



# LHDM500 Series Universal Ultrasonic Generator Homogenizer

With standard tools head,

Price - €

Download  
Catalogue



Central microcomputer centralized control  
It adopts 7 inch TFT touch screen display  
Ultrasonic power step with 1% continuous adjustable  
With pulse and continuous operation, and with test function Ultrasonic time, gap time, and total time can be accurate...

Treat the cell suspension with a certain amount of ultrasonic wave to make the cells violently oscillate and rupture. This method is more suitable for microbial materials. Escherichia coli is used to prepare various enzymes. The concentration of 50-100 mg bacteria/ml is often used, and the frequency is higher than 15-20 KHz. Ultrasound can break cells under high-intensity input.

Its fracture mechanism: may be related to shock waves and shear forces caused by cavitation. The efficiency of sonication is related to factors such as audio, sound energy, processing time, cell concentration and the first type.

Features: simple operation, good repeatability, saving time; mostly used for microbial and tissue cell disruption.

There are problems: sensitive to ultrasound and nucleic acids should be used with caution. Cavitation is the direct cause of cell destruction and produces reactive oxygen species, so some sulfhydryl protecting agents are added.

Cabinet to protect the environment from ultra sound.

LHDM500 Series include types of instruments 500/501/502/503



**20-25 KHz Ultrasound frequency**



**Standard transducer with 6mm probe**

Optional probe 2,3,10,12,15 mm



**Homogenization volume 0,5-600ml**



**LCD touch screen display**



**Digital control 0.1-99.9%**

Check the table

Model	LHDM500	LHDM501	LHDM502	LHDM503
Frequency	20-25 KHz	20-25 KHz	20-25 KHz	20-25 KHz
Display	LCD			
Adjustable Power range	150 W (5%-99%)	650 W (5%-99%)	900 W (1%-99%)	900 W (1%-99%)
Standard Tip (Φ)	6 mm	6 mm	6 mm	6 mm
Optional Tip (Φ)	3 mm	3 mm	2、3、10、12、15 mm	2,3,10,12,15 mm
Processing Volume	10-100 ml	10-200 ml	0.5-500 ml	0.5-600 ml
Duty Ratio	1-99 %	1-99 %	1-99%	0.1-99.9%
Temperature Alarm	No	No	No	0.1-99°C (Prevent sample overheating)
Alarm	Time overload	Time, overload	Time, overload	Time, temperature, overload
Power Supply	220/110V 50Hz/60Hz	220/110V 50Hz/60Hz	220/110V 50Hz/60Hz	220/110V 50Hz/60Hz
The size of Power Supply Chassis	430*255*300 (mm)	430*255*300 (mm)	430*255*300 (mm)	430*255*300 (mm)
The weight(The host and transducer)	9.3 Kg	9.8 Kg	14 Kg	14.2 Kg
The size of Sound Abating trap	345*340*570mm	345*340*570mm	345*340*570mm	345*340*570mm

Please note

If this Homogenizer does not match the specific needs of your application, or some options are not listed for sale, please feel free to contact us. Our manufacturing engineers will come up with technical solutions to meet your needs. We reserve the right to change technical specifications at any time.

**COLO LabExperts** 

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