RAUSCH INTERNATIONAL GROUP

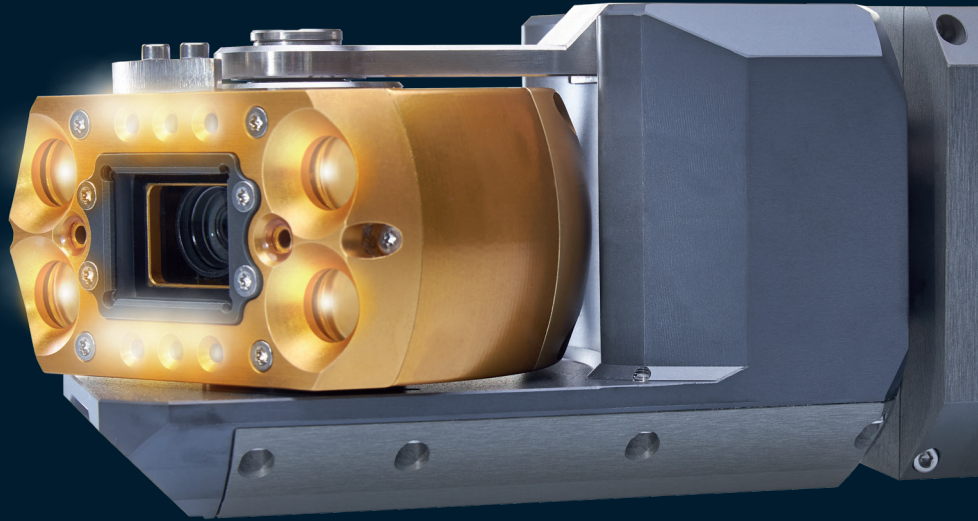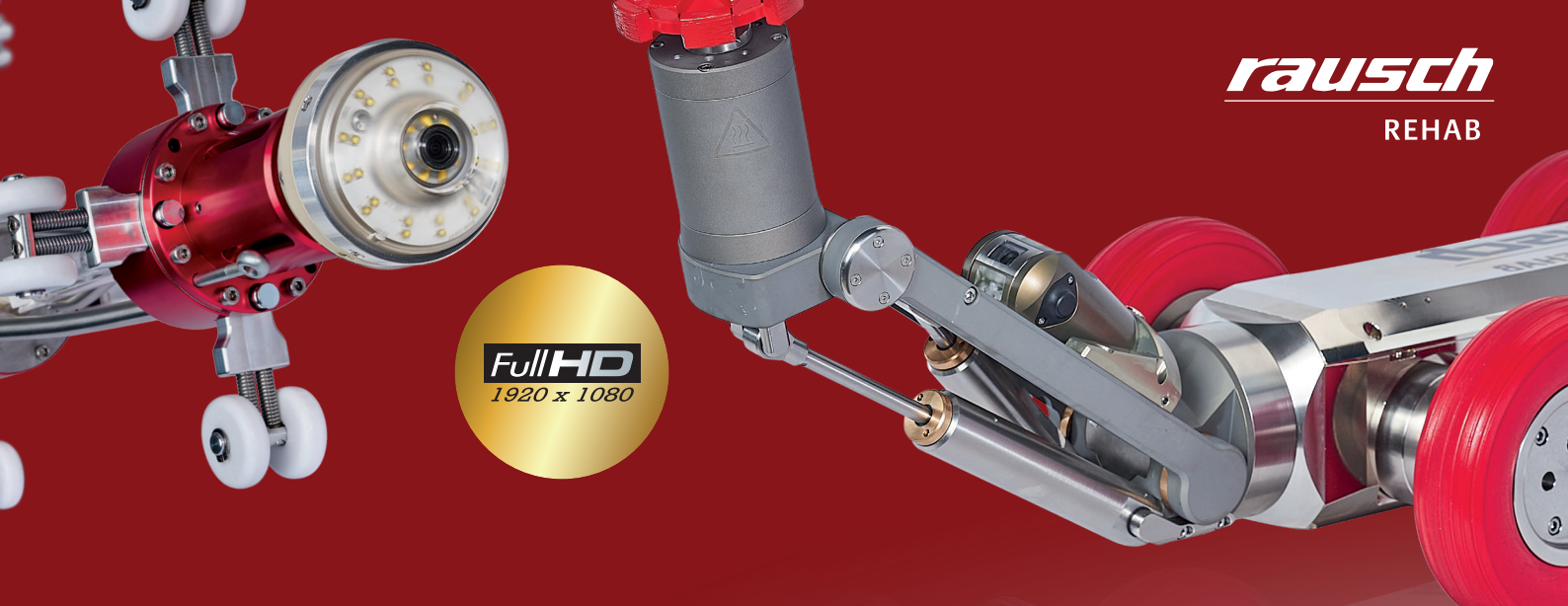*rausch*

Full HD
1920 x 1080

minCam

rausch

REHAB

Full HD
1920 x 1080

WE ARE UNIQUE.
WORLDWIDE.

The companies operating under the umbrella of RAUSCH INTERNATIONAL GROUP are, Rausch GmbH, minCam GmbH, Rausch Rehab GmbH and Rausch Electronics LLC, they develop and produce innovative products in the field of CCTV inspection systems and Leak testing systems, Cutters and UV curing technology for liners, all to enhance optical pipe and sewer inspections and trenchless sewer rehabilitation.
The perfectly coordinated technologies aim to keep the most valuable infrastructure, the sewage network, in good working order, to prevent negative influence to the environment and people.

DURABLE
SUSTAINABLE
CLEVER

INNOVATIVE TECHNOLOGY.
SAVES THE ENVIRONMENT.

CONTENT

RAUSCH INTERNATIONAL GROUP

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minCam

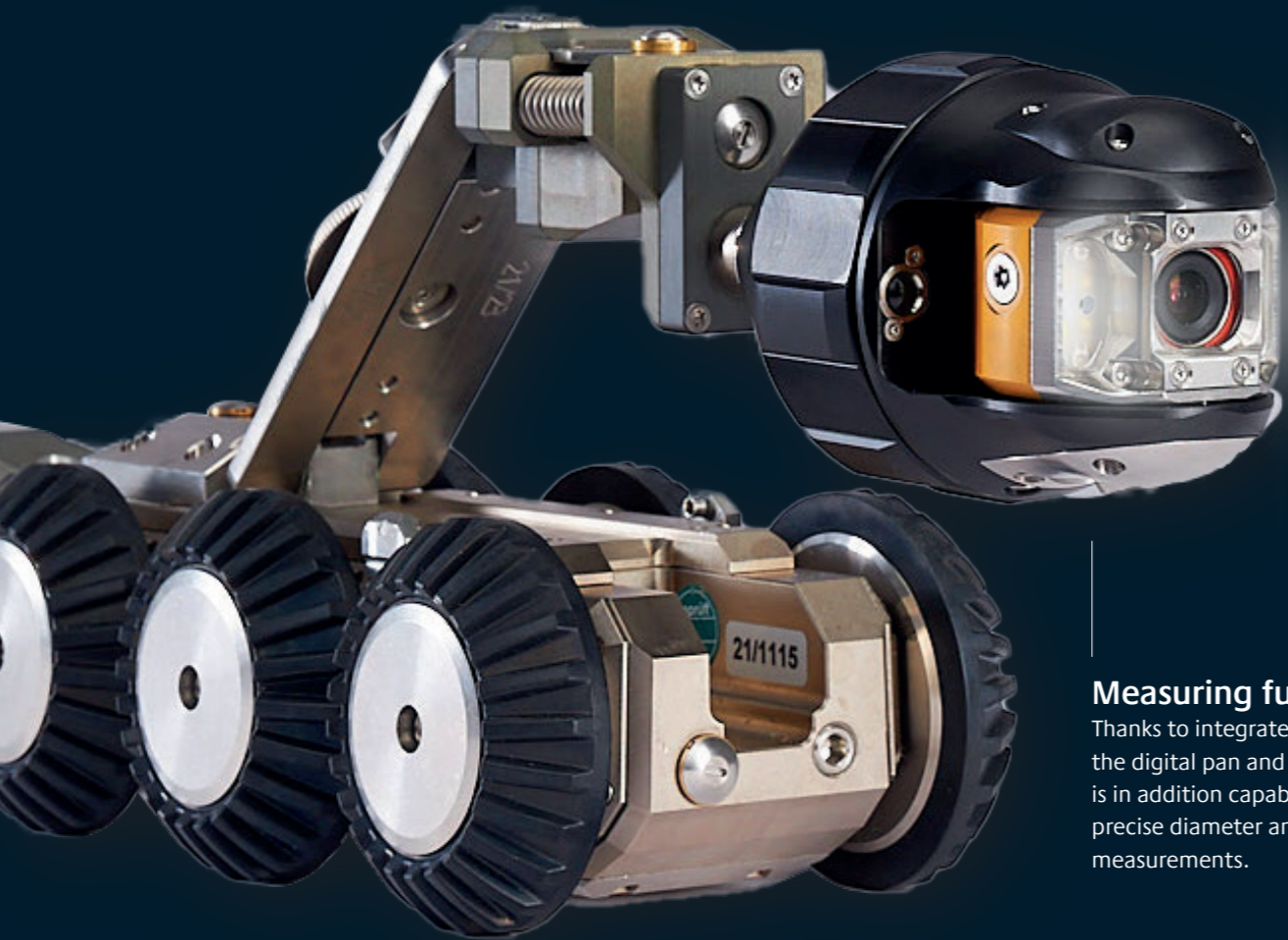rausch REHAB

rausch USA

DART SYSTEMS

RAUSCH IS THE FUTURE.
AND THE FUTURE IS NOW.

High-resolution, precise, modular, and efficient - Rausch sets new standards in sewer inspection and control technology. Rausch's developments ensure inspections at the highest level, in pipe systems from 50 to over 3000 mm. They are the result of company spirit, to invent, consistent progress and adaptation of proven systems to current market requirements. Razor-sharp images of the world's first transmission in full HD quality with copper cables without optical fibers, promise inspections at the highest level. The result: razor-sharp image quality, perfect recording, and documentation of the inspection, easy to handle, simple service, minimized maintenance costs. Vehicles with a wheelbase of 3,600 mm achieve a total weight of only 3,100 kg, even when fully built out, thanks to lightweight construction with innovative honeycomb technology.

rausch

EFFICIENT INSPECTION

Mainline sewer inspection
100 – 600 mm

COMBINATION

Crawler FW 90

· 100 – 600 mm
· 3 drive axles
· Manuel/automatic steering function
· Stepless automatic reverse drive due to reversing mechanism
· 30° bends from 150 mm
· Camera quick connect
· Mechanical camera height adjustment

· Electric lift gear
· Rear view camera
· Tilt sensor
· Temperature measurement
· Additional lighting
· Internal pressure monitored

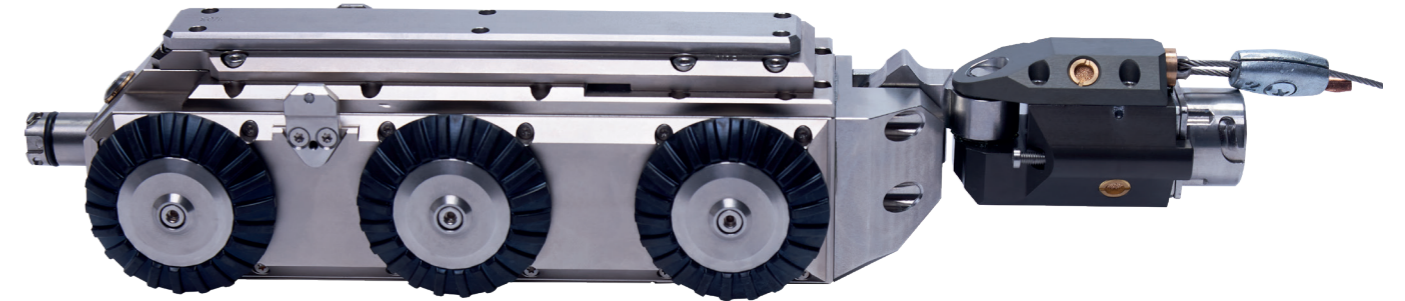### **Measuring function**
Thanks to integrated laser diodes, the digital pan and tilt camera KS 60 is in addition capable of doing precise diameter and damage measurements.

**Option:
Atex**

Camera KS 40

· From 75 mm
· Resolution: over 420 TV lines
· 90° bends from 90 mm
· Attachable pin
· 33 kHz and 512 Hz locating
· Robust lens module without moving parts = Liquid lens
· 2 laser diodes for precise measurement
· Manual and automatic focus
· Integrated 3D sensor for LATRAS
· Internal pressure monitored

Camera KS 60

· 100 – 600 mm
· Pan and tilt camera
· Resolution HD: 1920 x 1080 Pixel
· Resolution SD: over 530 TV lines
· Manual and automatic focus control
· 2 laser diodes for measurement
· Multiple zoom
· Integrated positioning: 33kHz and 512 Hz locating
· Integrated 3D sensor for LATRAS
· Internal pressure monitored

FullHD
1920 x 1080

MODULAR INSPECTION

COMBINATION

Mainline sewer inspection
135 – 3000 mm

The crawler FW135 is the base for mainline- and lateral launch inspection with only one crawler from 135 up to 3000 mm

Crawler FW 135

- · 135 – 1600 mm
- · Extension with Lafette up to 3000 mm or 118"
- · Manuel/automatic steering function
- · Stepless automatic reverse drive due to reversing mechanism
- · Camera quick connect
- · Electric lift
- · Rear view camera
- · Tilt sensor
- · Temperature measurement
- · Internal pressure monitored
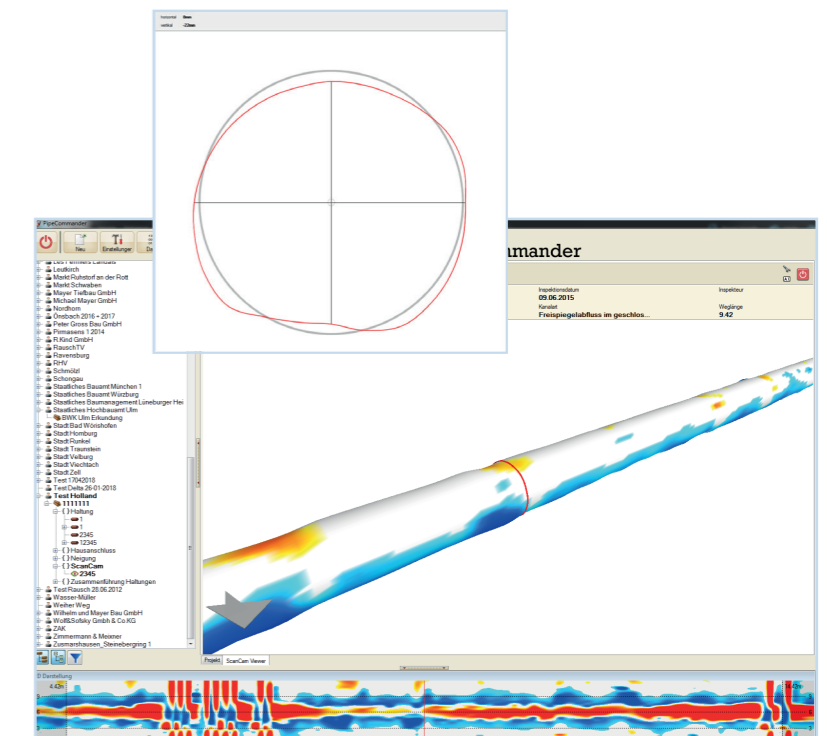- · Option: M series for Lateral launch

Camera KS 135

- · 135 – 3000 mm
- · Pan and tilt camera
- · Resolution HD: 1920 x 1080 Pixel
- · Resolution SD: over 530 TV lines
- · 2 laser diodes for precise measurement
- · Zoom: 10x optical and 12x digital
- · Wireless additional lighting
- · Option: variable camera head turning speed for deformation measurement
- · Lens with automatic iris, auto focus, manual focus
- · Internal pressure monitored

Full HD 1920 x 1080

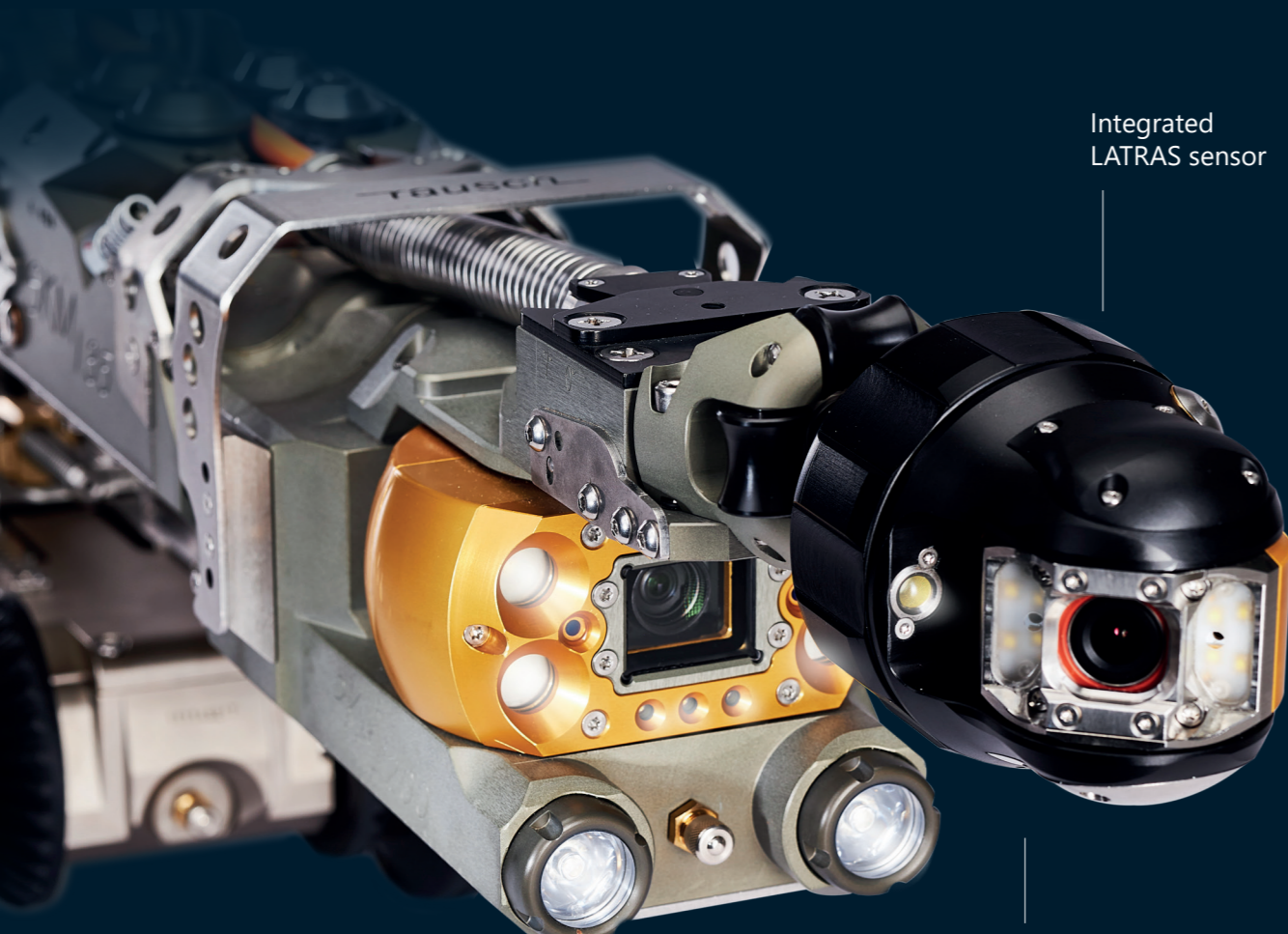**Option: Atex** ⬡Ex

Deformation measurement

Option scanning function:
- · Deformation measurements of complete reaches with visual representation of the deformations
- · Selective evaluation of deviations
- · Determining the diameter
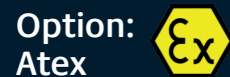
8   9

M-SERIES

COMBINATION

from 135 mm

With the M-Series, CCTV inspections of mainlines
as well as building connection lines can be conducted
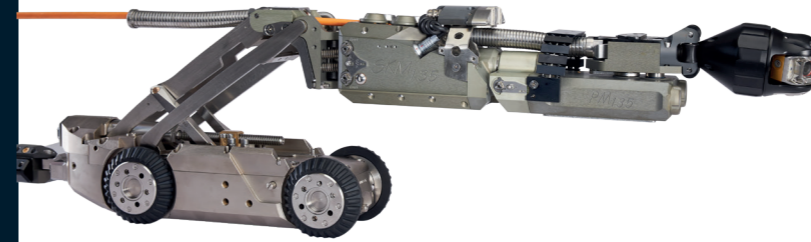from the mainline in one single operation.

Full **HD**
1920 x 1080

Integrated
LATRAS sensor

Satellite system with PM 135

· 135 – 1200 mm
· Crawler FW 135 with electric lift
· Pan and tilt camera KS 40 or KS 60
· Inspection of house connections
· Observation camera ZKM 135
· Cable feed module SKM 135
· Tilt and positioning module PM 135

Satellite system with PKM 200 HD

· 200 – 1800 mm
· Crawler FW 135 with electric lift forms the base
· Pan and tilt camera KS 40 or KS 60
· Inspection of house connections
· PKM 200 HD to ensure the exact positioning of the lateral launch camera and inspects mainlines from 200 mm

Jetting system

Parallel cleaning and inspections of the lateral
connection directly from the mainline.

Dual jetting lateral system

The dual jetting lateral system of the M-Series for
cleaning lateral connection before the inspection.

Optional: HD
Complete M-Series available in HD:
KS60 HD, KS135HD, PKM 200 HD.

Option: Atex €x
As an option, all modules of the M-series
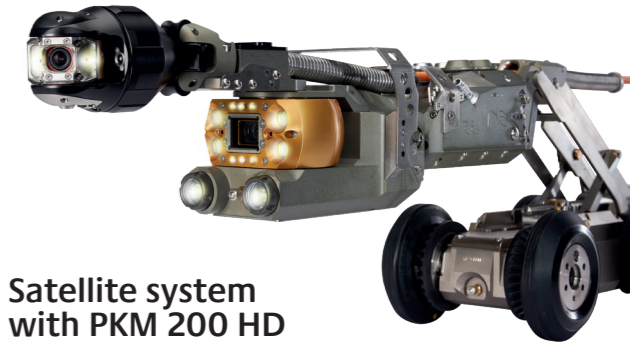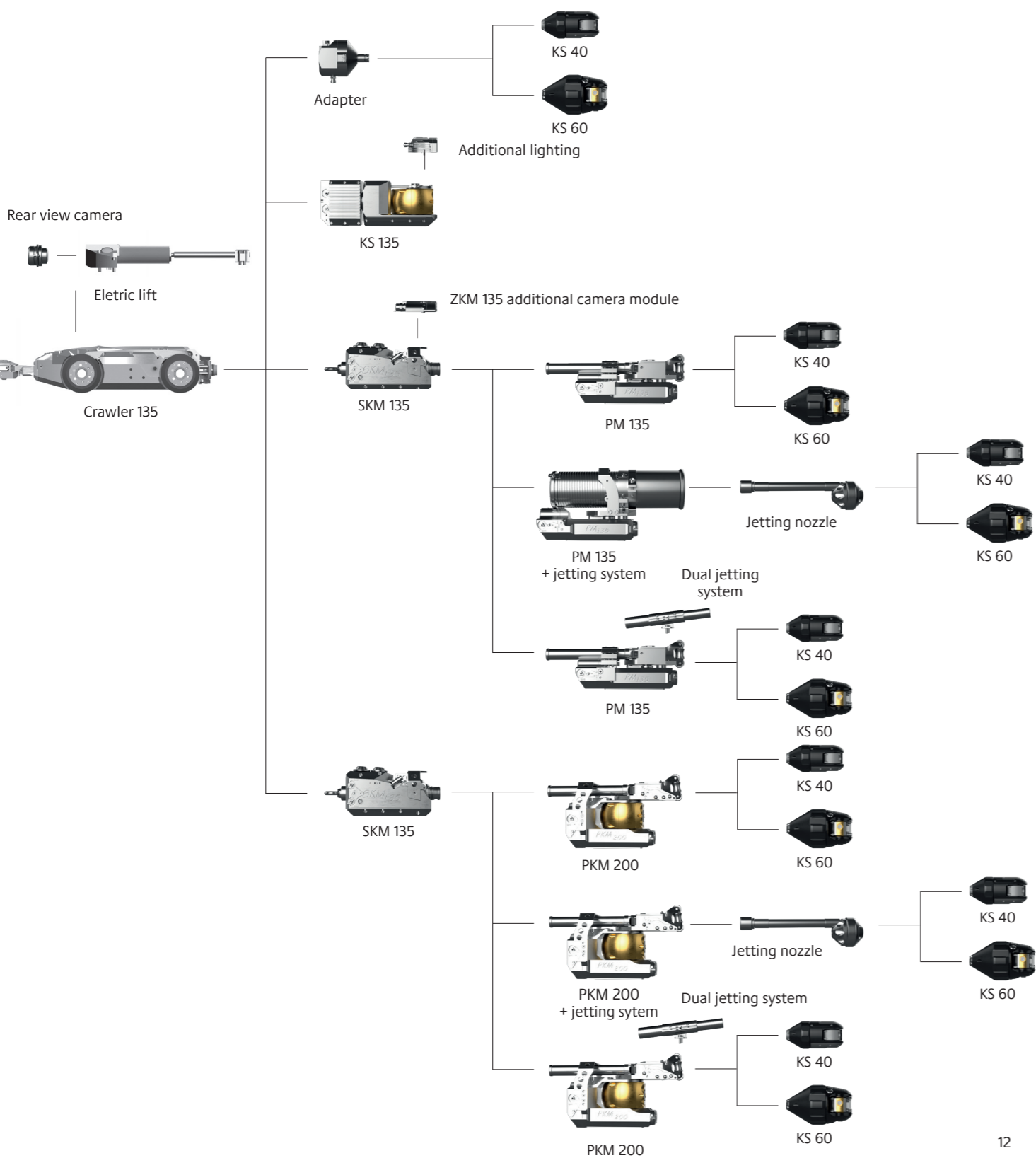are available in Ex-protection version
according to directive 2014/34/EU.

M-SERIES

from 135 mm

With the modular concept of the M-Series,
the crawler FW 135 can cope with all challenges
and demands of lateral launch.

KS 40

KS 60

Adapter

Additional lighting

Rear view camera

KS 135

Eletric lift

ZKM 135 additional camera module

Crawler 135

SKM 135

PM 135

KS 40

KS 60

KS 40

Jetting nozzle

KS 60

PM 135
+ jetting system

Dual jetting
system

PM 135

KS 40

KS 60

SKM 135

PKM 200

KS 40

KS 60

KS 40

Jetting nozzle

KS 60

PKM 200
+ jetting sytem

Dual jetting system

KS 40

KS 60

PKM 200

LATRAS

**3D inspection with integrated sensor
in the camera head**

This sensor locating system for automatic measurement and graphic display of
the pipe routing of lateral connection pipes is used with the proven KS 60 camera
with integrated 3D sensor. These xyz coordinates are permanently registered in
parallel with the inspection and allow the line routing to be automatically recorded
simultaneously and without significant additional effort for the inspector and
displayed in the PicoMaps map module.

LATRAS

· Integrated LATRAS sensors in the camera KS 40 and KS 60
· Feed technology with push or flush operation possible
· Determination of direction and inclination angles
· Distance measurement via incremental encoder with
  an error accuracy of less than 0.5%
· Online progress measurement in PicoMaps with xyz coordinates
· Measurement recording possible during forward and reverse travel
· Recalibration of the measurement result via
  endpoint determination
· Location probe optional with transmission frequency
  of 512 Hz or 33 kHz
· Operation on Rausch satellite systems
· Push operation possible
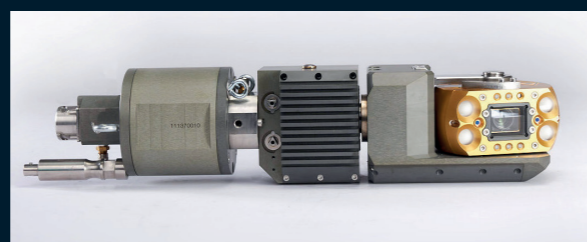· Operation on Omicron possible
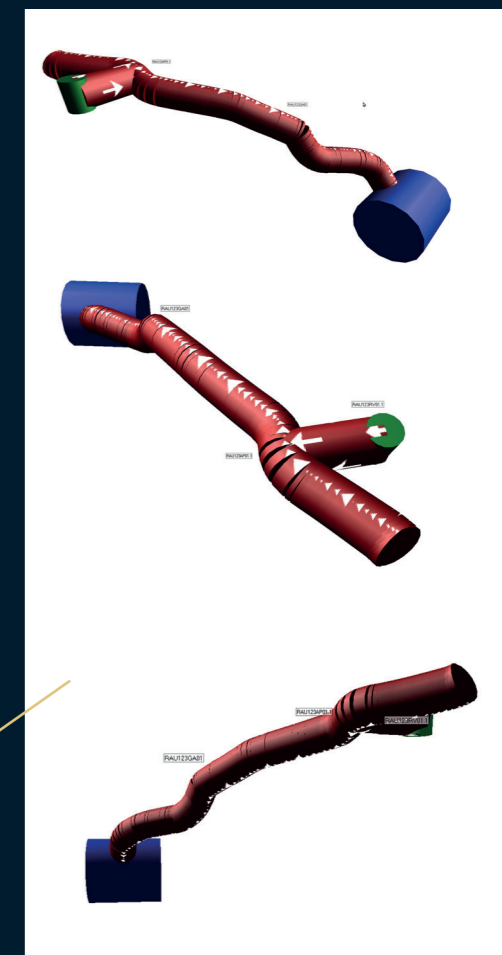
Interactive 3D view possible.
Three examples above.

ADDITIONAL
COMPONENTS

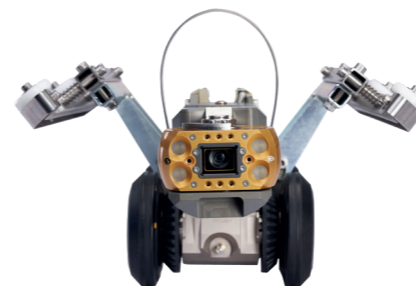## ACCESSORIES

Lafette
For inspections
up to 3000 mm
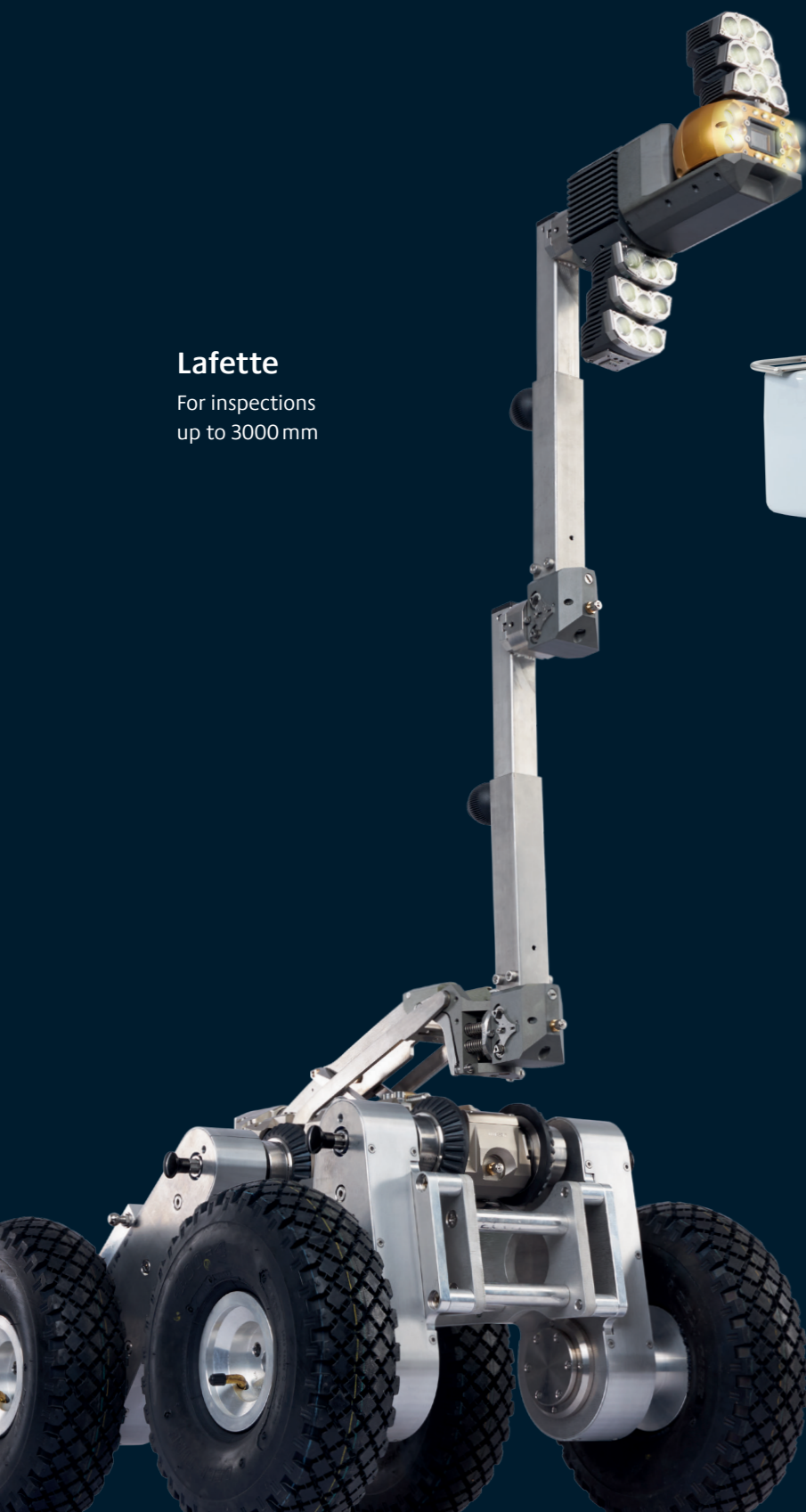
Camera raft
Application range from 600 mm for
transporting a KS 135 through large
water-bearing profiles.

Adapter, main cable
Used for walk-in sewers with optional
audio transmission. Multifunctional
for shaft inspection and camera raft
manhole.

Attachment for egg shaped profile
from 200/300 mm up to 900/1350 mm
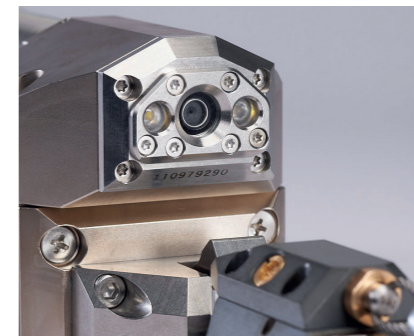
Rear view camera
Application range from 150 mm

Additional weights
from 150 mm 1,5 kg
from 200 mm 6,6 kg

Wheels
Suitable wheels for all pipe diameters
and conditions.
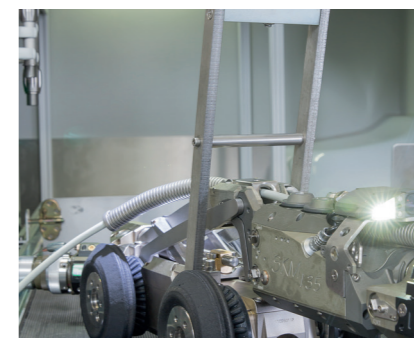
Lowering/lifting hook
For easy insertion of the crawlers
into the sewer.

Height extension
For centered camera position
in larger diameters.
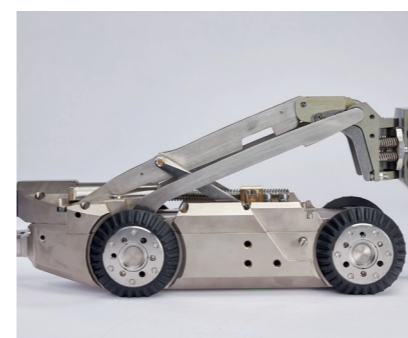
Electrical lifting gear
Continuous camera positioning
from 150 mm.

Quick connect
The camera system can be changed
in the shortest possible time using
a wireless quick-release technology.
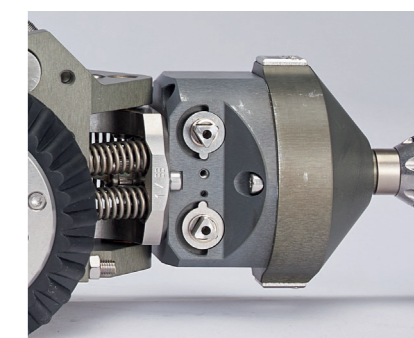
KS 60 Adapter
For mounting the KS 60 camera
on the 135 crawler.

14

15

PRODUCT LINES

RAUSCH TAB

RAUSCH BASIC
Mobile system push and drive

+ Rausch-Tab

RAUSCH MOBILE
Mobile electric cable drum with 300 m camera cable

+ Rausch-Tab

RAUSCH COMFORT
Van build-system with telescopic swivel arm and chain winch

+ Rausch-Tab

RAUSCH PREMIUM
Van build-premium system in FULL-HD

Full HD
1920 x 1080
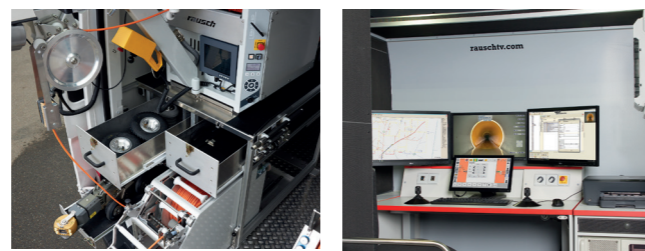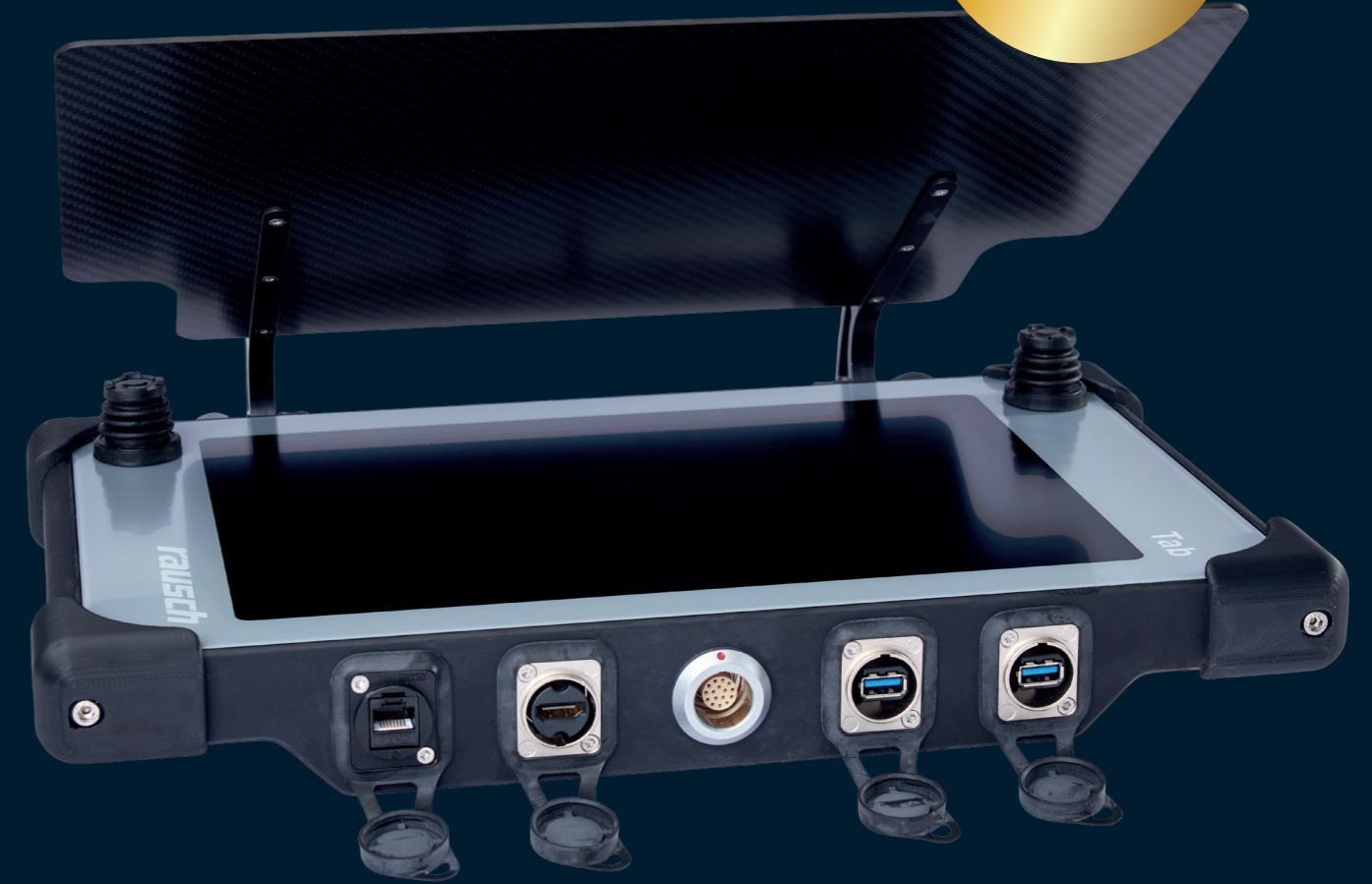
RAUSCH-TAB

- · 12.1" touch screen display
- · Integrated PC
- · Operating system: Windows 10
- · Multifunctional joysticks
- · Easy to remove for office work
- · Standard basic software
  for image, video and PDF creation
- · Expandable with fully integrated
  inspection software PipeCommander
  or any other third-party-system
- · Bracket for mounting on the cable drum
  Omicron, Cubix 300 or vehicle installations

- · Wi-Fi capable, LAN capable, USB, HDMI
- · Determining the diameter
- · Inclination, temperature and laser
  measurements with internal PC
- · Deformation measurement across the entire reach
- · Dimension: 410 x 250 mm
- · Type of protection: IP 64
- · Control unit for Omicron Cubix 300, Elka 600
- · Mobile solution for main lines and lateral inspection
  in Full HD
- · Remote service check
- · Option: external joysticks

RAUSCH BASIC

Omicron push + Omicron drive
from 50 mm

Ex Option: Atex

OMICRON

The Omicron combines two worlds in one TV inspection system and is the first system in the world in full HD for pipe and sewer inspections in push and crawler operation.

· Mobile system with compact transport dimensions
· Removable basket with quick release fastener
  as well as the simple quick-change system of the wheels
  support purposeful, effective working
· Thanks to the variable folding option and rotating
  capability of the holder, the Rausch-Tab can be optimally
  adapted to the operating conditions
· The foldable handle and the skids for stairs make
  the Omicron easy to handle
· Rechargeable battery operation with exchangeable battery
· Mains adapter

Omicron crawler operation

· Crawler operation from 100 mm
· Crawler FW 90
· Camera KS 40 or KS 60
· Up to 200 m camera cable
· Manuel guidance
· Crank handle
· Path length measurement in mm resolution
· Internal pressure monitored

Full HD
1920 x 1080

Omicron push mode

· Push mode from 50 mm
· Pan and tilt camera: KS 40, KS 60
· Axial view camera: SAT 42
  with horizontal picture
· Up to 80 m push cable
· Path length measurement
  in mm resolution
· Expandable with LATRAS for
  lateral route measurement
· Determining the diameter
· Internal pressure monitored

RAUSCH MOBILE

100–3000 mm

CUBIX 300

· Electric cable drum with up to 300 m camera cable
· Control panel with status display
· Foil buttons for the operation from the rear area
· Electric and manuel brake
· Remote control
· Cross guide spindle and folding arm
· Option: Radio remote control
· Dimension: 425 x 425 x 480 mm
· Weight: 67 kg incl. 300 m camera cable

Vehicle extensions

Studio

· Power supply with lithium-ion batteries
· Charging via the standard alternator

Rear area

· Finishing with high-quality aluminum profiles
  and pull-outs for crawlers and accessories
· Rear monitor
· Folding rain and sun protection canopy
· Water tank for cleaning

RAUSCH COMFORT

Telescopic swivel arm

100 – 3000 mm

Full HD 1920 x 1080

ELKA 600

· Up to 300 m camera cable
· Fully synchronized built-in cable drum
· Designed for Rausch van builds

Technical details

· Integrated 8" LCD monitor
· LED work light
· Telescopic swivel arm
· Integrated chain winch with 20 meter
  chain length for lifting and lowering
  camera and crawler
· Remote control, optional wireless
  remote control
· Unwind aid
· Electrical & mechanical drum brake

RAUSCH PREMIUM

CCTV inspections from 100 – 3000 mm
Lateral launch system from 135 – 1800 mm

Full HD
1920 x 1080

RCA 4.0

· Full-HD transmission with copper cable without fiber optics
· Resolution HD: 1920 x 1080 Pixel
· Based on the VML technology specially developed an patented for this purpose
· Elka cable drum with up to 500 m camera cable
· Pressure test: sleeves, reaches, manholes, house connection

Result:
· Razor sharp image quality
· Exact recording and documentation of the inspection
· Minimized maintenance costs
· Remote service check

Technical details

· RCA 4.0 technology in the studio
· Digital video technology in full HD quality
· 1920 x 1080 pixels or MPEG-4 with 720 x 576 pixels
· Ergonomic operating concept with electrical lifting table for fatigue-free working
· System control via industrial PC with a 15" touch screen and two multifunctional joysticks for camera and crawler operation
· Free configurable userinterface and joystick operations
· Digital overlay technology for measured value and data display in different national versions
· Display technology, adjustable font sizes and colours
· 24" full HD video monitor
· Serial bus system for the control of the cable drums, crawlers and cameras and the full HD satellite system
· Ethernet-, Wifi- and UMTS connection to the video and data exchange with documentation PC and software (PipeCommander or other acquisition programmes)
· Alternatively recording in MPEG-4 possible, if full-HD data sets cannot be processed
· Power supply with lithium-ion batteries

Options

· Deformation measurement system
· LATRAS measurement
· Up to 3000 mm in connection with crawler extension (Lafette) or camera raft
· Lightweight construction for driver's licence Class B up to 3500 kg total weight
· Expansion according to individual customer requirements possible
· Leak test of individual joints, pipes, manholes and separators

Crawlers and cameras

· Crawler FW 90 and camera KS 60 HD, 100 – 600 mm
· Crawler FW 135 and Camera KS 135 HD, 135 – 3000 mm
· Modular lateral launch system M-Series: Crawler FW 135 with lateral launch system PM 135, PKM 200 HD and camera KS 60 HD

Technical details

· Rear area expansion with passage to the studio
· Water supply
· Elka 600 cable drum HD with observation monitor, telescopic swivel arm and chain winch
· Cable length up to 500 m
· Quadtro SAT HD cable drum
· Cable length 160 m
· 40 m push cable
· Lateral launch system in full HD
· Kampac hose reel for joint pressure testing
· Premus 600 for reach, manhole and separators testing
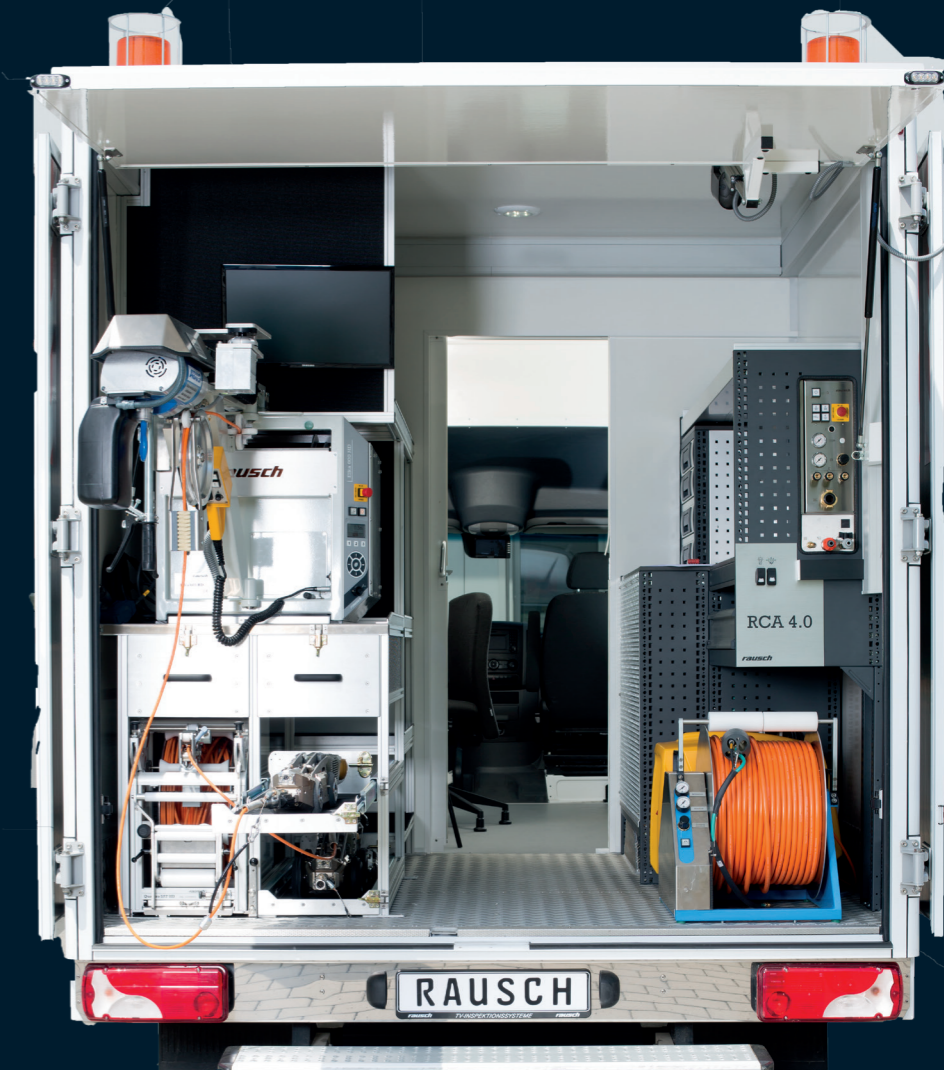
VEHICLE EXTENSIONS

SPECIAL UPGRADE

Special Rausch Expansions

INDIVIDUAL DESIGNED AND EXPANDED

· Fine-tuned to different needs
· Integrated personal safety device
· Box-type vehicles or box-type conversions with a longer wheelbase. For increased space requirements, such as for additional high-pressure flushing units or joint- and reach tests

Expansion of a sewer inspection truck with high-pressure flushing unit

Expansion of a Sprinter with box body for increased space requirements

LIGHTWEIGHT CONSTRUCTION

· Vehicles with a wheelbase of 3,600 mm
· Lightweight construction with innovative honeycomb technology
· Even when fully equipped, they weight is only 3100 kg, including the groundbreaking modular M-Series system and lithium-ion battery power supply
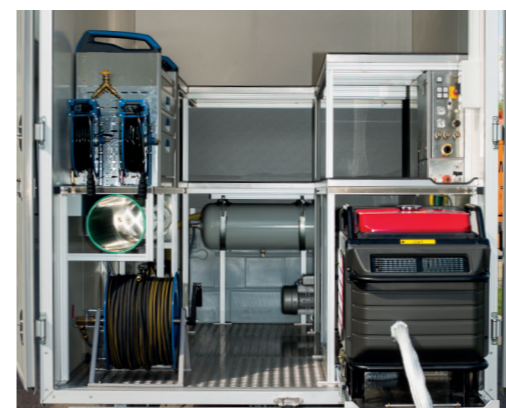

Upgrade with a pressure test trailer

LEAK TEST
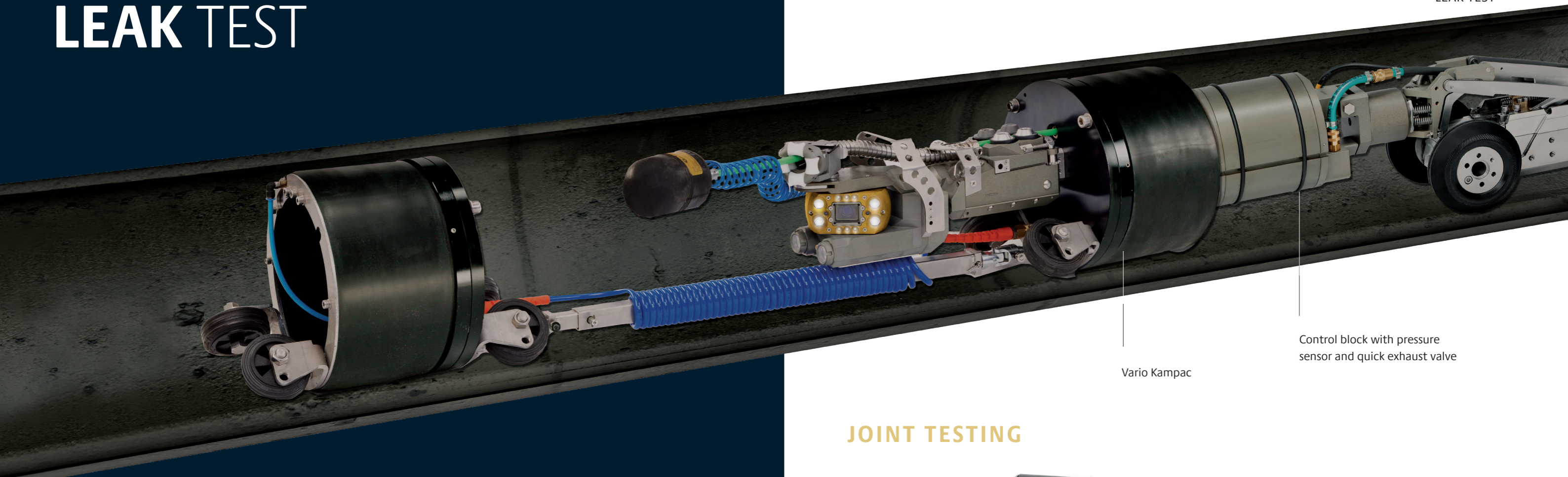
Vario Kampac

Control block with pressure
sensor and quick exhaust valve

PREMUS
AND KAMPAC

Our leak testing systems are
designed in accordance with national
and international requirements.

Depending on your requirements,
we offer stand-alone units or we
configure a complete installation version.
Our PipeCommander software controls,
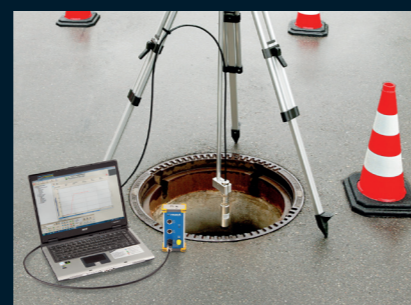monitors, evaluates and documents
all test procedures.

JOINT TESTING

Vario Kampac

· Leak test of pipe sections and house
  connection integrations
· 200 – 600 mm
· Test packers are telescopic connected
· Packers are positioned through the
  modules of the M-Series
· With the SKM 135 feed module, the
  shut-off valve is positioned in the house
  connection and pushed in up to 7 meters.

Kampac

· For single joint testing
· 200 – 600 mm
· Pneumatically operated hose drum
· Control block
· Multi-range test packers with lens glasses
· Optionally length: 100 mm or 200 mm
· Test using both air and water
· For positioning a pan and tilt camera is installed
· Variable collar pressure from 1.5 - 4.5 bar
· Quick exhaust valve
· Variable test pressure up to 500 mbar

Application ranges
Kampac · Vario Kampac · Premus

Inspection	with
Joints	Air and water
Reaches	Air, water or vakuum
Manholes	Water or vakuum
Separators	Water
House connection integrations	Air or water

Premus 600

· 70 – 2500 mm
· Vehicle installation version
  for the reach test
· Test with air and vacuum
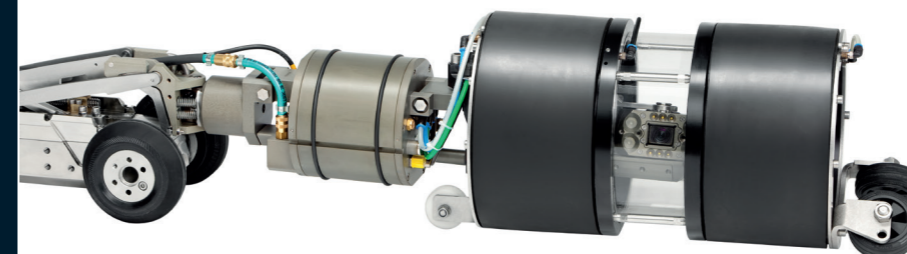 water, manhole and separator test

Premus 150

· Portable unit for manhole,
  reach and separator test
· Premus 150 also enables reach
  tests up to 300 mm
· In addition to manhole and
  separator testing, analogue to
  Premus MH

Premus MH

· Portable unit for checking manhole
  and light liquid separators
· Due to the temperature-com-
  pensating relative pressure sensor,
  a highly precise leak test according
  to DIN 1999 - 100 is guaranteed

Joint testing system

· With integrated camera
· 100 – 200 mm
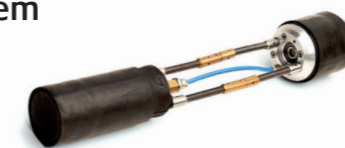
SOFTWARE

Inspection software

PIPE COMMANDER

- · Innovative features for working as effectively and flexibly as possible
- · Vehicle acquisition software
- · Office version for administration
- · Post-processing and transfer of test data
- · Various extensive reporting functions
- · With all current guidelines such as IsyBau 2006 and DWA M149-2, based on DIN EN 13508-2
- · Common standards such as EN 1610 or DWA A-139 and also DWA M149-6 are supported for leak testing of chambers, pipes and pipe connections

- · The DIN 1999-100 and DIN 4040-100 standards apply to the separator test
- · The free viewer version lets you easily pass on all inspection data and films to end customers
- · All relevant master data and inspection results are recorded
- · Datas can be easily edited and exported at any time
- · Clear menu structure
- · Inspection results can be retrieved in the form of videos, photos, logs and statistics

Facts

- · Inspections of reaches, connections and manholes
- · Powerful, configurable customer and project management
- · Real-time data insertion in the video image of all inspection-relevant data such as video counter, path lengths or damage incidents
- · Macro control for camera and crawler
- · Hardware-supported image digitization
- · Integrated, constantly updated standards and code catalogues

- · Free viewer version with all inspection data, images and films
- · Configurable report generator for generating detailed reports
- · Professional data management: Various project data from PipeCommander and SmartCommander can be imported, merged and edited in the office version.
- · Data exchange through IsyBau 96/2001 and IsyBau 2006, 2013 and 2017 interfaces

PicoMaps

- · The trend-setting all-rounder for graphical visualization of sewer networks
- · Automatically retrieves all available channel network data with geo coordinates from the database
- · Visualizes the connection cable progressions from CCTV inspection data - and this in best 3-D quality
- · Automated with LATRAS, the locating system for automatic measurement and graphic display of the pipe route of building connection pipes

Details of functions

- · Opens cadastral maps as vector drawings suitable for the coordinate space
- · Comprehensive sewer network representations based on master data
- · Digitalization of manholes, sewer pipes and cables
- · Automatic loading and adjustment of corresponding background maps
- · Generation of site plans and their display in vector format
- · Import of common DXF and SHP file formats
- · Position display in UTM or DHDN
- · Storage of vector maps (DXF, SHP)
- · Free drawing in of objects and lettering
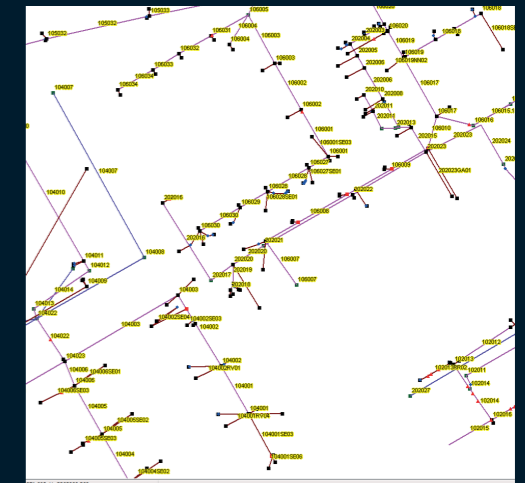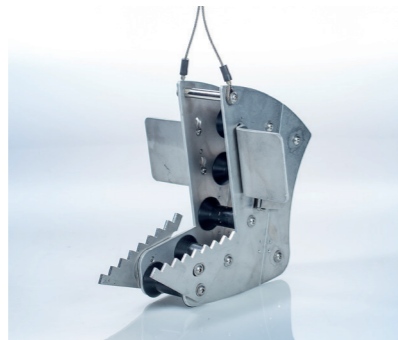
ACCESSORIES

Camera centring for KS 60

PIN set for KS 60

Jetting nozzle

Pressure filling system

Deflection pulley

Folding rain and sun protection canopy

Radio remote control

SAT 42

I-LOOK
SEWER LEVEL

Full HD
1920 x 1080

EFFICIENT CAPTURE

The mobile, battery-operated "I-Look Full HD" inspection unit enables the immediate assessment of the condition of wastewater pipes.

Even remote manholes and sewers can be reached thanks to the compact transport case.

Even low-lying pipes can be easily inspected from adjacent manholes thanks to the 12-metre-long pole.

The image and video documentation can be used to plan inspection resources more efficiently and prioritize further measures.

Thanks to the heated sapphire lens, the "I-Look Full HD" delivers razor-sharp images even when there are large temperature differences.

Technical highlights

- Full HD channel mirror incl. transport case
- Accessories: 3 rechargeable batteries, charger and accessories
- Pressure-monitored full HD camera in aluminum housing (IP68)
- 30x optical and 12x digital zoom, electric tilt incl. safety slip clutch
- Distance measurement via laser
- Sapphire glass incl. front glass heating (no fogging)
- Data acquisition on Android tablet

MINCAM.
A GIANT, WHEN IT GETS ABOUT SMALL PIPES.

minCam is the specialist for the small and smaller pipe diameters and offers a huge product portfolio. When things get tight in the sewage pipe, minCam's optical inspection systems make their big appearance - from the smallest push system minCord 5 with a 13-mm head to swivel-head cameras such as the minCam360, one of the smallest of its kind. The components are modular, making it possible to combine and interchange virtually with any minCam product. They enable inspection of pipes and cavities, in buildings and in industry, leaving no marks. Every inspection area is unique and minCam has the solution.

minCam

minCord 5
from 15 mm

Small and compact: Designed to reach even the most difficult-to-reach places

The non-destructively inspection enables you to inspect even the tightest spaces and saving costly disassembles. Tubes, cavities, welding seams, turbines, hollow profiles and castings. At the same time, the cameras are so robust that they can easily withstand the harsh field conditions. In this way you locate all surface damages, cracks, sediments and deteriorations with minimal effort.

- 13 mm axial camera
- 15 m flexible push cable
- 33 kHz / 512 Hz / 640 Hz locating sonde
- 90° bends from 25 mm
- Sunlight-readable 5"-display
- Battery life of 5 – 7 hours

minCord XL
from 15 mm

Inspection system for sewers

The mincord XL is used to inspect pipes ranging from 15 mm diameters.
The complete camera system ensures an optimum view. Individual applications in buildings and industry.

- 13 / 18 mm axial camera
- 30 m flexible push cable
- 33 kHz / 512 Hz / 640 Hz locating sonde
- 90° bends from 25 mm
- Sunlight-readable 7"-display
- Battery life of 5 – 7 hours

Axialcameras
from 15 mm

KK13
Application range from 15 mm
Diameter of 13 mm
Pressure-tight up to 1 bar
Location sonde with
33 kHz / 512 Hz/ 640 Hz

KK18
Application range from 25 mm
Diameter of 18 mm
Pressure-tight up to 3 bar
Location sonde with
33 kHz / 512 Hz / 640 Hz

KK29
Application range from 40 mm
Diameter of 29 mm
Pressure-tight up to 10 bar
Upright image (SelfLeveling)
Location sonde with 33 kHz / 512 Hz

KK55
Application range from 70 mm
Diameter of 55 mm
Pressure-tight up to 10 bar
Upright image (SelfLeveling)
Location sonde with 33 kHz / 512 Hz

SK50
Pan & Tilt camera with high resolution colour camera module, Ø50 mm
For pipes 70 mm and larger
Pressure-tight up to 6 bar

minCam App
User interface of minCam viewer app for recording of photos and videos including text generator.

mC-Series

mC30
from 40 mm

For the most convenient inspection in or around the house

The mC30 enables an easy inspection of pipes from 40 mm diameter. Perfect for the inspection of all pipes for residential areas.

- 29 mm axial camera with permanent upright image/self-leveling
- 30 m flexible push cable
- 33 kHz / 512 Hz location sonde
- 90° bends from 50 mm
- Sunlight-readable 5.6"-display
- Battery life of 2 – 3 hours

Additional option: Tested according to explosion protection

mC30 · Duo
from 15 mm

- 13 / 29 mm axial camera with permanent upright image/self-leveling
- 15 / 30 m flexible push cable
- Control unit with function keys and infinetely variable light regulation
- Sunlight-readable 5.6"-display
- Battery life of 2 – 3 hours

mC50
from 70 mm

Comfortable inspection

- 55 mm axial camera with permanent upright image/self-leveling
- 60 m flexible push cable
- 90° bends from 80 mm
- Sunlight-readable 8.4"-display
- Battery life of 2 – 3 hours

mC50 · Duo
from 32 mm

- 29 / 55 mm axial camera with permanent upright image/self-leveling
- 20 / 60 m flexible push cable
- Control unit with function keys and variable light regulation
- Sunlight-readable 8.4"-display
- Battery life of 2 – 3 hours

mC80
from 70 mm

Push Rod System

The standard push rod cable length of the mC80 is 130 m and assures a very comfortable manhole-to-manhole pipe inspection for pipes diameter from 70 mm.

- 55 mm axial camera with permanent upright image/self-leveling
- 130 m flexible push cable
- 90° bends from 100 mm
- Sunlight-readable 8,4"-display
- Battery life of 2 – 3 hours

minCam360

minCam360
From 70 mm

Pan & Tilt Camera Inspection System

With our intelligent pan & tilt camera inspection system you will reach easily even the remotest corner. The minCam 360 is one of the smallest cameras in this segment, pipes from 70 mm diameter can be inspected.

· Pan & tilt colour camera head with 50 mm diameter
· 60 m flexible push cable
· 90° bends from 80 mm
· Compatible with axial camera heads
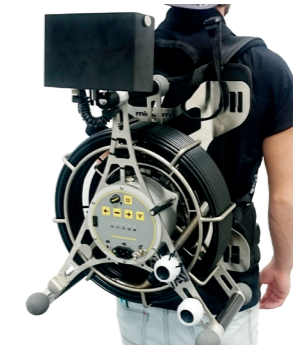· Sunlight-readable 8.4"-display with text generator
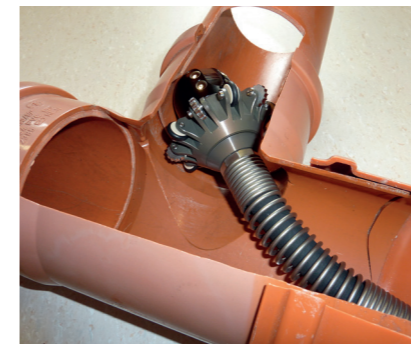
ACCESSORIES

Trolley wheels for mC50 and minCam360

Wheels for easy transport of the system mC50 and minCam360.

Backpack for mC30 and minCam360compact

Backpack for easy transport of the system mC30 and minCam360 compact. Especially for climbing up ladders or more floors.

minCam360 · compact
From 70 mm

Compact Pan & Tilt Camera Inspection System

This compact inspection system enables the entry into the camera head technology. The compact all-rounder allows many more options, even with an extra axial camera heads.

· 90° bends from 80 mm
· Pan & tilt camera head with 50 mm diameter
· 40 m flexible push cable
· WIFI with textgenerator
· Compatible with axial camera heads

Roll-In Device

Turning mechanism to turn in laterals for the pan and tilt camera SK50.

Powerbank

Adapter for Makita batteries to extend battery life for 3 hours

RAUSCH REHAB.
SETTING NEW STANDARDS.

They are the experts: the powerful high-tech cutter developed by Rausch Rehab, their new high-end UV curing system, and their innovative intensity measurement system for UV lamps are the pioneering solution for trenchless sewer rehabilitation at the highest standards. Rausch Rehab ensures that this standard always is maintained and controlled. With in-depth technical instruction, the RRcure int02 intensity measuring case – first of its kind, in the world- scientifically accompanied development, that is applied all products, a redundant logging system, and backup of all system-specific data, with a customer account in the Cloud and with a manufacturer, that does independent system service. All out of one hand.

rausch

REHAB

UV-LIGHT-SOURCE

RRcure 100

Nominal size:	DN 100 to DN 300/350
Cable length:	120m / 21mm
UV lamp power:	6 x 400/600 watts

RRcure 1500 Compact

Nominal size:	DN 150 to DN 1500
Cable length:	240m / 25mm
UV lamp power:	9 x 400 bis 2500 watts

RRcure 2000 Truck

Nominal size:	DN 150 to DN 2000
Cable length:	300m / 32mm
UV lamp power:	9 x 400 bis 2500/4000 watts

RRLQ 100 - 300

Nominal width:	Radial lamp train - DN 100 to DN 300/350
UV lamp power:	6 x 400 watts
Dimensions:	L = 2670mm
Weight:	about 13 kg

RRLQ 150 - 600

Nominal width:	Radial lamp train, DN 150 to DN 600
UV lamp power:	6 x 400/600 watts
Dimensions:	L = 3100mm
Weight:	about 20 kg

RRLQ 150 - 600

Nominal width:	Radial lamp train, DN 150 to DN 600
UV lamp power:	9 x 400/600 watts
Dimensions:	L = 4200mm
Weight:	about 20 kg
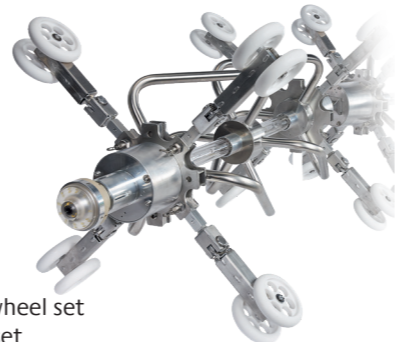
RRLQ 700 - 1500

Nominal diameter:	radial lamp train, DN 700 to DN 1500
UV lamp power:	8/9 x 1000 to 2500 watts
Dimensions:	L = 4300mm
Weight:	approx. 50 kg / without wheel set
Module diameter:	300mm / without wheel set

RRLQ Ext Core

Nominal width:	radial lamp core, DN 1500 to DN 2000
UV lamp power:	9 x 2000 bis 4000 watts
Dimensions:	L = min: 1400 / max: 3200mm
Weight:	about 70 kg

RRLQ 3000 V / manhole

Nominal size:	DN 800 to DN 2000 vertical
UV lamp power	6 x 1000 to 2500 watts & 2 x 1000 watts (sole)
IR lamp power:	3600 watts
Dimensions:	D= 300mm, H =1000mm
Weight:	about 15 kg

RRLQ 3000 V   RRLQ MH Hybrid

RRLQ MH HYBRID / manhole

Nominal size:	DN 800 to DN 1200 + vertical / depending on system capacity
UV lamp power:	8 x 1000/1200 watts (depending on UV lamp type)
Dimensions:	D= 450mm, L=950mm
Weight:	about 22 kg

RRcure 3000 V / manhole renovation

Nominal size:	DN 800 to DN 2000 vertical
Cable length:	40m / 25mm
UV lamp power:	6 x 1000 bis 2500 watts & 2 x 1000 watts
IR heater power:	3600 W

UV systems on trucks 12 - 18 T

- PTO or Stage V aggregate
- Expansion - turnkey
- Fan, solar power, battery system, heating etc.
- Expansion according to customer requirements

UV SYSTEMS

Intensity measurement kit
RRcure INT02

· Suitable for construction sites
· Can measure all commercially available UV lamps
· Automatic measurement sequence
· Calibrated UV sensors (GaP & SiC)
· Supported by scientific research
· Internal memory
· Log output (pdf-cloud)
· (A) Direct measurement
· (B) (B) Indirect measurement via external UV system
· (C) Indirect measurement via adapter

TEST OPTION A
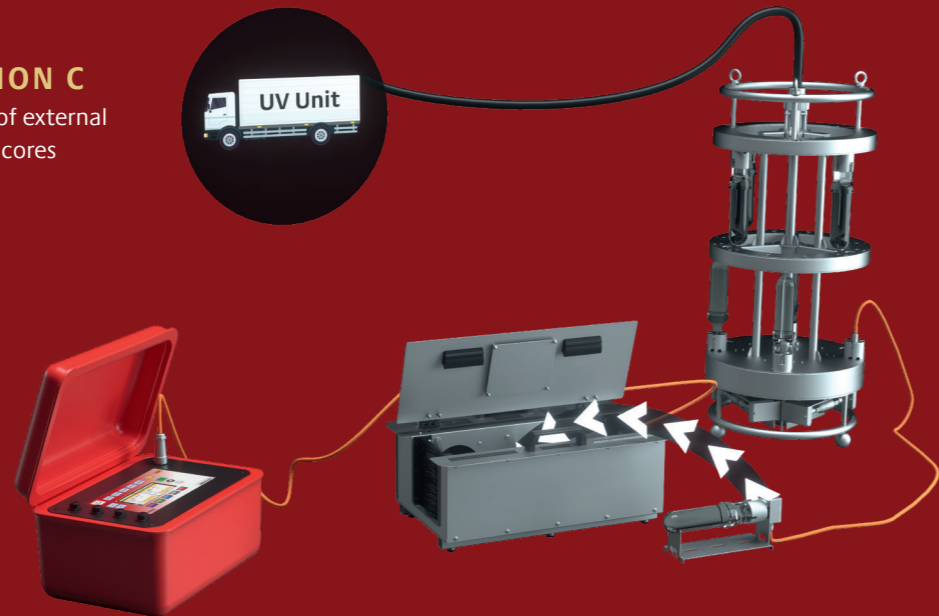
Absolute measurement by
integrated electronic ballast,
400 to 1200 watts

TEST OPTION B

Measurement of the light
source operated directly by
the UV vehicle.

TEST OPTION C

Measurement of external
emitters of UV cores
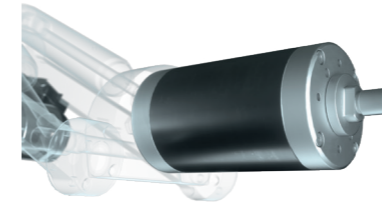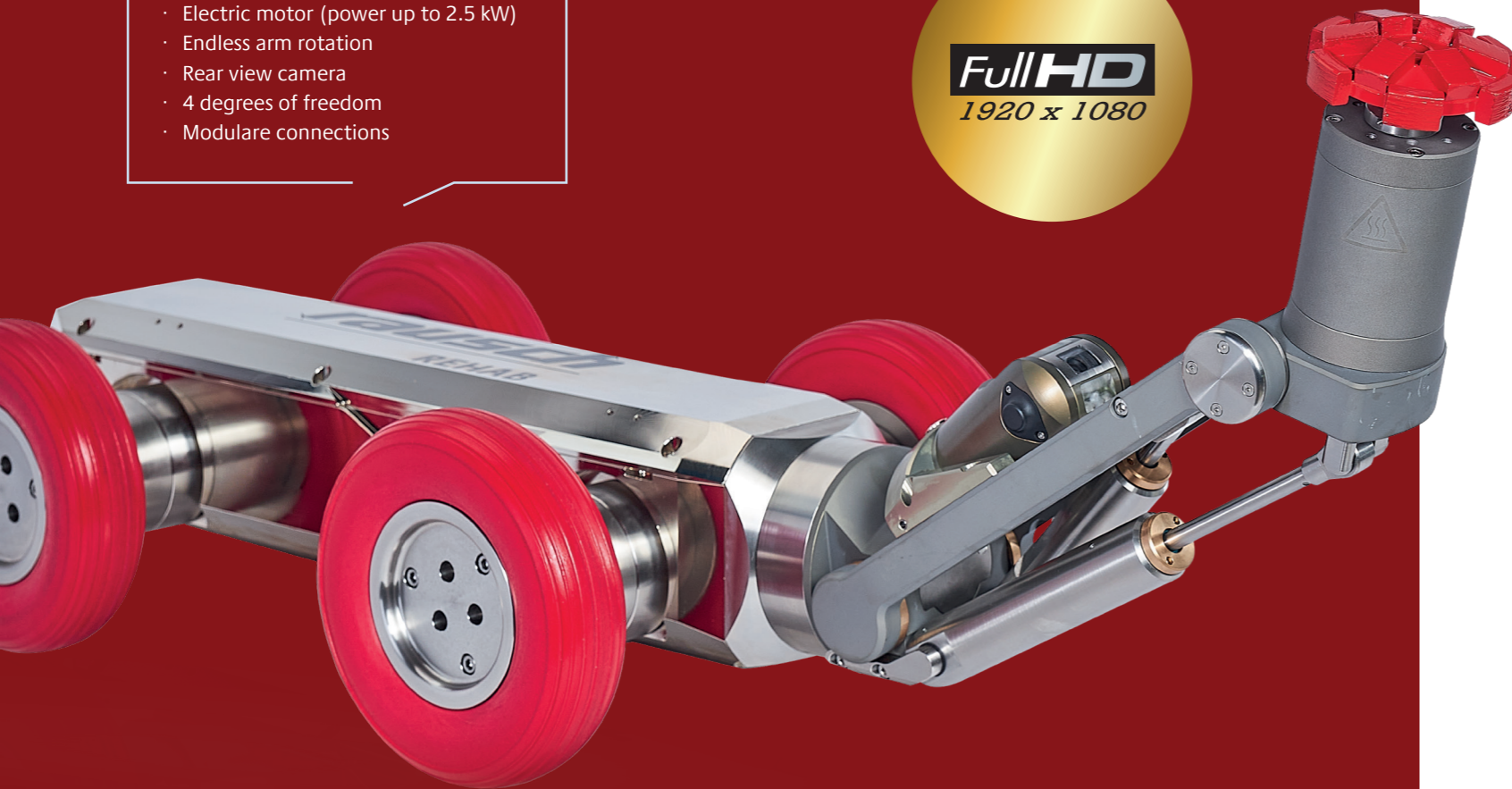
UV Unit

ROBOTIC CUTTER

Rausch-Tab:
Central control unit

· Daylight-readable 12" touch display
· Integrated PC
· Robust aluminum housing
· Connection of two external joysticks
· Windows-based operating system

Elektric motor RREM1

· Power up to 2.5 kW
· Speed of 8200 1/min
· Central locking
· Universal tool mounting

Camera RRV1 HD

Full HD 1920 x 1080

· Full-HD resolution
· Endless panning of the head
· Cleaning function with scraper
· Integrated measurement laser
· Tool-free mounting and unmounting

ACCESSORY

Wheels 200–800 mm

Extension Set

Adaption Top Hat

Adaption ultra high pressure nozzle

Quick-Lock Anbindung

Camera extension

Cutter RRC1

· Full-HD camera
· DN 200 - DN 800
· Electric motor (power up to 2.5 kW)
· Endless arm rotation
· Rear view camera
· 4 degrees of freedom
· Modulare connections

Full HD 1920 x 1080

Cable drum
ELKA 600 RRC

· Fully automatic cable drum
· Up to 300 m of cable
· Integrated observation monitor
· Telescopic swivel arm with chain winch
· Working spotlight for manhole illumination
· Easy vehicle installation

RAUSCH
INTERNATIONAL
GROUP