





ONE SOURCE ONLY The holistic E-Mobility concept.

BROSE⁵ 5 motors, 2 installation sizes. The most forward-

thinking and quietest mid-drive motor on the market.

MODULARITY

Numerous possible combinations for specifications. Maximum coverage of target groups.

100% FOCUS Concentrating on what is most important.

CONTENT

An E-Bike is more than just the sum of its parts	P. 3
Everything from a single source	P. 4 - 5
Your benefit	P. 6
Brose motor	P. 7 - 8
System components	P. 9
Linkage battery: frames/models/technology	P. 10 - 17
Attachment e-Bike Solution	P. 19 - 21
Service	P. 22
E-Mobility articles from our program	P. 23 - 58
Notes	P. 59 - 62
Contact	P. 63

AN E-BIKE IS MORE THAN JUST THE SUM OF ITS PARTS



Hardly any other product has introduced as much dynamism to the bicycle market as the e-bike has. Once again, the e-bike is the driver of the bicycle industry's growth and innovation. The expectations of the previous season were thus again exceeded. In Germany alone, 980,000 units sold in 2018 increased the estimated volume by 36 %. Medium-term expectations are set 30 %; however, in the long run e-bikes could make up a share of up to 35 % of the complete bicycle market.

Join the profitable and booming game of the e-bike market – do not wait any longer but start now and with us!

Premium E-Mobility Solutions at Messingschlager is a holistic concept with numerous possible variations and combinations – a concept of components that are perfectly in tune with one another. This system combines two frame & battery concepts with four frame designs each.

E-bikes with an inspiring design and a new understanding of the term 'premium' – clearly defined through its true holistic nature – that stand out from the market. At Messingschlager, we believe that only an integrated all-in approach can keep the promise of delivering premium goods. Such an approach is clearly reflected in our strategic premium E-Mobility Solutions strategy.

Do you want to be part of the successful e-bike market? The speed at which you enter the market is a central key for success. However, developing competitive products involves effort, many snares and great obstacles, let alone high costs. Hence, our approach guarantees maximum efficiency with the lowest possible effort. Our concept provides a very fast and straightforward market

entry – "the time to market" is a short six months.

Our approach guarantees highest standards when it comes to testing, homologation, compliance with statutory requirements, electromagnetic compatibility and standards such as DIN and EN as well as machinery directives. OEMs can create their own first-class e-bike portfolio requiring very little effort and at the same time supply their customers – and themselves – with safety and fun.

Your Team Messingschlager





BUILD YOUR OWN E-BIKE

EVERYTHING FROM A SINGLE SOURCE



FIVE FRAME OPTIONS



BROSE-DRIVE







BROSE DISPLAYS







ONE SOURCE ONLY The holistic E-Mobility concept.

With Messingschlager's premium E-Mobility Solutions you will receive everything from one single source. We will quickly provide you with very competitive products – guaranteeing success in the booming e-bike market. And with our concept, you can simply delete the following complex development steps from your "to-do-list":

- Market analysis
- Research & development
- Sourcing
- Testing & homologation



BROSE⁵

5 motors, 2 installation sizes. The most forwardthinking and quietest mid-drive motor on the market.

Brose's e-bike drive operates almost noiselessly and free of vibration. Highresolution sensors and intelligent drive control provide for a harmonious and at the same time powerful pedal assistance.

- Five motors and two installation sizes a compact design that saves space
- Reliable: As a mechatronics specialist, Brose stands for the very highest quality standards in the automotive sector
- High performance: The maximum torque is at a high 90 Nm
- Straightforward: An easy way to implement an alternative drive system

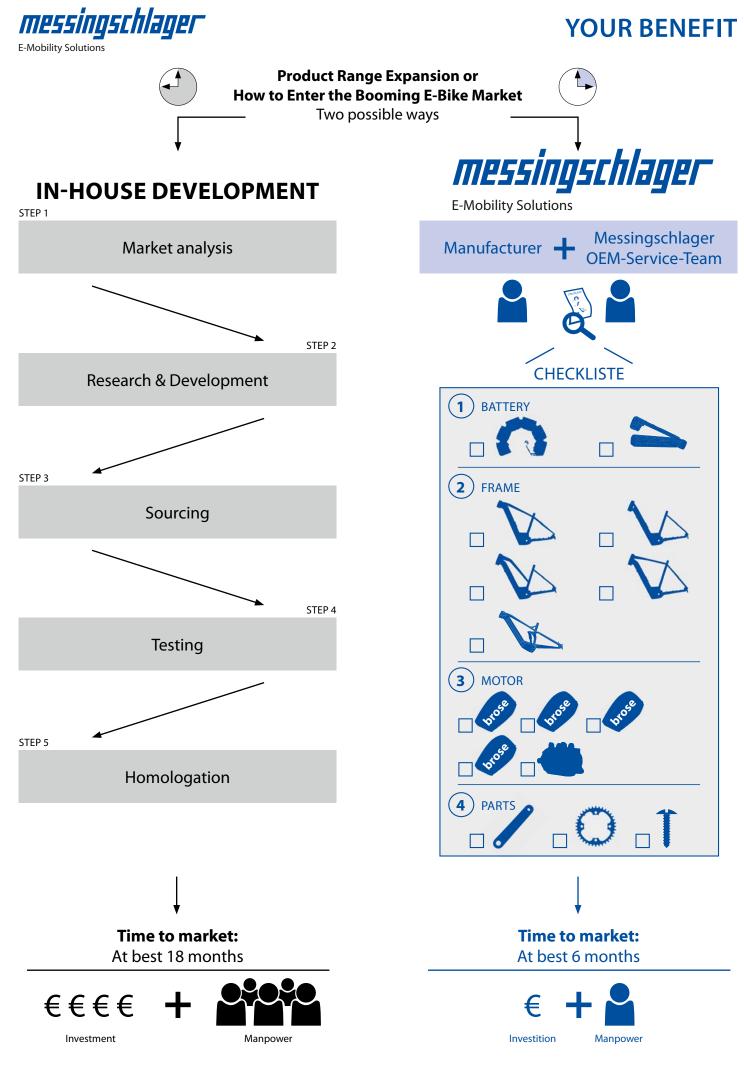


E-BIKE

Our frame- and battery concepts combined with different frame designs.

Our universal designs allow us to deliver the perfect frame for almost any application.

- Frame version 1: Frame with fully integrated Linkage link battery
- Frame variant 2: Full suspension frame with Brose Octagon battery
- Two battery types: Linkage battery, Brose Octagon battery
- Five frame types: MTB, Full Suspension, City Wave, Trekking Women and Trekking Men



BROSE MOTOR



Brose Drive Systems - Natural Bike Pleasure in a Nutshell:

Advantages of the Mid-Drive Motor

The mid-drive motor is situated directly at the bottom bracket and the force is transferred there directly to the chain. The constructional design of e-bikes with mid-drive motors causes a low center of gravity, so all models feature well balanced, stable and at the same time maneuverable qualities. Furthermore, mid-drive motors allow disassembly of front wheels and rear wheels in case of a puncture just as easy as it would be with conventional bicycles. A great advantage, not only for transporting your bike.

Natural Bike Pleasure - Quietest Motor

Brose's motor – driven by carbon belts and fully decoupled by a freewheel – is a true "Made in Germany" product that is manufactured in Brose's own motor factory in Berlin. Without assistance it runs just like an ordinary bicycle. Beyond that it works virtually noiseless. Thus riding, immediately feels all natural and somehow like cycling with a tail wind. The particularly harmonic and smooth assistance is guaranteed by the constant evaluation of data from the sensors measuring torque, cadence and speed.

Small and Lightweight Design

The compact design of Brose's mid-drive motor integrates perfectly into the frame – be it technically or optically – which preserves the tried and tested frame geometry and usual rideability of conventional bicycles. Integrating the system into the bicycle makes for a significant weight advantage as well as a reinforcing stiffing effect. Thanks to a very space-saving design, Brose's motor paves the way for e-bike designs of the next generation – and consequently five highly modern frame designs from our side.

Powerful and Reliable

Brose's drive system is based on a steering engine for passenger cars that has been produced over a million times in line with the highest quality standards of the automotive sector. Over the last few years, Brose further developed and consistently perfected this extremely reliable motor for the use with high quality e-bikes. Thanks to best power-to-weight ratio, this motor ensures powerful support and assistance. Its maximum torque is at a high 90 Nm. At most, the drive can contribute up to 180 % of the pedaling power brought in.



BROSE MOTOR







Drive C

The Drive C is the perfect companion for the city.

It provides just the right amount of additional power to flow in the hectic city traffic.

This drive, designed for comfort and range, makes it much easier to get to work or to the next meeting.

Drive T

The Drive for Trekking

The Drive T is a real "long-distance runner". Be it extensive tours or a short cruise through town – the Drive T is the perfect all-rounder. This highly efficient drive is ideal for daily e-bike needs and long ranges.

Drive TF

The Version for S-Pedelecs

The Drive TF was developed for e-bikers that rely on speed. It is based on the Drive T motor and assists cyclists up to a speed of 45 kilometers per hour. Especially long-distance commuters get their money's worth with this drive system.

Please note:

Statutory requirements must comply when operating an s-pedelec. Please contact us, we will be happy to advise you!

Drive S

The Sporty One

The Drive S is the "athlete" of the family. With higher cadences, our high-performance drive features 15 % more torque than the Drive T and an even more sensitive response behavior. This makes the Drive S particularly suitable for sporty tours and for e-mountain bikers who ride on demanding trails.

Drive S Mag (vertical)

500 grams lighter, 15 % smaller and still as strong as the Drive S. With these and many other features the Brose Drive S Mag scores. Developed for maximum performance, with low weight and small design, this engine with magnesium housing is the Primus in its class.





SYSTEM COMPONENTS





DISPLAY

The e-bike can be switched on and off with the control unit. With the help of both keys and joystick, one can activate and control the motor assistance or switch on the lights. The display of the control unit shows the current travel speed, assistance level, light function and charge level of the battery. Furthermore, the ergonomically perfect display indicates the total kilometers and the maximum speed of the total distance.

- Display for assistance level and charge level
- Colored display (Brose Allround-Display, Brose Central-Display)
- Ergonomic operation
- Weather resistance (IP protection class 65)
- · Choice between controller, side display and center display



LINKAGE BATTERY

The linkage battery is a patented link battery that is suitable for the use with Brose's Drive T, Drive S and Drive TF motors. The battery management system was specially tailored to Brose's motor and enables a motor setup that is individually harmonized and specific for the e-bike type in question.

- Fully integrated and revolutionary Linkage link battery
- · Patented concept that allows for specially solid frame constructions
- Extra clean and unobtrusive designs are possible
- Energy content: approx. 504 Wh, voltage: 36 V, capacity: 14 Ah
- With RoPD® (Rosenberger Power Data Connector)
- · Cutting-edge lithium-ion technology with extremely high energy density

OCTAGON BATTERY

The Octagon battery is the first battery developed by Brose. This was specially developed for the Mag engines. It is inserted from below into the down tube and, thanks to a patented holding mechanism, is securely fastened even in the event of strong vibrations. Nevertheless, it can be very easily clicked out of the frame and clicked in again.

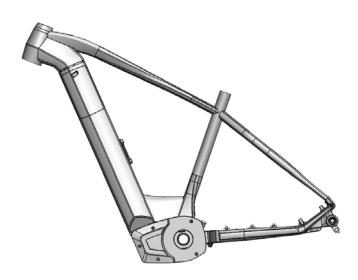
- Integrated down tube battery
- Almost completely invisible optics
- Only 3.8 kg
- Stable aluminum housing
- Energy content: 630 Wh, voltage: 36 V, capacity: 17 Ah





FRAME TYPE: LINKAGE BATTERY

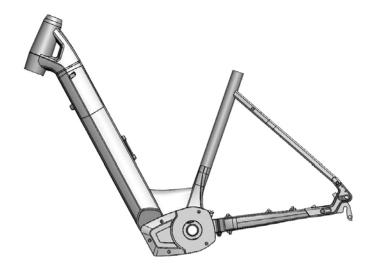
E-Mobility Solutions



Frame Type MTB

The MTB frame together with the linkage battery is characterized by extremely high rigidity. At first sight, one would never think of bicycle to be an e-bike, considering the consistently integrated components and their perfect application. The geometry - designed for sportive performance - allows pure trail riding fun. The focus during development was on perfect road performance. Therefore, we have chosen a geometry focused on the cyclist, which means battery and motor are placed at the best possible center of gravity. Furthermore, the full integration ensures safety: The battery is perfectly protected.

- MTB 27.5"+
- For use of forks with 120 mm travel (mounting height: 531 mm)
- Boost standard
- Installation dimension rear axle: 148 x 12 (Shimano)
- · Fixing points for mudguard and rear carrier
- Integrated stand boss
- (KSA18 standard, 18 mm hole spacing)
- Tire clearance: 27.5 x 2.8 650B (90-584)



Frame Type City-Wave

The Wave frame combines comfort and safe road characteristics. The linkage battery is obtrusively integrated into the frame and can be removed from the side conveniently. The battery's full integration emphasizes the high quality and sporty urban design of the Wave frame type and provides - as it does with all other frame types as well – for the normal bicycle look. The large-volume aluminum construction of the frame generates very high stiffness values in connection with the link battery. Since the frame can be used for derailleur or hub gears, there is the greatest possible diversity of variants here.

- For use of forks with 65 mm travel (mounting height: 460 mm)
- Multifunctional, exchangeable and moveable drop-outs
- · For derailleur systems or gear hubs
- Prepared for use of gear belts (Hub gears with 46 t - 22 t require 122 t belts)
- Fixing points for wider frame locks with spacing of 90 mm
- Integrated stand boss (KSA18 standard, 18 mm hole spacing)
- Tire clearance: 28 x 2.35 (60-622) or 27.5 x 2.8 (80-584)

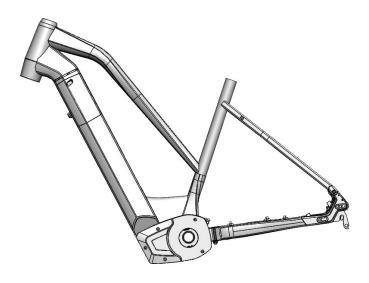
FRAME TYPE: LINKAGE BATTERY



Frame Type Trekking W

The trekking frame for women scores with its dynamic design and the wide range of possible applications. The complete integration of the linkage battery and the sporty lines are an eye-catcher. The striking top tube, whose swing underlines the whole dynamics of the wheel, is particularly successful. The large-volume head tube ensures particularly high road stability and sets new standards for load changes. The almost infinite combination possibilities in the specifications make the Mixte frame a very versatile touring bicycle of the extra class.

- For use of forks with 65 mm travel (mounting height: 460 mm)
- Multifunctional, exchangeable and moveable drop-outs
- For derailleur systems or gear hubs
- Prepared for use of gear belts (Hub gears with 46 t – 22 t require 122 t belts)
- Fixing points for wider frame locks with spacing of 90 mm
- Integrated stand boss
- (KSA18 standard, 18 mm hole spacing)
- Tire clearance: 28 x 2.35 (60-622) or 27.5 x 2.8 (70-584)



Frame Type Trekking M

The well thought-out frame construction gives the trekking frame for men its outstanding running smoothness and the high feeling of safety, which is particularly appreciated on long tours and downhill runs. A total of four frame sizes ensure broad user coverage. The simple integration of the motor and the battery as well as the internal cable routing are the result of a holistic development approach that has also been consistently implemented in this everyday and touring bicycle for touring demands.

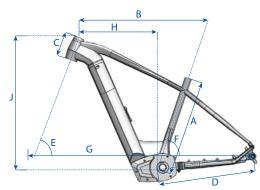
- For use of forks with 65 mm travel
- (mounting height: 460 mm)
- Multifunctional, exchangeable and moveable drop-outs
- For derailleur systems or gear hubs
- Prepared for use of gear belts
- (Hub gears with 46 t 22 t require 122 t belts)
- Fixing points for wider frame locks with spacing of 90 mm
- Integrated stand boss (KSA18 standard, 18 mm hole spacing)
- Tire clearance: 28 x 2.35 (60-622) or 27.5 x 2.8 (70-584)





LINKAGE BATTERY MODEL MTB





	MTB (27.5"+)	16" (42 cm)	18" (46 cm)	20" (50 cm)
Α	Seat Tube Length	420	460	500
	Top Tube Length	552	566	583
В	Top Tube horizontal	594	615	639
С	Head Tube	110	120	130
D	Chain Stays	453	453	453
Е	Head Tube Angle	69°	69°	69°
F	Seat Tube Angle	73°	73°	73°
G	Wheelsbase	1126	1148	1173
Н	Reach	400	418	439
J	Stack	636	646	655
	BB-Offset	56	56	56
	Fork Length	531	531	531



The special construction allows the use of wide tires with a short rear triangle.



A stand boss is integrated for touring cyclists.

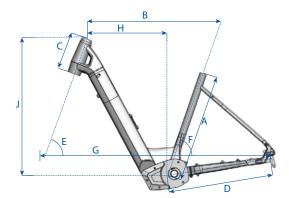


The battery can be removed from the frame in just a few simple steps.

LINKAGE BATTERY MODEL CITY-WAVE







	CITY-WAVE (28")	45 cm	50 cm	55 cm
А	Seat Tube Length	450	500	550
	Top Tube Length	-	-	-
В	Top Tube horizontal	616	616	630
С	Head Tube	180	180	180
D	Chain Stays	470	470	470
Е	Head Tube Angle	69°	69°	69°
F	Seat Tube Angle	73°	73°	73°
G	Wheelsbase	1154	1154	1169
Н	Reach	418	418	433
J	Stack	647	647	647
	BB-Offset	67	67	67
	Fork Length	460	460	460



The cables are laid inside the down tube for clear and clean optics.



An external supply allows for fast charging without battery removal.

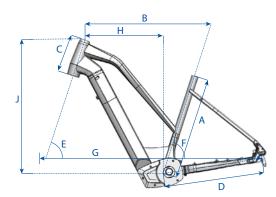


Movable drop-outs tighten the chain perfectly.



LINKAGE BATTERY MODEL TREKKING W





	TREKKING W (28")	45 cm	50 cm	55 cm
А	Seat Tube Length	450	500	550
	Top Tube Length	580	580	585
В	Top Tube horizontal	610	612	613
С	Head Tube	170	175	180
D	Chain Stays	470	470	470
Е	Head Tube Angle	71°	71°	71°
F	Seat Tube Angle	72°	74°	74°
G	Wheelsbase	1136	1138	1140
Н	Reach	425	425	425
J	Stack	647	651	656
	BB-Offset	65	65	65
	Fork Length	460	460	460



The rear cable outlet complements the clean look.



A timeless design combined with cutting-edge technology.

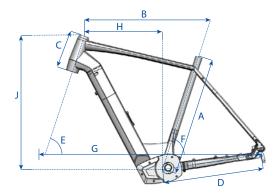


The special profile of the top tube supports an additional rigidity.

LINKAGE BATTERY MODEL TREKKING M







	TREKKING M (28")	45 cm	50 cm	55 cm	60 cm
А	Seat Tube Length	450	500	550	600
	Top Tube Length	565	562	564	583
В	Top Tube horizontal	612	612	613	629
С	Head Tube	175	175	180	200
D	Chain Stays	470	470	470	470
Е	Head Tube Angle	71°	71°	71°	71°
F	Seat Tube Angle	72°	74°	74°	74°
G	Wheelsbase	1138	1138	1140	1156
Н	Reach	425	425	425	435
J	Stack	651	651	656	675
	BB-Offset	65	65	65	65
	Fork Length	460	460	460	460



Solid motor housing for optimum protection of the engine.



Clear lines for a timeless design.



The rear triangle allows mounting of a belt drive.



FRAME

- Frame with raw finish
- For Brose motors with design of Generation 1 (Drive T, Drive S, Drive TF)
- For fully integrated Linkage batteries
- External charging connection (battery can be charged also when still mounted)
- Including all mounting parts and lock
- "Disc only" for use of disc brakes only, PM 160 mm
- For semi-integrated head set, tapered 1 1/8" to 1.5" (ZS 44, 28.6/ZS56/40)
- For seat stays with 31.6 mm
- Internal cables, also for lowerable seat posts with inside cables
- All city bicycle frames and trekking bicycle frames have one identical rear triangle.
- All frames with at least one position for bottle cage

City-Wave, Trekking M & W

- For use of forks with 65 mm travel (mounting height: 460 mm)
- Multifunctional, exchangeable and moveable drop-outs
- For derailleur systems or gear hubs
- Prepared for use of gear belts
- Details of belt drive: (with Shimano hub: 46 T 22 T, belt length 122 T)
- Fixing points for wider frame locks with spacing of 90 mm
- Integrated stand boss (KSA18 standard, 18 mm hole spacing)
- Tire clearance: 28 x 2.35 (60-622) or 27.5 x 2.8 (70-584)
- -----

City-Wave

613600 4	5 cm
-----------------	------

- **613601** 50 cm
- **613602** 55 cm

Trekking W

- **613603** 45 cm
- 613604 50 cm
- **613605** 55 cm

Trekking M

613660	45 cm
613606	50 cm

613607 55 cm

613608 60 cm









Mountainbike

- For use of forks with 120 mm travel (mounting height: 531 mm)
- Boost standard
- Installation dimension rear axle: 148 x 12 (Shimano)
- Fixing points for mudguard and rear carrier
- Integrated stand boss (KSA18 standard, 18 mm hole spacing)
- Tire clearance: 27.5 x 2.8, 650B (70 x 584)
- -----

613620 42 cm (16")

- **613621** 46 cm (18")
- 613622 50 cm (20")

MOVABLE DROP-OUTS

613609	 Exchangeable, movable aluminum drop-out for frames of city bicycles and trekking bicycles with Linkage battery Drive side, with hanger for derailleurs 	
613610	 Exchangeable, movable aluminum drop-out for frames of city bicycles and trekking bicycles with Linkage battery Drive side for gear hub 	
613614	 Exchangeable, movable aluminum drop-out for frames of city bicycles and trekking bicycles with Linkage battery Non-drive side, with brake adapter, PM 160 	

BATTERY

613200	 Patented Linkage battery, Capacity: 504 Wh, (10S4P, 18650 cells, 3.5 Ah) 36 V, 14 Ah 	
	 Battery management system specially tailored to Brose With RoPD[®] (Rosenberger Power Data Connector) Suitable for use with the following motors: Brose Drive T, Drive S and Drive TF Length: 479 mm, weight: 3.0 kg 	
613093	 Cable harness "motor battery" Specifically for the use with frames with Linkage battery and Brose motor, including RoPD[®] charge port with external wake-up line 	

BATTERY CHARGER

613230	 Travel charger, 2 A , RoPD[®] (Rosenberger Power Data Connector), 220 V
	• Weight: 0.72 kg
	 Dimensions: W 220 x H 140 x D 55 mm
	Charge time: 7 hrs

- 613231 Fast charger, 4 A RoPD[®] (Rosenberger Power Data Connector), 220 V
 - Weight: 0.95 kg
 - Dimensions: W 225 x H 140 x D 60 mm
 - Charge time: 3.5 hrs



 \cap





COMING SOON: MTB-FULLY WITH 630 WH OCTAGON BATTERY

- With Brose S Mag engine
- Aluminum frame
- 29"+ 27.5"
- 140 mm travel
- four-link rear
- Boost Standard
- Suitable for trail / all-mountain
- Bottle holder assembly possible
- Mounting of luggage carrier and mudguards possible (SUV concept)
- Expected availability: Spring 2020





BROSE ALU-MOTORS (MADE IN GERMANY)

- Weight: 3,400 g
- 36 V system
- 250 W continuous nominal output
- 90 Nm torque
- Tightness as defined in IP protection class 56
- Gear ratio: 1:27
- Light Output 6V

613015 Drive C

- Target Group: City, Trekking, 25 km/h
- Software optimized for efficiency and comfort
- Maximum support: 280 %
- 50 Nm of torque
- Pushing aid up to 6 km/h

613011 Drive T

- Target group: Trekking bikes, MTBs for moderate tours, 25 km/h
- Software optimized for efficiency
- Performance level 86 %
- Maximum assistance 320 %
- Pushing aid up to 6 km/h

613012 Drive TF

- Target group: Speed pedelecs, 45 km/h
- Software optimized for use on s-pedelecs
- Performance level 85 %
- Maximum assistance 380 %
- Pushing aid up to 18 km/h
- Please note: Speed pedelecs have to be operated with a special license that requires special consideration of numerous points!

613010 Drive S

- Target group: E-MTBs, 25 km/h
- Software optimized for sportive performance
- Performance level 100 %
- Maximum assistance 380 %
- Pushing aid up to 6 km/h

BROSE MAGNESIUM-MOTORS (MADE IN GERMANY)

613017 Drive SMag

- Weight: 2,900 g
- Target group: E-MTB, 25 km / h
- Magnesium housing
- Maximum support: 410 %

CONSAX MOTOR COVER (MADE IN GERMANY)

- Made of strong quality plastic
- Accurate fit
- Size and position of Brose's logo depend on position of motor
- Customizable by additional and indented stickers or labels
- Colour RAL 9005 black (individual colours for orders of at least 500 pieces)
- Including screws for mounting at Brose motor interface
- suitable for art. 613010,1,2,5





19





E-Mobility Solutions

613400	Design cover right-hand side (including screws)	
613401	Design cover left-hand side (including screws)	
613402	Brose logo button, black (individual colours for orders of at least 250 pieces), with 3M adhesive foil	bross
DISPLA	Y	

IJF LAT

613054 **Comfort-Display**

- Marguardt Comfort
- Display for assistance level and charge level
- Auto lights
- Integrated dot matrix display
- Excellent readability in sunlight
- Adaptive display lighting
- Display for system status
- Joystick control
- Ergonomic operation
- Tightness as defined in IP protection class 65
- FEATURES
- On/Off
- Light
- Assistance level
- Charge level
- Speed
- Error display •
- Software updates by USB
- Auto lights

613056 **Brose Allround-Display**

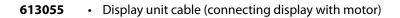
- · Display of assistance levels and state of charge
- TFT display
- Automatic driving light
- Bluetooth

613058 **Brose Remote-Controller**

- Display of assistance levels and state of charge
- LED display
- Automatic driving light
- Optional Central Display connectivity

Brose Central-Display 613060

- Display for center mounting in front of the stem
- Is operated via remote
- 85 x 60 x 30 mm











GEARSENSOR

- **613085** Recommended for use of gear hub combined with Brose's mid-drive motors.
 - Upon gear change, a signal is triggered that reduces the motor's torque for a short while and thus enables an effortless and smooth gear change.

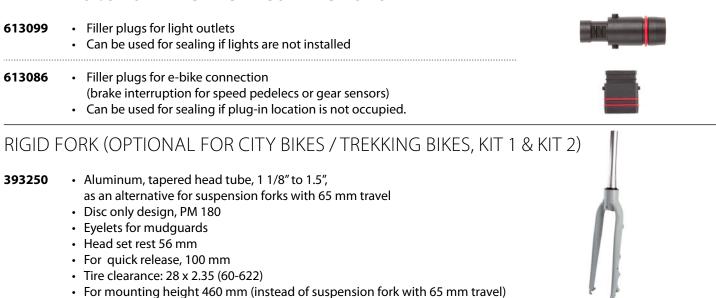
BROSE ACCESSORIES & ASSEMBLY PARTS

	For each motor, all five articles are required:	\bigcirc
613092	Speed sensor	
613091	Spoke magnet	D.
613096	Nuts for motor assembly (set of 3 pieces), M6	00
613097	Large ring nut for Spyder assembly	0
352639	ISIS crank set screw (2 pieces are required)	0 0

LIGHT CABLE FOR BROSE SYSTEM

613089	Length at front: 1095 mm	
613090	Length at front: 1226 mm	
613088	Length at back: 894 mm	
613087	Length at back: 1323 mm	

FILLER PLUGS FOR ELECTRICAL CONNECTIONS





SERVICE

Our Commitment:

A product is only as good as its service support. So our commitment is fully directed towards sustainable customer satisfaction. Swift response and qualified contacts – that is what characterizes our e-mobility service center.

For both, OEM customers as well as specialized stores, Messingschlager offers comprehensive service and support. In addition, we have a service & testing center that you can reach via our free hotline. We stock all necessary replacement parts, so it takes just a few working days until you receive the items you require. In relevant countries, we will set up so-called service satellites to be able to react even faster when it comes to sending out replacement parts and – above all – batteries.

This helps us guarantee training courses for international dealers.

Always Well Informed:

In addition, we regularly offer training courses for manufacturers as well as specialized store crew to share our expertise in the system. This enables fast troubleshooting and solving of problems. We stock all tools essential for servicing to be able to react in real time if service is required.

SERVICE



SERVICE OEM

- Documentation of work steps for an effective and time-saving assembly
- Training courses on assembly/cable routing and connection of system
- Training courses on assembly for end-of-line test and installation of suitable and customer-specific firmware
- · OEM hotline at our e-mobility service center
- Stocking of all crucial original spare parts and delivery within 48 hours
- General training courses on the system and all necessary diagnostic solutions for all components (motor, display, battery)
- · Swift response to queries within 48 hours
- Supply with all tools that are essential for OEMs
- OEM Tool



SERVICE FOR SPECIALIZED STORES

- Regular training courses on all relevant topics
 (service, firmware, maintenance, complaints & claims)
- Training courses on standard diagnostic processes of the systems used
- Training courses on exchanging the motor's belts
- · Fast supply with all necessary replacement parts
- Fast collection and return of items when service is required but problems cannot be solved on-site
- Supply with all tools that are essential for a specialized store
- Dealer service tool

CONTACT

Please note the following for an even faster and more comfortable service when submitting a complaint regarding our e-bike systems:

If you have any questions, complaints or claims about our premium e-bike solutions, please consult our e-mobility service center via:

E-Mail: e-mobility@messingschlager.com Hotline: +49 9544 / 9444 – 8338

Our e-mobility service is free of charge and available Monday till Friday from 8 am to 4 pm.

For further information concerning our offers and services, please visit our website: www.messingschlager.com/en/ebike

In addition to the e-mobility solution you will find more special e-mobility articles in our program



LIGHTING







LIGHTING

ARTNO. UVP	DESCRIPTION
466185 50 299,00 €	 FRONT LIGHT > M99 PURE (FOR S-PEDELECS Soo lumen supply Voltage: 6 V DC illuminant: 3 automotive LEDs daytime running light: 4.5 W, 32 Power LEDs, with daylight sensor 6061 aluminium, anodised, black polished license: L-Class e.g. L1e German StVZO-approved for E-Bikes up to 45 km/h cable length: 1,070 mm L x W x H: 67 x 87 x 57,5 mm 220 g without bracket suitable support arm art. 466182 5 years warranty OEM
466186 100 132,50 €	 LICENCE PLATE BRACKET INCL. TAIL LIGHT SUPERNOVA UNIVERSAL LEGAL KIT FOR L1E /S-PEDELECS adjustable fender-mounting license plate holder for all EU countries includes red reflector with E-Mark includes M99 tail light with 6 V (DC), 2 m cable without connectors impermeability: IP67 ECE License: L-Class e.g. L1e German StVZO-approved for E-Bikes up to 45 km/h integrate license plate illumination (5° installation angle variability) brake light (connection at M99 front light or special brake handle) 0.6 W continuous output, 1.1 W in brake light mode, 6 V DC 25 g L x W x H: 22 x 61,5 x 11,6 mm OEM
466457 80/20 11,90 €	 E-BIKE CARRIER REAR LIGHT with 3 red LEDs 6 V, DC for 50 mm hole spacing mounting only approx. 63 x 20 mm cable length: 100 cm incl. mounting parts on Smart eurohole card Without German mark - sale and use within the scope of StVZO (Germany) not allowed (delivery only to non-German customers).
466997 200/20 11,90 €	E-BIKE CARRIER REAR LIGHT → REFO MINI< • 6 - 60 V, DC • 1 super bright, red Osram LED • with German approval number • integrated Z-reflector • for 80 mm hole spacing mounting • with lock washers, screws and nuts • OEM
461651 50 16,90 €	E-BIKE HEAD LAMP D&E • DC 6 - 48 V • with reflector • 1 white LED • 30 Lux • with German approval number • on Smart eurohole card

SADDLES



ARTNO. UVP	DESCRIPTION	The saddles marked with E ^{Premium} are according to ISO 4210 tested for 140 kilograms overload.
250520 250521 250522 250523 20 44,90 €	RACING SADDLE >VELO-FIT ATHLETE BC size S size M size L size XL EPremium	S M L XL
250524 250525 250526 250527 20 44,90 €	RACING SADDLE VELO-FIT ATHLETE FCC size S Size M size L size XL EPremium EPremium	S M L XL
250528 250529 250530 250531 20 44,90 €	TREKKING SADDLE VELO-FIT TRAVELLER size M Size L size XL Size XXL Size XXL Premium	M L XL
250532 250533 250534 250535 20 44,90 €	CITY / COMFORT SADDLE VELO-FIT TOWNIE size M Size L Size XL Size XXL EPremium Size XXL	M L XL XXL XXL
COI	VING SOON:	10 VELO

VELO FIT-E-SERIE



SADDLES



SEAT POSTS







ARTNO. UVP	DESCRIPTION		
	ADJUSTABLE SEAT POST >LEVITATE IN<	i an	
	 clean look through integrated cable routing aluminium hydraulic quick release height adjustment while riding by a handlebar lever with scale rider's weight up to 100 kg OEM 		M-WAVE
252210	 Ø 27.2 mm length: 370 mm height adjustment: 0 - 100 mm 	1	
	 length: 425 mm height adjustment: 0 - 125 mm 		
252211	Ø 30,9 mm		
252212 20	Ø 31,6 mm		
129,00€	Tested by the manufacturer according to ISO 4210		
	Replacement / tuning spring for converting seat post art. 252183 et seq. to another rider's weight.		
252187	50 - 90 kg, silver	REALANNIN	
252199	90 - 120 kg, black		
30			
4,90€		-	



art.. 470410

ELUMATIK USB

M-WAVE ACCUMULATOR MINI PUMP

- universal double pump head
- powerful lithium-ion battery
- pumps up autonomously up to the default pressure
- max. air pressure 100 psi / 7 bar
- with ball needle and adapter for air beds
- for all three valve types (AV, DV, FV)

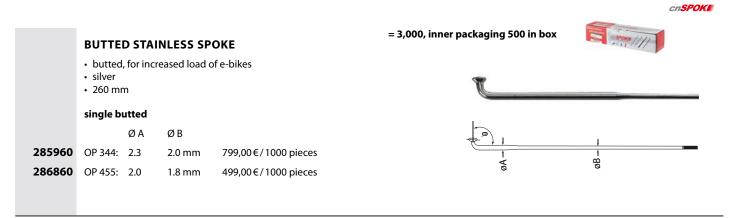
YOUR WORLD OF CYCLING www.m-wave-bike.com

BICYCLE MIRROR



ARTNO. UVP	DESCRIPTION		
270070	BICYCLE MIRROR >SPY SPACE 45	ECE APPROVED	•
50 19,90 €	 ECE approved: for all class L vehicles which do not have a bodywork surrounding the driver, e.g. suitable for E-Bikes, S-Pedelecs up to 45 km/h maximum speed, mopeds, motorcycles, quads, 3-dimensionally adjustable glare-free genuine glass for mounting on handlebar ends with inner-Ø 14.5 - 16.5 mm and Ø 18 - 19.5 mm in M-Wave eurohole box 	360°	

SPOKES



EVERYTHING IN (RE) VIEW

M-WAVE SPY SPACE – BICYCLE MIRROR

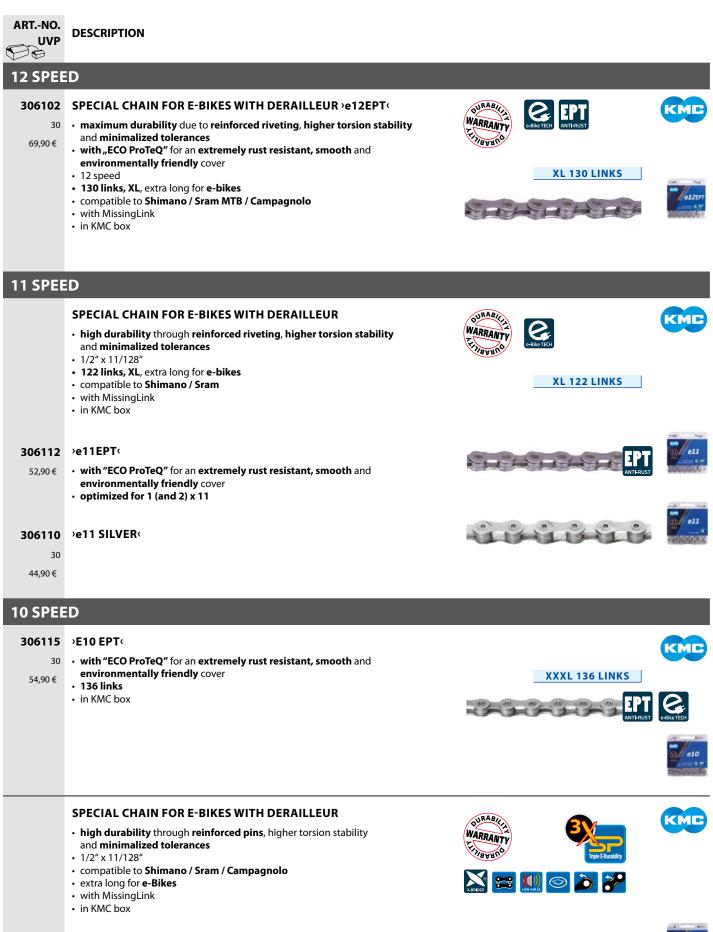
- 3-dimensionally adjustable
- antireflective, glare-free and blast-resistant
- for mounting right and left
- especially suitable for e-bikes



YOUR WORLD OF CYCLING www.m-wave-bike.com





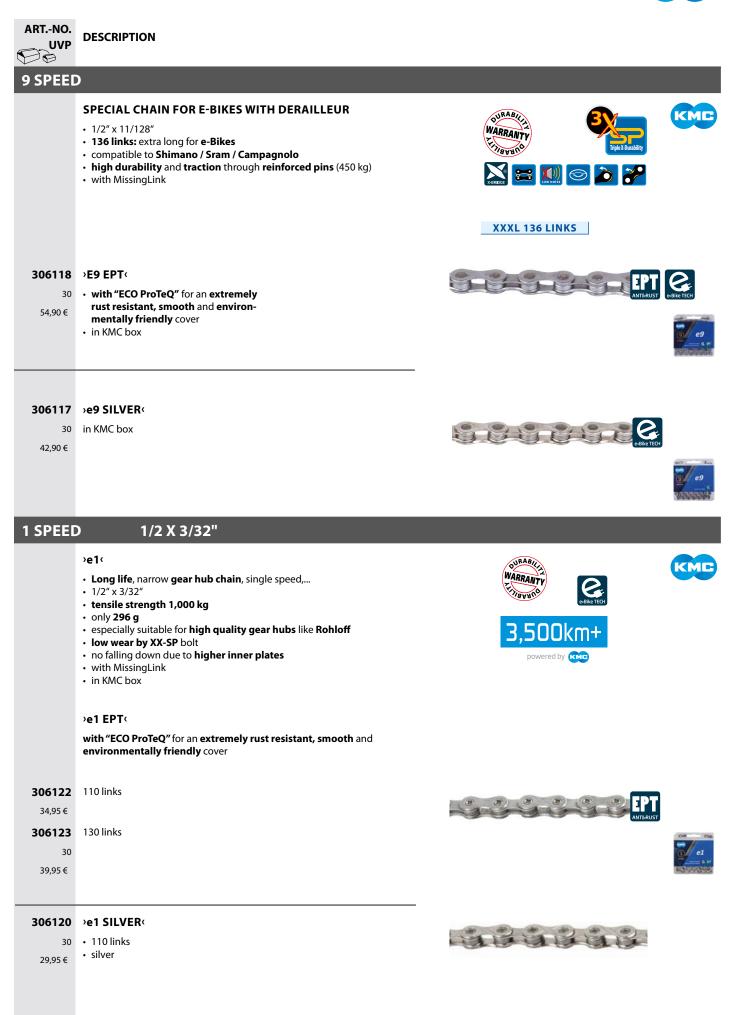


306114 >e10 SILVER

- 30 122 links
- 42,90€

22020

CHAINS



K	Μ	C
	$\boldsymbol{\nearrow}$	

RTNO. UVP	DESCRIPTION	
	Z eHX SERIE • E-Bikes- / internal gear hub- / BMX-chain: • 1/2"x 3/32" • 8 mm • no falling down due to higher inner plates ("StopDrop") • highest durability through HX-Stretch Proof treatment • mushroomed pins • chamfered inner plates for smoother running and more allowance of the of • tensile strength 1,050 kg • silver • with MissingLink • in KMC Box	chain line
306134 60 24,95 €	• Z1 eHX NARROW EPT 128 links: extra long for e-bikes • silver	XXL 128 LINKS
306131 60 21,90 €	>Z1 eHX NARROW< 112 links	
306125 30 59,90 €	 >E101 EPT 1/2" x 1/8" 112 links with "ECO ProTeQ" for an extremely rust resistant, smooth and environmentally friendly cover when using with KMC 1/8" chainring and KMC sprocket (art. 350075-8, 350094-6, 350081) enormously longlasting running per formance significantly over 10,000 km chainring and chain easily retrofitted at lots of bicycles with MissingLink in KMC box 	<image/> <image/> <image/> <section-header><section-header><image/><image/><image/><image/><image/><image/></section-header></section-header>
e1 e1	durability of e-bikes with mid-mounted engine	10.000 km + powered by
60 6127	Z1 eHX Wide E-bikes with hub gears:	K

- 60 **E-bikes with hub gears:** 21,90 € 1/2" x 1/8" silver

 - with MissingLink
 - in KMC box



CHAINS

CHAINS FOR WORKSHOPS AND ASSEMBLY



ARTNO. UVP	DESCRIPTION	Workshop 50 running meter
306113	e11 EPT (CERETE TO THE CONTRACT OF CONTRACT
306116	>e10 EPT< incl. 40 MissingLinks 10 NR EPT	CERKETERER EPT 99910
306119	> e9 EPT < incl. 40 MissingLinks 9 NR EPT	e-BikeTECH EPT 9
306124	1/2 x 3/32", Narrow >e1 EPT < incl. 40 MissingLinks e1 NR EPT	Leike TECH
306121	> e1 ∢ incl. 40 MissingLinks CL-573S	
306135	>Z1eHX NARROW EPT incl. 40 MissingLinks, Z1eHX Narrow NR EPT	C-BIKE TECH
306132	> Z1 eHX NARROW < incl. 40 MissingLinks CL-578	
306126	1/2 x 1/8" >e101 EPT< incl. 40 MissingLinks	C-EIKOTECH
306130	1/2 x 1/8", Wide >Z1eHX WIDE EPT incl. 40 MissingLinks Z1eHX Wide NR EPT	CARRENTECH EPT CONTRACTOR

CHAIN FASTENER ELEMENT

302367 1.000/50 Set 5,90 €	 >e1NR EPT for 7.3 mm wide chains silver 2 pieces in KMC blister pack 		KMC
302373 1.000/50 Set 8,90 €			
302372 1.000/40 Set	 >Z1 eHX WIDE NR EPT silver 2 pieces in KMC blister pack 		



ARTNO. UVP	DESCRIPTION		
	BICYCLE CHAIN		�
	 especially suitable for e-bikes longer durability due to reinforcements with connecting link for Brose, Bosch, Shimano, Bafang, drives silver in M-Wave single box 		M-WAVE
301941 30 39,90 €	 for 11 speed 1/2" x 11/128" 116 links 	<u>üüüüü</u>	
301940 30 34,90 €	 for 11 speed 1/2" x 11/128" 116 links 		
301945 30 16,90€	 for 1 speed also suitable for internal gear hubs 1/2" x 3/32" 112 links 		



NEW: 10.000 KM +

10

Available for → Bosch-motors → Shimano-hubs → NuVinci-hubs



MILEAGE (KM)

EQL

e101 EPT / KMC Pinion wide

e1 EPT/ KMC Pinion narrow 3.500 KM +

Standard

The warranty for at least 10,000 kilometers is based on the e101 chain with Eco-Pro-Teq technology. Only in conjunction with the optimized KMC pinions for center motors and hub gears.

Holds. And holds. And holds.

LINK TO PERFECTION

WWW.KMCCHAIN.DE

CHAINS

PEDALS





BOTTLE CAGE

	In the case of a mid-engine and / or a battery on the frame, the e-bike often no longer has room for a drinking bottle on the down tube. This problem is solved with our pictured bottle cages, since you can insert the bottle here laterally or at an angle.
	BOTTLE CAGE
	 particularly suitable for e-bike frame geometries with limited space outwardly chamfered edges makes it easier to put the bottle in with mounting screws on M-Wave eurohole card
340051	 bottle can be easily put in and taken away, also from the side only 29 g
340053	>BC 26 Side<
100	bottle can be easily put in and taken away, also diagonal from the side
4,90 €	• only 26 g



BOTTLE CAGE



CHAINRING

ART.-NO. DESCRIPTION UVP



KMC

	CHAINRIN • CrMo • black			c	himano hul		BOSCH ✓ SHIMANO ✓ NUVINCI ✓	ci hubs
		h e-bike en Generation 2	gines	3	nimano nui	05	NUVIN	Linubs
	1/2 x 1/8"	1/2 x 1	1/128"	1/2 x 1/8"	1/2 x	3/32"	1/2 x 1/8"	1/2 x 3/32"
teeth	AM	AM	OEM	AM	AM	OEM	AM	OEM
15		350079	350070					
17					350087	350090		
18	350075	350083	350071	350094	350088	350091		
19	350076	350084	350072	350095	350089	350092		
20	350077	350085	350073	350096	350097	350093	350081	350080
21	350078	350086	350074					
- Co	25	25	100	25	25	100	25	100
UVP	12,90€	12,90€	12,90€	12,90€	12,90 €	12,90€	12,90€	12,90€
	art. 350076	art. 350083	art. 350070	art. 350094	art. 350087	art. 350091	art. 350081	art. 350080

CHAINRING

- steel galvanized
- black
- 1/2 x 3/32"
- for Bosch e-Bike engines generation 2 original Bosch spare part)
- **352674** U 200 352676 16 theet U 50

352677

5,90€

MADE IN GERMANY BOSCH ✓



38



ART.-NO. DESCRIPTION





CHAINRING

CHAINRING

- black
- bolt circle 104 mm
- for 1/2 x 3/32 & 11/128" chains
- 0 offset
- for **Bosch** e-bike engines generation 1 and 3 and **Brose** e-bike engines (no original Bosch / Brose spare part)

	steel		steel / Na	rrow Wide	aluminium / Narrow Wide	
teeth	AM	OEM	AM	OEM	AM	OEM
32		356200	356213	356202	356243	356238
34			356214	356230	356244	356229
36	356204	356201	356215	356203	356245	356239
UVP	9,90€	9,90€	19,90 €	19,90€	29,90€	29,90€
38	352682	352685	356216	356232	356246	356231
40	356205	356220	356217	356235	356247	356240
42	352683	352686	356218	356236	356248	356241
44	352684	352687	356219	356226		
46	356206	356228	356242	356237		
Sò	50	50	50	50	50	50
UVP	9,90 €	9,90€	24,90€	24,90€	36,90€	36,90€
	art. 356204		art. 356	5203	art. 350	5239



32-40 teeth



DIRECT MOUNTS

• black

• for 1/2 x 3/32 & 11/128" chains

	Bosch GEN3* chain line 47 mm		Bosch GEN4* chain line 50 mm Narrow Wi		
teeth	AM	OEM	AM	OEM	
34			356252	356210	
36			356253	356211	
38	356249	356207	356254	356212	
40	356250	356208			
42	356251	356209			
UVP	9,90 €	9,90€	24,90 €	24,90 €	
	art. 356207		art. 356	210	



1.

CHAIN GUARD

ART.-NO. DESCRIPTION UVP





Sð

- CHAINGUARD
- aluminium
- black anodized • bolt circle 104 mm
- **CHAINGUARD 104 CHAINGUARD 104SL CHAINGUARD 104CNC** AM OEM AM OEM AM OEM teeth 36 356256 356278 38 356257 356279 40 356255 356273 356258 356280 42 356261 356272 44 356259 356275 46 356260 356276 48 356274 So 100 100 100 100 100 100 UVP 13,90€ 11,90€ 11,90€ 13,90€ 19,90€ 19,90€ Art. 356273 Art. 356275 Art. 356278



AM (4 Pieces on M-Wave card)	OEM
356304	356300
356305	356301
356306	356302
356307	356303
4	2000140
2,99 €/Set	0,69 €/St.
	356304 356305 356306 356307 4



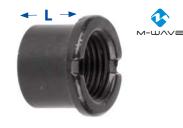
CHAINBING NUTS

CHAINKING NUTS		
	AM (4 Pieces on M-Wave card)	OEM
M8 * 0,75 * L5.5 mm	356310	356308
M8 * 0,75 * L8.5 mm	356311	356309
(C)d	4	
UVP	2,99 €/ Set	0,69€

SET OF CHAINRING BOLTS AND CHAINRING NUTS

4x nut M8 x 5.5 mm, for the use without chainguard, in polybag

set of 4x screw M8 x 10.5 mm and 4x nut M8 x 8.5 mm, for the use



```
4x
```

Other sizes and designs available on request

set of 4x screw M8 x 8.5 mm and

with chainguard, in polybag

356291

356293

500 4,99€



SPYDER / COVERPLUGS

M-W/V		
ARTNO. UVP	DESCRIPTION	E.
	SPYDER FOR E-BIKE ENGINES OF BROSE	•
	for MTB Linkage battery frame with boost standard (art. 613620-2), chain line 52 mm , bolt circle 104 mm	M-W/VE
613500	for usage with chainguard	
50		
613501	for usage without chainguard	
80		
	chain line 47 mm , bolt circle 104 mm	BOLNBRVOI.DO.C.
613522	for usage with chainguard	
613523		
80		
	chain line 49 mm , bolt circle 104 mm	
613520	for usage with chainguard	
613521	for usage without chainguard	
50		
19,99€		
	SPYDER FOR E-BIKE MOTOREN OF BOSCH *	
	• aluminium	M-WAVE
	with chain guard mountingblack anodized	
	bolt circle 104 mm	
613513	for BOSCH GEN3 system, chain line 47 mm	guardina
80		
14,90€		
613514	for BOSCH GEN4 System, chain line 50 mm	
80 24.00 6		~ ~
24,90 €		
	SPYDER FÜR E-BIKE ENGINES OF SHIMANO *	
	 aluminium with chain guard mounting	
	black anodized	
	bolt circle 104 mm	
613512	for Shimano E6100, chain line 47 mm	
100		BRIN SHERO DO CO
24,90€		
613511	for Shimano E6000, chain line 47 mm	
100		
19,99€		
613510	for Shimano E5000, chain line 47 mm	\checkmark
100		\wedge
19,99€		
613508	for Shimano E7000/8000, chain line 50 mm	EPOILASHERO-LUA C53
100		
24,90€		
613509	for Shimano E7000/8000, chain line 53 mm	
100		
24,90€		
	* no original Shimano spare part	• •

CRANKS



ART.-NO. UVP

CRANK, ISIS TYPE FOR BOSCH GEN1 + 2 + 4, BROSE *...

black

DESCRIPTION

aluminium

	le	eft	rig	ght	Offset	
length	AM	OEM	AM	OEM		
170	356108	356127	356109	356126	-	
175	356110	356125	356111	356124	0 mm	100
170	356112	356123	356113	356122	_	
175	356114	356121	356115	356120	5 mm	
160	356116	356135	356117	356133		
170	356118	356134	356119	356132	13 mm	
	50	50	50	50		
UVP	11,90€	11,90€	11,90€	11,90€		



CRANK, BNI TYPE (MINI-ISIS), BOSCH GEN3 *

black

• aluminium

	le	ft	rig	ght	Offset	
length	AM	OEM	AM	OEM		
160	356140	356131	356141	356129	_	
170	356142	356130	356143	356128	5 mm	
66	50	50	50	50		
UVP	11,90€	11,90€	11,90€	11,90€		

CRANK FOR SHIMANO 24 MM AXLES (FOR SHIMANO E8000 / 7000 / 6100) *

• black

- aluminium
- also suitable for Hollowtech II cranks

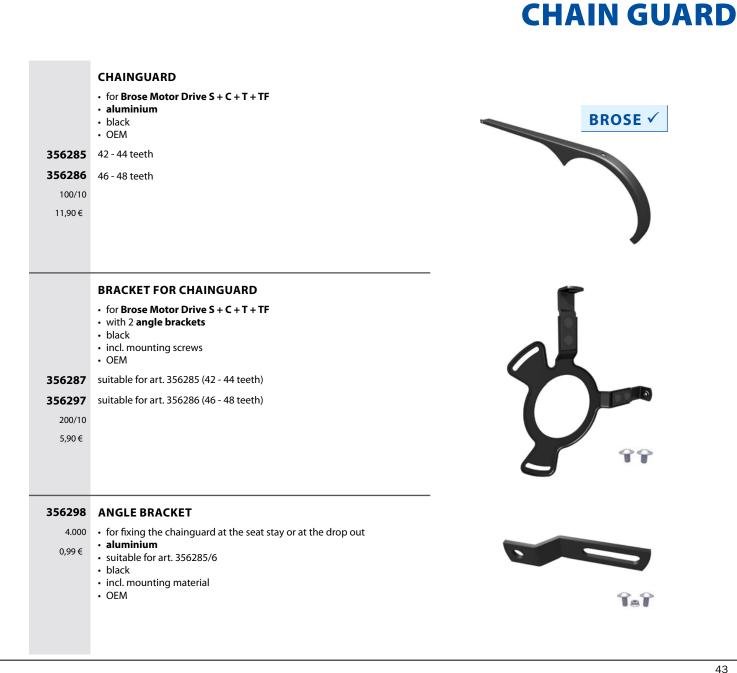
	le	ft	ri	Offset	
length	AM	OEM	AM	OEM	
165	356144	356139	356145	356138	
175	356146	356137	356147	356136	13 mm
So	50	50	50	50	
UVP	14,90€	14,90€	14,90 €	14,90 €	

The cranks are also available on request in other lengths, offsets and designs

* no original Bosch, Brose, Shimano spare part

CRANKS

ARTNO. UVP	DESCRIPTION	
352667	4-EDGE RECORDING (JIS)	
50 8,90€	 Offset: 20 mm length: 170 mm right black 	4-EDGE
	 AXLE BOLTS suitable for Bosch and Brose e-bike cranks (no original Bosch/Brose spare part) also suitable for ISIS bottom bracket with M15 thread 	





FOR BOSCH, SHIMANO, BROSE, FAZUA, ...

SAMOX

E-BIKE DRIVE PARTS FROM ONE HAND

You may have already held a part of Samox in your hand, but perhaps you did not realize it. No wonder, because Samox produces for many renowned suppliers cranksets, cranks, chainrings, spyder, chain rings, ... for the e-bike sector - for more than 10 years and depending on the specification in different price ranges and qualities. Also the production of individually specified parts is gladly tackled. We are pleased to be able to provide you with products of this experienced supplier in a fast growing segment! If you can not find a desired item in our brochure, then feel free to ask for it.

- largest, comprehensive range of parts for e-bikes

- custom-made products on request
- various materials and surface treatments possible
- all articles tested according to ISO 4210, test according to EFBE possible
- more than 10 years of competence in the production of e-bike parts
- fast availability thanks to our central warehouse in Baunach
- for aftermarket and factories

ESAMOX

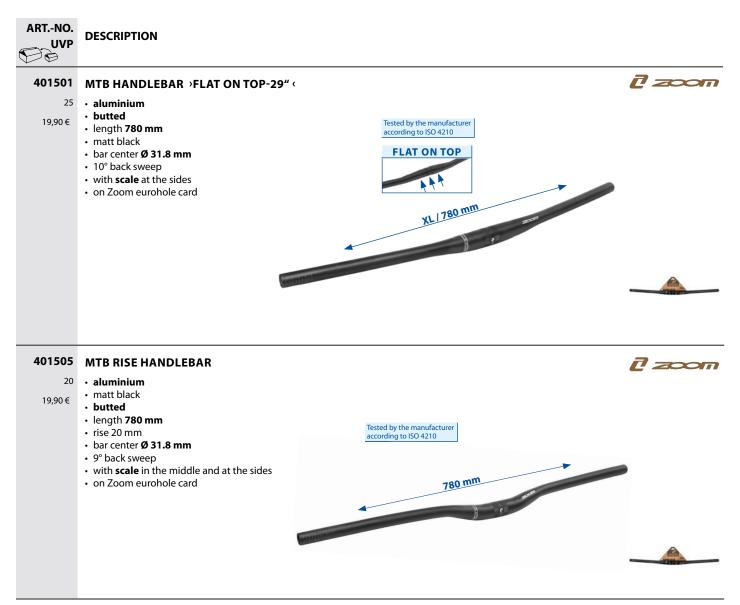


UVP

2 2			FORK
ARTNO. UVP	DESCRIPTION		
393250	E-BIKE FORK 28'	'/29"	
10	• Aluminlum 7005		Tested according to E-Bike norm DIN EN 15194
159,00 €	 with disc brake mo with eyelets for car with two cable gui headset set 62 mm OLD 100 mm for up to 2.35" tire 	rrier ide bosses 1	1 ¹ /8" 1.5"
395215	SUSPENSION FO	PRK	<u>i</u> 2007
8 99,90€	Especially suitable for	or e-bikes	Tested by the manufacturer according to EN 15194
	travel: suspension system: lower: stanchion: crown: for brake: steerer: colour: packaging:	65 mm adjustable springs and MCU elastomers, with Lock-Out function aluminum, one-piece, 28" butted Hi-Ten forged aluminum, with "Suntour light bracket" (no original Suntour bracket) V- and disc brake (PM) 1 ¹ /s", 320 mm, without thread matt black OEM	

HANDLEBAR





BUILD YOUR OWN E-BIKE EVERYTHING FROM A SINGLE SOURCE



FIVE FRAME CONCEPTS





BROSE-DRIVE

INTEGRATED BATTERY

BROSE DISPLAYS

www.messingschlager.com





HANDLE STEM

ARTNO. UVP	DESCRIPTION	
	AHEAD HANDLE STEM >3D<	<u>i</u> 200m
	aluminium 3D forged	
	• 11⁄8" • 7°	ATA
	 with Ø 31.8 mm clamp from 113 g OEM 	113 g Tested by the manufacturer according to ISO 4210
404177	60 mm	
404186	100 mm	C. tolim
50		Som 47
17,90€		
404505	00 mm	(株)
404505	90 11111	Tested by the manufacturer
		113 g according to ISO 4210
404507	110 mm	
50		
17,90€		
	 AHEAD HANDLE STEM according to ISO 4210: increased requirements up to 140 kg 	
	 aluminium adjustable from 0° to 90° 	Tested by the manufacturer according to ISO 4210
	• clamp Ø 31.8 mm	
	 1%" (28.6 mm) matt black 	1.61
	• OEM	
400312	length 90 mm	
		Chinash D
400313	length 110 mm	
50		
19,90 €		

SIDE STAND





ARTNO. UVP	DESCRIPTION
430256 U 9,90€	SIDE STAND • very stable version for e-bikes, • for mounting at the hub axle • with anti-scratch inlays • made of aluminium/steel • length adjustable without tools for 26" - 29" • with safety foot
430960 U 20 29,90 €	 DOUBLE LEG SIDE STAND > HEAVY DUTY the leg on the chain side folds to the other side: thus there is no space problem on the chain side aluminium for assembling behind the B.B. tube (between the chain stays) adjustable from 24" - 29" with safety feet incl. fixing screws and aluminium counter plate OEM
430217 U 29,90€	

BICYCLE LIFT



430098 BICYCLE LIFT >BIKE LIFT STRONG

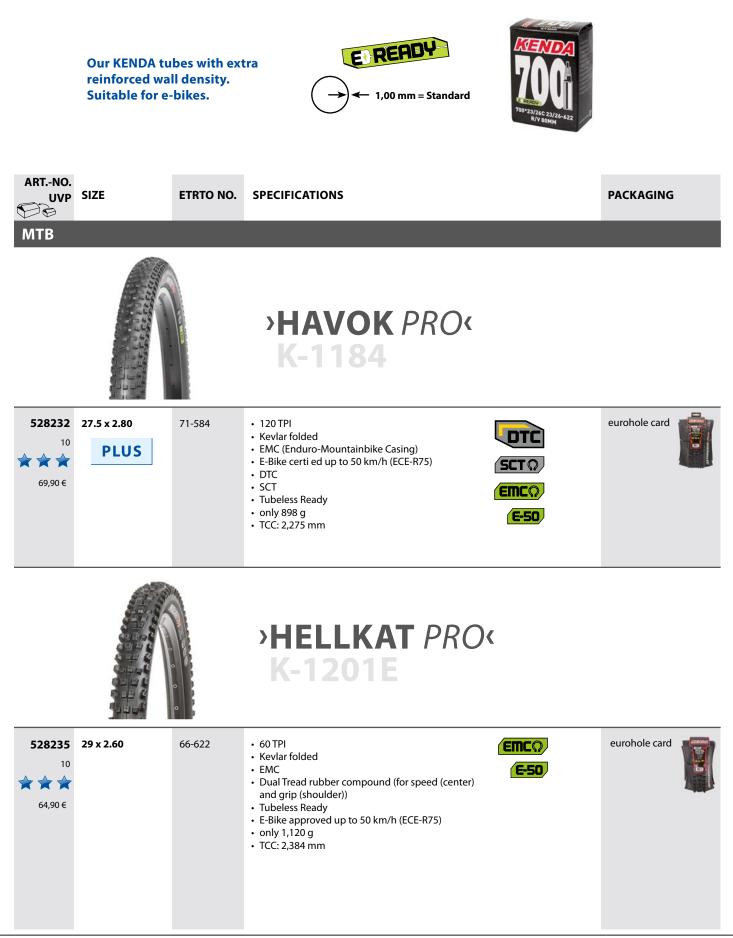
- 6 Set hooks with **plastic covers** for scratch protection
- stable round rope Ø 6.5 mm
 up to 4 m ceiling height
 usable up to 57 kg, so especially made for E-bikes
 in M-Wave box 36,90€
 - (A 1 1 1 1 1 1 1 1 1 1 1 1 1 1



THE FIRST ALLROUND PUNCTURE PROTECTION







TIRE







TIRE

	SIZE NG / CITY	ETRTO NO.	SPECIFICATIONS	PACKAGING
		0 0	>KHAN K-935	
527774 10 ₹ 24,90 €	700 x 35 C	37-622	 60 TPI K-Shield Plus E-Bike certi ed up to 50 km/h (ECE-R75) reflex TCC: 2,199 mm 	tag
527770 25 15,90 €			K-Shield KSO F-Bike approved reflex TCC: 2,199 mm	with tag
527765 10 ★ 27,90 €	700 x 38 C	40-622	 60 TPI K-Shield Plus E-Bike approved reflex TCC: 2,199 mm 	tag
527754 10 27,90 €	700 x 40 C	42-622	 60 TPI K-Shield Plus E-Bike approved reflex TCC: 2,209 mm 	tag
529087 25 16,90 €			K-Shield KSQ FeBike approved reflex TCC: 2,209 mm	with tag
522875 10 ≩ 27,90 €	700 x 45 C 28 x 1.75	47-622	 60 TPI K-Shield Plus E-Bike approved reflex TCC: 2,249 mm 	tag
529015 25 16,90€			K-Shield KSQ F-Bike approved reflex TCC: 2,249 mm	with tag

TIRE



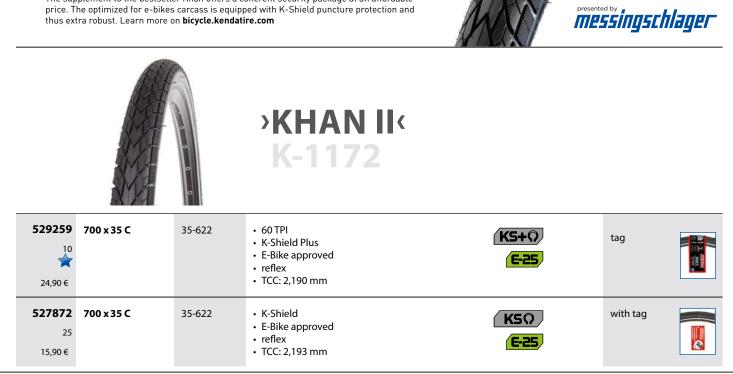
KENDA

SIZE	ETRTO NO.	SPECIFICATIONS	PACKAGING
26 x 1.75	47-559	 60 TPI K-Shield Plus E-Bike approved reflex TCC: 2,023 mm 	tag
		 K-Shield E-Bike approved reflex TCC: 2,023 mm 	with tag
		K-Shield KSQ F-Bike approved TCC: 2,023 mm E-25	with tag
26 x 1.95	50-559	K-Shield E-Bike approved reflex TCC: 2.061 mm KSQ	with tag
1		K-Shield KSQ TCC: 2.061 mm E-25	with tag
	26 x 1.75	26 x 1.75 47-559	26x1.7547-559: 60 TPl K-Shield Plus : Felike approved : reflex : TCC: 2,023 mmKS+O Felix Felix : FCC: 2,023 mm26x1.9550-559: K-Shield : Felike approved : Felike approved : Felike approved : Felike approved : Felike approved : Felike approved : FCC: 2,023 mmKSO Felix Felix : FElike approved : Felix : FCC: 2,023 mm26x1.9550-559: K-Shield : Felike approved : Felixe approved : Felixe approved : FElike approved : FELIX



KHAN II **BEST PANEL PROTECTION AT THE BEST PRICE**

The supplement to the bestseller Khan offers a coherent security package at an affordable price. The optimized for e-bikes carcass is equipped with K-Shield puncture protection and thus extra robust. Learn more on bicycle.kendatire.com



KENDA

TIRE

ARTNO. UVP	SIZE	ETRTO NO.	SPECIFICATIONS	PACKAGING
529258 10 ≩ 27,90 €	700 x 40 C	42-622	 60 TPI K-Shield Plus E-Bike approved reflex TCC: 2,218 mm 	tag
529090 25 16,90 €	700 x 40 C	42-622	 K-Shield E-Bike approved reflex TCC: 2,231 mm 	with tag
529257 10 ≩ 27,90 €	700 x 45 C 28 x 1.75	45-622	 60 TPI K-Shield Plus E-Bike approved reflex TCC: 2,253 mm 	tag
522895 25 16,90 €	700 x 45 C 28 x 1.75	45-622	 K-Shield KSO E-Bike approved reflex E-25 TCC: 2,253 mm 	with tag
527880 25 € 21,90 €	700 x 50 C	50-622	 30 TPI K-Shield E-Bike approved reflex only 1,092 g TCC: 2,297 mm 	with tag
527619 25 13,90 €	26x1.95	50-559	K-Shield KSQ E-Bike approved TCC: 2.095 mm E-25	with tag



>EUROTREK< K-197

527861 25 1 4,90 €		40-622	 30 TPI K-Shield E-Bike approved TCC: 2,202 mm 	(KSQ) (E-25)	with tag
527825 25 18,90 €	700 x 45 C	47-622	 30 TPI K-Shield E-Bike approved reflex only 918 g TCC: 2,249 mm 	(KSQ) (E-25)	with tag

E-BIKE ACCESSORIES







E-BIKE ACCESSORIES

ARTNO. UVP	DESCRIPTION	
612040 U 100 12,90€	 COCKPIT-/HANDLEBAR COVER protects e-bike displays, shift and brake levers, computer, against dust, dirt, rain, water resistant universally suitable for (almost) all handlebar shapes with rubber band and 4 hook and loop fastener on M-Wave eurohole card 	<image/>
610010	EBIKE UNIVERSAL MIDMOUNTED MOTOR	CE
4 699,00€	 turns (almost) every bike into a midmounted E-Bike up to 25 km/h universally useable in (almost) every frame with 68 - 73 mm BSA bottom bracket 36 V, 250 W with torque sensor torque 50 Nm integrated controller incl. illuminated display remote control at the handlebar end USB connection possibility for smartphones, connection possibility for head lamp and rear light with pushing aid (6 km/h) suitable for derailleur and internal gear box with integrated freewheel (not suitable for coaster brake hubs) with cable set (waterproof IP67) and speed sensor for bikes from 20" - 29" with EMV and EMC verification 	
610053	E-BIKE BATTERY	
1 549,00 €	 with battery management system 375 Wh / 36 Volt lockable with charger rechargeable mounted on bike and separately with charge control indicator for mounting at eyelets for bottle cages dangerous goods class UN 38.3 	
081200 100 6,90 €	Single box for Brose engine art. 613010/1/2/4/5	

HELMETS



ARTNO. UVP	DESCRIPTION	
	SPEED PEDELEC HELMET >45S<	
	A great combination of safety and design . Riding an ebike cheers you up! Enjoying epower up to 45 km/h is a special experience. But don't forget safety! This is why we invented the new Mighty 45S helmet which is also approved for fast e-bikes , e-scooters and motor cycles . Its protective function is tested accord ing to ECE R22.05 This helmet provides best comfort through its soft pads and eff ective ventilation.	Certification Content of Content
734100	ventilation:8 holescomfort:removable, washable comfort pads, with storage bagsafety:tested according to ECE R22.05technology:two-component shell, ABSface plate:polycarbonate In-Mold Microshelldesign:black / anthracite	
734101	size M, 57 - 58 cm	
734102	size L, 59 - 60 cm	
734103	size XL, 61 - 62 cm	Comy
6 159,00€		



NOTES



NOTES



NOTES



Messingschlager GmbH & Co. KG Haßbergstr. 45 D-96148 Baunach Tel.: +49 (0) 95 44 94 44 - 0 e-mobility@messingschlager.com www.messingschlager.com



Vertrieb: