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INDUCTIVE LOOP AMPLIFIER

FOR

AUTODIALER HELPY 2W - SERIES

USER MANUAL

7IS-80367 20/06/2014

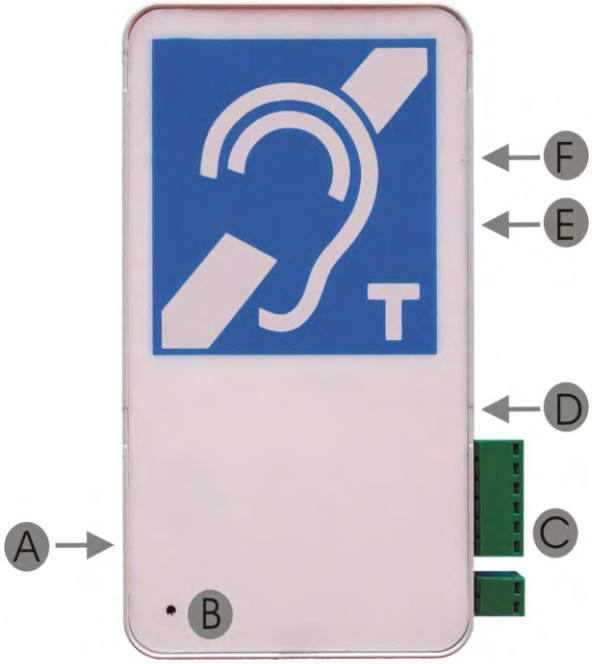
INDUCTIVE LOOP AMPLIFIER

The inductive loop amplifier enables two-way speech communication for lift passengers with impaired hearing.
Thanks to the induction loop, in the event of an emergency call, a passenger wearing a hearing aid is able to listen clearly to the voice prompts and communicate with the recipient.

Inductive loop amplifier

Inductive loop wire antenna

Description



A	ON / OFF switch
B	Built-in microphone
C	Terminal blocks
D	Jumper for built-in microphone ac va on
E	Transmission strength adjustment
F	Microphones sensitivity adjustment

Terminal Blocks

On/Off	External switch on/off
MIC	External microphone input
IN+	Audio signal input (+)
IN-	audio signal input (-)
–	Negative
+12 Vdc	Supply voltage 12Vdc
L1	Output for loop wire antenna
L2	Output for loop wire antenna

Operation

The audio signal transmitted by the autodialer connected to the inductive loop amplifier generates a current inside the loop antenna wire.
The magnetic field generated by the current is picked up by the passengers with hearing aid allowing them to hear the audio signal properly.

Connecting the audio signal

- Connect the audio signal (+) coming from the autodialer to connector **IN+** on the amplifier unit.
- Connect the audio signal (-) comming from the autodialer to connector **IN-** on the amplifier unit.
- Make sure that the jumper for the built-in microphone is removed. **D** on page 9

Connection example with Esse-ti active handsfree terminal:
*terminal **A** of the handsfree unit-> terminal **IN+** of the amplifier unit*
*terminal **–** of the handsfree unit -> terminal **IN-** of the amplifier unit.*

Connection example with any Esse-ti autodialer with built-in speech module (Helpy Quick, Helpy Quick-TL, Helpy Vox, ST61):
*terminal **ALT2** of the Esse-ti autodialer -> terminal **IN+** of the amplifier unit*
*terminal **–** of the Esse-ti autodialer -> terminal **IN-** of the amplifier unit.*

Connecting the loop wire

- Connect one terminal of the loop wire to the **L1** terminal of the amplifier unit (no polarity to be respected).
- Connect the other terminal of the loop wire to the **L2** terminal of the amplifier unit.

Placing the loop wire

For a correct audio signal transmission, it is strictly required to place the wire loop in the most proper position.

Warning: the loop wire must not be tampered with (prolonged, shortened, altered, …) so as to cause damage.

Loop shape

The wire loop must be placed so as to allow the current running inside it always travels along the same direction. (s. diagram 1).

The size of the loop wire may be reduced by increasing the number of turns (s. diagram 2), provided the current always travels along the same direction within all turns. Other installation methods or wire positions are not viable (ex. diagram 3).

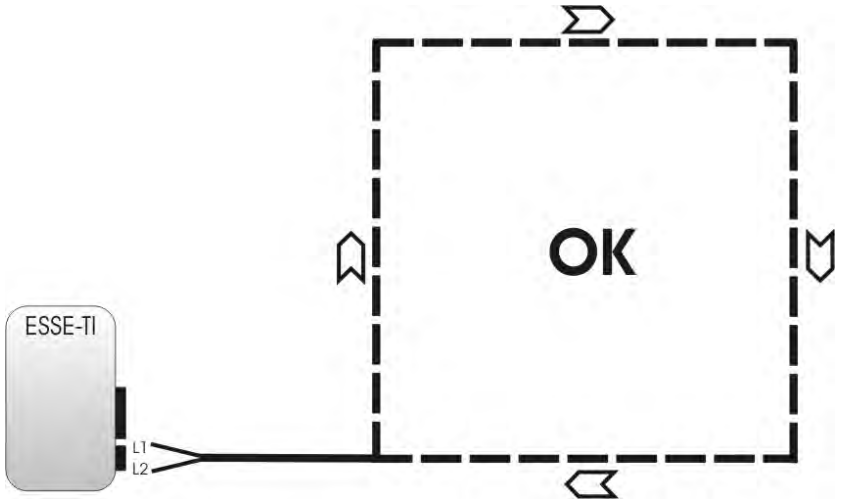


Diagram 1

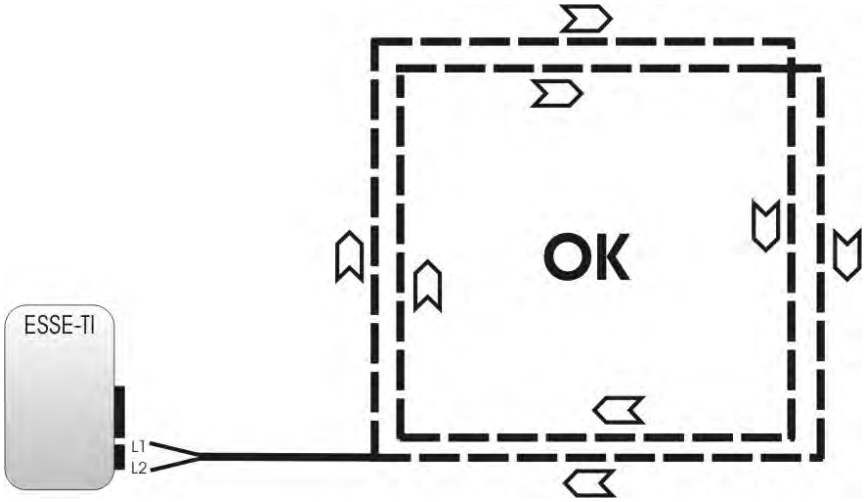


Diagram 2

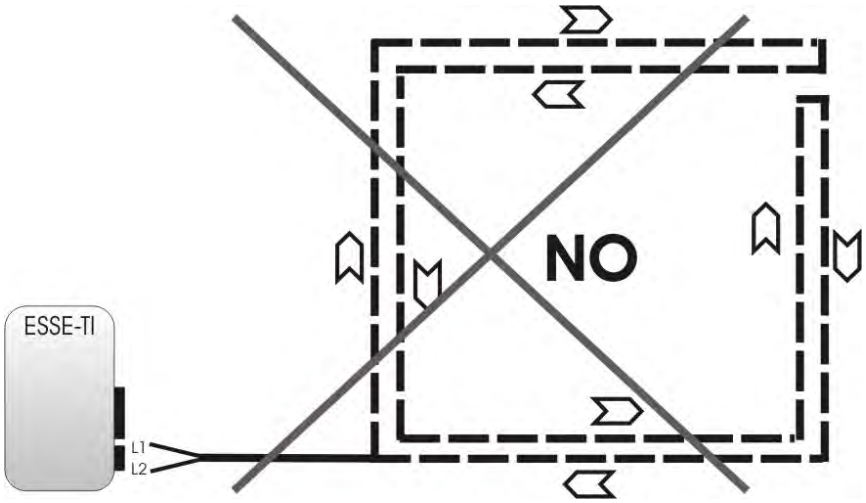


Diagram 3

Loop perimeter coverage area

The magnetic field might be screened by the surface where the loop wire is located. As a consequence, the signal picked up by the hearing aid of the disabled passenger may result weak or altered. It is highly recommended to avoid as much as possible any metal surface, whereas plastic or aluminum materials do not affect the signal quality.

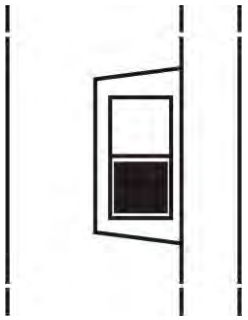
Connecting to power supply

The system must be connected to 12Vdc max. 1,5A.

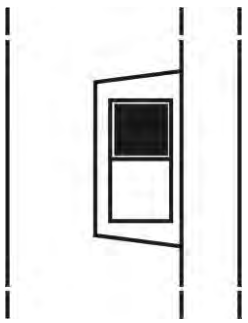
➢Connect the 12Vdc source to the **+ and -12 Vdc**

Switching on

By means of the **A** switch shown in the picture at page 9, it is possible to determine whether the induction loop is fully operating or if it is only active when the audio signal is captured:



Loop always ON



Loop ON only under audio signal

In the event of loop always-ON, it is possible to switch off the system externally by means of the **On/Off connector**:

- Connect the external switch-off contact to the **On/Off** and **-** terminals.
- Close the contact to switch off the system.

Remark: when the induction loop is on, the amplifier unit LED is lit up.

Microphone

The amplifierunit is equipped with a built-in microphone and and input for an external microphone.

The built-in microphone is active if jumper **D** shown in the picture at page 9 is properly inserted.

To activate the built-in microphone:

- Insert the jumper supplied with the unit.

To connect an external microphone:

- Wire the external microphone cable into terminals **MIC** and **–** , bewaring of the polarity.

Volumes adjustment

To regulate the transmitted signal strength:

- Turn trimmer **E** shown in the picture at page 9.

To regulate the microphones sensitivity :

- Turn trimmer **F** shown in the picture at page 9.

Signalling

The presence of the induction loop must always be indicated by the use of the sign supplied with the unit:

ETL UK (Electromatic Tele-Link Limited)
12 Station Court, Station Approach
Wickford, Essex, SS11 7AT
Tel: +44 (0) 1621 856 230 – E-mail: info@etluk.eu
Web: www.etluk.eu