APPLICATION FOR OSHPD PREAPPROVAL OF MANUFACTURER'S CERTIFICATION (OPM)

OFFICE USE ONLY
APPLICATION #: OPM-0185-13

OSHPD Preapproval of Manufacturer's Certification (OPM)

Type: ☐ New ☐ Renewal ☒ Update to Pre-CBC 2013 OPA Number: OPA-0331-07

Manufacturer Information

Manufacturer: Omnicell, Inc.

Manufacturer's Technical Representative: Chris Muir

Mailing Address: 590 E. Middlefield Road, Mountain View, CA 94043

Telephone: 650-251-6329 Email: chrism@omnicell.com

Product Information

Product Name: Omni-Supplier

Product Type: Automated Dispensing Cabinet

Product Model Number: Omni-Supplier One-Cell, Two-Cell and Three-Cell

General Description: Automated medication dispensing cabinet.

Applicant Information

Applicant Company Name: Omnicell, Inc.

Contact Person: Chris Muir

Mailing Address: 590 E. Middlefield Road, Mountain View, CA 94043

Telephone: 650-251-6329 Email: chrism@omnicell.com

I hereby agree to reimburse the Office of Statewide Health Planning and Development review fees in accordance with the California Administrative Code, 2013.

Signature of Applicant: Date: 1/7/2014

Title: Design Engineer Company Name: Omnicell, Inc.

Registered Design Professional Preparing Engineering Recommendations

Company Name: Degenkolb Engineers

Name: Adrian Nacamuli California License Number: SE 4857

Mailing Address: 1300 Clay Street, Suite 900, Oakland, CA 94612

Telephone: 510-250-1216 Email: anacamuli@degenkolb.com

OSHPD Special Seismic Certification Preapproval (OSP)

☐ Special Seismic Certification is preapproved under OSP-
(Separate application for OSP is required)

☒ Special Seismic Certification is not preapproved

Certification Method(s)

☐ Testing in accordance with: ☐ ICC-ES AC156 ☐ FM 1950-10

☐ Other* (Please Specify):

*Use of criteria other than those adopted by the California Building Standards Code, 2013 (CBSC 2013) for component supports and attachments are not permitted. For distribution system, interior partition wall, and suspended ceiling seismic bracings, test criteria other than those adopted in the CBSC 2013 may be used when approved by OSHPD prior to testing.

☒ Analysis

☐ Experience Data

☐ Combination of Testing, Analysis, and/or Experience Data (Please Specify):

List of Attachments Supporting the Manufacturer's Certification

☐ Test Report ☒ Drawings ☒ Calculations ☐ Manufacturer's Catalog

☐ Other(s) (Please Specify):

OFFICE USE ONLY – OSHPD APPROVAL VALID FOR CBC 2013 ONLY

Signature: Date: 07/06/2015

Print Name: William Staehlin

Title: SSE

Condition of Approval (if applicable):

OMNICELL
OSHPD PRE-APPROVAL OF MANUFACTURER CERTIFICATION
OPM 0185-13
OMNI-SUPPLIER ONE-, TWO-, AND THREE-CELL CABINETS

DEGENKOLB ENGINEERS
235 Montgomery Street, Suite 500
San Francisco, CA 94104
415.392.6952 *Phone*
415.981.3157 *Fax*
www.degenkolb.com

REGISTERED PROFESSIONAL ENGINEER
ADRIAN M. NACALUY
No. 4857
Exp. 9-30-15
STRUCTURAL
STATE OF CALIFORNIA

OMNI-SUPPLIER ONE-CELL CABINET MODELS
OS104, OSCT104, MDA-FRM-001, MDA-FRM-001-CI, MSA-FRM-001-INT, NAC-FRM-004, NAC-FRM-005, NAC-FRM-009, NAC-FRM-010, OPF-FRM-001, SDA-FRM-001, CSM-FRM-001, CSM-FRM-004-INT, CSM-FRM-007, OPTIX1, OX104, OX104-INT, OX104RX, OX104SV

OMNI-SUPPLIER TWO-CELL CABINET MODELS
OS224, OSCT224, MDA-FRM-002, MDA-FRM-002-CI, MSA-FRM-002-INT, NAC-FRM-005, NAC-FRM-006, NAC-FRM-007, NAC-FRM-008, OPF-FRM-002, SDA-FRM-002, CSM-FRM-002, CSM-FRM-005-INT, CSM-FRM-008, OPTIX2, OX224, OX224-INT, OX224RX, OX224SV

OMNI-SUPPLIER THREE-CELL CABINET MODELS
OS344, OSCT344, MDA-FRM-003, MDA-FRM-003-CI, MSA-FRM-003-INT, OPF-FRM-003, SDA-FRM-003, CSM-FRM-003, CSM-FRM-006-INT, CSM-FRM-009, OPTIX3, OX344, OX344-INT, OX344RX, OX344SV

GENERAL NOTES:

1. THIS OSHPD PREAPPROVAL OF MANUFACTURER'S CERTIFICATION (OPM) IS BASED ON THE CBC 2013. THE DEMAND (DESIGN FORCES) FOR USE WITH THIS OPM SHALL BE BASED ON THE CBC 2013.

2. PRE-APPROVED DESIGN AND MATERIALS CONFORM WITH THE 2013 EDITION OF THE CALIFORNIA BUILDING CODE. DETAILS WITHIN THIS APPROVAL MAY BE USED ANYWHERE IN THE STATE OF CALIFORNIA WHERE $S_{DS} \leq 1.85$.

3. SEISMIC FORCES ON EQUIPMENT DETERMINED PER THE 2013 CBC & ASCE 7-10 SECTION 13.3. ALL LOADS IN THIS PRE-APPROVAL ARE AT STRENGTH LEVEL AND SHALL BE USED FOR STRENGTH DESIGN.

   CASE 1 (EQUIPMENT ABOVE GRADE TO ROOF): $S_{DS} \leq 1.85$, ap=1.0, Rp=1.5, Ip=1.5, Ωo=1.5, $z/h \leq 1.0$
   i. Fp=2.22Wp, Fv=0.37Wp

   CASE 2 (EQUIPMENT AT OR BELOW GRADE): $S_{DS} \leq 1.85$, ap=1.0, Rp=1.5, Ip=1.5, z/h = 0.0, Ωo=1.5
   i. Fp=0.83Wp, Fv=0.37Wp

4. THE STRUCTURAL ENGINEER-OF-RECORD (S.E.O.R.) IS RESPONSIBLE FOR THE FOLLOWING:

   a. VERIFY THAT THE ANCHORS ARE AN ADEQUATE DISTANCE FROM ANY SLAB OPENINGS OR EDGES.

   b. VERIFY THAT THE ANCHORS ARE AN ADEQUATE DISTANCE FROM ANY NEW OR EXISTING ANCHORS.

   c. DESIGN ANY SUPPLEMENTARY MEMBERS AND THEIR ATTACHMENTS WHICH THE UNIT IS ANCHORED TO. VERIFY THE ADEQUACY OF ANY EXISTING MEMBERS AND THEIR ATTACHMENTS WHICH THE UNIT IS ANCHORED TO FOR THE FORCES EXERTED ON THEM BY THE UNIT IN ADDITION TO ALL OTHER LOADS AND FORCES.

   d. VERIFY THAT THE INSTALLATION IS IN CONFORMANCE WITH THE 2013 CBC AND WITH THE DETAILS SHOWN IN THIS PRE-APPROVAL. VERIFY THAT THE EQUIPMENT'S ACTUAL WEIGHT, CG LOCATION, ANCHOR LOCATIONS, ANCHOR DETAILS AND THE MATERIAL AND GAGE OF THE UNIT WHERE ATTACHMENTS ARE MADE AGREE WITH THE FORMATION SHOWN IN THIS PRE-APPROVAL.

5. THE MANUFACTURER SUPPLIED BASE BRACKETS HAVE BEEN EVALUATED FOR THE WORST CASE LOADING PER THE 2013 CBC. STRUCTURAL ENGINEER-OF-RECORD (S.E.O.R.) SHALL EVALUATE BRACKET ANCHORAGE FOR CONDITIONS THAT VARY FROM THIS PRE-APPROVAL.

6. CONTRACTOR/INSPECTOR OF RECORD MUST VERIFY ANCHOR SPACING TO ADJACENT EQUIPMENT IS TO BE GREATER THAN 8".

7. THIS OPM COVERS ONLY THE SUPPORTS AND ATTACHMENTS OF THE UNIT TO THE STRUCTURE

8. EXPANSION OR WEDGE ANCHORS INTO CONCRETE: HILTI KB-TZ (ICC ESR-1917). INSTALL ANCHORS IN ACCORDANCE WITH THE ICC REPORT AND MANUFACTURER'S RECOMMENDATIONS. TEST AT LEAST 50% OF ANCHORS NO SOONER THAN 24 HOURS AFTER INSTALLATIONS. TESTS SHALL BE CONDUCTED IN THE PRESENCE OF THE INSPECTOR OF RECORD (IOR) AND A REPORT OF THE TEST SHALL BE SUBMITTED TO OSHPD.

   TEST PER ONE OF THE FOLLOWING METHODS:

   a. DIRECT PULL TENSION TEST. ANCHOR IS ACCEPTABLE IF NO MOVEMENT IS OBSERVED AT THE TEST LOAD GIVEN IN TABLE BELOW. MOVEMENT MAY BE DETERMINED WHEN THE WASHER UNDER THE NUT BECOMES LOOSE.

   b. TORQUE WRENCH TEST: TEST ANCHORS TO THE REQUIRED TORQUE LOAD GIVEN IN TABLE BELOW WITHIN THE LIMIT OF ONE-HALF TURN OF THE NUT.

ANCHOR TEST LOAD VALUES								
ANCHOR TYPE	ANCHOR DIAMETER	EMBED hef	TENSION LOAD (LBS)	TORQUE LOAD (FT-LBS)	f'c MIN (PSI)	MINIMUM EDGE DIST REQ.	MINIMUM SPACING REQ.	CONCRETE TYPE
HILTI KB-TZ	5/8"	3-1/8"	3,125	60	3,000	12"	4-1/2"	NORMAL WEIGHT
HILTI KB-TZ	3/8"	2"	*	25	3,000	12"	4-1/2"	SAND LIGHT WEIGHT

*TEST $\frac{3}{8}$" EXPANSION ANCHOR USING THE TORQUE WRENCH TEST METHOD PER MANUFACTURER'S RECOMMENDATION.

9. IF ANY ANCHOR FAILS DURING TESTING, UNIT MUST BE MOVED SO THAT NO ANCHOR IS WITHIN 12" OF AN ABANDONED ANCHOR.

10. A MANUFACTURER PROVIDED PERMANENT PLAQUE MUST BE AFFIXED ON THE UNIT STATING THE FOLLOWING: "WEIGHT OF CONTENTS SHALL NOT EXCEED 10 PCF". DESIGNED WEIGHT OF CONTENTS IS 10 PCF. VERIFY IN FIELD BEFORE INSTALLATION.

11. FOR BOLTS THROUGH CONCRETE ON METAL DECK
   A. BOLTS SHALL BE TORQUED BY 3/4 TURN OF THE NUTS AFTER THE SNUG TIGHT CONDITION (SNUG TIGHT CONDITION IS DEFINED AS THE TIGHTNESS REQUIRED TO BRING THE CONNECTED PLIES INTO FIRM CONTACT) IS ACHIEVED.
   B. THROUGH BOLTS IN CONCRETE SHALL RECEIVE SPECIAL INSPECTION AND TESTING IN ACCORDANCE WITH REQUIREMENTS FOR POST-INSTALLED ANCHORS.

12. INSTALLATION PROCEDURE:
   a. MOUNT BASE BRACKET PROVIDED BY OMNICELL TO FLOOR WITH THROUGH BOLTS OR EXPANSION ANCHORS RESPECTIVELY.
   b. ROLL UNIT ONTO BASE BRACKET WITH DOWEL PIN INSERTING INTO BACK CASING OF UNIT.
   c. PIN UNIT AT FRONT WITH END PLATE, CONNECTING IT TO BOTH THE UNIT CASING AND THE CASE BRACKET.

OMNICELL
OSHPD PRE-APPROVAL OF MANUFACTURER CERTIFICATION
OPM 0185-13
OMNI-SUPPLIER ONE-, TWO-, AND THREE-CELL CABINETS

DEGENKOLB ENGINEERS
235 Montgomery Street, Suite 500
San Francisco, CA 94104
415.392.6952 *Phone*
415.981.3157 *Fax*
www.degenkolb.com

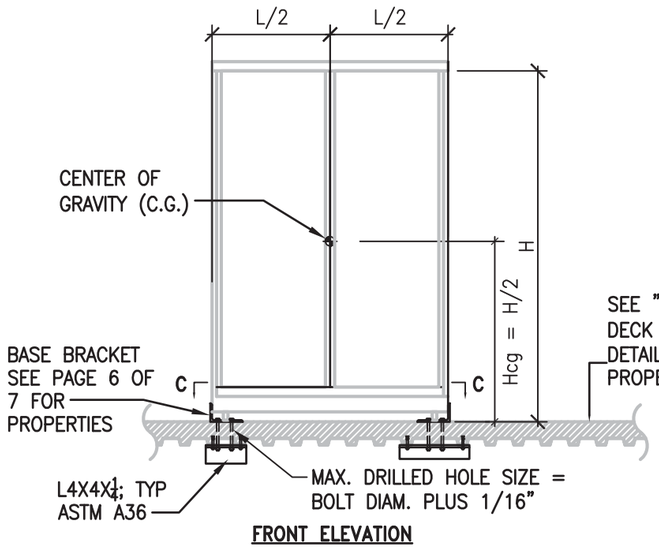
REGISTERED PROFESSIONAL ENGINEER
ADRIAN M. NACHAJ
No. 4857
Exp. 9-30-15
STRUCTURAL
STATE OF CALIFORNIA

OMNI-SUPPLIER ONE-CELL CABINET MODELS
OS104, OSCT104, MDA-FRM-001, MDA-FRM-001-CI, MSA-FRM-001-INT, NAC-FRM-004, NAC-FRM-005, NAC-FRM-009, NAC-FRM-010, OPF-FRM-001, SDA-FRM-001, CSM-FRM-001, CSM-FRM-004-INT, CSM-FRM-007, OPTIX1, OX104, OX104-INT, OX104RX, OX104SV

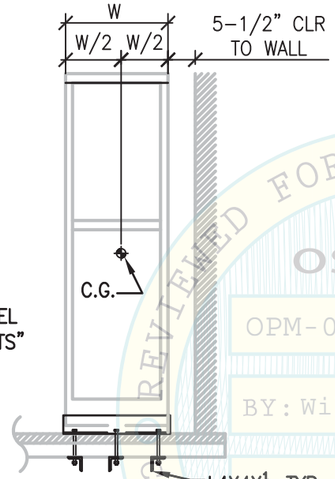
OMNI-SUPPLIER TWO-CELL CABINET MODELS
OS224, OSCT224, MDA-FRM-002, MDA-FRM-002-CI, MSA-FRM-002-INT, NAC-FRM-005, NAC-FRM-006, NAC-FRM-007, NAC-FRM-008, OPF-FRM-002, SDA-FRM-002, CSM-FRM-002, CSM-FRM-005-INT, CSM-FRM-008, OPTIX2, OX224, OX224-INT, OX224RX, OX224SV

OMNI-SUPPLIER THREE-CELL CABINET MODELS
OS344, OSCT344, MDA-FRM-003, MDA-FRM-003-CI, MSA-FRM-003-INT, OPF-FRM-003, SDA-FRM-003, CSM-FRM-003, CSM-FRM-006-INT, CSM-FRM-009, OPTIX3, OX344, OX344-INT, OX344RX, OX344SV

CASE 1 – ONE AND TWO CELL CABINETS ABOVE GRADE
SEE TITLE BLOCK FOR MODEL NUMBERS



FRONT ELEVATION

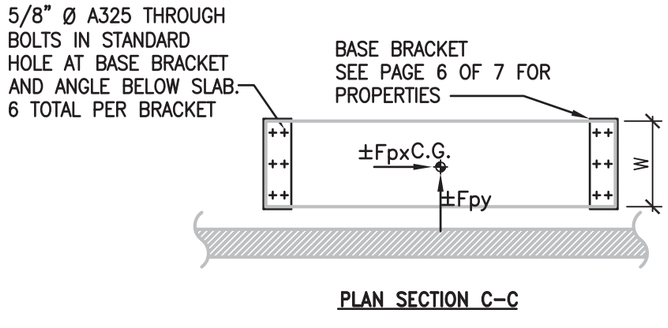


SIDE ELEVATION

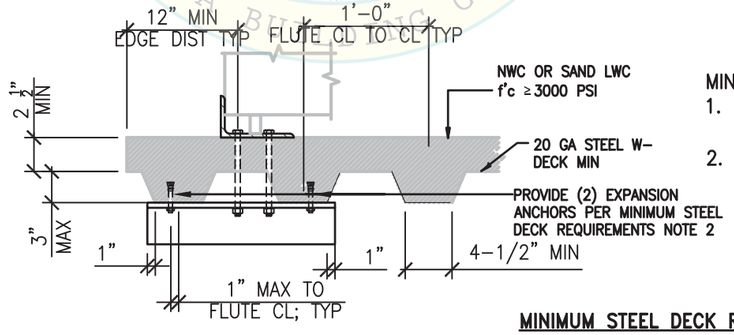
TYPE (SEE TITLE BLOCK FOR MODEL NUMBERS)	Wp (LBS)	FORCES				CABINET PROPERTIES		
		Rult (LBS)	Vult (LBS/BOLT)	Ωo Vult (LBS/BOLT)	Tult (LBS/BOLT)	L (in)	W (in)	H (in)
ONE-CELL CABINETS	1,288	1,714	238	357	1,567	26 1/2	22 1/2	77 1/4
TWO-CELL CABINETS	2,439	2,598	451	677	2,323	51 1/2	22 1/2	77 1/4

Fp=2.22 Wp [S_{DS} = 1.85, Ip=1.5, Rp=1.5, ap=1.0, Ωo=1.5, z/h <=1.0]
Fv=0.37 Wp
Rult = MAXIMUM BRACKET PIN UPLIFT FORCE AT STRENGTH LEVEL
Vult = MAXIMUM SHEAR PER THROUGH BOLT AT STRENGTH LEVEL = (Fp/12 ANCHORS)
Tult = MAXIMUM THROUGH BOLT TENSION FORCE AT STRENGTH LEVEL
Wp = TOTAL WEIGHT; INCLUDES 10 pcf CONTENTS PER NOTE 8 ON PAGE 1 OF 7

NOTES:
1. THE DESIGN OF SUPPORTS AND ATTACHMENTS CONFORMS TO THE 2013 CALIFORNIA BUILDING CODE.
2. Rult, Vult AND Tult GIVEN ARE FACTOR LOADS AT STRENGTH LEVEL. FINAL DEMAND FORCES FOR BEARING ON CONCRETE AND BREAK OUT OF CONCRETE SHOULD INCLUDE OVERSTRENGTH FACTOR Ωo AS DEFINED BY ASCE 7-10.
3. FOR THE SUPPORT AND ATTACHMENT DESIGN, THE MOST CRITICAL LOAD COMBINATION IS (0.9 – 0.2S_{DS})xDL
4. SEE GENERAL NOTES SECTION ON PAGE 1.
5. SEE PAGE 6 OF 7 FOR LOCATION OF APPLIED FORCES IN BASE BRACKET.
6. SEE PAGE 6 FOR MANUFACTURER BRACKET INFORMATION.
7. S.E.O.R. MAY RECALCULATE MAX. ANCHOR FORCES Rult, Vult AND Tult, AT THEIR DISCRETION, BASED ON PROJECT SPECIFIC SEISMIC DEMANDS SUBJECT TO OSHPD REVIEW/PERMIT.
8. TOTAL WEIGHT (Wp) IS A MAXIMUM. THIS PREAPPROVAL ENCOMPASSES ALL WEIGHTS UP TO THE MAXIMUM SHOWN.
9. EQUIPMENT MANUFACTURER MUST DESIGN UNIT TO MAKE Hcg EQUAL OR LESS THAN THE HEIGHT DIMENSION SHOWN.



PLAN SECTION C–C



MINIMUM STEEL DECK REQUIREMENTS

MINIMUM STEEL DECK REQUIREMENTS NOTES:
1. PROVIDE 12" MINIMUM DISTANCE TO EDGE OF SLAB, OPENINGS OR OTHER ATTACHMENTS
2. PROVIDE (2) ⅜" Ø HILTI KB-TZ W/ 2" EMBED EXPANSION ANCHORS TO SUPPORT ANGLE. INSTALL ON THE SLAB RIB INDEPENDENT FROM THROUGH BOLTS. EXTEND ANGLE AS REQUIRED. DO NOT INSTALL EXPANSION ANCHORS IN SLAB RIBS WHERE THROUGH BOLTS ARE PRESENT

OMNICELL
OSHPD PRE-APPROVAL OF MANUFACTURER CERTIFICATION
OPM 0185-13
OMNI-SUPPLIER ONE-, TWO-, AND THREE-CELL CABINETS

DEGENKOLB ENGINEERS
235 Montgomery Street, Suite 500
San Francisco, CA 94104
415.392.6952 *Phone*
415.981.3157 *Fax*
www.degenkolb.com

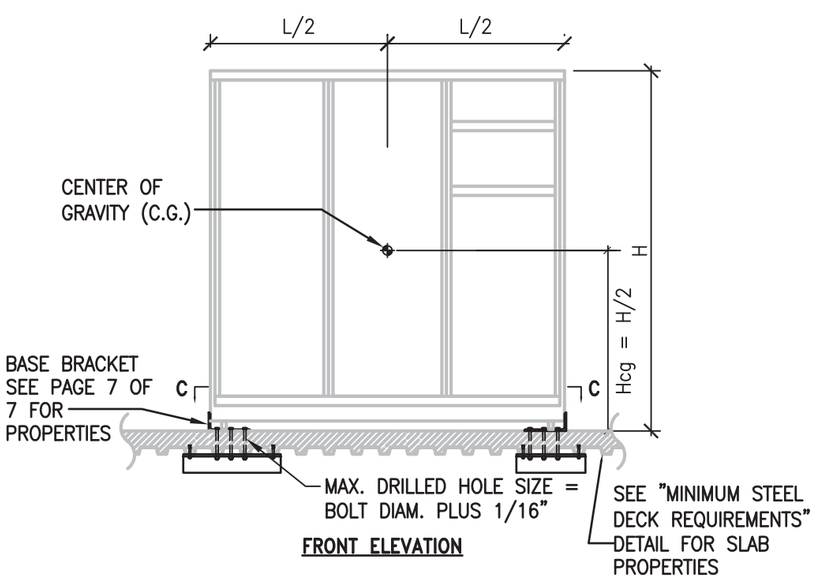
REGISTERED PROFESSIONAL ENGINEER
ADRIAN M. NACHAJ
No. 4857
Exp. 9-30-15
STRUCTURAL
STATE OF CALIFORNIA

OMNI-SUPPLIER ONE-CELL CABINET MODELS
OS104, OSCT104, MDA-FRM-001, MDA-FRM-001-CI, MSA-FRM-001-INT, NAC-FRM-004, NAC-FRM-005, NAC-FRM-009, NAC-FRM-010, OPF-FRM-001, SDA-FRM-001, CSM-FRM-001, CSM-FRM-004-INT, CSM-FRM-007, OPTIX1, OX104, OX104-INT, OX104RX, OX104SV

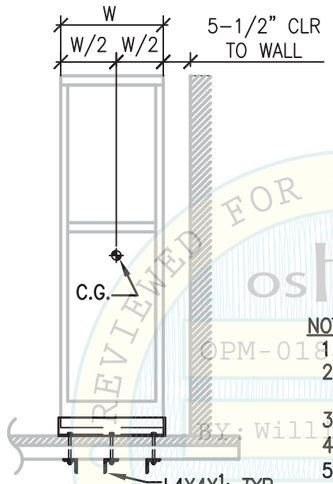
OMNI-SUPPLIER TWO-CELL CABINET MODELS
OS224, OSCT224, MDA-FRM-002, MDA-FRM-002-CI, MSA-FRM-002-INT, NAC-FRM-005, NAC-FRM-006, NAC-FRM-007, NAC-FRM-008, OPF-FRM-002, SDA-FRM-002, CSM-FRM-002, CSM-FRM-005-INT, CSM-FRM-008, OPTIX2, OX224, OX224-INT, OX224RX, OX224SV

OMNI-SUPPLIER THREE-CELL CABINET MODELS
OS344, OSCT344, MDA-FRM-003, MDA-FRM-003-CI, MSA-FRM-003-INT, OPF-FRM-003, SDA-FRM-003, CSM-FRM-003, CSM-FRM-006-INT, CSM-FRM-009, OPTIX3, OX344, OX344-INT, OX344RX, OX344SV

CASE 2 – THREE CELL CABINETS ABOVE GRADE
SEE TITLE BLOCK FOR MODEL NUMBERS



FRONT ELEVATION

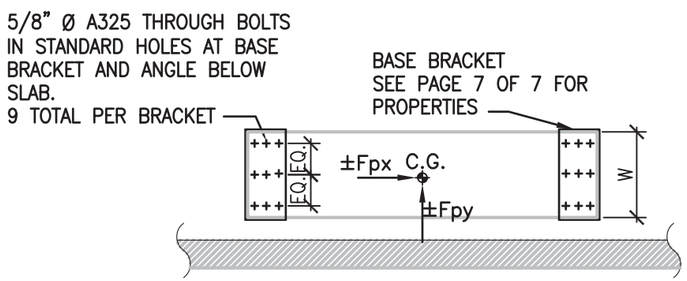


SIDE ELEVATION

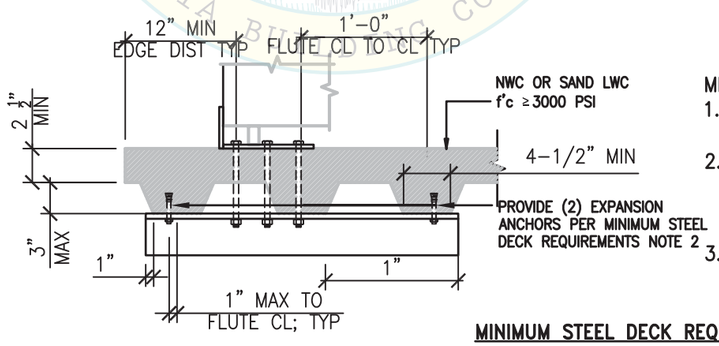
TYPE (SEE TITLE BLOCK FOR MODEL NUMBERS)	Wp (LBS)	FORCES				CABINET PROPERTIES		
		Rult (LBS)	Vult (LBS/BOLT)	Ωo Vult (LBS/BOLT)	Tult (LBS/BOLT)	L (in)	W (in)	H (in)
THREE CELL CABINETS	3,587	2,442	442	663	2,165	76 1/4	22 1/2	77 1/4

Fp=2.22 Wp [$S_{DS} \leq 1.85$, Ip=1.5, Rp=1.5, ap=1.0, Ωo=1.5, z/h <=1.0]
Fv=0.37 Wp
Rult = MAXIMUM BRACKET PIN UPLIFT FORCE AT STRENGTH LEVEL
Vult = MAXIMUM SHEAR PER THROUGH BOLT AT STRENGTH LEVEL = (Fp/18 ANCHORS)
Tult = MAXIMUM THROUGH BOLT TENSION FORCE AT STRENGTH LEVEL
Wp = TOTAL WEIGHT; INCLUDES 10 pcf CONTENTS PER NOTE 8 ON PAGE 1 OF 7

NOTES:
1. THE DESIGN OF SUPPORTS AND ATTACHMENTS CONFORMS TO THE 2013 CALIFORNIA BUILDING CODE.
2. Rult, Vult AND Tult GIVEN ARE FACTOR LOADS AT STRENGTH LEVEL. FINAL DEMAND FORCES FOR BEARING ON CONCRETE AND BREAK OUT OF CONCRETE SHOULD INCLUDE OVERSTRENGTH FACTOR Ωo AS DEFINED BY ASCE 7-10.
3. SEE GENERAL NOTES SECTION ON PAGE 1.
4. FOR THE SUPPORT AND ATTACHMENT DESIGN, THE MOST CRITICAL LOAD COMBINATION IS $(0.9 - 0.2S_{DS})$xDL
5. SEE PAGE 7 OF 7 FOR LOCATION OF APPLIED FORCES IN BASE BRACKET.
6. SEE PAGE 7 FOR MANUFACTURER BRACKET INFORMATION.
7. S.E.O.R. MAY RECALCULATE MAX. ANCHOR FORCES Rult, Vult AND Tult, AT THEIR DISCRETION, BASED ON PROJECT SPECIFIC SEISMIC DEMANDS SUBJECT TO OSHPD REVIEW/PERMIT.
8. TOTAL WEIGHT (Wp) IS A MAXIMUM. THIS PREAPPROVAL ENCOMPASSES ALL WEIGHTS UP TO THE MAXIMUM SHOWN.
9. EQUIPMENT MANUFACTURER MUST DESIGN UNIT TO MAKE Hcg EQUAL OR LESS THAN THE HEIGHT DIMENSION SHOWN.



PLAN SECTION C-C



MINIMUM STEEL DECK REQUIREMENTS

MINIMUM STEEL DECK REQUIREMENTS NOTES:
1. PROVIDE 12" MINIMUM DISTANCE TO EDGE OF SLAB, OPENINGS OR OTHER ATTACHMENTS
2. PROVIDE (2) 3/8" Ø HILTI KB-TZ W/ 2" EMBED EXPANSION ANCHORS TO SUPPORT ANGLE. INSTALL ON THE SLAB RIB INDEPENDENT FROM THROUGH BOLTS. EXTEND ANGLE AS REQUIRED. DO NOT INSTALL EXPANSION ANCHORS IN SLAB RIBS WHERE THROUGH BOLTS ARE PRESENT.
3. W- STEEL DECK TO BE 20 GAGE MIN.

OMNICELL
OSHPD PRE-APPROVAL OF MANUFACTURER CERTIFICATION
OPM 0185-13
OMNI-SUPPLIER ONE-, TWO-, AND THREE-CELL CABINETS

DEGENKOLB ENGINEERS
235 Montgomery Street, Suite 500
San Francisco, CA 94104
415.392.6952 *Phone*
415.981.3157 *Fax*
www.degenkolb.com

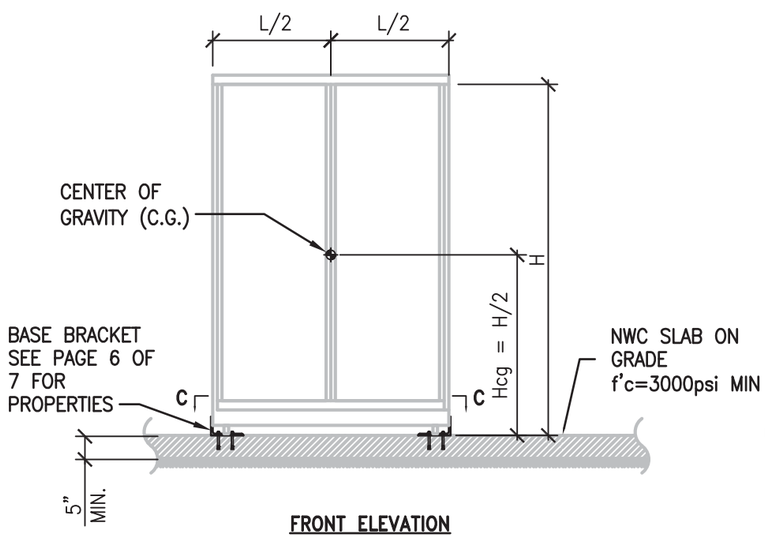
REGISTERED PROFESSIONAL ENGINEER
ADRIAN M. NACHAJ
No. 4857
Exp. 9-30-15
STRUCTURAL
STATE OF CALIFORNIA

OMNI-SUPPLIER ONE-CELL CABINET MODELS
OS104, OSCT104, MDA-FRM-001, MDA-FRM-001-CI, MSA-FRM-001-INT, NAC-FRM-004, NAC-FRM-005, NAC-FRM-009, NAC-FRM-010, OPF-FRM-001, SDA-FRM-001, CSM-FRM-001, CSM-FRM-004-INT, CSM-FRM-007, OPTIX1, OX104, OX104-INT, OX104RX, OX104SV

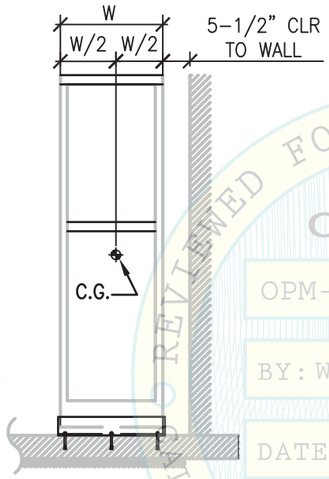
OMNI-SUPPLIER TWO-CELL CABINET MODELS
OS224, OSCT224, MDA-FRM-002, MDA-FRM-002-CI, MSA-FRM-002-INT, NAC-FRM-005, NAC-FRM-006, NAC-FRM-007, NAC-FRM-008, OPF-FRM-002, SDA-FRM-002, CSM-FRM-002, CSM-FRM-005-INT, CSM-FRM-008, OPTIX2, OX224, OX224-INT, OX224RX, OX224SV

OMNI-SUPPLIER THREE-CELL CABINET MODELS
OS344, OSCT344, MDA-FRM-003, MDA-FRM-003-CI, MSA-FRM-003-INT, OPF-FRM-003, SDA-FRM-003, CSM-FRM-003, CSM-FRM-006-INT, CSM-FRM-009, OPTIX3, OX344, OX344-INT, OX344RX, OX344SV

CASE 3 – ONE AND TWO CELL CABINETS ON GRADE
SEE TITLE BLOCK FOR MODEL NUMBERS



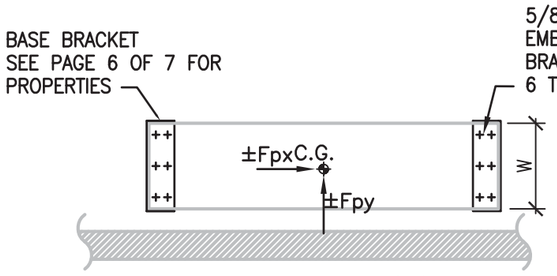
FRONT ELEVATION



SIDE ELEVATION

TYPE (SEE TITLE BLOCK FOR MODEL NUMBERS)	Wp (LBS)	FORCES					CABINET PROPERTIES		
		Rult (LBS)	Vult (LBS/BOLT)	ΩoVult (LBS/BOLT)	Tult (LBS/BOLT)	ΩoTult (LBS/BOLT)	L (in)	W (in)	H (in)
ONE-CELL CABINETS	1,288	589	89	134	627	885	26 1/2	22 1/2	77 1/4
TWO-CELL CABINETS	2,439	873	168	252	943	1313	51 1/2	22 1/2	77 1/4

Fp=0.83 Wp [$S_{DS} \leq 1.85$, Ip=1.5, Rp=1.5, ap=1.0, Ω_o=1.5, z/h=0]
Fv=0.37 Wp
Rult = MAXIMUM BRACKET PIN UPLIFT FORCE AT STRENGTH LEVEL
Vult = MAXIMUM SHEAR PER EXPANSION ANCHOR AT STRENGTH LEVEL = (Fp/12 ANCHORS)
Tult = MAXIMUM EXPANSION ANCHOR TENSION FORCE AT STRENGTH LEVEL
Wp = TOTAL WEIGHT; INCLUDES 10 pcf CONTENTS PER NOTE 8 ON PAGE 1 OF 7



PLAN SECTION C–C

NOTES:
1. THE DESIGN OF SUPPORTS AND ATTACHMENTS CONFORMS TO THE 2013 CALIFORNIA BUILDING CODE.
2. Rult, Vult AND Tult GIVEN ARE FACTOR LOADS AT STRENGTH LEVEL. FINAL DEMAND FORCES FOR ANCHORAGE TO CONCRETE SHOULD INCLUDE OVERSTRENGTH FACTOR Ωo AS DEFINED BY ASCE 7–10.
3. FOR THE SUPPORT AND ATTACHMENT DESIGN, THE MOST CRITICAL LOAD COMBINATION IS (0.9 – 0.2S_{DS})xDL
4. SEE GENERAL NOTES SECTION ON PAGE 1.
5. SEE PAGE 6 OF 7 FOR LOCATION OF APPLIED FORCES IN BASE BRACKET.
6. SEE PAGE 6 FOR MANUFACTURER BRACKET INFORMATION.
7. S.E.O.R. MAY RECALCULATE MAX. ANCHOR FORCES Rult, Vult AND Tult, AT THEIR DISCRETION, BASED ON PROJECT SPECIFIC SEISMIC DEMANDS SUBJECT TO OSHPD REVIEW/PERMIT.
8. TOTAL WEIGHT (Wp) IS A MAXIMUM. THIS PREAPPROVAL ENCOMPASSES ALL WEIGHTS UP TO THE MAXIMUM SHOWN.
9. EQUIPMENT MANUFACTURER MUST DESIGN UNIT TO MAKE Hcg EQUAL OR LESS THAN THE HEIGHT DIMENSION SHOWN.

OMNICELL
OSHPD PRE-APPROVAL OF MANUFACTURER CERTIFICATION
OPM 0185-13
OMNI-SUPPLIER ONE-, TWO-, AND THREE-CELL CABINETS

DEGENKOLB ENGINEERS
235 Montgomery Street, Suite 500
San Francisco, CA 94104
415.392.6952 *Phone*
415.981.3157 *Fax*
www.degenkolb.com

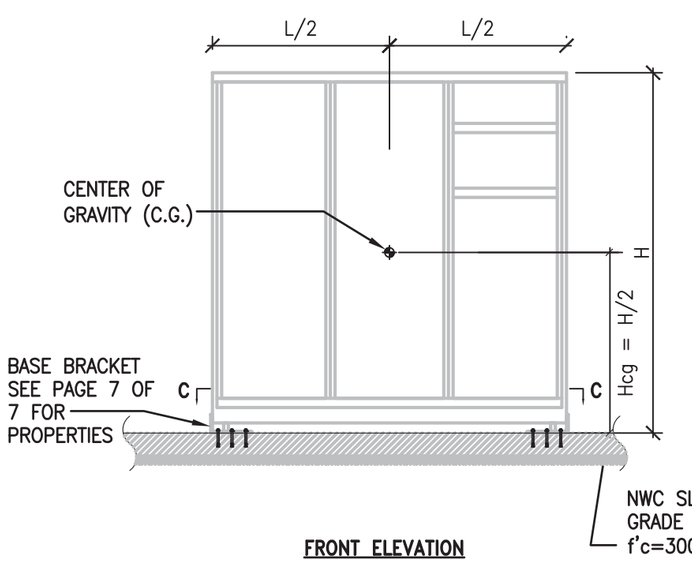
REGISTERED PROFESSIONAL ENGINEER
ADRIAN M. NACHMAN
No. 4857
Exp. 9-30-15
STRUCTURAL
STATE OF CALIFORNIA

OMNI-SUPPLIER ONE-CELL CABINET MODELS
OS104, OSCT104, MDA-FRM-001, MDA-FRM-001-CI, MSA-FRM-001-INT, NAC-FRM-004, NAC-FRM-005, NAC-FRM-009, NAC-FRM-010, OPF-FRM-001, SDA-FRM-001, CSM-FRM-001, CSM-FRM-004-INT, CSM-FRM-007, OPTIX1, OX104, OX104-INT, OX104RX, OX104SV

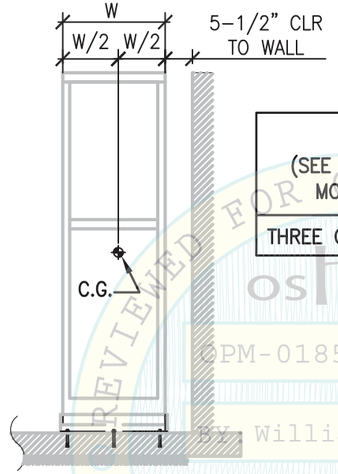
OMNI-SUPPLIER TWO-CELL CABINET MODELS
OS224, OSCT224, MDA-FRM-002, MDA-FRM-002-CI, MSA-FRM-002-INT, NAC-FRM-005, NAC-FRM-006, NAC-FRM-007, NAC-FRM-008, OPF-FRM-002, SDA-FRM-002, CSM-FRM-002, CSM-FRM-005-INT, CSM-FRM-008, OPTIX2, OX224, OX224-INT, OX224RX, OX224SV

OMNI-SUPPLIER THREE-CELL CABINET MODELS
OS344, OSCT344, MDA-FRM-003, MDA-FRM-003-CI, MSA-FRM-003-INT, OPF-FRM-003, SDA-FRM-003, CSM-FRM-003, CSM-FRM-006-INT, CSM-FRM-009, OPTIX3, OX344, OX344-INT, OX344RX, OX344SV

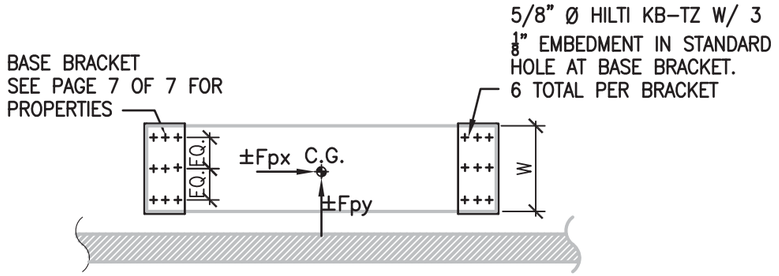
CASE 4 – THREE CELL CABINETS ON GRADE
SEE TITLE BLOCK FOR MODEL NUMBERS



FRONT ELEVATION



SIDE ELEVATION



PLAN SECTION C–C

TYPE (SEE TITLE BLOCK FOR MODEL NUMBERS)	Wp (LBS)	FORCES					CABINET PROPERTIES		
		Rult (LBS)	Vult (LBS/BOLT)	ΩoVult (LBS/BOLT)	Tult (LBS/BOLT)	ΩoTult (LBS/BOLT)	L (in)	W (in)	H (in)
THREE CELL CABINETS	3,587	817	165	248	820	1217	76 1/4	22 1/2	77 1/4

$Fp=0.83\ Wp\ [S_{DS} \leq = 1.85,\ Ip=1.5,\ Rp=1.5,\ ap=1.0,\ \Omega o=1.5,\ z/h <=1.0]$
$Fv=0.37\ Wp$
Rult = MAXIMUM BRACKET PIN UPLIFT FORCE AT STRENGTH LEVEL
Vult = MAXIMUM SHEAR PER EXPANSION ANCHOR AT STRENGTH LEVEL = (Fp/18 ANCHORS)
Tult = MAXIMUM EXPANSION ANCHOR TENSION FORCE AT STRENGTH LEVEL
Wp = TOTAL WEIGHT; INCLUDES 10 pcf CONTENTS PER NOTE 8 ON PAGE 1 OF 7

NOTES:
1. THE DESIGN OF SUPPORTS AND ATTACHMENTS CONFORMS TO THE 2013 CALIFORNIA BUILDING CODE.
2. Rult, Vult AND Tult GIVEN ARE FACTORED LOADS AT STRENGTH LEVEL. FINAL DEMAND FORCES FOR ANCHORAGE TO CONCRETE SHOULD INCLUDE OVERSTRENGTH FACTOR Ωo AS DEFINED BY ASCE 7–10.
3. FOR THE SUPPORT AND ATTACHMENT DESIGN, THE MOST CRITICAL LOAD COMBINATION IS $(0.9 - 0.2S_{DS})$xDL
4. SEE GENERAL NOTES SECTION ON PAGE 1.
5. SEE PAGE 7 OF 7 FOR LOCATION OF APPLIED FORCES IN BASE BRACKET.
6. SEE PAGE 7 FOR MANUFACTURER BRACKET INFORMATION.
7. S.E.O.R. MAY RECALCULATE MAX. ANCHOR FORCES Rult, Vult AND Tult, AT THEIR DISCRETION, BASED ON PROJECT SPECIFIC SEISMIC DEMANDS SUBJECT TO OSHPD REVIEW/PERMIT.
8. TOTAL WEIGHT (Wp) IS A MAXIMUM. THIS PREAPPROVAL ENCOMPASSES ALL WEIGHTS UP TO THE MAXIMUM SHOWN.
9. EQUIPMENT MANUFACTURER MUST DESIGN UNIT TO MAKE Hcg EQUAL OR LESS THAN THE HEIGHT DIMENSION SHOWN.

OMNICELL
OSHPD PRE-APPROVAL OF MANUFACTURER CERTIFICATION
OPM 0185-13
OMNI-SUPPLIER ONE-, TWO-, AND THREE-CELL CABINETS

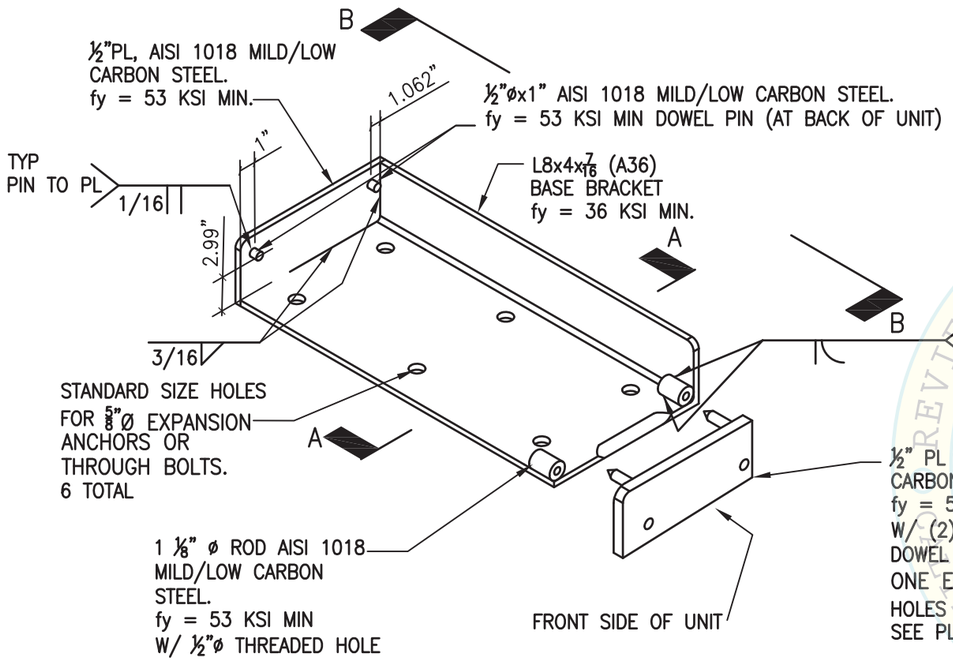
DEGENKOLB ENGINEERS
235 Montgomery Street, Suite 500
San Francisco, CA 94104
415.392.6952 *Phone*
415.981.3157 *Fax*
www.degenkolb.com

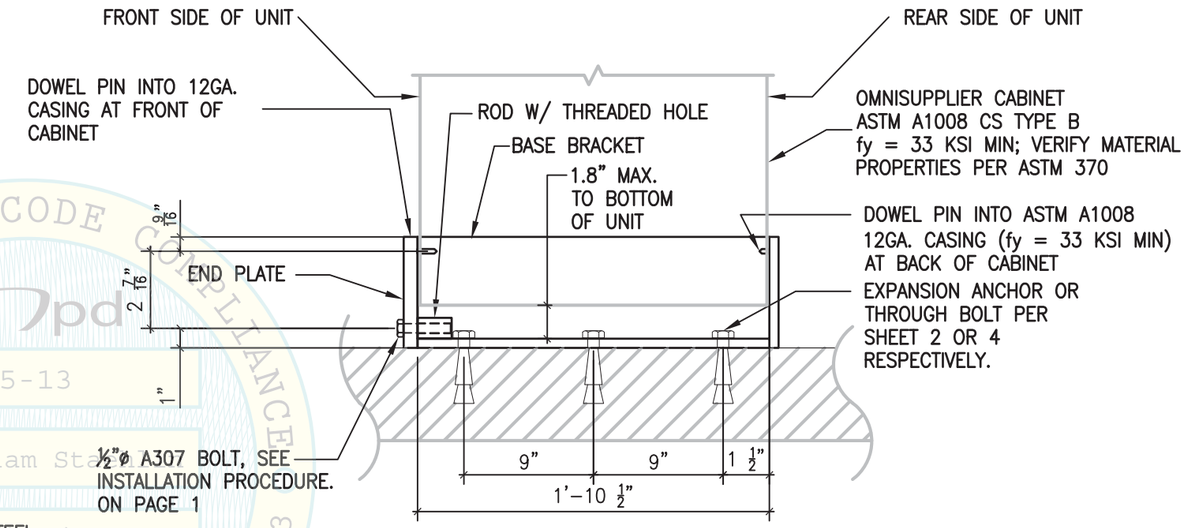
REGISTERED PROFESSIONAL ENGINEER
ADRIAN M. NACHAJ
No. 4857
Exp. 9-30-15
STRUCTURAL
STATE OF CALIFORNIA

OMNI-SUPPLIER ONE-CELL CABINET MODELS
OS104, OSCT104, MDA-FRM-001, MDA-FRM-001-CI, MSA-FRM-001-INT, NAC-FRM-004, NAC-FRM-005, NAC-FRM-009, NAC-FRM-010, OPF-FRM-001, SDA-FRM-001, CSM-FRM-001, CSM-FRM-004-INT, CSM-FRM-007, OPTIX1, OX104, OX104-INT, OX104RX, OX104SV

OMNI-SUPPLIER TWO-CELL CABINET MODELS
OS224, OSCT224, MDA-FRM-002, MDA-FRM-002-CI, MSA-FRM-002-INT, NAC-FRM-005, NAC-FRM-006, NAC-FRM-007, NAC-FRM-008, OPF-FRM-002, SDA-FRM-002, CSM-FRM-002, CSM-FRM-005-INT, CSM-FRM-008, OPTIX2, OX224, OX224-INT, OX224RX, OX224SV

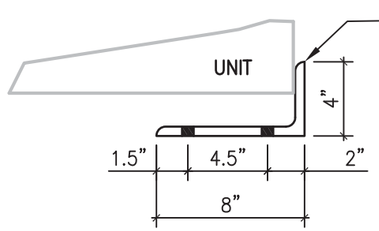
OMNI-SUPPLIER THREE-CELL CABINET MODELS
OS344, OSCT344, MDA-FRM-003, MDA-FRM-003-CI, MSA-FRM-003-INT, OPF-FRM-003, SDA-FRM-003, CSM-FRM-003, CSM-FRM-006-INT, CSM-FRM-009, OPTIX3, OX344, OX344-INT, OX344RX, OX344SV



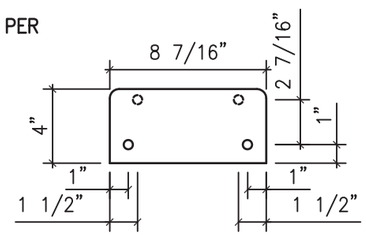


SECTION B–B

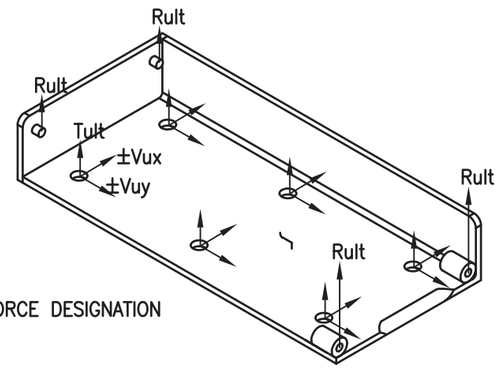
ISOMETRIC VIEW OF BASE BRACKET FOR ONE AND TWO CELL CABINETS
SEE TITLE BLOCK FOR MODEL NUMBERS



SECTION A–A



1/2" PL ON THE FRONT SIDE OF THE UNIT



NOTE
SEE PAGE 2 AND 4 OF 7 FOR FORCE DESIGNATION

FORCE DISTRIBUTION IN BASE BRACKET

OMNICELL
OSHPD PRE-APPROVAL OF MANUFACTURER CERTIFICATION
OPM 0185-13
OMNI-SUPPLIER ONE-, TWO-, AND THREE-CELL CABINETS

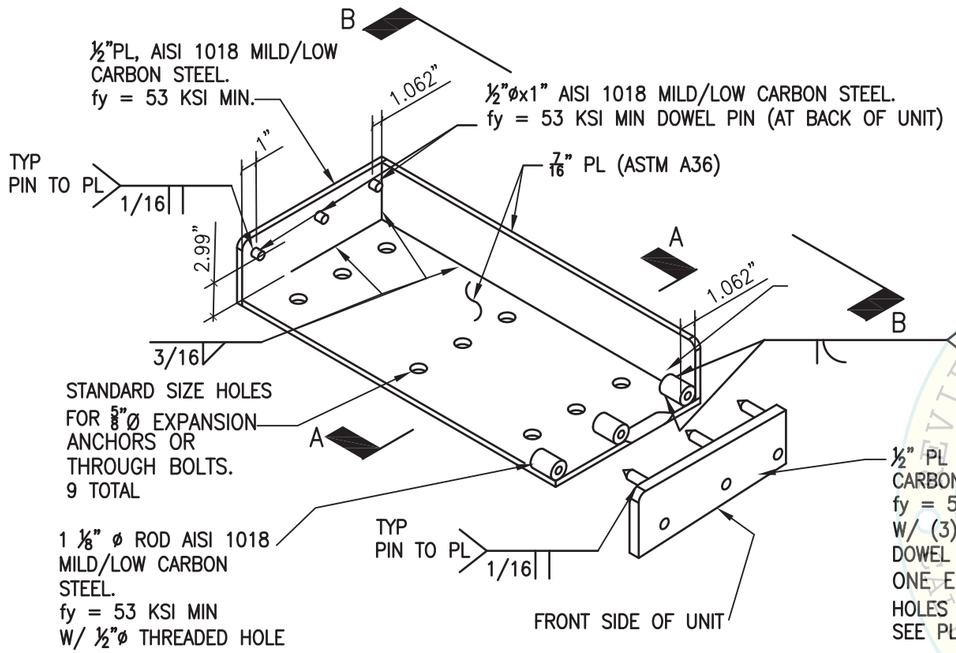
DEGENKOLB ENGINEERS
235 Montgomery Street, Suite 500
San Francisco, CA 94104
415.392.6952 *Phone*
415.981.3157 *Fax*
www.degenkolb.com

REGISTERED PROFESSIONAL ENGINEER
ADRIAN M. NACHAJ
No. 4857
Exp. 9-30-15
STRUCTURAL
STATE OF CALIFORNIA

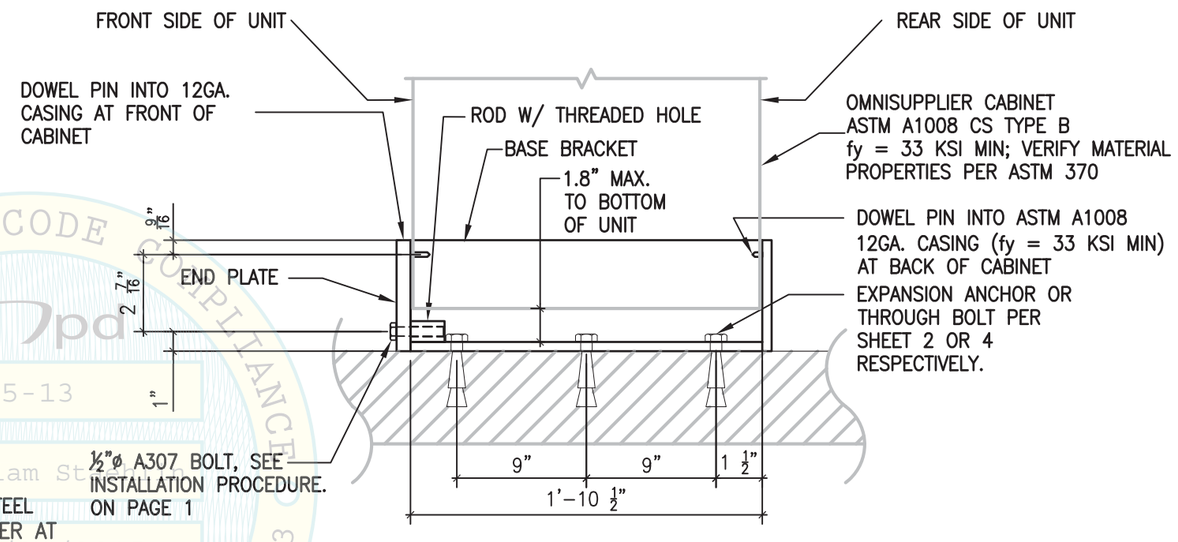
OMNI-SUPPLIER ONE-CELL CABINET MODELS
OS104, OSCT104, MDA-FRM-001, MDA-FRM-001-CI, MSA-FRM-001-INT, NAC-FRM-004, NAC-FRM-005, NAC-FRM-009, NAC-FRM-010, OPF-FRM-001, SDA-FRM-001, CSM-FRM-001, CSM-FRM-004-INT, CSM-FRM-007, OPTIX1, OX104, OX104-INT, OX104RX, OX104SV

OMNI-SUPPLIER TWO-CELL CABINET MODELS
OS224, OSCT224, MDA-FRM-002, MDA-FRM-002-CI, MSA-FRM-002-INT, NAC-FRM-005, NAC-FRM-006, NAC-FRM-007, NAC-FRM-008, OPF-FRM-002, SDA-FRM-002, CSM-FRM-002, CSM-FRM-005-INT, CSM-FRM-008, OPTIX2, OX224, OX224-INT, OX224RX, OX224SV

OMNI-SUPPLIER THREE-CELL CABINET MODELS
OS344, OSCT344, MDA-FRM-003, MDA-FRM-003-CI, MSA-FRM-003-INT, OPF-FRM-003, SDA-FRM-003, CSM-FRM-003, CSM-FRM-006-INT, CSM-FRM-009, OPTIX3, OX344, OX344-INT, OX344RX, OX344SV

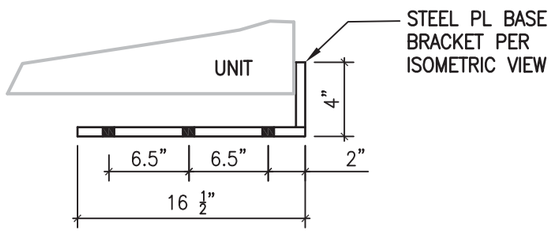


½" PL AISI 1018 MILD/LOW CARBON STEEL.
fy = 53 KSI MIN
W/ (3) ½"øX1-1/2"LONG STEEL DOWEL PINS W/ 75° CHAMFER AT ONE END AND (3) STANDARD SIZE HOLES FOR ½" ø A307 BOLTS
SEE PL ELEVATION BELOW

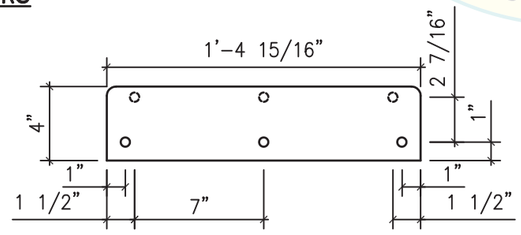


SECTION B–B

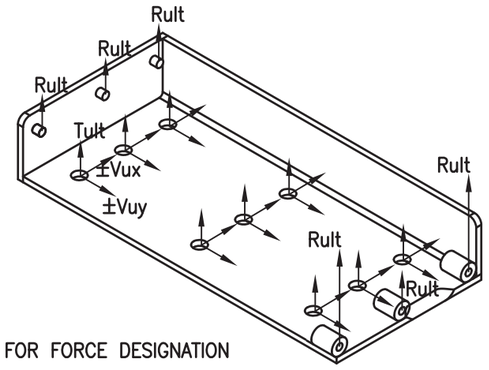
ISOMETRIC VIEW OF BASE BRACKET FOR THREE CELL CABINETS
SEE TITLE BLOCK FOR MODEL NUMBERS



SECTION A–A



½" PL ON THE FRONT SIDE OF THE UNIT



NOTE
SEE PAGE 3 AND 5 OF 7 FOR FORCE DESIGNATION

FORCE DISTRIBUTION IN BASE BRACKET