

3/30/2011 2:34 PM

A	B	C	D	E	F	G	H
STRUCTURAL ABBREVIATIONS:							
ACI	AMERICAN CONCRETE INSTITUTE						
ADD'L	ADDITIONAL						
AISC	AMERICAN INSTITUTE OF STEEL CONSTRUCTION						
AISI	AMERICAN IRON AND STEEL INSTITUTE						
ASTM	AMERICAN SOCIETY FOR TESTING AND MATERIALS						
ARCH	ARCHITECTURAL						
B	BOTTOM						
BLDG	BUILDING						
BOTT	BOTTOM						
¢	CENTER LINE						
CFMRF	COLD FORM METAL ROOF FRAME						
CFMF	COLD FORM METAL FRAME						
CFS	COLD FORMED STEEL						
CIP	CAST-IN-PLACE						
CIFL	CAST-IN-PLACE LINTEL						
CJ	CONTROL JOINT						
CLR	CLEAR						
CMU	CONCRETE MASONRY UNIT						
COEFF	COEFFICIENT						
COL	COLUMN						
CONC	CONCRETE						
CONT	CONTINUOUS						
COORD	COORDINATE						
CRSI	CONCRETE REINFORCING STEEL INSTITUTE						
CSJ	CONSTRUCTION JOINT						
DIA	DIAMETER						
DIAG	DIAGONAL						
DIM	DIMENSION						
DWG	DRAWING						
DWL	DOWEL						
EA	EACH						
EF	EACH FACE						
ELEC	ELECTRICAL						
ELEV	ELEVATION						
EMBED	EMBEDMENT						
EQUIV	EQUIVALENT						
ETC	ET CETERA						
EW	EACH WAY						
EXP	EXPANSION						
EXT	EXTERIOR						
FND	FOUNDATION						
FTG	FOOTING						
GA	GAUGE						
GB	GRADE BEAM						
HORIZ	HORIZONTAL						
h	HOUR						
HRS	HOURS						
IBC	INTERNATIONAL BUILDING CODE						
INFO	INFORMATION						
INT	INTERIOR						
kg	KILOGRAM						
km	KILOMETER						
kN	KILONEWTON						
kPa	KILOPASCAL						
L#	ANGLE (# INDICATES SIZE)						
LONG	LONGITUDINAL						
LLV	LONG LEG VERTICAL						
m	METER						
MAX	MAXIMUM						
MECH	MECHANICAL						
MFG	MANUFACTURER						
MID	MIDDLE						
MIN	MINIMUM						
MISC	MISCELLANEOUS						
mm	MILLIMETER						
MPa	MEGAPASCAL						
MTL	METAL						
MWFRS	MAIN WIND FORCE RESISTING SYSTEM						
N	NEWTON						
N	NORTH						
N/A	NOT APPLICABLE						
#	NUMBER SYMBOL FOR REBAR SIZE						
NTS	NOT TO SCALE						
OC	ON CENTER						
OPNG	OPENING						
¢ or PL	PLATE						
PRE-ENG	PRE-ENGINEERED						
RB	ROOF BEAM						
REINF	REINFORCED						
REQ'D	REQUIRED						
SIM	SIMILAR						
SOG	SLAB-ON-GRADE						
SPECS	SPECIFICATIONS						
STD	STANDARD						
STRUCT	STRUCTURAL						
SW	SHEAR WALL						
T	TOP						
T/	TOP OF						
T/ELEV	TOP ELEVATION						
T/SLAB	TOP OF SLAB						
T&B	TOP AND BOTTOM						
THK	THICK						
TYP	TYPICAL						
UFC	UNIFIED FACILITIES CRITERIA						
UON	UNLESS OTHERWISE NOTED						
VERT	VERTICAL						
W	WIDTH						
W/	WITH						

GENERAL NOTES:
 1.0 THIS PROJECT HAS BEEN DESIGNED FOR THE WEIGHTS AND MATERIALS INDICATED ON THE DRAWINGS AND FOR THE SUPERIMPOSED DEAD AND LIVE LOADS INDICATED IN THE STRUCTURAL DESIGN CRITERIA. IT IS THE CONTRACTOR'S RESPONSIBILITY TO DETERMINE ALLOWABLE CONSTRUCTION LOADS AND TO PROVIDE PROPER DESIGN AND CONSTRUCTION OF FALSEWORK, FORMWORK, STAGING, BRACING, SHEETING AND SHORING, ETC.
 1.2 METHODS, PROCEDURES AND SEQUENCES OF CONSTRUCTION ARE THE RESPONSIBILITY OF THE CONTRACTOR. THE CONTRACTOR IS RESPONSIBLE FOR IDENTIFYING AND IMPLEMENTING THE NECESSARY PRECAUTIONS TO MAINTAIN AND ENSURE THE INTEGRITY OF THE STRUCTURE AT ALL STAGES OF CONSTRUCTION.
 1.3 COORDINATE THESE DRAWINGS WITH THE ARCHITECTURAL, MECHANICAL, ELECTRICAL, PLUMBING, AND CIVIL DRAWINGS. ALL DIMENSIONS SHOWN ON THE DRAWINGS ARE MILLIMETERS UNLESS NOTED OTHERWISE.
 1.4 SLEEVES OR BLOCK-OUTS REQUIRED FOR PASSAGE OF DUCTWORK, PIPING, DRAINS, CONDUIT, ETC, IN ADDITION TO ANCHORS, CURBS AND HANGERS REQUIRED FOR EQUIPMENT AND PIPING AND UNDER-SLAB UTILITIES ARE NOT SPECIFICALLY, NOR GENERALLY, INDICATED ON THE STRUCTURAL DRAWINGS. THE CONTRACTOR IS RESPONSIBLE FOR COORDINATING WORK SHOWN ON OTHER DISCIPLINE'S DRAWINGS AND DETERMINING SUCH REQUIREMENTS PRIOR TO FABRICATION OR ERECTION OF THE STRUCTURE. PENETRATIONS OF STRUCTURAL MEMBERS ARE SUBJECT TO APPROVAL BY THE CONTRACTING OFFICER. REFER TO GENERAL NOTE 8.9 FOR OPENINGS IN ARCH SPAN STRUCTURE.
 1.5 DIMENSIONS AND INSTALLATION DETAILS OF PURCHASED EQUIPMENT MUST BE VERIFIED AND COORDINATED WITH THE SUPPORTING STRUCTURE. THE CONTRACTOR IS RESPONSIBLE FOR DETERMINING SUCH REQUIREMENTS FROM SUBCONTRACTORS AND EQUIPMENT SUPPLIERS ALONG WITH COORDINATING THE LOCATIONS AND DETAILS FOR THESE ITEMS PRIOR TO CONSTRUCTION OF EQUIPMENT PADS OR FABRICATION AND ERECTION OF FRAMING INTENDED TO SUPPORT SUCH EQUIPMENT. ANY CONFLICTS BETWEEN THESE ITEMS AND THE BUILDING STRUCTURE IS TO BE BROUGHT TO THE ATTENTION OF THE CONTRACTING OFFICER FOR RESOLUTION. REFER TO GENERAL NOTE 8.10 FOR HANGING LOADS ON ARCH SPAN STRUCTURE.
 1.6 WORK NOT INCLUDED ON THE DRAWINGS BUT IMPLIED TO BE SIMILAR TO THAT SHOWN AT CORRESPONDING PLACES ELSEWHERE ON THE DRAWINGS SHALL BE REPEATED.
 1.7 IN CASE OF CONFLICT BETWEEN THE NOTES, DETAILS AND SPECIFICATIONS THE MOST RIGID REQUIREMENTS SHALL GOVERN.
 1.8 SEE ARCHITECTURAL DRAWINGS FOR LOCATIONS OF NON-LOAD BEARING PARTITIONS. PROVIDE COMPRESSIBLE FIRESAFING AT TOP OF WALL AS REQUIRED BY ARCHITECTURAL DRAWINGS.
 1.9 COORDINATE FINISHED FLOOR DATUM ELEVATION 0.0m WITH THE CIVIL DRAWINGS.

FOUNDATION NOTES
 2.0 THE GEOTECHNICAL ANALYSIS FOR THIS PROJECT IS THE RESPONSIBILITY OF THE CONTRACTOR AWARDED THE WORK. AN ASSUMED ALLOWABLE SOIL BEARING VALUE OF 72 kPa HAS BEEN USED IN THE STRUCTURAL ANALYSIS OF THE BUILDING AND SHALL BE CONFIRMED AND VERIFIED AS PART OF THE GEOTECHNICAL INVESTIGATION. VALUES WHICH DO NOT MEET THE REQUIREMENTS INDICATED IN THE STRUCTURAL DESIGN CRITERIA, FOUNDATION LOADS SECTION SHALL BE IMMEDIATELY BROUGHT TO THE ATTENTION OF THE CONTRACTING OFFICER FOR CONSIDERATION AND DETERMINATION ON THE NEXT APPROPRIATE COURSE OF ACTION.
 2.1 ELEVATIONS SHOWN ON THE DRAWINGS AT WHICH FOUNDATIONS BEAR ARE APPROXIMATE AND MAY VARY TO SUIT SUBSURFACE SOIL CONDITIONS AND PROJECT GEOTECHNICAL ENGINEER'S RECOMMENDATIONS. ALL EXTERIOR FOOTINGS ARE TO BEAR A MINIMUM OF 800mm BELOW FINISHED GRADE.
 2.2 SEE THE SPECIFICATION FOR ADDITIONAL REQUIREMENTS TO THOSE OUTLINED IN THE GEOTECHNICAL INVESTIGATION FOR EXCAVATION AND PREPARATION OF THE FOUNDATION AND THE SLAB ON GRADE SUBGRADE INCLUDING COMPACTION PROCEDURES.
 2.3 EXCAVATIONS FOR FOOTINGS SHALL HAVE THE SIDES AND BOTTOMS TEMPORARILY LINED WITH 0.25mm POLYETHYLENE IF PLACEMENT OF CONCRETE DOES NOT OCCUR WITHIN 24 HRS OF THE EXCAVATION OF THE FOOTING.
 2.4 FOUNDATION CONDITIONS NOTED DURING CONSTRUCTION WHICH DIFFER FROM THOSE DESCRIBED IN THE GEOTECHNICAL REPORT SHALL BE REPORTED TO THE GENERAL CONTRACTOR AND CONTRACTING OFFICER BEFORE FURTHER CONSTRUCTION IS ATTEMPTED.
 2.5 NO FOOTINGS SHALL BE POURED INTO OR AGAINST SUBGRADE CONTAINING FREE WATER, FROST, ICE OR LOOSE MATERIAL.
 2.6 CONCRETE SLABS ON GRADE HAVE BEEN DESIGNED TO BEAR ON PROPERLY COMPACTED SUB-BASE STONE AND SUB-GRADE SOILS. THE SUB-BASE MATERIAL BENEATH THE SLAB-ON-GRADE SHALL BE A WELL GRADED CRUSHED STONE (AASHTO #57 OR SIMILAR) AND BE COMPACTED IN ACCORDANCE WITH 95% MODIFIED DENSITY PER ASTM D 1557.
 2.7 PRIOR TO START OF FOUNDATION OR SLAB-ON-GRADE CONSTRUCTION, EXISTING SUBGRADES SHALL BE COMPACTED TO MINIMUM OF 95% MAXIMUM DRY DENSITY OBTAINED THRU ASTM D 1557 MODIFIED PROCTOR TESTING.
 2.8 SEE PLUMBING, ELECTRICAL & CIVIL DRAWINGS FOR REQUIRED UNDERSLAB UTILITIES.
 2.9 SEE ARCHITECTURAL DRAWINGS FOR ALL WATERPROOFING DETAILS AND MATERIALS.
 2.10 IF UNDERMINING OF FOOTINGS OCCURS, FILL VOIDS WITH 15 MPa CONCRETE. DO NOT ATTEMPT TO REPLACE AND RE-COMPACT SOIL.

CONCRETE
 3.0 CONCRETE SHALL HAVE THE UNIT WEIGHT OF 2350 kg/m³ AND A MINIMUM COMPRESSIVE STRENGTH (f_c) OF 28 MPa AT 28 DAYS. ALL CONCRETE SHALL HAVE A MAXIMUM WATER-CEMENT RATIO OF 0.45. SEE SPECIFICATIONS FOR ADDITIONAL INFORMATION. ENTRAIN AIR TO PRODUCE TOTAL AIR CONTENT ACCORDING TO THE SPECIFICATIONS FOR CONCRETE EXPOSED TO FREEZING TEMPERATURES (EXTERIOR FOOTINGS AND STEM WALLS, SLAB TURNDOWNS, EXTERIOR SLABS AND SLABS-ON-GRADE, EXTERIOR RETAINING WALLS.)
 3.1 PRIOR TO CONCRETE PLACEMENT, THE CONTRACTOR MUST SUBMIT CONCRETE MIX DESIGNS FOR EACH TYPE OF CONCRETE TO BE USED, PREPARED IN ACCORDANCE WITH THE SPECIFICATIONS TO THE CONTRACTING OFFICER FOR REVIEW.
 3.2 NO CALCIUM CHLORIDE SHALL BE USED IN ANY CONCRETE. MIXING, TRANSPORTING AND PLACING OF CONCRETE SHALL CONFORM TO ACI 301M-05.
 3.3 ALL CONCRETE WORK SHALL CONFORM TO THE REQUIREMENTS OF THE AMERICAN CONCRETE INSTITUTE (ACI) 318M-05 MANUAL (metric), "BUILDING CODE REQUIREMENTS FOR REINFORCED CONCRETE", ACI-301M-05 "SPECIFICATIONS FOR STRUCTURAL CONCRETE FOR BUILDINGS" AND REQUIREMENTS OUTLINED IN THE CONTRACT SPECIFICATIONS.
 3.4 CHAMFER ALL EXPOSED EXTERNAL CORNERS OF CONCRETE WITH 20mm x45 DEGREE CHAMFER UON.
 3.5 CONCRETE REINFORCEMENT BARS SHALL BE METRIC SIZE BARS AND SHALL CONFORM TO ASTM A615M-07, GRADE 420 MPa. REINFORCING BARS SHALL NOT BE TACK WELDED, WELDED, HEATED OR CUT, UNLESS INDICATED ON THE CONTRACT DOCUMENTS. ALL LAP SPLICES SHALL BE CLASS "B" UON.
 3.6 HORIZONTAL FOOTING AND HORIZONTAL WALL REINFORCEMENT SHALL BE CONTINUOUS AND SHALL HAVE 90 DEGREE BENDS AND EXTENSIONS, OR CORNER BARS OF EQUIVALENT SIZE LAPPED WITH A CLASS B TENSION SPLICE AT CORNERS AND INTERSECTIONS. TOP BAR CRITERIA SHALL APPLY IF 300mm OR MORE OF FRESH CONCRETE IS PLACED BELOW BAR.
 3.7 SLABS-ON-GRADE SHALL HAVE CONSTRUCTION JOINTS OR CRACK CONTROL JOINTS AS SHOWN ON THE DRAWINGS. CONSTRUCTION JOINTS CAN BE USED AT CONTROL JOINT LOCATIONS AT CONTRACTORS OPTION. SEE SLAB PLANS & JOINT DETAILS FOR ADDITIONAL INFORMATION. FOR AREAS NOT SHOWN ON DWGS, THE MAXIMUM SPACING OF CONSTRUCTION/ CRACK CONTROL JOINTS SHALL BE 3600mm.
 3.8 ALL CONCRETE REINFORCEMENT SHALL BE DETAILED, FABRICATED, LABELED, SUPPORTED, AND SPACED IN FORMS AND SECURED IN PLACE IN ACCORDANCE WITH THE PROCEDURES AND REQUIREMENTS OUTLINED IN ACI 318M, AND THE "MANUAL OF STANDARD PRACTICE FOR DETAILING REINFORCED CONCRETE STRUCTURES", ACI 315M, LATEST EDITION.
 3.9 ALL DOWELS SHALL MATCH SIZE AND NUMBER OF MAIN REINFORCING, UNLESS NOTED OTHERWISE ON THE DRAWINGS.
 3.10 ADDITIONAL BARS SHALL BE PROVIDED AROUND ALL FLOOR AND WALL OPENINGS AS SHOWN ON THE DRAWINGS.
 3.11 SEE ARCHITECTURAL DRAWINGS FOR TYPE AND LOCATION OF ALL FLOOR FINISHES.
 3.12 SPLICES (LAPS) OF REINFORCING BARS SHALL BE CLASS 'B' TENSION LAPS PER ACI 318M-05 UNLESS NOTED OTHERWISE. SEE SCHEDULE ON S-601.
 3.13 PROVIDE ADEQUATE CONCRETE COVER IN ACCORDANCE WITH THE REQUIREMENTS AS SET FORTH BY ACI 318M-05.
 3.14 REINFORCEMENT IS TO BE SECURELY HELD IN PLACE WHILE PLACING CONCRETE. IF REQUIRED, ADDITIONAL BARS, STIRRUPS, OR CHAIRS WILL BE PROVIDED BY THE CONTRACTOR TO FURNISH SUPPORT FOR ALL BARS WHERE NECESSARY DURING CONSTRUCTION.
 3.15 CONTINUOUS TOP BARS TO BE SPLICED AT MID-SPAN. CONTINUOUS BOTTOM BARS TO BE SPLICED AT CENTERLINE OF SUPPORTS (OR AS SHOWN ON DETAILS).
 3.16 CONCRETE SLABS TO BE CURED BY METHOD COMPATIBLE WITH SPECIFIED FLOOR FINISH. WHERE ACCEPTABLE USE A LIQUID MEMBRANE-CURING COMPOUND AT THE MANUFACTURERS RECOMMENDED COVERAGE. SAW JOINTS TO BE CUT AS SOON AS POSSIBLE WITHOUT RAVELING THE SURFACE.
 3.17 LEVELING GROUT TO BE NON-SHRINK, NON-METALLIC TYPE, FACTORY PREMIXED GROUT IN ACCORDANCE WITH ASTM C 1107, HAVING A MINIMUM COMPRESSIVE STRENGTH OF NOT LESS THAN 34.5 MPa.
 3.18 SLEEVES, INSERTS, MECHANICAL OPENINGS, CONDUITS, PIPES, RECESSES, DEPRESSIONS, CURBS AND OTHER EMBEDDED ITEMS TO BE PROVIDED FOR AS SHOWN ON THE ARCHITECTURAL, MECHANICAL AND ELECTRICAL DRAWINGS AND AS REQUIRED BY EQUIPMENT MANUFACTURERS. INSTALLATION OF THESE ITEMS TO BE COORDINATED AND PROVIDED FOR PRIOR TO PLACING CONCRETE.
 3.19 EPOXY ADHESIVE SUCH AS EUCCO-#452 AS MANUFACTURED BY EUCLID CHEMICAL CO. OR HVA ADHESIVE SYSTEM AS MANUFACTURED BY HILTI, INC. SHALL BE USED WHERE REBAR DOWELS ARE TO BE INSTALLED INTO EXISTING CONCRETE.

CONCRETE CONT
 3.20 ANCHOR RODS TO BE ASTM F 1554 Fy=248 MPa MINIMUM, GALVANIZED, UNLESS NOTED OTHERWISE.
 3.21 UNLESS NOTED OTHERWISE, ALL CURBS SHALL BE REINFORCED WITH AT LEAST (1)-#14 CONTINUOUS AND #14 AT 450mm O.C. DOWELS TO THE SLAB-ON-GRADE.
 3.22 PROVIDE ADDITIONAL (2)-#14 x 600mm REINFORCING BARS IN SLAB-ON GRADE AT ALL RE-ENTRANT CORNERS. PLACE BARS AT MID-DEPTH OF SLAB WITH A CLEARANCE OF 50mm FROM CORNER UON.
 3.23 COLD-WEATHER PLACEMENT: COMPLY WITH ACI 306.1 AND AS FOLLOWS. PROTECT CONCRETE WORK FROM PHYSICAL DAMAGE OR REDUCED STRENGTH THAT COULD BE CAUSED BY FROST, FREEZING ACTIONS, OR LOW TEMPERATURES. SUBMIT A COLD WEATHER CONCRETING PLAN FOR APPROVAL.
 3.24 PROVIDE BONDING COMPOUND PER ASTM C 1059-99; SPECIFICATION FOR LATEX AGENTS FOR BONDING FRESH CONCRETE (GROUT) TO HARDENED CONCRETE.
 3.25 THE FORMED SURFACES FOR REINFORCED CONCRETE SHALL ACHIEVE A "CLASS A" FINISH WHEN EXPOSED OR A "CLASS B" FINISH WHEN RECEIVING PLASTER OR TILE AS PER SPECIFICATION SECTION 03 31 00 CAST-IN-PLACE STRUCTURAL CONCRETE.
 4.0 **CONCRETE MASONRY**
 4.1 MASONRY CONSTRUCTION SHALL CONFORM TO SPECIFICATION FOR MASONRY STRUCTURES (ACI 530.1) UON.
 4.2 STRENGTH OF MASONRY MATERIALS SHALL BE AS FOLLOWS:
 A. CONCRETE MASONRY UNITS SHALL BE NORMAL WEIGHT, GRADE N, TYPE 1, CONFORMING TO ASTM C-90 AND HAVE A MINIMUM COMPRESSIVE STRENGTH OF 13.1 MPa ON THE NET AREA.
 B. MORTAR SHALL CONFORM TO ASTM C-270 TYPE S.
 C. GROUT FOR MASONRY SHALL BE NORMAL WEIGHT AND HAVE A MINIMUM COMPRESSIVE STRENGTH OF 14 MPa AT 28 DAYS. GROUT SHALL CONFORM TO ASTM C476M. GROUT LIFTS SHALL NOT EXCEED 1500mm.
 D. REINFORCED MASONRY SHALL HAVE A STRENGTH F_m = 10.3 MPa. (F_m IS THE COMPRESSIVE STRENGTH OF THE MASONRY AT 28 DAYS AS DETERMINED BY PRISM TESTS).
 4.3 ALL VERTICAL REINFORCEMENT FOR CONCRETE MASONRY SHALL BE ASTM A615M-07, GRADE 420 MPa. ALL SPLICES SHALL BE LAPPED 48 BAR DIAMETERS MINIMUM.
 4.4 CMU CELLS THAT REQUIRE VERTICAL REINFORCING BARS AS INDICATED ON THE CONTRACT DRAWINGS AND/OR SPECS SHALL HAVE REINF BARS PLACED IN CENTERS OF CMU CELLS AND CONTINUOUSLY GROUTED UON.
 4.5 CONTRACTOR SHALL COORDINATE LOCATION OF ALL OPENINGS SEE ARCH, MECH, ELEC, AND PLUMBING SHEETS FOR SIZE AND LOCATION OF OPENINGS. PROVIDE SINGLE COURSE SOLID GROUTED BOND BEAMS REINFORCED WITH 2 #14 OVER ALL OPENINGS IN CMU WALLS. BEAR BOND BEAMS AT LEAST 200mm ON SOLID GROUTED, VERTICALLY REINFORCED CMU AT EACH SIDE OF THE OPENING. PASS VERTICAL JAMB REINFORCING THROUGH THE BOND BEAM AND EXTEND TO TOP OF WALL. NO OPENING IN CMU WALLS SHALL EXCEED 800mm.
 4.6 HORIZONTAL JOINT REINFORCING TO BE GALVANIZED, STANDARD CLASS, LADDER TYPE, CONFORMING TO ASTM A 82, SPACED AT EVERY OTHER COURSE UON. SIDE RODS TO BE 5mm WITH 4mm CROSS RODS. PROVIDE ONE-PIECE PREFABRICATED REINFORCING UNITS AT EVERY COURSE AT ALL WALL CORNERS AND INTERSECTIONS AND IN THE FIRST TWO COURSES ABOVE AND BELOW MASONRY OPENINGS. PROVIDE LAP AS RECOMMENDED BY THE MANUFACTURER WITH A MINIMUM OF 300mm. DISCONTINUE HORIZONTAL JOINT REINFORCING AT CONTROL JOINTS.
 4.7 ALL MASONRY TO BE CONSTRUCTED USING A RUNNING BOND PATTERN. FULL BED AND HEAD JOINTS MUST BE USED. ALL CORNERS TO BE TIED BY MASONRY BOND.
 4.8 DOWEL REINFORCED MASONRY WALLS TO FOUNDATION. SIZE DOWELS TO MATCH WALL REINFORCEMENT. LOCATE DOWELS IN CELLS TO CONTAIN WALL REINFORCEMENT. LAP DOWELS AND WALL REINFORCEMENT A MINIMUM OF 48 BAR DIAMETERS UON.
 4.9 DURING CONSTRUCTION, COVER AND PROTECT THE TOPS OF MASONRY WALLS AT THE END OF EACH DAY.



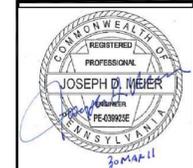
REV.	DATE	DESCRIPTION
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DESIGNED BY: JDM
 CHECKED BY: RMS
 DRAWN BY: RMS
 REVIEWED BY: JH
 SUBMITTED BY: JH
 DATE: 3/30/2011
 CONTRACT NO: W912ER-09-D-0002
 DRAWING CODE:
 FILE NAME:
 PLOT SCALE: NONE
 PLOT DATE: 3/30/2011

U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
 CORPS OF ENGINEERS
 APO AE 09356

SITE ADAPT DESIGN
 S09 - STORAGE BUILDING - ARCH SPAN
 ABBREVIATIONS AND GENERAL NOTES

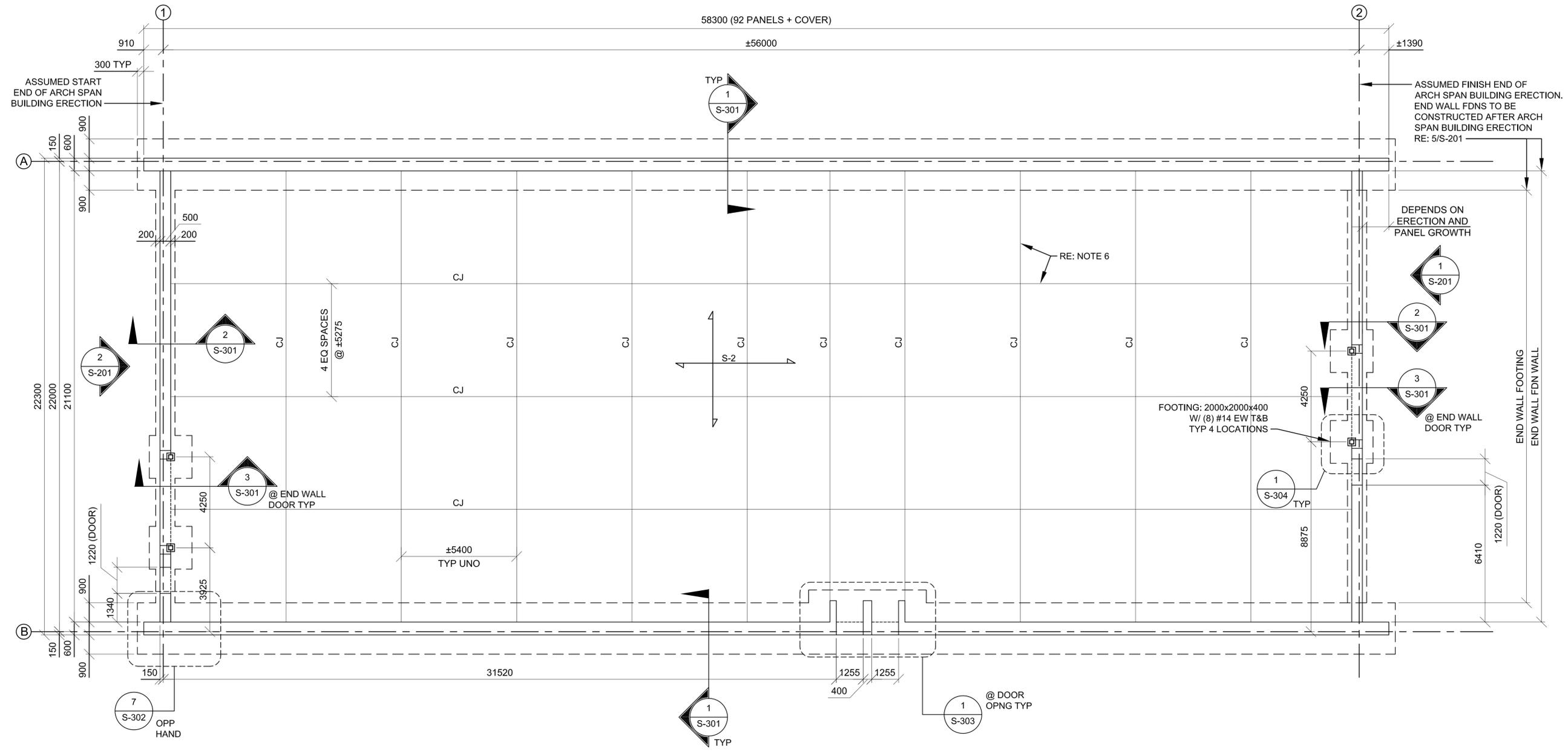
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S-001



UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.

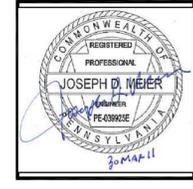
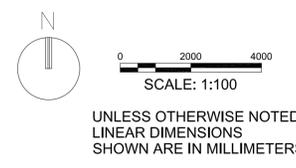
A B C D E F G H

6
5
4
3
2
1



1 FOUNDATION PLAN
S-101 SCALE: 1:100

- FOUNDATION PLAN NOTES:**
- RE: DRAWINGS S-001 AND S-002 FOR GENERAL NOTES AND DESIGN CRITERIA.
 - COORDINATE DIMENSIONS, WALL OPENINGS, ELEVATIONS, SECTIONS, AND DETAILS WITH ARCHITECTURAL DRAWINGS.
 - TOP OF SLAB ELEVATION MUST BE COORDINATED WITH SITE ADAPT CIVIL DRAWINGS. TOP OF FLOOR SLAB IS AT THE DATUM ELEVATION = 0. ALL ELEVATIONS ARE REFERENCED FROM THIS ELEVATION.
 - BOTTOM OF CONCRETE FOOTING ELEVATIONS = -950 (BELOW TOP OF SLAB, TYP UNO).
 - S-2 DENOTES A 150 CONCRETE SLAB-ON-GRADE REINFORCED WITH #14 @ 400. PLACE SLAB OVER 0.25 VAPOR RETARDER AND 100 COMPACTED GRANULAR SUB-BASE MATERIAL SUCH AS AASHTO #57 STONE.
 - SPACE SLAB CONTROL/CONSTRUCTION JOINTS AS SHOWN. CJ = CONTROL OR CONSTRUCTION JOINT, RE: 2/S-501.
 - PROVIDE ADDITIONAL SLAB REINFORCEMENT AT ALL RE-ENTRANT CORNERS, RE: 8/S-501.
 - RE: DRAWING S-501 FOR TYPICAL FOUNDATION AND SLAB DETAILS.
 - LOCATION OF FLOOR DRAINS ARE NOT SHOWN, COORDINATE LOCATIONS AND SLOPE OF SLAB WITH PLUMBING AND ARCHITECTURAL DRAWINGS.
 - COORDINATE MECHANICAL PENETRATIONS W/ M/E/P DRAWINGS.
 - TD INDICATES APPROXIMATE LOCATION OF TRENCH DRAIN. COORDINATE EXACT LOCATION W/ ARCHITECTURAL AND PLUMBING DRAWINGS.
 - PROVIDE REINFORCED CONCRETE WALK-OFF MATS AT ALL EXTERIOR DOORS RE: A-503 FOR DETAILS AND ARCHITECTURAL FLOOR PLAN FOR LOCATIONS.



SYMBOL	DESCRIPTION	DATE	APPR.	SYMBOL	DESCRIPTION	DATE	APPR.

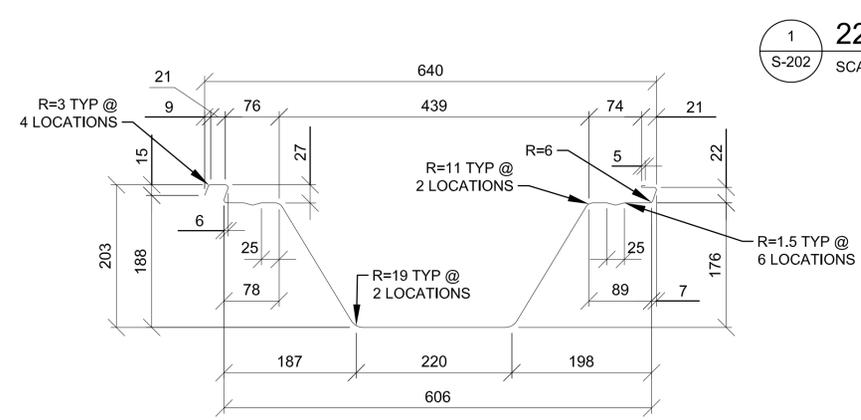
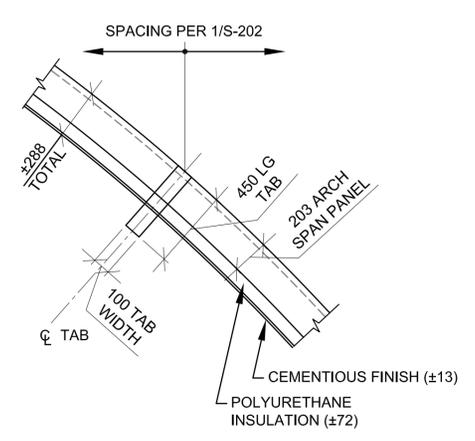
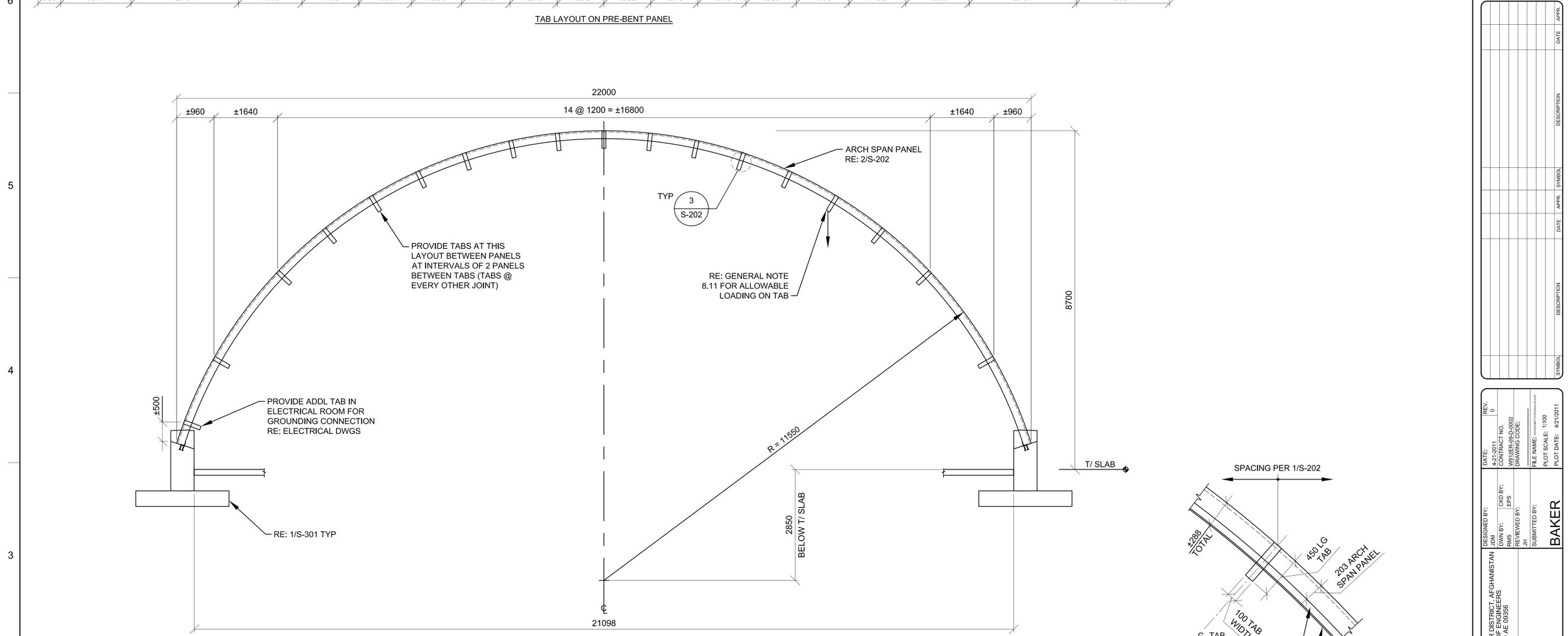
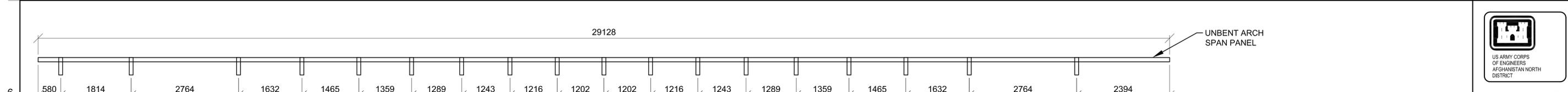
DESIGNED BY: JDM	CKD BY: EPS	REVIEWED BY: JH	SUBMITTED BY: BAKER
DATE: 3-30-2011	CONTRACT NO. W912ER-09-D-0002	DRAWING CODE: 	FILE NAME:
			PLOT SCALE: 1:100
			PLOT DATE: 3/30/2011

U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
FOUNDATION PLAN

SHEET REFERENCE NUMBER:
S-101

3/30/2011 2:34 PM



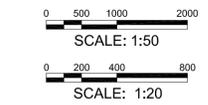
1 22m BUILDING SECTION
S-202 SCALE: 1:50

NOMINAL STRENGTH VALUES PER PANEL (WITHOUT FACTOR OF SAFETY)

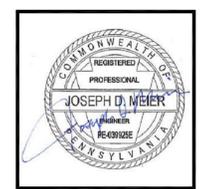
SHEAR : $V_n = 1655.6 \text{ kg}$
 AXIAL COMPRESSION : $P_n = 11589.3 \text{ kg}^*$
 POSITIVE MOMENT : $+M_n = 2638.08 \text{ kg-m}$
 NEGATIVE MOMENT : $-M_n = 767.64 \text{ kg-m}^*$

* THE CURVING PROCESS REDUCES THE NOMINAL STRENGTH OF ARCH-SPAN PANELS IN NEGATIVE FLEXURE AND COMPRESSION. THESE VALUES ARE BASED ON TESTING OF PANELS.

3 STEEL TAB DETAIL
S-202 SCALE: 1:20



UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



2 240 PROFILE - PROVIDE 1.52mm (16 GA) THICKNESS
S-202 SCALE: NTS



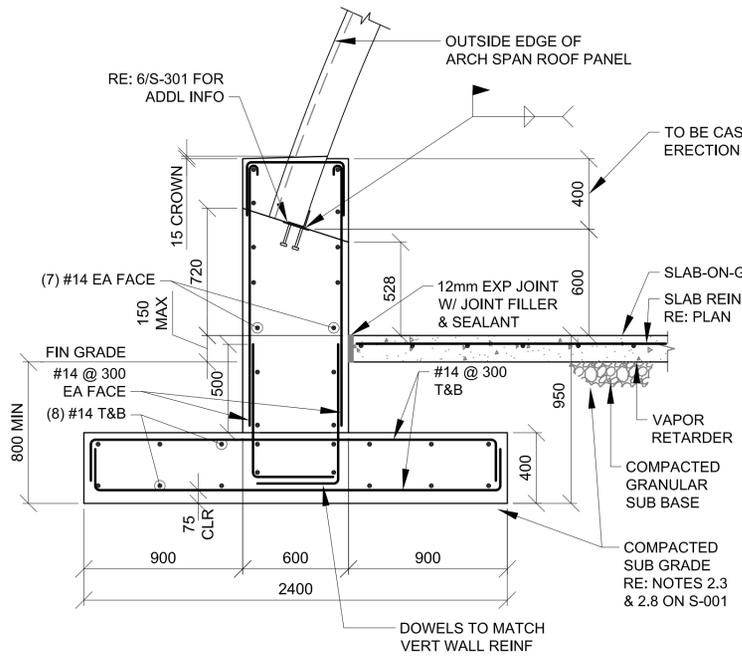
REV.	DATE	DESCRIPTION
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DESIGNED BY: JDM	CKD BY: EPS	REVIEWED BY: JH	SUBMITTED BY: BAKER
DWN BY: RMS			
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			PLOT DATE: 4/21/2011

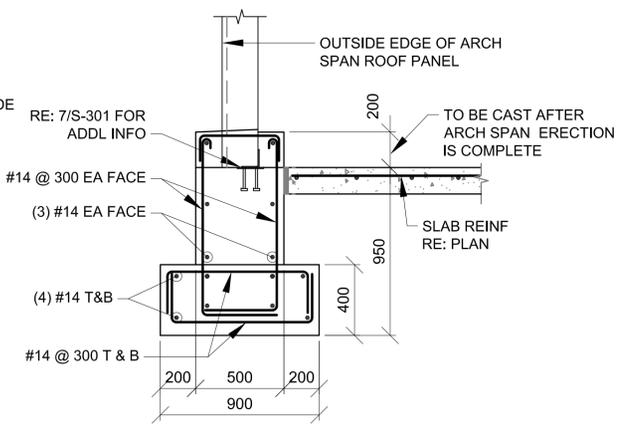
U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
 CORPS OF ENGINEERS
 APO AE 09356

SITE ADAPT DESIGN
 S09 - STORAGE BUILDING - ARCH SPAN
 BUILDING SECTION AND DETAILS

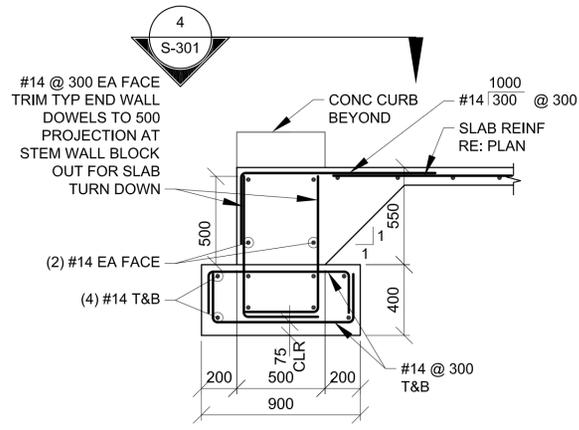
SHEET REFERENCE NUMBER:
S-202



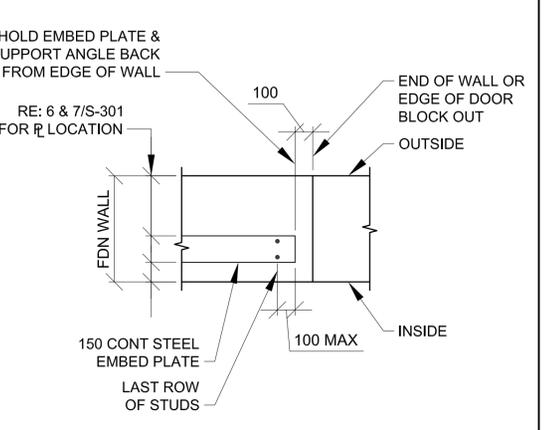
1 FOUNDATION WALL SECTION
S-301 SCALE: 1:20



2 END WALL FOUNDATION SECTION
S-301 SCALE: 1:20

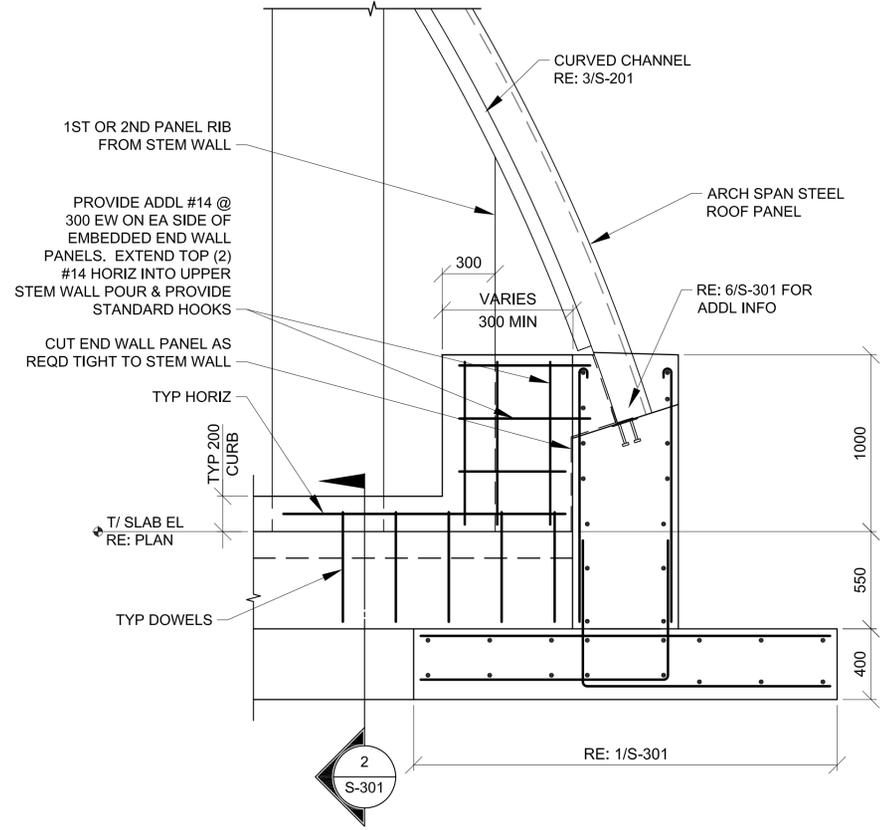


3 END WALL FDN SECTION TYP @ DOOR
S-301 SCALE: 1:20

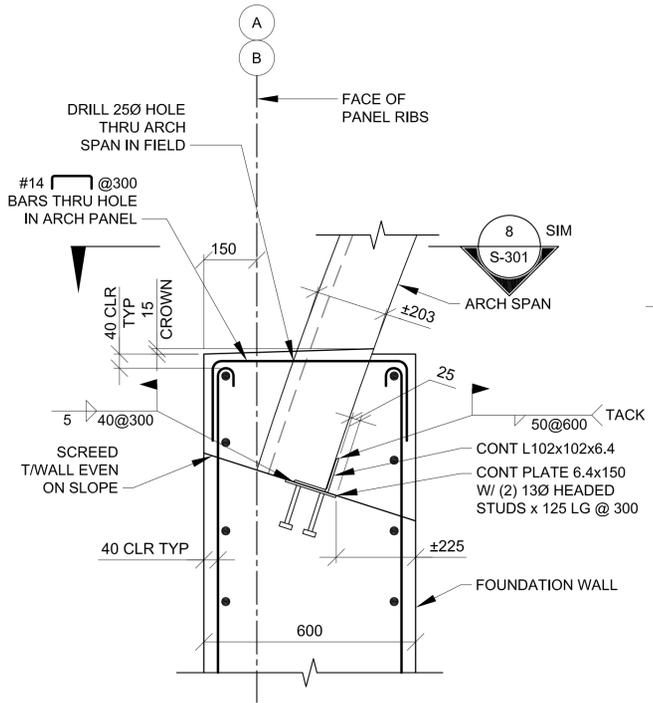


4 PLAN VIEW TYP AT END OF FDN WALL OR AT DOOR BLOCKOUT
S-301 SCALE: 1:20

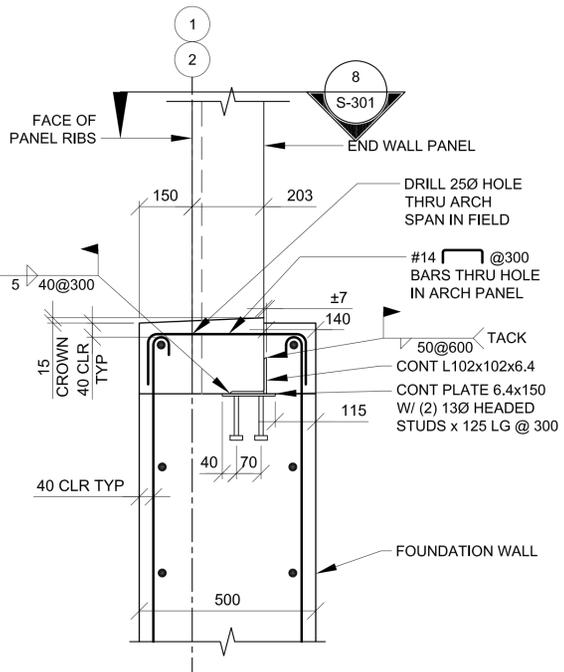
NOTE:
PROVIDE OPENING IN STEM WALL PER
PLAN (200mm WIDER THAN DOOR, 100mm EA SIDE)



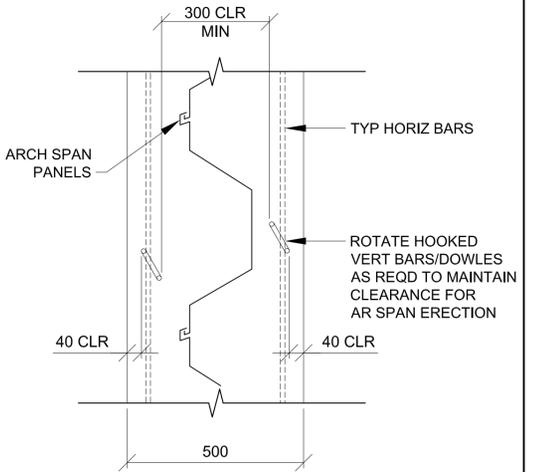
5 FOUNDATION END WALL SECTION
S-301 SCALE: 1:20



6 TYP ARCH SPAN CONN TO SIDE WALL FOUNDATION
S-301 SCALE: 1:10



7 TYP ARCH SPAN CONN TO END WALL FOUNDATION
S-301 SCALE: 1:10



8 PLAN DETAIL
S-301 SCALE: 1:10



UNLESS OTHERWISE NOTED,
LINEAR DIMENSIONS
SHOWN ARE IN MILLIMETERS.



REV.	DATE	DESCRIPTION
0		

DESIGNED BY:	JDM
DRAWN BY:	RMS
REVIEWED BY:	JH
SUBMITTED BY:	

U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
FOUNDATION SECTIONS

SHEET REFERENCE NUMBER:
S-301

NOT USED

NOT USED

NOT USED

1 LATRINE SECTION
S-302 SCALE: 1:20

2 LAVATORY SINK SECTION
S-302 SCALE: 1:20

3 TRENCH DRAIN SECTION
S-302 SCALE: 1:10

NOT USED

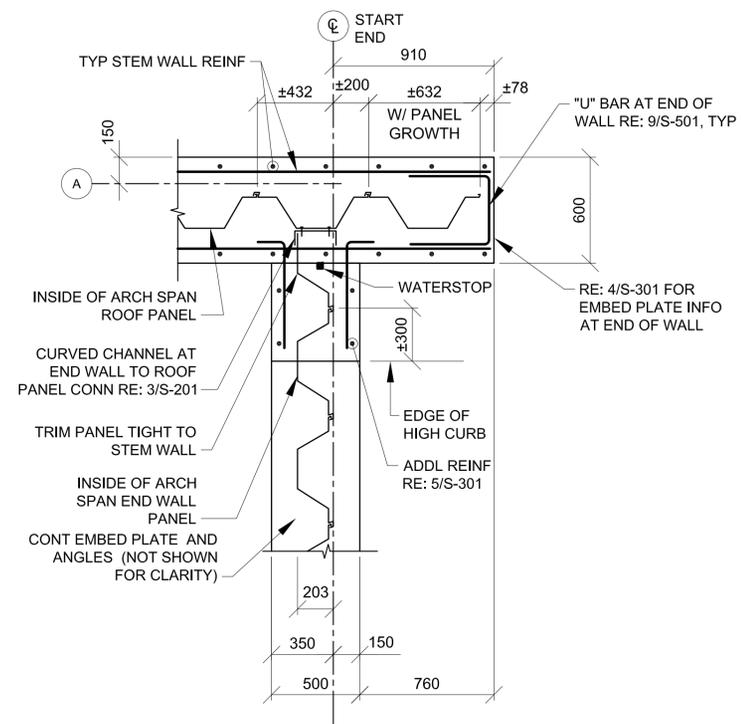
NOT USED

NOT USED

4 SECTION
S-302 SCALE: 1:20

5 SECTION
S-302 SCALE: 1:20

6 CHAI BOILER SECTION
S-302 SCALE: 1:20



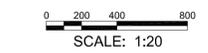
NOT USED

NOT USED

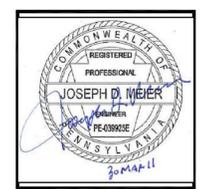
7 PLAN DETAIL
S-302 SCALE: 1:20

8 FIRE SHUTTER FDN SECTION
S-302 SCALE: 1:20

9 COLUMN/SLAB INT ISOLATION JOINT
S-302 SCALE: NTS



UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



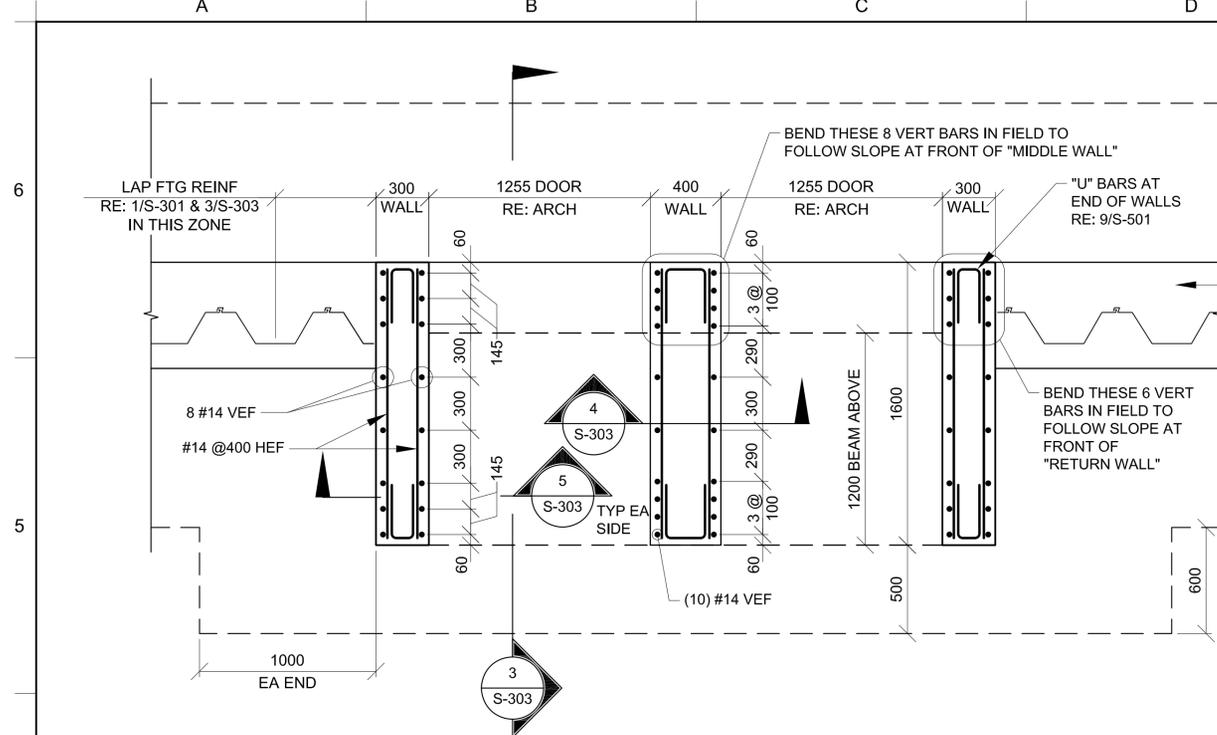
REV.	DATE	DESCRIPTION	SYMBOL	DATE	DESCRIPTION
0	3-30-2011				

DESIGNED BY: JDM	CKD BY: RMS	REVIEWED BY: JH	SUBMITTED BY: BAKER
DATE: 3-30-2011	CONTRACT NO: W912ER-09-D-0002	DRAWING CODE:	FILE NAME: 44141001000000000000
			PLOT DATE: 3/30/2011

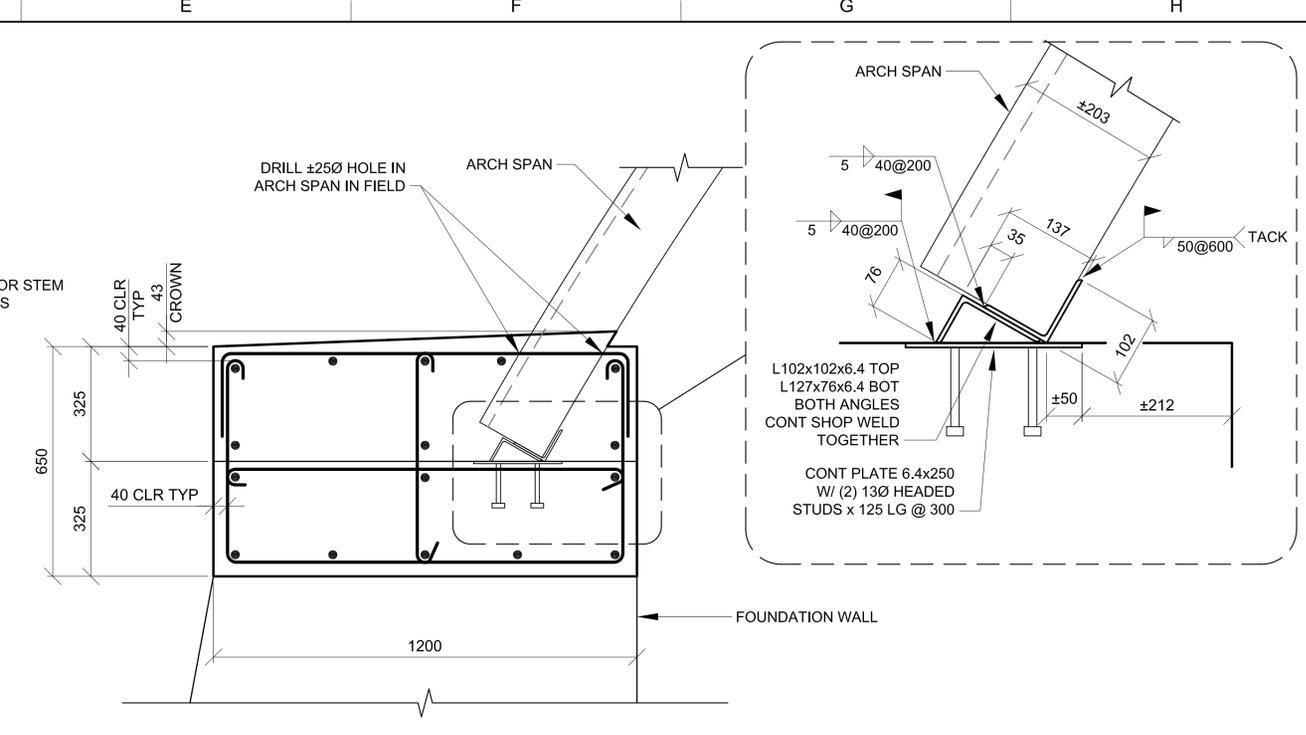
U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
SECTIONS

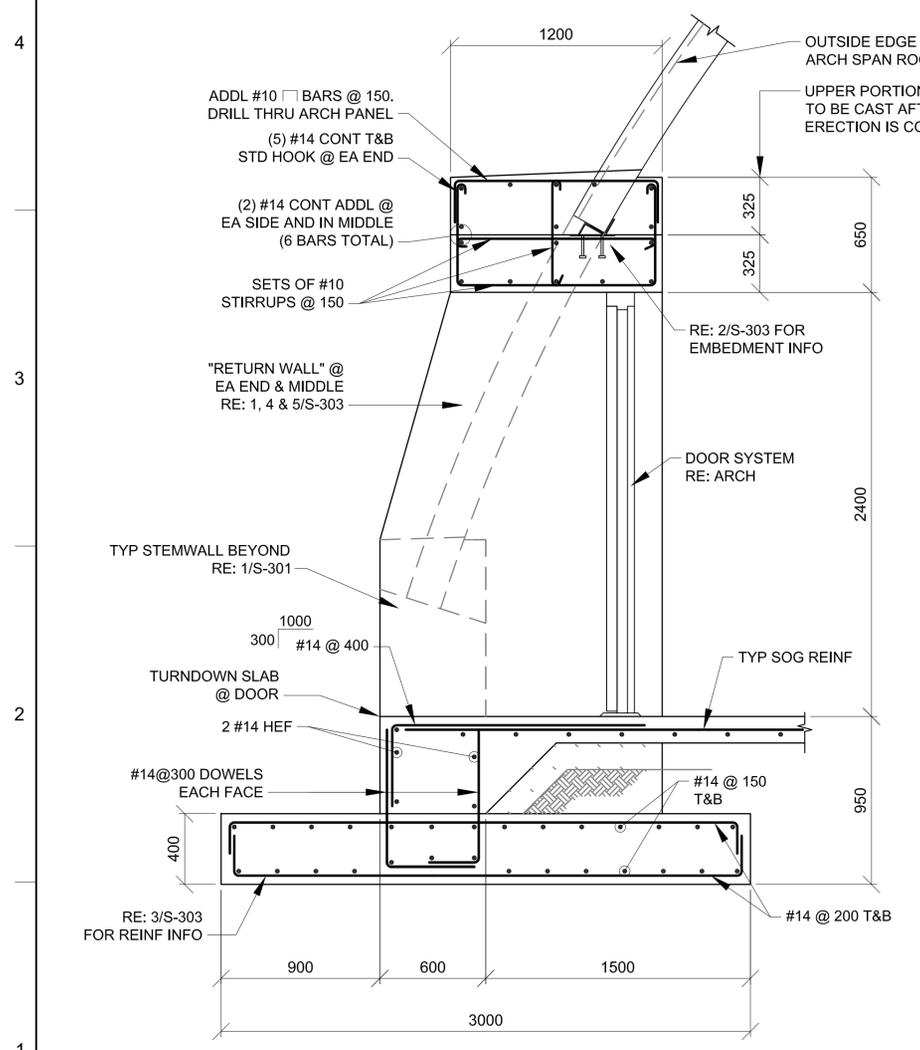
SHEET REFERENCE NUMBER:
S-302



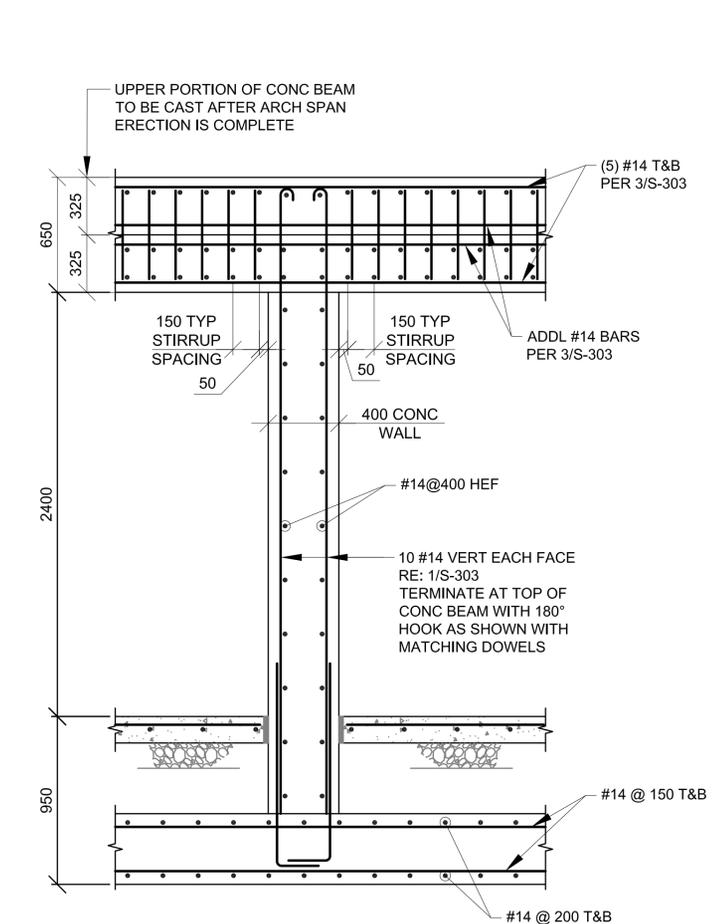
1 PLAN DETAIL AT SIDE WALL DOOR/WINDOW
S-303 SCALE: 1:20



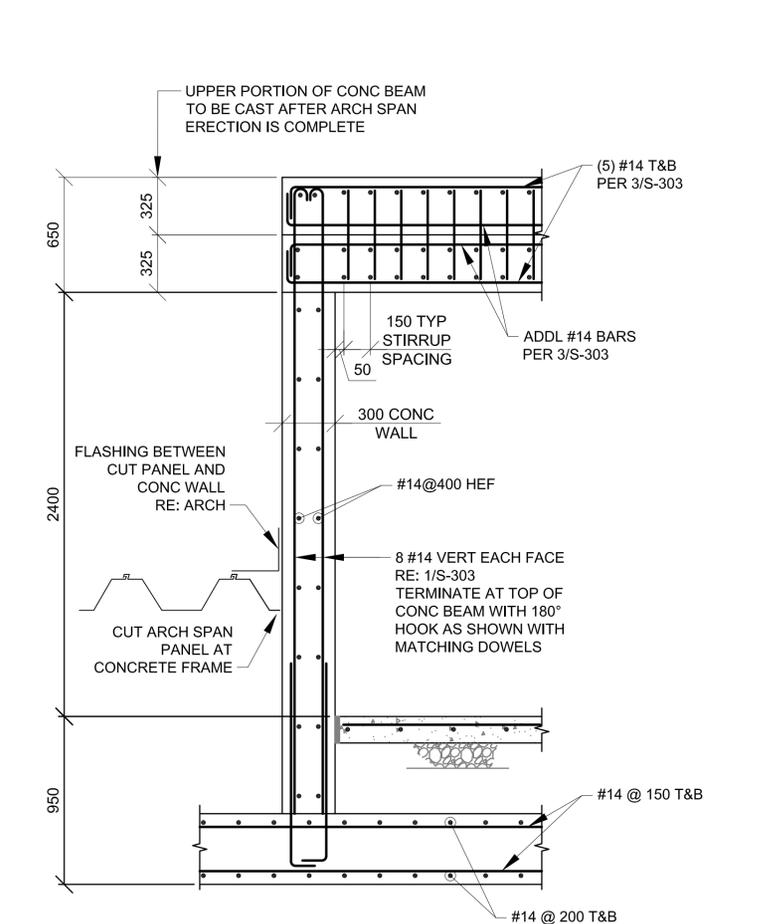
2 CONCRETE BEAM SECTION
S-303 SCALE: 1:10



3 SECTION @ SIDEWALL DOOR
S-303 SCALE: 1:20



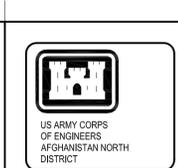
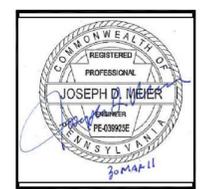
4 SECTION
S-303 SCALE: 1:20



5 SECTION
S-303 SCALE: 1:20



UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



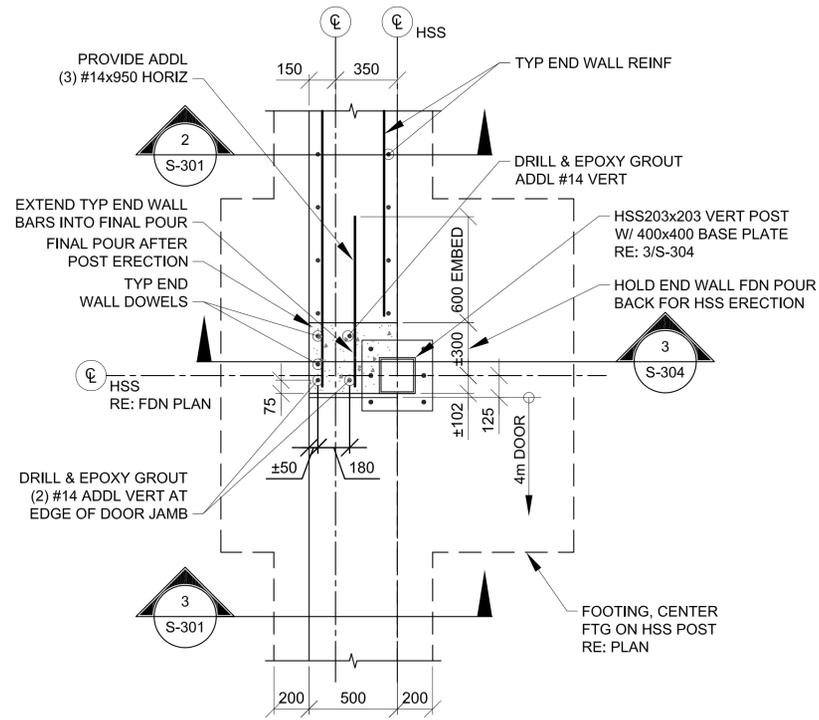
REV	DATE	DESCRIPTION
0		

DATE: 3-30-2011	CONTRACT NO: W912ER-09-D-0002	DRAWING CODE:	FILE NAME: 1100	PLOT DATE: 3-30-2011
DESIGNED BY: JDM	CKD BY: EPS	REVIEWED BY: JH	SUBMITTED BY: BAKER	

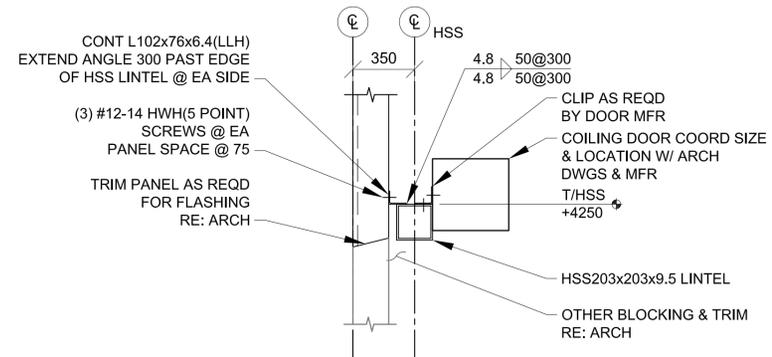
U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
SIDE WALL CONCRETE FRAME SECTIONS

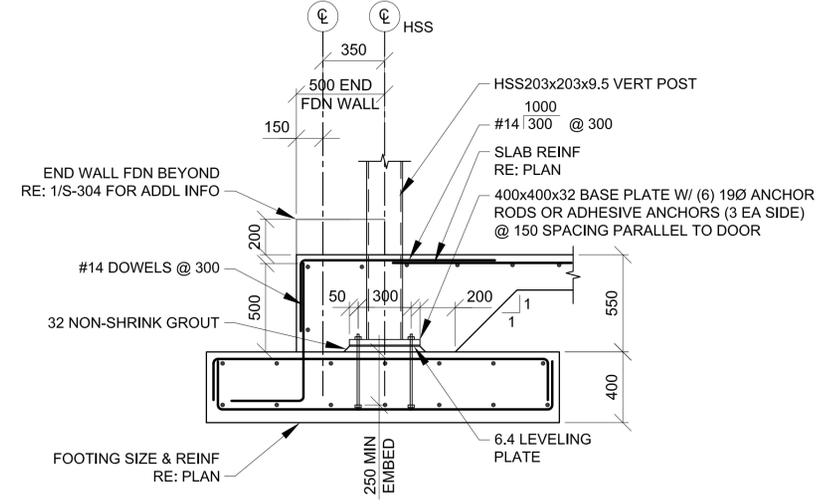
SHEET REFERENCE NUMBER:
S-303



1 HSS POST AT OVER HEAD DOOR PLAN
S-304 SCALE: 1:20

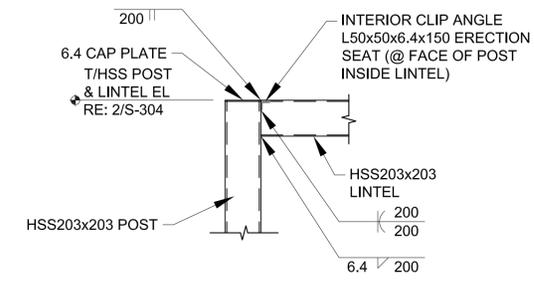


2 HSS LINTEL AT OVER HEAD DOOR
S-304 SCALE: 1:20

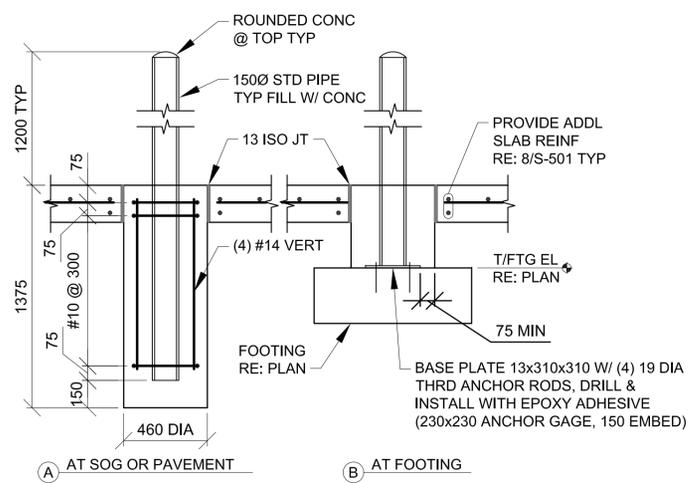


3 HSS POST AT OVER HEAD DOOR
S-304 SCALE: 1:20

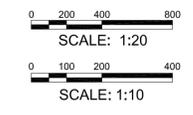
4 NOT USED
S-304 SCALE: 1:20



5 OVER HEAD DOOR POST TO LINTEL
S-304 SCALE: 1:20



6 TYP BOLLARD DETAIL
S-304 SCALE: 1:20



UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



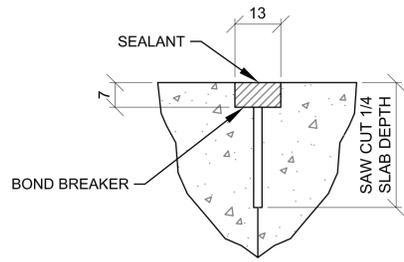
REV.	DATE	DESCRIPTION
0		

DESIGNED BY: JDM	CKD BY: RMS	REVIEWED BY: JH	SUBMITTED BY: JH
DATE: 3-30-2011	CONTRACT NO: W912ER-09-D-0002	DRAWING CODE:	FILE NAME: 0912ER09D0002.DWG
			PLOT SCALE: 1:100
			PLOT DATE: 3-30-2011

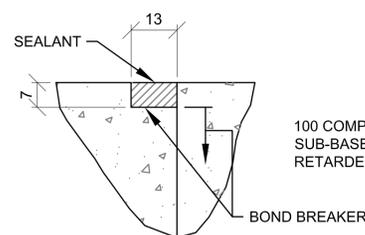
U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
OVERHEAD DOOR SECTIONS

SHEET REFERENCE NUMBER:
S-304



CONTROL JOINT DETAIL



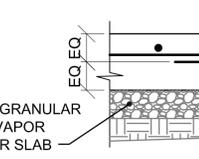
CONSTRUCTION JOINT DETAIL

TYP CONCRETE SLAB JOINT FINISH DETAILS

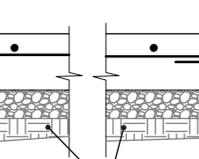
1 S-501 SCALE: NTS

SEE TYPICAL CONCRETE SLAB JOINT FINISH DETAILS, THIS SHEET

SEE TYPICAL CONCRETE SLAB JOINT FINISH DETAILS, THIS SHEET



CONTROL JOINT DETAIL



CONSTRUCTION JOINT DETAIL

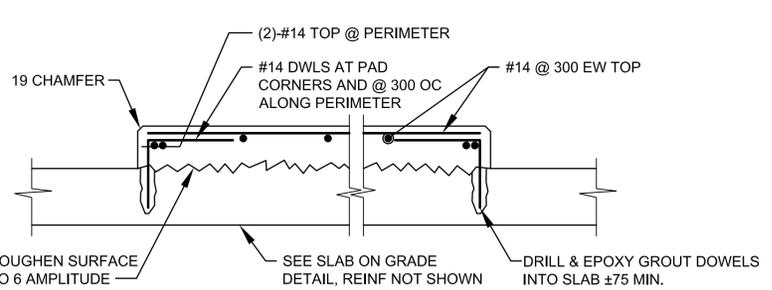
TYP SLAB ON GRADE JOINT DETAILS

2 S-501 SCALE: NTS

30 CLR @ S-1
45 CLR @ S-2
55 CLR @ S-3

100 COMPACTED GRANULAR SUB-BASE WITH VAPOR RETARDER UNDER SLAB

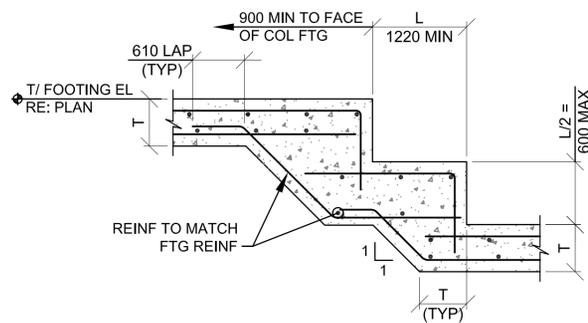
200 x 450 LONG SMOOTH DWL @ 300 OC CENTERED IN SLAB, PROVIDE BOND BREAKER ON ONE SIDE



INTERIOR EQUIPMENT PAD DETAIL

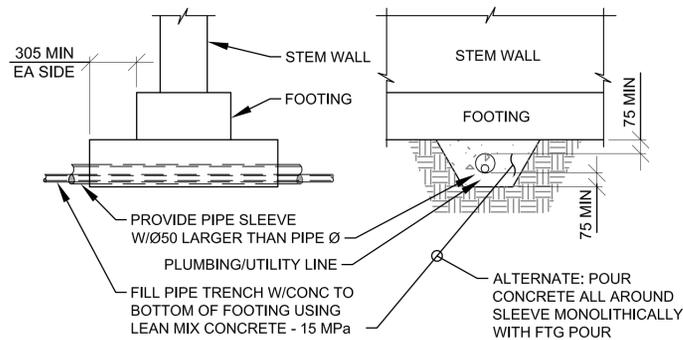
INTERIOR EQUIPMENT PAD DETAIL

3 S-501 SCALE: NTS



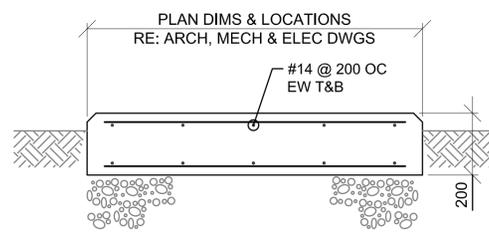
STEPPED FOOTING (2 LAYERS REINF)

4 S-501 SCALE: NTS



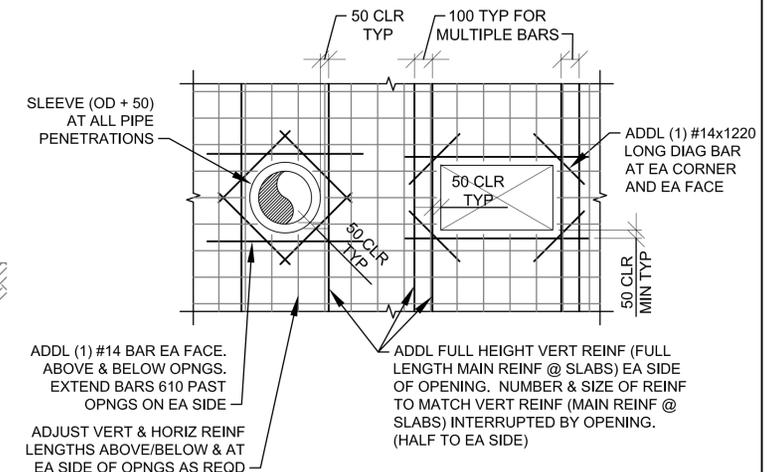
UTILITY PIPE UNDER WALL FTG

5 S-501 SCALE: NTS



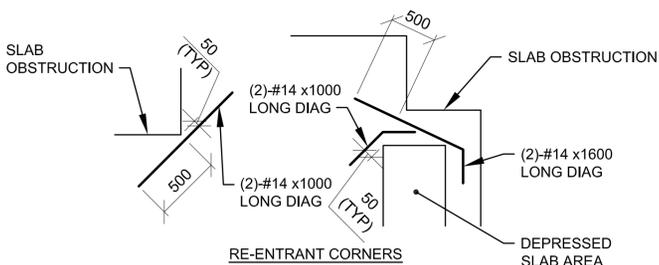
EQUIPMENT PAD (EXTERIOR)

6 S-501 SCALE: NTS



OPENING THRU CONC WALL

7 S-501 SCALE: NTS

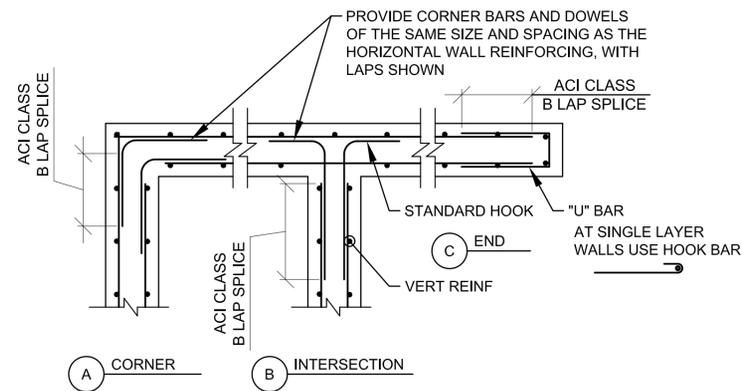


RE-ENTRANT CORNERS

- DETAIL NOTES:
- WHERE MORE THAN ONE ADDITIONAL BAR IS REQUIRED PARALLEL TO THE EXISTING SLAB/WALL REINFORCING THE ADDITIONAL REINFORCING BARS SHALL BE SPACED AT 100 ON CENTER.
 - ADDITIONAL REINFORCING PARALLEL TO THE SLAB/WALL REINFORCING SHALL BE #16 BARS THAT PROVIDE A STEEL AREA ON EACH SIDE OF THE OPENING EQUAL TO 1/2 THE AREA OF THE REINFORCING CUT BY THE OPENING.
 - FOR OPENINGS WITH SIDES OR DIAMETERS LESS THAN 300 SPREAD THE SLAB/WALL REINFORCING TO CLEAR THE OPENING.

CONCRETE REINF DETAILS

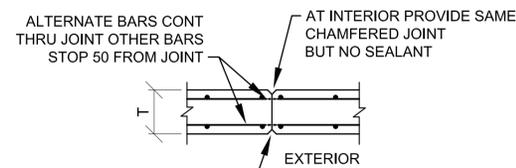
8 S-501 SCALE: NTS



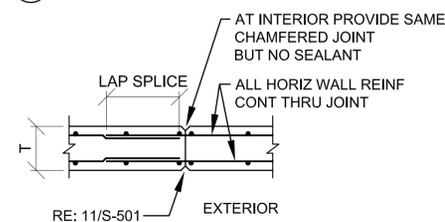
CONCRETE WALL CORNER REINFORCING

9 S-501 SCALE: NTS

NOTE: WALLS WITH SINGLE LAYER OF REINFORCING SIMILAR



CONTROL JOINT (@ 4500 MAX)

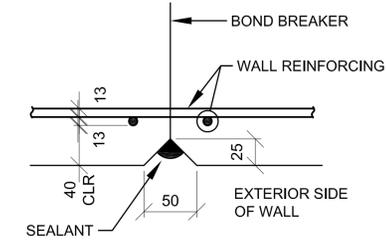


CONSTRUCTION JOINT (@ 18000 MAX)

CONCRETE WALL JOINTS

10 S-501 SCALE: NTS

NOTE: WALLS WITH SINGLE LAYER OF REINFORCING SIMILAR



TYP CONCRETE WALL JOINT FINISH DETAIL

11 S-501 SCALE: NTS

UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



US ARMY CORPS OF ENGINEERS AFGHANISTAN NORTH DISTRICT

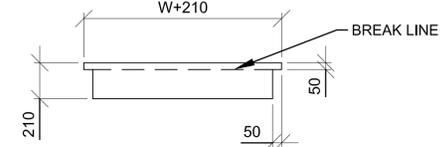
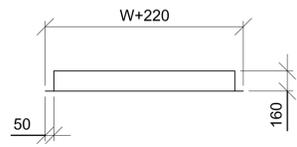
DATE	APPR.	SYMBOL	DESCRIPTION

DESIGNED BY: JDM	CKD BY: EPS	REVIEWED BY: JH	SUBMITTED BY: JH
DATE: 3-30-2011	CONTRACT NO: W912ER-09-D-0002	DRAWING CODE: EPS	FILE NAME: 3032011

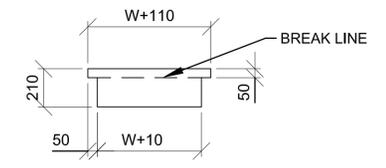
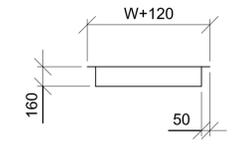
U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
TYPICAL DETAILS

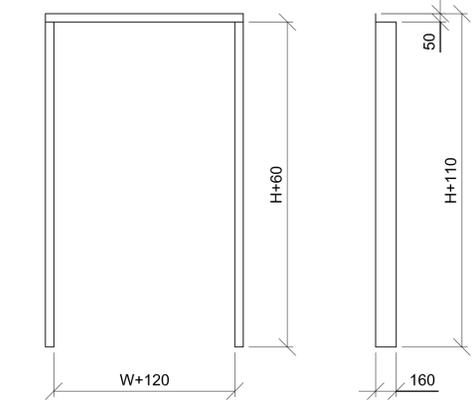
SHEET REFERENCE NUMBER:
S-501



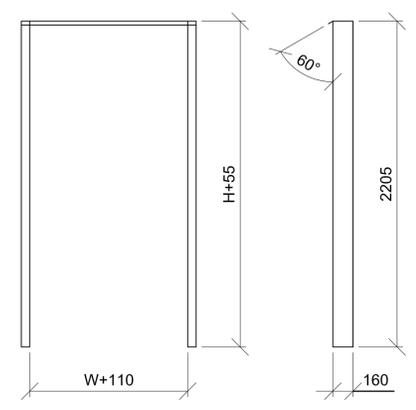
HEADER DETAIL



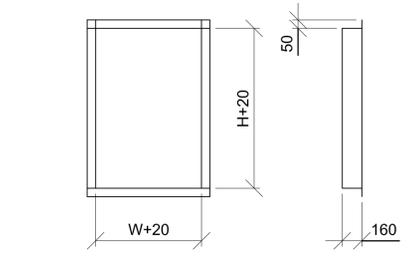
HEADER DETAIL



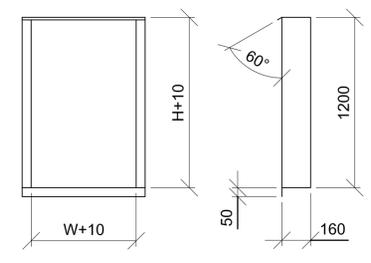
INDOOR FRAME



OUTDOOR FRAME



INDOOR FRAME



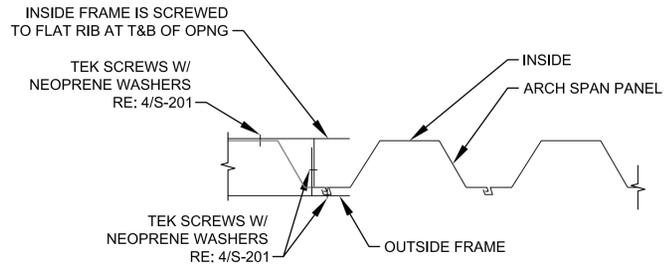
OUTDOOR FRAME

1 240 DOOR DETAIL
S-502 SCALE: NTS

2 240 WINDOW/MECHANICAL OPENING DETAIL
S-502 SCALE: NTS

- DOOR & WINDOW FRAME NOTES:**
1. ALL DIMENSIONS ARE INSIDE DIMENSIONS.
 2. WELD AND GRIND SMOOTH ALL CORNERS.
 3. FRAME THICKNESS = 2.5mm.
 4. ALL FRAMES, INTERIOR AND EXTERIOR, TO BE GALVANIZED.
 5. RE: 1/A-601 FOR DOOR WIDTHS (W) AND HEIGHTS (H).
 6. RE: 3/A-601 FOR WINDOW WIDTHS (W) AND HEIGHTS (H).
 7. RE: SCHEDULE BELOW FOR LOUVER DIMENSIONS.
 8. CUT OPENING DIMENSIONS:
 - WINDOW/LOUVER - W+130
 - DOOR - W+130
 - WINDOW/LOUVER - H+30
 - DOOR - H+65
 9. RE: 3/S-502 FOR TYP JAMB DETAIL

MECH OPENING FRAME SCHEDULE		
TYPE	W	H
M1	1350	1500
M2	940	940



3 TYP JAMB SECTION
S-502 SCALE: NTS



SYMBOL	DESCRIPTION	DATE	APPR.	DATE	APPR.

DATE: 3-30-2011	REV: 0
CONTRACT NO: W912ER-09-D-002	DESIGNED BY: JDM
DRAWING CODE: EPS	DWN BY: RMS
FILE NAME: 240DOORWINDOWDETAIL.dwg	CHKD BY: JH
PLOT SCALE: NONE	REVIEWED BY: JH
PLOT DATE: 3-30-2011	SUBMITTED BY: JH
BAKER	

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
DOOR/WINDOW/MECHANICAL
OPENING FRAME DETAILS

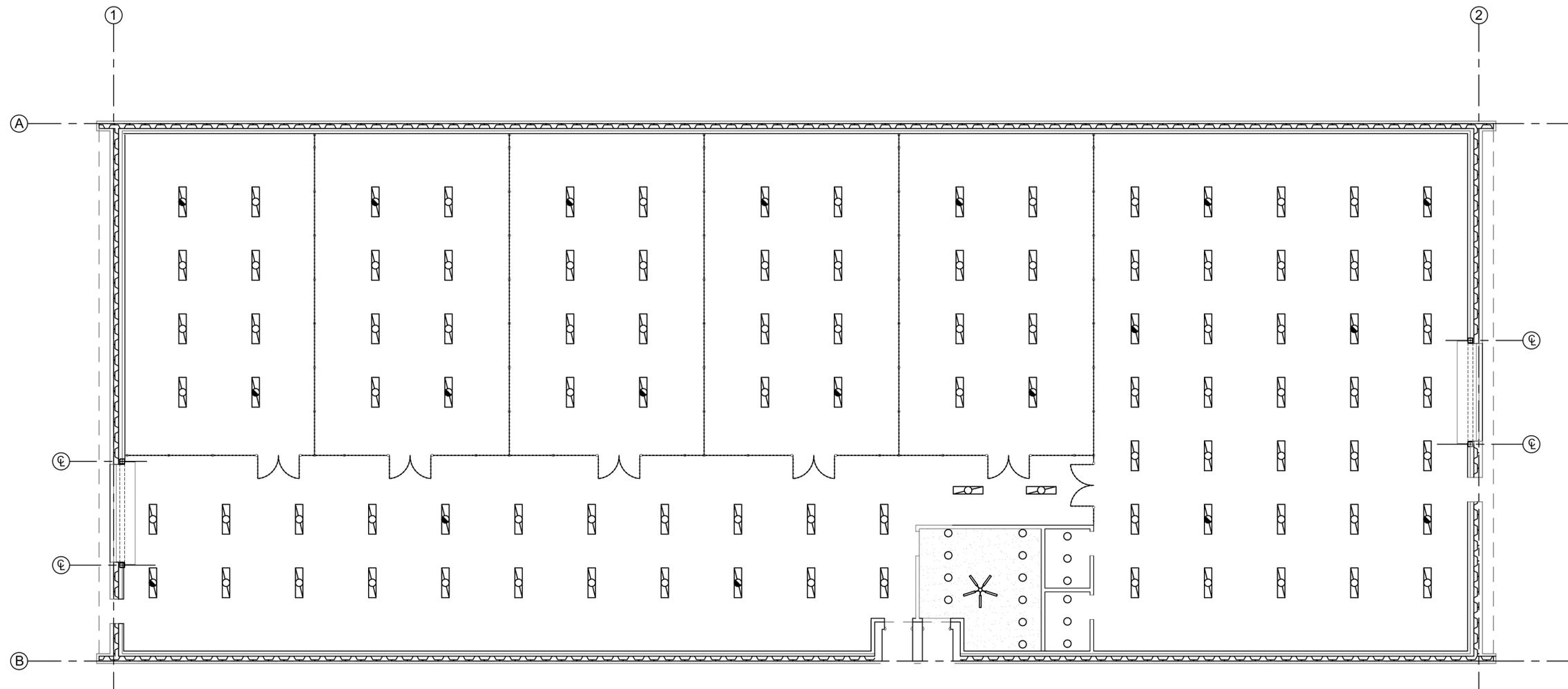


UNLESS OTHERWISE NOTED,
LINEAR DIMENSIONS
SHOWN ARE IN MILLIMETERS.

SHEET
REFERENCE
NUMBER:
S-502

A B C D E F G H

6
5
4
3
2
1



1 REFLECTED CEILING PLAN
A-102 SCALE: 1:100

CEILING LEGEND:

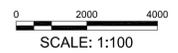
-  600mm X 1200mm METAL PANEL SUSPENDED CEILING SYSTEM
-  NO FINISHED CEILING, EXPOSED STRUCTURE (SEE FINISH SCHEDULE)
-  GYPSUM WALLBOARD CEILING (SEE FINISH SCHEDULE)
-  300mm X 1200mm FLUORESCENT LIGHT FIXTURE
-  600mm X 1200mm FLUORESCENT LIGHT FIXTURE
-  300mm X 1200mm FLUORESCENT LIGHT FIXTURE NORMAL/EMERGENCY
-  600mm X 1200mm FLUORESCENT LIGHT FIXTURE NORMAL/EMERGENCY
-  SUSPENDED LIGHT FIXTURE
-  WALL MOUNTED LIGHT FIXTURE
-  DOWNLIGHT
-  EXIT SIGN
-  SMOKE DETECTOR
-  BATTERY PACK
-  RELIEF RETURN DIFFUSER
-  SUPPLY DIFFUSER
-  EXHAUST DIFFUSER
-  ACCESS PANEL
-  CEILING FAN

GENERAL NOTES:

- A. CEILING SHALL BE 2.65M A.F.F. UNLESS NOTED OTHERWISE OR EXPOSED STRUCTURE.
- B. REFER TO SHEET A603 FOR FINISH SCHEDULE
- C. REFER TO STRUCTURAL DRAWINGS NOTES FOR LIGHT GAUGE CEILING FRAMING CRITERIA.
- D. REFER TO ELECTRICAL DRAWINGS TO COORDINATE EQUIPMENT ABOVE CEILING GRID.
- E. LOCATION OF LIGHT FIXTURES AND FANS AS INDICATED ON THIS REFLECTED CEILING PLAN TAKES PRECEDENCE OVER ALL RELATIVE POSITIONS AS SHOWN ON ELECTRIC AND MECHANICAL DRAWINGS. U.N.O. INSTALL FIXTURES WITH EQUAL SPACING BETWEEN EACH OTHER TO THE GREATEST EXTENT POSSIBLE AND AS GRAPHICALLY SHOWN IN THIS LAYOUT. SEE ELECTRICAL DRAWINGS FOR SUPPORT AND WIRING INFORMATION. IN AREA WHERE SUSPENDED CEILING SUPPORTS OVERLAP LIGHTING LOCATIONS SHIFT LIGHTING 25MM OFF OF GRID TO RESOLVE CONFLICT.

KEY NOTES:

1. ACCESS PANEL



UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



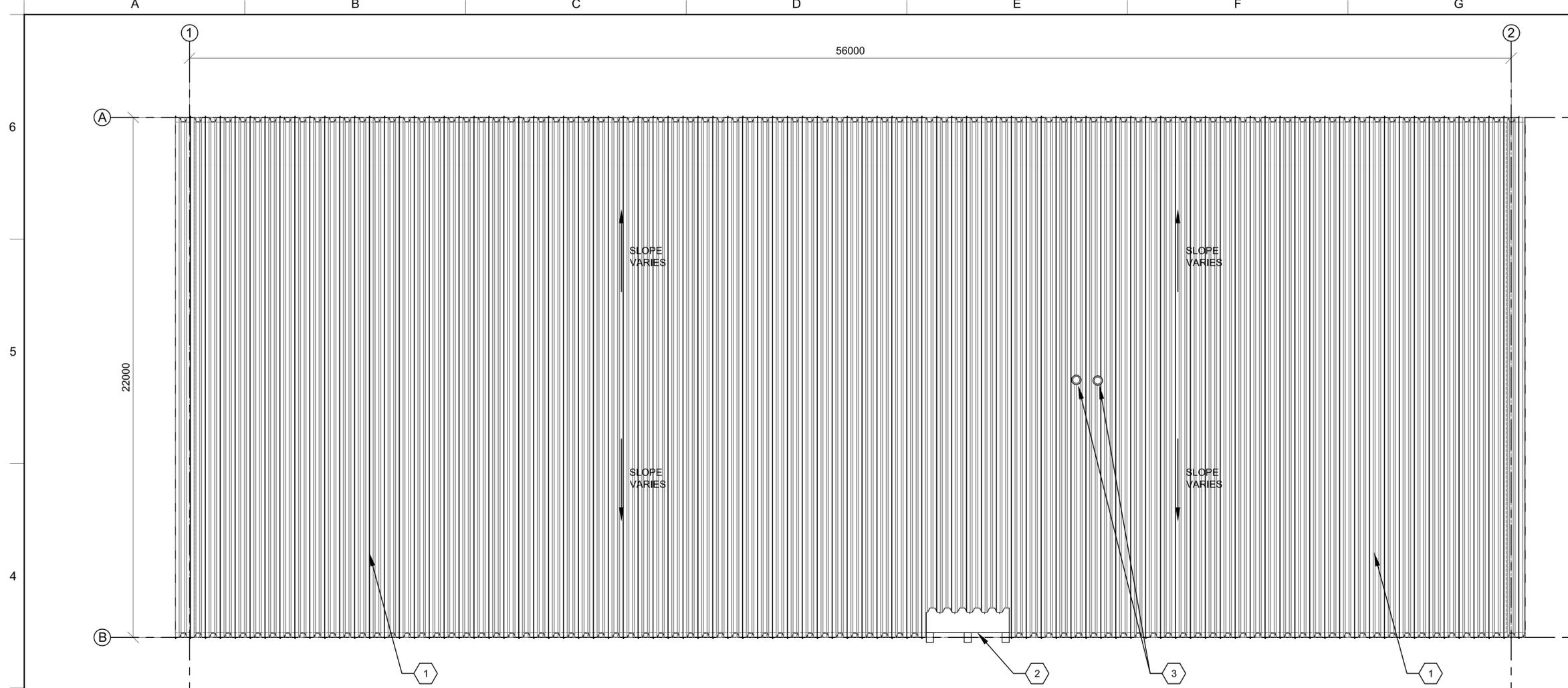
REV.	DATE	DESCRIPTION
0		

DESIGNED BY: PSS, SE, MR	CKD BY: SE, MDH, AH	PGS, SE, MR
DWN BY: SE, MDH, AH	REVISED BY: JH	SUBMITTED BY: BAKER

U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
REFLECTED CEILING PLAN

SHEET REFERENCE NUMBER:
A-102



1
A-103
ROOF PLAN
SCALE: 1:100

- KEY NOTES:**
- PRE-FINISHED METAL ARCH-SPAN CONSTRUCTION
 - DOOR OR WINDOW DORMER
 - RIDGE CAP SEE MECH M-501

- GENERAL NOTES:**
- THE APPROXIMATE LOCATION OF ROOF DEVICES AND PENETRATIONS ARE SHOWN ON THE ROOF PLAN FOR INFORMATION ONLY. THE CONTRACTOR SHALL BE RESPONSIBLE FOR UNDERSTANDING THE ACTUAL LOCATION OF THESE AND ALL OTHER ITEMS PRIOR TO BEGINNING CONSTRUCTION. COORDINATE ALL ROOF PENETRATIONS WITH STRUCTURAL, MECHANICAL AND PLUMBING WORK.
 - PLUMBING VENT PENETRATIONS SHALL TERMINATE 300 MM MINIMUM ABOVE THE ROOF.
 - UNLESS OTHERWISE NOTED, NOTES, DETAILS OR FEATURES INDICATED FOR ONE CONDITION SHALL BE APPLICABLE FOR ALL ALIKE AND SIMILAR CONDITIONS.
 - STOCKPILING OF MATERIALS, EQUIPMENT AND ANY OTHER ITEMS ON THE ROOF IS PROHIBITED.
 - ROOFS SHALL BE PRE-FINISHED METAL K-SPAN.



UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



SYMBOL	DESCRIPTION	DATE	APPR.	SYMBOL	DESCRIPTION	DATE	APPR.

DESIGNED BY: P.G.S. SE, MR	CKD BY: P.G.S. SE, MR	DATE: 3-30-2011	REV: 0
DWN BY: SE, MDH, AH	FILE NAME: A-103-ROOF PLAN	CONTRACT NO. W912ER-09-D-0002	PLOT DATE: 3-30-2011
REVIEWED BY: JH	PLANT SCALE: 1:100	DRAWING CODE:	
SUBMITTED BY: BAKER			

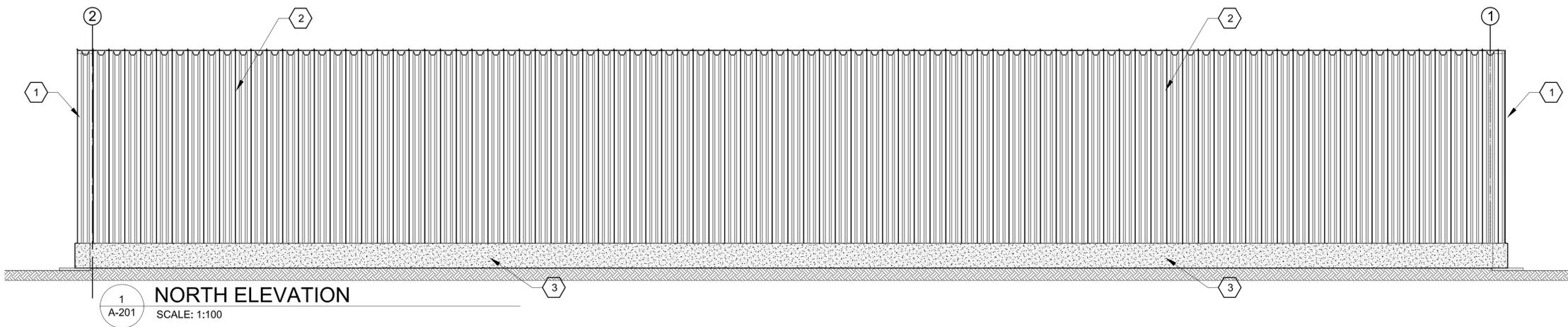
U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
ROOF PLAN

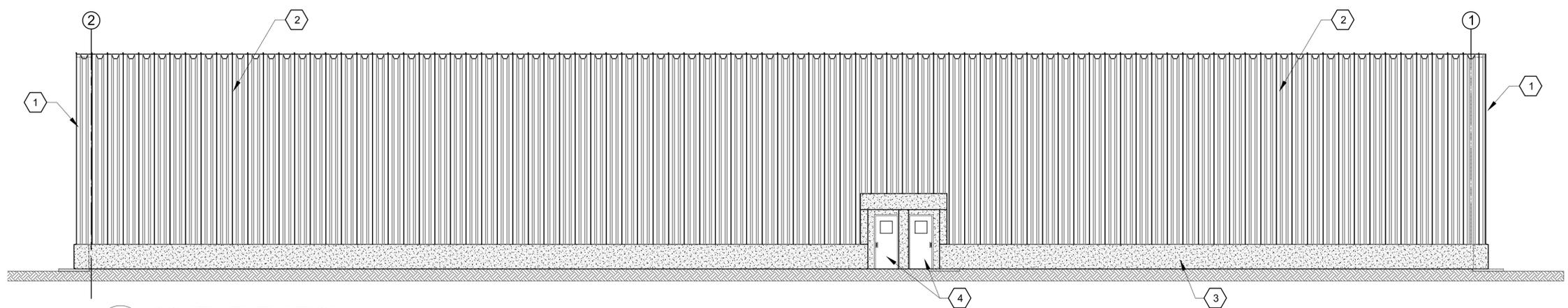
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A-103

A B C D E F G H

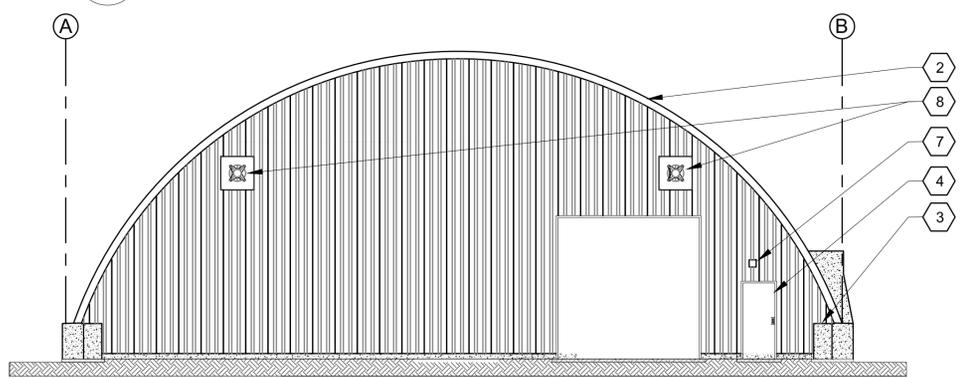
6
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2
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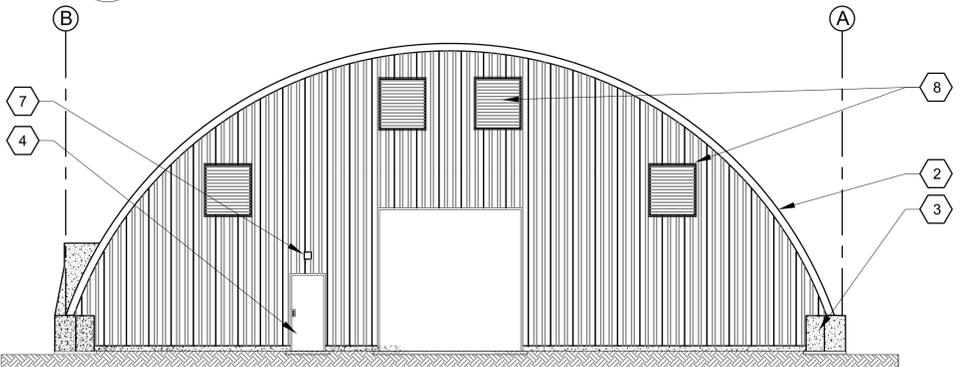
1 NORTH ELEVATION
A-201 SCALE: 1:100



2 SOUTH ELEVATION
A-201 SCALE: 1:100



3 WEST ELEVATION
A-201 SCALE: 1:100



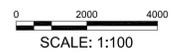
4 EAST ELEVATION
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KEY NOTES: (X)

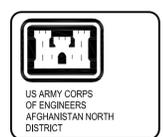
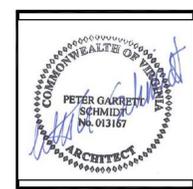
1. EXTENSION OF ARCH SPAN
2. PRE-FINISHED METAL ARCH SPAN CONSTRUCTION WALL AND ROOF.
3. CONCRETE WALL.
4. PAINTED HOLLOW METAL DOOR & FRAME.
5. STEEL WINDOW PAINTED.
6. NOT USED
7. LIGHTING - SEE ELECTRICAL
8. ATTIC VENTILATION LOUVER OR FAN SEE MECHANICAL FOR SIZE AND TYPE. SEE 3/A501 FOR LOUVER DETAIL.

GENERAL NOTES:

- A. FACTORY PRIMED METAL DOORS AND FRAMES SHALL RECEIVE TWO COATS OF PAINT.
- B. LOCATION OF EXTERIOR DOORS AND WINDOWS MUST BE COORDINATED WITH ARCH-SPAN MODULE. PLAN DIMENSIONS OF THESE ARE APPROXIMATE AND MAY BE SLIGHTLY ADJUSTED TO SUIT PANEL FABRICATION TOLERANCES.
- C. EXTERIOR CONCRETE BUILDING SURFACES TO RECEIVE PENETRATING CONCRETE SEALER.
- D. COORDINATE ALL HVAC OPENING SIZES AND LOCATIONS WITH HVAC CONTRACTOR PRIOR TO INSTALLATION.



SCALE: 1:100
UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



US ARMY CORPS OF ENGINEERS
AFGHANISTAN NORTH DISTRICT

REV.	DATE	SYMBOL	DESCRIPTION
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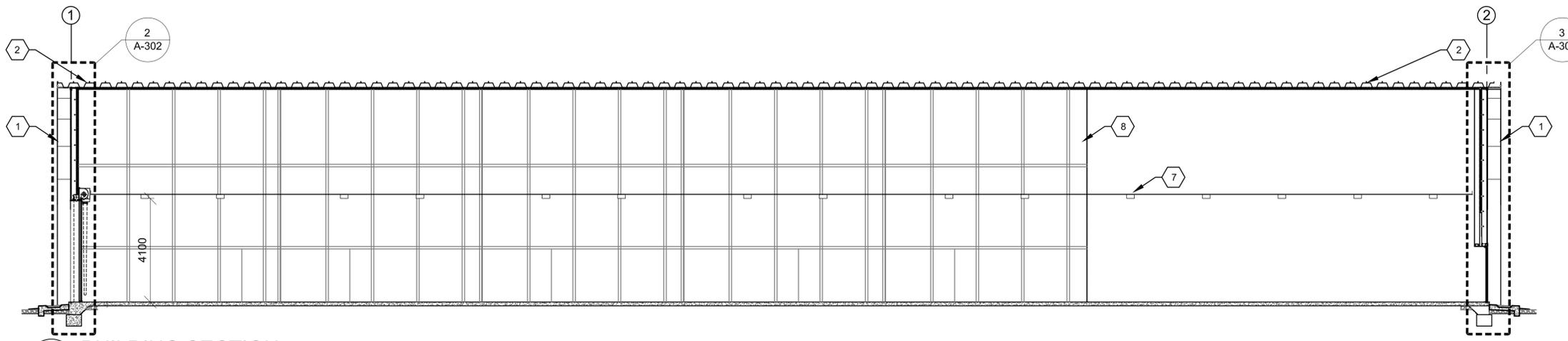
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PLOT SCALE:	1:100	SUBMITTED BY:	BAKER
PLOT DATE:	3/30/2011		

U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

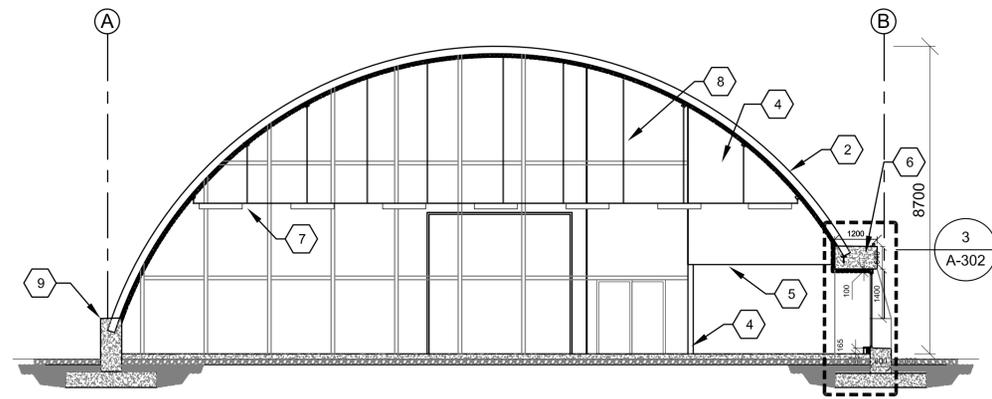
SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
ELEVATIONS

SHEET REFERENCE NUMBER:
A-201

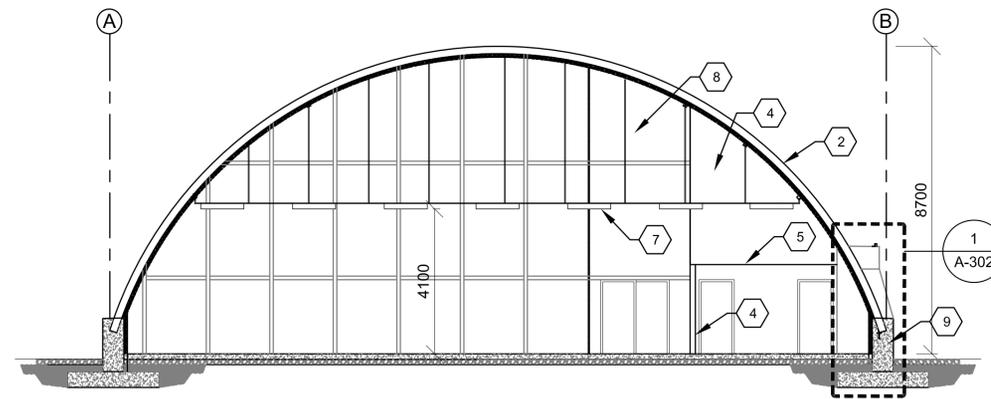
3/30/2011 2:38 PM



1 BUILDING SECTION
A-301 SCALE: 1:100



2 BUILDING SECTION
A-301 SCALE: 1:100



3 BUILDING SECTION
A-301 SCALE: 1:100

KEY NOTES:

1. EXTENSION OF ARCH SPAN
2. ARCH SPAN ROOF/WALL PANEL WITH POLYURETHANE/CEMENTITIOUS SPRAY - ON FIRE BARRIER
3. HOLLOW METAL FRAME WITH DOOR AS SCHEDULED
4. PARTITION AS SCHEDULED
5. CEILING SYSTEM AS SCHEDULED
6. SIDEWALL DOOR AND DORMER FRAMING
7. LIGHT FIXTURE ON UNI-STRUCT SEE ELEC
8. CHAIN LINK FENCE - PROVIDE TOP, TWO INTERMEDIATE, AND BOTTOM BRACE RAILS FOR CHAIN LINK. SECURE EACH END OF CHAIN LINK TO BRACE RAILS. SEE DETAILS 4 & 5/A501
9. CONCRETE STEM WALL

0 2000 4000
SCALE: 1:100

UNLESS OTHERWISE NOTED,
LINEAR DIMENSIONS
SHOWN ARE IN MILLIMETERS.



US ARMY CORPS
OF ENGINEERS
AFGHANISTAN NORTH
DISTRICT

SYMBOL	DESCRIPTION	DATE	APPR.	SYMBOL	DESCRIPTION	DATE	APPR.

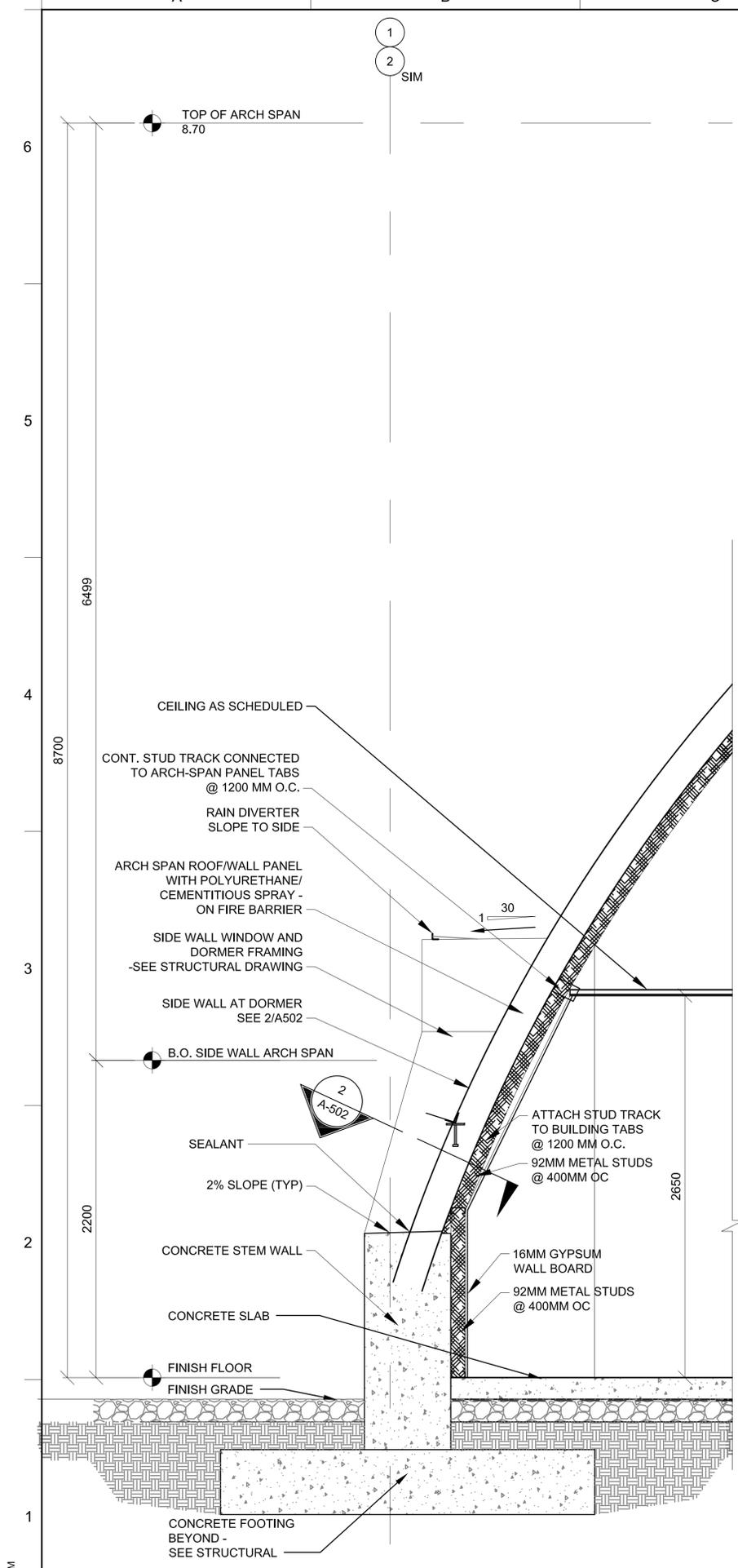
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DWN BY: SE, MDH, AH
REVIEWED BY: JH
SUBMITTED BY: JH
BAKER

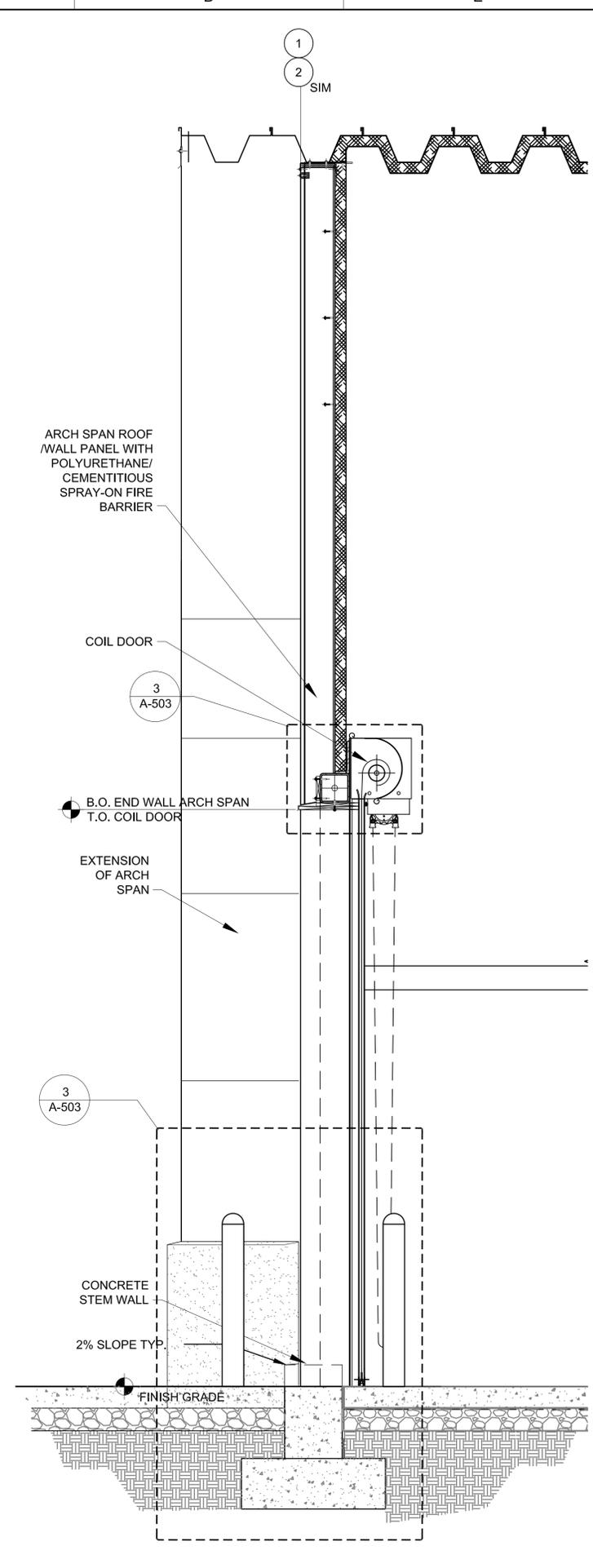
U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
BUILDING SECTIONS

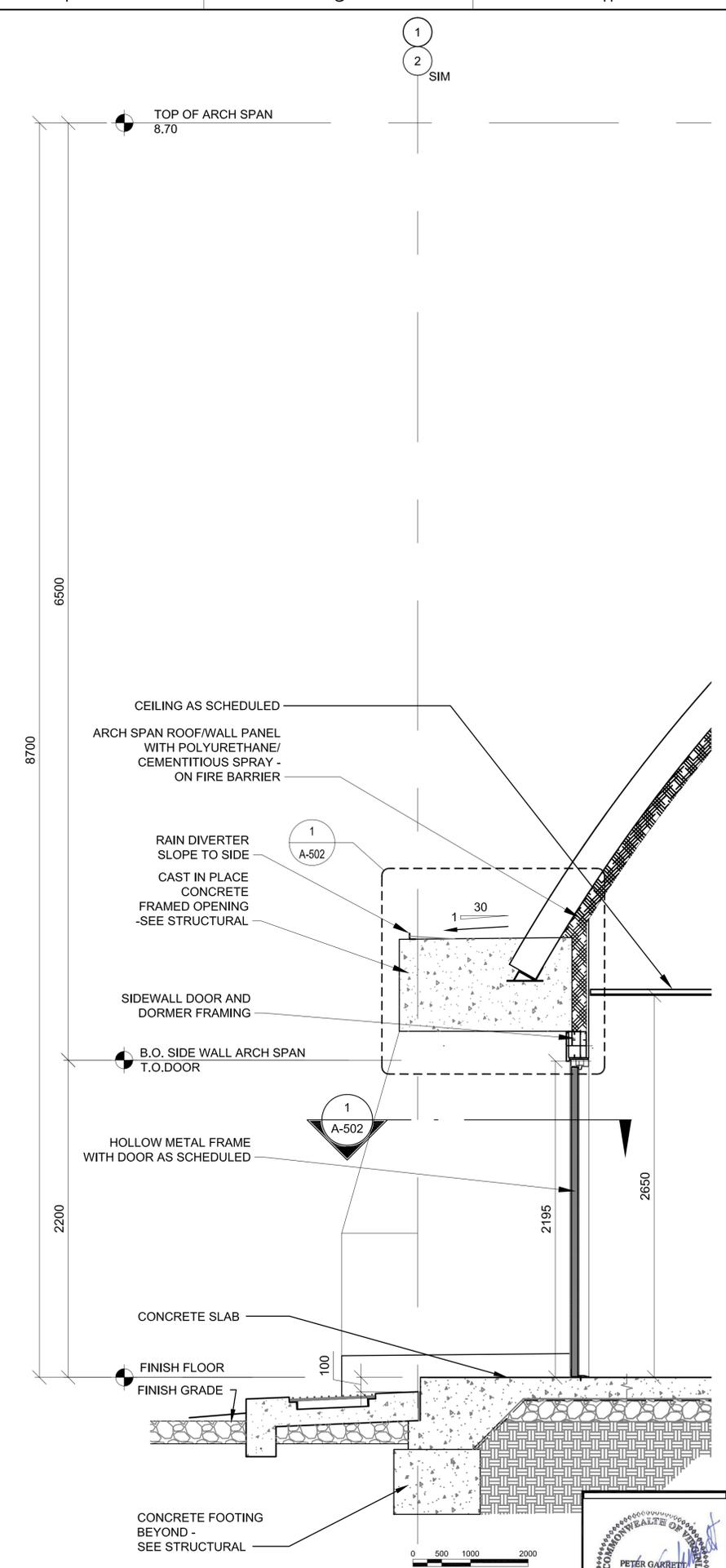
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REFERENCE
NUMBER:
A-301



1 WALL SECTION - THRU SIDE WALL
A-302 SCALE: 1:50

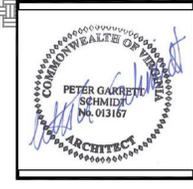


2 WALL SECTION - THRU ROLL-UP DOOR
A-302 SCALE: 1:50



3 WALL SECTION - THRU SIDE WALL DOOR
A-302 SCALE: 1:50

UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.





US ARMY CORPS OF ENGINEERS
AFGHANISTAN NORTH DISTRICT

REV.	DATE	SYMBOL	DESCRIPTION
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DWN BY: SE, MDH, AH
REVIEWED BY: JH

CONTRACT NO. W912ER-09-D-0002
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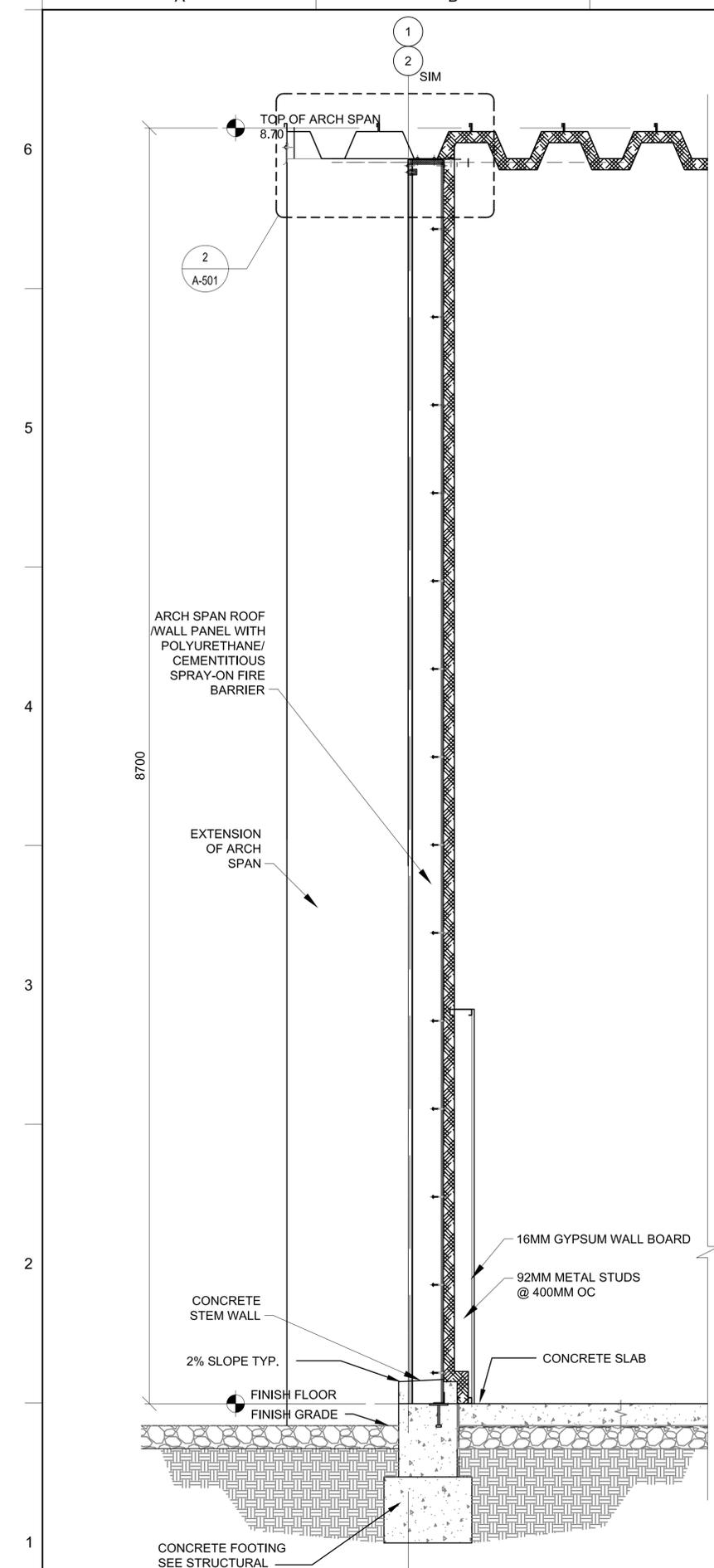
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BAKER

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
WALL SECTIONS

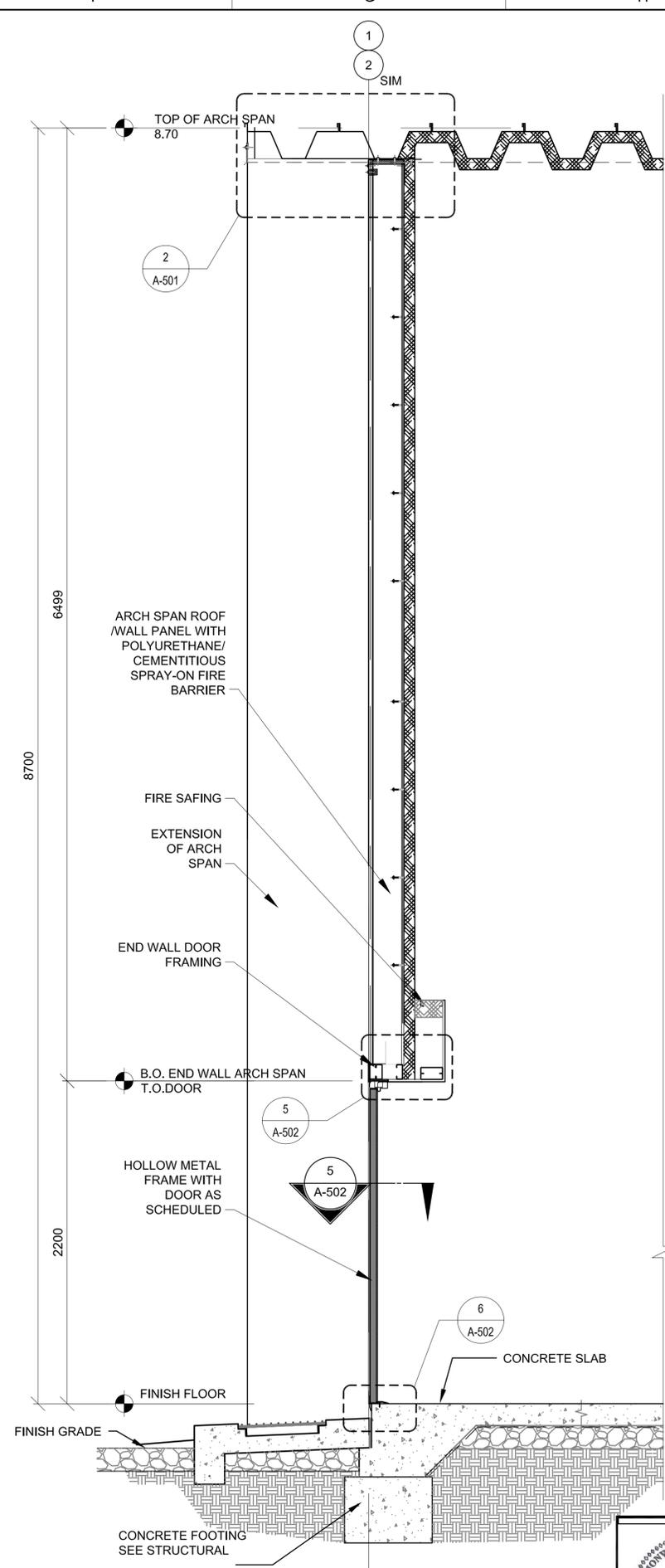
A-302

3/30/2011 2:38 PM



1
A-303
WALL SECTION - THRU END WALL
SCALE: 1:50

2
A-303
NOT USED
SCALE: 1:50



3
A-303
WALL SECTION - THRU END WALL DOOR
SCALE: 1:50

0 500 1000 2000
SCALE: 1:50
UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



REV.	DATE	SYMBOL	DESCRIPTION
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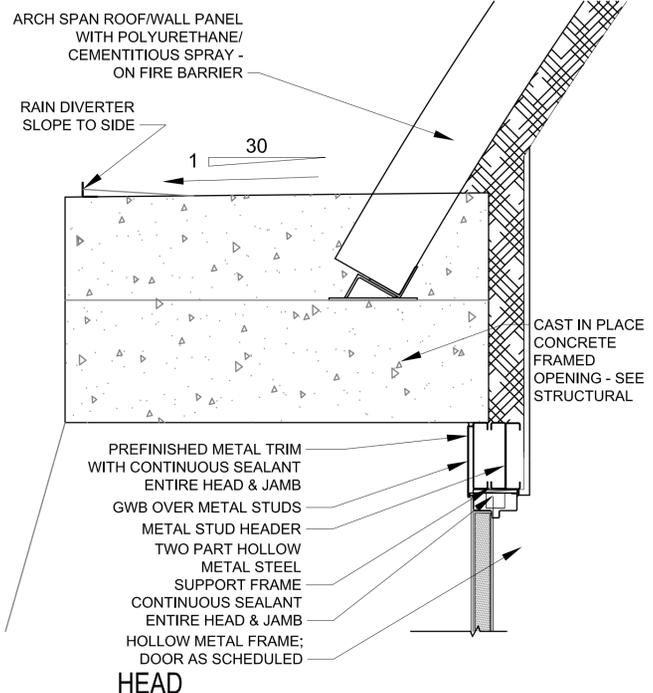
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U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

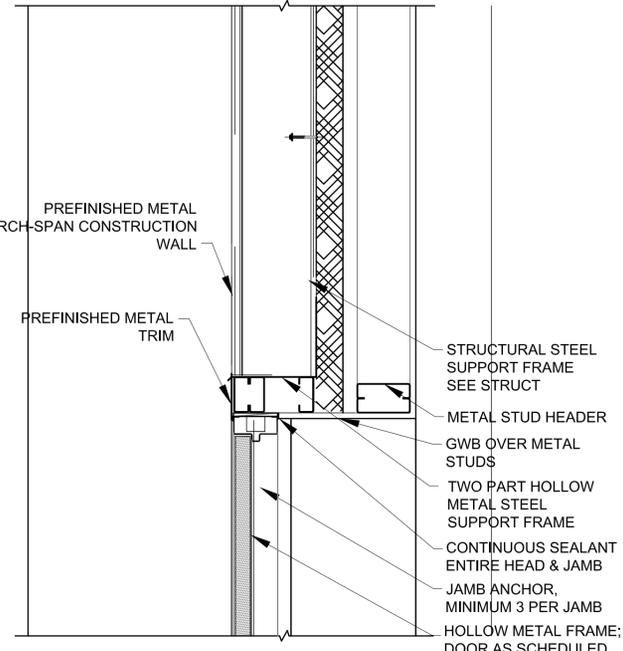
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S09 - STORAGE BUILDING - ARCH SPAN
WALL SECTIONS

SHEET REFERENCE NUMBER:
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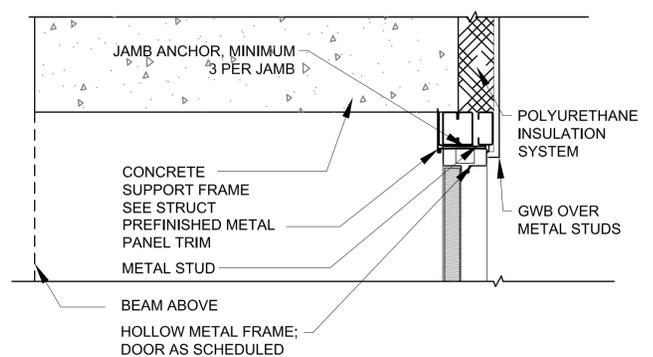
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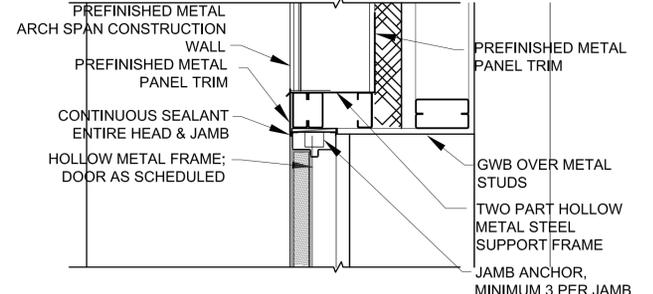
HEAD



HEAD

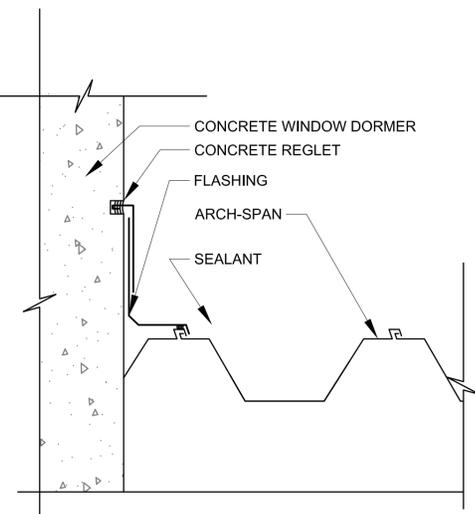


JAMB



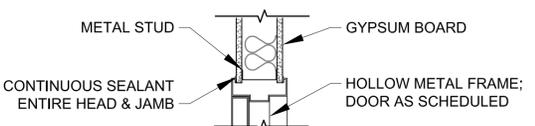
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1 EXTERIOR DOOR DETAILS
A-502 SCALE: 1:10



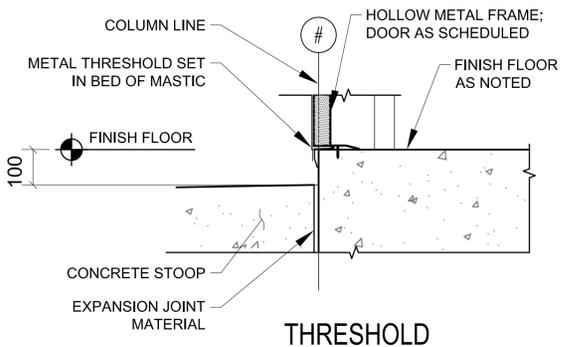
2 DORMER DETAILS
A-502 SCALE: 1:10

3 NOT USED
A-502 SCALE: 1:10



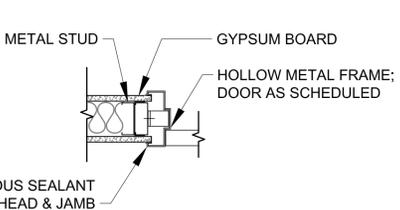
4 INTERIOR WALL DETAILS
A-502 SCALE: 1:10

5 END WALL EXTERIOR DOOR DETAILS
A-502 SCALE: 1:10



THRESHOLD

6 EXTERIOR DOOR DETAILS
A-502 SCALE: 1:10



THRESHOLD

8 NOT USED
A-502 SCALE: 1:10

7 INTERIOR DOOR DETAILS
A-502 SCALE: 1:10

0 100 200 400
SCALE: 1:10
UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



REV.	DATE	DESCRIPTION
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DWN BY: SE, MDH, AH	REVIEWED BY: JH	PGS. SE, MR	PLOT SCALE: 1:10
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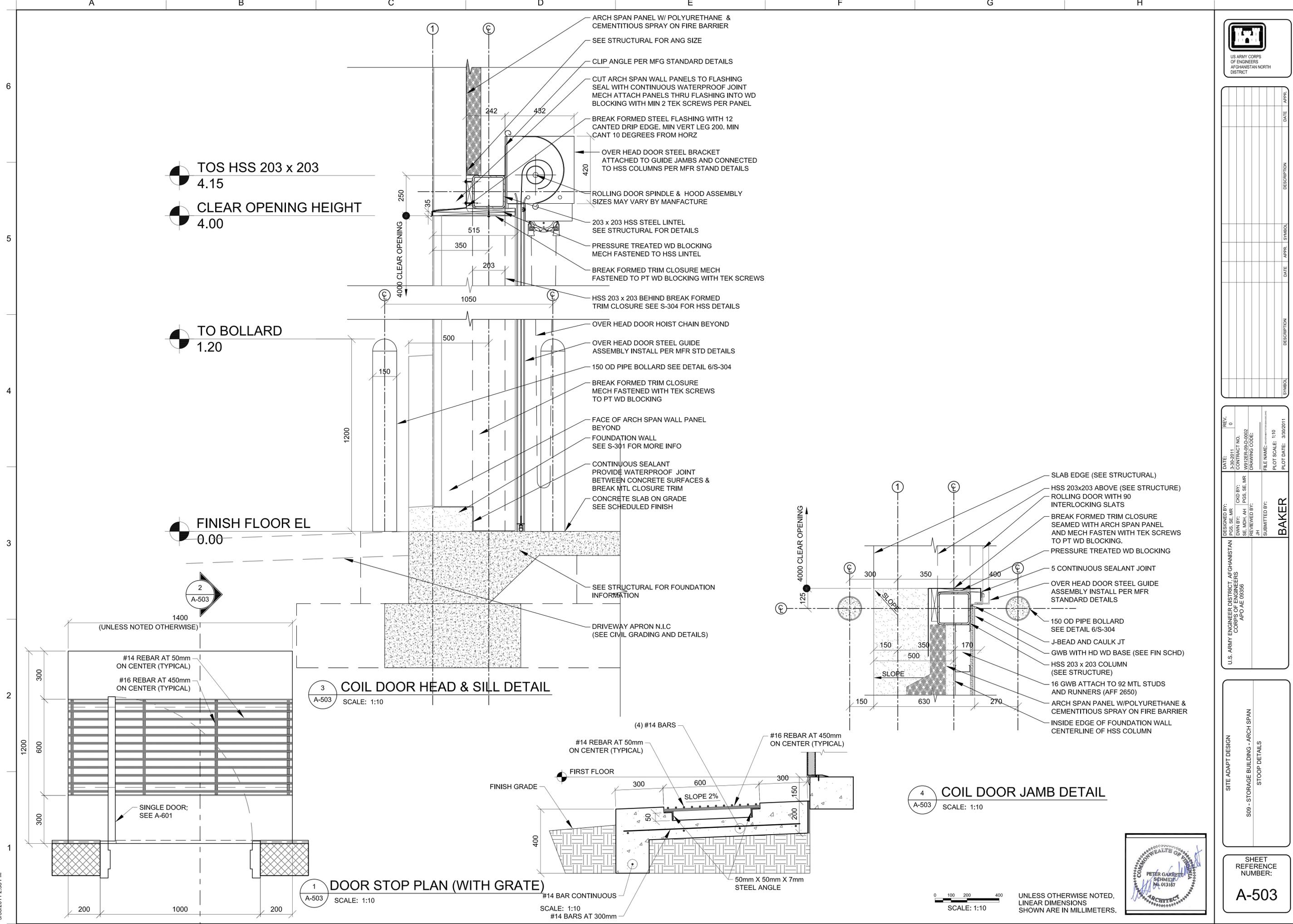
U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
HEAD, JAMB, AND SILL DETAILS

SHEET REFERENCE NUMBER:
A-502

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3/30/2011 2:38 PM



REV	DATE	DESCRIPTION
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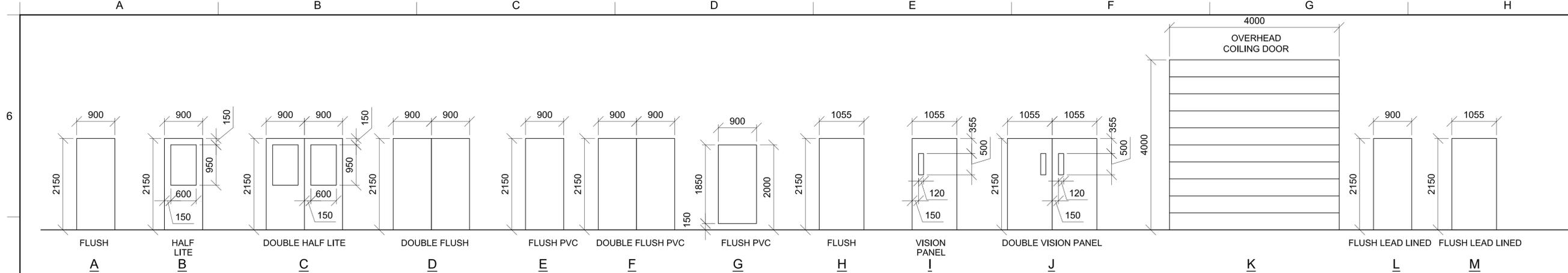
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 CKD BY: SE, MDH, AH
 DWN BY: JH
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 SUBMITTED BY: JH
BAKER

U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
 CORPS OF ENGINEERS
 APO AE 09356

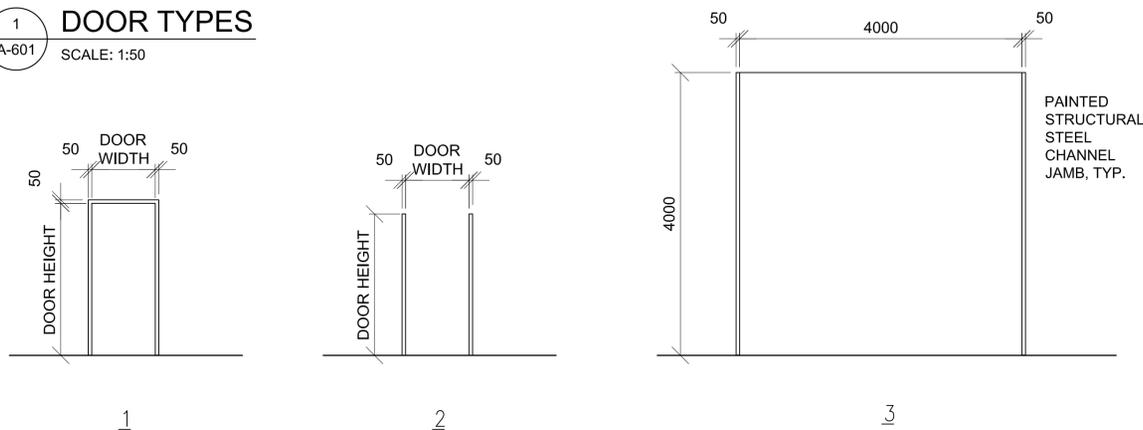
SITE ADAPT DESIGN
 S09 - STORAGE BUILDING - ARCH SPAN
 STOOP DETAILS

SHEET REFERENCE NUMBER:
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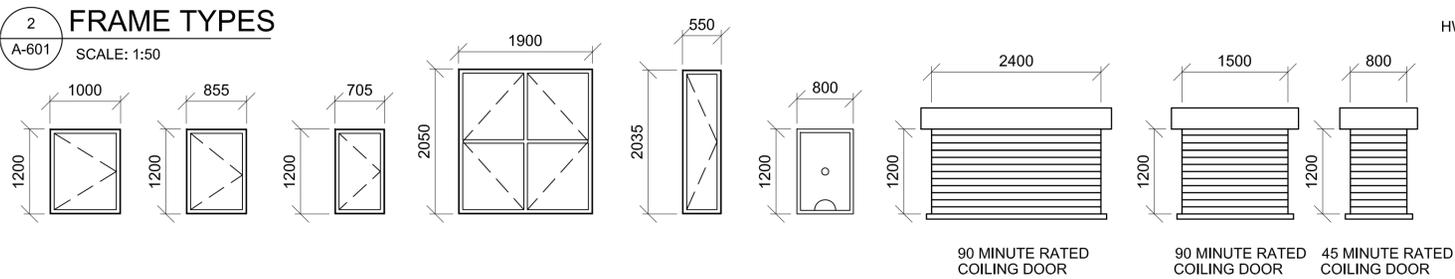




1 DOOR TYPES
A-601 SCALE: 1:50



2 FRAME TYPES
A-601 SCALE: 1:50



3 WINDOW TYPES
A-601 SCALE: 1:50



WINDOW TYPE NOTES:

- ALL EXTERIOR WINDOWS SHALL BE STEEL. PROVIDE INSECT SCREENS ONLY AT DFAC FACILITIES. WINDOWS SHALL BE COMMERCIAL GRADE.
- ALL EXTERIOR WINDOWS SHALL BE OPERABLE.
- WINDOWS IN LATRINES OR RESTROOM AREAS SHALL HAVE OBSCURE GLASS.
- WINDOW TYPES ARE NOT APPLICABLE AT ALL BUILDINGS. SEE FLOOR PLAN FOR REQUIREMENTS

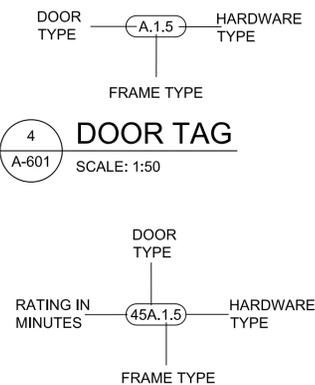
DOOR AND HARDWARE NOTES:

- INTERIOR AND EXTERIOR METAL DOORS AND FRAME COLORS SHALL MATCH ADJACENT WALL COLORS AS SELECTED BY THE CONTRACTING OFFICER.
- FRAMES, EXCEPT FIRE-RATED FRAMES, SHALL BE MOUNTED AND ADJUSTED IN ACCORDANCE WITH MANUFACTURER'S INSTRUCTIONS. FRAMES SHALL BE FASTENED WITH MINIMUM OF THREE ANCHORS PER JAMB AT EQUAL INTERVALS.
- DIMENSIONS SHOWN ON DOOR TYPES DETAIL ARE BASED UPON MODULAR MASONRY (OR ROUGH OPENING), HEIGHT OF 2150 MM FOR STANDARD PERSONNEL DOORS. CONTRACTOR SHALL COORDINATE WITH DOOR SUPPLIER TO ENSURE THAT DIMENSIONS OF DOORS AND FRAMES PROVIDED ARE COMPATIBLE WITH DOOR OPENING DIMENSIONS.
- HARDWARE SHALL BE HEAVY DUTY, COMMERCIAL GRADE, STAINLESS STEEL WITH A SATIN OR BRUSHED FINISH.
- HARDWARE TYPES INCLUDE BUILDERS HARDWARE MANUFACTURERS ASSOCIATION (BMHA) NUMBER.
- DOORS IN 2 HOUR RATED PARTITIONS SHALL BE 1.5 HOUR (90 MINUTE) RATED DOORS IN ACCORDANCE WITH NFPA 101, TABLE 8.3.4.2.
- DOORS IN 1 HOUR RATED WALLS SHALL BE 3/4 HOUR (45 MINUTE) RATED DOORS IN ACCORDANCE WITH NFPA 101, TABLE 8.3.4.2.
- DOORS IN 1 HOUR RATED CORRIDOR WALLS SHALL BE 1/3 HOUR (20 MINUTE) IN ACCORDANCE WITH NFPA 101, TABLE 8.3.4.2.
- PROVIDE DOOR STOPS TO PROTECT WALLS ON LOCATIONS WHERE DOOR SWING WILL STRIKE WALL.
- FIRE RATED DOORS SHALL HAVE RATED GLASS NOT EXCEEDING ALLOWABLE SIZE PER NFPA 80. (836,125MM2 FOR MIN. DOORS & 64,500MM2 FOR 45 MIN OR GREATER DOORS)
- DOOR TYPES ARE NOT APPLICABLE AT ALL BUILDINGS. SEE FLOOR PLAN FOR REQUIREMENTS
- REFER TO MECHANICAL DRAWINGS FOR LOCATIONS OF UNDERCUT DOORS

DOOR TAG NOTES:

- THE DOOR TAG INDICATES THE DOOR TYPE, FRAME TYPE AND HARDWARE SET FOR EACH DOOR.
- THE DOOR TAG FOR RATED DOORS INCLUDES THE RATING OF THE DOOR IN MINUTES.
- REFER TO FLOOR PLANS FOR DOOR TAG INFORMATION APPLICABLE TO EACH DOOR.

4 DOOR TAG
A-601 SCALE: 1:50



5 RATED DOOR TAGS
A-601 SCALE: NTS

EXTERIOR DOOR HARDWARE TYPES:

- HW-1 1-1/2 PR HINGES, A5112 114 X 114 (SINGLE EXIT DOOR)
1 EA RIM EXIT DEVICE, TYPE 1
1 EA CYLINDER, E09221A, GRADE 1
1 EA OVERHEAD CLOSER, C02061, LOW RESISTANCE
1 EA THRESHOLD, J32130
3 EA DOOR SILENCERS, L03011
- HW-2 1-1/2 PR HINGES, A5112 114 X 114 (SINGLE ENTRY DOOR)
1 EA LOCKSET, F13 ENTRY LOCK W/LEVER HANDLES, GRADE 1
1 EA OVERHEAD CLOSER, C02061, LOW RESISTANCE
1 EA THRESHOLD, J32130
3 EA DOOR SILENCERS, L03011
- HW-3 3 PR HINGES, A5112 114 X 114 (DOUBLE EXIT DOOR)
2 EA RIM EXIT DEVICE, TYPE 1
2 EA CYLINDER, GRADE 1
2 EA OVERHEAD CLOSER, C02061, LOW RESISTANCE
1 EA DOOR COORDINATOR, TYPE 21
1 EA ASTRAGAL
1 EA THRESHOLD, J32130
2 EA DOOR SILENCERS, L03011
- HW-4 3 PR HINGES, A5112 114 X 114 (DOUBLE DOOR DORMITORY FUNCTION)
1 EA LOCKSET W/LEVER HANDLES, GRADE 1, F13
1 EA OVERHEAD CLOSER, C02061, LOW RESISTANCE
2 EA MAGNETIC HOLDER PIN, ATTACHED TO DOOR LEAF
2 EA MAGNETIC HOLDER RECEIVER, ATTACHED TO STOOP
1 EA ASTRAGAL
1 EA THRESHOLD, J32130
2 EA DOOR SILENCERS, L03011

INTERIOR DOOR HARDWARE TYPES:

- HW-8 1-1/2 PR HINGES, A8112 (SINGLE JAN/STOREROOM FUNCTION)
1 CLOSER
1 EA LOCKSET W/LEVER HANDLES, F07 GRADE 1
1 EA WALL STOP, L02101 OR L02161
2 EA MOP PLATE, J103
3 EA DOOR SILENCERS, L03011
- HW-9 1-1/2 PR HINGES, A5112 114 X 114 (SINGLE EXIT DOOR)
1 EA RIM EXIT DEVICE, TYPE 1
1 EA CYLINDER, E09221A, GRADE 1
1 EA OVERHEAD CLOSER, C02061, LOW RESISTANCE
3 EA DOOR SILENCERS, L03011
- HW-10 3 PR HINGES, A5112 114 X 114 (DOUBLE STOREROOM FUNCTION)
1 EA LOCKSET W/LEVER HANDLES, GRADE 1, F7
2 EA LEVER EXTENSION FLUSH BOLTS, L04081
1 EA ASTRAGAL
2 EA DOOR SILENCERS, L03011
- HW-11 1-1/2 PR HINGES, A8112 114 X 114 (SINGLE DORMITORY FUNCTION)
1 EA LOCKSET W/LEVER HANDLES, F13, GRADE 1
1 EA WALL STOP, L02101 OR L02161
1 EA OVERHEAD CLOSER, C02061, LOW RESISTANCE
3 EA DOOR SILENCERS, L03011
1 EA ROBE HOOK
- HW-12 1-1/2 PR HINGES, A8133 (SINGLE PRIVACY-BATH FUNCTION)
1 EA LATCH SET W/LEVER HANDLES, F22 GRADE 1
1 EA WALL STOP, L02101 OR L02161
3 EA DOOR SILENCERS, L03011
1 EA ROBE HOOK
- HW-13 3 PR HINGES, A5112 114 X 114 (DOUBLE DORMITORY FUNCTION)
1 EA LOCKSET W/LEVER HANDLES, GRADE 1, F13
1 EA OVERHEAD CLOSER, C02061, LOW RESISTANCE
2 EA LEVER EXTENSION FLUSH BOLTS, L04081
1 EA ASTRAGAL
2 EA DOOR SILENCERS, L03011

INTERIOR DOOR HARDWARE TYPES:

- HW-5 1-1/2 PR HINGES, A8133 114 X 114 (SINGLE FRONT DOOR FUNCTION)
1 EA LOCKSET W/LEVER HANDLES, F08, GRADE 1
1 EA WALL STOP, L02101 OR L02161
3 EA DOOR SILENCERS, L03011
- HW-5A 1-1/2 PR HINGES, A8133 114 X 114 (SINGLE OFFICE FUNCTION)
1 CLOSER
1 EA LOCKSET W/LEVER HANDLES, F05, GRADE 1
1 EA WALL STOP, L02101 OR L02161
3 EA DOOR SILENCERS, L03011
- HW-6 1-1/2 PR HINGES, A8112 114 X 114 (SINGLE STOREROOM FUNCTION)
1 CLOSER
1 EA LOCKSET W/LEVER HANDLES, F07, GRADE 1
1 EA WALL STOP, L02101 OR L02161
3 EA DOOR SILENCERS, L03011
- HW-7 1-1/2 PR HINGES, A8133 (SINGLE PASSAGE FUNCTION)
1 CLOSER
1 EA LOCKSET W/LEVER HANDLES, F01 GRADE 1
1 EA WALL STOP, L02101 OR L02161
2 EA MOP PLATE, J103
3 EA DOOR SILENCERS, L03011
- HW-7A 1-1/2 PR HINGES, A8133 (SINGLE PASSAGE FUNCTION)
1 CLOSER
1 EA LOCKSET W/LEVER HANDLES, F01 GRADE 1
1 EA WALL STOP, L02101 OR L02161
3 EA DOOR SILENCERS, L03011
- HW-14 3 PR HINGES, A5112 114 X 114 (DOUBLE EGRESS EXIT DOOR)
2 EA VERTICAL ROD EXIT DEVICE, TYPE 1
2 EA CYLINDER, GRADE 1
2 EA OVERHEAD CLOSER, C02061, LOW RESISTANCE
1 EA DOOR COORDINATOR, TYPE 21
1 EA ASTRAGAL
2 EA DOOR SILENCERS, L03011
- HW-15 3 PR HINGES, A5112 114 X 114 (DOUBLE STOREROOM FUNCTION)
2 CLOSERS
1 COORDINATOR
1 EA LOCKSET W/LEVER HANDLES, GRADE 1, F7
2 EA LEVER EXTENSION FLUSH BOLTS, L04081
1 EA ASTRAGAL
2 EA DOOR SILENCERS, L03011

THIS SHEET IS STANDARD AND IS INCLUSIVE OF ALL THE DOOR/ WINDOW/ HARDWARE TYPES FOR THE ENTIRE CONTRACT. NOT ALL DOOR/ WINDOW/ HARDWARE TYPES ARE USED FOR ANY PARTICULAR BUILDING DESIGN. CONTRACTOR SHALL REFER TO THE FLOOR PLAN FOR THE TYPES BEING USED.



UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



US ARMY CORPS OF ENGINEERS AFGHANISTAN NORTH DISTRICT

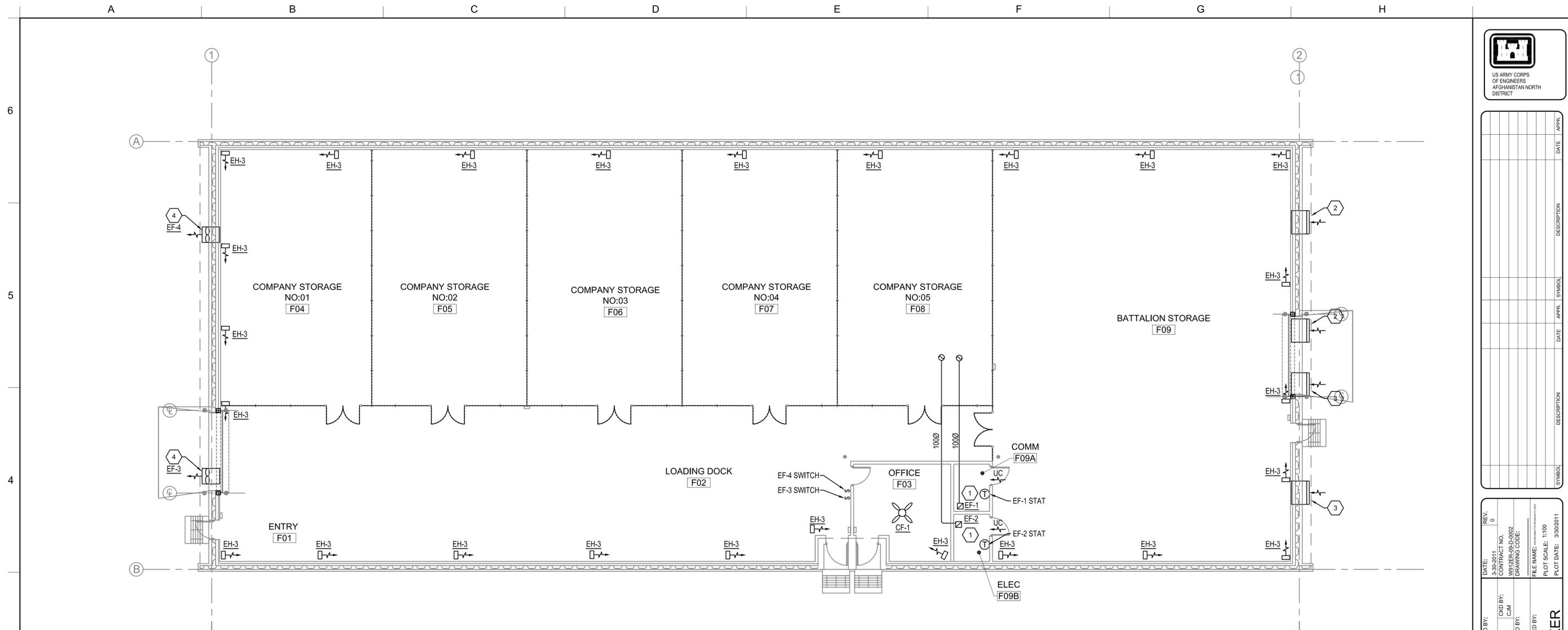
REV.	DATE	DESCRIPTION
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DESIGNED BY: PGS, SE, MR	DATE: 3-30-2011
DWN BY: SE, MD, AH	CONTRACT NO: W912ER-09-D-0002
REVIEWED BY:	DRAWING CODE:
SUBMITTED BY: BAKER	FILE NAME: AFGHANISTAN NORTH DISTRICT
	PLOT SCALE: 1:50
	PLOT DATE: 3-30-2011

U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
WINDOW AND DOOR SCHEDULE

SHEET REFERENCE NUMBER:
A-601



1 HVAC - FLOOR PLAN
M-101
SCALE 1:100

GENERAL NOTES:

- DO NOT SCALE DRAWINGS - ALL DIMENSIONS AND CONDITIONS SHALL BE CHECKED AND VERIFIED BY THE CONTRACTOR AT THE SITE.
- ALL WORK PERFORMED ON THIS BUILDING SHALL BE IN COMPLIANCE WITH ALL PERTINENT CODES, RULES, ORDINANCES AND REGULATIONS OF THE GOVERNING AUTHORITIES.
- ALL WORK PERFORMED UNDER AND IN CONNECTION WITH THESE DRAWINGS AND SPECIFICATIONS SHALL BE IN STRICT COMPLIANCE WITH THE LATEST SAFETY AND HEALTH STANDARDS.
- COORDINATE ALL EQUIPMENT LOCATIONS WITH EQUIPMENT SHOWN ON OTHER DRAWINGS. VERIFY FINAL LOCATIONS IN FIELD.

SYMBOLS:

- (X) KEY NOTE
- UC DOOR UNDERCUT 25mm
- S SINGLE POLE SWITCH FOR EXHAUST FAN - 20A RATED MOUNT SWITCH 1.2M AFF.
- EH-3 ELECTRIC HEATER
- CF-1 CEILING FAN
- DIRECTION OF AIR FLOW

ABBREVIATIONS:

- AFF ABOVE FINISH FLOOR
- CF CEILING FANS
- LPS LITERS PER SECOND
- EF EXHAUST FAN
- EH ELECTRIC HEATER
- DH DUCT HEATER
- STATS THERMOSTATS
- TYP TYPICAL

KEY NOTES:

- CEILING MOUNTED EXHAUST FAN WITH DUCT EXTENDED UP TO RIDGE AND OUT THROUGH ROOF TO ROOF CAP. PREPARE ROOF PENETRATION AND FLASH AS RECOMMENDED BY BUILDING MANUFACTURER. SEE ROOF CAP DETAIL ON SHEET M-501.
- 1350x1500 (41x59) INTAKE LOUVER WITH MOTOR OPERATED DAMPER INTERLOCKED WITH EF-3. LOUVER LOCATED AS HIGH AS POSSIBLE. SEE ARCHITECTURAL ELEVATIONS FOR LOCATION AND DETAIL ON SHEET M-501.
- 1350x1500 (41x59) INTAKE LOUVER WITH MOTOR OPERATED DAMPER INTERLOCKED WITH EF-4. LOUVER LOCATED AS HIGH AS POSSIBLE. SEE ARCHITECTURAL ELEVATIONS FOR LOCATION AND DETAIL ON SHEET M-501.
- 940mm (37"sq) WALL MOUNTED ATTIC EXHAUST FAN VERIFY LOCATION WITH ARCHITECTURAL ELEVATIONS. SEE DETAIL ON SHEET M-501.

EXHAUST FAN SCHEDULE

NO.	TYPE	FLOW RATE (LPS)	DRIVE	HP	SP mmH2O	ELECTRICAL DATA	SWITCH
EF-1	CEILING	35	DIRECT	FRACTIONAL	7	220/1/50	W/ STAT
EF-2	CEILING	35	DIRECT	FRACTIONAL	7	220/1/50	W/ STAT
EF-3	PROP	3445	DIRECT	1	3	220/1/50	@ WALL
EF-4	PROP	3445	DIRECT	1	3	220/1/50	@ WALL

- NOTES:
1. PROVIDE BACK DRAFT DAMPER AT EACH FAN.

ELECTRIC UNIT HEATER SCHEDULE

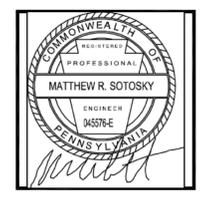
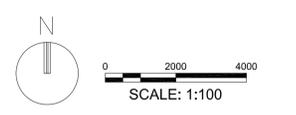
NO.	FLOW RATE (LPS)	CAPACITY (KW)	F.A.T. (°C)	ELECT. CHAR.	MOUNTING
EH-3	200	3	38	220/1/50	WALL HUNG

- NOTES:
1. PROVIDE UNIT MOUNTED DISCONNECT SWITCH.
2. PROVIDE TAMPER RESISTANT UNIT MOUNTED THERMOSTAT.
3. UNIT SHALL BE HUNG AND MOUNTED 2.5M AFF.

CEILING FAN

NO.	BLADE SIZE		VOLTAGE	SWITCH	REMARKS
	mm	IN			
CF-1	1320	52	220/1/50	@ WALL	3 SPEED REVERSIBLE MOTOR

- NOTES:
1. IF FANS ARE TO BE INSTALLED IN AN AREA WITHOUT A CEILING, PROVIDE EXTENSION DOWN RODS FROM ARCH-SPAN TABS, BRACE / GUY FAN AS REQUIRED AND INSTALL FANS 2.5M AFF. IF FANS ARE TO BE MOUNTED IN AREA WITH A CEILING GRID OR HARD CEILING, MOUNT PER MANUFACTURERS RECOMMENDATIONS. SEE ELECTRICAL DRAWINGS FOR MOUNTING OPTIONS.
2. PROVIDE WITHOUT LIGHT FIXTURE.
3. PROVIDE WITH REMOTE MOUNTED ON-OFF SWITCH. SWITCHES ARE SHOWN ON ELECTRICAL DRAWINGS.
4. COORDINATE CEILING FANS WITH LIGHTS. IN GENERAL FANS SHALL BE CENTERED BETWEEN LIGHTS WHEN POSSIBLE.



REV.	DATE	DESCRIPTION
0	3/30/2011	

DESIGNED BY: RML
DRAWN BY: JLN
CHECKED BY: CJM
REVIEWED BY: JH
SUBMITTED BY: JH

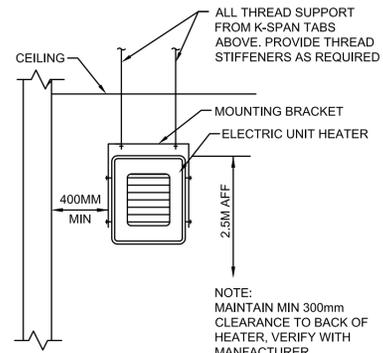
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CONTRACT NO.: W912ER-09-D-0002
DRAWING CODE:
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PLOT SCALE: 1:100
PLOT DATE: 3/30/2011

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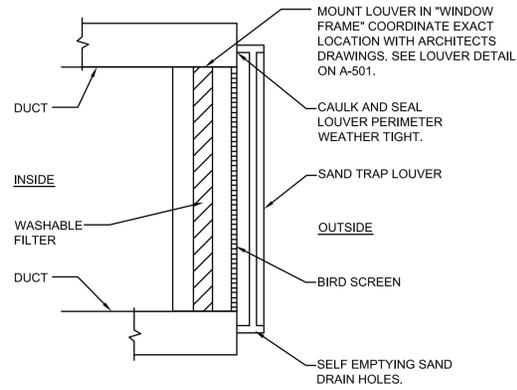
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SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
HVAC - FLOOR PLAN AND SCHEDULES

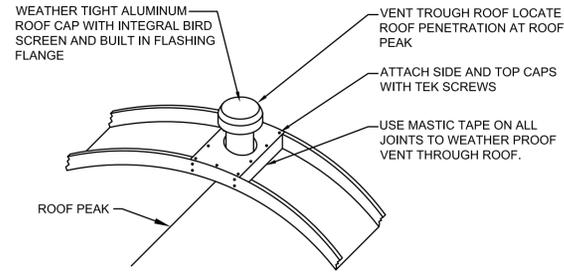
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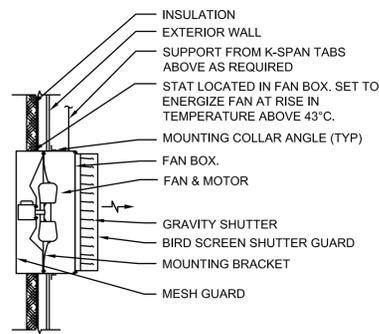
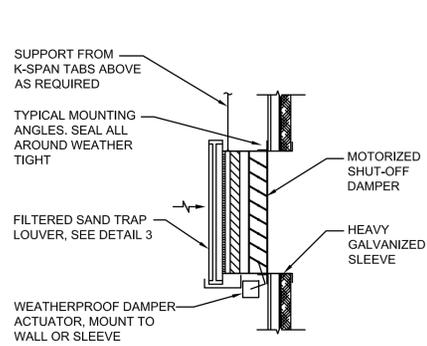
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M-501
ELECTRIC UNIT HEATER MOUNTING DETAIL
SCALE: N.T.S.



2
M-501
FILTERED SAND TRAP LOUVER
SCALE: N.T.S.



3
M-501
EXHAUST FAN ROOF CAP DETAIL
SCALE: N.T.S.



4
M-501
VENTILATION SYSTEM DETAIL
SCALE: N.T.S.



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REV.	DATE	SYMBOL	DESCRIPTION
0			

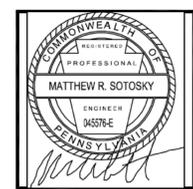
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DRAWING CODE:
FILE NAME:
PLOT SCALE: 1:100
PLOT DATE: 3-30-2011

DESIGNED BY: RML
DWN BY: JLN
REVIEWED BY: JH
SUBMITTED BY: JH
BAKER

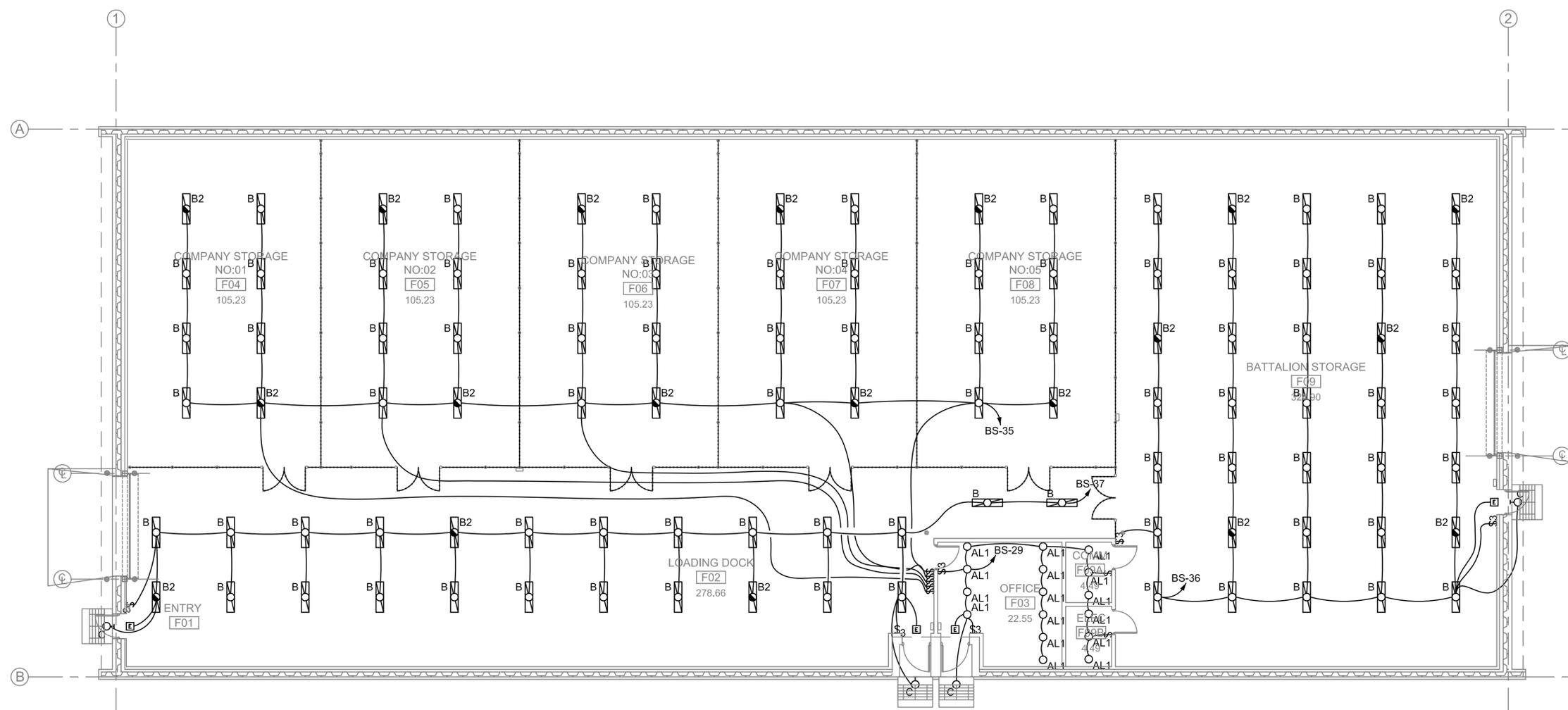
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SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
HVAC DETAILS

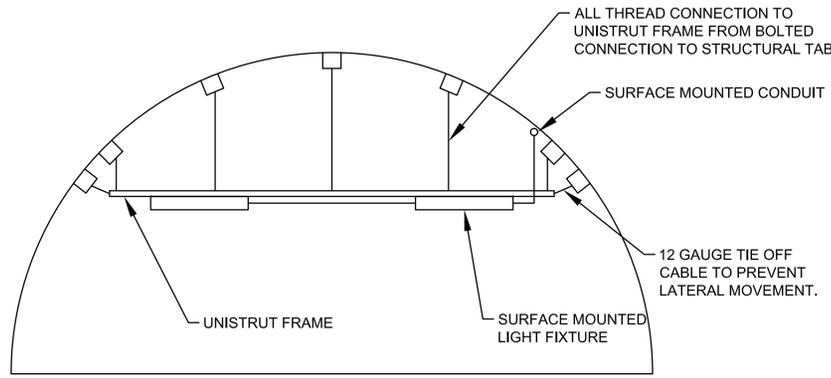
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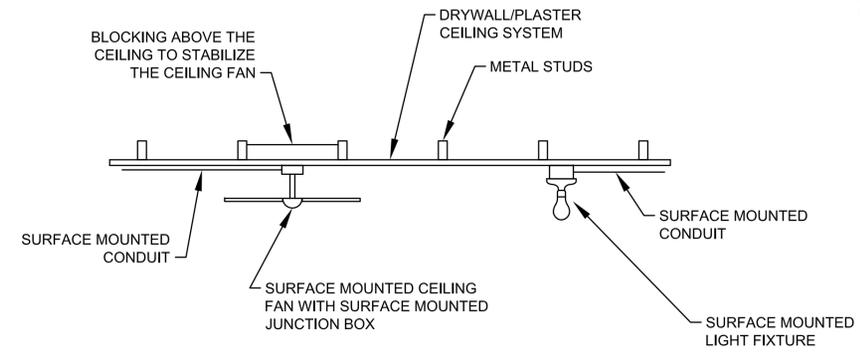
UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



1 LIGHTING PLAN
E-101 SCALE: 1:100



2 OPEN BAY MOUNTING DETAIL
E-101 NOT TO SCALE



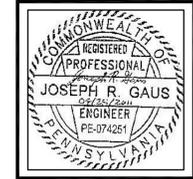
2 NON-OPEN BAY MOUNTING DETAIL
E-101 NOT TO SCALE

GENERAL NOTES:

1. REFER TO DRAWING #E-001 FOR THE ELECTRICAL SYMBOLS LIST.
2. REFER TO DRAWING #E-601 FOR THE LIGHTING FIXTURE SCHEDULE.
3. REFER TO DRAWING #E-602 FOR PANEL SCHEDULES.
4. LIGHT FIXTURES INDICATED AS EMERGENCY SHALL BE PROVIDED WITH A BATTERY BACKUP BALLAST.
5. LIGHT SWITCHES AND CEILING FAN SWITCHES SHALL BE GANGED IN THE SAME FACEPLATE AT ROOM ENTRANCES.
6. CIRCUITS SHOWN INCLUDE ONE PHASE CONDUCTOR, ONE NEUTRAL, AND ONE EQUIPMENT GROUND CONDUCTOR UNLESS OTHERWISE SHOWN. THE CONDUCTOR SIZE SHALL BE 2.5mm² UNLESS INDICATED OTHERWISE ON THE PANEL SCHEDULE.



UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.



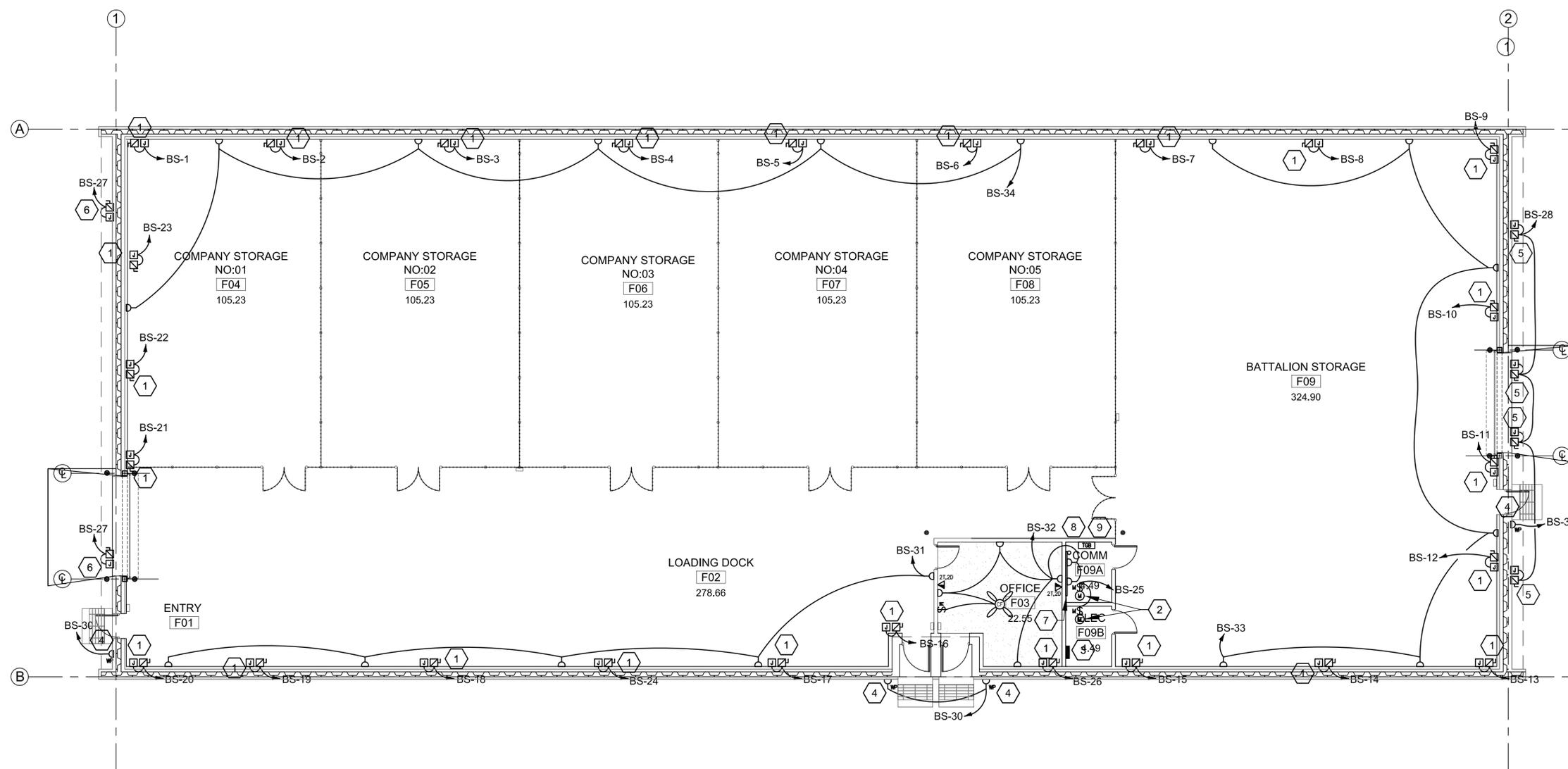
REV.	DATE	DESCRIPTION
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DESIGNED BY:	CKO BY:	REVIEWED BY:	SUBMITTED BY:
DWN BY:			

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CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
ELECTRICAL LIGHTING PLAN

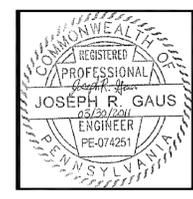
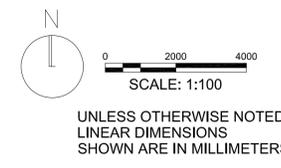
SHEET REFERENCE NUMBER:
E-101



1
E-102 **POWER AND SYSTEMS PLAN**
SCALE: 1:100

- GENERAL NOTES:**
- REFER TO DRAWING #E-001 FOR THE ELECTRICAL SYMBOLS LIST.
 - REFER TO DRAWING #E-501 FOR THE POWER RISER DIAGRAM.
 - REFER TO DRAWING #E602 FOR ELECTRICAL PANEL SCHEDULES.
 - COORDINATE EXACT MOUNTING LOCATION OF DISCONNECTING MEANS FOR MECHANICAL AND PLUMBING EQUIPMENT IN THE FIELD.
 - FUSIBLE SAFETY SWITCHES THAT ARE NOT OTHERWISE IDENTIFIED SHALL BE 380V, 1P, 30A FUSED SAFETY SWITCHES WITH 20A FUSES.
 - LIGHT SWITCHES AND CEILING FAN SWITCHES SHALL BE GANGED IN THE SAME FACEPLATE AT ROOM ENTRANCES.
 - CIRCUITS SHOWN INCLUDE ONE PHASE CONDUCTOR, ONE NEUTRAL, AND ONE EQUIPMENT GROUND CONDUCTOR UNLESS OTHERWISE SHOWN. THE CONDUCTOR SIZE SHALL BE 2.5mm² UNLESS INDICATED OTHERWISE ON THE PANEL SCHEDULE.

- KEY NOTES:**
- PROVIDE POWER CONNECTION TO ELECTRIC UNIT HEATER. REFER TO MECHANICAL PLANS AND PANEL SCHEDULES FOR MORE INFORMATION.
 - PROVIDE POWER CONNECTION TO EXHAUST FAN. REFER TO MECHANICAL PLANS AND PANEL SCHEDULES FOR MORE INFORMATION.
 - PANEL 'BS' 380/220V, 3Ø, 4W.
 - SEE DETAIL #7 ON DRAWING E-501 FOR MORE INFORMATION.
 - PROVIDE POWER CONNECTION TO MOTOR OPERATED DAMPER MOUNTED IN THE ATTIC.
 - PROVIDE POWER CONNECTION TO EXHAUST FAN MOUNTED IN THE ATTIC.
 - PROVIDE A 1200mm X 2400mm SHEET OF FIRE RESISTANT PLYWOOD FOR MOUNTING OF TELECOMMUNICATIONS EQUIPMENTS.
 - PROVIDE CONDUIT STUB UP IN THE ROOM FOR INCOMING TELECOM SERVICES FROM THE CENTRAL SYSTEM IN THE GARRISON.
 - TELECOMMUNICATIONS SERVICE ENTRANCE GROUND BUS.



REV.	DATE	DESCRIPTION
0		

DESIGNED BY:	CKD BY:	REVIEWED BY:	SUBMITTED BY:
			BAKER

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SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
ELECTRICAL POWER AND SYSTEMS PLAN

SHEET REFERENCE NUMBER:
E-102

LIGHT FIXTURE SCHEDULE

FIXTURE MARK	STYLE NUMBER AND TYPE	NUMBER AND TYPE OF LAMPS	VOLTAGE	MOUNTING	NOTES
AL1	PORCELAIN SOCKET WITH MEDIUM SCREW IN BASE	(1) 42W SELF BALLASTED COMPACT FLUORESCENT "TWISTER" LAMP	220V - 1Ø 50HZ	SURFACE MOUNTED	
B	WET LOCATION WRAP AROUND SURFACE/PENDANT MOUNTED FLUORESCENT FIXTURE WITH PRISMATIC ACRYLIC LENS AND ELECTRONIC BALLAST. FIXTURE SHALL BE IP-44 RATED.	(2) 32W 3500K	220V - 1Ø 50HZ	SURFACE MOUNTED	FURNISHED WITH ELECTRONIC BALLAST, VIRGIN ACRYLIC WRAP AROUND LENS.
B2	SAME AS FIXTURE 'B' WITH EMERGENCY BALLAST	(2) 32W 3500K	220V - 1Ø 50HZ	SURFACE MOUNTED	FURNISHED WITH ELECTRONIC BALLAST, VIRGIN ACRYLIC WRAP AROUND LENS. EMERGENCY BALLAST WITH SELF TEST SWITCH.
C	INCANDESCENT ONE PIECE W/ APPROVED LENS STABILIZED HIGH IMPACT POLY CARBONATE. FIXTURE SHALL BE IP-44 RATED.	(1) 100W INCANDESCENT	220V - 1Ø 50HZ	WALL MOUNTED ABOVE EXTERIOR DOORS	FURNISHED WITH INTEGRAL PHOTOCCELL.
E	UNIVERSAL MOUNT ENGINEER GRADE THERMOPLASTIC HOUSING EXIT SIGN WITH LED LAMPS, RED LETTERS 6" IN HEIGHT WITH ARROWS AS INDICATED, WITH 12V CADMIUM BATTERY WITH REMOTE HEAD CAPABILITY	LED LAMPS	220V - 1Ø 50HZ	UNIVERSAL MOUNTING	



US ARMY CORPS OF ENGINEERS
AFGHANISTAN NORTH DISTRICT

SYMBOL	DESCRIPTION	DATE	APPR.	SYMBOL	DESCRIPTION	DATE	APPR.

DESIGNED BY:	DATE:	REV:
DWN BY:	4-25-2011	0
CONTRACT NO.:	W912ER-09-D-0002	
DRAWING CODE:		
FILE NAME:		
PLOT SCALE:	NONE	
PLOT DATE:	4-25-2011	

U.S. ARMY ENGINEER DISTRICT, AFGHANISTAN
CORPS OF ENGINEERS
APO AE 09356

SITE ADAPT DESIGN
S09 - STORAGE BUILDING - ARCH SPAN
LIGHTING FIXTURE SCHEDULE

SHEET REFERENCE NUMBER:
E-601



UNLESS OTHERWISE NOTED, LINEAR DIMENSIONS SHOWN ARE IN MILLIMETERS.

