

Lust
FOR CYCLING

SIRRAM

07
COMFORT AND CITY

USA

Just 20 minutes a day
strengthens your immune system
Riding a bike is rewarding
a dose of the "happy-maker" endorphin

Riding a bike is rewarding!
Cycling is good for your mind and body. Just 20 minutes a day
strengthens your immune system!

Everyone who rides a bike to improve his endurance is
rewarded with a dose of the "happy-maker" endorphin.

SRAM
i-MOTION 3

SRAM
i-MOTION 9

SRAM
i-LIGHT



EXPLORER



SRAM
i-MOTION 9

SRAM
i-LIGHT

Adventure on two wheels. You can explore everything on a bike: foreign cities, countries and cultures. Suggestions for your own personal adventure can be found at...

Information Travel Websites

www.radreisen-online.de
www.trekkingbike.com
www.aktiv-radfahren.de

www.fietspad.nl
www.oppad.nl
www.fietsactief.nl

Germany
www.radfahren.de
www.deutschland-tourismus.de
www.bettundbike.de

Holland
www.anwb.nl

Europe
www.ecf.com



Gears are your friends!

Why are gears needed on a bike?

The answer is very simple: to ride fast and climb hills easier, right?

A car has up to six gears, an engine loaded with HP and a tank full of gas. The motor of a bike is the cyclist who barely generates half a horsepower and even that depends on what and how much he has eaten beforehand. At 3,000 revolutions per minute driving a car is most efficient and here's where the gears become important. To start, one needs the power of the first gear, going uphill you need a gear with a small transmission and on the highway you can drive at full speed in the highest gear.

Cyclists can best use the strength in their legs to generate speed by pedaling 60 crank revolutions per minute, which is optimal for a city, or trekking bike. You should maintain this revolution going uphill, downhill and on level ground. The body can best use oxygen and energy reserves to create strength for the leg muscles at this cadence. If you pedal too slowly or use a gear that is too high, you get tired more quickly, and if you pedal too fast you will soon be out of breath. The wrong gear is extremely exhausting, which is why you need a bicycle that has several speeds with close gear ratio. In bicycle jargon this is referred to as the "transmission".

The new i-MOTION 9 hub has nine gears. The transmission is the ratio of the teeth of the front chainring to the rear gear. In general, the front chainring of an i-MOTION 9 bicycle has 38 teeth and the rear gear has 20. This results in a gear ratio of 1.9. The gear ratio multiplied by the diameter of the wheel gives you the distance traveled during one crank revolution. The first gear of an i-MOTION 9 travels 2.3 meters. If we pedal 60 revolutions per minute this corresponds to 8.3 km/h. The same applies to the ninth gear which would result into 28.2 km/h.

Then what is the advantage of racing bikes that have 20 gears? Of course, if you are fit you can go faster with this type of bike. But with regard to the gears, they have an even closer gear ratio. That means there is only a small difference between each gear. This way you can find the right gear for each terrain and in doing so maintain the optimal cadence. Just imagine a long staircase: if you have steps with the same distance, climbing the stairs is much more efficient than if each step has a different height.

With the i-MOTION 9 hub, SRAM has been able to integrate a sporty shift transition into a gear hub system for the first time. Between each of the nine gears there is a maximum difference of only 17%. The whole system is paired with a large overall – transmission of 340%.

For racing bikes this means that the first gear of the i-MOTION 9 equals to 2.3 meters with a triple chain ring system of 30 teeth in the front and 27 teeth in the back. The ninth gear corresponds to 52 teeth in the front and 14 teeth in the rear. In addition, the system is safely protected in a sturdy hub shell.

Now, you will ask, "How do I know about the right cadence?"

In a car you have a dashboard to see the RPM's but how do you control this on your bike? That's simple. As long as you are able to speak without being out of breath you are doing fine, if not just shift gears!

24
SRAM
DUALDRIVE II

27
SRAM
DUALDRIVE II





i-SERIES - The new comfort product group by SRAM

The SRAM i-SERIES includes drivetrain systems, brakes, electronic devices and accessories. SRAM combines newly developed parts with reliable and proven components, for example the i-MOTION 9 hub with the i-BRAKE drum brake. Each product is a class of its own thanks to intelligent technology. The integration within the i-SERIES occurs through continuous development and adaptation to the latest standards. The clever and integrative approach allows individual products of the group to be combined freely, which gives you the opportunity to create your perfect bicycle, from the comfortable city bike to the sporty trekking bike.

Innovation needs passion and courage to change. In 1903, Ernst Sachs laid the foundation for today's developments with the legendary Torpedo freewheel hub. SRAM revolutionized the bicycle world in 1987 with the grip shift twist shifters. "German Engineering" and American entrepreneurship have turned SRAM into one of the world's leading bicycle component manufacturers.

The SRAM i-SERIES is developed for people who have a passion for cycling. The "i" stands for innovation, inspiration, intelligence, integration and intuition. Enjoy cycling anytime and anywhere.

As the highlight of the i-SERIES, SRAM presents "the novelty" i-MOTION 9. This is the first sporty gear hub on the market with nine speeds – modern design and high functionality. Its large transmission range and smooth transitions allow for sportive cycling that was previously only possible with external drive train systems.

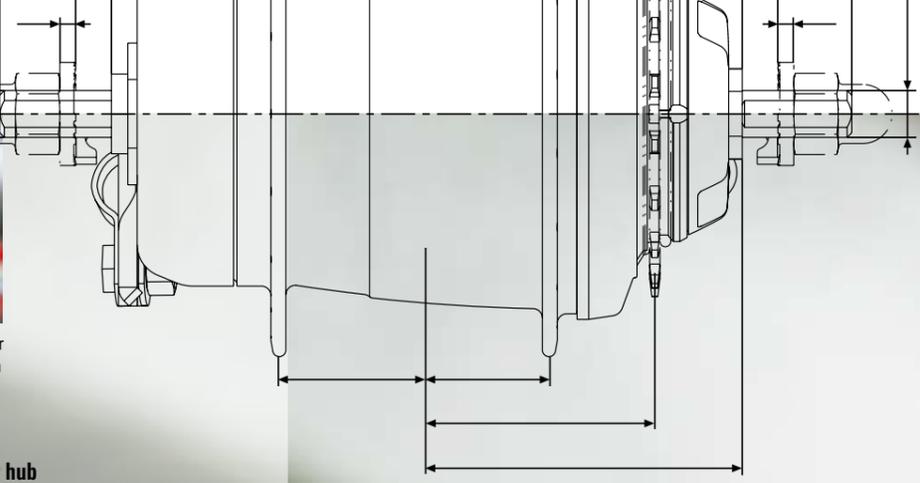
Developed and designed in Schweinfurt, SRAM i-MOTION stands for "German Engineering." Following the SRAM DualDrive shifting system, i-MOTION 9 and i-MOTION 3 also profit from the production know-how at SRAM.

i-MOTION 9 and i-MOTION 3 are offered in several variations. i-MOTION 9 can be used on comfortable city bikes as well as sporty trekking bikes; a disc-specific version will vitalize the fitness bike sector. Trendy cruiser bikes are the first choice for the successor of the Torpedo three-speed. The new i-MOTION 3 is the perfect shifting system for cruising the city streets.



i-SERIES

Drivetrain system	Brake system	Electronic system	Accessories
i-MOTION 9 i-MOTION 3 DualDrive II_27 DualDrive II_24	i-BRAKE	Sparc i-LIGHT	Handles Front hub



Dead easy wheel changing: the Easy-Click-Connector allows you to disconnect and mount the shift cable in only 5 seconds.

i-MOTION 9 – The perfect internal gear hub

Sporty cycling for everyone

i-MOTION 9 is the world's first gear hub with 9 speeds. A wide transmission range with evenly spaced gears make it the first ever sporty internal gear hub. For the first time, you can use the advantages of an external drivetrain system in the protected shell of an internal gear hub: Smooth transition, large transmission range and shifting under load.

Sporty transmission

The gear ratio of the i-MOTION 9 equals to 340%. In the lowest gear you reach 2.3 meters per crank revolution, in the highest gear a distance of 7.83 meters.

Efficient ride

i-MOTION 9 has the smallest steps between each gear of all gear hubs in this product segment. The individual speeds have a maximum transition of 17%. The consistent gear steps guarantee an efficient ride.

Safe and comfortable shifting while standing and shifting under load

Shifting while standing and the ability to shift under load make the i-MOTION 9 safe and comfortable in any cycling situation. If you have to brake suddenly at a high speed, to stop at a traffic light, you can select easily a lower gear while standing and without difficulty when starting up again. And your gears will never let you down again when facing a hill. If you notice that you need a lower or higher gear going up- or downhill, you can shift gear while pedaling.

Low maintenance

i-MOTION 9 is designed for every day use, whether sunshine or rain. The sealed and robust hub shell requires little maintenance. The new developed Easy-Click Connector allows rapid wheel changes and easy adjustment.

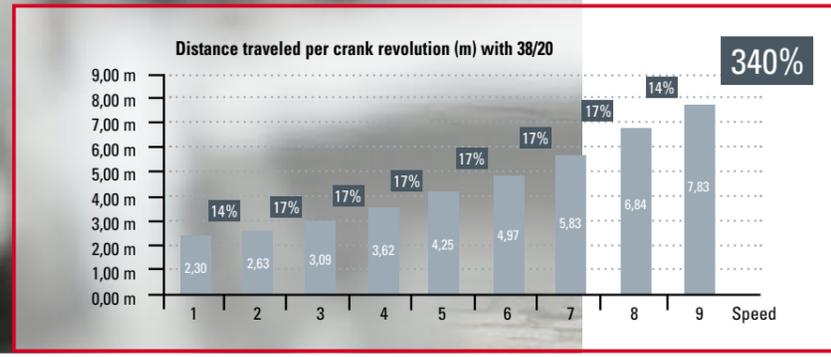
Options

The freewheel model can be combined with a double chainring. A combination of 48 and 38 teeth in the front and 22 teeth in the rear is possible for example. The i-MOTION brake-shift lever is compatible with linear pull brakes, i-BRAKE and mechanical disc brakes. In order to integrate hydraulic rim brakes, a separate shift lever is available. The i-MOTION 9 hub will be available as a coaster brake, freewheel, i-BRAKE and disc brake version.

SRAM
i-MOTION 9



TRANSITION I-MOTION 9 HUB





SRAM i-MOTION 9™

The new ease of shifting

i-MOTION 9: High functionality in an elegant design. SRAM has brought the first 9-speed gear hub with sporty transmission onto the market. The smooth transition over a large transmission range guarantees always the right gear at the right time.

Advantages

- Sporty transmission
- Close and even gear steps
- Shifting while standing
- Shifting under load

TECHNICAL DATA	
Speeds	9
Transmission	340%
Brakes	coasterbrake
Shifter	IBS, twist shifter
OMD	135mm
Materials	aluminium

MODELS	
i-MOTION 9	coasterbrake
	freewheel, coming soon
	i-BRAKE, coming soon
	disc brake, coming soon

GEAR HUB / SHIFTER



i-MOTION 9 IBS



i-MOTION 9 twist shifter



i-MOTION 9 coasterbrake



SRAM i-MOTION 3™

**i-MOTION 3 – The legitimate successor of the Torpedo 3-speed.
Safe and relaxed every day.**

i-MOTION 3 is the perfect gear hub for everyday use. Low shifting forces and a high load shiftability keep you safe in city traffic. The ergonomic grip shift lever with a large speed indicator guarantees maximum riding comfort.

The gear ratio of i-MOTION 3 amounts to 186%. In the first gear the cyclist travels 3.04 meters per crank revolution. Up to 5.67 meters can be achieved in the third gear. This allows you to cycle comfortably and easily in the city and suburbs.

Shifting made easy: For the i-MOTION 3 hub SRAM has developed its own new twist shifter with a large gear indicator that contributes to safety on the road. Thanks to the low shifting forces, i-MOTION 3 is perfectly suitable for children's bicycles that are equipped with an extra Bandix shifter. i-MOTION 3 is available with an i-BRAKE braking system, as a freewheel variant and -coasterbrake version.

For optimal transmission, SRAM suggests front chainrings between 32 and 50 teeth as well as sprockets between 16 and 21 teeth.



Advantages

- Shifting under load
- Shifting while standing
- Low shifting forces, child-friendly
- Large indicator
- Chain guard compatible

TECHNICAL DATA

Speeds	3
Transmission	186%
Brakes	coasterbrake i-BRAKE
Shifter	twist shifter, Bandix
OMD	130mm
Materials	steel

MODELS

i-MOTION 3	coasterbrake i-BRAKE freewheel
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GEAR HUB / SHIFTER



i-MOTION 3 coasterbrake



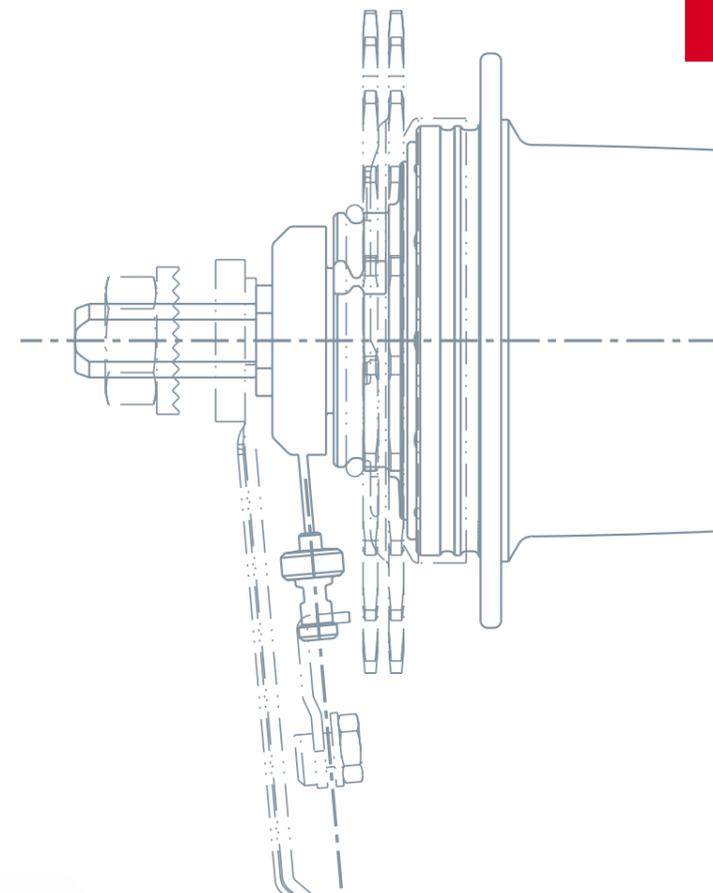
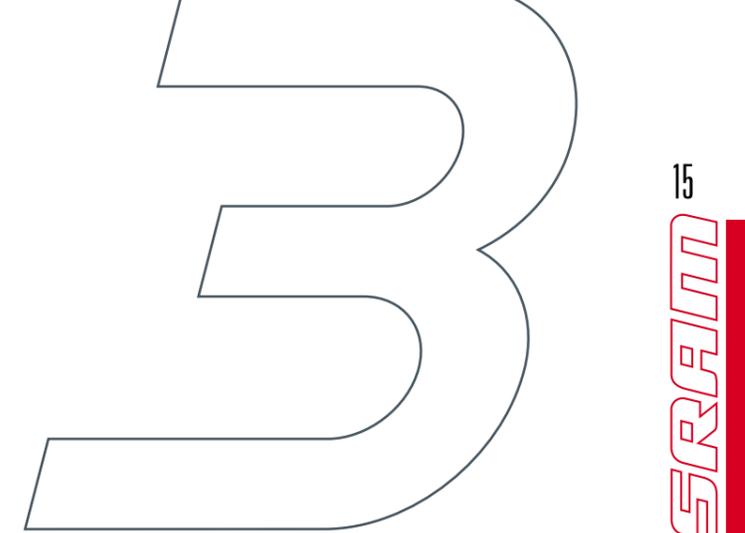
i-MOTION 3 i-BRAKE



i-MOTION 3 freewheel



i-MOTION 3 twist shifter





SRAM DUALDRIVE II

Advantages

- Shifting while standing (at a traffic light)
- Shifting under load (riding up steep grades)
- Shifting with one hand (max. 27 gears)
- No dirt on pants (chain guard)

DualDrive II gear hub

Technology: DualDrive II improved power shift gear
 Speeds: 3
 Weight: Approx. 970g (freewheel)
 Details: Sealed aluminum hub cartridge
 Compatibility: DualDrive cartridge and shift lever

One-hand shift lever

Technology: 1:1[®]-gear ratio, SRS™, Grip Shift[®]
 Speeds: 24/27
 Indicator: Images of 3 cycling modes
 Details: Thermoplast plastic, casing made of fiberglass-reinforced polyamide
 Compatibility: SRAM DualDrive gear hub and SRAM derailleur

Rear derailleur

Technology: 1:1[®]-gear ratio, Di.R.T™
 Speeds: 8/9
 Weight: Approx. 275g/260g
 Details: Composite steel / composite alloy / alloy-alloy composite
 Compatibility: SRAM DualDrive shift lever

24 27 GEARS



DualDrive II gear hub



DualDrive II gear hub



8x shifter



9x shifter

Trigger option



8x derailleur



9x derailleur

The trend of sporty cycling with fitness bikes.

In order to meet this demand, SRAM[®] has developed the trigger shift lever for DualDrive™. Like a mountain bike, you shift all gears quickly and safely only with your thumb. While shifting, four fingers are always holding the handlebar securely and at the same time you can shift gears and brake when necessary. Both shift lever options, one-hand and -trigger shifts guarantee the same advantages of the SRAM[®] DualDrive system. Shifting while standing (gear hub) or under load (derailleur). It's your choice: Solid and comfortable with the one-hand shifter or sporty and fast with the trigger.

Supplementary components

i-BRAKE, i-LIGHT, crankset, Avid disc brake
 9 speed chains: PC-991 / PC-971 / PC-951,
 8 speed chains: PC-48 / PC-58 / PC-68



SRAM i-LIGHT™

The i-LIGHT™ hub dynamo turns a bicycle into a mobile power plant. Highly efficient and with low roll resistance it is safe and simple to generate energy for your lights. Compact and efficient, the i-LIGHT™ is the reliable solution for an integrated light source for front and rear lights. Smooth at slow speed, i-LIGHT™ supplies sufficient electrical energy. Start and roll resistances are extremely low.

Effectiveness 60% (with switched-on illumination)

No-load loss 2 Watt

Bearings
sealed Grooved ball bearings
Details 2.4 Watt / 6 Volt or 3 Watt / 6 Volt for Germany
 Quick-release and full axis version, i-BRAKE option, Disc brake option

Finish options Silver, black, polished



SRAM i-BRAKE™



Weight option



i-BRAKE front wheel hub



Cooling disc

OPTIONS

The SRAM[®] i-BRAKE system has been specially developed for everyday use: sporty, comfortable and safe. The outstanding advantages include precise adjustability, combined with excellent braking performance and a light overall weight. i-BRAKE is safe: Due to the closed brake system, i-BRAKE is safe and reliable in wet or dry conditions.

Compatible with SRAM gear hubs (SRAM i-MOTION 9, SRAM i-MOTION 3, SRAM S7, SRAM P5, SRAM T3, SRAM Dual Drive) SRAM i-BRAKE
 Compatible front wheel hubs i-LIGHT

Brake lever Linear pull compatible
Brake system Sealed for consistent brake performance

Bearings Sealed grooved ball bearings for excellent friction reduction, protecting against weather influences



i-BRAKE version



Quick release version



Disc brake version

OPTIONS

SRAM

OPTIONS



Cassette



Trigger option



i-BRAKE version



Disc brake



SRAM S7 coasterbrake



SRAM P5 coasterbrake



SRAM T3 coasterbrake

SRAM S7™



SRAM S7 Shifter



clicbox

SRAM S7 gear hub

Technology: Hub shifting
 Total
 Transmission: 303%
 Actuation: Shifting lever and clicbox
 Details: Drum brake - aluminum
 Coasterbrake - steel
 Freewheel hub - steel
 i-BRAKE hub
 Compatibility: SRAM S7 shifter / clicbox
 DIN plus: Coasterbrake, i-BRAKE

SRAM S7 shifter

Technology: SRS™
 Speeds: 7
 Indicator: Vision panel
 Details: Reinforced nylon,
 optimized handle length
 Compatibility: All SRAM S7 hubs

Options

S7 Drum brake hub
 SRAM S7 freewheel hub
 Coasterbrake - black
 Freewheel - black
 i-BRAKE

SRAM P5™



SRAM P5 Shifter



clicbox

SRAM P5 gear hub

Technology: Hub shifting
 Total
 Transmission: 251%
 Actuation: Shifting lever and clicbox
 Details: Drum brake - aluminum
 Coasterbrake - steel
 Freewheel hub - steel
 i-BRAKE hub
 Compatibility: SRAM P5 shifter / clicbox
 DIN plus: Coasterbrake, i-BRAKE

SRAM P5 shifter

Technology: SRS™
 Speeds: 5
 Indicator: Vision panel
 Details: Reinforced nylon,
 optimized handle length
 Compatibility: All SRAM P5 hubs

Options

Coasterbrake - black
 Freewheel - black
 i-BRAKE

SRAM T3™



SRAM T3 Shifter



Bandix Version

SRAM T3 gear hub

Technology: Hub shifting
 Total
 Transmission: 186%
 Actuation: Shift levers and guide pulley
 Details: Drum brake - aluminum
 Coasterbrake - steel
 Freewheel hub - steel
 i-BRAKE hub
 Compatibility: SRAM T3 shifter

SRAM T3 shifter

Technology: SRS™
 Speeds: 3
 Indicator: Quick display
 Details: Reinforced nylon,
 optimized handle length
 Compatibility: All SRAM T3 hubs

Options

Torpedo shifter
 T3 drum brake hub
 SRAM T3 freewheel hub
 i-BRAKE

SRAM - German Engineering

SRAM i-MOTION - the successor of the legendary SACHS Torpedo 3 gear hub is produced in the traditional location of Schweinfurt, Germany. For decades, the Torpedo hub made a legendary name for itself among sporty and everyday cyclists. The first gear hubs were produced in 1903. Even today the red shifter stands for quality bikes. Since the take over of Mannesmann Sachs AG in 1997, SRAM has become one of the biggest bike components manufacturers worldwide and has acquired the know-how of over 100 years of internal gear hubs. SRAM is consequently continuing all Sachs gear hub efforts. The latest innovations are the 9 speed i-MOTION gear hubs and the legitimate successor of the famous Torpedo 3 speed – i-MOTION 3 - German Engineering.



Legendary Torpedo shifter

		GEARS	TECHNOLOGY	WEIGHT	DETAILS	INTENDED APPLICATION
SRAM i-MOTION 9™		9	i-MOTION 9 coasterbrake hub shifting, transmission 340% power shift gear, shifting while standing and under load	2400 g	Aluminum casing, easy-click connector, chainring 33-38, sprocket 18-22 teeth, versions with 32 and 36 spokes	City, Trekking
		9	i-MOTION 9 i-BRAKE (coming soon) hub shifting, transmission 340% power shift gear, shifting while standing and under load	2000 g	Aluminum casing, easy-click connector, drum brake, chainring 33-38, sprocket 18-22 teeth, versions with 32 and 36 spokes	City, Trekking
		9	i-MOTION 9 handle B/S Turning handle, brake lever linear pull, i-BRAKE, Avid BB disc	285 g	One-piece brake shift handle made of aluminum, large indicator	City, Trekking
		9	i-MOTION 9 twist shifter	186 g	Aluminum, large indicator	City, Trekking, Fitness
SRAM i-MOTION 3™		3	i-MOTION 3 coasterbrake hub shifting, transmission 186% power shift gear, shifting while standing and under load	1555 g	Aluminum casing, chainring 33-38, sprocket 16-21 teeth, versions with 28, 32 and 36 spokes	City, Cruiser
		3	i-MOTION 3 i-BRAKE hub shifting, transmission 186% power shift gear, shifting while standing and under load	1921 g	Aluminum casing, drum brake, chainring 33-38, sprocket 16-21 teeth, versions with 28, 32 and 36 spokes	City, Cruiser
		3	i-MOTION 3 freewheel hub shifting, transmission 186% power shift gear, shifting while standing and under load	1258 g	Aluminum casing, chainring 33-38, sprocket 16-21 teeth, versions with 28, 32 and 36 spokes	City, Cruiser
		3	i-MOTION 3 twist shifter	133 g	Large indicator, easy shifting, optional child handle	City, Cruiser
SRAM DUALDRIVE II 27		27	DualDrive II 27 Twister with one-hand shifting lever or trigger	246 g		City, Trekking, Fitness
		27	DualDrive II 27 Gear hub (3) and derailleur (9), power shift gear, shifting while standing and under load	System 2854 g	Chain guard available, low-maintenance	City, Trekking, Fitness
SRAM DUALDRIVE II 24		24	DualDrive II 24 Twister with one-hand shifting lever, gear hub (3) and derailleur (8), power shift gear, shifting while standing and under load	System 2854 g	Chain guard available, low-maintenance	City, Trekking, Fitness
SRAM i-LIGHT™			i-LIGHT 28 claw pole generator	859 g	2.4 Watt/ 6 Volt, for Germany 3 Watt/ 6 Volt, optional quick release, full axis, i-BRAKE and disc	City, Trekking
SRAM i-BRAKE™			i-BRAKE Drum brake		DIN Plus certified, dirt protection	City, Trekking
SRAM SPARC™		5	Sparc Electrical accessory drive, twin drive	System 4984 g	16 Volt, NiMH battery, shiftable, two cycling modes, five-gear hub, distance of max. 35 km, charger	City
SRAM T3™		3	Gear hub, transmission 186%	F 911 g R 1182 g	Twist shifter, click shifter option	City
SRAM P5™		5	Gear hub, transmission 251%	F 1330 g R 1495 g B 1920 g	Twist shifter, cargo hub	City, Trekking
SRAM S7™		7	Gear hub, transmission 303%	F 1556 g R 1714 g B 2164 g	Twist shifter, DIN plus certified	City, Trekking

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