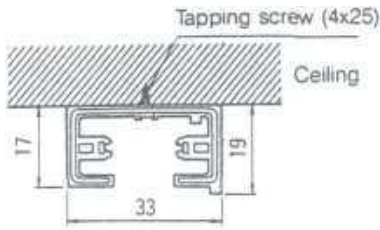


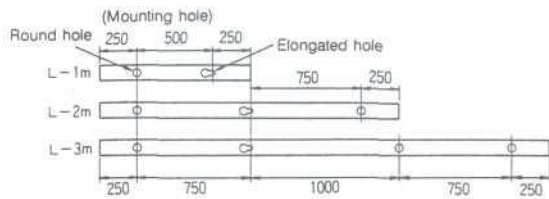
Factory Line 20

Installation of the ducts

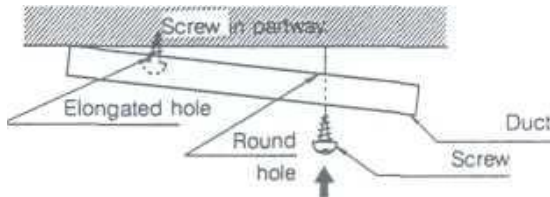
- Mounting the ducts directly to the ceiling
- Use the tapping screws included with the ducts to mount the ducts directly to the ceiling (or wall).



- Use all of the mounting holes

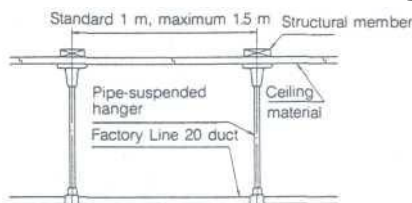
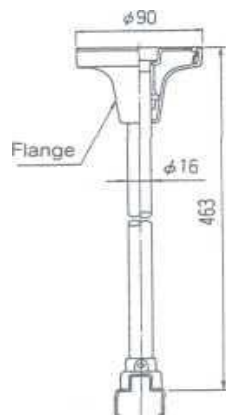


- Screw one screw partway in, fit the elongated hole of the duct onto that screw, and then screw the other screw in through the round hole in the duct. This allows the installation to be completed by one person.



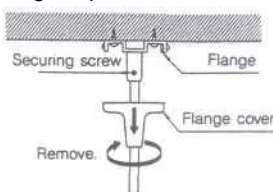
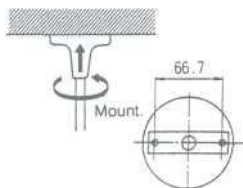
Mounting the pipe-suspended hangers 1

- Use this procedure if the Factory Line 20 ducts are to be suspended from pipes. If necessary, the pipes can be shortened to the required length by cutting them at the flange end.
- The standard interval for mounting of the hangers is 1 m, and the maximum interval is 1.5 m. Be sure to mount securely to a structural member.



• Mounting the flanges

- Turn the flange cover to the left to remove it, and then mount the flange to a structural member.
- Turn the flange cover to the right to mount it back in its original position.



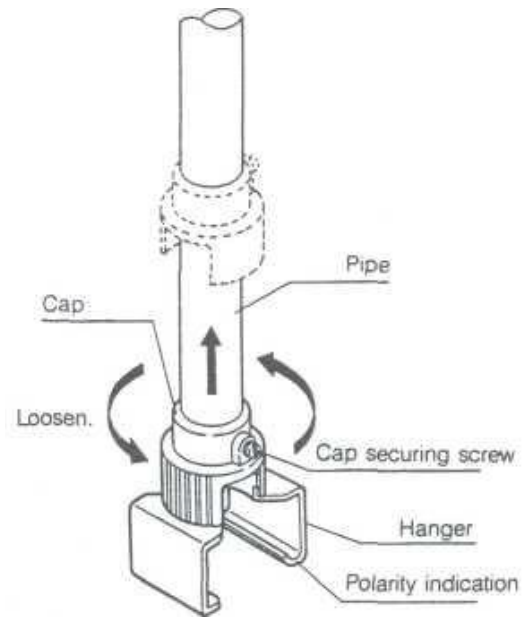
Note

In order to adjust the length after the pipe-suspended hangers have been mounted to a structural member, loosen the securing screw, remove the pipe, and cut the pipe at the flange end.

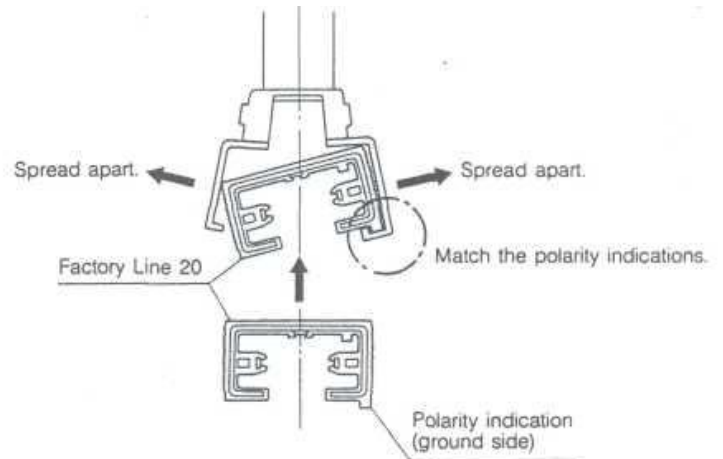
Mounting the pipe-suspended hangers 2

• Mounting the ducts

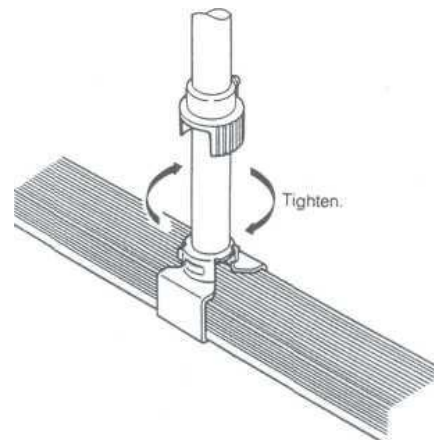
- Loosen the cap securing screw and turn the cap to the left to remove it from the hanger.



- Spread apart the hanger and match the polarity indication on the duct with the polarity indication on the hanger.



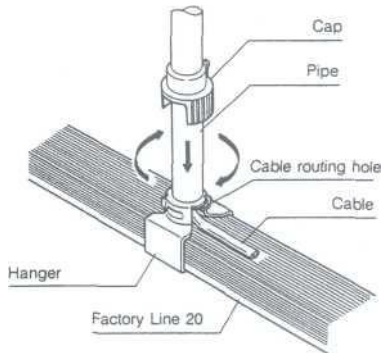
- Fit the duct into the hanger, and then turn the cap to the right and tighten the securing screw in order to secure the duct.



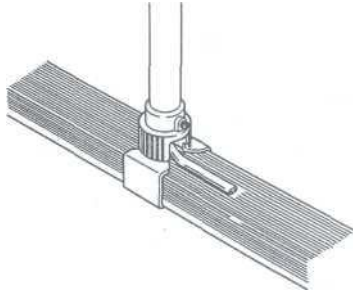
Mounting the pipe-suspended hangers 3

• Supplying power via the pipe-suspended hangers (method for bringing in the power supply)

- Route the cable from the ceiling into the pipe. When doing this, it is easier if the cable is passed through the pipe before securing the Factory Line 20 duct in the hanger.
- Loosen the cap and fit the Factory Line 20 duct into the hanger. Use a pipe-suspended hanger close to the feed-in cap.



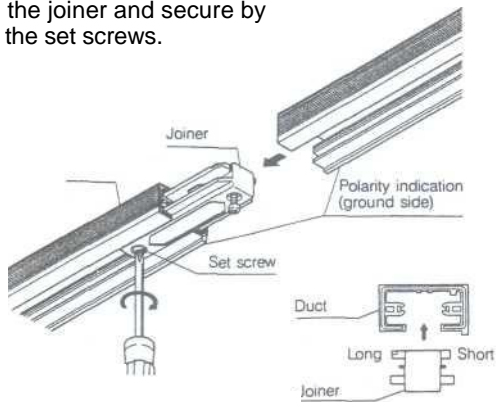
- Pass the cable through the hanger's cable passage hole, turn the cap to the right to secure the Factory Line 20 duct, and then tighten the cap's securing screw.



- Connect the cable to the feed-in cap of the Factory Line 20 duct.

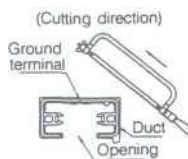
Connecting the ducts

- Use a joiner to connect two ducts together.
- Be sure to match the polarities of the ducts and the joiner and secure by tightening the set screws.



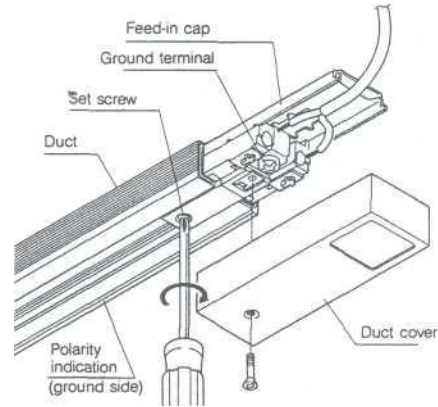
Note

1. Connect the ducts so that they butt securely up against each other.
2. Tighten the set screws securely.
3. When cutting the ducts, use a metal hacksaw (hand type) and cut with the opening in the duct facing downward as shown in the figure. If a power saw is used, the insulation cladding or ground terminals could be scraped or burned.
4. After cutting, if the ground terminal protrudes slightly, correct it.
5. Remove any cutting chips or burrs (ram the cut surface).



Installing the feed-in cap

- Fit the feed-in cap into the duct and tighten the set screw to secure it.
- Strip the ends of the electrical wires in accordance with the stripping gauge shown on the inside of the cover, and then insert the electrical wires until they are visible in the peep hole.
- To disconnect the electrical wires, pull them out while using a screwdriver or your finger to press the connection release button.

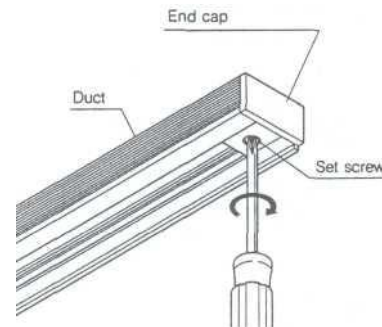


Note

1. When connecting the power supply, be sure that the side of the duct with the polarity indication (the side with the protruding rib) is the ground side.
2. Use either 1.6 or 2-mm² single wire for the electrical wire. If grounding is necessary, use three-wire cable and connect one
3. wire to the ground terminal by winding it around the terminal.

Attaching the end cap

Fit the end cap onto the end of the duct and secure it by tightening the set screw.



Note

An end cap must be attached onto the end of the duct.

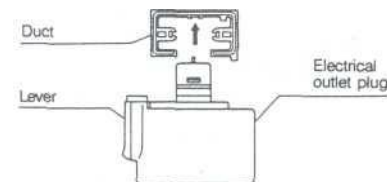
Mounting an electrical outlet plug

• Mounting

Matching the polarity indications on the duct and the plug, insert the plug into the duct and turn it to the right 90°.

• Removal

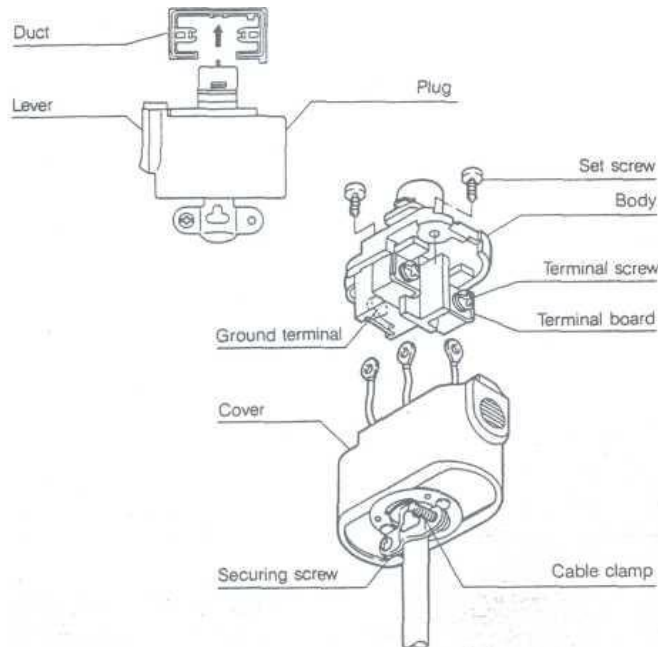
Pull down the lever on the plug, then turn it to the left 90°.



Mounting a terminal plug

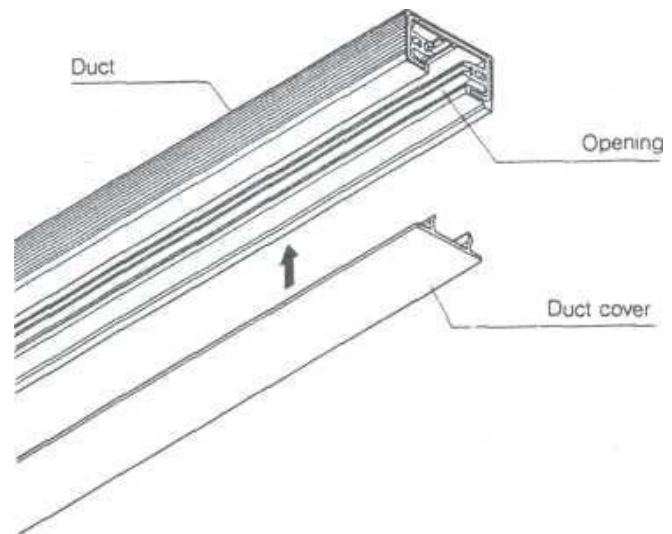
• Connection of the electrical wires

- Remove the set screws to remove the cover.
- Loosen the cable clamp securing screws and insert the electrical cable into the cover.
- Connect the electrical wires to the terminal board by either using crimp terminals or by winding the wires around the terminals.
- Fit the cover into the body and secure it by tightening the set screws.
- Tighten the cable clamp securing screws to secure the electrical cable.



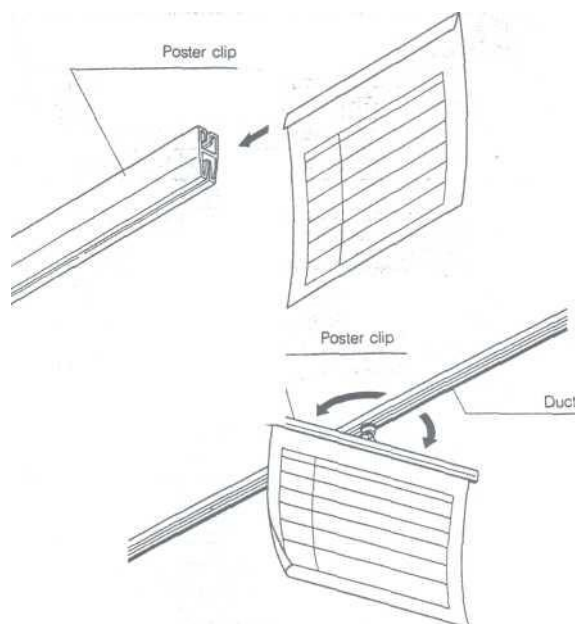
Mounting a duct cover

- Mount the cover by fitting it into the opening in the duct.



Use of a poster clip

- Fold down about 10 mm of the top of the work instruction sheet or process chart and slide it sideways into the poster clip.
- The work instruction sheet can be positioned in the desired direction.'



- Use the poster clip to suspend a work instruction sheet or process chart from the Factory Line 20.
- Mount the poster clip onto the Factory Line 20 duct in the same way as a plug. The maximum load weight is 5 kg.