

## Specifications

	RatLog64	MouseLog16B		MouseLog16C	SpikeLog64	RatLog128
		Spike mode	LFP mode			
Introduction	2015	2015		End of 2018	2018	2019
Configuration	Modular	Single board		Single board	Single board	Modular
Orientation options	Vertical, horizontal or flexibly wired	MouseLog16B: Horizontal MouseLog16V: Vertical	Horizontal	Horizontal	Vertical	Vertical, horizontal or flexibly wired
Neural inputs	16,32,64	16	8	16	64	16-128
Sampling rate, kHz, each channel	32kHz	31.25kHz	4kHz	31.25kHz	32kHz	32kHz
Resolution, bits	16	12-16	16	12	16	16
Input range	± 5mV	± 6mV		± 6mV	± 5mV	± 5mV
Noise rms	2.4μV	2.2μV	1.5μV	2.2μV	2.4μV	2.4μV
Analog bandwidth, high limit	30Hz to 10kHz	7kHz	400Hz	7kHz	30Hz to 10kHz	30Hz to 10kHz
Analog bandwidth, low limit	0.2-500Hz	1Hz, 10Hz, 60Hz or 300Hz		1Hz, 10Hz, 60Hz or 300Hz	0.2-500Hz	0.2-500Hz
Electrical stimulus channels	6 with optional module	none		none	none	none
Number of possible reference channels	According to headstage 8-35 per headstage	7+Ground		6+Ground	14+Ground	According to headstage 8-35 per headstage
9-Axis motion sensor	Yes	none		yes	yes	yes
Audio recording, sampling rate	Optional, 32kHz	none		50, 100, 200kHz	50, 100, 200kHz	Optional
Standard data memory capacity	64GB	64GB		64 GB	64GB	128GB
Memory limit of recording time	64-channel: 4.5 hours 32-channel 9 hours	18 hours	11 days	18 hours	4.5 hours	128 channel: 4.5 hours 32 channel: 18 hours
Recording time with 3g battery	64-channel: 2 hours 32-channel 3.3 hours	4 Hours	16 Hours	3g: 4 hours 1.3g: 100 mintues	2 hours	128 channel: 3 Hours with 5g battery
Wired data streaming option. To be introduced in 2018	32-channels (Some headstages only)	16 channels	8 channels	16 channels	32 channels	64 channels
Board size, mm	15 x 22	17 x 24		13 x 18	20 x 29	18 x 24
Board mass, incl. memory card	Processor: 1.92g	Horizontal: 1.9g ; Vertical 2.25g		1.58g	4.0g	Processor: 2.6g
Headstage size, mm	13 x 13, standard wired 15 x 27, standard stacked	None		none	none	13 x 13, standard wired 15 x 27, standard stacked
Headstage mass	1.-2g typical	None				1-2g typical
Connector	According to headstage Standard: Omnetics A79025. Also Molex, Mill-max, Hirose	Omnetics A79043 or low profile Molex 54102-0204		Omnetics A79043	Two Omnetics A79025	According to headstage Standard: Omnetics A79025