

# PSU-103

POWER SUPPLY UNIT



# OPERATION MANUAL





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# RISK AND SAFETY MEASURES

- Before using the power supply unit, carefully read the operation manual.
- Keep the manual in a safe place, accessible for all users.
- Use the power supply unit only for its intended purpose in accordance with this manual.
- The liquid entered into the power supply unit can cause a short circuit in the electronic components or damage the mechanical components.
- When you take the power supply unit from cool environment into a warm room, you need to keep this power supply unit at least for two hours before switching on.
- Do not open the power supply unit body by yourself. The warranty does not apply to power supply units, opened by customers by themselves.
- The fuse should be replaced by the identical only on the de-energized power supply.

# CAUTION!

- Before switching on the power supply unit, please, ensure that the power supply unit switch 110 V/220 V is switched to the position corresponding to the mains supply voltage!
- It is prohibited to open the microphone and the power supply unit! The warranty does not apply to items, opened by customers themselves.
- It is prohibited to connect or disconnect the microphone to/from the power supply if it is energized!
- It is prohibited to handle the powered power supply unit by wet hands!

# PURPOSE

- The power supply unit PSU-103 is designed for conversion of the mains voltage 220 V or 110 V into the voltage supplying capacitor microphones with lamp prime amplifier (MKL-4000 and MKL-5000).
- The electric safety of the power supply unit meets the requirements of IEC 60065-2011 for devices of I class.

# DELIVERY INCLUDES

1. Power supply unit PSU-103;
2. Three-pin power supply unit cord;
3. Packing;
4. Operation manual.

# SETUP

- In the front panel, there are the indicator lamp (1), the input connector (2), the output connector (3), on the back panel, there are the mains connector (4) and the mains switch (5).

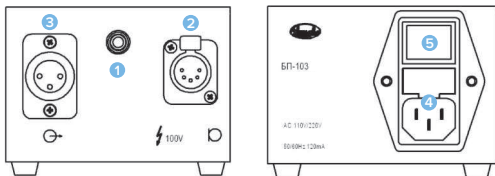


Fig. 1

- The mains voltage selector 110V/220V (6) is located on the bottom panel.



Fig. 2



## PLEASE, CONNECT THE WHOLE EQUIPMENT SET BY CABLES AND GROUND IT BEFORE SWITCHING ON THE POWER SUPPLY UNIT!

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- Plug in the power supply unit to connect it to the mains.
- Use the cable XLR-5 - XLR-6 included in the microphone set in order to connect it to the power supply unit PSU-103.
- Connect the power supply unit PSU-103 to the audio mixing console by any microphone cable XLR-3 (Fig. 3).
- Switch on the mains switch (5), the indicator lamp (1) lights up on the panel. The device is ready for operation.

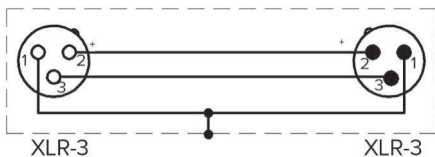


Fig. 3

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**CAUTION! IMPROPER SUPPLY CAN CAUSE DAMAGE TO THE DEVICE!**

# OPERATION

- The power supply unit should be operated indoors at the atmosphere temperature of 5 °C to 45 °C and the air relative humidity of 95% at most at the temperature of 25 °C.
- Do not subject the power supply unit to sudden shocks or impacts.
- Do not allow water to enter the power supply unit.
- Do not use or store the power supply unit in rooms containing acidic or other aggressive impurities in the air.
- Store the power supply unit in a dry, clean and dust-free room at room temperature, using the packing included in the package.

# TECHNICAL DATA

## OUTPUT VOLTAGE

- The anode voltage is  $(100\pm 5)$  V at the ripple ratio of 0.01% at most.
- The filament voltage is  $(6\pm 0.25)$  V at the ripple ratio of 0.01% at most.

## LOAD CURRENT

3 mA for anode supply and 0.4 A for filament supply.

## RATED INPUT

The rated input is 10 W at most, the input current does not exceed 50 mA.

## INSTABILITY FACTOR

The voltage regulation at supply voltage variation within 187-242 V or within 93-121 V at 50 Hz AC does not exceed: 8% for anode, 5% for filament.

## DIMENSIONS

116 x 216 x 84 mm.

# TROUBLE AND COUNTERMEASURE

Condition	Causes	Corrective action
The power supply does not work	The power supply unit is not connected to the	Check the connection to the mains.
	The mixing console or the power supply unit is not turned on.	Check the corresponding buttons of the power supply unit.
	The switch 110V/220V is in the position which does not correspond to the mains voltage.	Check that the switch 6 is in the correct position (Fig. 8).

# MANUFACTURER WARRANTY

- The manufacturer guarantees compliance of the microphone technical characteristics, if the user observes the conditions and rules of operation and storage specified in this manual.
- The warranty — 24 months from the date of sale.
- The manufacturer guarantees a free replacement or repair of a microphone during the warranty period, if it does not comply with the requirements of this manual through the manufacturer's fault.
- No claim for a microphone will be accepted without certificate of sale.
- Please, dispose of the microphone at the local collection point for recyclable materials or at the recycling center after the end of its service life.

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Tula, Kaminsky str., 24  
E-mail: [service@oktavatula.ru](mailto:service@oktavatula.ru)  
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## WARRANTY CARD

For warranty service (repair) No. 1

Power supply unit PSU-103

No.

---

product serial number

---

date of receipt for repair

---

full name of a person responsible for repairs

---

L.S. signature

## WARRANTY CARD

For warranty service (repair) No. 2

Power supply unit PSU-103

No.

---

product serial number

---

date of receipt for repair

---

full name of a person responsible for repairs

---

L.S. signature

# WARRANTY CARD

For warranty service (repair) No. 1

Power supply unit PSU-103

No.

\_\_\_\_\_

product serial numbe

\_\_\_\_\_

date of receipt for repair

\_\_\_\_\_

reason for repair

\_\_\_\_\_

seller

L.S. \_\_\_\_\_

signature of seller



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information on performed repairs

L.S.  
of repair organization

---

signature, printed name

---

---

---

address of owner

---

full name and signature of owner





# WARRANTY CARD

For warranty service (repair) No. 2

Power supply unit PSU-103

No.

\_\_\_\_\_

product serial numbe

\_\_\_\_\_

date of receipt for repair

\_\_\_\_\_

reason for repair

\_\_\_\_\_

seller

\_\_\_\_\_

L.S. signature of seller



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information on performed repairs

L.S.  
of repair organization

---

signature, printed name

---

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---

address of owner

---

full name and signature of owner



## ACCEPTANCE CERTIFICATE

\_\_\_\_\_  
unit type

\_\_\_\_\_  
serial number

**Manufactured and approved**

**Chief controller**

\_\_\_\_\_  
personal signature

\_\_\_\_\_  
printed name

L.S.

\_\_\_\_\_  
year, month, day

## CERTIFICATE OF SALE

\_\_\_\_\_  
unit type

\_\_\_\_\_  
serial number

\_\_\_\_\_  
dealer

\_\_\_\_\_  
signature of seller

\_\_\_\_\_  
printed name

L.S.

\_\_\_\_\_  
year, month, day

## THE GUARANTEE CONDITIONS ARE ACKNOWLEDGED AND ACCEPTED

\_\_\_\_\_  
signature of buyer

\_\_\_\_\_  
printed name



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