# speco technologies

# SRD80T 80W Speaker Horn Driver + SRH20 Horn Casing

### **IMPORTANT NOTES**

Before connecting and using this product, please read this instruction manual carefully and keep it on hand for future reference. The manual is to be considered an integral part of this product and must accompany it if ownership changes, to serve as a reference for correct installation and use as well as for the safety precautions.

Any incorrect installation or use of this product will void the warranty.

#### WARNING

Contact your Speco Technologies technical support should any of the following occur:

- the Driver Unit does not function (or works in an anomalous way).
- the cable has been damaged.
- · objects or liquids have gotten into the Driver Unit.
- · the Driver Unit has been damaged due to impact or fire.

#### SAFETY PRECAUTIONS

1. All precautions, in particular the safety ones, must be read with special attention, as they provide important information.

2. Make sure all connections have been made correctly and the Driver Unit input voltage (in a constant voltage system) or its impedance is suitable for the amplifier output.

3. Never attempt to carry out any operations, modifications or repairs that are not expressly described in this manual.

4. Driver Unit lines (i.e., speaker wire) can sometimes have sufficiently high voltage (i.e. 100 V) to involve a risk of electrical shock: never install or connect this Driver Unit when the line is alive.

5. Protect connected speaker wire from damage; make sure it is positioned in a way that it cannot be stepped on or crushed by objects.

6. Should the Driver Unit emit any strange odors or smoke, turn the amplifier off and disconnect the driver from the speaker wire.

7. Make sure that no objects or liquids can get into this product as this may cause a short circuit.

8. To prevent inductive effects from causing hum, noise and poor performance, speaker wire should not be laid together with other electric cables (mains), microphone cables or line level signal cables connected to amplifier inputs.

9. Strongly recommend this product is only installed by professional qualified installers or specialized firms who can ensure a correct installation and certify it is installed according to local regulations.

10. WARNING: Do not install the speaker close to the listening area. Exposure to high sound levels can cause permanent hearing loss. The acoustic pressure level that leads to hearing loss is different from person to person and depends on the duration of exposure. To prevent potentially dangerous exposure to high levels of acoustic pressure, anyone who is exposed to these levels should use adequate protection devices. When a transducer capable of producing high sound levels is being used, it is necessary to wear ear plugs or protective earphones.

11. Do not connect this product to any equipment or accessories other than that for which it is intended (i.e., commercial amplifiers).

### CAUTION

- · Install this Driver Unit far from any heat source.
- · Do not overload this product for extended periods of time.
- If the Driver Unit is used in particularly cold places, drive it with a low signal for 5-10 minutes to allow it to warm up before using it maximum power.
- · Do not use solvents, alcohol, benzene or other volatile substances for cleaning the external parts of this product.

## APPLICATION

This unit is intended for use with Speco Technologies SRH20 Horn Casing. When used in conjunction with a casing, driver units can be easily aimed to any direction. Their use is recommended in houses of worship, supermarkets, public transportation, stadiums, parking lots, factories, warehouses, schools, offices, etc., or any environments where good sound projection and high efficiency are required.

# INSTALLATION

Driver Units are only to be installed by qualified personnel following all safety standards.

Every Driver Unit/Horn Casing must be installed securely, making sure the support structure (walls, ceilings) has the necessary characteristics for the system weight, to avoid the risk of a fall that could damage things or cause an injury.

Use attachment elements suitable for walls, ceilings (e.g. screw anchors for bricks, screw anchors for concrete, etc.).

#### CONNECTIONS

Driver Unit connections should only be made by qualified and experienced personnel having the technical know-how or sufficient specific instructions to ensure that connections are made correctly and to prevent any electrical danger.

To prevent any risk of electric shock, do not connect Driver Units when the amplifier is switched on.

Before turning the system on, check all connections and make sure there are no accidental short circuits. The entire sound system shall be designed and installed in compliance with the current local laws and regulations regarding electrical systems.

The Driver Unit is designed for connection to audio lines at 70 constant voltage. The connection to the audio line is made using the 2-wire input cable connected to the back part of the Driver Unit. The adjustment can easily be made on the back of the Driver Unit by changing the point of the tap. The wires to be used depend on the line voltage and the power to be delivered, as indicated in the table below.

Direct output: V1 (+) V2 (-)

70 constant voltage output

Connection	C-5W	C-10W	C-20W	C-40W	C-80W
Power	5W	10W	20W	40W	80W

#### NOTES ABOUT CONSTANT VOLTAGE SYSTEMS

- The Driver Unit input voltage must correspond to the amplifier output voltage. (i.e., 70V)
- The sum of nominal power values of all Driver Units connected to the line must not exceed the amplifier power (minus a 20% safety buffer).
- Make sure all Driver Units are connected in phase (+ to + and to -) to ensure correct audio reproduction.
- We recommend using 14-2 or 16-2 speaker wire to ensure maximum performance over distance.
- Driver Unit lines must be kept separated from main power cables, microphone cables or others, in order to avoid inductive phenomena that may cause hum or noises.
- Use cables with twisted wires to reduce hum caused by inductive effects due to coupling with electromagnetic fields.

# HOW TO ASSEMBLE THE DRIVER UNIT WITH THE SRH20

The Driver Unit has 1 - 3/8 18 threads (inch screw) which helps to very easily connect it with the matching screw thread on the SRH20.

Speco Technologies is constantly developing and improving products.

We reserve the right to modify product design and specifications without notice and without incurring any obligation.

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