



Technical Information

LMX 56

2025



**Open the way,
Outride your friends,
Boost your performance
with electric power.**





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ULTRA

BIKE



EXPLORER

BIKE



5

1 SPEED BIKE, TWO WORLDS, 100% CONFIGURABLE.

Based on the same chassis and motorization, the LMX 56 adapts to your desires and needs thanks to its multiple equipment options. It's up to you to create the version that suits you!



WHAT MAKES THE LMX 56 UNIQUE...



Both bicycle and motorcycle

2 modes: pedal-assist + throttle mode



45 km/h

Maximum speed
(using the motor)



2500 W

Motor power
(peak)



1000 Wh

Battery capacity
Removable block



Mobile App

Navigation and
customization



DUAL TRANSMISSION

Thanks to a dual freewheel system, the LMX 56 features two independent transmissions.

ADVANTAGES

- Complete independence between “bike” & “motorcycle” modes.
- Greatly reduced wear & risk of breakage for the pedaling chain.

Proven and patented technology since 2017.



Chain on the pedaling side



Belt on the motor side

BETWEEN A BIKE AND A MOTORCYCLE

The LMX 56 allows you to pedal with motor assistance, just like a regular electric bike. However, a second independent riding mode lets you truly enjoy the experience. The throttle on the handlebars provides real motorcycle sensations!

This unique system lets you push your limits during your rides and reach speeds of up to 45 km/h to overcome any obstacles.



Pedal assistance



Throttle on the handlebars



HOMOLOGATION

The LMX 56 is available in a road-approved version with a 45 km/h top speed (category L1e-B). It is therefore allowed to be ridden on public roads in France and Europe, thanks to its dedicated equipment.

Equipment of the LMX 56 street legal version

- Front and rear lights
- Rearview mirror
- Horn
- Kickstand
- License plate holder / Luggage rack
- Reflectors

Advantages of the street legal version

- Ability to take out insurance
- Government grant of €250
- Permission to ride on public roads up to 45 km/h (commuting, cycling to work)





High-performance motor

Designed and Assembled by LMX Bikes

Up to 45 km/h of speed

Peak power of **2500 W**

Nominal power of 2000 W

Up to **171 N.m** of maximum torque at the wheel

Central motor block, brushless type

Air cooling system

Standard ISIS cranks

Only one connector to disconnect for motor block removal

Torque sensor and controller integrated into the block

Optimized sealing with lip seals on all interfaces

Enhanced battery capacity

Designed and Assembled by LMX Bikes

1008 Wh battery to accompany you on all your outings

Assistive range : 40 to 100 km

Range **without pedaling : 25 to 35 km**

Removable for easy and fast charging and replacement

CAN bus communication, temperature sensors for optimal lifespan

50.4V, 20Ah design

Full recharge in 4 hours

External 4A charger with 230V

500 charge-discharge cycles up to 80% of the initial capacity





Aluminum chassis welded in France

LMX Bikes Design and Assembly

Cutting, bending, machining, welding, heat treatment, etc.

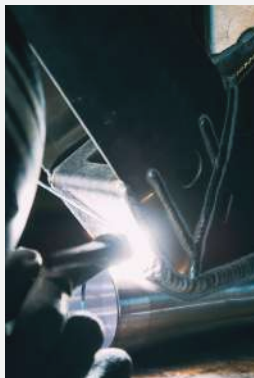
Frame/Rear triangle/ Swingarm : **6061-T6 aluminum**
(aerospace quality)

Total frame weight: 5.5 kg

Wheelbase: 1245 mm (size M) / 1305 mm (size L)

Head angle: 64°

Integrated, tool-free removable battery





A 100% configurable speed bike



Fork (choice of model)

Formula Selva S

160mm travel, 35mm diameter, Air technology

Fox Racing Shox 38 Float Factory Kashima

170mm travel, 38mm diameter, Boost 15x110mm, 29", Air technology

Adjustments: pressure, compression, rebound and lockout



Shocks (choice of model)

Formula Mod

160mm travel

Fox DHX Factory

160mm travel, 210x50mm

Adjustments: Compression, rebound, preload
2 eccentric seat adjustments
Progressive suspension



Brakes

Formula Cura 4-e

Front 203mm / Rear 203mm

Discs 2.3 mm

4 pistons front / 4 pistons rear



A 100% configurable speed bike



Peripherals (choice of package)

Standard Pack

SRAM NX derailleur

Tranzx AL7075 150mm dropper seatpost

Premium Pack

SRAM AXS GX Eagle derailleur

Rockshox Reverb AXS dropper seatpost



Smart LED

Assistance mode management through LED color.

4 available modes: Neutral, Eco, Mid, High



Wheels Front/Rear

Front: Mach1 rim 30 mm x 29"

Rear: Mach1 rim 35 mm x 27.5"

Boost 157mm, reinforced freewheel

Hub: Dual transmission (LMX patent)

Tires Front/Rear (choice of model)

Front: Schwalbe 29" x 2.6"

Rear: Schwalbe 27.5" x 2.8"

Johnny Watts (mixed) OR

Eddy Current (all-terrain - Tube Type) OR

Eddy Current (all-terrain - Tubeless)



A 100% configurable speed bike



Saddle (choice of model)

Italia Origine (standard) OR
Italia Ultimate (comfort)



Pedals (choice of model)

Plastic (standard) OR
LOOK Trail Fusion Black (comfort)

Frame Colors (choice of model)

Copper Green OR Oyster White

Homologation (choice of version)

Street legal version (allowed on public roads up to 45 km/h, category L1e-B)

Non street legal version (for circuits, closed or private terrains only)



Accessories (choice of model)

External charging adapter

Quad Lock phone holder

20L panniers

Additional battery

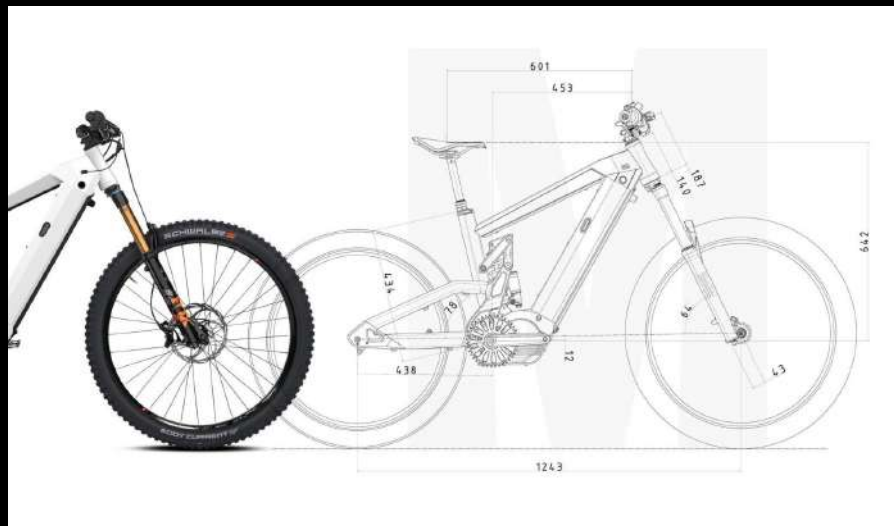
Black mudguards (included in street legal version)

Display (included in the street legal version)



SIZE GUIDE

We recommend size M for riders under 180 cm and size L for riders over 180 cm.





NAVIE APP

Dashboard - Access all your riding data in real time: actual speed, battery level, distance traveled, etc.

Motor Tuning - Customize your 3 motor assist modes: power level, speed, torque, whether or not the throttle is active, and more.

Route Planner - Discover new routes and share your best rides with your friends.

A system that adapts to you - The app adjusts based on your personal data (weight, height, gender), your configuration preferences, the selected mode, and driving conditions.

Updates - Enjoy new features and download system updates offered by LMX over the months.





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A black and white photograph of a mountain biker wearing a white helmet and dark jacket, riding through a shallow stream. The bike is splashing water, and the rider is looking towards the camera. The background shows a rocky, hilly landscape.

**MORE
THAN
A BIKE**