

### Build a fence (if required)

To optimise your new energizer's performance, ensure that your fence system is of a high standard, using high quality Speedrite accessory products where appropriate. Refer to the enclosed Speedrite Fence Manual for complete fence building instructions.

# Install your earthing/ grounding system

For optimum performance of your energizer a suitable earth/ground system must be installed

Heightsufficient to clear
stock and vehicles

Earth
System

Earth

(6ft)

Indoor Installation Option

Note - sleeve in wall to prevent

chafing

Line Tap

Feedline to Fence

at least 10m (33ft) from other earth/ground systems (ie telephone or mains power). Ideally Speedrite Earth Stakes (SA067) or Speedrite Super Earth Kits (SA066) should be used, alternatively galvanised pipe or steel posts can be used as earth rods. Earth rods should be driven 2m (6.5ft) into the soil and spaced at least 3m (10ft) apart.

Total recommended minimum earth/ground length	
Energizer Model	Number of 2m (6.5ft) rods
Panther 20000	4

For complete earthing/ grounding instructions refer to your Speedrite Fence Manual.

# Attach the energizer to the wall (refer diagram above)

Select a suitable location, indoors or protected from the weather, about 2m (6ft) above floor level, or out of reach of children and near a power point.

Using the template supplied, fix two screws into the wall. Hang the energizer on the wall by locating screws into the keyholes provided on the back of the energizer.

When correctly installed, the unit should hang level and flat against the wall.

#### Connect the earth and fence

Connect the energizer "Earth" (black) terminal to your earth system, preferably using a length of 2.5mm (12.5g) Speedrite Insulated Cable (SC005). Connect the Fence to the "Fence High Output" (red) terminal.

The "Fence Low Output" (yellow) terminal can be connected to fences where high power is not required (eg yard, barn or shed fences).

### Connect the energizer to mains power and switch on at power point

The "Power" light on the bottom of the energizer will glow, indicating that power is being supplied to the energizer and that the energizer's storage capacitors are being charged.

The "Pulse" light will flash with each pulse, indicating that there is a pulse at the output terminals. The pulse light will get dimmer as fence load increases, indicating that fence maintenance (eg clearing vegetation from fence) is required. Under extreme load the Pulse light will cease flashing.

Load Indicator: The Load Indicator lights, just above and either side of the Pulse light, provide more detailed information on the fence load.

Light/No load	Neither light flashes
Medium load	Right light flashes
Heavy load	Both lights flash

Electronic gearing: The Panther 20000 has 3 stage gearing which automatically increases or decreases the energizer's output to compensate for extra or reduced fence loading (eg vegetation).

### Test your earth/ground system

See the enclosed Speedrite Fence Manual.

# Safety points and regulations

All energizers must comply with local standard requirements. These requirements may vary from country to country.

In areas prone to bush fires there may be a risk of fire caused by sparking from the fence. In high risk situations, if available, the Fence Low Output should be used, or the energizer should be turned off.

Barbed Wire should never be used for electric fencing.

Energizers should, if possible be installed inside a building in a position free from the risk of mechanical damage. If mounted outdoors they should be mounted on a substantial structure in a position free from risk of mechanical damage.

Avoid erecting a fence which runs parallel to or under power lines. Where this is unavoidable the crossing should be underneath the power lines and as near as possible at right angles to the lines.

If an electric fence has to be installed in the vicinity of an overhead power line, the vertical distance between any fence wire or connecting lead and the surface of the earth should not exceed 2m.

Fence wiring should be installed so that it is well away from any telephone/telegraph line or radio aerial.

Each energizer should be connected to its own earth system and this should not be connected to any other earth system.

Do not connect more than one energizer to a single electric fence.

Do not connect the energizer simultaneously to a fence and to any other device such as a cattle trainer or poultry trainer, otherwise lightning striking your fence will be conducted to all other devices.

When an electric fence is installed where it might reasonably be expected to be touched by the public then warning signs must be attached. The warning sign must be at least 200mm x 100mm (8" x 4") in size and should be attached at intervals not exceeding 90m (295ft).

The sign should display the symbol below or the words "Electric Fence".



The inscription should be indelible and any lettering should have a height of at least 35mm (1 1/3"). It is recommended that the basic colour off the sign be yellow with black inscription.

When the energizer is used to supply a system of conductors used for deterring birds from roosting on buildings, no conductor should be connected to earth. A switch should be installed to provide means of isolating the energizer from all poles of the supply and clear warning signs should be fitted at every point where a person may have ready access to the conductors. The notice should bear the words "LIVE WIRES" in block letters not less than 13mm (½") high, the letters should be red on a white background and the size of each notice should be not less than 62mm x 50mm (2 ½" x 2") overall.

Please save these instructions



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