# MRT-X PRIVILEGE+



MANITOU

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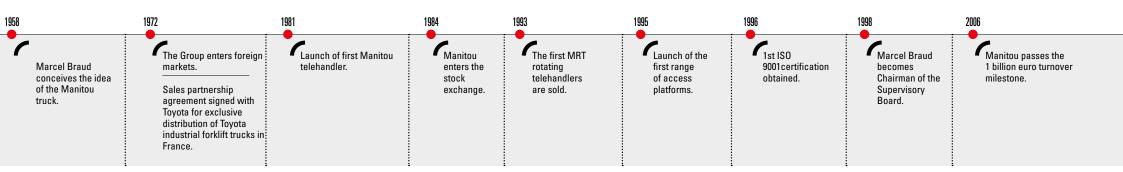
## Handling your world World Founded over 60 worldwide. A we

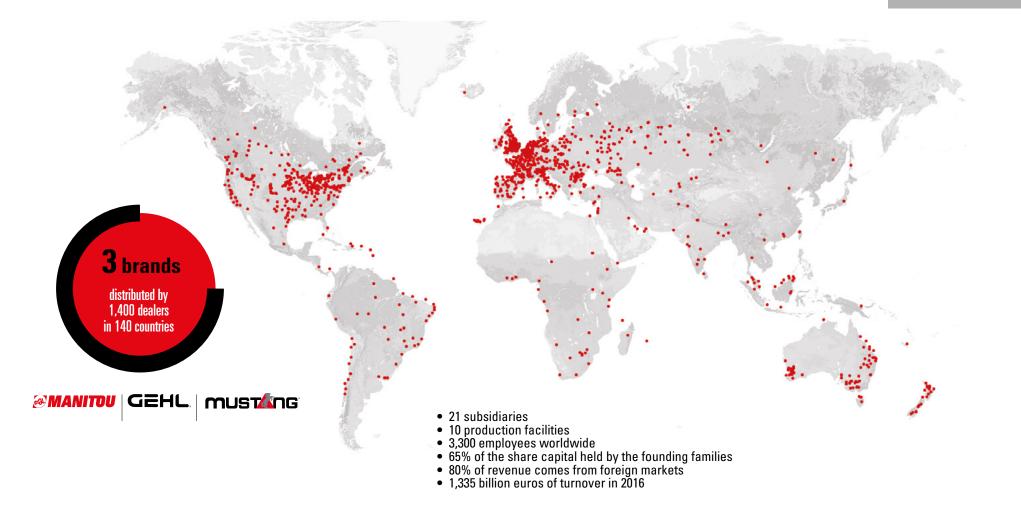
Founded over 60 years ago by the Braud family, the Manitou Group now operates worldwide. A world leader in all-terrain material handling, the Group designs, manufactures, distributes and services equipment for construction, agriculture and industries.

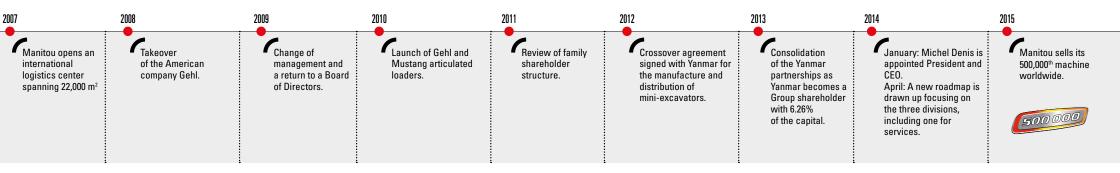
The Group's product ranges include, all-terrain fixed, rotating and heavy-load telehandlers; all-terrain, semi-industrial and industrial masted forklift trucks; wheel or track skid-steer loaders; access platforms; truck-mounted forklifts; warehousing equipment; and attachments.

Through its iconic brands – Manitou, Gehl and Mustang – and its worldwide network of 1,400 dealers, the Group offers the best solutions to create optimum value for its customers.

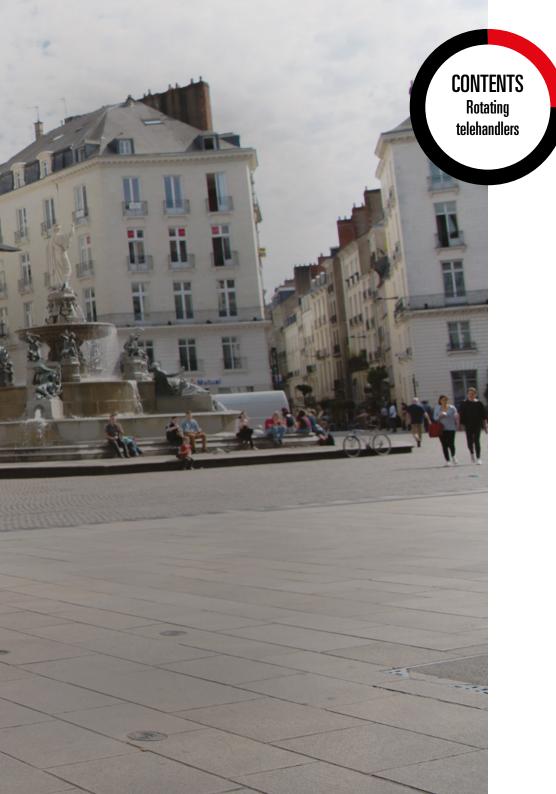
With headquarters in France, the Group recorded turnover of 1,335 billion euros in 140 countries in 2016, and employs 3300 people, all strongly focused on customer satisfaction.











Manitou's rotating telehandlers - a great feat of technology	
What is a Manitou MRT-X ?	8
Versatile machines	10
High-performance machines in any situation	- 14 -
Complete safety	16
Assured comfort	20
Select your model	26
Selection of attachments	30
Manitou is here to help	36





# Manitou's rotating telehandlers a great feat of technology

#### The Manitou brand presents to you one of its feats of technology: the Manitou Rotating Telehandler, better known as MRT.

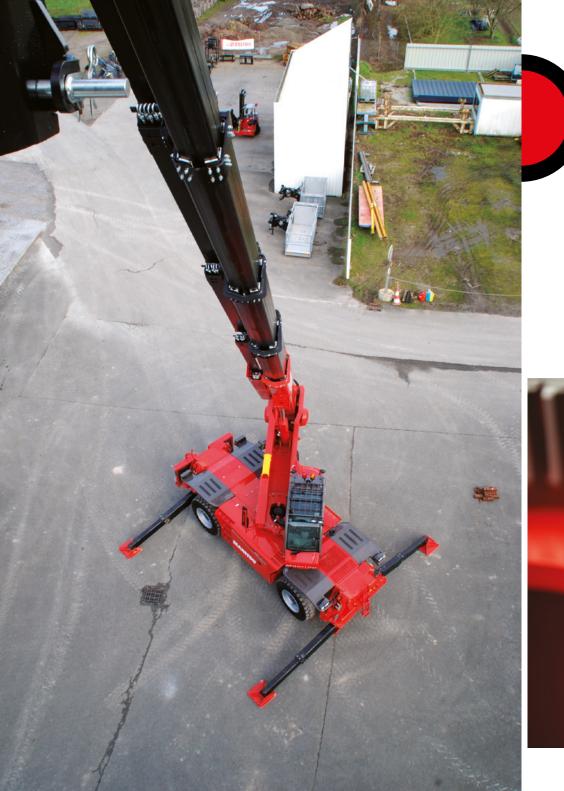
Manitou makes its debut in the world of rotating telehandlers in **1982, after entering into a distribution agreement** with Italy-based manufacturer Fargh.

Then, in 1983, Manitou starts trading the 5500 Fargh RTL under the Manitou brand and enjoys great success in the United States. Over the following years, Manitou introduces new models, creating an entire product line.

In 1986, Manitou creates Manitou Costruzioni Industriali S.R.L. in Bologna. The Province of Modena is already well-known for manufacturing sports cars and motorcycles. In 1993, the MRT1540 (15 m / 4 tonnes), Manitou's first rotating telescopic, is created on Manitou premises in Italy, building on over 10 years of technical expertise.

Since then, Manitou continues to develop and improve the rotating telehandler. In 2007, the MRT and MRT-X 2150 becomes the world's best-selling roto telehandler! The Privilege + range brings the best of Manitou technology thanks to world-class load chart performance.

Enjoy the privilege of operating a MRT-X Manitou Privilege+!

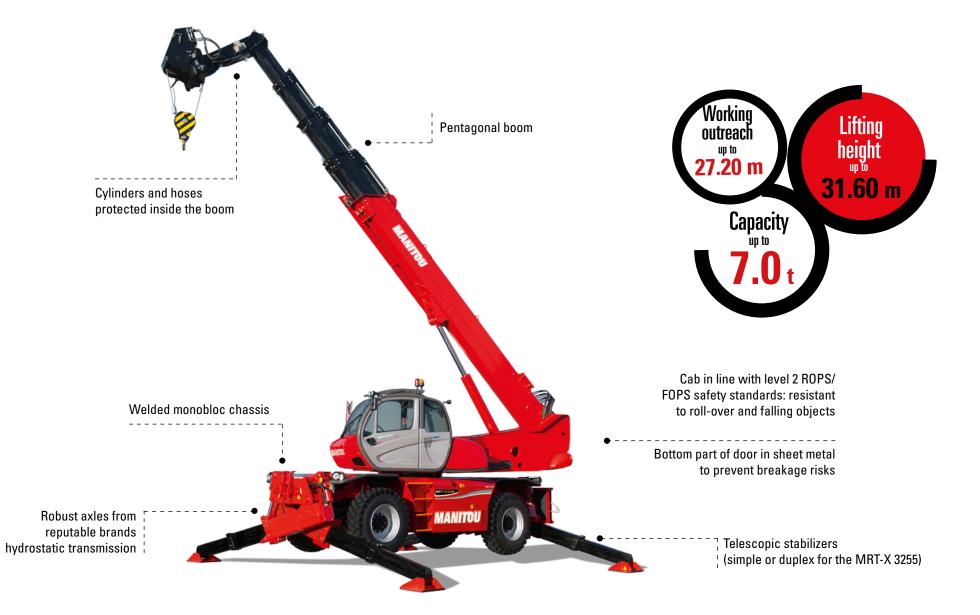


# WHAT IS A MANITOU MRT-X ?

MRT-X Privilege + machines are all-terrain telehandlers with four-wheel drive and steering and full 360° turret rotation. MRT-Xs are perfectly adapted to operate quickly and efficiently on any work site, maintaining impressive load capacities without the need to move the machine.

Maximise your profits by working with a highly versatile MRT-X!





Privilege +		MRT-X 2150 P+	MRT-X 2550 P+	MRT-X 2470 P+	MRT-X 3050 P+	MRT-X 3255 P+
Max. capacity	kg	4 999	4 999	7000	4999	5500
Max. lifting height	m	20.60	24.70	23.70	29.70	31.60
Max. outreach	m	17.90	21.40	21.50	25.80	27.20
Power	HP (kW)	156/115	156/115	176/129	176/129	197 /145

## 5 models at 360 ° from 21 to 32 m



# **VERSATILE MACHINES**

The MRT-X concept can be used on tires or stabilizers and combines the functions of **3 machines in 1.** 

# **Telehandler mode**

- Positioning on stabilisers or tires
- Precise load control
- Strong pentagonal boom

# Suspended mode

- Winch up to 12 tons at the base of the boom
- Winch from 3.0 to 7.2 tons at the boom head
- (MRT-X 3255 only)

# Platform mode

- Extendable and adjustable man basket with up to 1000 kg load capacity
- Up to 43 m working height with the 3D man basket
- Both postive and negative work positions

**Continuous rotation makes your machine more efficient and reduces maneuver times.** Regardless of the attachments used, the MRT-X Privilege + demonstrates excellent maneuvrability and remains completely stable on the ground.



## Perfect for all construction applications

MANITOU **rotating telehandlers** are effective tool-carriers which can easily be fitted with the attachment specifically adapted to your application.

To cater your needs and activities, we offer a wide range of attachments validated by Manitou and specially adapted to your machines.

The MRT-X Privilege+ allows for precise control of your load, transport and lifting of heavy and bulky loads and efficient loading and distribution. Achieve peak operational performance in minimal time from a fixed point.







## Intuitive attachment changing



The MRT-X Privilege + range is equipped as standard with an E-RECO attachment recognition system. The system detects and analyses the attachment to propose the corresponding working range and optimize the machine's working parameters. With the various working modes, your site constraints are no longer an obstacle.

# Use the remote control to better handle loads



You can remotely control the machine as if you were in the cab. You benefit from excellent visibility over your working environment. The remote control has a control screen which shows the state of the machine. You can also use this control unit to work with your machine in platform mode.

All the functions of the boom and its attachments **can be guided by the radio control** on the ground. The box is also used to control the work platforms.





# An ultra-manageable machine with 3 steering modes

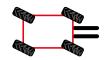


2 WHEEL FRONT STEERING to ensure greater safety on the road

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**4 WHEEL STEERING** to manoeuvre in tight areas



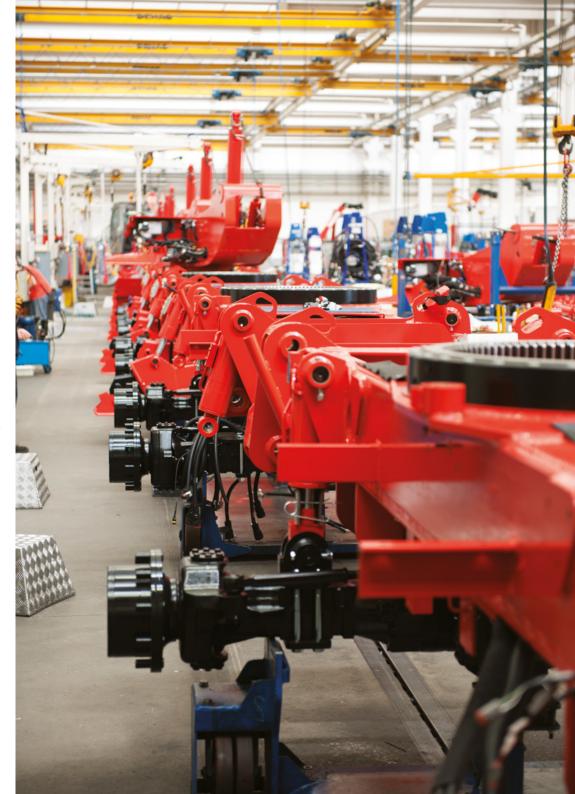
**CRAB MODE** for tricky sideways approaches





# HIGH-PERFORMANCE MACHINES IN ANY SITUATION

MRT-Xs have been designed to easily adapt to any situation. Thanks to their hydrostatic transmission, chassis and engine power, our MRT-Xs show outstanding performance and precision on all types of terrain.



Hydrostatic transmission ensures maneuverability and ease of use. Coupled to a two-speed gearbox, the hydrostatic transmission allows to adapt the travel speed to the tractive effort. This ensures progressive operation with high precision to safely move and place your load.

The shift-on-the-fly transmission, as an option on the MRT2470 and MRT-X 3050 Privilege +, allows to automatically change gear ratios, bringing extra comfort.

The MRT-X 3255 uses Continuously Variable Transmission (CVT) technology, providing a high level of flexibility when accelerating from 0 to 40 km/h.

MRT-X 2470, 3050 and 3255 are equipped with a speed control for safer driving.

A standard feature on all MRT-X models, the inching function allows the operator to increase the speed of boom movements while progressively reducing the machine's forward movement.

The MRT-X Privilege sits on three types of chassis, acting as the main core structure of your machine. Thanks to their tubular frames, the chassis allow for maximum resistance and rigidity whatever the position of the machine. The MRT-X 2470 and 3050 Privilege + integrate all electrical and hydraulic lines for full protection, allowing the operator to work on the most challenging environments.

The MRT-X 3255 Privilege + brings great driving comfort thanks to its chassis and its hydro-pneumatic suspension.



## Pentagonal boom for greater robustness and higher precision

**The pentagonal boom** offers greater precision and robustness.

The load moment indicator sensors are located at the rear of the boom and completely protected in the event of falling objects. The MRT-X Privilège+ models ensure high precision of boom movements, while maintaining lateral rigidity, an essential feature when working at height. Boom movement speeds are adapted to the telescope extension lenght.

# Lowered boom position for greater safety

The position of the lowered boom has been altered to ensure better visibility on the right side of the machine. This allows the operator to drive the machine safely and more easily on the site.



# **COMPLETE SAFETY**

#### Automatic parking brake

The battery-powered automatic parking brake provides **safety for your manœuvres on all sites.** Your machine will not move ... unless you tell it so!

#### **Control of load status**

The MRT-X Privelege+ is fitted with the Manitou Safety System. It anlyZes continuously the position of your load within the working envelope, and the machine's work configuration. The system restricts the working area according to the accessory and the load being handled.

#### Limitation of movement speeds

According to the working situation and the type of work, you are able to store the maximum movement speeds of all activating parts of the jib. You store up to four sets of parameters.

#### **Restrictive working zone**

To ensure the safety of your repeated handling movements in congested sites, you can limit the working zone, thereby increasing safety.

Accurate load handling in compliance with safety measures.



# Quick extension of the stabilizers

All MRT-X models come complete with Manitou technology, which ensures complete stability to work in a safe manner.

- Quick lowering of the stabilizers.
- The MRT-X Privilege stabilizers are long and boost load chart capacity.
- Control the lowered length directly on the dashboard.
- The load chart adapts in proportion to the lowered length of the stabilizers.



# Adjustable stabilisation surface

The stabilisers have a telescopic scissor design enabling the legs to be only partly deployed when there are obstacles or lack of space. The machine's capacities are automatically adjusted in this configuration.



## Saves time and increases productivity

Standard stabilizers: 35 x 35 cm. Optional 60 x 60cm stabilizer composite pads provide 3.5 kg / cm<sup>2</sup> of ground pressure. You can move the machine without needing to draw the stabilisers.



MRT-X 2470 and 3050 models sit on stabilisers equipped with strain gauges for greater precision in all surfaces.



The MRT-X Privilege + cab offers a comfortable and safe driver's cab.

The MRT-X Privilege + cab is ROPS/FOPS Level 2 certified which ensures high resistance to rollover accidents and heavy falling objects. You will be protected at all times while using the machine.

The steps to the cab are wide and aligned with access to the cab. The steps are evenly spaced.

Several access points around the machine whatever the postion of the turret (left and right hand steps, front and rear access ladders).







All controls are visible and within reach!

**The attachment and load are completely visible**, including through the protective roof. The electric tilting seat (optional) offers greater comfort when the boom is in the raised position.

The operator can adjust the seat angle.

With no bar and a rounded windscreen, the machine guarantees panoramic views over the upper section.

MRT-X 2470 and 3050 models are equipped with a new heating system that uses engine calories, reducing cabin noise and increasing visual comfort in the front of the cabin.



# Driver assistance system and easy control

In case of incorrect operation of the machine, a message will appear automatically at the bottom of the screen. The operator can then immediately correct any error!

The cab contains two easy-to-use joysticks **to simultaneously control** all machine movements including transmission with the integrated FNR (front/neutral/rear) on the right-hand joystick.

Each joystick comes with an acceptance button. All movements are completely under control.



- Telescope extension
- Turret rotation
- Attachment controls



- Lifting of the load
- Fork angling
- Reversing shift



# **Dashboard** All machine functions are centralized

All machine functions are centralized on the dashboard for simple and efficient use. All controls and menus are illustrated by icons to make it easier to remember their function and sequence.

The seven-inch TFT screen (7 or 9 inches according the model) is positioned to the right for the operator to easily read the information in the cab. The screen is intuitive with just a few easy-to-remember menus.

Driver assist messages are always available on the screen.

On-board diagnostics are available on all models

Dynamic load charts to monitor load position in real time (for each models).











# Easy access to engine components

The engines of our telehandlers are mounted on the right side of the chassis. This provides easy access to the main engine components from the ground.

Fuel and hydraulic oil tanks are easy to access and identify.

The engine hood can be fully opened for a quick access to all components.

# Choose the attachments and the model that you need!



Whether you are a rental company or end user, you can choose from 21 to 32 m telehandlers, as well from a wide array of attachments and options that best meet your needs.







#### A complete range of tools adapted to the construction world

Manitou telehandlers are effective tool carriers where you can easily attach the specific attachment required. To cater to your needs and activities, we recommend a range of Manitou-approved attachments fully compatible with our machines.

# Simple and rapid coupling

To save you time, the coupling system for Manitou attachments (TS: simple fork carriage with manual or hydraulic locking), is reliable, quick and easy to use.

You can attach and detach your attachments easily.



### **CBR re-handling bucket**

Perfect for handling sand, dirt or gravel, the CBR bucket can handle material with a density less than or equal to 2100 kg/cm<sup>3</sup>.



### **PFB Forks**

Tilting fork carriage using ISO forks. Optional backrest and side shift available.



### **PSE 4400 platform**

Fast opening platform: **opens/closes in less than 50 seconds.** Guaranteed safety and maximum efficiency for all your work at heights (up to 1000 kg, including three people). Easy access with three entry points (rail or door depending on the model).



### **Platform Winch**

For panel installation and maintenance of industrial facilities, the platform winch ensures safe elevation of personnel and also allows suspended loads to be lifted and handled directly from the platform without returning to the ground. Capacity on winch up to 450 kg, including a maximum of three people.



#### 360° rotating carriage

**Continuous rotation carriage for incomparable flexibility.** Constant communication with the

machine ensures optimum safety and capacity (4000 kg in the front-facing position and 2500 kg when rotating >15°).



## P Jib

Tubular extension jib, **offering the perfect compromise between front outreach and lightness.** This is the essential tool for placing suspended loads. 1500 kg capacity with outreach of 3m (600 to 2000 kg capacities available in the offer).

#### **MRT PRIVILEGE+ RANGE**



### Hydraulic winch

The hook block assembly offers greater stability. 3 to 5t capacities available.



#### PT extension jib with winch

The direct hook assembly offers greater speed (600 to 2000 kg capacity and hook block versions available). Hook capacity: 1500 kg.



#### Aerial jib 2

Personnel elevation solution suitable for work at heights (+9.3m) and depths (-6.4m). **360° arm rotation**. 200 kg capacity, including two people.



#### 3D platform

Personnel elevation solution suitable for work at heights (+11.6m) and depths (-10.4m) and for performing inspections under bridges using the principal telescopic vertical component, **360° rotation of the secondary arm and a pendular basket.** 200 kg capacity, including two people.



#### Bespoke

Do you have specific needs or special applications? Thanks to the experience and skills of its special business department, Manitou is able to offer customised attachments and machines that comply with the most detailed specifications. Can we help with anything? Feel free to contact us!

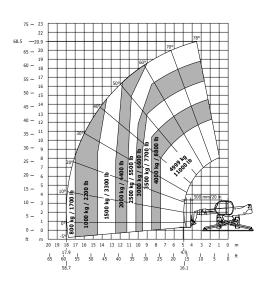
> Discover all our attachments on manitou.com



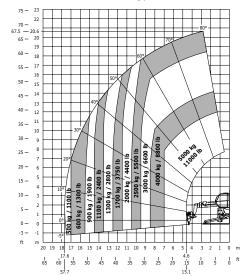


Technical data sheets	
Max. capacity / with 7.2 winch	4 999 kg
Max. lifting height	20.60 m
Max. outreach	17.90 m
Engine brand	Mercedes stage 3A
Power	156 ch / 115 kw
Laden drawbar pull	7 900 daN
Overall width	2.49 m
Overall width (with stabilizers lowered)	5.55 m
Overall height	3.05 m
Overall length to carriage	6.87 m
Ground clearance	0.35 m
Turning radius (over tires)	4.88 m
Unladen weight (with forks)	17 930 kg

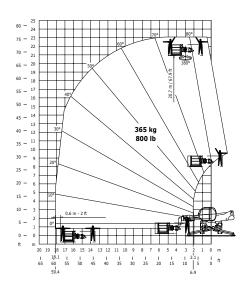
Rotation on lowered stabilizers with forks



Rotation on lowered stabilizers with 1500 kg jib



Rotation on lowered stabilisers with 365 kg platform



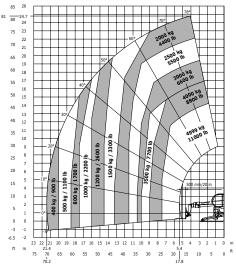
Rough-terrain load chart Standard EN 1459 B

# MRT-X 2550

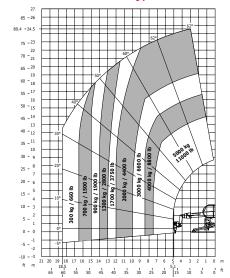


Technical data sheets	
Max. capacity / with 7.2 winch	4 999 kg
Max. lifting height	24.70 m
Max. outreach	21.40 m
Engine brand	Mercedes stage 3A
Power	156 ch / 115 kw
Laden drawbar pull	7 900 daN
Overall width	2.49 m
Overall width (with stabilizers lowered)	5.55 m
Overall height	3.05 m
Overall length to carriage	6.87 m
Ground clearance	0.35 m
Turning radius (over tires)	4.88 m
Unladen weight (with forks)	18 900 kg

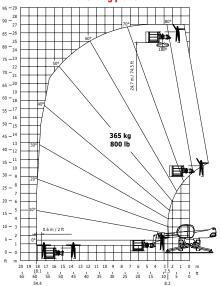
#### Rotation on lowered stabilizers with forks









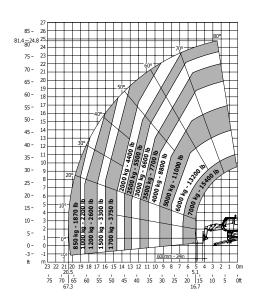


Rough-terrain load chart Standard EN 1459 B

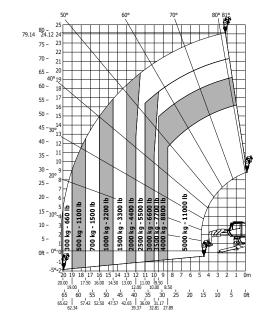
# MRT-X 2470



#### Rotation on lowered stabilizers with forks

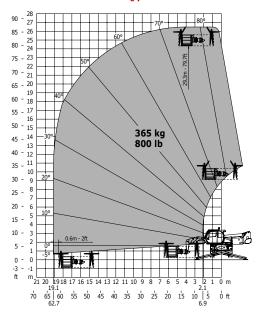


Rotation on lowered stabilizers with 1500 kg jib



Technical data sheets	
Max. capacity / with 7.2 winch	7 000 kg
Max. lifting height	23.70 m
Max. outreach	21.50 m
Engine brand	Mercedes stage 3A
Power	176 ch / 129 kw
Laden drawbar pull	9500 daN
Overall width	2.49 m
Overall width (with stabilizers lowered)	6.25 m
Overall height	3.05 m
Overall length to carriage	7.55 m
Ground clearance	0.35 m
Turning radius (over tires)	6.50 m
Unladen weight (with forks)	21 850kg

Rotation on lowered stabilizers with 365 kg platform



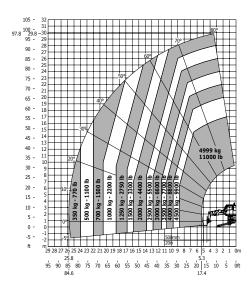
**Rough-terrain load chart** 

Standard EN 1459 B

# MRT-X 3050



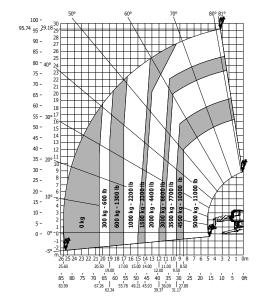
<b>Rotation on lower</b>	ed stabilizers
with for	ks



**Rough-terrain load chart** 

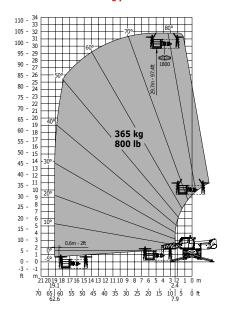
Standard EN 1459 B





Technical data sheets	
Max. capacity / with 7.2 winch	4 999 kg
Max. lifting height	29.70 m
Max. outreach	25.80 m
Engine brand	Mercedes stage IV / Final tier 4
Power	216 ch / 159 kw
Laden drawbar pull	9500 daN
Overall width	2.49 m
Overall width (with stabilizers lowered)	6.25 m
Overall height	3.05 m
Overall length to carriage	7.82 m
Ground clearance	0.35 m
Turning radius (over tires)	6.50 m
Unladen weight (with forks)	21 850 kg

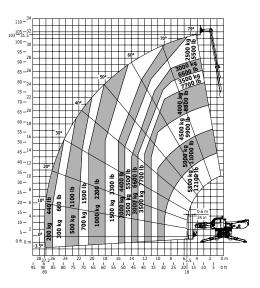
#### Rotation on lowered stabilizers with 365 kg platform



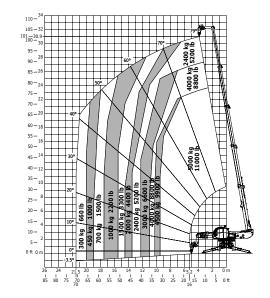


Technical data sheets	
Max. capacity / with 7.2 winch	5 500 kg / 7200 kg
Max. lifting height	31.60 m
Max. outreach	27.20 m
Engine brand	Mercedes stage 3A
Power	197 ch / 145 kw
Laden drawbar pull	10 500 daN
Overall width	2.50 m
Overall width (with stabilizers lowered)	7.10 m
Overall height	3.20 m
Overall length to carriage	8.50 m
Ground clearance	0.42 m
Turning radius (over tires)	4.91 m
Unladen weight (with forks)	23 986 kg

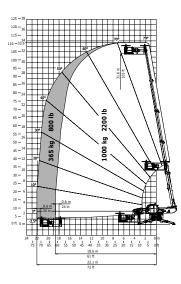
Rotation on lowered stabilizers with forks



Rotation on lowered stabilizers with 1500 kg jib



#### Rotation on lowered stabilizers with 365 kg platform



# LES EQUIPEMENTS **DE SERIE & OPTIONS**













S: Standard / O: optional / - not available	MRT-X 2150 / 2550	MRT-X 2470 / 3050	MRT-X 3255
General			
Battery cut-off	S	S	S
24 V start-up platform	S	S	S
Internal rear-view mirror	S	S	S
Electric window	S	S	S
Roof screen wiper	S	S	S
Automatic levelling	S	S	S
Automatic stabilization		S	
Restriction of work areas	S	S	S
Reduction in movement speeds	S	S	S
Speed control		S	S
Platform predisposition and radio-control	0	0	0
Comfort			
Fabric seat	S	S	0
Air-conditioning	0	0	0
Pneumatic fabric seat	0	0	0
Heated pneumatic fabric seat	0	0	0
Tilting seat	0	0	S
MP3 car radio	0	0	0
Bluetooth radio	0	0	0
Hydraulics			
Attachment line	S	S	S
Return to tank	S	S	S
Dual function on boom head	0	0	0
Triple function on boom head	0	0	0
Lock attachment	0	0	0
Forced march	0	0	0
Chassis suspension			S
Boom suspension	0	0	0
ElectricitY / Security			
E-Reco	S	S	S
Reverse alarm	S	S	S
Front work lights	0	0	0
Rear work lights	0	0	0
Work lights on the boom	0	0	0
Camera on the boom head	0	0	0
Side camera	0	0	0
Rear camera	0	0	0
Bi-energy	0	0	0





# Manitou is here to help

Manitou offers a wide range of products and services that cover all your specific needs to enjoy a high performing machine throughout the year.





# 1,400 dealers at your service

The Manitou network **operates in more than 140 countries.** In total, we employ more than 2,000 expert technicians, specially trained in Manitou technology, who are at your service to assist with everything from purchasing to after-sales.

# Daily expertise and service

Your **Manitou** dealer offers a complete range of services at all stages of your machine's life. The dealer will support you and adapt to your needs in order to provide the best solution to meet your requirements.







#### **Dealership network**

A network of experts at your service, whatever your activity (agriculture, construction, industry).

#### **Maintenance contracts**

We offer three levels of contract to meet your needs: Initial, Advanced and Excellence. Rest easy and leave the maintenance to your official Manitou dealer.

#### Financing

Lease or buy? Manitou Finance helps you choose the most suitable financing solution for your activity. Why look any where else?

#### Warranty extension

With Maniplus, you can extend the cover of your Manitou warranty for up to 5 years. Use your equipment with peace of mind.

#### The connected solution

Easy Manager is a simple and flexible tool for managing, optimizing and securing the operational monitoring of your machines.

#### **Second-hand equipment**

In the market for second-hand equipment? The Manitou network is here to help. Just visit manitou.used. com, our dedicated reference site for second-hand Manitou machines.

#### **Original spare parts**

With more than 70,000 products available, your Manitou dealer offers daily expertise and service!





**Easy MANAGER** is a simple and flexible tool to maximize the operational monitoring of your equipment. The option is available at the time of order or an after-sales basis.

MRT-X 2020+

MANITOU





## Management

**See the machine**'s geoprahical location and use in real time. **Increase your machine's availability** by allowing your dealer to carry out remote diagnostics.

**Control your budget** by ensuring optimum machine maintenance. Maximize the machine's resale value.

# **Optimization**

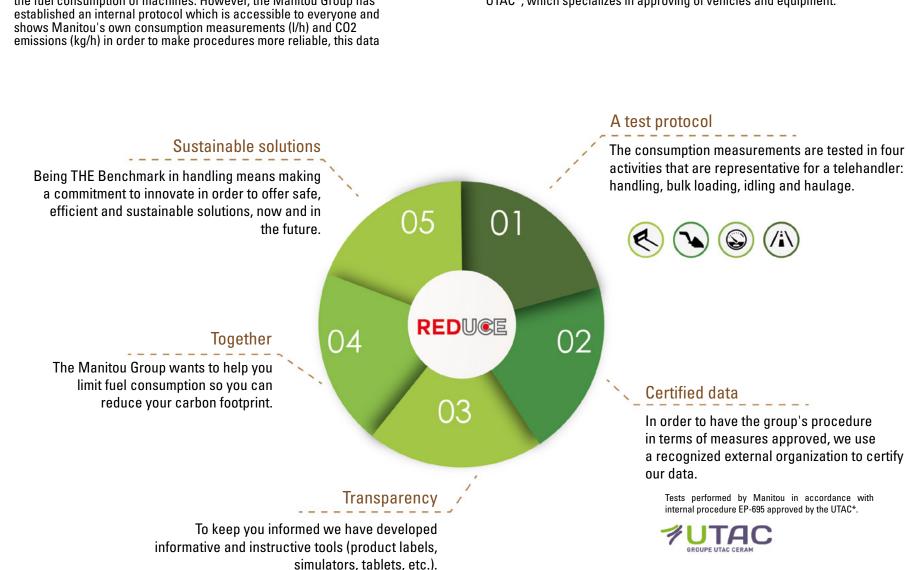
**Trust the maintenance** of your equipment to your dealer, who can acces the machine usage data and arrange maintenance operations to suit you.

**Analyze your equipment's performances** using the dashboard and activity reports to optimize its use and fuel consumption.

# **Security**

**Protect your equipment** against theft and fraudulent use by setting up warnings.

**Control access** to your equipment to authenticate users and ensure their safety.



# The **REDUCE** Program

The handling sector does not have a standardized cycle for measuring the fuel consumption of machines. However, the Manitou Group has

is controlled and approved by an independent organization, the UTAC\*, which specializes in approving of vehicles and equipment.

activities that are representative for a telehandler:

# Here to help

The Manitou Group wants to help you save fuel and reduce the carbon footprint of your machines with these 23 easy-to-follow tips. See more advice at reduce.manitou.com.



Choose the right level of power for your needs.



Switch off your engine after three minutes of idling.



Best engine performance occurs with maximum torque.



Choose controllable and reversible fan systems.



Use 'smart' automated transmissions.



Close doors and windows when using air-conditioning.



Choose LED headlights.



Use the right tires for your environment.



Ensure you have the right tire pressure.



Check that the parking brake is set.



Adjust your maximum trailing load.



Adapt your attachments to your machine.



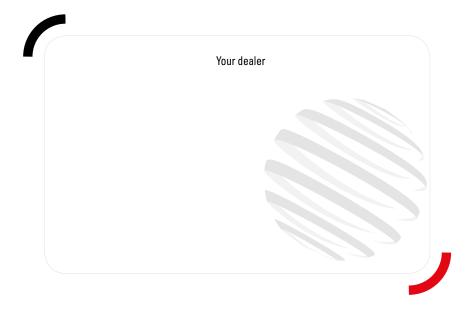
Respect maintenance schedules.



Ensure regular lubrication.



Make sure you know your machine's fuel consumption and emissions.





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