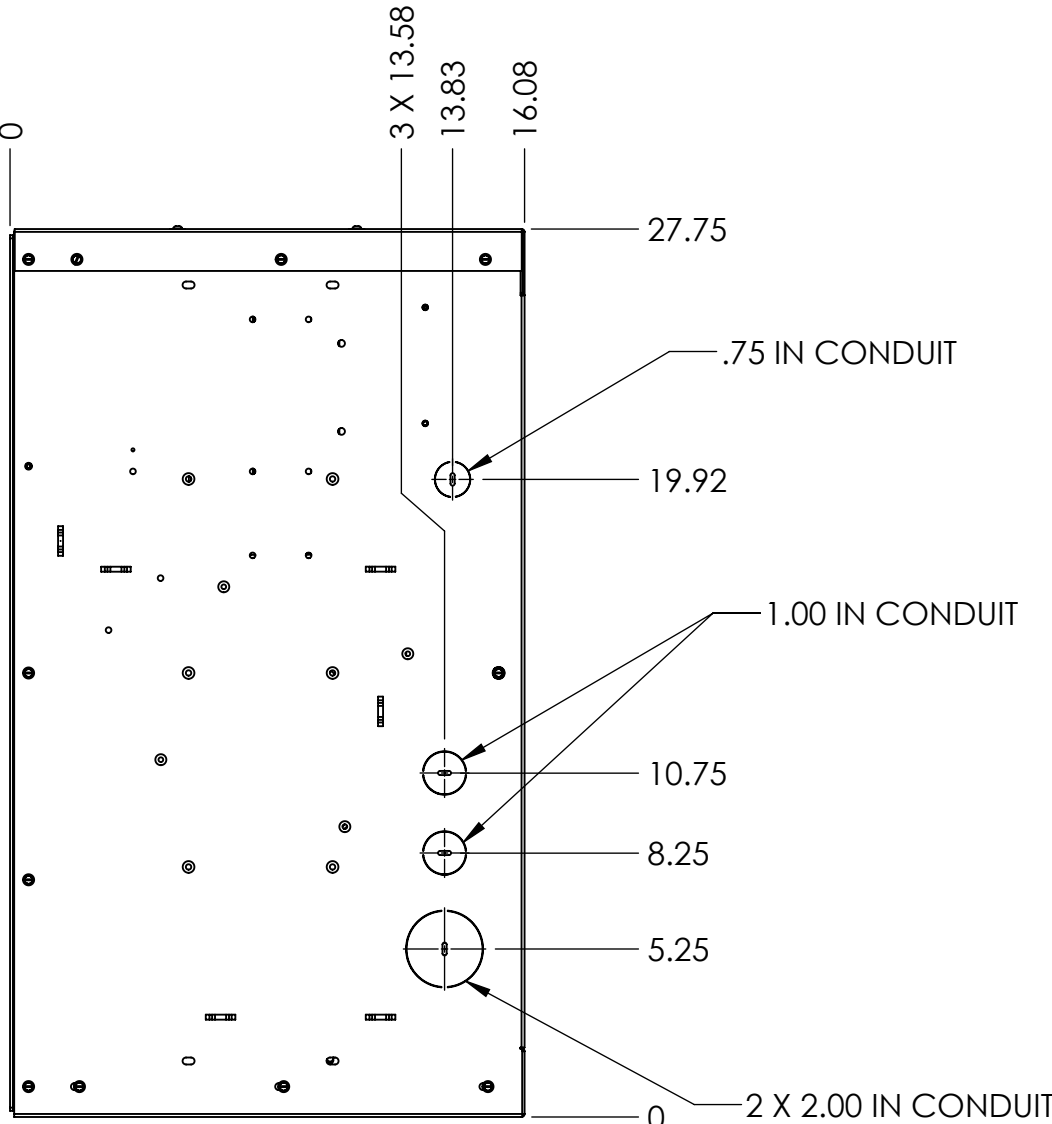


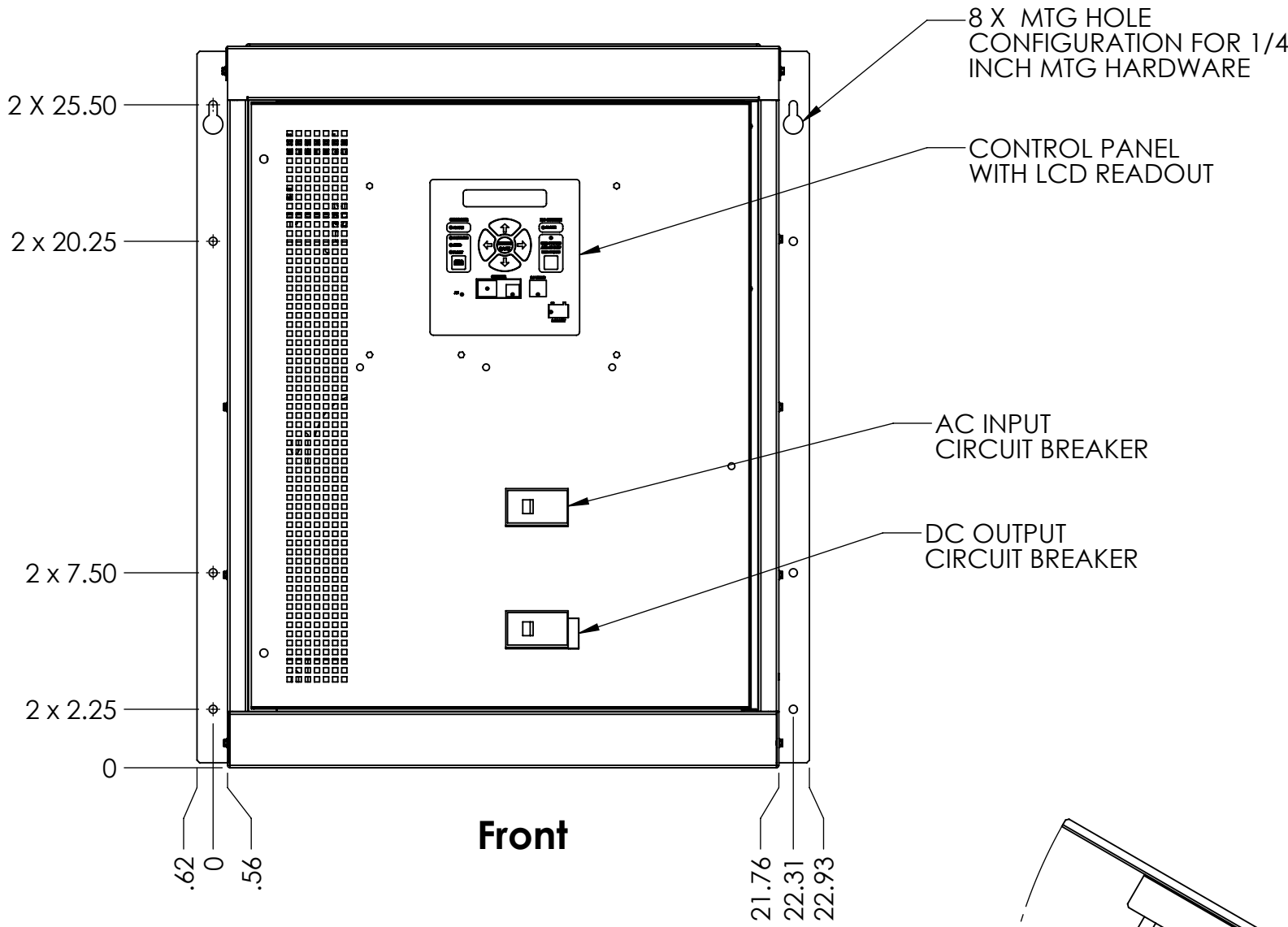
Notes:

1. Allow 6 inch of free air space minimum top, 4in free air space bottom for ventilation.

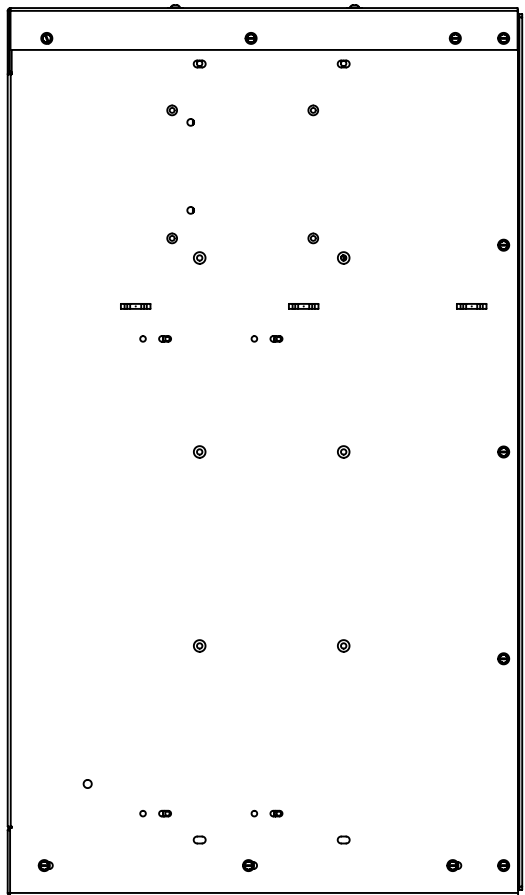
4 X 3/8-16 THREADED HOLES  
PROVIDED FOR LIFTING HARDWARE



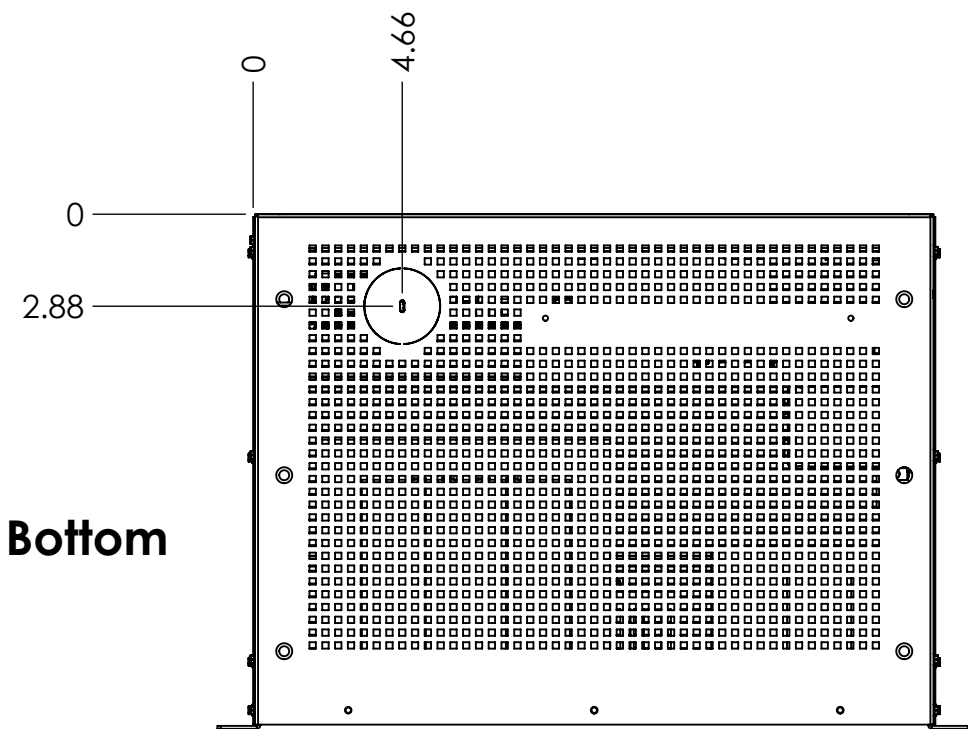
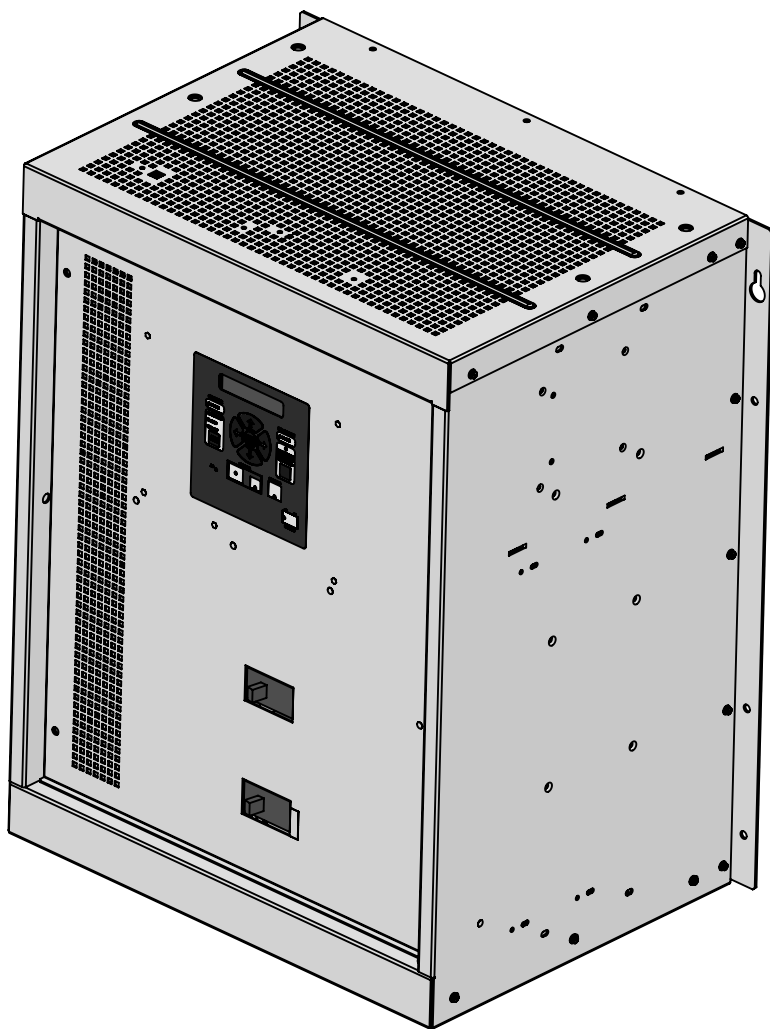
Left



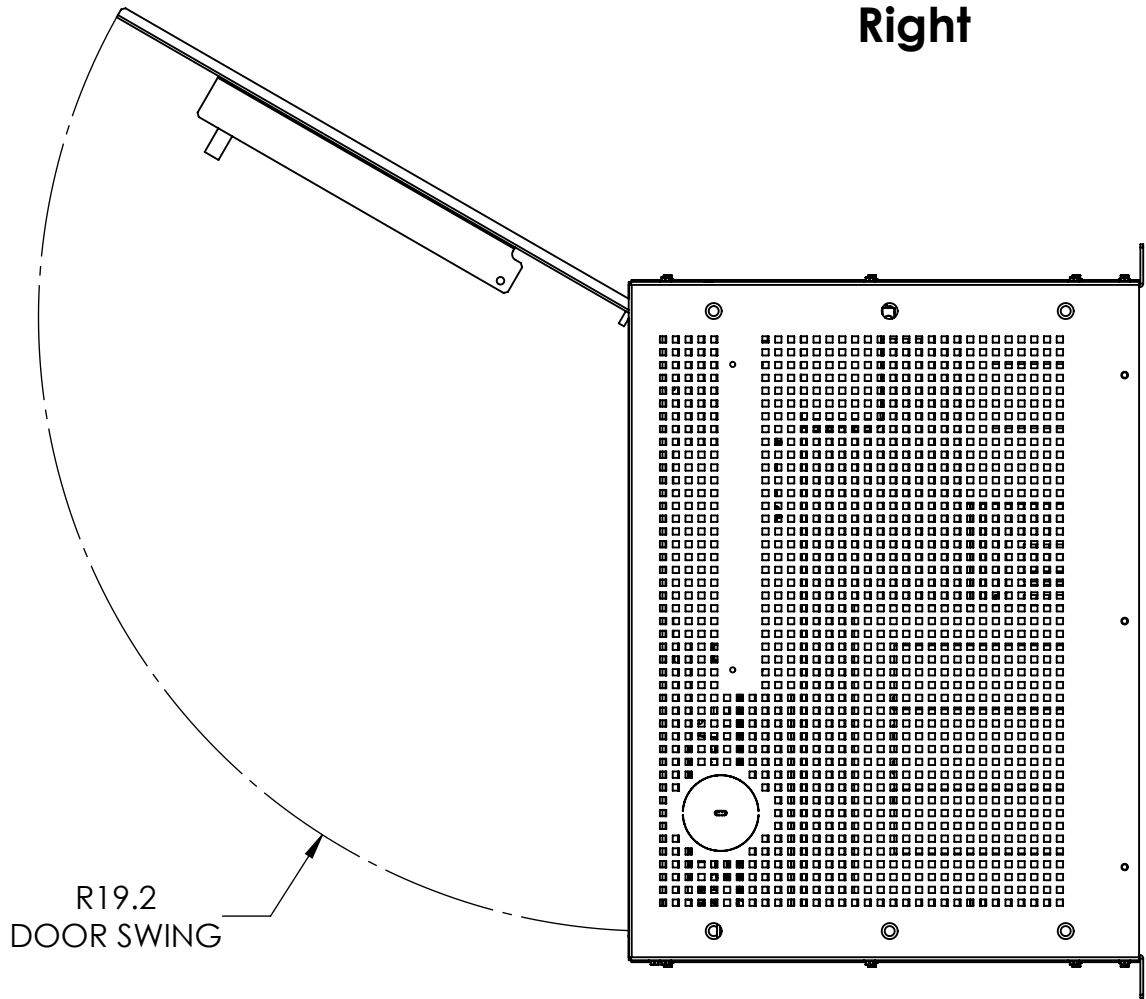
Front



Right



Bottom



R19.2  
DOOR SWING

WALL MOUNT CONFIGURATION

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DEFAULT TOLERANCES:  
ANGLES  $\pm 1^\circ$   
TWO PLACE DECIMAL  $\pm .01$   
THREE PLACE DECIMAL  $\pm .001$   
DO NOT SCALE DRAWING

| NAME  | DATE      |
|---|-----------|
| JWF   | 2/28/2014 |
| CHECKED                                       |           |
| THIRD ANGLE PROJECTION                        |           |
| DIMENSIONS & TOLERANCES PER ASME Y14.5 - 2009 |           |

| DESCRIPTION         |                 | DATE         | APPROVED |
|---------------------|-----------------|--------------|----------|
| 2DCAD, Q2, STANDARD |                 | 2/28/2014    | JWF      |
| SIZE                | DOCUMENT NUMBER | REV          |          |
| C                   | 2DCAD-Q2-STD    | A            |          |
|                     |                 | SHEET 1 OF 6 |          |

Notes:

1. Allow 6 inch min of free air space above the top surface.

4 X 3/8-16 THREADED HOLES  
PROVIDED FOR LIFTING HARDWARE

Top

8 X MTG HOLE  
CONFIGURATION FOR 1/4  
MTG HARDWARE

CONTROL PANEL  
WITH LCD READOUT

AC INPUT  
CIRCUIT BREAKER

DC OUTPUT  
CIRCUIT BREAKER

Front

Right

Left

Bottom

FLOOR MOUNT CONFIGURATION

19.2  
DOOR SWING

6 X Ø .437 HOLE THRU  
FOR FLOOR MOUNTING  
WITH 3/8 IN HARDWARE

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DIMENSIONS ARE IN INCHES

DEFAULT TOLERANCES:

ANGLES ± 1°  
TWO PLACE DECIMAL ± NA  
THREE PLACE DECIMAL ± NA

DO NOT SCALE DRAWING

| NAME   | DATE      |
|--|-----------|
| DRAWN<br>JWF                                     | 2/28/2014 |
| CHECKED  |           |
| THIRD ANGLE PROJECTION                           |           |
| DIMENSIONS & TOLERANCES<br>PER ASME Y14.5 - 2009 |           |

REVISIONS

| DCN | REV | DESCRIPTION | DATE | APPROVED |
|-----|-----|-------------|------|----------|
| -   | -   | See Sheet 1 | -    | -        |

DESCRIPTION  
2DCAD,Q2,STANDARD

SIZE  
**C** DOCUMENT NUMBER  
2DCAD-Q2-STD

REV  
**A**

SHEET 2 OF 6

Notes:

1. Allow 6 inch of free air space minimum top, 4in free air space bottom for ventilation.

Top

21.60  
RACK CLEARANCE

| REVISIONS |     |              |      |          |
|-----------|-----|--------------|------|----------|
| DCN       | REV | DESCRIPTION  | DATE | APPROVED |
| --        | --  | See sheet 1. | --   | --       |

4 X 3/8-16 THREADED HOLES  
PROVIDED FOR LIFTING HARDWARE

Left

27.75

.75 IN CONDUIT

19.92

1.00 IN CONDUIT

10.75

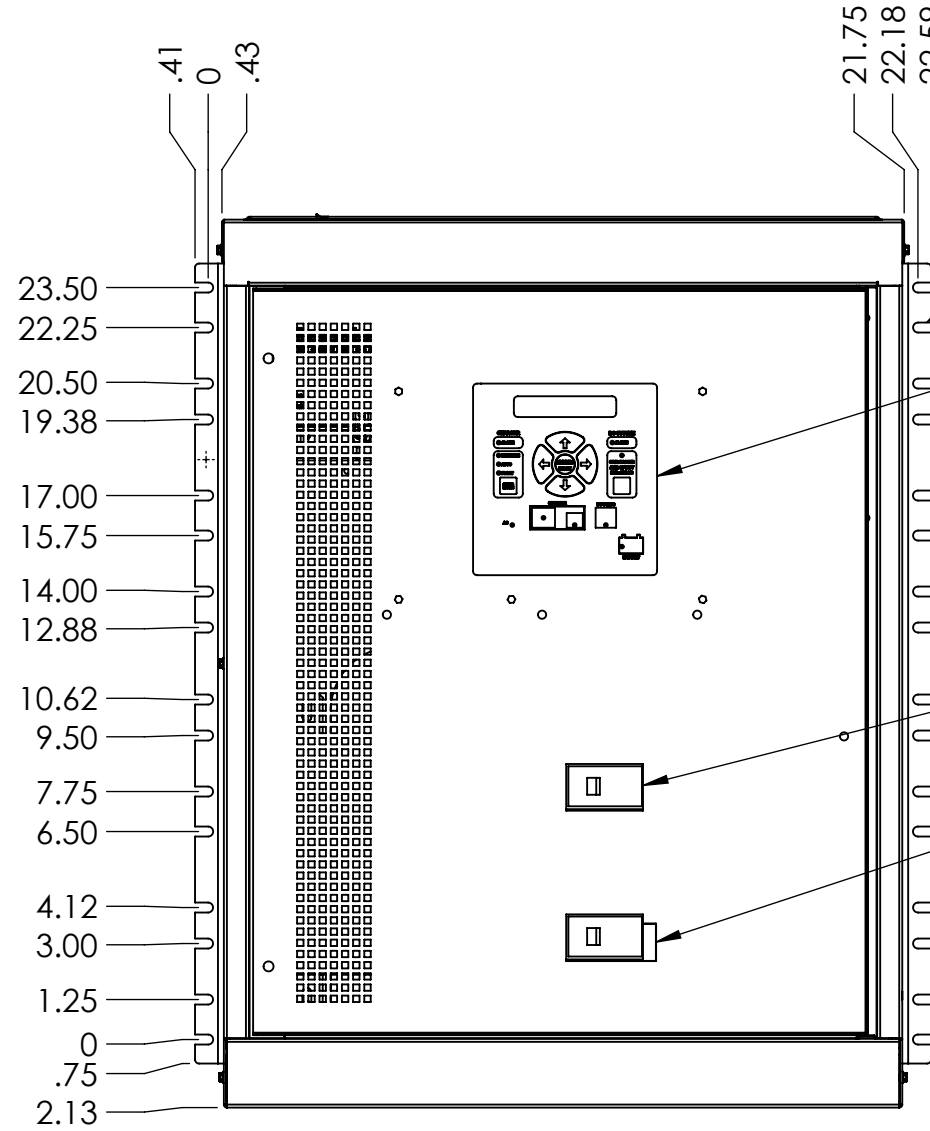
8.25

5.25

2 X 2.00 IN CONDUIT

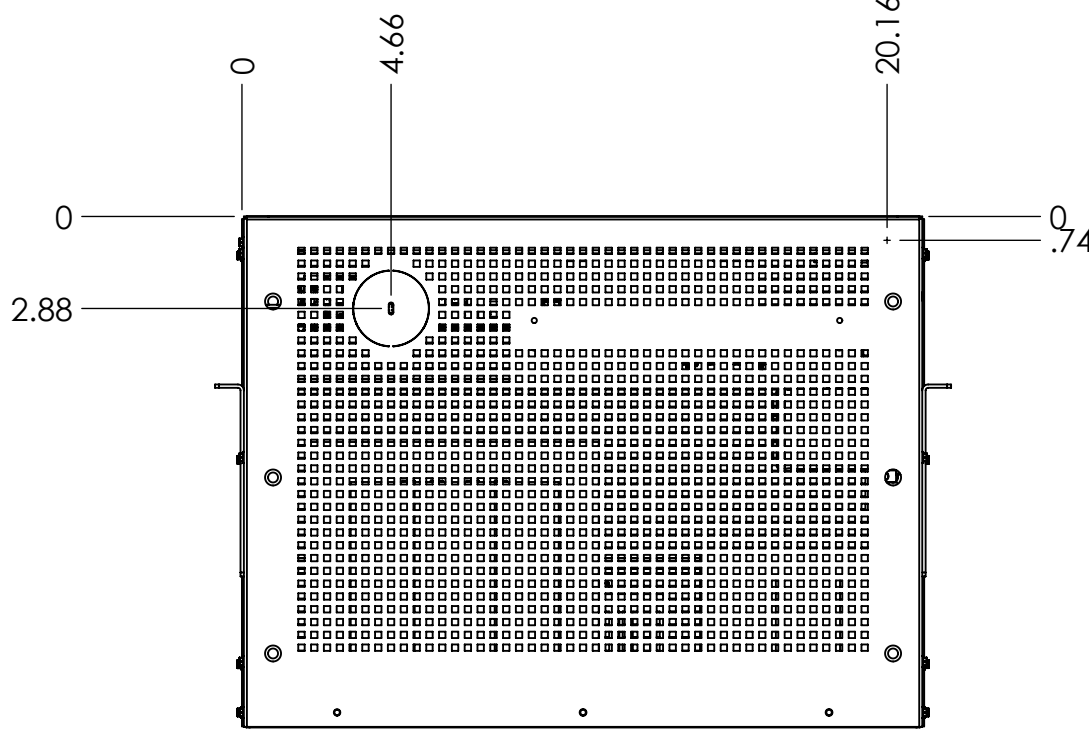
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Front



Right

Bottom



19.2  
DOOR SWING

## RACK MOUNT CONFIGURATION

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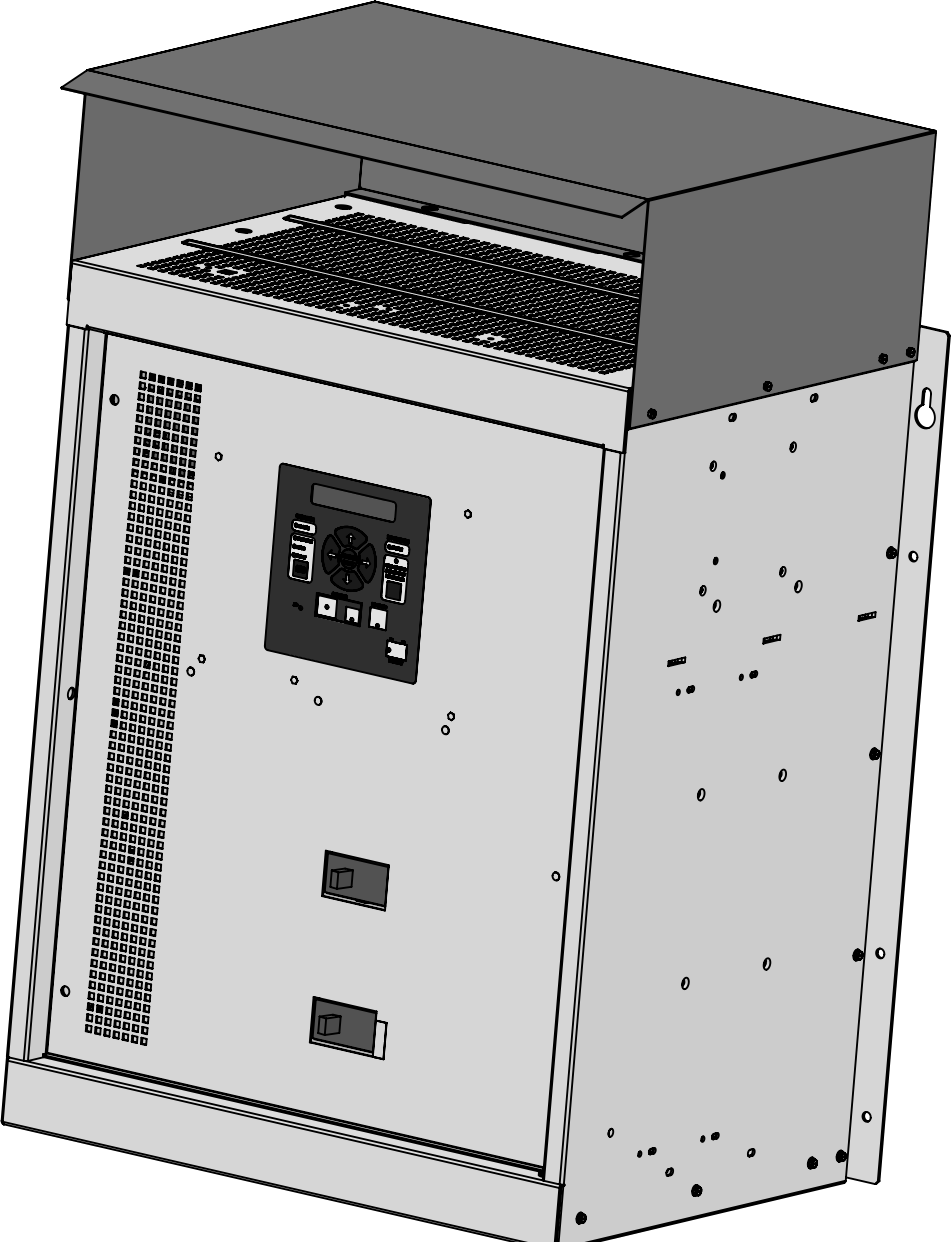
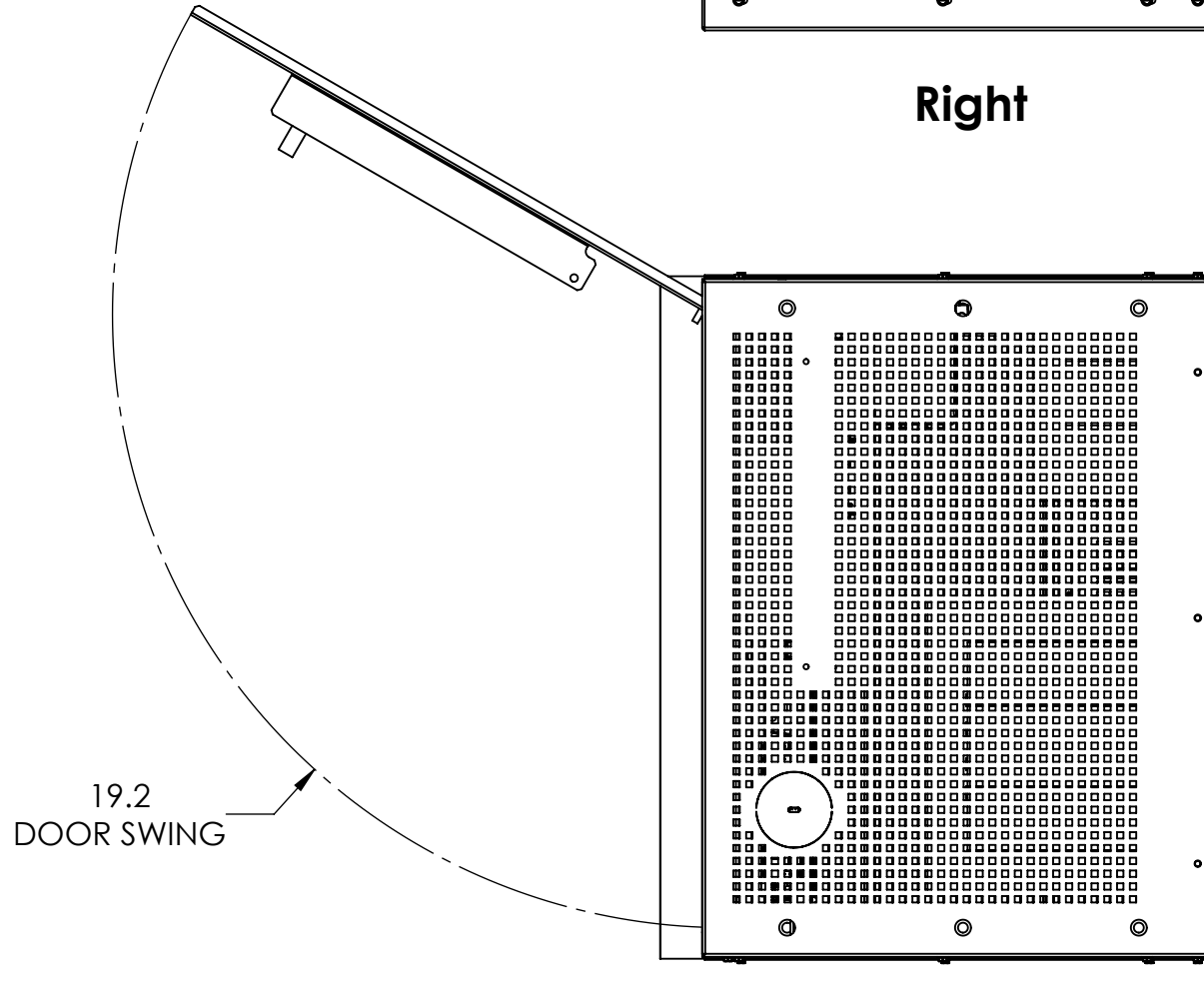
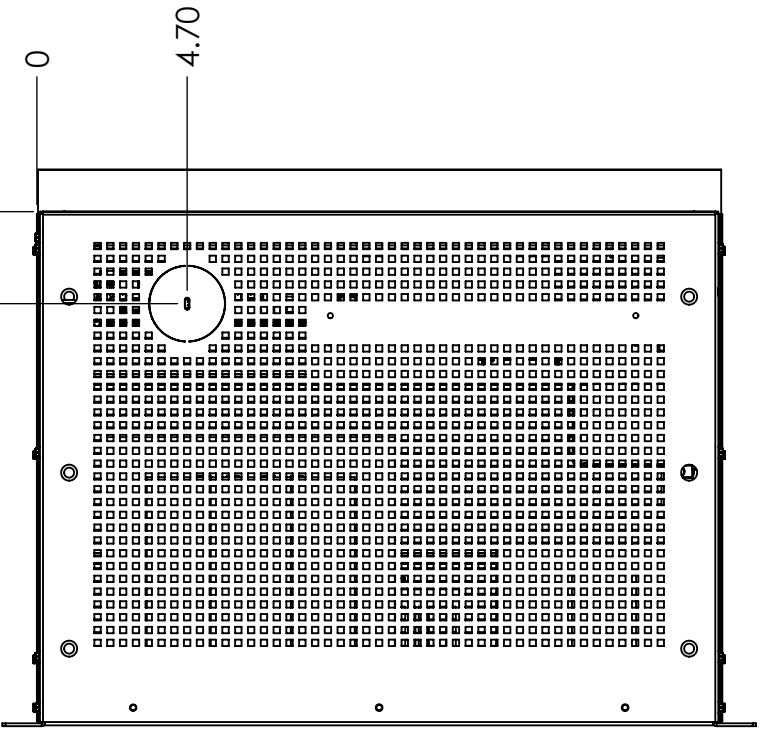
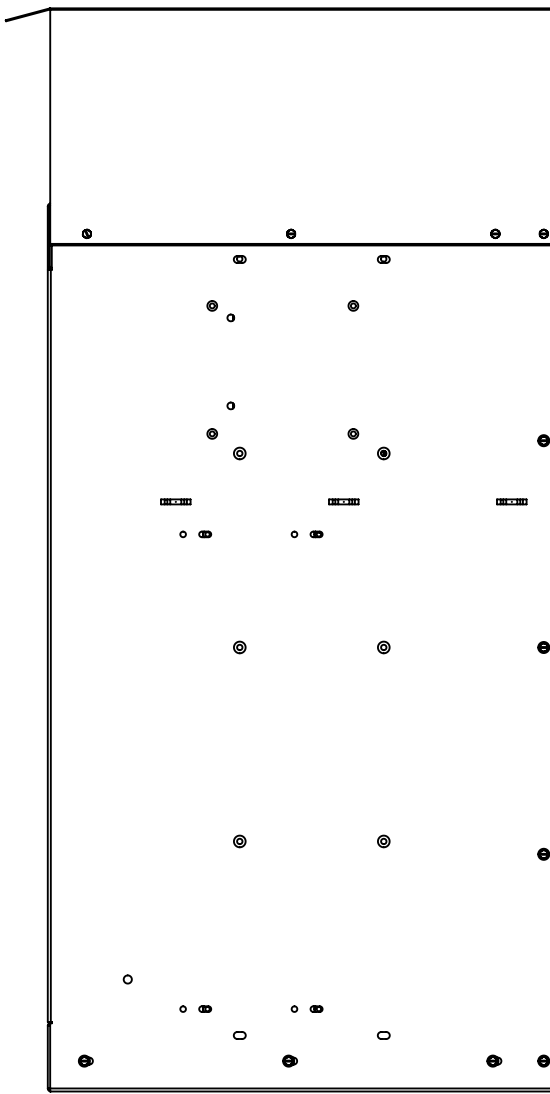
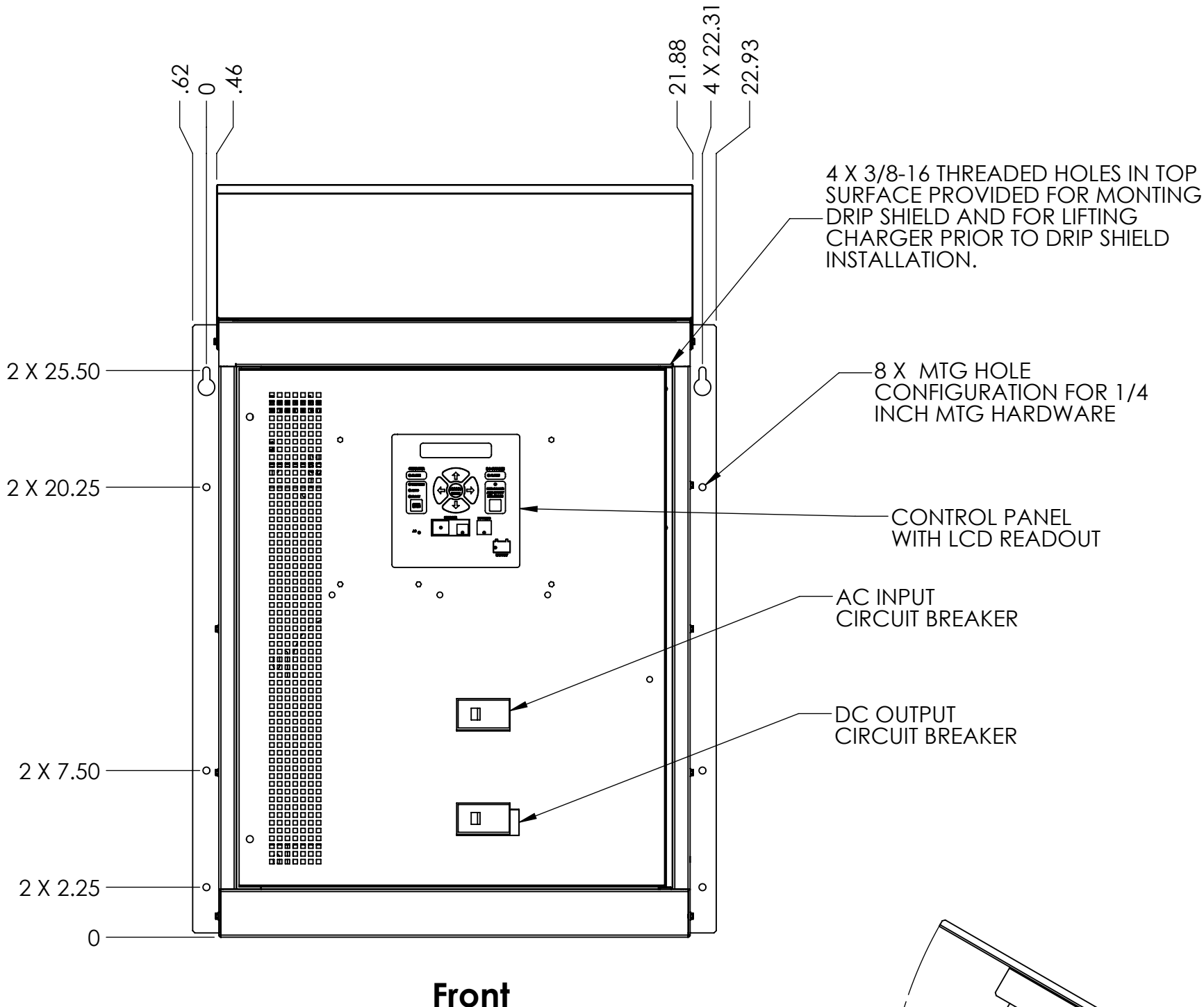
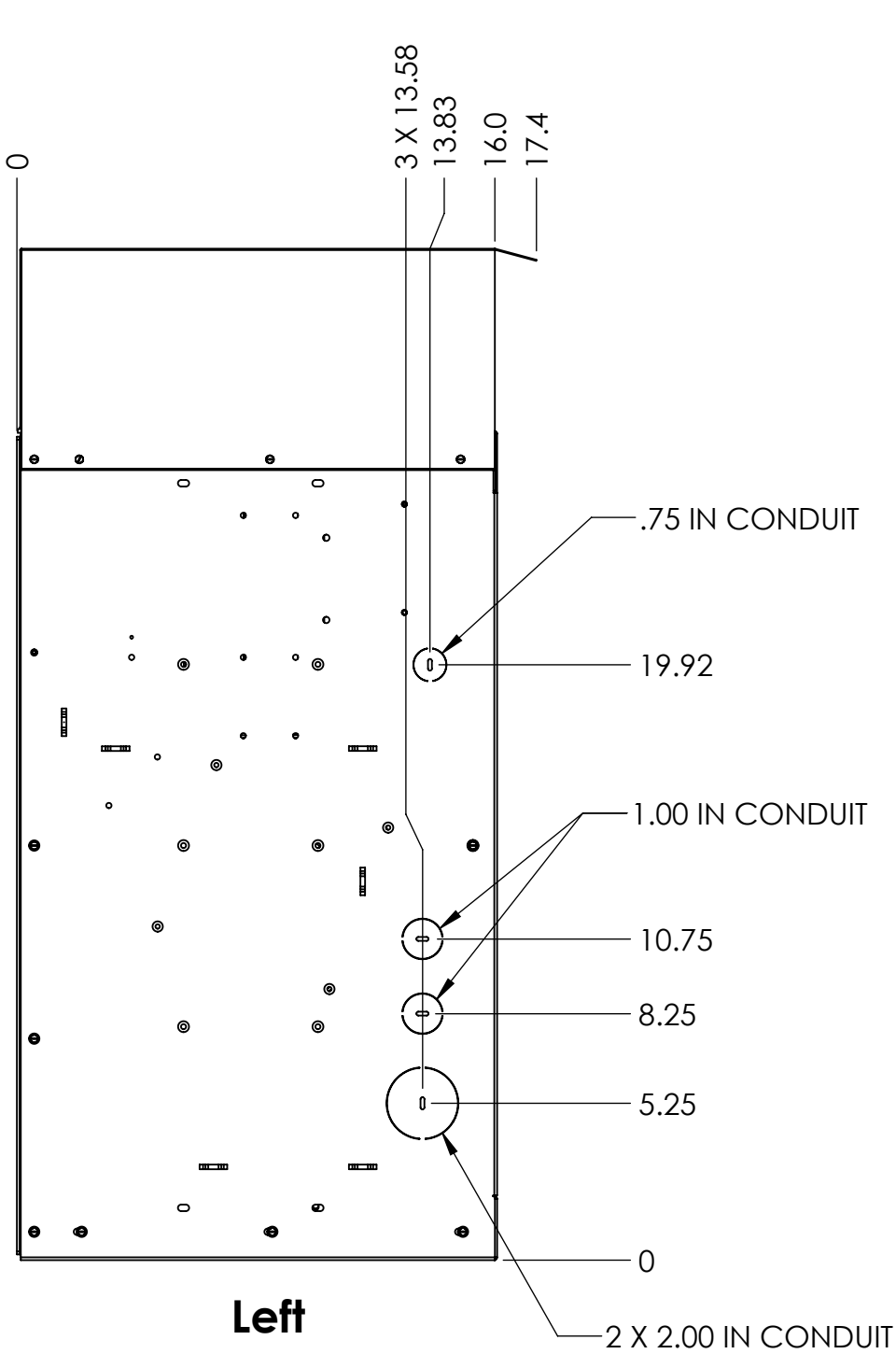
UNLESS OTHERWISE SPECIFIED:  
DIMENSIONS ARE IN INCHES  
DEFAULT TOLERANCES:  
ANGLES  $\pm 1^\circ$   
TWO PLACE DECIMAL  $\pm .NA$   
THREE PLACE DECIMAL  $\pm .NA$   
DO NOT SCALE DRAWING

| NAME   |     | DATE      | DESCRIPTION                     |                                 |
|--|-----|-----------|---------------------------------|---------------------------------|
| DRAWN  | JWF | 2/28/2014 | 2DCAD,Q2,STANDARD               |                                 |
| CHECKED  |     |           |                                 |                                 |
| THIRD ANGLE PROJECTION                           |     |           | SIZE<br><b>C</b>                | DOCUMENT NUMBER<br>2DCAD-Q2-STD |
| DIMENSIONS & TOLERANCES<br>PER ASME Y14.5 - 2009 |     |           | REV<br><b>A</b><br>SHEET 3 OF 6 |                                 |

Notes:

1. Allow 6 inch of free air space minimum top, 4in free air space bottom for ventilation.

| REVISIONS |     |              |      |          |
|-----------|-----|--------------|------|----------|
| DCN       | REV | DESCRIPTION  | DATE | APPROVED |
| --        | --  | See sheet 1. | --   | --       |



## STANDARD DRIP SHIELD CONFIGURATION

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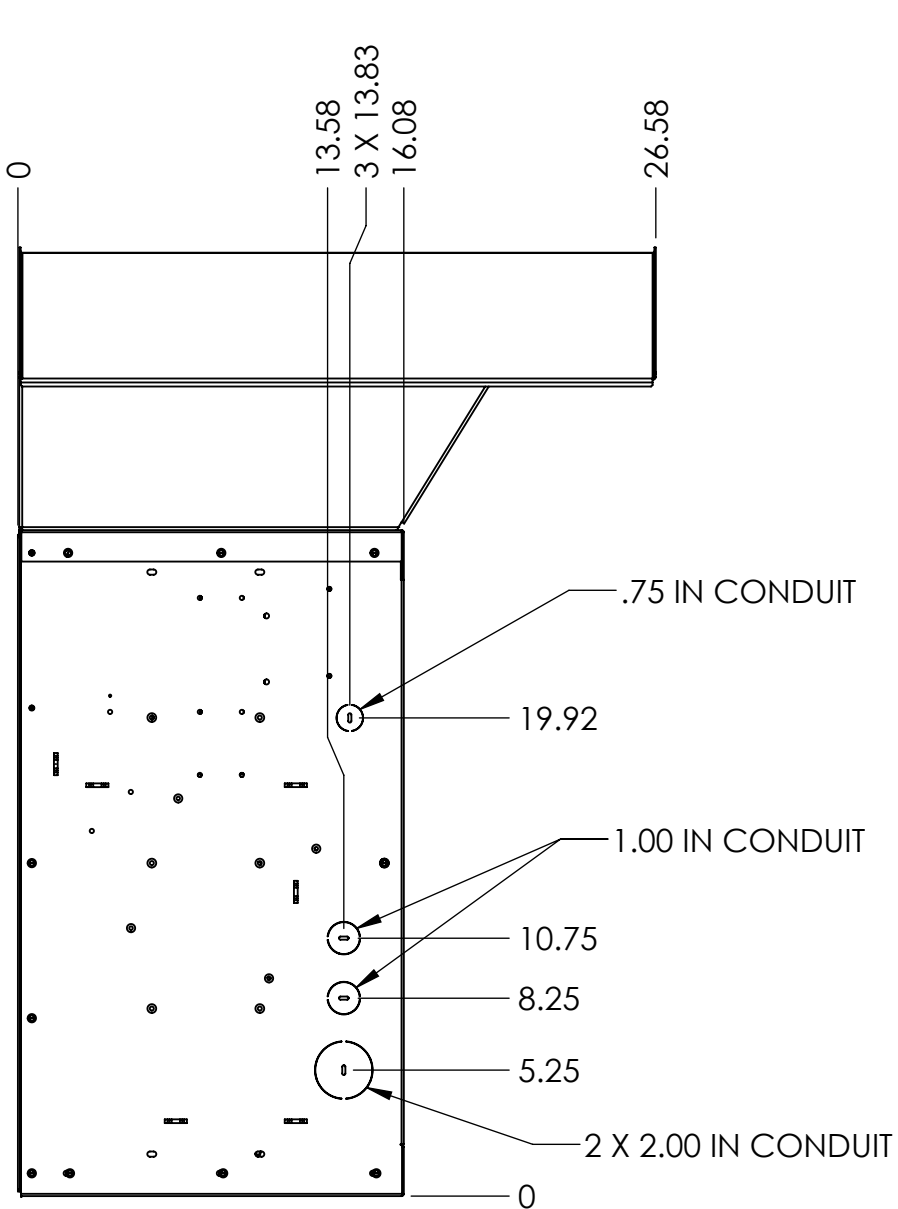
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DIMENSIONS ARE IN INCHES  
DEFAULT TOLERANCES:  
ANGLES  $\pm 1^\circ$   
TWO PLACE DECIMAL  $\pm .01$   
THREE PLACE DECIMAL  $\pm .001$   
DO NOT SCALE DRAWING

| NAME  | DATE      |
|---|-----------|
| DRAWN<br>JWF                                  | 2/28/2014 |
| CHECKED                                       |           |
| THIRD ANGLE PROJECTION                        |           |
| DIMENSIONS & TOLERANCES PER ASME Y14.5 - 2009 |           |

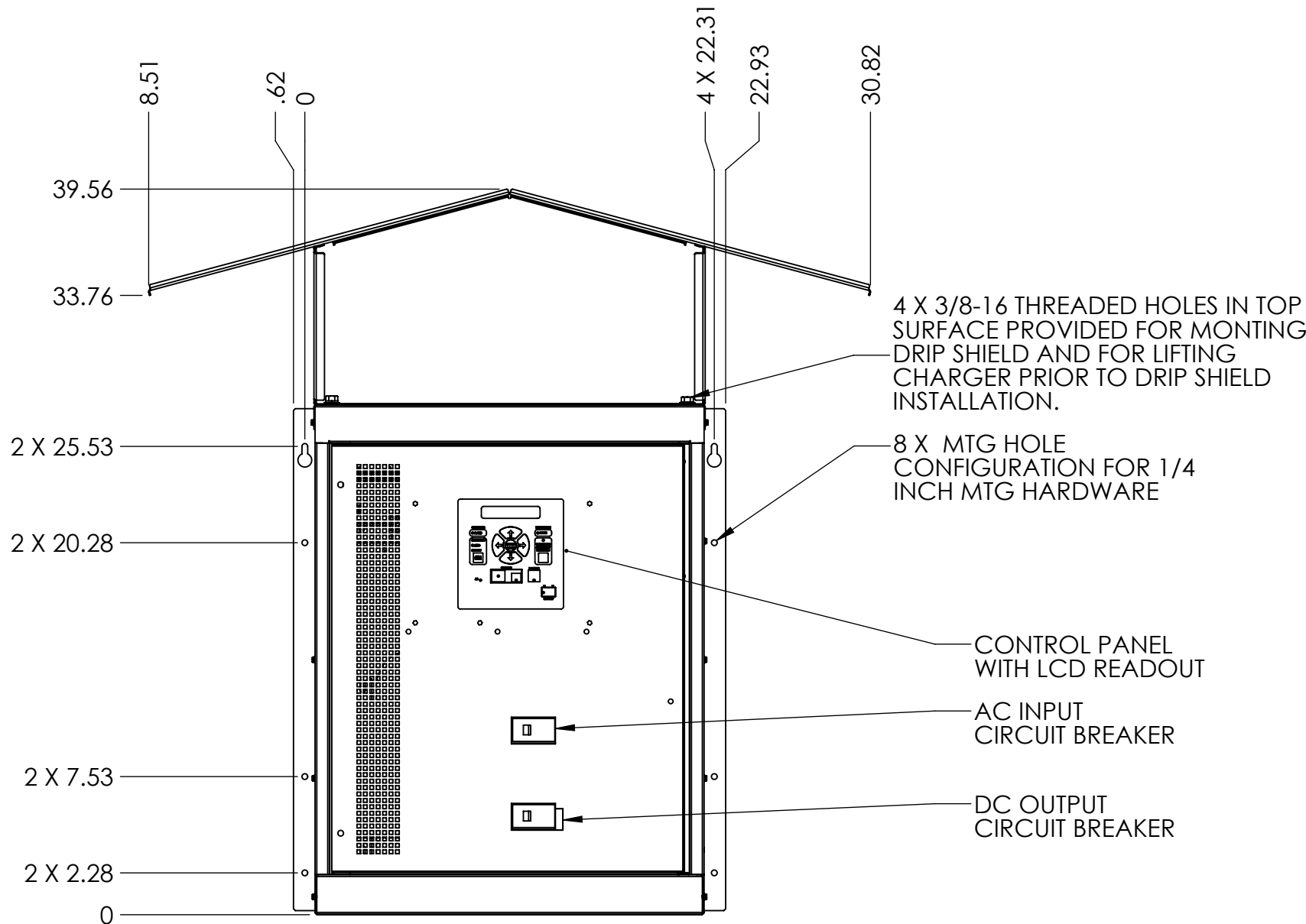
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|-------------------|---------------------------------|-----------------|
| DESCRIPTION       |                                 |                 |
| 2DCAD,Q2,STANDARD |                                 |                 |
| SIZE<br><b>C</b>  | DOCUMENT NUMBER<br>2DCAD-Q2-STD | REV<br><b>A</b> |
|                   |                                 | SHEET 4 OF 6    |

- Notes:
1. Allow 6 inch of free air space minimum top, 4in free air space bottom for ventilation.

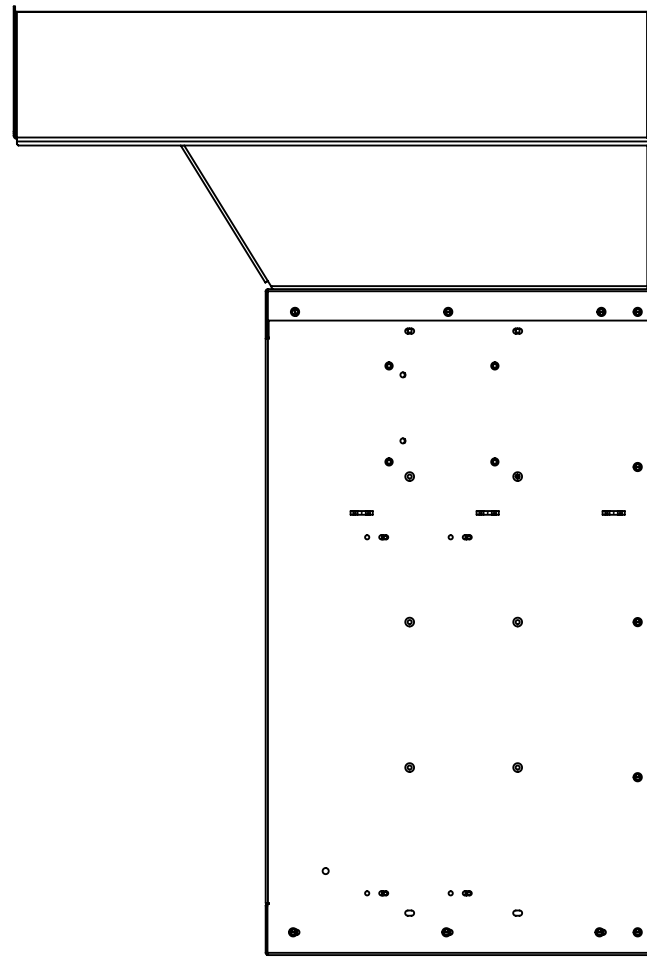
| REVISIONS |     |              |      |          |
|-----------|-----|--------------|------|----------|
| DCN       | REV | DESCRIPTION  | DATE | APPROVED |
| --        | --  | See sheet 1. | --   | --       |



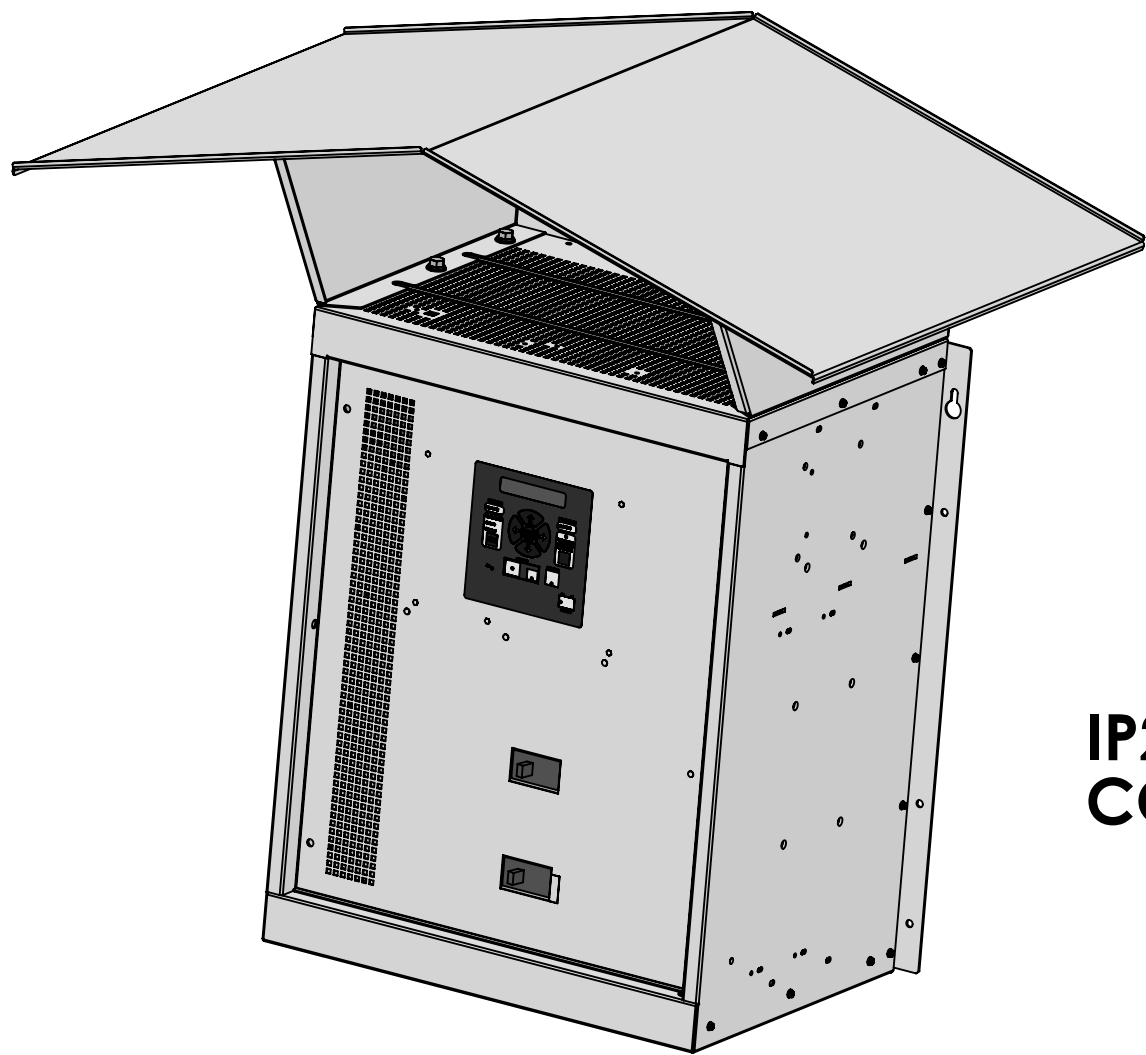
Left



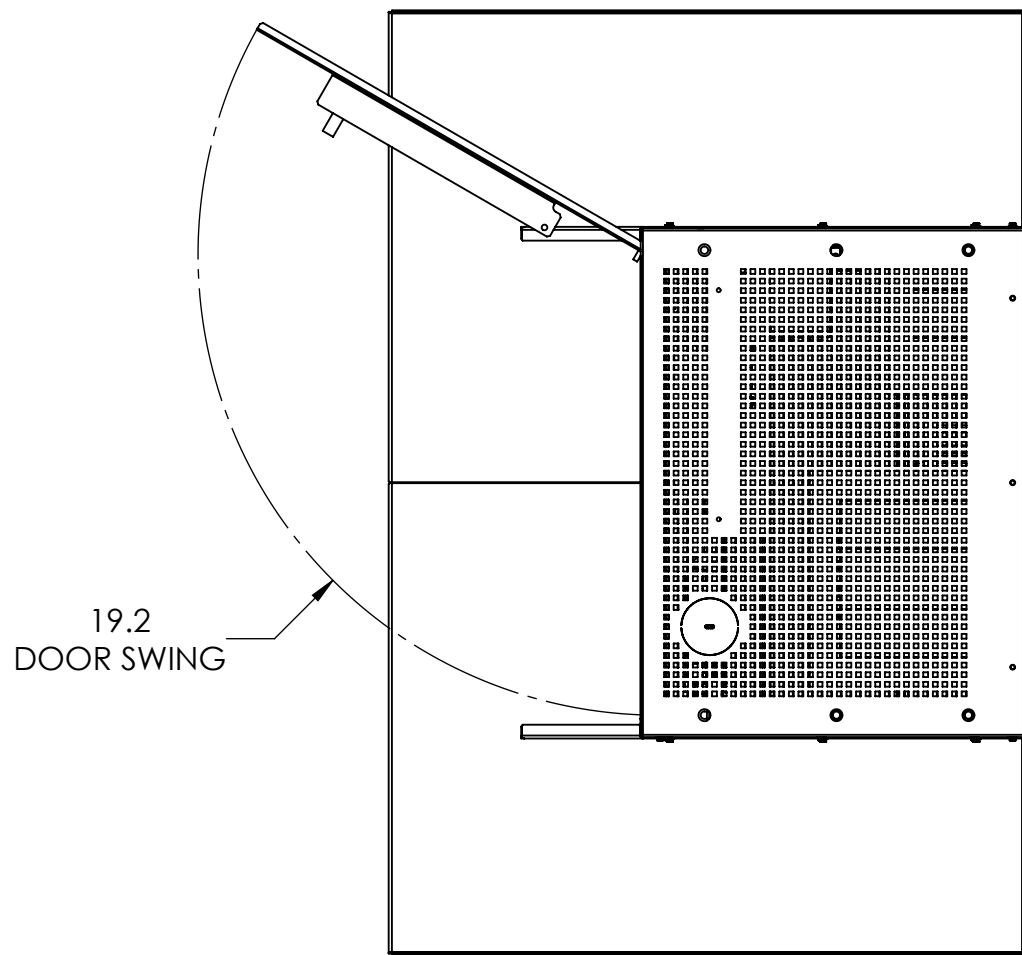
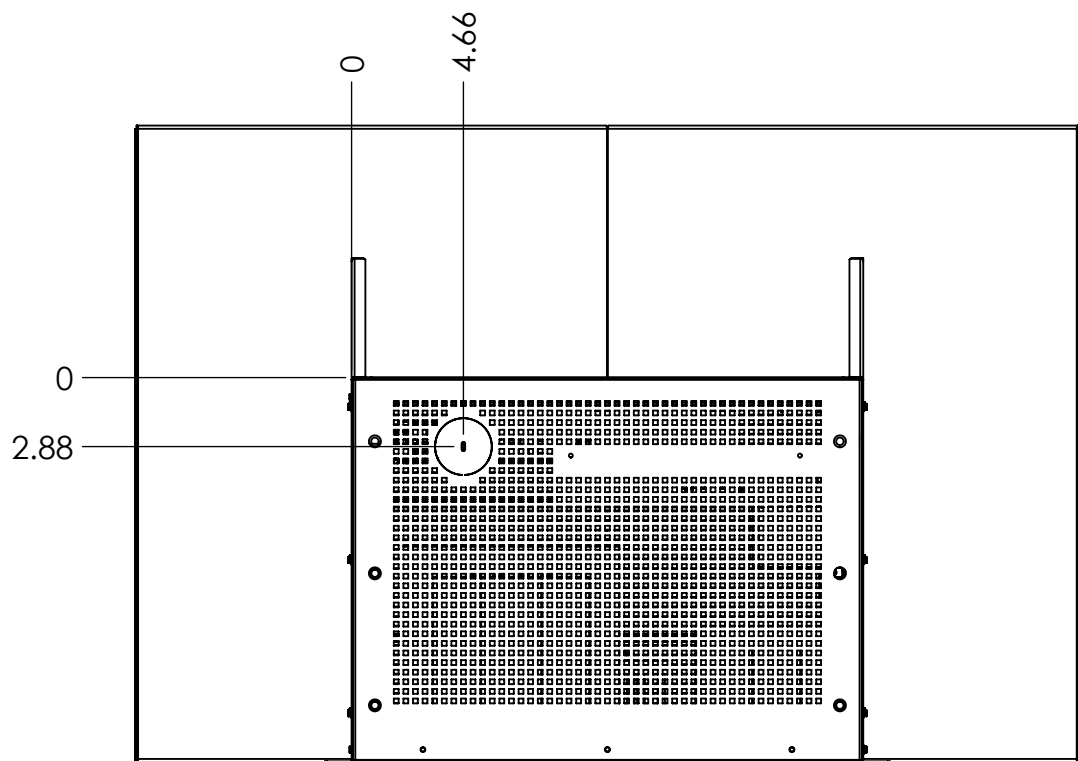
Front



Right



## IP22 DRIP SHIELD CONFIGURATION



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ANGLES  $\pm 1^\circ$   
TWO PLACE DECIMAL  $\pm$  NA  
THREE PLACE DECIMAL  $\pm$  NA  
DO NOT SCALE DRAWING

| NAME | DATE      |
|------|-----------|
| JWF  | 2/28/2014 |

CHECKED

THIRD ANGLE PROJECTION

DIMENSIONS & TOLERANCES PER ASME Y14.5 - 2009

DESCRIPTION

2DCAD,Q2,STANDARD

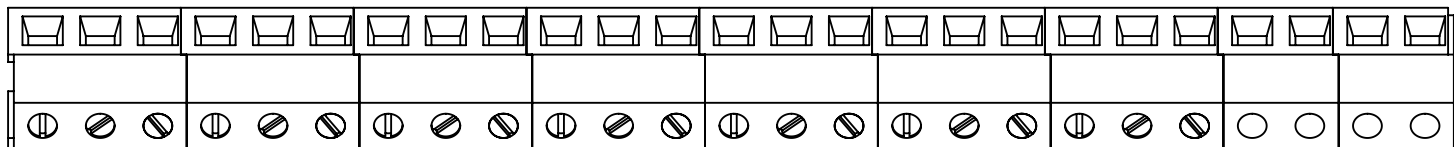
SIZE **C** DOCUMENT NUMBER 2DCAD-Q2-STD

REV **A**  
SHEET 5 OF 6

## Optional Alarm Connections

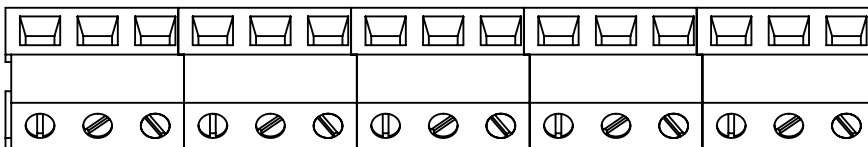
MAXIMUM WIRE - #14. SEE INSTALLATION AND OPERATION MANUAL FOR COMPLETE EXPLANATION OF ALARM FUNCTION AND CONNECTIONS.

END DISCHARGE LOW DC BATTERY CHECK GROUND FAULT HIGH DC AC FAIL CHARGER FAIL  
FAIL OK COM FAIL OK COM FAIL OK COM FAIL OK COM FAIL OK COM FAIL OK COM FAIL OK COM NO CONNECTIONS



7 ALARM  
OPTION

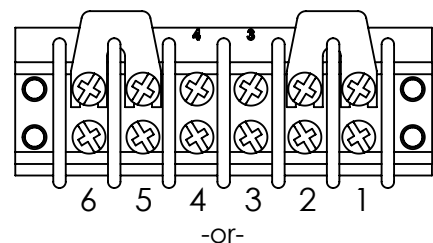
LOW DC GROUND FAULT HIGH DC AC FAIL CHARGER FAIL  
FAIL OK COM FAIL OK COM FAIL OK COM FAIL OK COM FAIL OK COM



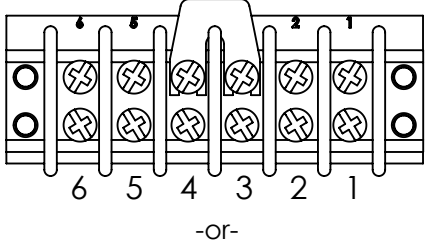
5 ALARM  
OPTION

### INPUT VOLTAGE SELECTION

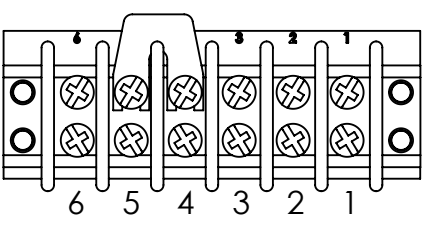
#### Input Voltage Codes P, T (Triple Input)



115-120V

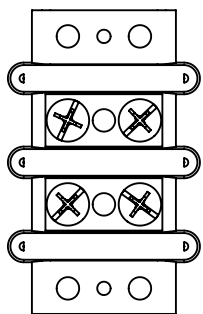


208V  
both jumpers  
same position



230-240V  
both jumpers  
same position

#### Input Voltage Code Z (Dual Input)



Do NOT move  
wires on this side.

Connect existing internal  
wire here for 240V input.  
-or-  
Connect existing internal  
wire here for 208V input.

#### Input Voltage Codes Other than P,T,Z (Single Input)

No terminal block - no configuration required.

Table 2 - AC Input Wire Gauge Ratings

| Rated Charger Input                  | Wire Gauge     |               |
|--------------------------------------|----------------|---------------|
|                                      | Min            | Max           |
| ≤ 240 VAC, 60 Hz                     | #14 Cu or Al   | #2 Cu or Al   |
| ≤ 240 VAC, 50/60 Hz                  | #14 Cu, #12 Al | #1/0 Cu or Al |
| >240 VAC                             | #14 Cu, #12 Al | #1/0 Cu or Al |
| all 65 KAIC breakers (special order) | #14 Cu, #12 Al | #1/0 Cu or Al |

Table 3. DC Output Wire Gauge Ratings

| Rated Charger Output |            | Wire Gauge      |                |
|----------------------|------------|-----------------|----------------|
| Volts                | Current    | Min             | Max            |
| 12V - 48V            | ≤ 50A      | # 14 Cu or Al   | # 2 Cu or Al   |
|                      | 75 & 100 A | # 4 Cu or Al    | # 2/0 Cu or Al |
|                      | 150A       | # 4 Cu Only     | # 4/0 Cu Only  |
| 120V & 240V          | ≤ 16A      | # 14 Cu, #12 Al | # 4 Cu or Al   |
|                      | ≥ 25A      | # 14 Cu, #12 Al | # 1/0 Cu or Al |

### IMPORTANT INFORMATION

- Some non-referenced items omitted for clarity.
- Style and size of AC and DC breakers may change depending on charger model number.

### NOTES TO INSTALLER

- Make AC and DC connections direct to AC and DC breakers. Location of breakers is shown.
- Make connections to charger and terminal blocks per user guide instructions.
- Polarity of breaker connections is indicated by the text enclosed in a diamond. For AC connections, "L" denotes line and "L/N" denotes a line or neutral connection, depending on the particular AC line configuration used.
- Tables 2 and 3 specify only the physical capacity of the breaker terminals. In addition to physical limitations, conductors must be electrically adequate per all applicable electrical safety regulations.



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DEFAULT TOLERANCES:

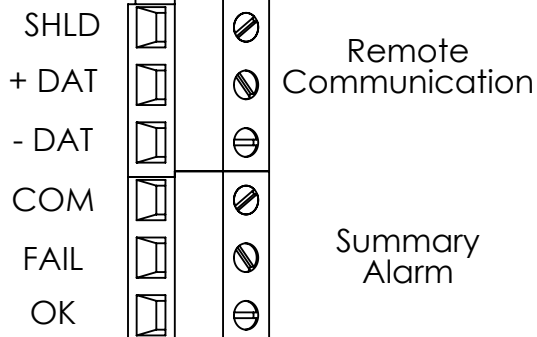
ANGLES ± 1°  
TWO PLACE DECIMAL ± NA  
THREE PLACE DECIMAL ± NA

DO NOT SCALE DRAWING

| NAME  | DATE      |
|---|-----------|
| JWF   | 2/28/2014 |
| CHECKED                                       |           |
| THIRD ANGLE PROJECTION                        |           |
| DIMENSIONS & TOLERANCES PER ASME Y14.5 - 2009 |           |

| REVISIONS |     |              |      |          |
|-----------|-----|--------------|------|----------|
| DCN       | REV | DESCRIPTION  | DATE | APPROVED |
| --        | --  | See sheet 1. | --   | --       |

### OPTIONAL DATA & ALARM CONNECTIONS



Remote  
Communication

Summary  
Alarm

Maximum wire gauge is #14 AWG.

Table 1- AC Input Current and AC/DC Circuit Breaker Current Ratings

| Charger Model | Rated AC Input Current |                                |                |                                     |                   |                   | Charger Input Breaker Current Ratings |                               |                |                                    |                   |                   | Output Breaker Current Ratings |
|---------------|------------------------|--------------------------------|----------------|-------------------------------------|-------------------|-------------------|---------------------------------------|-------------------------------|----------------|------------------------------------|-------------------|-------------------|--------------------------------|
|               | 208V 60Hz (3)          | 230/240V 50/60 Hz (4) 60Hz (S) | 480V 60 Hz (8) | 120/208/240V 50/60 Hz (P) 60 Hz (T) | 400V 50/60 Hz (V) | 208/240V 60Hz (Z) | 208V 60Hz (3)                         | 230/240V 50/60Hz (4) 60Hz (S) | 480V 60 Hz (8) | 120/208/240V 50/60Hz (P) 60 Hz (T) | 400V 50/60 Hz (V) | 208/240V 60Hz (Z) |                                |
| Q012-075      | N/A                    | N/A                            | 4.6            | 18/11/9.1                           | 5.5               | N/A               | N/A                                   | N/A                           | 15             | 25                                 | 15                | N/A               | 100                            |
| Q012-100      | N/A                    | N/A                            | 6.1            | 24/14/12                            | 7.3               | N/A               | N/A                                   | N/A                           | 15             | 30                                 | 15                | N/A               | 125                            |
| Q012-150      | N/A                    | N/A                            | 9.0            | 36/21/18                            | 11                | N/A               | N/A                                   | N/A                           | 15             | 45                                 | 15                | N/A               | 200                            |
| Q024-075      | N/A                    | N/A                            | 8.3            | 33/19/17                            | 9.9               | N/A               | N/A                                   | N/A                           | 15             | 45                                 | 15                | N/A               | 100                            |
| Q024-100      | N/A                    | N/A                            | 11             | 44/25/22                            | 13                | N/A               | N/A                                   | N/A                           | 15             | 60                                 | 20                | N/A               | 125                            |
| Q024-150      | 37                     | 32                             | 16             | N/A                                 | 19                | 37                | 50                                    | 40                            | 20             | N/A                                | 25                | 50                | 200                            |
| Q048-075      | 34                     | 30                             | 15             | N/A                                 | 18                | 34                | 45                                    | 40                            | 20             | N/A                                | 25                | 45                | 100                            |
| Q048-100      | 45                     | 39                             | 20             | N/A                                 | 24                | 45                | 60                                    | 50                            | 25             | N/A                                | 30                | 60                | 125                            |
| Q120-035      | 38                     | 33                             | 17             | N/A                                 | 20                | 38                | 50                                    | 45                            | 25             | N/A                                | 25                | 50                | 45                             |
| Q120-050      | 54                     | 46                             | 23             | N/A                                 | 28                | 54                | 70                                    | 60                            | 30             | N/A                                | 35                | 70                | 70                             |
| Q240-016      | 35                     | 30                             | 15             | N/A                                 | 18                | 35                | 45                                    | 40                            | 20             | N/A                                | 25                | 45                | 20                             |
| Q240-025      | 54                     | 46                             | 23             | N/A                                 | 28                | 54                | 70                                    | 60                            | 30             | N/A                                | 35                | 70                | 35                             |

DESCRIPTION

2DCAD,Q2,STANDARD

SIZE  
C

DOCUMENT NUMBER  
2DCAD-Q2-STD

REV  
A

SHEET 6 OF 6