

## Biohit Mechanical Stepper

The Biohit Mechanical Stepper is an easy to use positive displacement dispenser which allows rapid multi-dispensing of pre-set volumes up to 48 times in succession without refilling.

The unit comes complete with an adapter for 25 ml and 50 ml tips.

### Features include:

- Easy single handed operation
- Lightweight (105 g) yet robust construction
- Maintenance-free design
- Compatible with a wide range of dispenser tips
- Ideal for dispensing aqueous and viscous liquids
- Dispensing volumes from 1 µl to 5000 µl (min. volume with Biohit Dispenser Tips is 2 µl)
- Its ergonomic design and positioning of the dosage button in the upper part of the device allow single-handed volume selection, loading and dispensing.
- Choose quickly and effectively according to the requirements of your applications between the highest precision or maximum repetitions of your desired dosage volume.
- 48 dispensing steps at intervals of 1 second without the need to refill thus saving 90 % of the working time required by the usual pipetting technique
- Tested according to ISO 8655-1



### Biohit Mechanical Stepper and Biohit Dispenser Tip system Performance specifications

Tip volume (ml)	Dosage volume					Imprecision (%)	Inaccuracy (%)
	1	2	3	4	5		
Adjustment on dispenser							
Number of steps	48	23	15	11	8		
0.10	2 µl	4 µl	6 µl	8 µl	10 µl	< 1.6 %	< ± 3.0 %
0.20	4 µl	8 µl	12 µl	16 µl	20 µl	< 1.3 %	< ± 2.0 %
0.50	10 µl	20 µl	30 µl	40 µl	50 µl	< 0.5 %	< ± 0.8 %
1.00	20 µl	40 µl	60 µl	80 µl	100 µl	< 0.9 %	< ± 0.9 %
2.50	50 µl	100 µl	150 µl	200 µl	250 µl	< 0.4 %	< ± 0.8 %
5.00	100 µl	200 µl	300 µl	400 µl	500 µl	< 0.3 %	< ± 0.4 %
10.00	200 µl	400 µl	600 µl	800 µl	1000 µl	< 0.5 %	< ± 0.6 %
25.00	500 µl	1000 µl	1500 µl	2000 µl	2500 µl	< 0.3 %	< ± 0.2 %
50.00	1000 µl	2000 µl	3000 µl	4000 µl	5000 µl	< 0.2 %	< ± 0.2 %

The data for tips 0.5 and 2.5 ml are based on a measurement carried out with a 100 µl pipette tip. The performance specifications apply to the Biohit Mechanical Stepper and Biohit Dispenser Tips (non-sterile) System.

### Ordering Details

Cat. No.	Description
725700	Biohit Mechanical Stepper including adapter for 25 ml and 50 ml syringe tips



## Biohit Dispenser Tips

### Features:

- Function according to positive displacement principle
- Contamination free dispensing – no aerosols are formed
- Made of virgin polypropylene (tip) and polyethylene (plunger)
- 9 different tip sizes from 0.1 to 50 ml
- DNase, RNase, ATP and Pyrogen (Endotoxin) free
- Pre-sterilized tips are individually wrapped
- Suitable for use together with eLINE Pro and Lite Dispensers and Biohit Mechanical Stepper, as well as most other mechanical steppers (Ripette (Ritter), HandyStep (Brand), Minilab 100/101 (HTL), EasyStep)



### Biohit Dispenser Tip package Ordering details

Volume (ml)	Package	Qty/Unit	Cat. No.
Starter Kit	Includes 20 * 0.5 ml 20 * 1.0 ml 20 * 2.5 ml 20 * 5.0 ml 20 * 10.0 ml	100	792038
0.1	Non sterile Pre-sterilized	100 100	792017 792026
0.2	Non sterile Pre-sterilized	100 100	792018 792027
0.5	Non sterile Pre-sterilized	100 100	792019 792028
1.0	Non sterile Pre-sterilized	100 100	792020 792029
2.5	Non sterile Pre-sterilized	100 100	792021 792030
5.0	Non sterile Pre-sterilized	100 100	792022 792031
10.0	Non sterile Pre-sterilized	100 100	792023 792032
25.0*	Non sterile Pre-sterilised	25*	792024 792033
50.0*	Non sterile Pre-sterilised	25*	792025 792034
Adapter for 25 and 50 ml tips, 3 pcs./unit			792036

\*Includes 1 adapter/unit

### eLINE Pro and Lite Dispenser and Biohit Dispenser Tip system Performance specifications

Tip volume (ml)	Volume min/max (µl)	Increment (µl)	Step size max (µl)	Test volume (µl)	Inacc. (%)	Impr. (%)	Number of dispensings min/max
0.1	1/100	0.2	100	10 100	1.00 % 1.00 %	2.00 % 0.50 %	1/100
0.2	2/200	0.4	200	20 200	1.70 % 1.00 %	2.50 % 0.50 %	1/100
0.5	5/500	1	500	50 500	1.00 % 0.80 %	3.00 % 0.60 %	1/100
1.0	10/1000	2	1000	100 1000	0.50 % 0.50 %	0.60 % 0.20 %	1/100
2.5	25/2500	5	2500	250 2500	0.60 % 0.60 %	0.40 % 0.20 %	1/100
5.0	50/5000	10	5000	500 5000	0.60 % 0.60 %	0.50 % 0.15 %	1/100
10.0	100/10 000	20	10 000	1000 10000	0.40 % 0.40 %	1.00 % 0.20 %	1/100
25.0	500/25 000	50	25 000	2500 25000	0.50 % 0.50 %	0.50 % 0.15 %	1/50
50.0	1000/50 000	100	50 000	5000 50000	0.30 % 0.30 %	0.70 % 0.15 %	1/50

The performance specifications apply to the eLINE Dispenser and Biohit Dispenser Tip System. Due to Biohit's continuous R&D, specifications may change without prior notice.

