING WALLS AND 4x COLUMNS. "DOUG FIR-LARCH" NO. 2 (Fb= 900 PSI, Fc= 1350 PSI) OR "HEM-FIR" NO. 1 (Fb=975 PSI, Fc=1350 PSI).
5. INTERIOR NON-BEARING STUD WALLS. "DOUG FIR-LARCH" NO. 2 (Fb=900 PSI. Fc=1350 PSI) OR "HEM-FIR" NO. 1 (Fb=975 PSI, Fc=1350 PSI)
6. 2x & 3x T&G DECKING: "DOUG FIR-LARCH" COMMERCIAL (Fb=1450 PSI, E=1700 KSI)
7. THE MINIMUM GRADE OF ALL OTHER STRUCTURAL FRAMING. "DOUG FIR-LARCH" NO. 2 (Fb= 900 PSI, Fc=1350 PSI), OR "HEM-FIR" NO. 1 (Fb=975 PSI, Fc=1350 PSI).
8. UTILITY & STANDARD GRADES NOT PERMITTED.

STRUCTURAL COMPOSITE LUMBER (SCL):

STRUCTURAL COMPOSITE LUMBER (SCL) SHALL BE MANUFACTURED BY BOISE CASCADE, OR PRE-APPROVED EQUAL IN ACCORDANCE WITH APPROVED SHOP AND INSTALLATION DRAWINGS CONFORMING TO A CURRENT EVALUATION REPORT.

MINIMUM DESIGN VALUES:

1. 2x SCL: Fb = 1700 PSI, Fv = 285 PSI, E = 1300 KSI
2. 1-3/4" SCL: Fb = 2600 PSI, Fv = 285 PSI, E = 1800 KSI
3. 3-1/2" SCL: Fb = 2900 PSI, Fv = 285 PSI, E = 2000 KSI
4. 5-1/4" SCL: Fb = 2900 PSI, Fv = 285 PSI, E = 2000 KSI
5. RIMBOARD: APA/EWS PERFORMANCE RATED RIM (PRR-401) 1-1/4" MINIMUM THICKNESS

MEMBERS HAVE BEEN DESIGNED TO SERVICEABILITY AND OTHER PERFORMANCE BASED REQUIREMENTS, WHICH MAY EXCEED MINIMUM DESIGN LOADS AND CODE REQUIREMENTS. SUBSTITUTIONS MUST MEET OR EXCEED MOMENT, SHEAR, AND STIFFNESS OF THOSE MEMBERS SPECIFIED AT THE SAME DEPTH AND SPACING.

PRESERVATIVE TREATED WOOD REQUIREMENTS:

TREATMENTS OTHER THAN THOSE LISTED BELOW ARE NOT PERMITTED.

CONDITIONS OF USE		APPLICATION	SPECIFIED MATERIAL	PRESERVATIVE TREATMENT (1)	CONNECTORS & FASTENERS (2)(3)
EXPOSURE	DRY	FOUNDATION SILL PLATES, TOP PLATES & LEDGERS ON CONCRETE OR MASONRY WALLS (4)	2x, 4x, 6x (FIR), OR GLULAM (SP)	SBX	GALV (G60)
				ACQ, CBA, CA	GALV (G185)
	WET	FRAMING, DECKING, POSTS & LEDGERS	2x, & 4x (FIR)	ACQ, CBA, CA	GALV (G185)
			2x, & 4x (CEDAR)	NONE	GALV (G90)
		BEAMS & COLUMNS	6x (FIR), OR GLULAM (SP)	ACQ, CBA, CA	GALV (G185)
			6x OR GLULAM (CEDAR)	NONE GALV	(G90)

NOTES AND ABBREVIATIONS:

1.PRESERVATIVE TREATMENT:

CCA: CHROMATED COPPER ARSENATE NOT PERMITTED — FIR: DOUG-FIR OR HEM-FIR
SBX: DOT SODIUM BORATE — SP: SOUTHERN PINE
ACQ: ALKALINE COPPER QUAT — CBA & CA: COPPER AZOLE

2. CONNECTORS: JOIST HANGERS, STRAPS, FRAMING CONNECTORS, COLUMN CAPS AND BASES, ETC.
FASTENERS: MACHINE BOLTS, ANCHOR BOLTS AND LAG SCREWS WITH ASSOCIATED PLATE WASHERS ANDNUTS. NAILS, SPIKES, WOOD SCREWS, ETC.

3. G60, G90 & G185 PER ASTM A653 FOR COLD-FORMED STEEL CONNECTORS. BATCH/POST HOT-DIP GALVANIZED PER ASTM A123 FOR CONNECTORS AND ASTM A153 STRUCTURAL STEEL CONNECTORS. HOT-DIP GALVANIZED PER ASTM A153 FOR FASTENERS OR MECHANICALLY GALVANIZED FASTENERS PER ASTM B695, CLASS 55 OR GREATER.

4. AT CONTRACTORS OPTION, LEDGERS AND TOP PLATES A MINIMUM OF 8 FEET ABOVE GRADE ON CONCRETE OR MASONRY WALLS MAY BE UN-TREATED IF COMPLETELY SEPARATED FROM THE WALL BY A SELF ADHERING ICE & WATER SHIELD BARRIER (40 MIL MINIMUM).

MISCELLANEOUS:

PRE-APPROVED SUBSTITUTIONS:

SUBSTITUTIONS MAY BE ALLOWED ONLY IF THEY MEET THE REQUIREMENTS OF THESE GENERAL NOTES AND THE SPECIFICATIONS, AND IF COMPLETE WRITTEN ENGINEERING DATA FOR EACH CONDITION REQUIRED FOR THIS PROJECT IS PROVIDED TO THE STRUCTURAL ENGINEER TWO WEEKS PRIOR TO BID DATE AND APPROVED IN WRITTEN ADDENDA BY THE ARCHITECT. DATA IS TO INDICATE CODE BASIS BY YEAR, AUTHORITY FOR STRESSES AND STRESS INCREASES, IF ANY, AND AMOUNT OF EXPECTED DEFLECTION FOR FLEXURAL MEMBERS UNDER (1) TOTAL LOAD AND (2) LIVE LOAD ONLY. ALL INCREASED COSTS IN MECHANICAL, SPRINKLER, ELECTRICAL OR GENERAL INSTALLATION AND ANY ARCHITECTURAL OR STRUCTURAL REDESIGN RESULTING FROM SUBSTITUTION SHALL BE BORNE BY THE GENERAL CONTRACTOR.

SHOP DRAWINGS/SUBMITTALS:

THE ENGINEER OF RECORD SHALL REVIEW SHOP DRAWINGS FOR DESIGN INTENT ONLY. THE ENGINEER OF RECORD DOES NOT GUARANTEE DIMENSIONS AND QUANTITIES; THEREFORE, THE GENERAL CONTRACTOR MUST VERIFY THEM. DRAWINGS FOR COMPONENTS DESIGNED PRIMARILY BY OTHERS SHALL BE APPROVED BY THE COMPONENT DESIGNER PRIOR TO CURSORY REVIEW BY THE ENGINEER OF RECORD FOR LOADS IMPOSED ON THE BASIC STRUCTURE. THE COMPONENT DESIGNER IS RESPONSIBLE FOR CODE CONFORMANCE AND ALL NECESSARY CONNECTIONS NOT SPECIFICALLY CALLED OUT ON ARCHITECTURAL OR STRUCTURAL DRAWINGS. SUBMIT AN ELECTRONIC PDF FILE OR A REPRODUCIBLE AND FIVE COPIES OF THE SHOP DRAWINGS TO THE ARCHITECT OR ENGINEER. THE REPRODUCIBLE WILL BE REVIEWED AND RETURNED. ALLOW 10 WORKING DAYS FOR REVIEW. THE FOLLOWING SHOP DRAWINGS/SUBMITTALS SHALL BE PROVIDED FOR REVIEW AND APPROVAL BY THE STRUCTURAL ENGINEER PRIOR TO FABRICATION OR DELIVERY.

A. REINFORCING STEEL
B. STRUCTURAL STEEL
C. ELEVATOR MANUFACTURER'S DATA AND CUT SHEETS
D. ELEVATOR INSTALLATION INSTRUCTIONS AND DETAILS
E. CONCRETE MIX DESIGN

TRANSOLYMPIC ENGINEERING, INC.
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NO.	DATE	REVISION
1	09-04-19	BID DOCUMENTS

Sheet Contents
STRUCTURAL NOTES

Project
HYDRAULIC ELEVATOR MODERNIZATION
USPS SEATTLE NDC
34301 NINTH AVENUE SOUTH, FEDERAL WAY, WASHINGTON

Designed By	MJL
Drawn By	SOG
Checked By	MJL
Date	09-04-19

MARK J. LEWIS — STATE OF WASHINGTON — 53424 — STRUCTURAL ENGINEER — PROFESSIONAL ENGINEER
09-04-19

Project Number
19031

Sheet Number
S1.2
4 of 6

IF SHEET MEASURES LESS THAN 22"X34" IT IS A REDUCED PRINT. REDUCE SCALE ACCORDINGLY.

GENERAL NOTES , STRUCTURAL NOTES, CONTINUED FROM SHEETS S1.00, S1.01, S1.02 AND S1.03.

SPECIAL INSPECTION:

THIS PROJECT IS IN A HIGH WIND AND SEISMIC REGION. SPECIAL INSPECTION REQUIREMENTS ACCORDING TO INTERNATIONAL BUILDING CODE SECTIONS 1705.11, 1705.12 AND 1705.13 SHALL APPLY. THE WIND FORCE AND SEISMIC FORCE LATERAL SYSTEMS ARE THE ROOF FRAMING, DIAPHRAGMS, SHEAR WALLS AND THE FOUNDATIONS.

TESTING AND SPECIAL INSPECTION REPORTS SHALL BE PREPARED FOR EACH INSPECTION ITEM ON A DAILY BASIS WHENEVER WORK IS PERFORMED ON THAT ITEM. REPORTS SHALL BE DISTRIBUTED TO OWNER, CONTRACTOR, BUILDING OFFICIAL, ARCHITECT AND STRUCTURAL ENGINEER. STRUCTURAL OBSERVATIONS SHALL BE PERFORMED BY THE STRUCTURAL ENGINEER OF RECORD OR DESIGNATED REPRESENTATIVE IN ACCORDANCE WITH IBC 1704.6.

STRUCTURAL OBSERVATION SHALL BE PERFORMED AS FOLLOWS:

-PERIODIC VISUAL OBSERVATION OF STRUCTURAL SYSTEMS FOR GENERAL CONFORMANCE TO CONSTRUCTION DOCUMENTS AT SIGNIFICANT CONSTRUCTION STAGES.
- REVIEW OF TESTING AND INSPECTION REPORTS.
- REPORTS SHALL BE PREPARED FOR EACH SITE VISIT AND SHALL BE DISTRIBUTED TO ARCHITECT.

GENERAL CONTRACTOR SHALL SUBMIT A WRITTEN CONTRACTOR'S STATEMENT OF RESPONSIBILITY TO THE BUILDING OFFICIAL AND OWNER PRIOR TO COMMENCEMENT OF WORK. THE CONTRACTOR'S STATEMENT OF RESPONSIBILITY SHALL INCLUDE ACKNOWLEDGMENT OF AWARENESS OF THE SPECIAL INSPECTION REQUIREMENTS CONTAINED IN THE STATEMENT OF SPECIAL INSPECTION.

SPECIAL INSPECTION SHALL BE PROVIDED BY AN INDEPENDENT TESTING LABORATORY PER THE REQUIREMENTS OF IBC CHAPTER 17 AND THE LOCAL BUILDING OFFICIAL OR APPLICABLE JURISDICTION AND THE CONTRACT DOCUMENTS. THE SPECIAL INSPECTOR SHALL SUBMIT INSPECTION REPORTS AND A FINAL SIGNED REPORT TO THE BUILDING OFFICIAL FOR THE ITEMS LISTED IN THE QUALITY ASSURANCE/SPECIAL INSPECTION SECTION:

CONFIRM THE SPECIAL INSPECTION REQUIREMENTS LISTED BELOW WITH THE LATEST EDITION OF THE INTERNATIONAL BUILDING CODE AND REFERENCED CODE(S).

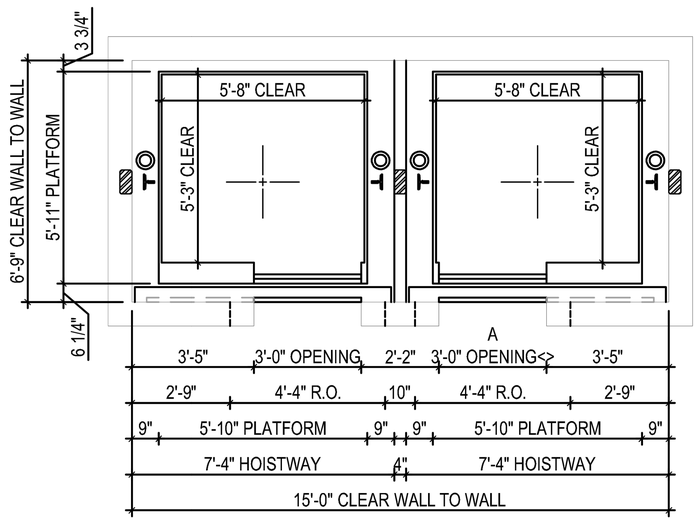
STRUCTURAL SYSTEM	VERIFICATION AND INSPECTION	CONTINOUS	PERIODIC	COMMENTS	REFERENCES
CONCRETE	1. INSPECT REINFORCEMENT, INCLUDING PRESTRESSING TENDONS AND VERIFY PLACEMENT.		X	SPECIAL INSPECTIONS NOT REQUIRED FOR THE FOLLOWING CONDITIONS: NON-STRUCTURAL SLAB ON GRADE	ACI 318: CH. 20, 25.2, 25.3, 26.6.1-26.6.3 IBC 1908.4
	2. REINFORCING BAR WELDING				AWS D1.4 ACI 318: 26.6.4 IBC 1705.3.1
	A. VERIFY WELDABILITY OF REINFORCING BARS OTHER THAN ASTM A706;		X		
	B. INSPECT SINGLE PASS FILLET WELDS, MAXIMUM 5/16" AND		X		
	C. INSPECT ALL OTHER WELDS.	X			
	3. INSPECT ANCHORS TO BE CAST IN CONCRETE		X		ACI 318: 17.8.2
	4. INSPECT ANCHORS POST INSTALLED IN HARDENED CONCRETE MEMBERS				
	A. ADHESIVE ANCHORS INSTALLED HORIZONTALY OR UPWARDLY INCLINED ORIENTATIONS TO RESIST SUSTAINED TENSION LOADS.	X			ACI 318: 17.8.2.4
	B. MECHANICAL ANCHORS AND ADHESIVE ANCORS NOT DEFINED IN 4.A.		X		ACI 318: 17.8.2
	5. VERIFY USE OF REQUIRED DESIGN MIX.		X		ACI 318: CH 19, 26.4.3, 26.4.4, 26.12 IBC 1705.3.2, 1904.1, 1904.2, 1908.2, 1908.3
	6. PRIOR TO CONCRETE PLACEMENT, FABRICATE SPECIMENS FOR STRENGHT TESTS, PERFORM SLUMP AND AIR CONTENT TESTS, AND DETERMINE THE TEMPERATURE OF THE CONCRETE.	X			ASTM C172, C31 ACI 318: 26.4, 26.12 IBC 1908.10
	7. INSPECT CONCRETE AND SHOTCRETE PLACEMENT FOR PROPER APPLICATION TECHNIQUES.	X			ACI 318: 26.5 IBC 1908.6, 1908.7, 1908.8
	8. VERIFY MAINTENANCE OF SPECIFIED CURING TEMPERATURE AND TECHNIQUES.		X		ACI 318: 26.5.3-26.5.5 IBC 1908.9
	9. INSPECT PRESTRESSED CONCRETE FOR:				
	A. APPLICATIONS OF PRESRTESSING FORCES; AND	X			ACI 318: 25.10
	B. GROUTING OF BONDED PRESTRESSING TENDONS	X			
	10. INSPECT ERECTION OF PRECAST CONCRETE MEMBERS		X		ACI 318: 26.8
	11. VERIFY IN-SITU CONCRETE STRENGTH PRIOR TO STRESSING TENDONS IN POST TENSIONED CONCRETE AND PRIOR TO REMOVAL OF SHORES AND FORMS FROM BEAMS AND STRUCTURAL SLABS.		X		ACI 318: 25.11.2
	12. INSPECT FORMWORK FOR SHAPE, LOCATION AND DIMENSIONS OF THE CONCRETE MEMBER BEING FORMED.		X		ACI 318: 25.11.1.2(B)

STRUCTURAL SYSTEM	VERIFICATION AND INSPECTION	CONTINOUS	PERIODIC	COMMENTS	REFERENCES
COLD-FORMED STEEL FRAMING	ANCHORAGE AND SEISMIC BRACING.		X		IBC 1621, 1705.1, 1705.2, 1705.11.2, 1705.11.3, 1705.12, 1705.12.3 ASCE 9.6.2.6
SUSPENDED CEILINGS	INSPECTION PROGRAM SHALL VERIFY:		X	VERIFICATION AT BEGINNING OF CONSTRUCTION.	

STRUCTURAL SYSTEM	VERIFICATION AND INSPECTION	CONTINOUS	PERIODIC	COMMENTS	REFERENCES
STEEL CONSTRUCTION	MATERIAL VERIFICATION OF HIGH-STRENGTH BOLTS, NUTS AND WASHERS.	X		SPECIAL INSPECTIONS IN THIS SECTION ARE WAIVED WHERE FABRICATION IS PERFORMED ON THE PREMISES OF A FABRICATOR REGISTERED AND APPROVED IN ACCORDANCE WITH IBC SECTION 1704.2	IBC 1705.2 AISC 360 CHAPTER N5 AISC 341 CHAPTER J7
	HIGH-STRENGTH BOLTING - BEARING-TYPE CONNECTIONS.		X		
	HIGH-STRENGTH BOLTING – SLIP-CRITICAL CONNECTIONS.		X		
	STRUCTURAL STEEL WELDING:	X			
	1. COMPLETE AND PARTIAL PENETRATION WELDS				
	2. MULTI-PASS FILLET WELDS.	X			
	3. SINGLE-PASS FILLET WELDS >5/16".	X			
	4. SINGLE-PASS FILLET WELDS <5/16".	X			
	5. FLOOR AND ROOF METAL DECKING.		X		AWS D1.3
	6. FIELD-INSTALLED WELDED STUDS.		X		
	7. WELDING OF STAIRS AND RAILING SYSTEMS.		X		
	REINFORCING STEEL WELDING		X		AWS D1.4 ACI 318.: 3.5.2 IBC CHAPTER 19
	1. VERIFICATION OF WELDABILITY.				
	2. SHEAR REINFORCEMENT.		X		
	3. OTHER REINFORCEMENT.	X			
	4. REINFORCEMENT IN MOMENT FRAMES, SHEAR WALL BOUNDARY ELEMENTS.		X		
	MATERIAL VERIFICATION OF STRUCTURAL STEEL	X		MANUFACTURER TO PROVIDE CERTIFIED MILL TEST REPORTS.	IBC CHAPTER 17, SECTION 1703, 1704 AND 1705, ASTM A6 OR A568
	1. IDENTIFICATION MARKINGS CONFORM TO ASTM STANDARDS LISTED IN GENERAL NOTES.				
	2. MANUFACTURER'S CERTIFIED MILL TEST REPORTS.		X		
	MATERIAL VERIFICATION OF WELD FILLER MATERIALS.		X	MANUFACTURER TO PROVIDE CERTIFICATE OF COMPLIANCE.	AISC, ASD SECTION A3.6 AISC, LRFD, SECTION SECTION A3.5
	1. IDENTIFICATION MARKINGS TO CONFORM TO AWS SPECIFICATIONS LISTED IN GENERAL NOTES.				
	2. MANUFACTURER'S CERTIFICATE OF COMPLIANCE.		X		
	INSPECTION OF STEEL FRAME JOINT DETAILS FOR COMPLIANCE WITH APPROVED CONSTRUCTION DOCUMENTS.		X		IBC 1704.3.2
	SPRAYED FIRE-RESISTANT MATERIALS.		X		IBC 1704.11 1705.14
OPEN WEB STEEL JOISTS AND GIRDERS	INSTALLATIO OF OPPEN WEB STEEL JOISTS AND GIRDERS				IBC 1705.2.3
	A. END CONNECTIONS, WELDED OR BOLTED		X		SJI SPECIFICATIONS SECTION 2207.1.
	B. BRIDGING – HORIZONTAL OR DIAGONAL				
	1. STANDARD BRIDGING		X		SJI SPECIFICATIONS SECTION 2207.1.
	2. BRIDGING THAT DIFFERS FROM THE SJI SPECIFICATIONS LISTED IN SECTION 2207.1.		X		

ELEVATOR NUMBER - DUTY:
ELEVATORS 1-2: 2500# @ 150 FPM - INGROUND HYDRAULIC

DESIGN NOTES:
- MACHINE ROOM LAYOUT REFERENCE ONLY
- MACHINE ROOM HEIGHT:8'-0"
- FIELD VERIFY ALL DIMENSIONS
- EXISTING HOISTWAY



EXCERPT LERCH BATES DWG. VT–01
1/2"=1'–0"

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Sheet Contents: STRUCTURAL NOTES

Project: HYDRAULIC ELEVATOR MODERNIZATION
USPS SEATTLE NDC
34301 NINTH AVENUE SOUTH, FEDERAL WAY, WASHINGTON

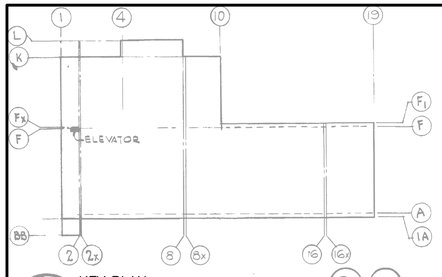
Designed By	MJL
Drawn By	SOG
Checked By	MJL
Date	09-04-19

MARK J. LERCH STATE OF WASHINGTON 25424 REGISTERED PROFESSIONAL ENGINEER
09-04-19

Project Number: 19031

Sheet Number: S1.3
5 of 6

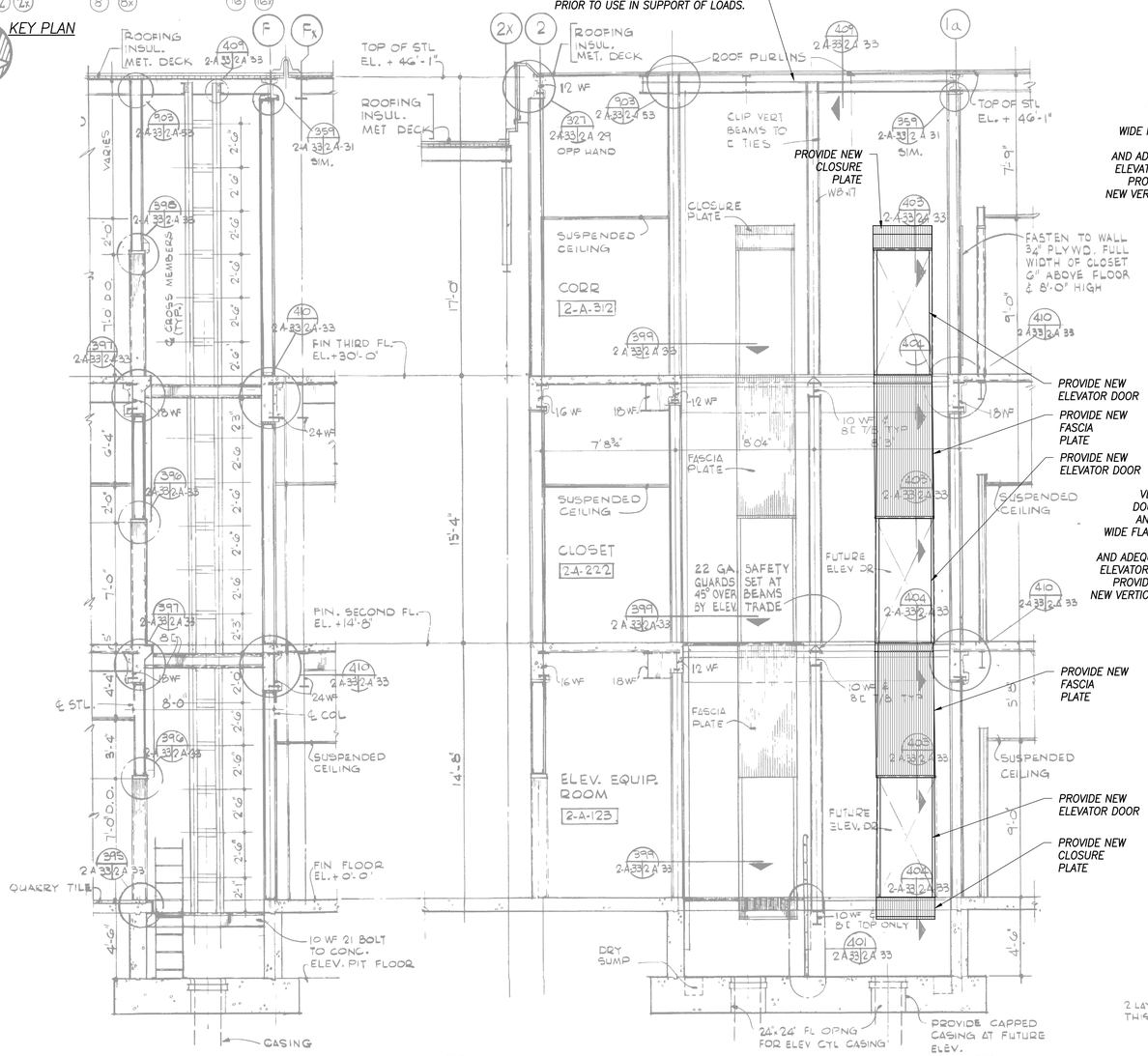
IF SHEET MEASURES LESS THAN 22"X34" IT IS A REDUCED PRINT. REDUCE SCALE ACCORDINGLY.



KEY PLAN

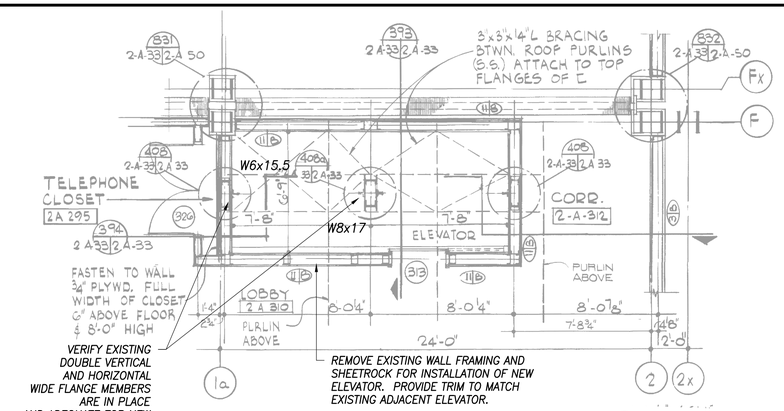
ELEVATOR DATA SUBMITTAL REQUIREMENT:

1. REFER TO SPECIFICATION PARAGRAPHS 2.1 AND 2.2 FOR ACCEPTABLE MANUFACTURERS AND ELEVATOR REQUIREMENTS.
2. SEE LERCH BATES DRAWING VT–01 FOR ELEVATOR PLAN.
3. SUBMIT MANUFACTURER'S DATA FOR PROPOSED ELEVATOR TO ENGINEER FOR DETERIMINATION OF WEIGHT, CONFIGURATION AND ACCEPTABILITY PRIOR TO SUPPLYING ELEVATOR.
4. DO NOT INSTALL ELEVATOR WITHOUT ENGINEER'S APPROVAL IN WRITING REGARDING ACCEPTABLE CONFIGURATION AND WEIGHTS.
5. SEE STRUCTURAL NOTES FOR ADDITIONAL SUBMITTAL REQUIREMENTS.

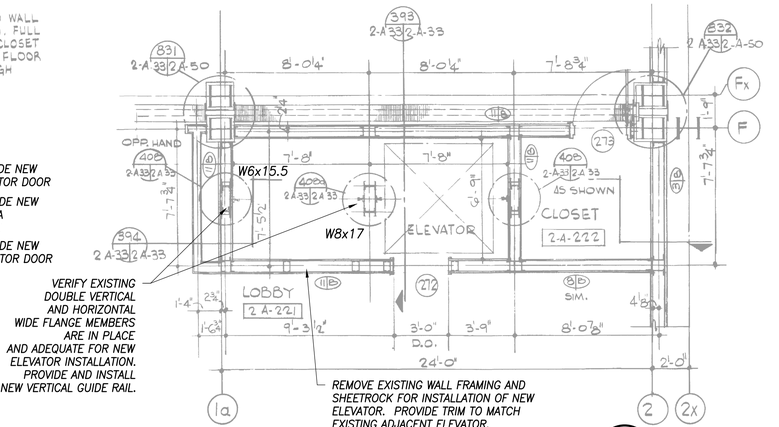


SECTION
1/4"=1'-0"
EXCERPT AS BUILT SHEET 2–A–33 DATED 22 MAR 73 (USPS DWG. NO. 100–01–05)
393 | 2-A-33 | 2-A-33

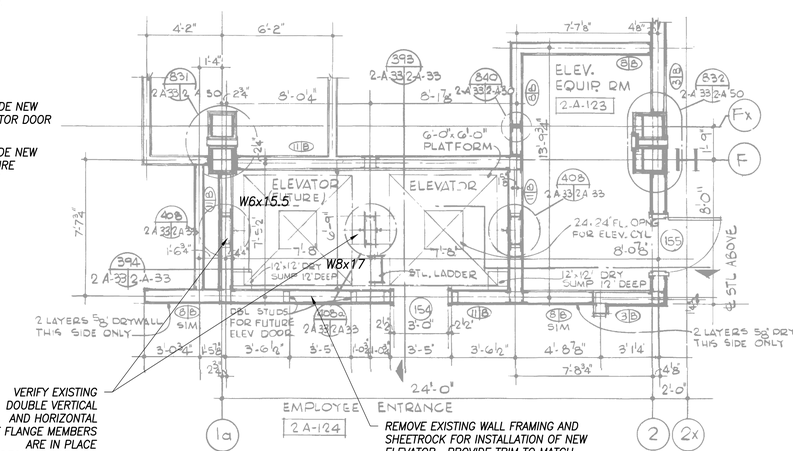
SECTION
1/4"=1'-0"
EXCERPT AS BUILT SHEET 2–A–33 DATED 22 MAR 73 (USPS DWG. NO. 100–01–05)
394 | 2-A-33 | 2-A-33



PLAN AT THIRD FLOOR
1/4"=1'-0"
EXCERPT AS BUILT SHEET 2–A–33 DATED 22 MAR 73 (USPS DWG. NO. 100–01–05)
400 | 2-A-33 | 2-A-33



PLAN AT SECOND FLOOR
1/4"=1'-0"
EXCERPT AS BUILT SHEET 2–A–33 DATED 22 MAR 73 (USPS DWG. NO. 100–01–05)
392 | 2-A-33 | 2-A-33



PLAN AT FIRST FLOOR
1/4"=1'-0"
EXCERPT AS BUILT SHEET 2–A–33 DATED 22 MAR 73 (USPS DWG. NO. 100–01–05)
391 | 2-A-33 | 2-A-33

AS–BUILT NOTE:
INFORMATION DEPICTED WAS PROVIDED BY US POSTAL SERVICE AND HAS BEEN FIELD VERIFIED BY TRANSOLYMPIC ENGINEERING, INC. WHERE POSSIBLE. HOWEVER, FIELD CONDITIONS MAY VARY FROM THAT SHOWN. FIELD VERIFY EXISTING CONDITIONS PRIOR TO CONSTRUCTION.

NOTE:
SHEET REFERENCES SHOWN REFER TO AS–BUILT DRAWINGS PROVIDED BY POSTAL SERVICE. SEE AS BUILT DRAWINGS DATED 22 MAR 73 FOR DETAILS CALLED AND NOTES NOT SHOWN ON THIS SHEET.

TRANSOLYMPIC ENGINEERING, INC.
STRUCTURAL - FOUNDATION - CIVIL ENGINEERS
PO Box 849, Montesano, WA 98563
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NO.	DATE	REVISION
1	09–04–19	BID DOCUMENTS

Sheet Contents
ELEVATOR PLANS AND SECTIONS

Project
HYDRAULIC ELEVATOR MODERNIZATION
USPS SEATTLE NDC
34301 NINTH AVENUE SOUTH, FEDERAL WAY, WASHINGTON

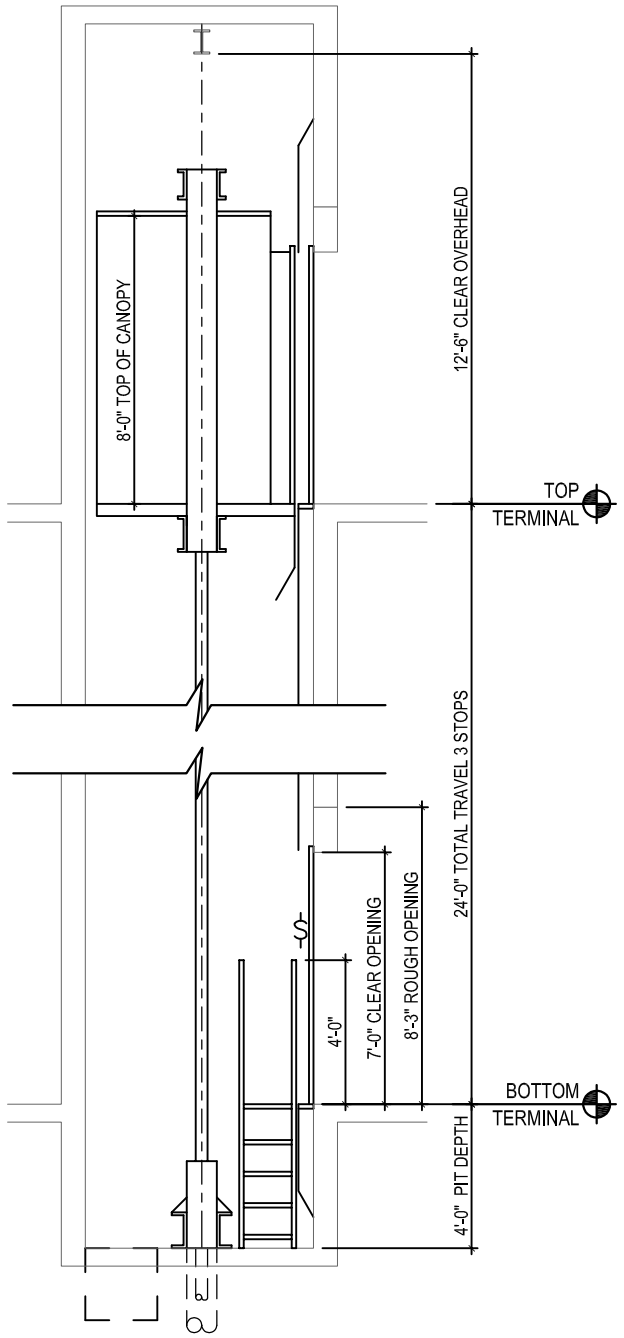
Designed By	MJL
Drawn By	SOG
Checked By	MJL
Date	09-04-19

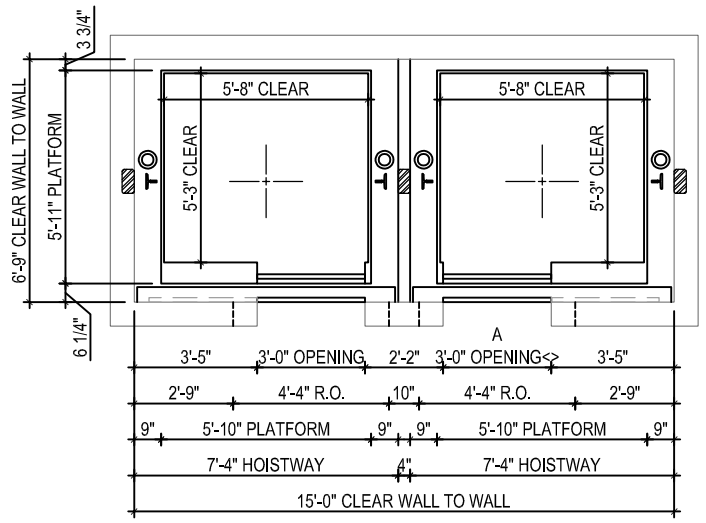
MARK J. LERCH — STATE OF WASHINGTON — 13424 — REGISTERED PROFESSIONAL ENGINEER
09-04-19

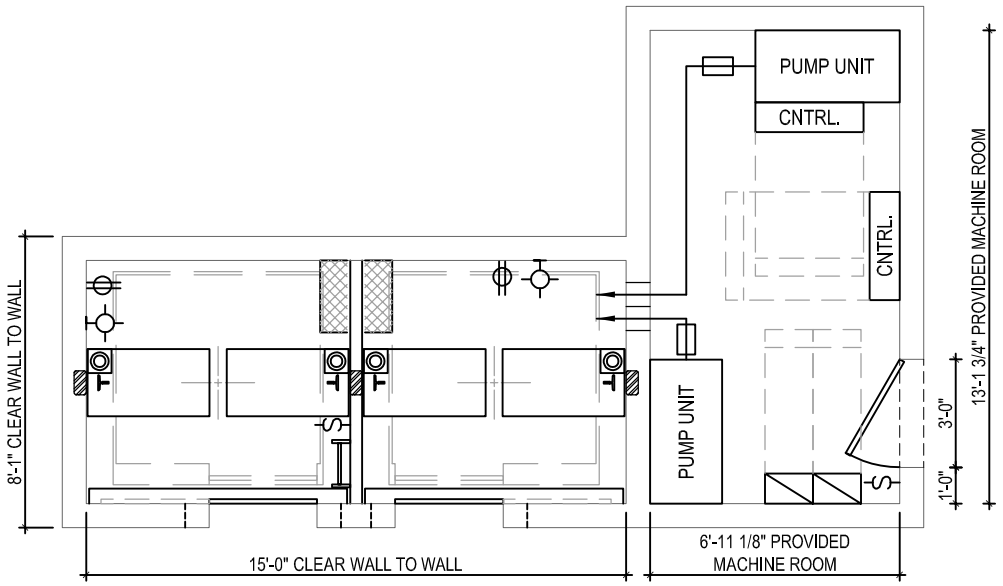
Project Number
19031

Sheet Number
S2.0
6 of 6

IF SHEET MEASURES LESS THAN 22"X34" IT IS A REDUCED PRINT. REDUCE SCALE ACCORDINGLY.







ELEVATOR NUMBER - DUTY:
ELEVATORS 1-2: 2500# @ 150 FPM - INGROUND HYDRAULIC

DESIGN NOTES:

- MACHINE ROOM LAYOUT REFERENCE ONLY
- MACHINE ROOM HEIGHT:8'-0"
- FIELD VERIFY ALL DIMENSIONS
- EXISTING HOISTWAY

USPS NDC
Federal Way, WA

LERCH BATES
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Global Support Center
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19515 North Creek Parkway, Suite 304
Bothell, WA 98011
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Sheet Name	PLANS AND HOISTWAY SECTION FOR ELEVATORS 1-2	
Project Number:	160-0100018283-01	VT01
Date	09/03/2019	
Drawn By:	AL	
Checked By:	CAD	Scale: N.T.S.