Electronic sprayer kit P&S-T45-MXX NEBx01 IHM

MICRONICE TECHNOLOGY

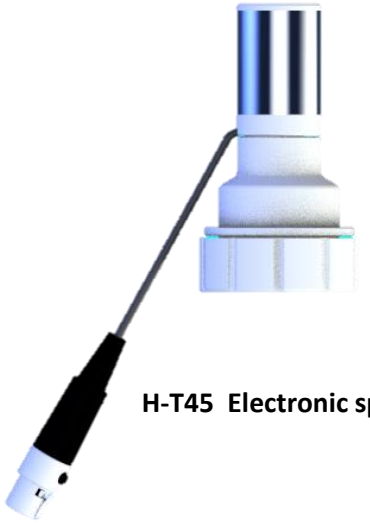
P&S-T45

Plug&Spray Integrated tank

Nebulization kit

P&S-T45 *Thank you for trusting Tekceleo and buying this Electronic sprayer system.*
Please follow the instructions below before using the Kit Plug&Spray-T45-MXX NEBx01 IHM

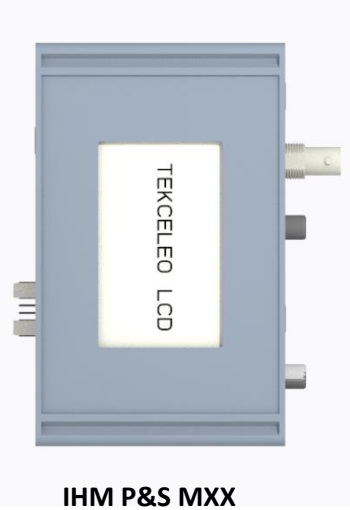
Electronic sprayer kit P&S-T45-MXX NEBx01 IHM Content



H-T45 Electronic sprayer

ECU NEBx01 MXX with Casing

Tripod



IHM P&S MXX

12V Power Supply

BNC Cable

1x DC-DC Cable

protective cap

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Electronic Control Unit Characteristics

Characteristics	Values
Supply voltage **Current consumption/sprayer**	12VDC 90 mA < I < 160 mA
Nebulization On	Blue Led On
Nebulization Off	Blue Led Off
Time response	Time response < 1.5 ms
Cable length **Any cable length change made by the client will impact the ECU operation**	60 cm If you need a different cable length, please contact us
Dimensions in mm (LxWxH)	120x66,5x32,5 mm

Reference liquid :
Functioning validated with *Saline solution NaCl 0,9%*
For any other liquid performances may vary.

Water nebulization tips :
If you need to nebulize water , please use *Saline solution NaCl 0,9%* to guarantee performance and avoid clogging the electronic sprayer.
Avoid the use of tap water ,distilled water, demineralized water or deionized water.

Electronic sprayer Characteristics

Electronic sprayer	Values
Spray head 04 Microns **H-T45-M04**	Flow rate : 1,2 ml/min +/- 0,2 ml/min Drop diameter : 4 µm +/- 1 µm
Spray head 08 Microns **H-T45-M08**	Flow rate : 2 ml/min +/- 0,3 ml/min Drop diameter : 8 µm +/- 2 µm
Spray head 12 Microns **H-T45-M12 and HG-T45-M12**	Flow rate : 3,5 ml/min +/- 0,5 ml/min Drop diameter : 12 µm +/- 3 µm
Spray head 40 Microns **HG-T45-M40**	Flow rate : 40 ml/min +/- 2 ml/min Drop diameter : 40 µm +/- 3 µm

Ambient conditions:
Functioning: -20°C to 80°C
Storage and transportation: -20°C to +80°C

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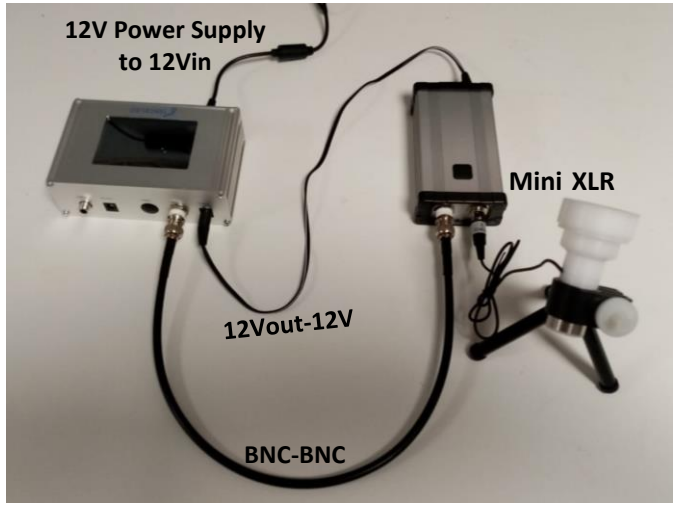
Instructions to set up the P&S T45

Instructions:

1. Unscrew the cap located on the nebulizer's integrated tank
2. Fill in the integrated tank with the liquid you want to nebulize
3. Screw the cap and make sure it is hermetically sealed
4. Make sure the maximum tilt for the aerosol head is 45°

➢ For the electronic assembly please make sur to plug the 12V adapter to the 12Vin of the IHM P&S MXX at the very end :

1. Connect the IHM P&S MXX to the ECU NEBx01 (BNC-BNC-12Vout-12V)
2. Connect the H-T45 electronic sprayer to the ECU NEBx01 via the mini XLR connector
3. Connect the IHM P&S MXX to the power supply (12V adapter-12Vin) and then follow the instructions on the IHM P&S MXX : Quick Start Guide



Note:

➢ If you need to change HIM interface to adapt to your application, do not hesitate to contact us.

➢ If necessary , see page 5 for instructions on how to control the ECU via the BNC connector without the Control Box.

➢ A drop may appear on the membrane when the nebulization stops and the tank is not completely empty. In that case, you just need to dry it carefully.

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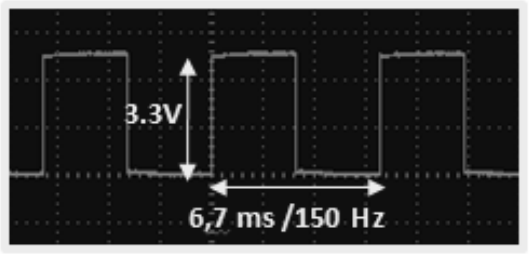
ON/OFF and Flow Rate Control via BNC Connector

N.B: The default State of BNC connector is always at 3.3V / the functions below are insured when the 12VDC power supply is connected

On/Off + Flow Rate Control (PWM) :

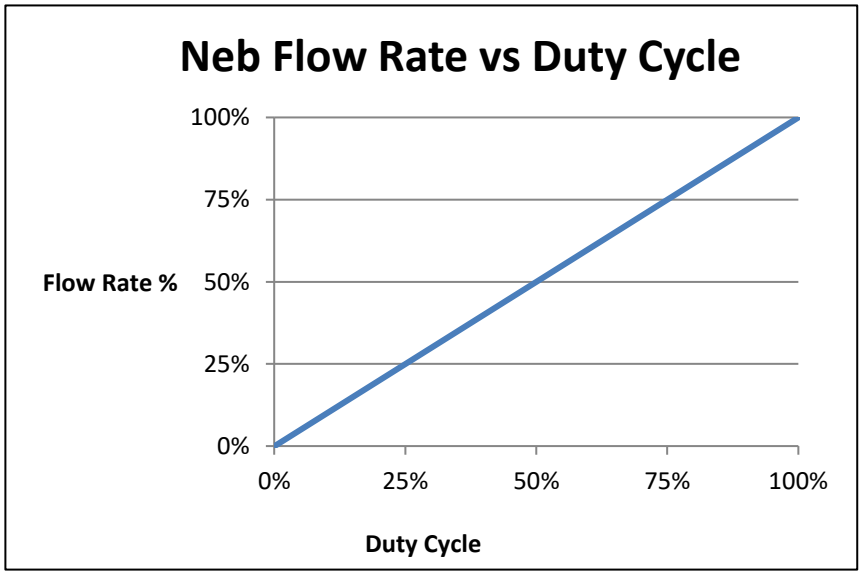
- The default State of BNC connector is at 3.3V.
- By Default without input from BNC: electronic sprayer is ON.
- 100% Duty Cycle : electronic sprayer ON (Frequency: 150 Hz).
- 0% Duty Cycle : electronic sprayer OFF (Frequency: 150 Hz).
- From 0% to 100% Duty Cycle: Linear Electronic sprayer Flow Rate Variation.



150Hz/3.3V PWM signal

Function	TTL on BNC	Comments
Electronic sprayer ON/OFF Flow Rate Control	0=OFF 3.3V = ON (default state)	Any voltage > 3.3V on BNC connector could damage ECU Maximum Duty Cycle : 100% Minimum Flow Rate : 0%

BNC Connector



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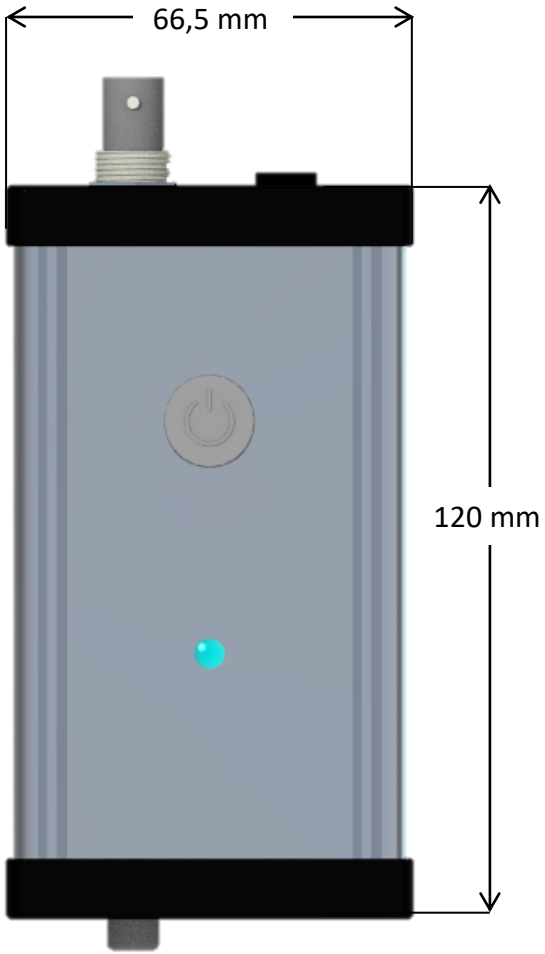
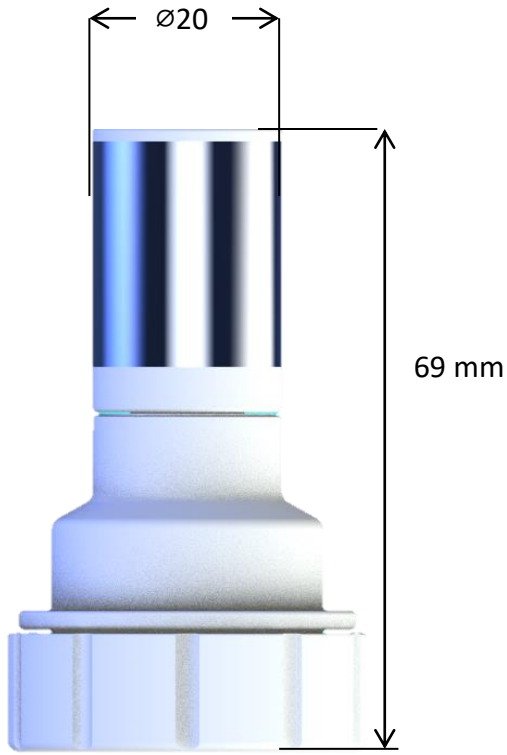
ECU NEBx01 MXX and Electronic sprayer Dimensions

Step Files available upon request





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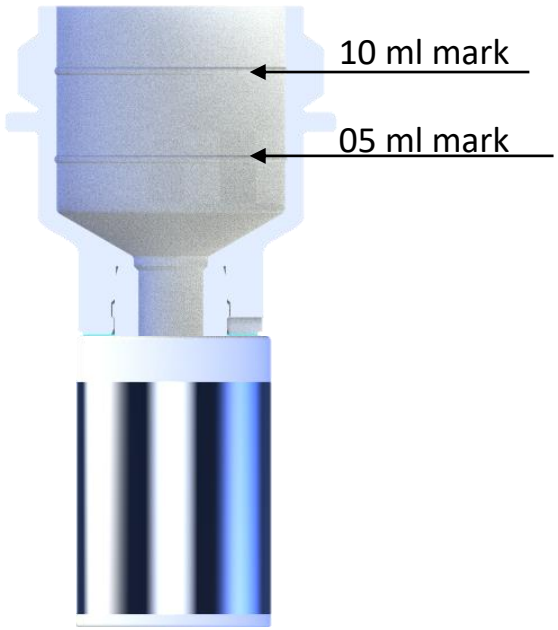
Integrated tank specifications

Please make sure not to fille more than 10ml of liquid in the tank . This might lead to dripping



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Maintenance and cleaning of the electronic sprayer

- After each use, purge the electronic sprayer from initially used liquid and nebulize a saline solution NaCl 0,9% for 1 minute.

- If the electronic sprayer is completely clogged, nebulize saline solution NaCl 0,9% mixed with white vinegar during a short period of time (about 1 min).

    - Ratio of saline solution NaCl 0,9% to vinegar= 100:1

Please make sure not to clean the membrane manually.
If there is any problem with the flow rate, please follow the cleaning guide above.

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