

CYBER@SWITCHING®

Installation Guide

Cyber Switching EV Charging station Pedestal

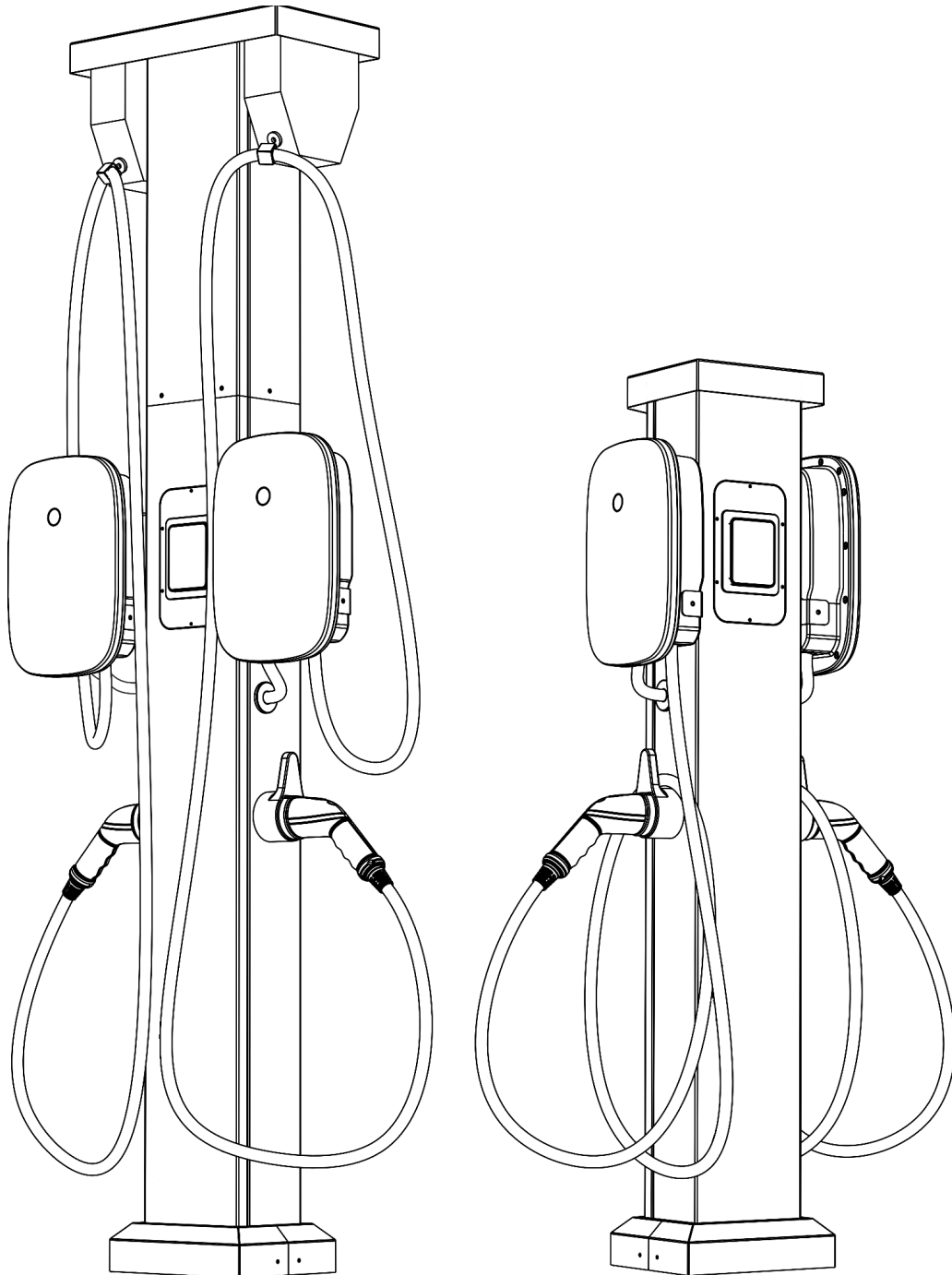


Table of Contents

Supply Content

- Pedestal base kit
- Pedestal Top kit

Specifications

- Pedestals dimensions

Tools Required

Mechanical Installation

- Pedestal base installation
- Covers and Hatches
- Chargers
- Retractors

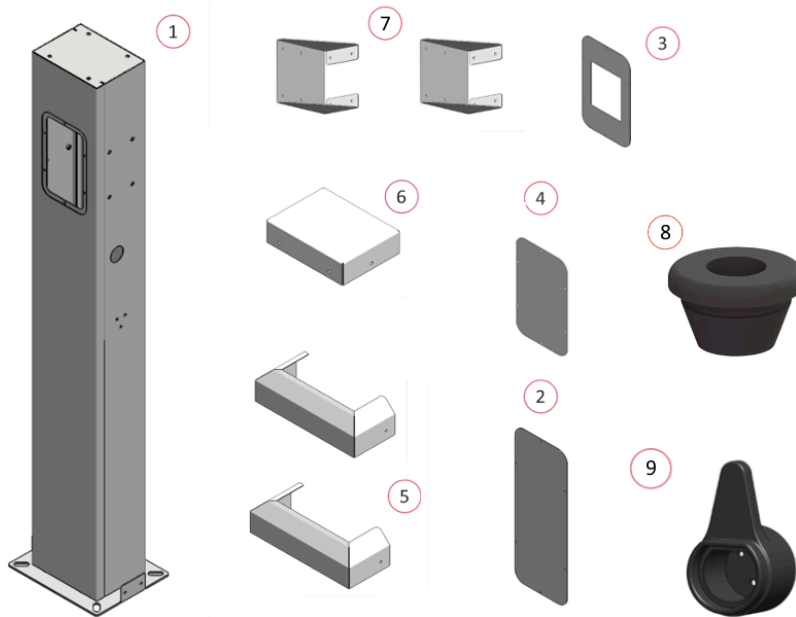
Electrical Connections

- Power supply requirements
- Wiring circuit diagram
- Cable plug connector
- Chargers connection

Supply Content

Pedestal Base Kit

Item #	Part	Quantity
1	Pedestal Base Section	1
2	Bottom Hatch	1
3	CC Reader Opening Plug	1
4	CC Reader Dummy Plug	1
5	Foot cover	2
6	Top Cover	1
7	Angle Mount	2
8	Grommet	2
9	Plug Holder	2
10	Fasteners Kit	1

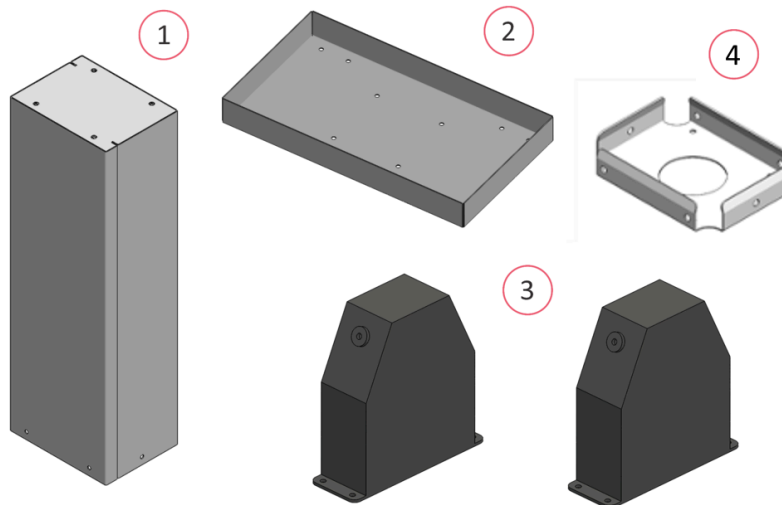


Pedestal Base Fasteners Kit

Item name	Qty	Placement
#8-32 3/8" Black Oxide Button Head Socket Cap Screws	28	Foot Cover, Bottom & Top Openings
#8-32 3/8" Phillips Pan Head Machine Screws	10	Plug Socket, Internal Electric Panel
#6-32 Stainless Nut	4	Credit Card Reader
#6 Stainless Washer	4	Credit Card Reader
#1/4-20 3/8" Black Oxide Button Head Socket Cap Screws	14	Top, Charger Holders
#1/4-20-1/2" Phillips Pan Head Machine Screws	12	Crown, Charger Mount
#1/4-20 Stainless Nut	8	Charger Mount
#1/4-20 Stainless Washer	8	Charger Mount

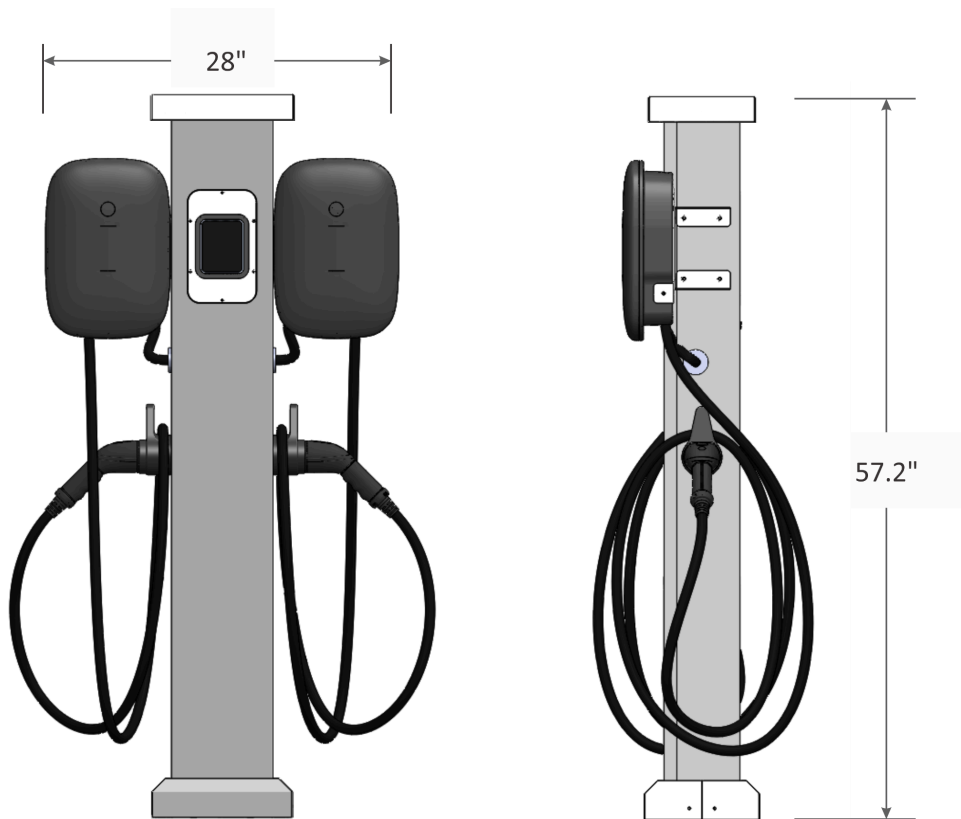
Pedestal Top Kit

Item #	Part	Quantity
1	Top Section	1
2	Retractors Mount	1
3	Retractor	1 or 2
4	Crown	1
5	Fasteners Kit	1

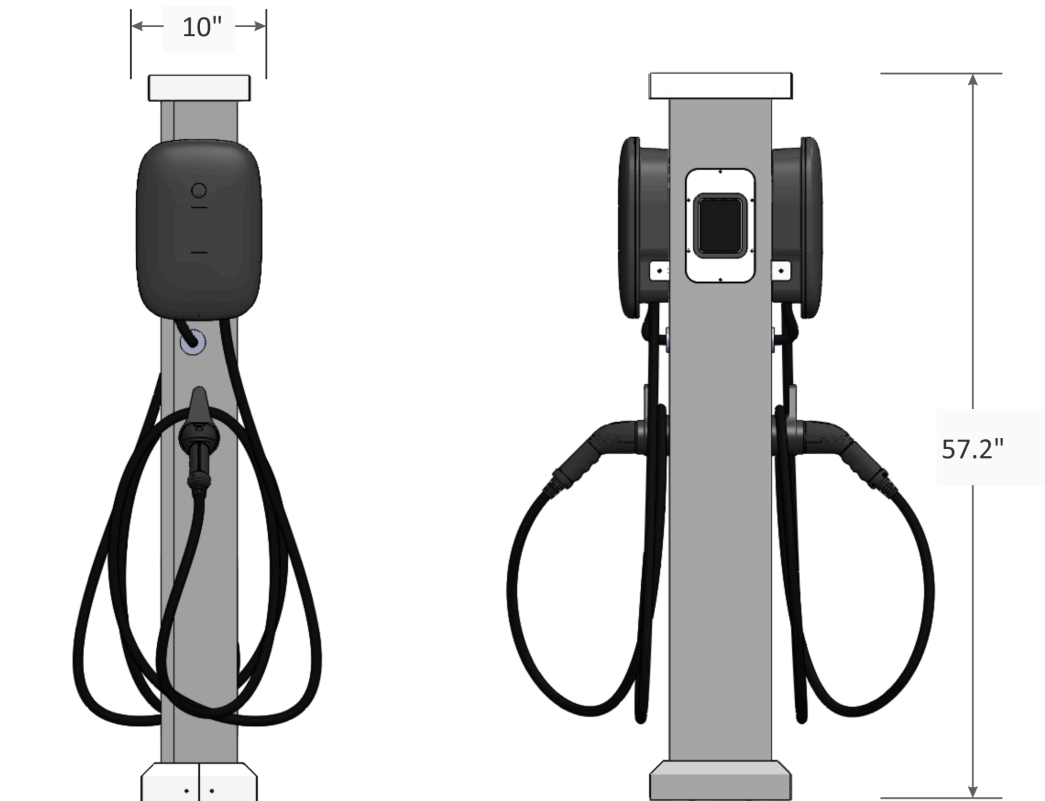


Pedestal dimensions, CS-SP

Side by side

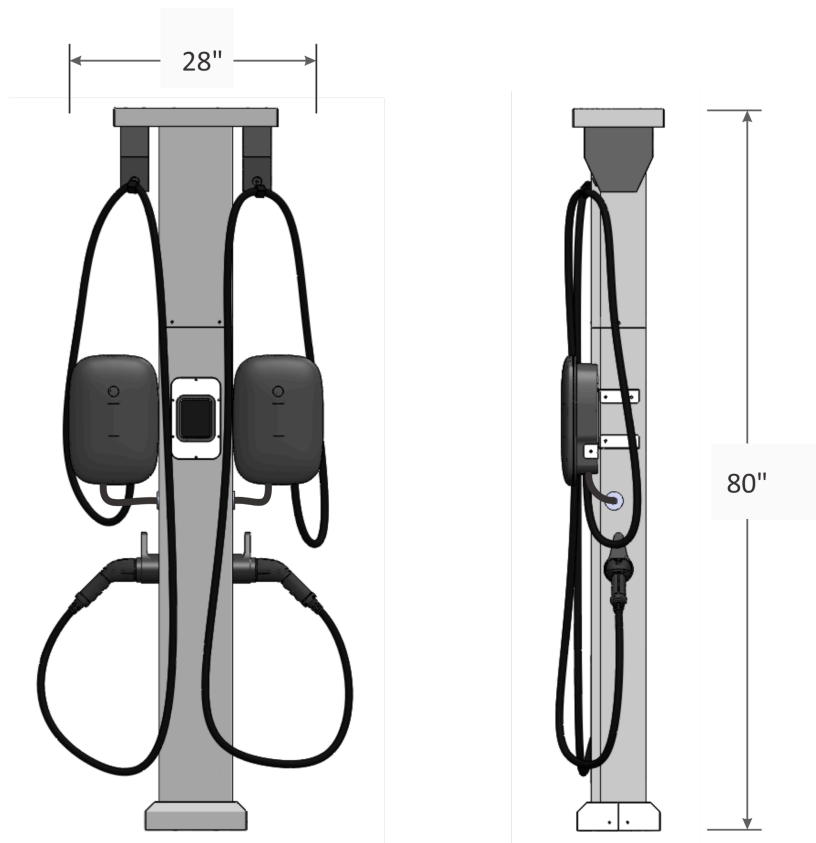


Back to back

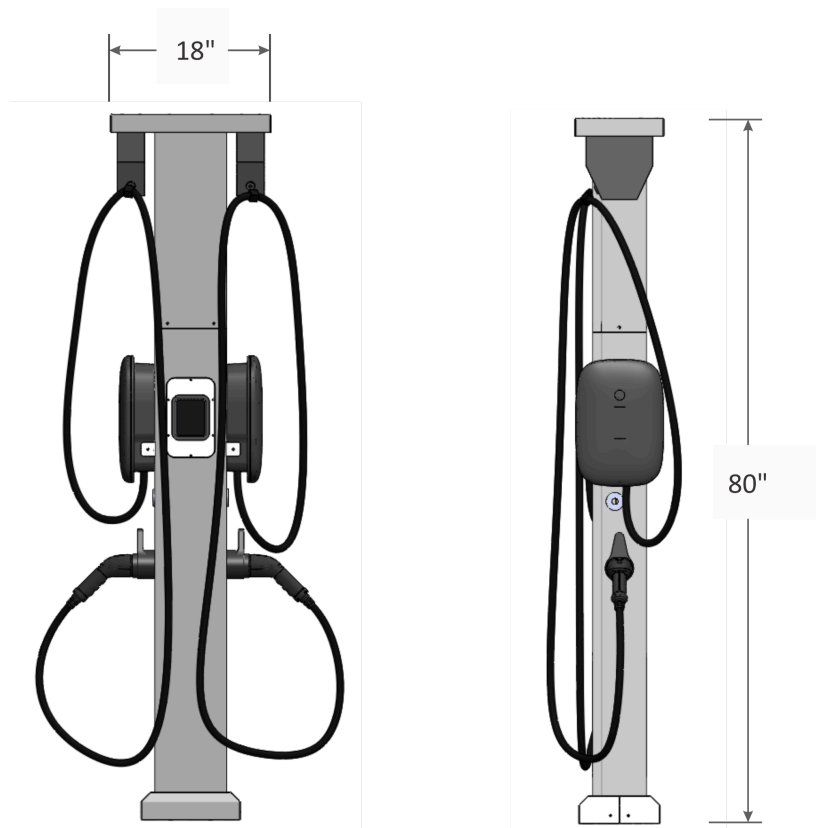


Pedestal with cable retractors dimensions, CS-DRP

Side by side



Back to back



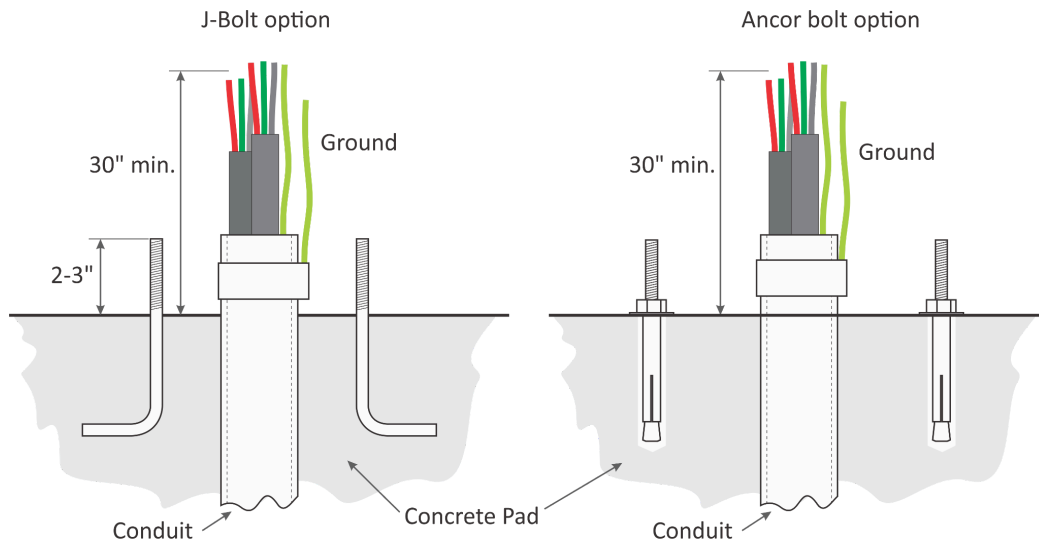
Tools Required

1. Wire strippers
2. Phillips screwdriver / Torq screwdrivers / Allen head screwdrivers
3. Adjustable pliers and/or wrenches
4. Multimeter
5. Tape measurer and level
6. Pencil
7. Drill & Drill bits

Mechanical Installation

Base Section Installation

There are two options to install base section, using J-bolts for new concrete pourings or ancor bolt on the existing concrete pads



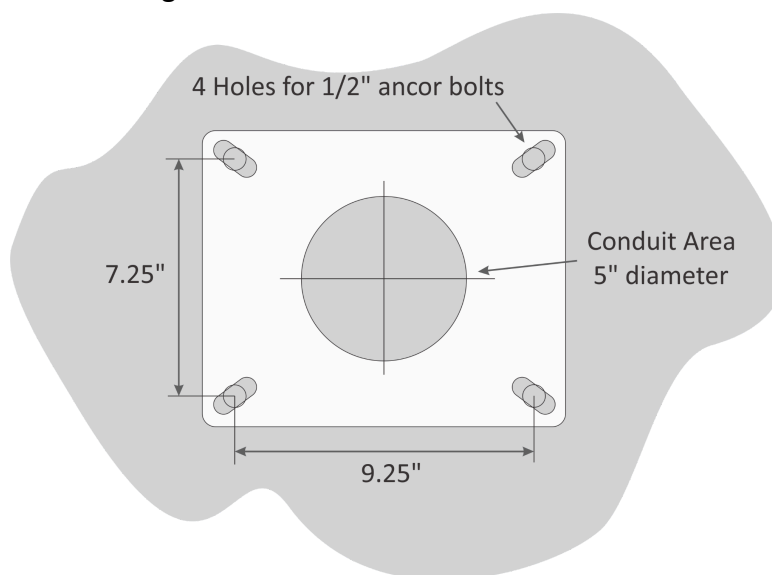
Minimum recommended concrete pad dimensions are:

- 18" square or min 18" any side of rect pad, 12" deep

When pouring new concrete, purchase J-bolt kit from Cyber Switching

Procedure for both type of pedestals (with and without retractors) is the same:

- Using template for placing J-bolts during concrete pour or drill minimum 4" holes for ancor bolts
- Ensure that conduit fits to the 5" circle as shown
- Install and fasten pedestal when concrete sets. You may need to use additional washers and nuts for pedestal leveling



Wiring

Requirements

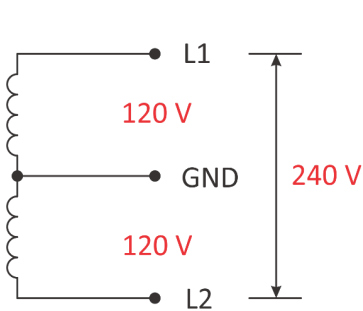
Each charger line shall be protected with a 2-pole common trip circuit breaker (non-GFCI type) according the table below:

Rated Current	Circuit Breaker Rate
16 A	20 A
32 A	40 A
40 A	50 A
48 A	60 A
80A	100A

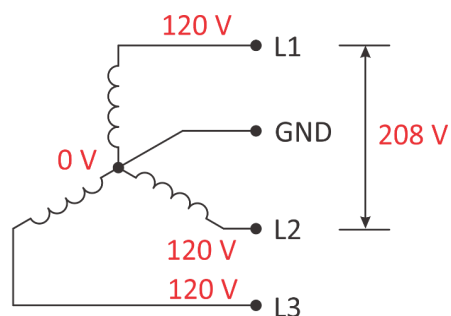
Wiring Diagram

Connect chargers to any one of these types of power sources

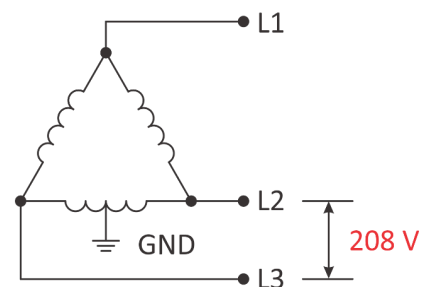
- A. 240 VAC single phase
- B. 208 VAC three phase, Wye system, only two phases used
- C. 208 VAC three phase, Delta system, Center tap grounded, only two phases used



A



B



C

Connection

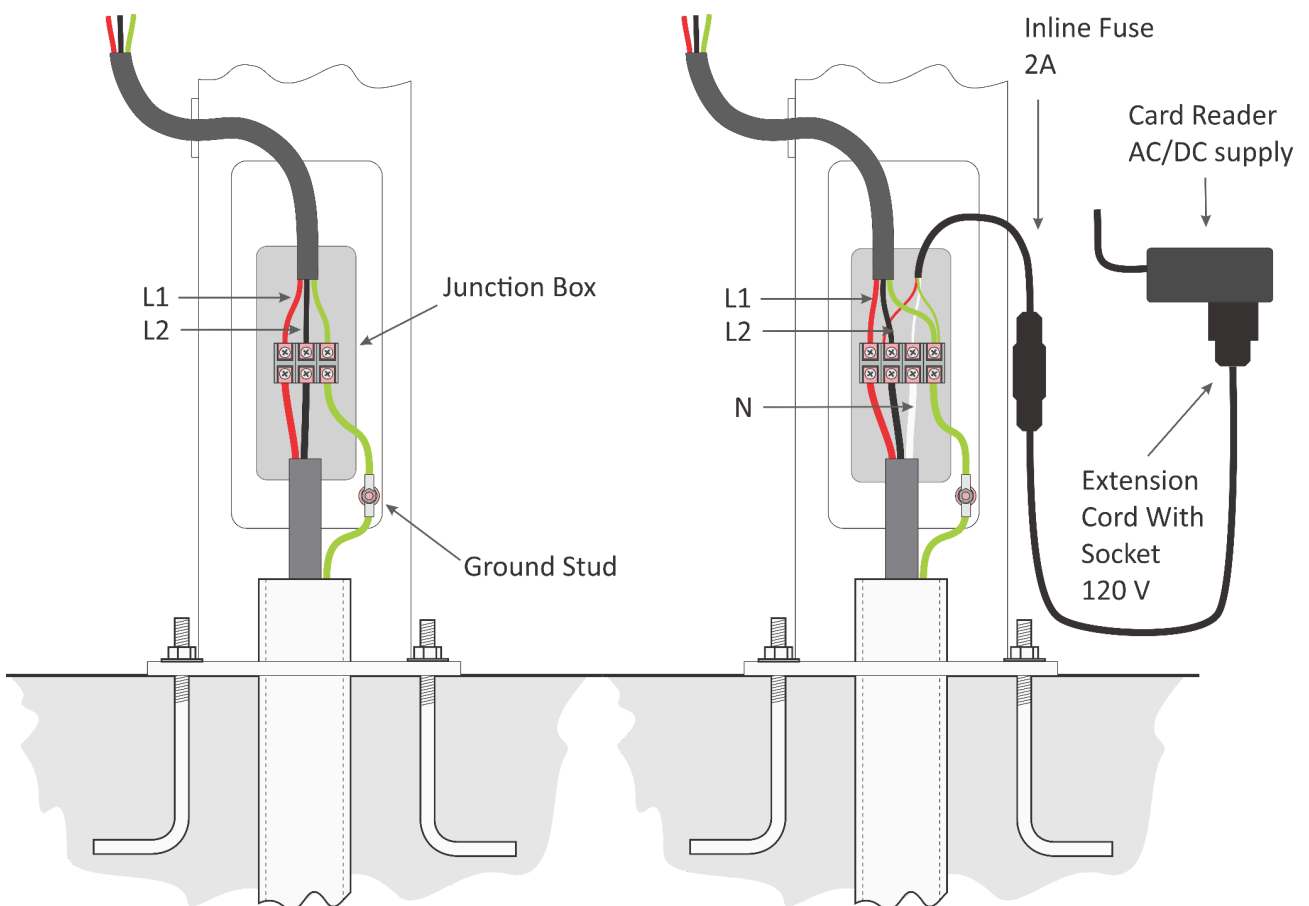
1. Connect the charging station on its dedicated electrical circuit via terminal block. There are three options for this

- Without card reader supply, using only two hotlines and grounding, on the left picture
- With card reader 120V supply from main feeder using neutral wire, on the right picture
- With card reader supply from dedicated 120V line, connect charger as on the left picture

2. If the pedestal is equipped with a credit card reader, use the extension cord with socket

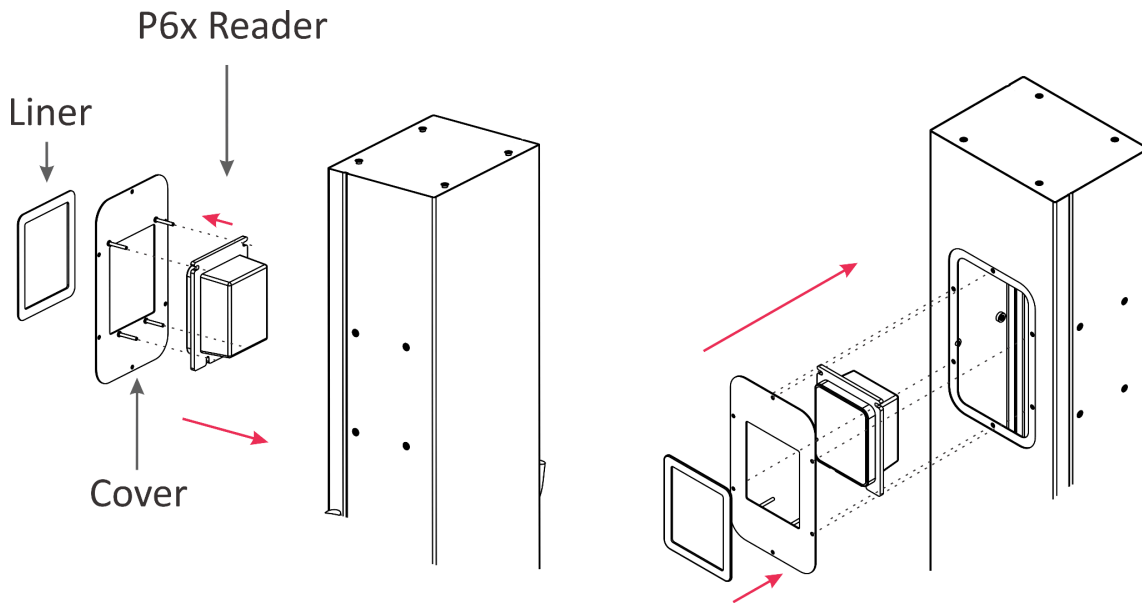
3. Insert 2A inline fuse into the extension cord hotwire

4. Connect all metal covers with grounding wire before closing openings



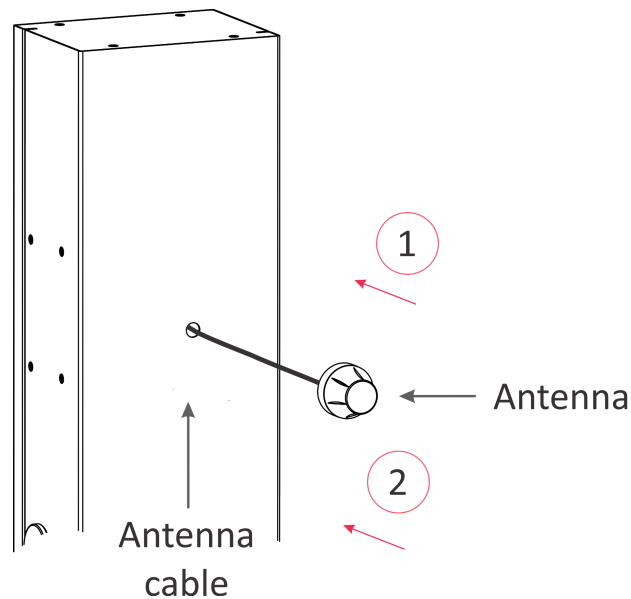
Payter P6x Installation (optional)

To assemble the configuration with the reader, attach it to the cover with opening first using washers and nuts, connect DC power and data link. Then install this assembly to the opening and stick the liner.



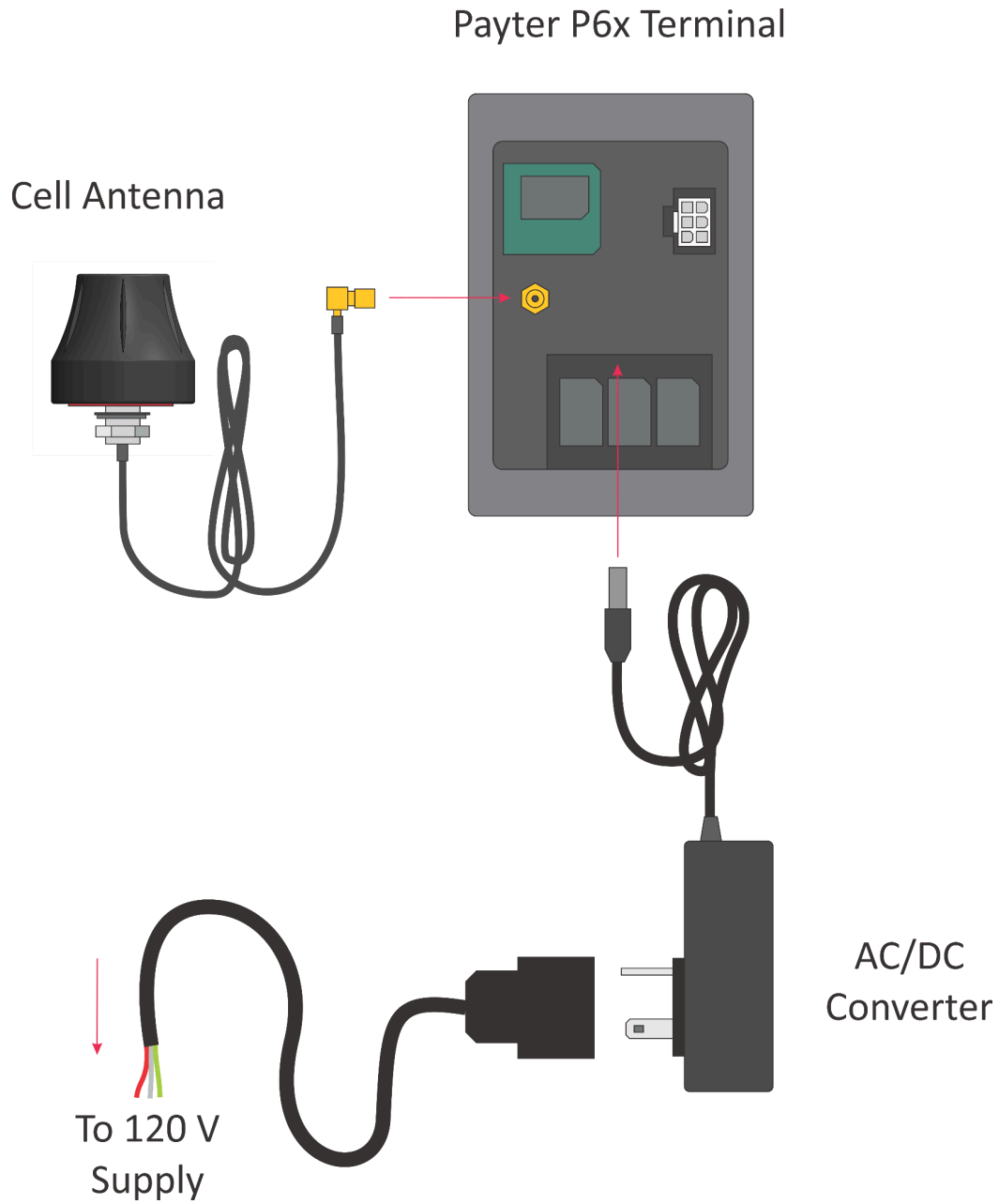
For antenna installation

1. Drill a $\frac{1}{2}$ " hole in the wall of the column.
2. Pull the cable and antenna through the hole and fasten nut and connect SMA connector to the pay terminal



To connect payment terminal

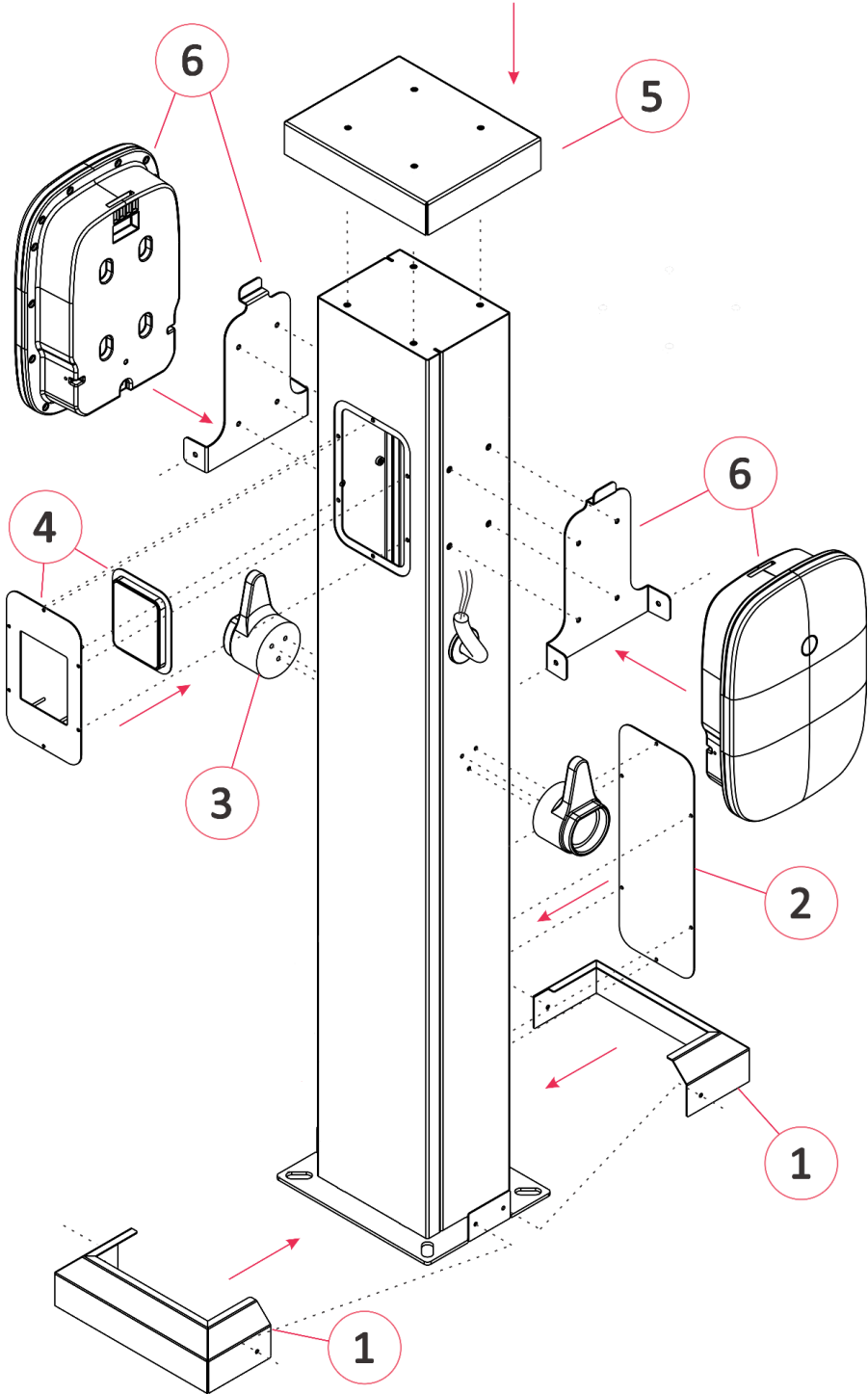
- 1.Plug adapter into the extension cord socket inside pedestal
- 2.Connect DC supply connector to the pay terminal
- 3.Connect SMA antenna



Assembly

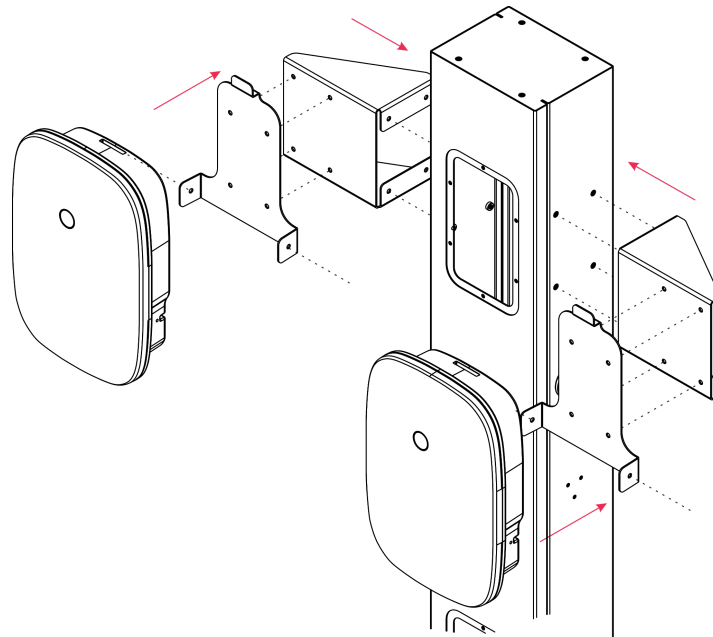
Pedestal assembly

Prepare and install parts on the mounted pedestal base section

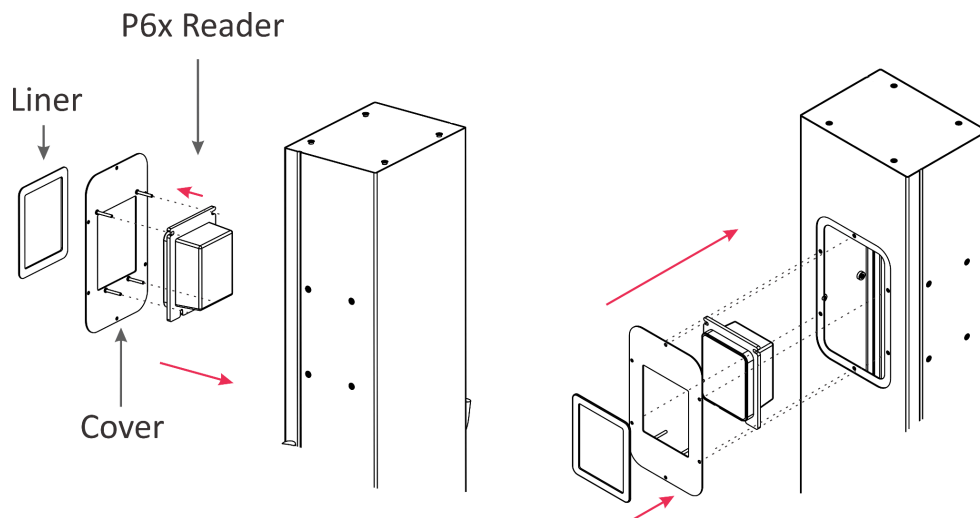


1. Attach two foot covers to the base. Apply any silicon base sealant into the gap between the ground and foot before, and trim anchors thread if needed.
2. Attach cover to junction box opening
3. Attach plastic plug holders to base
4. Attach dummy covers to reader opening or attach the reader to cover with opening if you using this option. Connect reader power supply wire and antenna as described before.
5. Attach top cover
6. Attach charger(s) bracket to base then put on charger and secure it

To assemble side by side configuration take angle mounts and attach them to the base before charger brackets, as shown



To assemble the configuration with the reader, attach it to the cover with opening first using washers and nuts, connect DC power and data link. Then install this assembly to the opening and stick the liner.



Retractors configuration assembly

1. To assemble retractable configuration follow previous instructions but install additional top section instead the top cover
2. Attach retractors to mount first
3. Attach mount with retractors to the top section

