

Cleaning Technology
Municipal Technology
Waterjet Technology

Hako



Municipal Technology

Multifunctionality without compromise

High performance for year-round use



Our efficient all-rounders

Spring, summer, autumn and winter: Each season presents its own unique challenges for municipal technology. We develop future-proof vehicles that meet the changing demands of municipalities, service providers and industry with economic efficiency: through high quality, absolute reliability and consistent multifunctionality. This means: all applications can be flexibly covered with just one machine. For lower investment costs and a decisive increase in efficiency.



www.agr-ev.de



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The right solution for every application

Our full-range portfolio meets this requirement, featuring articulated and all-wheel-steering sweepers with additional benefits, as well as multifunctional load and implement carriers. Safety, comfort, efficiency and environmental protection are always our top priorities.

Citymaster

Citymaster 650

Articulated sweeper with additional benefits in the 2-t class. Output 25.5 kW, driving licence Class B



Citymaster 1650

Articulated sweeper with additional benefits in the 3.5-t class. Output 55 kW, driving licence Class B



Citymaster 2250

All-wheel-steering sweeper with additional benefits in the 6-t class. Output 80 kW, driving licence Class C/C1/C1E



All-electric Citymaster 1650 ZE

Articulated sweeper with additional benefits in the 3.5-t class. Output 50 kW, driving licence Class B



Multicar

Multicar M29

Narrow-gauge load- and implement carrier in the 6-t class. Output 80 kW, driving licence Class C/C1/C1E



Multicar M31 Euro VI-E

Load- and implement carrier in the 6-t class. Output 110 kW, driving licence Class C/C1/C1E



Multicar M31 Euro VI-E Hydrostat

Load- and implement carrier in the 6-t class. Output 108 kW, driving licence Class C/C1/C1E



Multicar M41

Load- and implement carrier in the 6-t class. Output 108 kW, driving licence Class C/C1/C1E

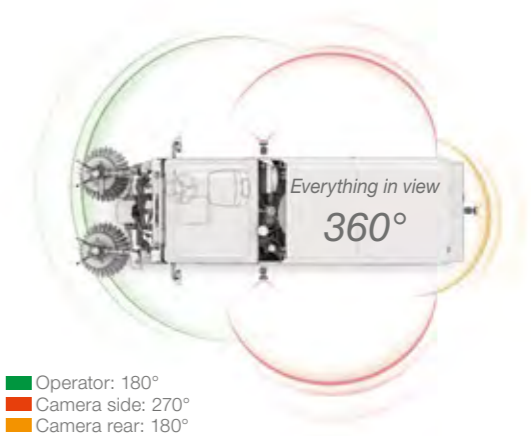




State-of-the-art technology produced in-house:
Our qualified employees in the Hako factories ensure that all components meet our high quality and safety standards.

Always on the safe side

When working in cities and residential areas, drivers of municipal vehicles are often confronted with challenging traffic situations, for example through cyclists or pedestrians located in the vehicle's blind spot when turning right. Hako's Turning Assistant supports the driver in his daily routine and helps to avoid potentially dangerous situations. The innovative camera system detects other road users located in the vehicle's immediate vicinity and issues visual and acoustic warning signals.



We focus on safety

With our sophisticated safety concepts, ranging from a fully-glazed cab, additional work lights and a camera system to assistance systems such as ABS and ESP, we actively protect the health and safety of both machine operators and other road users.

Keeping an eye on what's important

Fully glazed cabs offer the driver a good view onto his surroundings. The camera system including a rear-view camera ensures that his viewing angle is extended by a further 270° to provide an all-round view of the machine's surroundings and increased safety when turning or reversing.

Safety first

Tested and approved – Citymaster with ROPS-tested safety cab and Multicar with ECE R29-certified 2-person safety cab. Both our Citymaster and Multicar vehicles comply with the high standards required to obtain EC type approval.



Well-adjusted

For optimal working conditions, the steering column can be adjusted continuously for height and angle, allowing it to be easily adapted to drivers of any height.

Award-winning comfort

Our ergonomic machine concept comprising an adjustable comfort seat, our no-tools-needed quick-change system and a full-suspension chassis turns Citymaster and Multicar vehicles made by Hako into particularly back-friendly workplaces – certified and recommended by AGR (Aktion Gesunder Rücken e.V. www.agr-ev.de).

Protect both the environment and people's health. Awarded with the "Blue Angel" environmental label: the Citymaster models 1650 and 2250 meet the criteria for particularly low-noise and low-emission municipal machines according to RAL-UZ 59.



More comfort at the workplace

Even the best machine is only as efficient as its operator. That's why Hako noticeably increases driving and operating comfort with ergonomic details such as individually adjustable steering columns, operating armrests with integrated functional elements and fully electric accelerator pedals with improved foot ergonomics. This is also confirmed by the AGR quality label awarded to the Citymaster models 1650, 1650 ZE and 2250 as well as the Multicar M29.



Changing attachments made easy: Our quick-change systems and the quick-coupling triangle provide easy and back-friendly changing of attachments without the need for tools.

Simple to use: featuring a 1-button control for automated machine configuration sequences and a USB port for charging your mobile phone.

Optimally tempered

The hot-water and footwell heating ensures pleasant temperatures in the cab to provide comfortable working conditions even in the winter. The optional air conditioning ensures a comfortable working environment in the summer.

Superb roadholding characteristics

The sprung chassis (not Citymaster 650) and the air-sprung driver's seat, which is perfectly matched to the chassis of the respective model, ensure optimal suspension comfort. This not only protects the driver on long working days, but also the vehicle.



Multifunctional all year round: for example, with attachments for maintaining green areas, as well as all-wheel drive and versatile equipment for a variety of winter service tasks.



Citymaster

If you can hardly see or hear it, it's municipal technology at its best. Because it means that the machines carry out their tasks in a clean, rapid and efficient manner. The key factors are, for example, that the machines are as compact, manoeuvrable and flexible as possible while offering a high payload at the same time. Moreover, they need to be safe on the road and provide low-noise operation as well as lowest possible emission and consumption values combined with best possible dust control during sweeping.



A strong basis for various applications

No matter what the season or the application or the surface, or whether the conditions change constantly or you need to consider specific regional circumstances: the machines of our Citymaster range master every task efficiently and they are highly flexible. Because, in addition to carrying out professional sweeping tasks, they can be re-tooled and equipped with a wide range of different attachments and chassis-mounted equipment for any kind of seasonal application – 365 days a year, from efficient city cleaning to green area maintenance or winter service. That's what we call "One for All". And our customers put it like this: "The optimal machine for every application."



For even more efficient work results: cab with ergonomic comfort seats and consistent operating concept.

At a glance: the high-resolution colour display provides a good overview of the machine's current operating states and parameters.

Fast, easy, no tools needed: thanks to the quick-change system, the Citymaster can be re-tooled for the next job in no time at all.



Sweeping



Wet cleaning



Winter service



Green area maintenance



Transport



Waterjet technology



Weed control



Freedom through multifunctionality

This compact-class professional vehicle is perfectly suited to the needs of service providers and gardening and landscaping businesses: as an articulated, all-wheel-steering implement carrier and sweeper with a narrow vehicle width and small turning circle, it offers maximum manoeuvrability in confined spaces. And with its multifunctional design, it is ideal for cost-effective year-round use.



Quickly off to the next job site: on its own axles if the job is nearby, or transported on a trailer to cover larger distances.



The lawn specialist: equipped with different mowers, grass collecting systems or flail mowers, and a large universal hopper.



The green area expert: equipped, for example, with an irrigation system for flower beds, bushes and trees, or a hedge trimmer.



Flexible winter service applications: for example, with a front sweeper for reliable snow sweeping, or with slow blades and a snow blower for safe snow ploughing.

Citymaster 650

The basic version of the Citymaster 650, designed as a compact implement carrier, already sets new standards in the 2-t class: for example, with articulated steering, permanent all-wheel drive with a fully electronic control system and extensive features providing increased comfort and safety at work. Thanks to its multifunctional design, the Citymaster 650 can be re-tooled quickly and easily, for example as a professional sweeper or an efficient snowplough for winter service tasks, which makes this machine not only extremely versatile in use but also particularly economical as it provides multiple application options.



Compact, highly manoeuvrable, and economically efficient: for best results also on footpaths and in confined areas.

Sustainably on the road

The Citymaster 650 meets the emission limit requirements of the Stage V Exhaust Emission Standard. Clever details such as the energy-saving drive control system and three different performance levels reduce the machine's fuel consumption both in work mode and during road travel. When working in ECO mode, a standard feature which is not only good for the environment but also for applications in noise-sensitive areas, the Citymaster 650 works at 85% of its maximum performance capacity and saves up to 40% fuel.

Technical data Citymaster 650	
Engine	Diesel/25.5 kW
Vehicle drive system (type/formula/Vmax.)	Hydrostat/permanent all-wheel drive/25 km/h
Chassis, general	Chassis with articulated steering, quick-change system for attachments
Hydraulic system (power circuits)	2/66 l/min/195 bar
Dimensions basic unit (L x W x H)	3,163 x 1,090 x 1,969 mm
Weight basic unit (GVW/payload)	2,200 kg/up to 770 kg
Driving licence	Class B



Easy to change: comfortable, back-friendly changing of the hopper and different attachments via our quick-coupling system and a trolley.



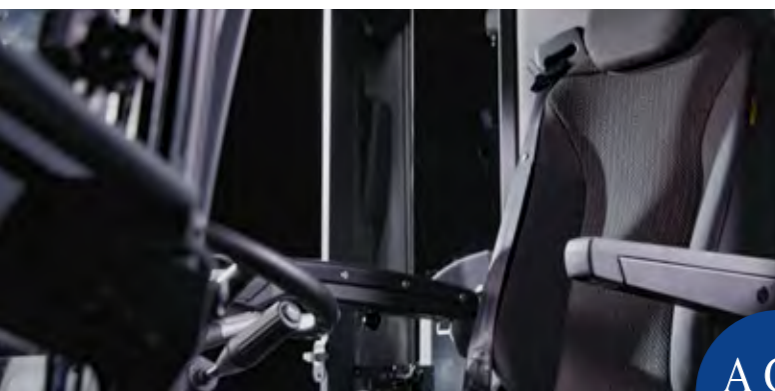
The vehicle easily circumnavigates any obstacle: thanks to its compact dimensions, directionally stable steering and particularly small turning circle.



Increased working comfort in all conditions: provided by our 2- or 3-broom comfort sweeping technology.

Citymaster 1650

The Citymaster 1650 offers all the benefits and application options of a larger sweeper by taking full advantage of the Class B driving licence range – and the vehicle can also work on footpaths. Thanks to its directionally stable, articulated steering, the smallest turning circle in the 3.5-t class and permanent all-wheel drive, the vehicle can access almost all areas. And what's more, a comprehensive range of new features provides increased working comfort, safety and efficiency – no matter whether the machine is used exclusively as a sweeper or as a versatile implement carrier for all-season municipal applications.



Ergonomic, back-friendly, safe

The cab of the Citymaster 1650 offers an excellent workplace for the driver – independently certified and recommended by AGR! In addition, coil springs, shock absorbers and stabilisers as well as the vehicle's intelligent drive control and disc brake systems provide high levels of safety.



Multifunctional all along the line

As a multifunctional implement carrier with a powerful, particularly efficient hydraulic work drive for the attachments, there are virtually no limits to the Citymaster 1650's range of applications. For example, in winter service. This means that the sweeper can be used all year round thanks to additional utilisation options.



Powerful against ice and snow: the wide range of attachments available allows flexible adaptation to different snow and weather conditions.

Mowing-suction combi unit with universal hopper: mows lawns, maintains road-side greenery and works close to kerbs and edges on either side.



Safe: the camera system widens the driver's viewing angle by 270°.

Technical data Citymaster 1650	
Engine	Diesel/55.4 kW
Vehicle drive system (type/formula/Vmax.)	Hydrostat/permanent all-wheel drive/40 km/h
Chassis, general	Chassis with hydraulic articulated steering, fully suspended with coil springs and shock absorbers, quick-change system for attachments
Hydraulic system (power circuits/l/min/bar)	2/102 l/min/225/195 bar
Dimensions basic unit (L x W x H)	3,829 x 1,210 x 1,970 mm
Weight basic unit (GVW/payload)	3,500 kg/up to 1,465 kg
Driving licence	Class B



New energy

When developing the Citymaster 1650 ZE, we focused on both the technology and the driver. Hence, the Citymaster 1650 ZE also convinces with its ergonomic workplace design – from the adjustable steering column and the comfort seat to the 1-button operating system integrated in the armrest, which controls all functions at just the push of a button.



Fully electrically fuelled for more sustainable outdoor area maintenance.

Quick changing of attachments provides efficient cleaning.

Citymaster 1650 ZE

The Citymaster 1650 ZE stands for “Zero Emissions” in the 3.5-t class. As the first all-electric sweeper with additional benefits made by Hako, the Citymaster 1650 ZE guarantees reliably clean results and zero exhaust emissions. While noise pollution and fine particulate emissions are reduced to a minimum, the vehicle offers maximum efficiency, safety and user comfort. Providing up to nine hours of working without recharging, the compact and highly manoeuvrable Citymaster 1650 ZE is well equipped for long running times and optimal work results – also on footpaths and in confined areas. Thanks to its top speed of up to 40 km/h, the Citymaster 1650 ZE can quickly travel from one job site to the next.



Your ZE alternative: equipped with all-electric components, the Citymaster 1650 ZE makes your municipal fleet eco-friendly and future-proof.

The new all-electric multifunctionality

All-electric sweeping, wet cleaning and light winter service: this is how the Citymaster 1650 ZE follows Hako’s multifunctionality principle. Whether collecting light debris and leaves, scrubbing and removing particularly stubborn dirt or oil spills, or clearing roads and paths from small amounts of snow – the Citymaster 1650 ZE carries out a wide range of municipal tasks in all seasons.



Technical data Citymaster 1650 ZE	
Engine	All-electric/50 kW
Vehicle drive system (type/formula/Vmax.)	All-electric via 2 rear-wheel motors/40 km/h
Chassis, general	Chassis with fully hydraulic articulated joint, semi suspended chassis with coil springs and shock absorbers, quick-change system for attachments
Dimensions basic unit (L x W x H)	3,829 x 1,210 x 1,970 mm
Weight basic unit (GVW/payload)	3,500 kg/up to 1,360 kg
Driving licence	Class B

Pleasantly quiet

For applications in noise-sensitive environments: electric drive plus “silent brooms” for low noise values – also inside the cab.



Citymaster 2250

The Citymaster 2250 simply offers more in the 6-t class: more room and comfort for the operator, more safety and application options for more economic efficiency. Whether sweeping, wet cleaning or winter service: the multi-functional implement carrier with all-wheel steering convinces with heavy-duty, high-quality components and professional functionality in any situation. Offering plenty of space with variable utilisation options, state-of-the-art air conditioning, intuitive operating elements and sophisticated safety features such as large windows and an intelligent wing mirror concept, the crash-tested cab has been designed to provide excellent user comfort.



Made for the driver: various seating configurations – including comfort or emergency seats – and with or without storage options - not only provide variable utilisation options but also offer the driver significantly more space in the cab.

Clean results on all levels

When used as a sweeper, the Citymaster 2250's large 2-cubic metre dirt hopper is impressive in itself. Equipped with a 2 or 3-broom sweeping unit, the Citymaster 2250 easily cleans even difficult-to-access areas or traffic islands and multi-level surfaces. The circulating water system prevents dust from rising and ensures optimal dust control.



D = 2.52 m

Great performance, small turning circle: thanks to its compact dimensions and all-wheel steering.

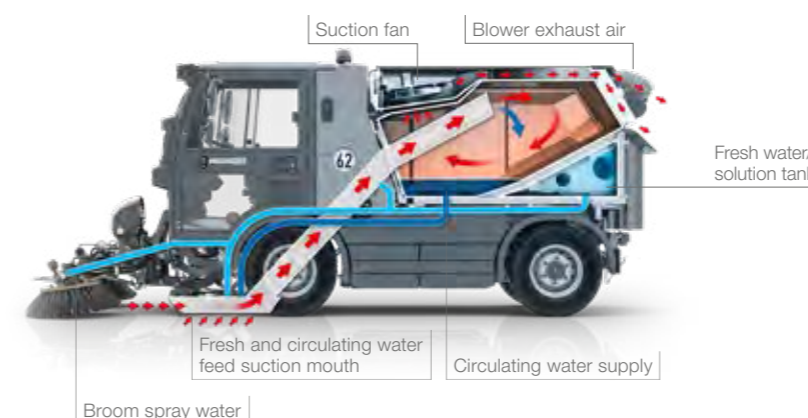
Provides excellent flexibility: equipped with a 2 or 3-broom sweeping unit, the Citymaster 2250 can access all areas.

For effective chemical-free removal and direct collection of weeds: the mechanical weed broom.

Accurate performance from collection to disposal

The broom sweeps dirt and debris in the path of the suction mouth, from where it is transferred directly into the dirt hopper. The hopper can be filled to 100% to provide long emptying intervals. When finally filled to capacity, a remote control provides safe, uncomplicated and contact-free emptying and disposal.

Technical data Citymaster 2250	
Engine	Diesel/80 kW
Vehicle drive system (type/formula/Vmax.)	Hydrostat/rear wheel drive with optional differential lock/ 62 km/h with rpm reduction
Chassis, general	Ladder frame chassis with hydraulic front wheel or all-wheel steering, fully suspended chassis with coil springs and shock absorbers, quick-change system for attachments
Hydraulic system (power circuits)	2/90 l/min/200 bar
Dimensions basic unit (L x W x H)	3,975 x 1,330 x 2,095 mm
Weight basic unit (GVW/payload)	6,000 kg/up to 3,365 kg
Driving licence	Class C/C1/C1E//Class B/L as work machine 25 km/h





The basis for multifunctionality is our quick-change system – for example as a front lift with attachment plate according to DIN EN 15432-2 providing lifting, lowering and swivel functions to facilitate easy connection of front attachments.



Multicar M29 Multicar M31 Euro VI-E Multicar M31 Euro VI-E Hydrostat Multicar M41

Only a Multicar can do that

Three basic models are available to meet the highest demands in terms of comfort, safety, robustness and efficiency: ranging from compact and manoeuvrable to extremely powerful and professional, and equipped with our unique Hydrostat-ABS, ESC and independent suspension at the front axle. Both the Multicar M29 and M31 models comply with the strict ECE guidelines regarding occupant protection and high-quality braking systems, which have obtained EC type approvals. No matter which model you choose: it's always the right one.


Multicar

Sweeping in the spring, green area maintenance in the summer, collecting leaves in autumn, providing winter service in the cold season, or carrying out different transport tasks throughout the year – thanks to the interfaces suitable for universal use, the Multicar can easily be re-tooled for every application. A wide range of different attachments, driven by either the powerful on-board hydraulic or electrical systems, can be connected to the vehicle with effortless ease. Our customers decide what they want their Multicar to look like. We will be happy to assist you in finding the right solution for your individual needs.

Everything in view, all under control: centrally arranged operating elements and displays ensure both ease-of-use and short response times.

Made for the operator: adjustable seats, height-adjustable safety belts as well as an adjustable steering column – all very practicable features, especially when the vehicle is often operated by different drivers.


For a long service life: High-quality, robust materials, a sturdy design, wear-reducing technologies and our Hako full-service packages ensure that Multicar vehicles can be used efficiently for many years to come.




One for All



Sweeping



Wet cleaning



Winter service



Green area maintenance



Transport



Waterjet technology



Weed control



Side tipper for quick, controlled unloading – even in confined spaces.



Minimal effort for a high payload: thanks to the quick-fit mounting of superstructures directly onto the chassis.



Ease-of-use: all of the machine's functions as well as the hydrostatic drive are easily and centrally controlled via a joystick.



The easily accessible controls and intuitive operating logic increase user-friendliness and working comfort.



The standard full LED lighting optimally illuminates the working area at any time of day.



More freedom of movement: in the spacious cab with a customisable passenger area.

Multicar M29

No matter what the seasonal challenge: Thanks to its modular concept, the multifunctional narrow-gauge implement carrier Multicar M29 masters any task with extreme flexibility. And it does so with the highest level of safety – oriented to the high standards that also apply to the construction of trucks. The vehicle's large driver's cab, for example, offers maximum occupant protection, which has been confirmed in safety tests according to ECE R 29 by DEKRA. All-wheel drive, disc brakes, a new type of hydrostatic ABS and heavy-duty axles are also part of the safety concept – for stable driving and braking behaviours in every situation, confirmed by tests according to ECE R 13.



The machine has the excellent manoeuvrability of a lorry implement carrier – and gets you around every corner easily thanks to all-wheel steering.

Sufficient space for maximum performance

A width of only 1.33 m and a turning circle of only 3.25 m enable the Multicar M29 to be used on narrow roads, farm tracks and cemeteries. The vehicle can handle payloads of up to 3.2 t. When going steeply downhill, the hydrostatic drive with variable hydrostatic braking force protects the service brake. This is an advantage on uphill gradients as well: by means of mechanical reduction, the working speed can be precisely adapted to the tasks, freeing up additional tractive power reserves.

Technical data Multicar M29	
Engine (type/output/exhaust gas cleaning system)	Diesel/80 kW/DOC, DPF, SCR
Engine drive (type/formula/Vmax.)	Hydrostat/4x2 (4x4)/62 km/h
Exhaust emissions (standard)	EURO VI, stage E
Attachment docking system	front lift (attachment triangle/plate), tilt cross member, rear mounting frame
Work hydraulics	up to 2 work circuits (max. 110 l/min at 300 bar)
Dimensions basic vehicle (L x W x H)	3,955 x 1,330 x 2,090 mm
Weight basic vehicle (GVW/payload max.)	6,000 kg/3,150 kg
Driving licence	Class C/C1/C1E



Economical in use – and quickly off to the next job site with a top speed of 62 km/h: the Multicar M29.



Great performance in open terrain

Multifunctionality, economic efficiency and dynamics in a compact form: With a total towing weight of up to 7.5 t, variable, powerful hydraulics, three attachment points for countless implement combinations and a top speed of 90 km/h, the Multicar M31 is just as powerful a partner in the winter as it is in spring, summer and autumn. The version Multicar M31 Hydrostat with hydrostatic drive and unique Hydrostat ABS is a particularly safe option when it comes to working in slippery, uneven terrain. Two different driving modes and a mechanical crawler gear ensure that the vehicle always works at optimum speed.



Snow clearance: effective clearance of footpaths and roads.

Versatility only a Multicar can offer: from weed control using hot steam to common tasks such as green area maintenance and repair work on lifting platforms.

Multicar M31

The Multicar M31 redefines performance in the 6-t class by setting new standards: With its fuel-efficient turbo diesel engine, various exhaust gas purification systems such as a diesel oxidation catalytic converter, SCR-coated diesel particulate filter and second SCR catalytic converter, it fully complies with the Euro-VI-E standard for lower exhaust gas values without sacrificing performance! This makes municipal use even more sustainable and future-proof.



Comfortable workplace

Comfortable working increases efficiency – this is why we have integrated a number of comfort features into the Multicar M31 as standard: from the smooth power steering to the spring-mounted independent spiral suspension and the ergonomic comfort cabin with individually adjustable seats and practical storage compartments in the doors and centre console.

For better air quality

To comply with the strict limits of the Euro VI standard, various exhaust gas after-treatment systems have been integrated, such as a diesel oxidation catalyst, an SCR-coated diesel particulate filter and a second SCR catalyst.



Technical data Multicar M31/M31 Hydrostat	
Engine (type/output/exhaust gas cleaning system)	Diesel/110 kW (Hydrostat: 108 kW) DOC, DPF, SCR
Engine drive (type/formula/Vmax.)	5-gear/4x2 (4x4)/90 km/h (Hydrostat: 4x2 (4x4)/70 km/h)
Exhaust emissions (standard)	EURO VI, Stage D
Attachment docking system	front lift, ball coupling system, rear brackets
Work hydraulics	up to 2 work circuits (max. 110 l/min at 300 bar)
Dimensions basic vehicle (L x W x H)	4,115 (4,660) x 1,630 x 2,200 mm
Weight basic vehicle (GVW/payload max.)	5,600 kg/to 3,100 kg
Driving licence	Class C/C1/C1E



EURO VI-E

Euro VI-E emissions standard
The Multicar M41 meets the strict requirements of the Euro VI-E emissions standard.

Multicar M41

Versatile, uncompromisingly powerful and consistently designed for everyday work: the Multicar M41 combines high payload, compact design and modern drive and operating concepts with an economical solution for a wide range of applications. Whether in urban environments, on construction sites or in demanding terrain – with its intelligent technology, intuitive operation and well-thought-out safety features, this all-rounder impresses with its efficiency, comfort and control for year-round use.



Comfort meets safety

Ergonomic, intuitive controls make the driver's daily work easier, whilst innovative features make working noticeably safer – even in challenging traffic situations. Optional driver assistance systems and well-thought-out details help to minimise risks, improve visibility and make the working day significantly more comfortable.

Up to any task

Whether in urban areas, gardening and landscaping, on construction sites or in waste disposal: thanks to universally usable interfaces, the Multicar M41 can be configured with a wide range of attachments and superstructures for economical year-round use. Supported by its high payload, precise driving and drive concept, and extensive operating and safety features, it handles changing tasks efficiently, comfortably and safely at all times.



Flexible in the maintenance of green areas

Powerful, reliable and safe against ice and snow

Suitable for a wide range of transport tasks – including use with a loading crane or gripper

Powerful performance in all conditions

The continuously variable drive makes an immediately noticeable difference: the speed – and with it, the engine speed, can be adjusted to the task at hand without changing gears. This ensures a high level of driving comfort, constant traction and optimum control, especially when carrying out precision work. The user can concentrate fully on the task at hand, experiences less fatigue and works more safely. Further positive effects: more efficient fuel consumption and less wear and tear.

With a top speed of 90 km/h, the Multicar M41 can also be used on motorways and expressways.



Sensitive control via the drive lever

- 1 + 2 Longitudinal deflection determines the direction of travel
- 3 Reversing via transverse deflection
- 4 Cruise control via transverse deflection

Technical data Multicar Multicar M41	
Engine (type/output/exhaust gas cleaning system)	Diesel FTP/129 kW
Engine drive (type/formula/Vmax.)	Drive system: 4x4 (permanent all-wheel drive/hydrostatic-mechanical, continuously variable/0–90 km/h
Exhaust emissions (standard)	Euro VI-E
Attachment docking system	Front lift, attachment plate, rigid mounting plate, tilting cross-member, quick-change system for superstructures
Work hydraulics	up to 2 work circuits, (max. 110 l/min at 200/300 bar)
Dimensions basic vehicle (L x W x H)	5,120 x 2,037 x 2,360 mm
Weight basic vehicle (GVW/payload max.)	7,490 kg/4,250 kg
Driving licence	Class

Hako-Fleet-ready!

As the size of the machine fleet increases, so does the importance of effective management. Hako-Fleet-Management helps you to manage your fleet efficiently, coordinate its deployment and keep an eye on all relevant key figures in real time. As a central machine management tool, it ensures fully automated transparency and provides the data basis for optimising the use of resources. For increased efficiency, reduced costs and more sustainable fleet management.



More graphics, improved visualisations and interactive analyses for faster insights

The module **view.X** supports economically efficient utilisation and management of your fleet. All evaluations are available online 24/7, and are easy to retrieve thanks to the tool's intuitive user interface

- Cost/budget management
- Service and maintenance history management
- Excel export including information on costs and operating hours
- Mapping of organisational structures with rights allocation
- Viewing and maintaining contract data
- Pre-setting of recurring appointments
- E-mail notification in the event of changing machine conditions
- Service requests can be made (and traced) directly from the portal
- When service is required, direct transmission of machine status and service codes to regional service technicians



The **view.X.live** module makes organising the fleet both simple and efficient – with a modern, clearly designed user interface and optimised dashboard, clearly structured graphical display of information, rapid availability of data and detailed filtering options for optimum use and analysis of route information.

- Live operating times and statuses
- Location and route information (GPS)
- Cost/budget management
- Management of service and maintenance history
- Excel export including information on costs and operating hours
- Mapping of organisational structures with assignment of rights
- Maintenance and view of contract data
- Accurate hour-by-hour recording of operating times
- Notification when service and maintenance intervals are exceeded
- Live messages about availability with service and event codes
- Alarm function for recurring inspections/maintenance
- Specially customised display for the Scrubmaster B75 i autonomous scrubber-drier with cleaning report and resource display
- Keeping performance records



The **entry.X** module (optional) allows only authorised users to use the machine. By providing a structured usage framework, the electronic machine access authorisation helps to make fleet operation safer, more efficient and more cost-effective.

Service from the professionals makes the difference!

Excellent service from Hako turns a premium quality machine into a top solution that fulfils all your requirements: with competent service technicians in the field, in fully equipped workshops, with a regular contact person and with uncomplicated, solution-oriented processing of your service requests.



Customer service – full availability, full security

Our qualified service technicians are available for you around the clock. Another big plus: our efficient spare parts logistics, which delivers spare parts overnight if the worst comes to the worst.

Customised and scalable services for:

- Maximum machine availability and high efficiency
- Cost transparency and greater cost-effectiveness
- Improved quality of results
- Sustainability in use and through extended service life and value retention of your machine



220 mobile service technicians with the shortest response times

- Qualified service technicians – optimally prepared thanks to efficient deployment planning
- Fully equipped service vehicles with suitable spare parts for all common service cases
- Fast and professional troubleshooting

Renting instead of buying!

- Short-term hire for increased flexibility – the fleet can be quickly adapted to changing needs
- Always the latest technology at hand
- Lower investment costs and thus protection of liquidity
- Cost certainty and predictability
- All-round carefree package with maintenance and service contracts



Service is our DNA

Your satisfaction is our benchmark. That's why you get much more than a top product from Hako: you get a solution that always fits perfectly; to suit you, your goals, the area of application and our machines.



Hako



For a clean future

To ensure that our solutions meet the increasing demands for sustainability, we are constantly developing them further: in dialogue with our users, closely oriented to current trends, and by taking into account the requirements of the future. That is why we are constantly driving our research and development in the direction of efficiency-increasing and even more environmentally friendly measures as well as important future topics – for example, electromobile solutions in Municipal Technology or digitalised processes.

Far ahead even today

Taking more responsibility for the environment: due to their low emission values and minimal noise levels, our vehicles can work also in environmental zones and other sensitive areas.



We are also active in the field of Cleaning Technology and Waterjet Technology

The requirements for professional indoor and outdoor cleaning are just as extensive as the options we offer our customers: from sweepers and vacuum sweepers to scrubber-driers and combination machines to efficient waterjet technology for use in industry and commerce.

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Blue Competence is an initiative of VDMA (www.vdma.org). By engaging in this partnership, we are committed to comply with the twelve sustainability principles applied in the field of mechanical and system engineering (www.bluecompetence.net/about).

For the sake of readability, Hako has opted for gender-neutral terminology throughout this document. This includes all people, regardless of their gender or identity.

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