



**DEPARTMENT OF HEALTH CARE ACCESS AND INFORMATION
FACILITIES DEVELOPMENT DIVISION**

**APPLICATION FOR HCAI SPECIAL SEISMIC
CERTIFICATION PREAPPROVAL (OSP)**

OFFICE USE ONLY

APPLICATION #: OSP-0309

HCAI Special Seismic Certification Preapproval (OSP)

Type: New Renewal

Manufacturer Information

Manufacturer: ABB, Inc.

Manufacturer's Technical Representative: B.P. Anilkumar

Mailing Address: 41 Woodford Avenue, Plainville, CT 06062-2372

Telephone: (860) 747-7623

Email: anilkumar.bp@us.abb.com

Product Information

Product Name: Industrial Control Panels

Product Type: Pump Control Panels

Product Model Number: See Certified Product Table attached.

General Description: Rigidly wall mounted enclosed non-combination starters, combination starters, lighting contactors, pump panels, and RV starters and a rigidly floor mounted pump panel.

Mounting Description: Rigid, Floor/Wall Mounted

Tested Seismic Enhancements: Seismic enhancements made to the test units and/or modifications required to address anomalies during the tests shall be incorporated into the production units.

Applicant Information

Applicant Company Name: WE Gundy & Associates, Inc

Contact Person: Travis Soppe

Mailing Address: PO Box 9121, Boise, ID 83707

Telephone: (208) 342-5989

Email: tsoppe@wegai.com

Title: President





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California Licensed Structural Engineer Responsible for the Engineering and Test Report(s)

Company Name: W.E. GUNDY & ASSOCIATES INC.
Name: Travis Soppe California License Number: S6115
Mailing Address: P.O. Box 9121, Boise, ID 83707
Telephone: (208) 342-5989 Email: tsoppe@wegai.com

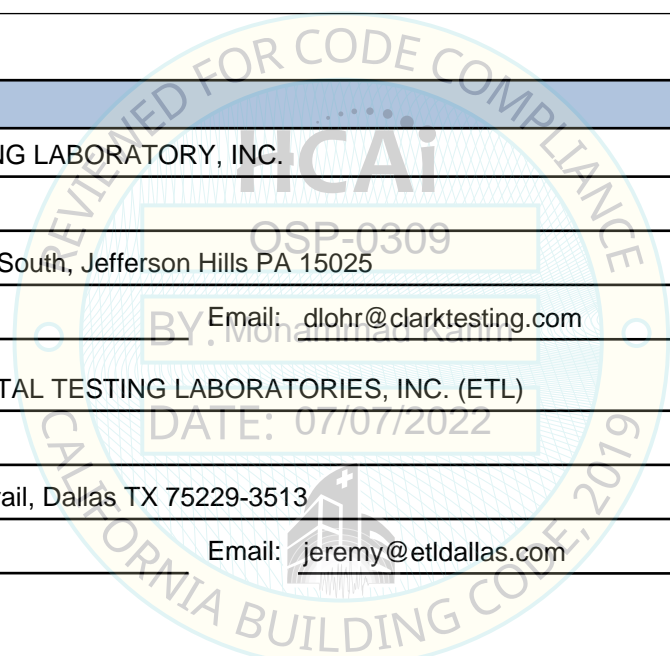
Certification Method

GR-63-Core ICC-ES AC156 IEEE 344 IEEE 693 NEBS 3
 Other (Please Specify): _____

Testing Laboratory

Company Name: CLARK TESTING LABORATORY, INC.
Contact Person: Devon Lohr
Mailing Address: 1801 Route 51 South, Jefferson Hills PA 15025
Telephone: (412) 387-1027 Email: dlohr@clarktesting.com

Company Name: ENVIRONMENTAL TESTING LABORATORIES, INC. (ETL)
Contact Person: Jeremy Lange
Mailing Address: 11034 Indian Trail, Dallas TX 75229-3513
Telephone: (972) 247-9657 Email: jeremy@etldallas.com





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Seismic Parameters

Design Basis of Equipment or Components (F_p/W_p) = 1.13 (SDS=1.5, z/h =1.0) or 1.5 (SDS=2.0 and z/h =1.0)

SDS (Design spectral response acceleration at short period, g) = 1.5 or 2.0 at z/h = 1.0 (See Certified product Table)

a_p (Amplification factor) = 2.5

R_p (Response modification factor) = 6.0

Ω_0 (System overstrength factor) = 2.0

I_p (Importance factor) = 1.5

z/h (Height ratio factor) = 1 and 0

Natural frequencies (Hz) = See Attachment

Overall dimensions and weight = See Attachment

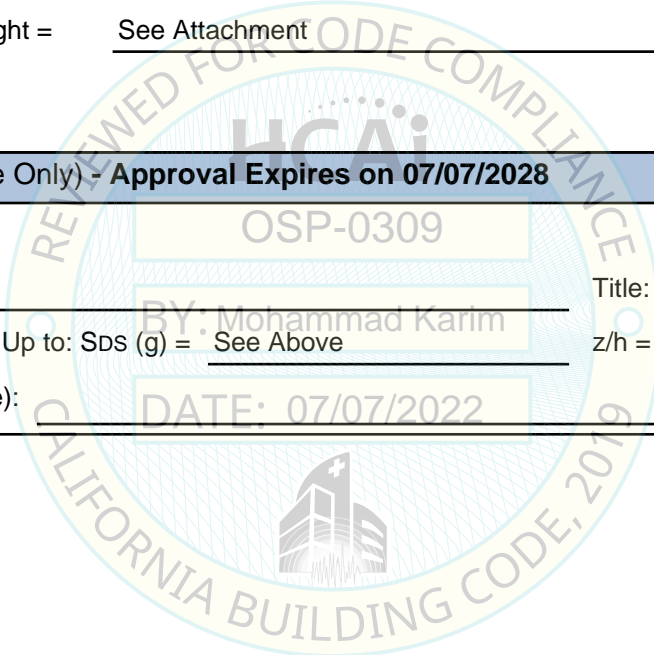
HCAI Approval (For Office Use Only) - Approval Expires on 07/07/2028

Date: 7/7/2022

Name: Mohammad Karim Title: Supervisor, Health Facilities

Special Seismic Certification Valid Up to: SDS (g) = See Above z/h = See Above

Condition of Approval (if applicable): DATE: 07/07/2022



ABB, INC. GENERAL PURPOSE CONTROLS CERTIFIED PRODUCT LINE MATRICES



ID/Catalog Number ¹	Frame Size	NEMA Rating	Equipment Dimensions			Weight (lbs)	Representative UUT ²
			Width (in)	Depth (in)	Height (in)		
Table 1: Floor Mounted General Purpose Controls/Pump Panel - Max S_{DS} = 1.5 at z/h = 1.0 and S_{DS} = 2.4 at z/h = 0							
PPEF6-3R	6	3R	26.0	24.0	97.0	520	UUT _z -7
GPCEF6/PPEF6-1,3R,12,4X	6	1/3R/12/4X	26.0 - 35.0	21.0 - 24.0	82.0 - 97.0	300 - 676	interpolated
GPCEF6-4X	6	4X	35.0	21.0	82.0	676	UUT _y -6
Table 2: Wall Mounted General Purpose Controls/Pump Panels Product Line - Max S_{DS} = 2.0 at z/h = 1.0 and S_{DS} = 2.5 at z/h = 0							
GPCEW0-1	0	1	6.0	5.4	10.0	6	UUT _z -1
GPCEW0-1,3R,12,4X	0	1/3R/12/4X	6.0 - 12.0	4.0 - 9.0	10.0 - 29.4	5 - 66	interpolated
GPCEW0-3R	0	3R	11.2	8.4	29.4	58	UUT _y -4
GPCEW1-1,3R,12,4X	1	1/3R/12/4X	6.0 - 21.0	4.0 - 9.0	10.0 - 34.0	5 - 90	interpolated
PPEW1-3R	1-2	3R	11.0 - 20.0	7.0	28.0	90	interpolated
GPCEW2-1	2	1	14.0	8.0	18.0	34	UUT _z -5
GPCEW2-1,3R,12,4X	2	1/3R/12/4X	7.0 - 21.0	6.0 - 9.0	13.0 - 34.0	15 - 90	Interpolated
GPCEW3-1	3	1	10.0	7.0	24.0	27	UUT _z -3
GPCEW3-1,3R,12,4X	3	1/3R/12/4X	8.0 - 25.0	7.0 - 9.0	20.0 - 51.0	20 - 195	interpolated
PPEW4-3R	3-4	3R	25.0	8.0	42.0	285	interpolated
GPCEW4-1	4	1	23.0	8.5	54.0	177	UUT _y -5
GPCEW4-1,3R,12,4X	4	1/3R/12/4X	8.0 - 31.0	7.0 - 10.0	25.0 - 52.0	20 - 369	interpolated
GPCEW5-1,3R,12,4X	5	1/3R/12/4X	18.0 - 31.0	10.0 - 13.0	45.0 - 54.0	50 - 369	interpolated
GPCEW5-4X	5	4X	31.0	13.0	54.0	306	UUT _y -13
PPEW5-3R	5	3R	31.0	13.0	54.0	369	UUT _y -12

General Notes:

¹ The general purpose controls product line identifies different frame size enclosures that house internal components. The internal components create the following control configurations; enclosed combination starters, non-combination starters, lighting contactors, pump panels, and RV starters. The seismic certification is limited to configurations that utilize the seismically certified subcomponents identified in the subcomponent certification matrix.

² Subscript indicates the test report in which the units were qualified: _y - 16380, _z - 10277

Example Nomenclature = GPCEW01: General Purpose Control Enclosure Wall Mounted NEMA Size 0 Type 1
PPEW5-3R: Pump Panel Enclosure Wall Mounted NEMA Size 5 Type 3R

ABB, INC. GENERAL PURPOSE CONTROLS CERTIFIED SUBCOMPONENT MATRICES (WALL)



Identification Number	Manufacturer	Description	Approximate Weights (lbs)	Representative UUT ¹
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Table 3: Magnetic Contactor

CR305	ABB (formerly GE)	18A	< 10	UUT _z -1 / UUT _z -3 / UUT _y -4
CR305		37A, 45A	< 10	interpolated
CR305		90A, 135A	17.5	interpolated
CR305		135A	17.5	UUT _y -5
CR305		270A	50	UUT _y -12 / UUT _y -13

Table 4: Overload Relay (Thermal and EOL)

CR324	ABB (formerly GE)	27A	< 10	UUT _z -3 / UUT _y -4
CR324		27A-270A	< 10	interpolated
CR324		135A	< 10	UUT _y -5
CR324		270A	< 10	UUT _y -12 / UUT _y -13

Table 6: Lightning Contactor

CR460	ABB (formerly GE)	30A	< 10	UUT _z -5 / UUT _y -13
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Table 7: Control Power Transformer

9T58K	ABB (formerly GE)	0.05kVA	< 10	UUT _y -4
9T58K		0.05kVA, 0.075kVA	< 10	interpolated
9T58K		0.10kVA	< 10	UUT _z -5
9T58K		0.15kVA, 0.30kVA	< 10	interpolated
9T58K		0.25kVA	< 10	UUT _y -5 / UUT _y -13
B150	Micron ImperviTRAN	0.15kVA	< 10	UUT _y -12
143872	NECO Hammond	0.05kVA	< 10	UUT _y -5 / UUT _y -13

Table 8: Disconnect

TH3361	ABB	ABB Open Safety Switch 30A	3	UUT _y -4
THXXXXXX	ABB	ABB Open Safety Switch 30-200A	3-8	interpolated
TH3364	ABB	ABB Open Safety Switch 200A	8	UUT _y -5

Table 9: XT Circuit Breakers

XT2	ABB	125A	< 10	UUT _y -13
XT4	ABB	250A	< 10	interpolated
XT5	ABB	600A	10	UUT _y -12 / UUT _y -13

Table 10: Phase Voltage Relay

1SVR750433R	ABB	Voltage Relay	< 10	UUT _y -5 / UUT _y -12 / UUT _y -13
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Table 11: Lightning Arrester

TPS	Siemens	Lightning Arrester	< 10	UUT _y -12
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Table 12: Space Heater

CR305X7	ABB (formerly GE)	50w-100w	< 10	UUT _y -5 / UUT _y -12
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Table 13: Surge Capacitor

CA603/302	Delta	Surge Capacitor	< 10	UUT _y -13
9L18BBB301	ABB	Surge Capacitor	< 10	UUT _y -12

General Notes:

¹ Subscript indicates the test report in which the units were qualified: _y - 16380, _z - 10277

ABB, INC. GENERAL PURPOSE CONTROLS CERTIFIED SUBCOMPONENT MATRICES (FLOOR)



Identification Number	Manufacturer	Description	Approximate Weights (lbs)	Representative UUT ¹
Table 14: Magnetic Contactor				
CR305	ABB (formerly GE)	540A	52	UUT _z -7 / UUT _y -6
Table 15: Overload Relay (Thermal and EOL)				
CR324	GE	540A	< 10	UUT _z -7 / UUT _y -6
Table 16: Lightning Contactor				
CR460	GE	30A	< 10	UUT _y -6
Table 17: Control Power Transformer				
9T58K	ABB (formerly GE)	0.05kVA	< 10	extrapolated
9T58K		0.05kVA, 0.075kVA	< 10	extrapolated
9T58K		0.10kVA	< 10	extrapolated
9T58K		0.15kVA, 0.25kVA	< 10	UUT _z -7
9T58K		0.30kVA	< 10	UUT _y -6
B150	Micron ImperviTRAN	0.15kVA	< 10	UUT _y -6
Table 18: Circuit Breakers				
XT5	ABB	600A	10	UUT _y -6
XT7	ABB	1200A	27	UUT _y -6
TK1200	ABB (formerly GE)	1200A	48	UUT _z -7
SK1200	ABB (formerly GE)	1200A	48	UUT _z -7
Table 19: Phase Voltage Relay				
1SVR730010R	ABB	Voltage Relay	< 10	UUT _y -6
Table 20: Lightning Arrester				
TPS	Siemens	Lightning Arrester	< 10	UUT _z -7 / UUT _y -6
Table 21: Space Heater				
CR305X7	GE	50w-100w	< 10	UUT _y -6
Table 22: Surge Capacitor				
9L18BBB301	ABB	Surge Capacitor	< 10	UUT _y -6

General Notes:

¹ Subscript indicates the test report in which the units were qualified: _y - 16380, _z - 10277

UUT_z-1

**UNIT UNDER TEST (UUT)
SUMMARY SHEET**



Mounting Details: Wall mounted with (3) 10-32 grade 5 bolts



Manufacturer: ABB, Inc.	Test Location: Clark Testing Laboratory
Product Line: General Purpose Control Enclosure	Report Number: 10277
Identification Number: GPCEW0-1	UUT No. in Test Report: UUT-1
UUT Function: Enclosed Non-combination Starter	
UUT Description: The unit under test is a wall mounted NEMA Type 1 enclosed non-combination starter.	
UUT Component Description: NEMA 1, size 0 carbon steel enclosure with GE CR305 18A contactor.	

UUT PROPERTIES

Weight (lb)	Dimensions (inches)			Natural Frequency (Hz)		
	Enclosure Width	Enclosure Depth	Enclosure Height	FB	SS	V
6	6"	5.4"	10"	NA	NA	NA

SEISMIC TEST PARAMETERS

Test Criteria	S _{DS} (g)	z / h	I _p	A _{FLX-H}	A _{RIG-H}	A _{FLX-V}	A _{RIG-V}
CBC 2019 / ICC-ES-AC156	2.00	1.00	1.50	3.20	2.40		
	2.50	0.00	1.50			1.67	0.67

Note: The unit was full of contents during testing and remained functional before and after the ICC-ES AC156 test. The unit maintained structural integrity during and after the ICC-ES AC156 Test.

UUT_z-3

**UNIT UNDER TEST (UUT)
SUMMARY SHEET**



Mounting Details: Wall mounted with (3) 5/16" diameter grade 5 bolts



Manufacturer: ABB, Inc.	Test Location: Clark Testing Laboratory
Product Line: General Purpose Control Enclosure	Report Number: 10277
Identification Number: GPCEW3-1	UUT No. in Test Report: UUT-3
UUT Function: Combination Starter	
UUT Description: The unit under test is a wall mounted NEMA Type 1 enclosed combination starter.	

UUT Component Description: NEMA1, size 3 carbon steel enclosure with CR305 18A contactor, CR324 27A overload relay, and QMR/W 30A disconnect.

UUT PROPERTIES

Weight (lb)	Dimensions (inches)			Natural Frequency (Hz)		
	Enclosure Width	Enclosure Depth	Enclosure Height	FB	SS	V
27	10"	7"	24"	NA	NA	NA

SEISMIC TEST PARAMETERS

Test Criteria	S _{DS} (g)	z / h	I _p	A _{FLX-H}	A _{RIG-H}	A _{FLX-V}	A _{RIG-V}
CBC 2019 / ICC-ES-AC156	2.00	1.00	1.50	3.20	2.40		
	2.50	0.00	1.50			1.67	0.67

Note: The unit was full of contents during testing and remained functional before and after the ICC-ES AC156 test. The unit maintained structural integrity during and after the ICC-ES AC156 Test.

UUT_z-5

**UNIT UNDER TEST (UUT)
SUMMARY SHEET**



Mounting Details: Wall mounted with (4) 1/4" diameter grade 5 bolts



Manufacturer: ABB, Inc.	Test Location: Clark Testing Laboratory
Product Line: General Purpose Control Enclosure	Report Number: 10277
Identification Number: GPCEW2-1	UUT No. in Test Report: UUT-5
UUT Function: Enclosed Lighting Contactor	
UUT Description: The unit under test is a wall mounted NEMA Type 1 enclosed lighting contactor.	
UUT Component Description: NEMA 1, size 2 carbon steel enclosure and CR460 lighting contactor, and 9T58k 0.1kVA transformer.	

UUT PROPERTIES

Weight (lb)	Dimensions (inches)			Natural Frequency (Hz)		
	Enclosure Width	Enclosure Depth	Enclosure Height	FB	SS	V
34	14"	8"	18"	NA	NA	NA

SEISMIC TEST PARAMETERS

Test Criteria	S _{DS} (g)	z / h	I _p	A _{FLX-H}	A _{RIG-H}	A _{FLX-V}	A _{RIG-V}
CBC 2019 / ICC-ES-AC156	2.00	1.00	1.50	3.20	2.40		
	2.50	0.00	1.50			1.67	0.67

Note: The unit was full of contents during testing and remained functional before and after the ICC-ES AC156 test. The unit maintained structural integrity during and after the ICC-ES AC156 Test.

UUT_{Z-7}

**UNIT UNDER TEST (UUT)
SUMMARY SHEET**



Mounting Details: Floor mounted with (4) 1/2" diameter grade 5 bolts



Manufacturer: ABB, Inc. **Test Location:** Clark Testing Laboratory

Product Line: Floor Mounted Pump Panel **Report Number:** 10277

Identification Number: PPCF6-3R **UUT No. in Test Report:** UUT-7

UUT Function: Enclosed Pump Panel

UUT Description: The unit under test is a floor mounted NEMA Type 3R enclosed pump panel.

UUT Component Description: NEMA 3R, size 6 carbon steel enclosure with CR305 540A contactor, CR324 540A overload thermal relay, CR324 540A overload EOL relay, 9T58K 0.15kVA transformer, TK 1200A circuit breaker, SK 1200A circuit breaker, and TPS arrester.

Note: A locking device shall be used to prevent the door from opening during seismic event.

UUT PROPERTIES

Weight (lb)	Dimensions (inches)			Natural Frequency (Hz)		
	Enclosure Width	Enclosure Depth	Enclosure Height	FB	SS	V
520	26"	24"	97"	15.8	15.4	>33

SEISMIC TEST PARAMETERS

Test Criteria	S _{DS} (g)	z / h	I _p	A _{FLX-H}	A _{RIG-H}	A _{FLX-V}	A _{RIG-V}
CBC 2019 / ICC-ES-AC156	1.50	1.00	1.50	2.40	1.80		
	2.40	0.00	1.50			1.60	0.65

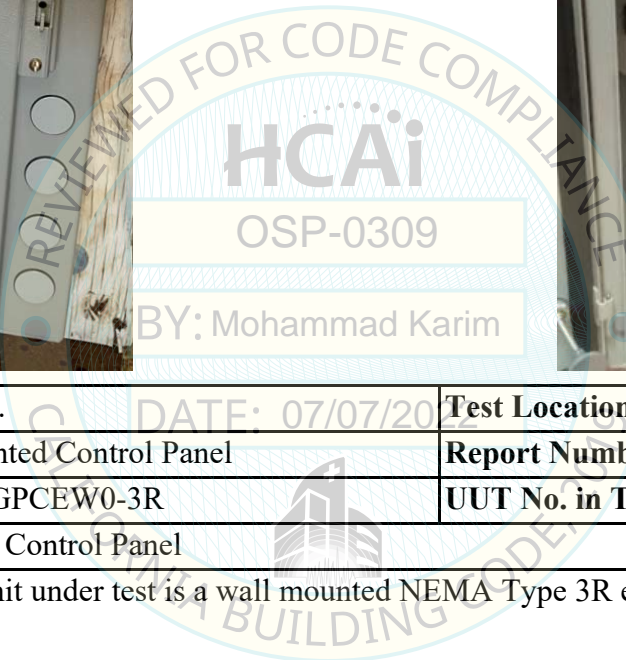
Note: The unit was full of contents during testing and remained functional before and after the ICC-ES AC156 test. The unit maintained structural integrity during and after the ICC-ES AC156 Test.

UUT_y-4

**UNIT UNDER TEST (UUT)
SUMMARY SHEET**



Mounting Details: Wall mounted with (4) 5/16" diameter grade 5 bolts



Manufacturer: ABB, Inc. **Test Location:** ETL (Dallas, TX)

Product Line: Wall Mounted Control Panel **Report Number:** 16380

Identification Number: GPCEW0-3R **UUT No. in Test Report:** UUT-4

UUT Function: Enclosed Control Panel

UUT Description: The unit under test is a wall mounted NEMA Type 3R enclosed control panel.

UUT Component Description: NEMA 3R, size 0 carbon steel enclosure with CR305 18A contactor and CR324 relay, 9T58K 0.05kVA transformer, and 30A Open Safety Switch.

UUT PROPERTIES

Weight (lb)	Dimensions (inches)			Natural Frequency (Hz)		
	Enclosure Width	Enclosure Depth	Enclosure Height	FB	SS	V
58	11.2"	8.4"	29.4"	NA	NA	NA

SEISMIC TEST PARAMETERS

Test Criteria	S _{DS} (g)	z / h	I _p	A _{FLX-H}	A _{RIG-H}	A _{FLX-V}	A _{RIG-V}
CBC 2019 / ICC-ES-AC156	2.00	1.00	1.50	3.20	2.40		
	2.50	0.00	1.50			1.67	0.67

Note: The unit was full of contents during testing and remained functional before and after the ICC-ES AC156 test. The unit maintained structural integrity during and after the ICC-ES AC156 Test.

UUT_y-5

**UNIT UNDER TEST (UUT)
SUMMARY SHEET**



Mounting Details: Wall mounted with (4) 5/16" diameter grade 5 bolts



Manufacturer: ABB, Inc. **Test Location:** ETL (Dallas, TX)

Product Line: Wall Mounted Control Panel **Report Number:** 16380

Identification Number: GPCEW4-1 **UUT No. in Test Report:** UUT-5

UUT Function: Enclosed Control Panel

UUT Description: The unit under test is a wall mounted NEMA Type 1 enclosed control panel.

UUT Component Description: NEMA 1, size 4 carbon steel enclosure with CR305 135A contactor and CR324 relay, 1SVR7 voltage relay, 9T58K 0.25kVA transformer, NECO Hammond transformer, CR305X7 space heater, and 200A Open Safety Switch.

UUT PROPERTIES

Weight (lb)	Dimensions (inches)			Natural Frequency (Hz)		
	Enclosure Width	Enclosure Depth	Enclosure Height	FB	SS	V
177	23.0"	8.5"	54.0"	NA	NA	NA

SEISMIC TEST PARAMETERS

Test Criteria	S _{DS} (g)	z / h	I _p	A _{FLX-H}	A _{RIG-H}	A _{FLX-V}	A _{RIG-V}
CBC 2019 / ICC-ES-AC156	2.00	1.00	1.50	3.20	2.40		
	2.50	0.00	1.50			1.67	0.67

Note: The unit was full of contents during testing and remained functional before and after the ICC-ES AC156 test. The unit maintained structural integrity during and after the ICC-ES AC156 Test.

UUT_y-6

**UNIT UNDER TEST (UUT)
SUMMARY SHEET**



Mounting Details: Floor mounted with (4) 1/2" diameter grade 5 bolts



Manufacturer: ABB, Inc. **Test Location:** ETL (Dallas, TX)

Product Line: Floor Mounted Pump Panel **Report Number:** 16380

Identification Number: GPCEF6-4X **UUT No. in Test Report:** UUT-6

UUT Function: Enclosed Pump Panel

UUT Description: The unit under test is a floor mounted NEMA Type 4X enclosed pump panel.

UUT Component Description: NEMA 4X, size 6 stainless steel enclosure with CR305 540A contactor, CR324 540A overload thermal relay, CR324 540A overload EOL relay, 9T58K 0.30kVA transformer, ImperviTRAN CPT, 1SVR7 voltage relay, XT5 600A circuit breaker, XT7 1200A circuit breaker, space heater, control relay, backspin timer, terminal board and TPS arrester.

UUT PROPERTIES

Weight (lb)	Dimensions (inches)			Natural Frequency (Hz)		
	Enclosure Width	Enclosure Depth	Enclosure Height	FB	SS	V
676	35"	21"	82"	7.3	7.5	24.4

SEISMIC TEST PARAMETERS

Test Criteria	S _{DS} (g)	z / h	I _p	A _{FLX-H}	A _{RIG-H}	A _{FLX-V}	A _{RIG-V}
CBC 2019 / ICC-ES-AC156	2.00	1.00	1.50	3.20	2.40		
	2.50	0.00	1.50			1.67	0.67

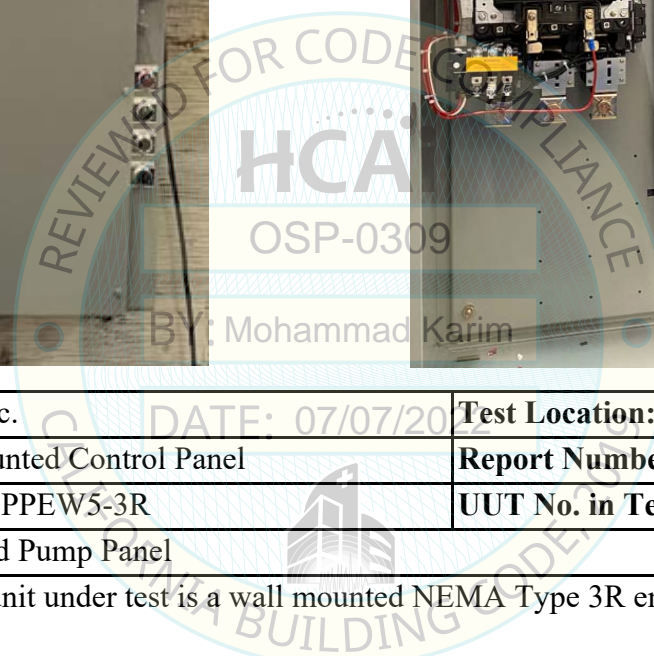
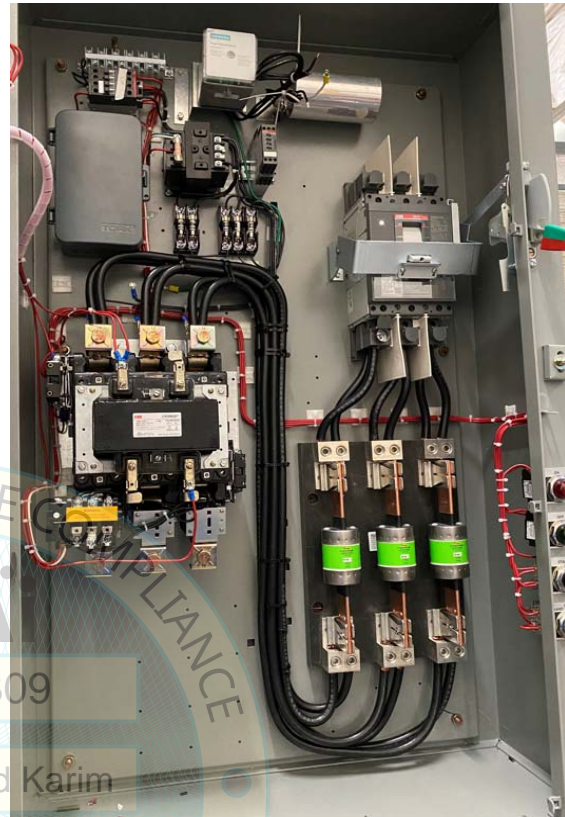
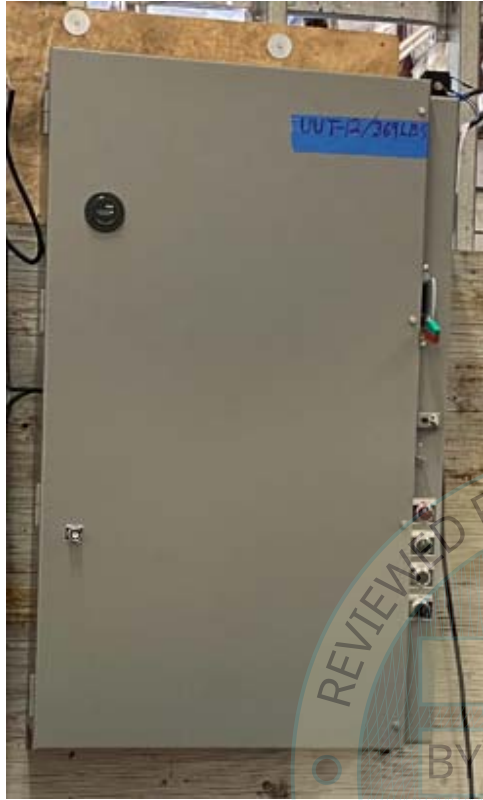
Note: The unit was full of contents during testing and remained functional before and after the ICC-ES AC156 test. The unit maintained structural integrity during and after the ICC-ES AC156 Test.

UUT_y-12

**UNIT UNDER TEST (UUT)
SUMMARY SHEET**



Mounting Details: Wall mounted with (4) 3/8" diameter grade 5 bolts



Manufacturer: ABB, Inc. **Test Location:** ETL (Dallas, TX)

Product Line: Wall Mounted Control Panel **Report Number:** 16380

Identification Number: PPEW5-3R **UUT No. in Test Report:** UUT-12

UUT Function: Enclosed Pump Panel

UUT Description: The unit under test is a wall mounted NEMA Type 3R enclosed pump panel.

UUT Component Description: NEMA 3R, size 5 carbon steel enclosure with CR305 270A contactor and CR324 relay, XT5 circuit breaker, 1SVR7 voltage relay, ImperviTRAN transformer, CR305X space heater, 9L1 surge capacitor, control relay, backspin timer, terminal board, and TPS arrester.

UUT PROPERTIES

Weight (lb)	Dimensions (inches)			Natural Frequency (Hz)		
	Enclosure Width	Enclosure Depth	Enclosure Height	FB	SS	V
369	31.0"	13.0"	54.0"	NA	NA	NA

SEISMIC TEST PARAMETERS

Test Criteria	S _{DS} (g)	z / h	I _p	A _{FLX-H}	A _{RIG-H}	A _{FLX-V}	A _{RIG-V}
CBC 2019 / ICC-ES-AC156	2.00	1.00	1.50	3.20	2.40		
	2.50	0.00	1.50			1.67	0.67

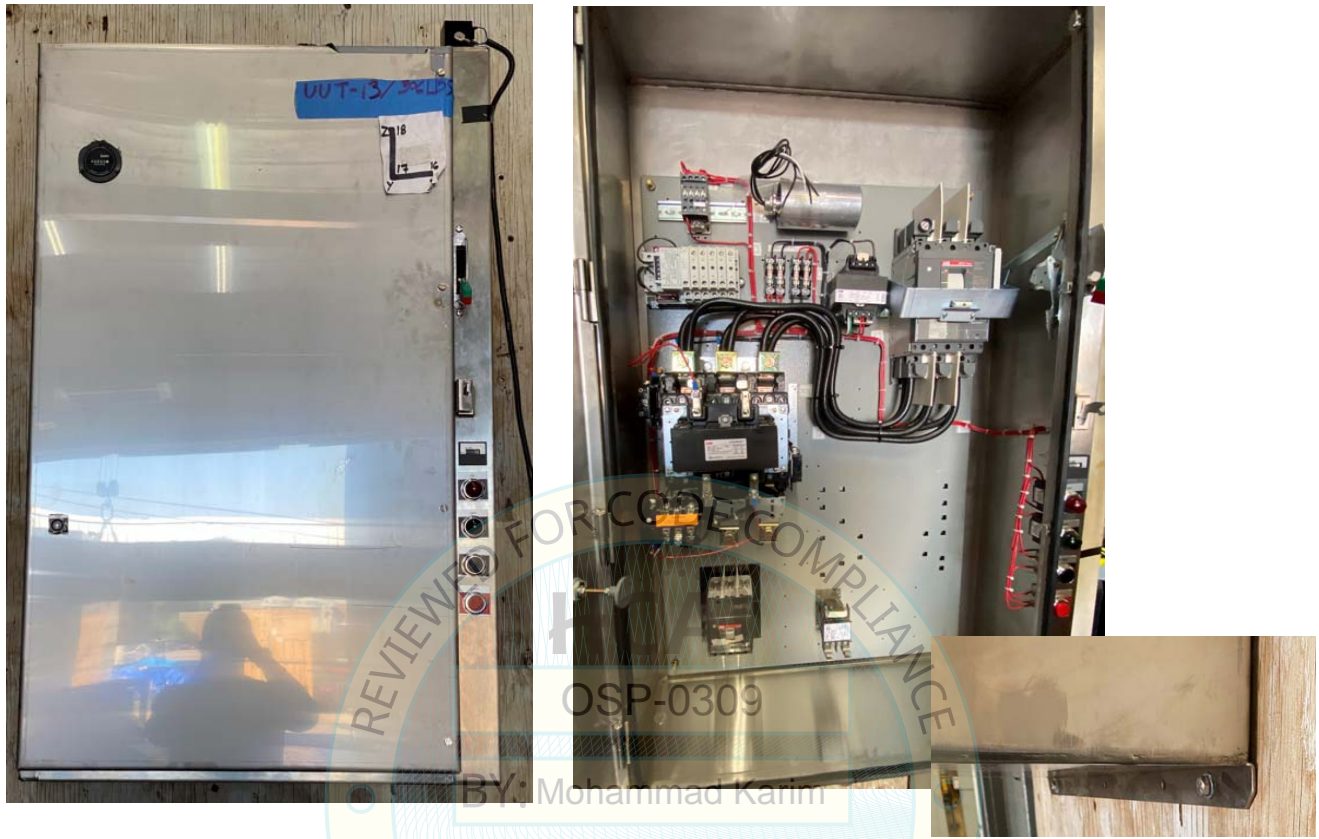
Note: The unit was full of contents during testing and remained functional before and after the ICC-ES AC156 test. The unit maintained structural integrity during and after the ICC-ES AC156 Test.

UUT_y-13

**UNIT UNDER TEST (UUT)
SUMMARY SHEET**



Mounting Details: Wall mounted with (4) 3/8" diameter grade 5 bolts



Manufacturer: ABB, Inc. **Test Location:** ETL (Dallas, TX)

Product Line: Wall Mounted Control Panel **Report Number:** 16380

Identification Number: GPCEW5-4X **UUT No. in Test Report:** UUT-13

UUT Function: Enclosed Control Panel

UUT Description: The unit under test is a wall mounted NEMA Type 4X enclosed control panel.

UUT Component Description: NEMA 4X, size 5 stainless steel enclosure with XT2 125A and XT5 600A circuit breakers, CR305 270A contactor and CR324 relay, 1SVR7 voltage relay, 9T58K 0.25kVA transformer, NECO Hammond transformer, CR460 lightning contactor, and CA603 surge capacitor.

UUT PROPERTIES

Weight (lb)	Dimensions (inches)			Natural Frequency (Hz)		
	Enclosure Width	Enclosure Depth	Enclosure Height	FB	SS	V
306	31.0"	13.0"	54.0"	NA	NA	NA

SEISMIC TEST PARAMETERS

Test Criteria	S _{DS} (g)	z / h	I _p	A _{FLX-H}	A _{RIG-H}	A _{FLX-V}	A _{RIG-V}
CBC 2019 / ICC-ES-AC156	2.00	1.00	1.50	3.20	2.40		
	2.50	0.00	1.50			1.67	0.67

Note: The unit was full of contents during testing and remained functional before and after the ICC-ES AC156 test. The unit maintained structural integrity during and after the ICC-ES AC156 Test.