DAP AUDIO

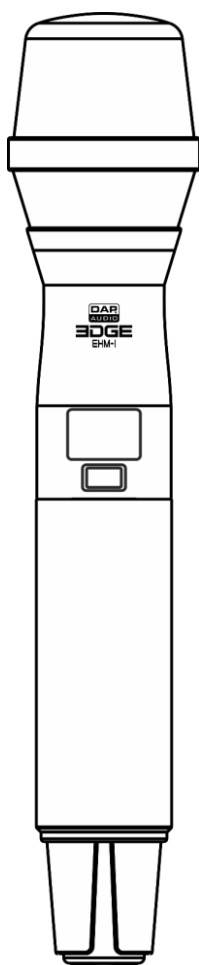**ENGLISH**

EDGE EHM-1 V2

Product code: D1477B

Preface

Thank you for purchasing this DAP product.

The purpose of this user manual is to provide instructions for the correct and safe use of this product.

Keep the user manual for future reference as it is an integral part of the product. The user manual shall be stored at an easily accessible location.

This user manual contains information concerning:

- Safety instructions
- Installation and operation of the device
- Intended and non-intended use of the device
- Maintenance procedures
- Troubleshooting
- Transport, storage and disposal of the device

Non-observance of the instructions in this user manual may result in serious injuries and damage of property.

Table of contents

1. Introduction

1.1. Before Using the Product

> **Important**
> **Read and follow the instructions in this user manual before installing, operating or servicing this product.**

The manufacturer will not accept liability for any resulting damages caused by the non-observance of this manual.

After unpacking, check the contents of the box. If any parts are missing or damaged, contact your Highlite International dealer.

Your shipment includes:

- DAP EDGE EHM-1
- User manual
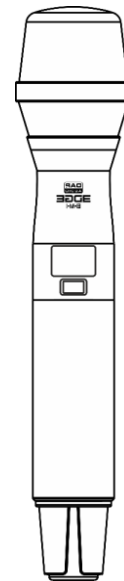
Fig. 01

1.2. Intended Use

This device is intended for use as a handheld wireless transmitter. It is suitable for indoor use.

Any other use, not mentioned under intended use, is regarded as non-intended and incorrect use.

1.3. Product Lifespan

This device is not designed for permanent operation. Turn the device off when the device is not in operation. This will reduce the wear and will improve the device's lifespan.

1.4. Text Conventions

Throughout the user manual the following text conventions are used:

- Buttons: All buttons are in bold lettering, for example "Press the **UP/DOWN** buttons"
- References: References to chapters and parts of the device are in bold lettering, for example: "Refer to **2. Safety**", "press the **power switch (03)**"
- 0–255:   Defines a range of values
- Notes: **Note:** (in bold lettering) is followed by useful information or tips

1.5. Symbols and Signal Words

Safety notes and warnings are indicated throughout the user manual by safety signs.

Always follow the instructions provided in this user manual.

⚠️	**DANGER**	Indicates an imminently hazardous situation which, if not avoided, will result in death or serious injury.
⚠️	**WARNING**	Indicates an imminently hazardous situation which, if not avoided, could result in death or serious injury.
⚠️	**CAUTION**	Indicates a potentially hazardous situation, which, if not avoided, may result in minor or moderate injury.
❗	**Attention**	Indicates important information for the correct operation and use of the product.
📖	**Important**	Read and observe the instructions in this document.
🗑️		Provides important information about the disposal of this product.

1.6. Symbols on the Information Label

This product is provided with an information label. The information label is located on the bottom plate of the device.

The information label contains the following symbols:

🗑️	This device shall not be treated as household waste.

2.   Safety

> **Important**
> **Read and follow the instructions in this user manual before installing, operating or servicing this product.**

The manufacturer will not accept liability for any resulting damages caused by the non-observance of this manual.

2.1.   Warnings and Safety Instructions

> **DANGER**
> **Danger for children**

For adult use only. The device must be installed beyond the reach of children.

● Do not leave various parts of the packaging (plastic bags, polystyrene foam, nails, etc.) within children's reach. Packaging material is a potential source of danger for children.

> **Attention**
> **General safety**

● Do not shake the device. Avoid brute force when installing or operating the device.
● If the device is exposed to extreme temperature variations (e.g. after transportation), do not switch it on immediately. Let the device reach room temperature before switching it on, otherwise it may be damaged by the formed condensation.

> **Attention**
> **This device shall be used only for the purposes it is designed for.**

This device is intended for use as a handheld wireless transmitter. Any incorrect use may lead to hazardous situations and result in injuries and material damage.

● This device is not designed for permanent operation.
● This device does not contain user-serviceable parts. Unauthorized modifications to the device will render the warranty void. Such modifications may result in injuries and material damage.

> **Attention**
> **Do not expose the device to conditions that exceed the rated IP class conditions.**

This device is IP20 rated. IP (Ingress Protection) 20 class provides protection against solid objects greater than 12 mm, such as fingers, and no protection against harmful ingress of water.

2.2. Requirements for the User

This product may be used by ordinary persons. Maintenance and installation may be carried by ordinary persons. Service shall be carried out only by instructed or skilled persons. Contact your Highlite International dealer for more information.

Instructed persons have been instructed and trained by a skilled person, or are supervised by a skilled person, for specific tasks and work activities associated with the service of this product, so that they can identify risks and take precautions to avoid them.

Skilled persons have training or experience, which enables them to recognize risks and to avoid hazards associated with the service of this product.

Ordinary persons are all persons other than instructed persons and skilled persons. Ordinary persons include not only users of the product but also any other persons that may have access to the device or who may be in the vicinity of the device.

3.   Description of the Device

The DAP EDGE EHM-1 is a handheld wireless transmitter that can be used with the EDGE receiver. It has a cardioid condenser capsule. The device is powered by 2 x AA LR6 (alkaline) batteries (not included).
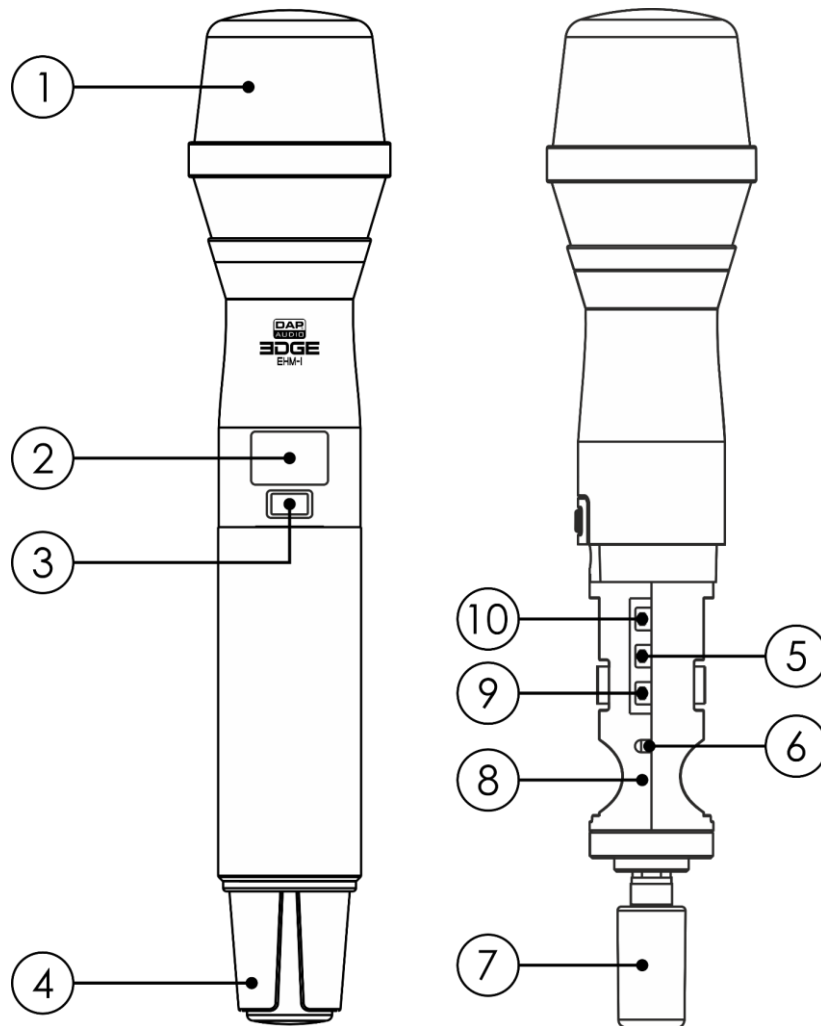
3.1.   Overview

Fig. 02

01) Microphone head
02) OLED display
03) Power button (on/off)
04) Battery cover
05) DOWN button
06) IR sensor
07) Transmitter antenna
08) Battery housing (2 x AA LR6)
09) SET button
10) UP button

3.2. Product Specifications

Model:	EDGE EHM-1

Physical:	
Dimensions:	Ø51 mm x 255 mm (WxH)
Diameter:	36 mm
Weight:	0,38 kg

Audio specifications:	
Microphone type:	Condenser
Sensitivity:	2,2 mV
Gain range:	30 dB
Polar pattern:	Cardioid
Frequency response:	60–18000 Hz
Maximum SPL:	130 dB
Frequency range:	610–670 MHz
Wireless stability:	0,0015 %
RF power:	30 mW
RF bandwidth:	60 MHz
Frequency deviation:	± 75 kHz
Spurious rejection:	≤ 50 dBC

Operation and control:	
Display:	OLED

Construction:	
Housing:	Aluminum
Color:	Black
IP rating:	IP20

Batteries:	
Batteries:	2 x AA LR6 (alkaline) 1,5 V (not included)
Average runtime:	10 h

Thermal:	
Maximum ambient temperature t_a:	40 °C
Minimum ambient temperature:	0 °C

3.3. Accessories

The device is delivered without the receiver. The receiver is available in each of the following 4 sets:

- D1475B (EDGE EHS-1, 1-channel wireless handheld system)
- D1476B (EDGE EBS-1, 1-channel wireless bodypack system)
- D1479B (EDGE EHS-2, 2-channel wireless handheld system)
- D1480B (EDGE EBS-2, 2-channel wireless bodypack system)

3.4. Dimensions

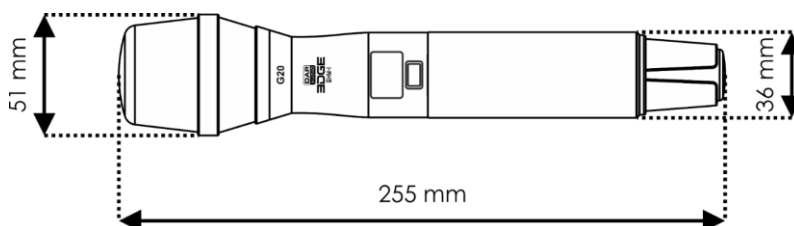**Fig. 03**

4.   Setup and Operation

4.1.   Safety Instructions for Operation

> **(!)** **Attention**
> **This device must be used only for the purposes it is designed for.**

This device is intended for use as a handheld wireless transmitter. It is suitable for indoor use. It is not suitable for households.

Any other use, not mentioned under intended use, is regarded as non-intended and incorrect use.

4.2.   Ambient Conditions

- The device can be used only indoors.
- The maximum ambient temperature t_a = 40 °C must never be exceeded.
- The relative humidity must not exceed 50 % with an ambient temperature of 40 °C.

4.3.   Setup

> **(!)** **Attention**
> **Connect all data cables before supplying power.**
> **Disconnect power supply before connecting or disconnecting data cables.**

To set up the wireless handheld system, follow the steps below:

01) Install the batteries in the device. See **4.3.1. Installation of the Batteries** on page 10.
02) Switch on the device. See **4.3.2. Switching ON/OFF** on page 10.
03) Pair the device with the receiver. See **4.3.3. Pairing** on page 10.
04) Switch on the connected mixer/amplifier.

4.3.1. Installation of the Batteries

The device is delivered without batteries. It accepts 2 x AA LR6 (alkaline) batteries.

To install the batteries:

01) Turn the **battery cover (04)** counterclockwise to remove it.
02) Insert the batteries into the **battery housing (08)** (Fig. 04). The devicer operates with 2 x AA LR6 (alkaline) batteries. The batteries are not delivered with the product.
03) Tighten the **battery cover (04)** again. Do not overtighten.

Note:

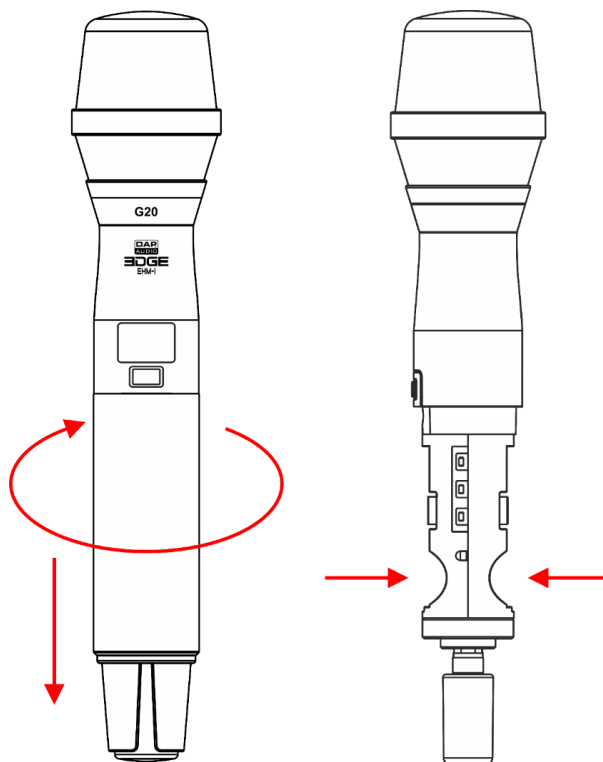Make sure that you install the batteries with correct polarity orientation.

Fig. 04

4.3.2. Switching ON/OFF

The device has a power button.

- Press and hold down the **power button (03)** for 3 seconds to switch the device on/off.
- When in the main menu, press the **power button (03)** to confirm selections and to return to the start screen.

4.3.3. Pairing

You can pair the device with the receiver.

Before pairing, scan for unused frequencies to avoid interference. Refer to the user manual of the receiver.

To automatically pair the receiver with the device, follow the steps below:

01) Turn the **battery cover (04)** counterclockwise to remove it.
02) Put the device near the receiver, so that the **IR sensor (06)** is as close as possible to the IR sensor of the receiver.
03) Pair the receiver with the device. Refer to the user manual of the receiver.
04) Tighten the **battery cover (04)** again. Do not overtighten.

To manually set the device and the receiver to the same channel and frequency, follow the steps below:

01) Select a group, channel and frequency on the receiver. Refer to the user manual of the receiver.
02) Select a group on the device. See **5.1.2.1. Group** on page 12.
03) Select a channel on the device. See **5.1.2.2. Channel** on page 13.
04) Select a frequency on the device. See **5.1.2.3. Frequency** on page 13.

5.   Operation

To operate, talk or sing into the device. The AF signal strength indicator on the receiver increases or decreases during talking/singing.

After use:

01) Mute the transmitter to prevent the occurrence of a popping sound. See **5.1.1. Mute** on page 11.
02) Switch off the receiver and the device. Refer to the user manual of the receiver and see **4.3.2. Switching ON/OFF** on page 10.

5.1.   Control Panel

A) Transmitter battery status
B) Frequency
C) Group (A–J) and channel (1–14)
D) Transmitter lock
E) Gain level

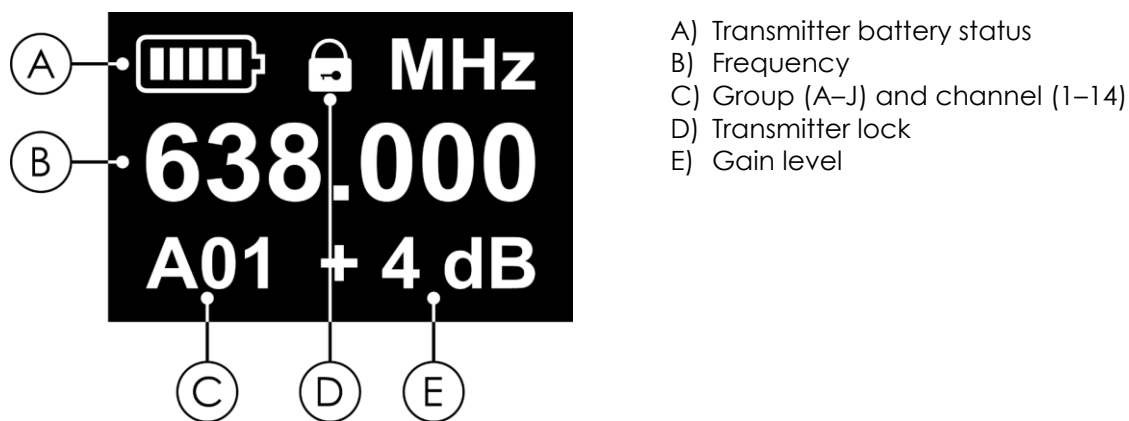**Fig. 05**

● Press the **SET button (09)** to open a menu and to confirm a selection.
● Press the **UP/DOWN buttons (10/05)** to navigate through the options or to increase/decrease values.

5.1.1.   Mute

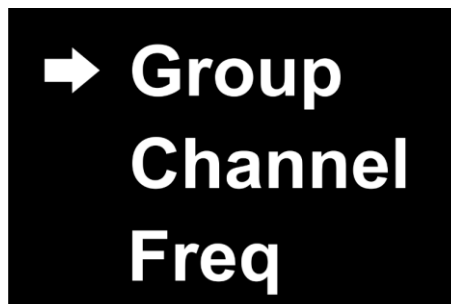During operation you can mute the device with the **power button (03)**.

● Press the **power button (03)** to mute the device.
● Press the **power button (03)** again to deactivate mute.

5.1.2. Main Menu Options

Upon start-up, the display shows the current status of the device.

01) Press the **SET button (09)** to open the main menu. The display shows:

02) Press the **UP/DOWN buttons (10/05)** to select the following 6 options:
   - GROUP   See **5.1.2.1. Group**
   - CHANNEL   See **5.1.2.2. Channel**
   - FREQ   See **5.1.2.3. Frequency**
   - GAIN   See **5.1.2.4. Gain**
   - RF POWER   See **5.1.2.5. RF Output Power**
   - LOCK   See **5.1.2.6. Lock**
03) Press the **SET button (09)** to open menus.

5.1.2.1. Group

In this menu you can select a group. Each group (A–J) has a unique set of channels with 14 fixed frequencies per channel. See **5.2. Channel and Frequency Overview** on page 15.

01) Press the **UP/DOWN buttons (10/05)** to select GROUP.
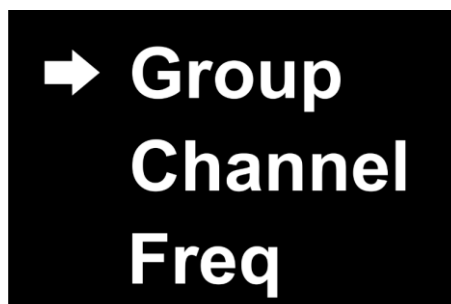
02) Press the **SET button (09)** to edit.
03) Press the **UP/DOWN buttons (10/05)** to select a group. The adjustment range is A–J.
04) Press the **SET button (09)** to confirm.

5.1.2.2. Channel

In this menu you can select a channel. Each channel (1–14) has a unique fixed frequency. See **5.2. Channel and Frequency Overview** on page 15.

01) Press the **UP/DOWN buttons (10/05)** to select CHANNEL.

Group
➡ Channel
Freq

02) Press the **SET button (09)** to edit.
03) Press the **UP/DOWN buttons (10/05)** to select a channel. The adjustment range is 1–14.
04) Press the **SET button (09)** to confirm.

5.1.2.3. Frequency

In this menu you can set the frequency. See **5.2. Channel and Frequency Overview** on page 15.

01) Press the **UP/DOWN buttons (10/05)** to select FREQ.

Group
Channel
➡ Freq
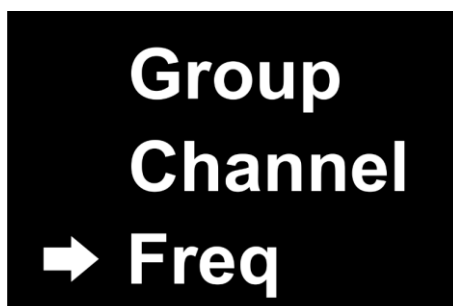
02) Press the **SET button (09)** to edit.
03) Press the **UP/DOWN buttons (10/05)** to select a frequency. The adjustment range is between 610–670 MHz.
04) Press the **SET button (09)** to confirm.

5.1.2.4. Gain

In this menu you can set the gain of the transmitter.

01) Press the **UP/DOWN buttons (10/05)** to select GAIN.
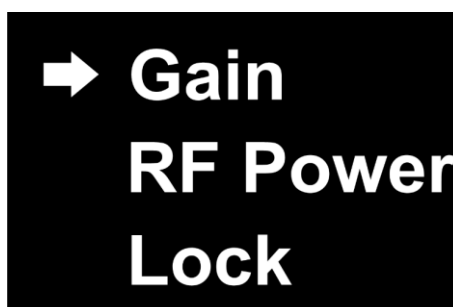
➡ Gain
RF Power
Lock

02) Press the **SET button (09)** to edit.
03) Press the **UP/DOWN buttons (10/05)** to set the desired gain. The adjustment range is from -32 dB to +4 dB.
04) Press the **SET button (09)** to confirm.

5.1.2.5. RF Output Power

In this menu you can set the RF output power.

01) Press the **UP/DOWN buttons (10/05)** to select RF POWER:

02) Press the **SET button (09)** to edit.
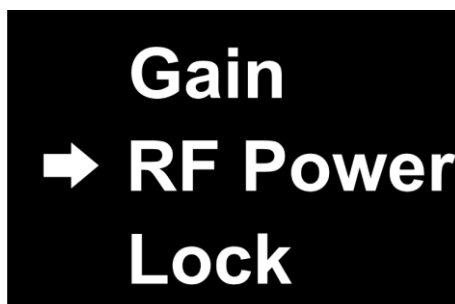03) Press the **UP/DOWN buttons (10/05)** to select one of the 3 options:
   - LOW (10 mW)
   - MID (20 mW)
   - HIGH (30 mW)
04) Press the **SET button (09)** to confirm.

Note:

The maximum allowed RF output power differs per country and region. Consult the respective national and/or regional authority as licensing or specific restrictions may apply for the use of the device. We do not take any responsibility in case the device cannot operate or cannot be used in your country/region or if it requires additional licensing. Before using the device, check the maximum allowed RF output power in your country or region.

5.1.2.6. Lock

In this menu you can lock the display of the transmitter.

01) Press the **UP/DOWN buttons (10/05)** to select LOCK.
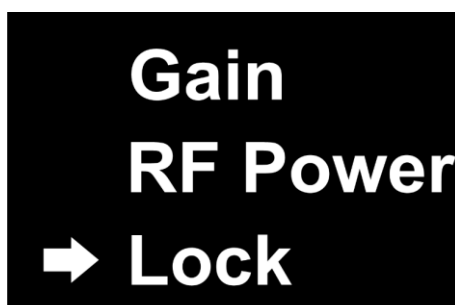
02) Press the **SET button (09)** to edit.
03) Press the **UP/DOWN buttons (10/05)** to select one of the 2 options:
   - ON: The display is locked
   - OFF: The display is unlocked
04) Press the **SET button (09)** to confirm.

Note:

To unlock the display, press and hold down the **SET button (09)** for 3 seconds, until the **transmitter lock (D)** disappears from the display.

5.2. Channel and Frequency Overview

The carrier frequency is in the range 610–670 MHz.

CH	A Frequency	CH	B Frequency	CH	C Frequency	CH	D Frequency	CH	E Frequency
1	610.000 MHz	1	610.250 MHz	1	610.500 MHz	1	610.750 MHz	1	611.000 MHz
2	612.025 MHz	2	612.275 MHz	2	612.525 MHz	2	612.775 MHz	2	613.025 MHz
3	614.250 MHz	3	614.500 MHz	3	614.750 MHz	3	615.000 MHz	3	615.250 MHz
4	616.700 MHz	4	616.950 MHz	4	617.200 MHz	4	617.450 MHz	4	617.700 MHz
5	619.375 MHz	5	619.625 MHz	5	619.875 MHz	5	620.125 MHz	5	620.375 MHz
6	622.250 MHz	6	622.500 MHz	6	622.750 MHz	6	623.000 MHz	6	623.250 MHz
7	625.325 MHz	7	625.575 MHz	7	625.825 MHz	7	626.075 MHz	7	626.325 MHz
8	629.175 MHz	8	629.425 MHz	8	629.675 MHz	8	629.925 MHz	8	630.175 MHz
9	634.925 MHz	9	635.175 MHz	9	635.425 MHz	9	635.675 MHz	9	635.925 MHz
10	638.225 MHz	10	638.475 MHz	10	638.725 MHz	10	638.975 MHz	10	639.225 MHz
11	643.150 MHz	11	643.400 MHz	11	643.650 MHz	11	643.900 MHz	11	644.150 MHz
12	649.525 MHz	12	649.775 MHz	12	650.025 MHz	12	650.275 MHz	12	650.525 MHz
13	654.850 MHz	13	655.100 MHz	13	655.350 MHz	13	655.600 MHz	13	655.850 MHz
14	665.700 MHz	14	665.950 MHz	14	666.200 MHz	14	666.450 MHz	14	666.700 MHz

CH	F Frequency	CH	G Frequency	CH	H Frequency	CH	I Frequency	CH	J Frequency
1	611.250 MHz	1	611.500 MHz	1	611.750 MHz	1	612.000 MHz	1	612.250 MHz
2	613.275 MHz	2	613.525 MHz	2	613.775 MHz	2	614.025 MHz	2	614.275 MHz
3	615.500 MHz	3	615.750 MHz	3	616.000 MHz	3	616.250 MHz	3	616.500 MHz
4	617.950 MHz	4	618.200 MHz	4	618.450 MHz	4	618.700 MHz	4	618.950 MHz
5	620.625 MHz	5	620.875 MHz	5	621.125 MHz	5	621.375 MHz	5	621.625 MHz
6	623.500 MHz	6	623.750 MHz	6	624.000 MHz	6	624.250 MHz	6	624.500 MHz
7	626.575 MHz	7	626.825 MHz	7	627.075 MHz	7	627.325 MHz	7	627.575 MHz
8	630.425 MHz	8	630.675 MHz	8	630.925 MHz	8	631.175 MHz	8	631.425 MHz
9	636.175 MHz	9	636.425 MHz	9	636.675 MHz	9	636.925 MHz	9	637.175 MHz
10	639.475 MHz	10	639.725 MHz	10	639.975 MHz	10	640.225 MHz	10	640.475 MHz
11	644.400 MHz	11	644.650 MHz	11	644.900 MHz	11	645.150 MHz	11	645.400 MHz
12	650.775 MHz	12	651.025 MHz	12	651.275 MHz	12	651.525 MHz	12	651.775 MHz
13	656.100 MHz	13	656.350 MHz	13	656.600 MHz	13	656.850 MHz	13	657.100 MHz
14	666.950 MHz	14	667.200 MHz	14	667.450 MHz	14	667.700 MHz	14	667.950 MHz

DAP AUDIO

6.   Troubleshooting

This troubleshooting guide contains solutions to problems which can be carried out by an ordinary person. The device does not contain user-serviceable parts.

Unauthorized modifications to the device will render the warranty void. Such modifications may result in injuries and material damage.

Refer servicing to instructed or skilled persons. Contact your Highlite International dealer in case the solution is not described in the table.

Problem	Probable cause(s)	Solution
The device does not function at all	No power to the device	● Make sure that the batteries are inserted correctly
	The batteries are depleted	● Change the batteries. See **4.3.1. Installation of the Batteries** on page 10
No sound	The device is switched off or does not function correctly	● Make sure that the device is switched on and the batteries are not depleted
	The device is muted	● Make sure that the device is not muted
	The volume is too low	● Turn up the volume on the receiver ● Make sure that the volume on the connected devices is turned up
	Channel selection	● Make sure that the receiver and the device are paired. See **4.3.3. Pairing** on page 10
	The device is out of range	● Move the device closer to the receiver
	Connections are defective	● Examine connections and cables. Correct defective connections. Repair or replace damaged cables
Bursts of noise or other audible signals present	Sources of interference are present	● Adjust the squelch threshold of the receiver ● Change the channel frequency ● Identify potential sources of interference (other RF-sources) and turn them off

7.   Maintenance

7.1.   Preventive Maintenance

!	**Attention** **Before use, examine the device visually for any defects.**

7.1.1.   Basic Cleaning Instructions

To clean the device, follow the steps below:

01) Switch the device off.
02) Clean the device with a soft, lint-free cloth.

!	**Attention**

● Do not immerse the device in liquid.
● Do not use alcohol or solvents.

7.2.   Corrective Maintenance

The device does not contain user-serviceable parts. Do not open the device and do not modify the device.

Refer repairs and servicing to instructed or skilled persons. Contact your Highlite International dealer for more information.

8.   Deinstallation, Transportation and Storage

● Use the original packaging to transport the device, if possible.
● Clean the device before storing. Follow the cleaning instructions in chapter **7.1.1. Basic Cleaning Instructions** on page 17.
● Store the device in the original packaging, if possible.

9. Disposal

Correct disposal of this product
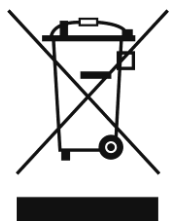
Waste Electrical and Electronic Equipment

This symbol on the product, its packaging or documents indicates that the product shall not be treated as household waste. Dispose of this product by handing it to the respective collection point for recycling of electrical and electronic equipment. This is to avoid environmental damage or personal injury due to uncontrolled waste disposal. For more detailed information about recycling of this product contact the local authorities or the authorized dealer.

10. Approval

CE

UK
CA

Hereby, Highlite International declares that the device EDGE EHM-1, product code D1477B, is in compliance with Directive 2014/53/EU (RED – Radio Equipment Directive).

The full text of the EU declaration of conformity is available at the respective product page on the website of Highlite International (www.highlite.com).

The DAP EDGE EHM-1 is a Class 2 wireless audio device (Commission Decision 2000/299/EC).

Frequency: 610–670 MHz

	BE	DK	DE	FR	HR	LV	LT	MT
	NL	AT	PL	RO	SK	ES	SE	

Exclusion of liability

The frequency ranges available for radio transmitters differ per country and region. Consult the respective national and/or regional authority as licensing or specific restrictions may apply for the use of the device. We do not take any responsibility in case the device cannot operate or cannot be used in your country/region or if it requires additional licensing. Before using the device, check the allowed frequencies in your country or region.