



MONARK LC6



High-precision testing and seamless connectivity.

The Monark LC6 is a professional ergometer with an easily calibrated electronic pendulum system (EPS), designed for research, testing, and education. It supports full external system integration via BLE, ANT+, USB-B, and RS232.

KEY FEATURES

- **EPS** - Electronic pendulum system
- **Monark Novo Duo display** - Monochrome touchscreen for clear and quick reading of data.
- **Wireless Connections** - Supports BLE (FTMS), ANT+ (FE-C) for seamless device pairing
- **Wired connections** - Includes USB-B (3 m) and RS232 ports for stable data transfer
- **Perfect fit frame** - Vastly increases adjustability to fit every unique user.
- **Power modes** - RPM-independent (constant power) & RPM-dependent (constant force)
- **Continuous workload range** - 5-1400 Watt (at 200 rpm) with (8-2800 W) as a option
- **Easy to calibrate and control**
- **Designed for external control**

Max User Weight 180 kg

Monark Test Software

Medical Device Class IIa

Pendulum System



Specifications

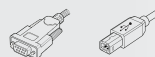
MONARK LC6

CERTIFICATIONS	
EU directive 93/42/EU class IIa	
FRAME	
Type	Sport, perfect fit
Handlebar	Racing handlebars
Seatpost	Monark standard, H/V adjustable
Saddle	Racing Unicus, black
BB	68/110 mm
Crank	Steel, 172.5 mm
Pedals	9/16", Combi SPD
RESISTANCE	
System	Electronic pendulum system
Calibration	Electronic (Novo Duo) and mechanical (Pendulum with 4 kg calibrated weight)
Flywheel	20 kg (44.1 lbs)
DISPLAY	
Monark Novo Duo Display Monochrome Touchscreen	
RPM	Yes
HR	Yes, ANT+
Time	Yes, HH:MM:SS
Speed	Yes, km/h
Distance	Yes, km
Watt / KP	Yes
CONNECTIVITY	
Wired	RS232 and USB-B (max 3 m)
Wireless	BLE (FTMS), ANT+ (FE-C)
WEIGHT & DIMENSIONS	
Max user weight	180 kg (397 lbs)
Recommended user height	>150cm (>59 in)
Length	1405 - 1630 mm (55-64 in)
Width	640 mm (Max 25 in)
Height	1240 mm at saddle, 1265 mm at display, (49-50 in)
Weight	77 kg (170 lbs)
POWER REQUIREMENTS	
220V (12V, 5.0A)	



ECG

CPET/ECG integration (analog/digital signals)



CONNECTION

Wired: RS232 and USB-B (3 m)
Wireless: BLE (FTMS), ANT+ (FE-C)



SOFTWARE

SOFTWARE COMPATIBILITY

External control for elite sport and research. Monark Test Software + third-party sim/ERG/resistance, CPET/ECG, and standalone capable.



HEART

HEART RATE MONITORING

Displays heart rate when connected via chest belt (ANT+)



TEST

TEST FUNCTIONALITY

For aerobic testing and advanced diagnostics in performance and research



CONSTANT POWER

Maintains a fixed power output regardless of cadence (RPM)



CONSTANT FORCE

Maintains a fixed resistance (kp) regardless of cadence (RPM)

ISO 9001

Monark Exercise AB has been ISO 9001 certified since 1992. The model is:

- Approved under CE Certificate No. 15 36 01 (MDD IIa)
- Anti-corrosion treated and powder coated
- Made in Sweden



Description

MONARK LC6

APPLICATIONS

Monark LC6 is designed for advanced performance testing and academic research. High accuracy, easy calibration, and full external control support elite-level protocols and integrations.

LC6 is ideal for:

- **Elite cycling teams and performance coaches** – For precise performance testing and structured training.
- **Sports science researchers** – For controlled power output studies and physiological measurements.
- **Endurance athletes** – For reliable watt-based testing and long-duration assessments.
- **Universities and academic labs** – For applied research using cycle ergometry and external data systems.

SOFTWARE & INTEGRATION

The LC6 supports a wide range of connection modes for seamless integration with training and testing platforms

It supports:

- **Wired** – USB-B (3 m), RS232
- **Wireless** – BLE (FTMS), ANT+ (FE-C)
- **Heart rate** – Displays heart rate when connected via chest belt (ANT+)
- **Simulation Mode** – Resistance is adjusted based on virtual terrain and gear settings from platforms like Zwift.
- **ERG Mode** – Application controls the target watt output for structured workout sessions.
- **Resistance Mode** – Set a specific resistance level (0–7 kp) from an external app.
- **Manual Mode** – No external control, but apps can still receive live data (cadence, power and speed).

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Description

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MEASUREMENT ACCURACY

The Monark pendulum system is built for long-term accuracy and reliability. When calibrated regularly, the system consistently delivers power measurements with an error margin typically below 2%.

Thanks to its mechanical construction, calibration can be performed quickly and easily without the need for external tools or advanced software. This allows users to verify and ensure accuracy as often as needed, even daily – which is critical in research, rehabilitation, and performance testing.

Unlike many electronic systems that rely solely on internal sensors and estimated values, the Monark pendulum offers a direct, physical indication of the applied resistance. This makes it uniquely dependable in environments where trust in the workload is essential.

PRODUCTION AND SUSTAINABILITY

Monark has been manufacturing ergometers since 1954 with a philosophy of delivering precise, reliable, and durable products for research, rehabilitation, and performance development.

LC6 is assembled in Sweden, with the majority of its components sourced from Swedish manufacturers.

Our products are used daily by professionals in research, physiotherapy, and sports worldwide. Through continuous product development and close collaboration with experts, we have built a strong reputation for measurement accuracy and ergonomics.

Monark LC6 – A precision ergometer for advanced testing and system integration.



Monark Exercise AB

Monark has over 100 years of experience in bicycle production. This long tradition has resulted in deep know-how, hands-on expertise, and a genuine understanding of product quality and performance. Since the early 1900s, Monark cycles have represented precision, reliability, durability, and quality.

Today, we are a trusted global provider of high-precision cycle ergometers for research, sports science, clinical use and performance testing.

We develop, manufacture, and market ergometers and exercise bikes. Our largest customer groups are within health care, sports medicine, and exercise physiology.

For more information: www.monarksportsmed.com



PRODUCTS FOR LIFE AND PERFORMANCE



MONARK EXERCISE

Version: 2026

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