

Installation of AVITHOR[™] E-Track[™]

Please read these instructions before attempting to install your AVITHOR E-Track system.

AVITHOR E-Track is a relatively simple product to install. You will benefit from some basic electrical knowledge, and the ability to adapt things to fit different circumstances. While the system has been well thought out, there may be situations where you need to improvise. Our Technical Support Team can help you if you have problems, or need additional assistance, simply call your Area Manager directly, or make a local call to **13 35 36**.

Required Tools

- Cut & Strip Tool for Lead Wires
- E-Connector Crimp Tool
- E-Track Cutter Tool or Strong Scissors
- AVITHOR Bond and a caulking gun
- Utility knife or pocket knife
- Tape measure
- Pen or pencil

Step 1 - Choose the ideal position for the E-Charger Unit

Whenever possible, position the E-Charger Unit as near the track system as possible.

Solar E-Chargers need to face due North in the southern hemisphere, or due South in the northern hemisphere, to capture as much sunlight as possible.

Plug-in E-Chargers (110 - 240v.) need to be installed out of the weather. When installing the 110 - 240v. unit, make sure it is plugged into a weatherproof outlet that has been installed by a licensed electrician. It is not necessary to install the charger unit close to the track; it's just more convenient that way. You can run lead-out wire from the unit to the track, up to a total lead wire and track distance of 150 metres.



Step 2 – Clean the intended E-Track location.

The track requires a clean surface for the **AVITHOR Bond** to adhere. Use **AVITHOR SEL Cleaning Concentrate** to break down droppings for easy clean-up. If possible, it is best to pressure wash the surface first. If applying to a painted surface, test a small area to ensure the installation will not affect the paint.

Step 3 - Layout the E-Track and cut to fit



E-Track is delivered in 15 metre rolls. E-Track should be placed in position very near to where it will be secured to the surface using our **E-Bond**. E-Track will easily adapt to many surface imperfections and obstacles found on ledges and roof surfaces and is easily cut and joined to handle tight turns. Take the time now, before getting out the bottle of E-Bond, to make your cuts and corners.

Step 4 - Attach E-Quick Connectors to E-Track

Straight Connections

The **E-Quick Connector Set** includes a centre component, two snapping caps and two strands of stainless steel braided wire.



To make a connection, thread the stainless steel braids through the two holes in the Connector and lock the braids in place. The stainless steel braids move current from one track to the next.

Take one track and set it down in a trough, lay the stainless steel braids on top and

take the locking cap and press it down on top, making sure the stainless steel braids are in place. To connect the other side, take the track and place in the remaining trough, put the stainless steel braid down on top and press the cap down until it locks.

To make sure you don't have any short circuit, trim off any excess pieces of stainless steel braid.



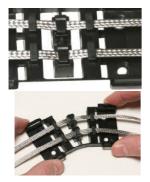
Notice that the two male connections sticking up can be used to connect to a lead wire or another track. If not being used, make sure you bend them down away from each other to prevent arcing.



The connection is now complete.

Corner Connections

An E-Quick Connector Set can also be used to create a 90 degree corner in the track.



E-Quick Taps



You will need to cut out one side of the centre component. Thread the stainless steel braid through the centre locking snaps. Take the track, slide it into the trough, make sure the stainless steel braid is centred on top of track braid and lock with the snapping caps.

Bend the Centre Component to the desired angle, and then place the other side of the track into the trough and lock it down.

Another part of the E-Quick Connector system is the **E-Quick Tap**. Slide the base under the track and lock it down using the snapping caps. The male connections sticking up will allow you to 'jump' from track to track or to the power charger. A parallel connection between tracks can be accomplished by placing an **E-Quick Tap Jumper Connector** on a track next to the first track and connecting them using lead out wire.

If you ever run out of E-Quick Taps, and have E-Quick Connector Straight Sets, cut the Centre Component in half and you will have two E-Quick Tap Jumpers.

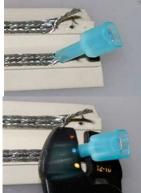
To remove a cap, take a screw driver and insert it into the side of the Centre Component until the snapping cap is released.

E-Standard Connectors



Use a knife to cut the stainless braid free from the track base. Cut back under the stainless steel braid about 15mm.

On one side of the track, trim off about 5mm of the exposed stainless steel braid to allow room for the connectors. Twist the stainless steel braid into a wire like form then stand the stainless steel braid up straight from the track to allow easy installation of the connector.



Slide on the appropriate male or female connector for this splice.

Crimp across the barrel as shown, in line with the connector. When performing the crimp always use a **Ratchet Crimp Tool** to ensure a complete and tight crimp. (NB. The AVITHOR product warranty does not cover crimps).

Install and crimp the second connector.

Corner Connections



E-Track can make gentle side to side curves to conform to building features, but it will need to be cut to handle sharper corners. **E-Corner Connectors** are supplied with each roll of E-Track and additional Connector packs are available for complex jobs. An **E-Flag Connector** is used to make a tight turn in the stainless steel braid for corners.



Use the very tip of the Ratchet Crimp Tool to crimp the E-Flag Connector. This will ensure a tight connection to the stainless steel braid. This connection can be tricky so we suggest that you 'tug' on the end to ensure that the E-Flag Connector is secure.

| Connections supplied with each 15 m roll | Additional Connection Kits available separately |
|--|---|
| Connection from Track to Charger Unit (1 only) | E-Straight Connection Kit (50 Sets) |
| Straight Connections (4 Sets) | E-Corner Connection Kit (50 Sets) |
| Corner Connections (4 Sets) | 'T' Junction Kit (25 Sets) |

The **'T' Junction Kit** has special connectors that support the ability to splice into an existing track and run in a different direction. This kit contains separate installation instructions.

Step 5 – Bond the E-Track to the structure



Apply E-Bond to the back of the E-Track paying special attention to the track ends where the connectors are. Apply a thin bead down the centre, skipping a few centimetres every 15 centimetres. For the best adhesion, press the track down to the surface so the E-Bond squeezes out towards the edges.

Step 6 – Snap together the Connectors



Press together the Connectors for a tight fit. Be certain that the individual stainless steel braids stay separated from each other. If necessary use some E-Bond to hold the Connectors in place.

Step 7 – Attaching E-Track to the E-Charger Unit



The E-Track and the E-Charger unit are connected using **AVITHOR copper dual lead wire**. This special, highly insulated wire, is available separately. To connect the wire, simply strip the ends of the dual leads and connect the

Ring Connector to one end and use the appropriate male or female connector to attach the wire to the E-Track.