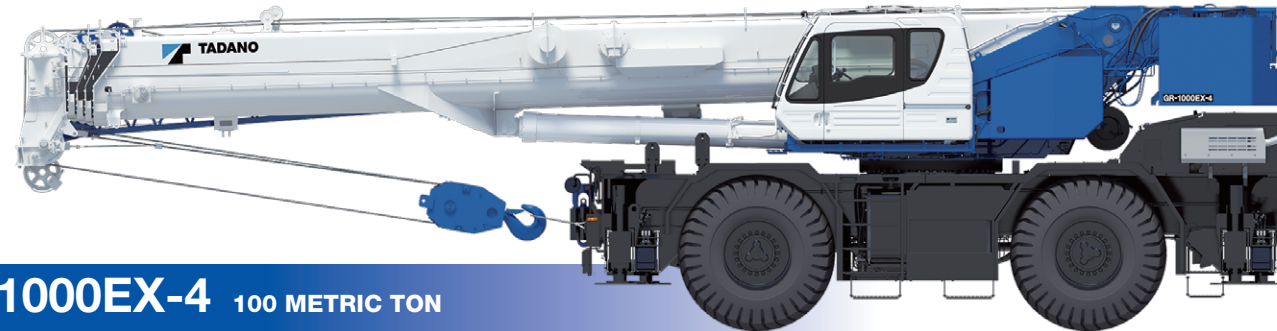




Lifting your dreams

ROUGH TERRAIN CRANE



GR-1000EX-4 100 METRIC TON



GR-900EX-4 90 METRIC TON



GR-700EX-4 70 METRIC TON

Photo: Optional model



TADANO LTD. (International Sales Division)
4-12, Kamezawa 2-chome, Sumida-ku Tokyo 130-0014, Japan
Phone: +81-3-3621-7750 Fax: +81-3-3621-7785
www.tadano.com E-mail: info@tadano.com



GR-1000EX/900EX/700EX-4 E-20-3-03-786-606-A
Printed in Japan

GR-1000EX-4

100 METRIC TON CAPACITY

GR-900EX-4 GR-700EX-4

90 METRIC TON CAPACITY

70 METRIC TON CAPACITY

NEXT GENERATION



Photo: GR-1000EX-4 (optional model)

*The GR-EX Models:
High Quality We Are Proud Of*

Next-Generation RTs

In the making of products at Tadano, our number one priority is safety. These fully equipped cranes feature comfortable cab newly designed with an emphasis on stable operability for the operator. Using Tadano's vaunted state-of-the-art control technology, we have safely enhanced functionality while also optimizing operational efficiency and minimizing environmental impact. Backed by trust earned over many years, Tadano's high levels of safety, quality, and efficiency adapt to the changing needs of your business. Our next generation of cranes carries on this tradition. Experience new rough terrain cranes which are the pride of Tadano!



Photo: GR-1000EX-4 (optional model)

GR-1000EX-4

New 100 t lifting capacity and class-leading 51 m long boom create new demand by expanding the range of work.

Crane capacity: 100 metric ton
5-section boom: 51.0 m
2-staged bi-fold jib: 10.1 m / 17.7 m
Overall length: approx. 15,185 mm
Overall width: approx. 3,315 mm
Overall height: approx. 3,805 mm



GR-900EX-4

New 90 t lifting capacity model was developed to be a highly competitive product.

Crane capacity: 90 metric ton
5-section boom: 47.0 m
2-staged bi-fold jib: 10.1 m / 17.7 m
Overall length: approx. 14,375 mm
Overall width: approx. 3,315 mm
Overall height: approx. 3,805 mm



GR-700EX-4

A class-leading 47 m long boom with 70 t lifting capacity will create new kinds of demand.

Crane capacity: 70 metric ton
5-section boom: 47.0 m
2-staged bi-fold jib: 10.1 m / 17.7 m
Overall length: approx. 14,375 mm
Overall width: approx. 3,315 mm
Overall height: approx. 3,820 mm



Photo: Optional model

Crane		Carrier	
Ultimate Boom for Rough Terrain Crane	03	Travel Speed	11
New Super structure Frame	04	High Performance Engine	12
Winch Drum Camera		New Carrier Frame	
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Tilttable Cab		Axle	
Bi-Fold Jib		4 Steering Modes	
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Large Multi-Function Display			
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NEW DESIGN

Ultimate Boom
for Rough Terrain Crane

Crane

The rounded boom is made of high tensile steel, which allows for decreased boom weight as well as increased boom strength. In addition, the high-performance AML-E ensures operational safety.

Longest boom and speedy operation

Max. boom length: **51.0 m** [GR-1000EX-4]

47.0 m [GR-900EX-4]

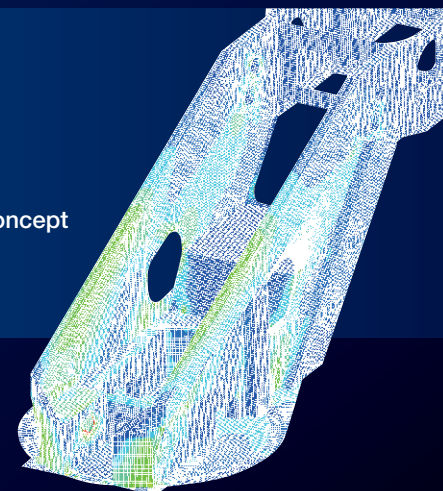
47.0 m [GR-700EX-4]

Telescoping mechanism: 2 hydraulic cylinders with wire ropes
Synchronization telescopic system makes the fast operation possible
2 telescoping modes selectable according to works.

New Super structure Frame

When developing the crane structure, importance is attached to the shape that is best suited for crane operation. FEM analysis is used to create the design. It is also important that the slewing structure be true to Tadano's original concept and be both rigid and compact while maintaining a desirable overall height.

*FEM: Finite Element Method



Emergency
Engine
Stop Switch



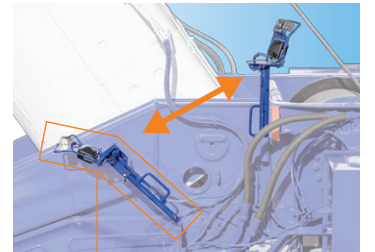
Rubber Floor Mat



Outrigger
Control
Panel



Winch Drum Camera



Stowed position when transporting

Two-Roll Sunshade



Adjustable in any position

Longer Wiper Blade

Flat Windshield

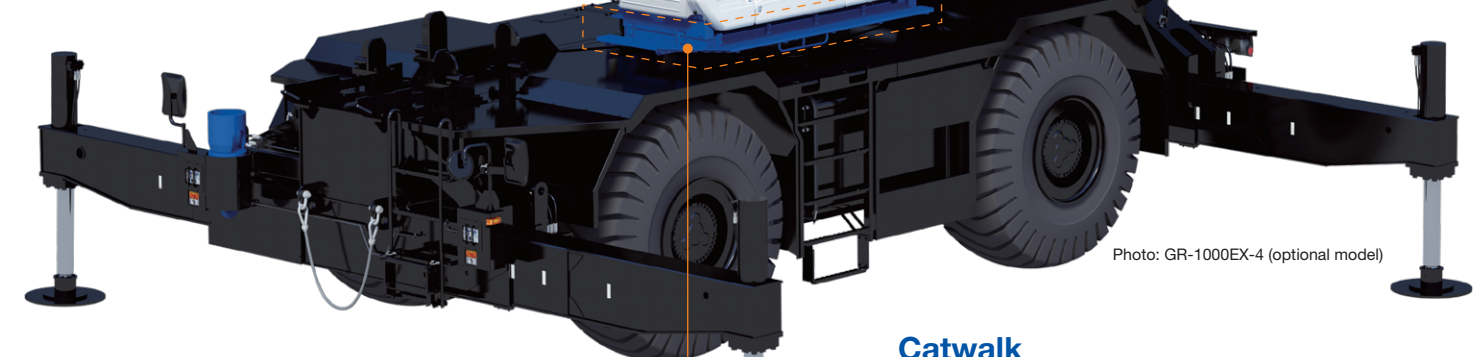
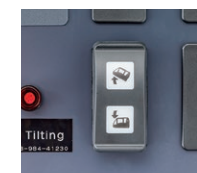


Photo: GR-1000EX-4 (optional model)

Catwalk
for Easy Access to Cab



Cab tilt indicator
and switch

Tiltable Cab

You can operate the crane comfortably by tilting the cab during high hoisting operations such as lifting with the jib. The cab tilting angle is between 0° and 20°.



Bi-Fold Jib

A two-stage, bi-fold lattice-type jib can be offset at 3.5°, 25°, and 45° to enable the crane to carry out jobs that require extra reaching ability.

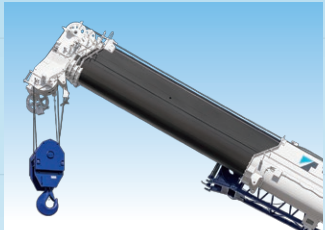
Assist Cylinder for Jib

When mounting and stowing the jib, the assist hydraulic cylinders are used resulting in increased work efficiency and safety.



Two Telescoping Modes 1 & 2

The operator has enhanced capabilities with two boom telescoping options whichever suits the lift needs.



Mode 1

Mode 1 is extension of 2nd section only. Then follows the synchronized extension of 3rd, 4th and 5th sections.



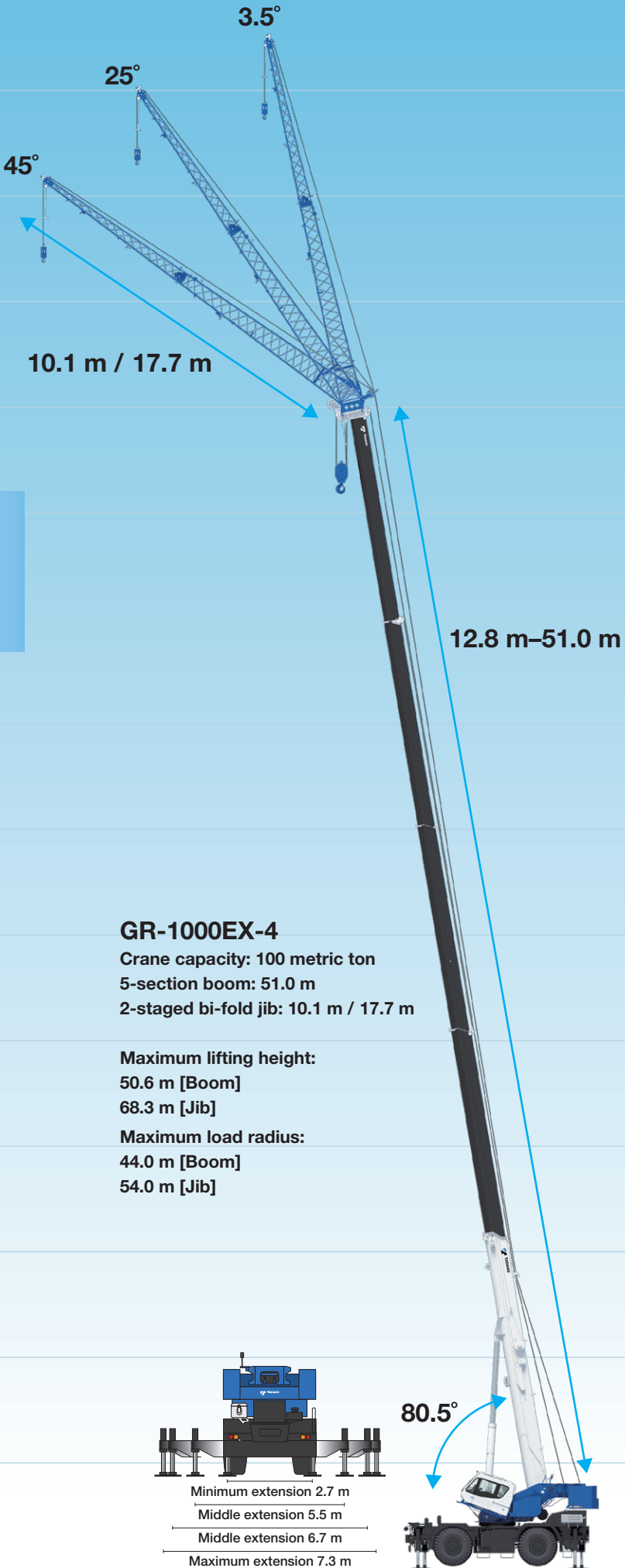
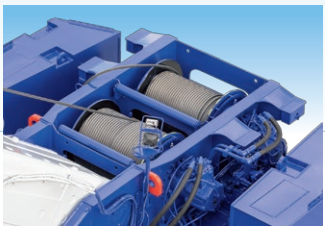
Mode 2

Mode 2 is synchronized extension of 3rd, 4th and 5th sections. Then 2nd section extends independently.

Two Winches with Cable Follower

Both the main winch and the auxiliary winch have powerful line pull and operate at high speeds thus enhancing work efficiency.

*Maximum permissible line pull may be affected by wire rope strength.

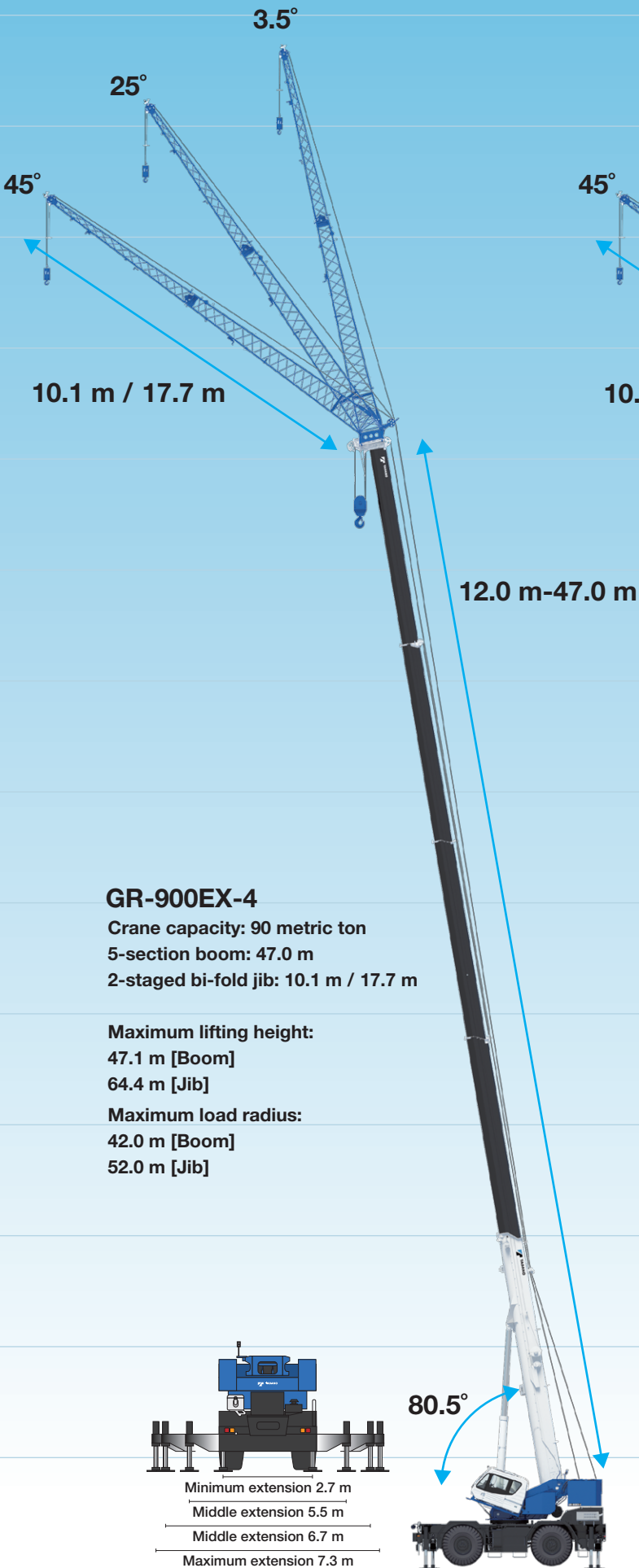


GR-1000EX-4

Crane capacity: 100 metric ton
5-section boom: 51.0 m
2-staged bi-fold jib: 10.1 m / 17.7 m

Maximum lifting height:
50.6 m [Boom]
68.3 m [Jib]

Maximum load radius:
44.0 m [Boom]
54.0 m [Jib]

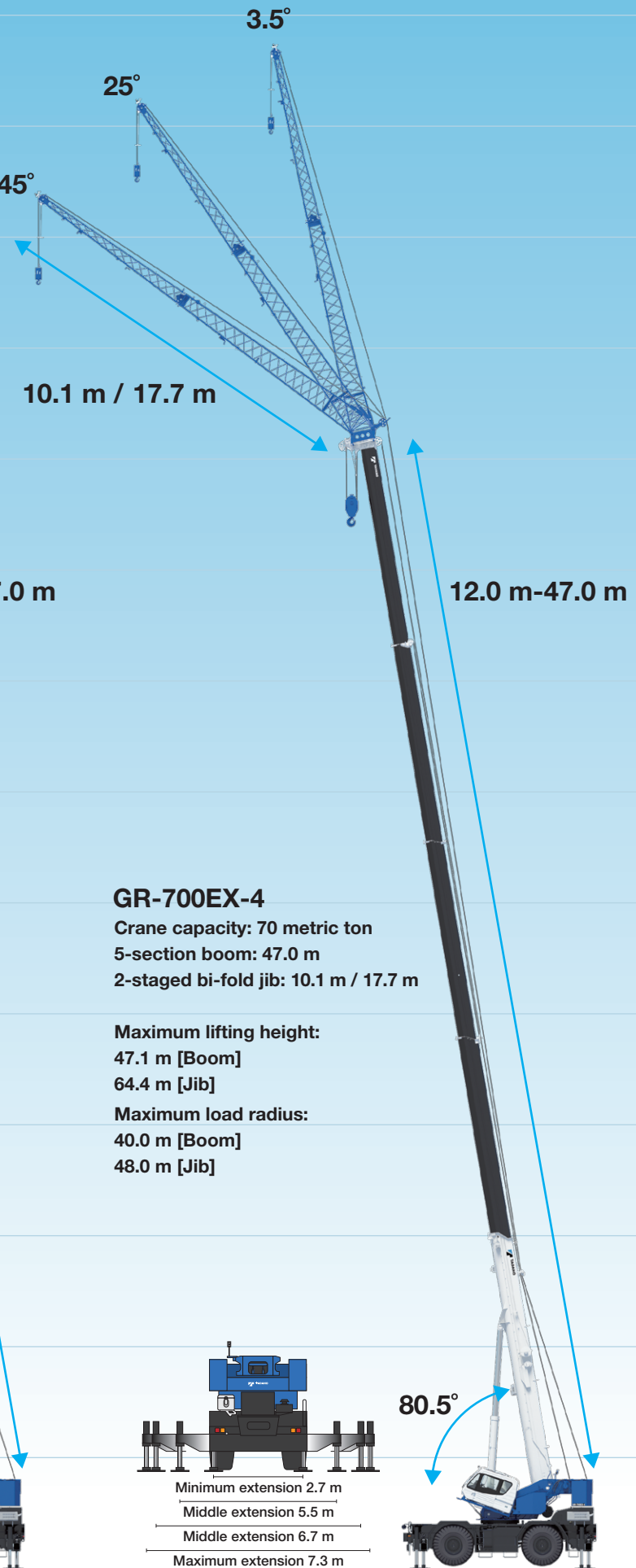


GR-900EX-4

Crane capacity: 90 metric ton
5-section boom: 47.0 m
2-staged bi-fold jib: 10.1 m / 17.7 m

Maximum lifting height:
47.1 m [Boom]
64.4 m [Jib]

Maximum load radius:
42.0 m [Boom]
52.0 m [Jib]



GR-700EX-4

Crane capacity: 70 metric ton
5-section boom: 47.0 m
2-staged bi-fold jib: 10.1 m / 17.7 m

Maximum lifting height:
47.1 m [Boom]
64.4 m [Jib]

Maximum load radius:
40.0 m [Boom]
48.0 m [Jib]

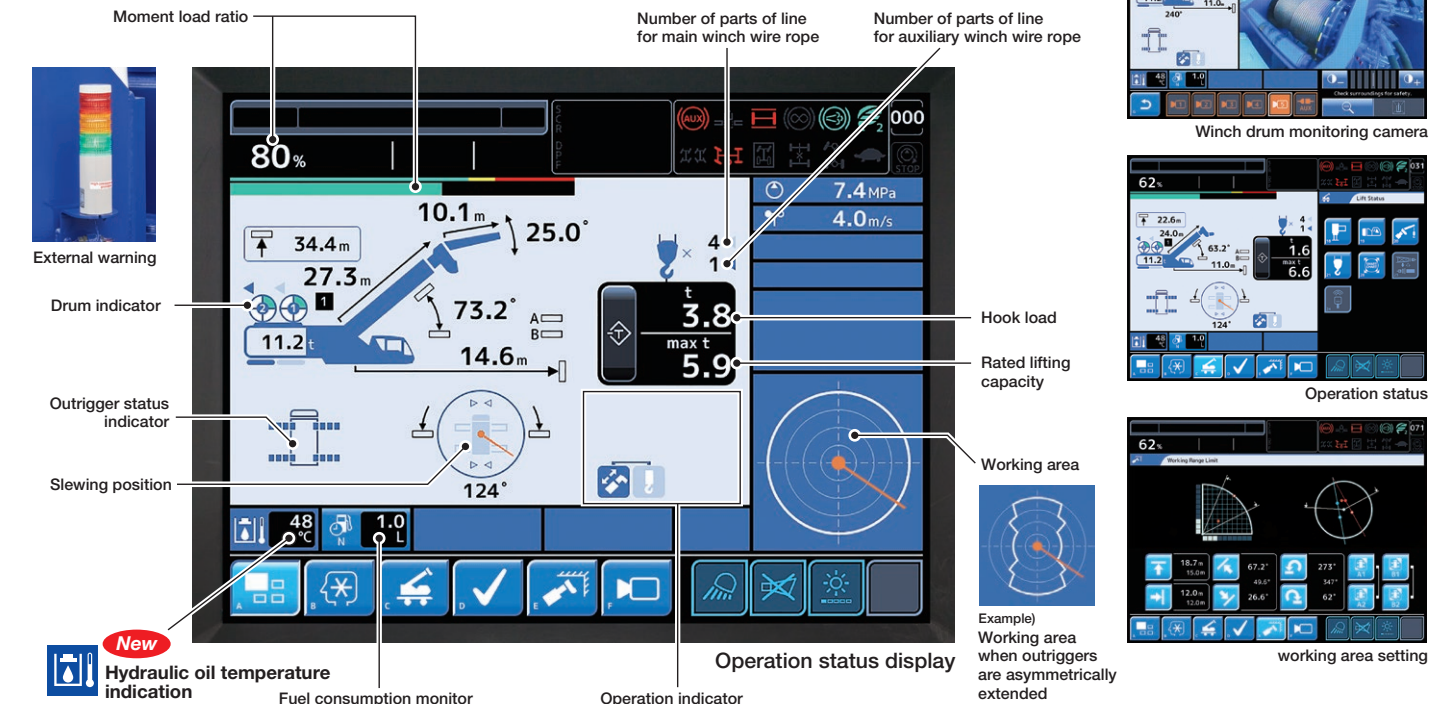
Optimally-Designed Cab

Crane cab and equipment designed for safety and operational efficiency.

Automatic Moment Limiter [AML-E]

Large Multi-Function Display

The 10.4 inch color touch panel consolidates operation information and settings for increased work efficiency and comfort. The touch panel is pressure sensitive to handle gloved operation.



Seat Adjustment

Multiple seat adjustment positions for ease of operation.

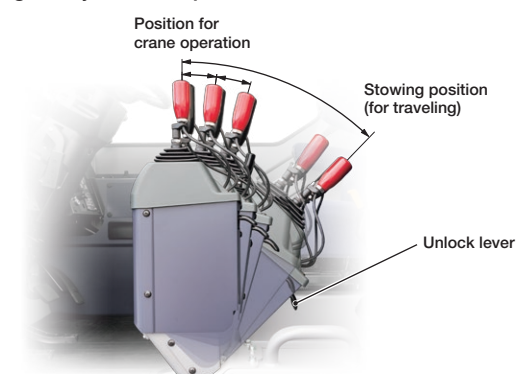


Adjustment of Control Lever Stand

- The control lever stand has a 3-stage adjustment feature.
- Before you enter or exit the cab, or when you complete the crane operation, set the control lever stand on the left to the stowing position.
- The unlock lever is used by pulling to adjust for all positions of the control lever stand.



The control levers are smooth and responsive to the operators touch.



Multi-Function Display Operation Switch

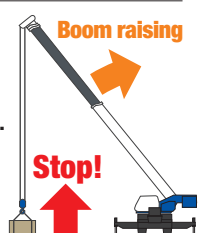
Convenient hand controls are also available for when operating the touchscreen is difficult (for instance when the seat is sliding back).



Safety Control for Boom Raising Operation

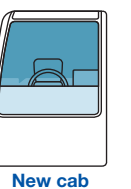
Prevent overload using boom raising operation for lifting a load off the ground.

*Release switch available for emergency operation



Visibility

The shape and height of the instrument panel as well as the angle of the windshield have all been designed for optimum forward visibility.



New cab



Smart Counterweight

SMART CW GR-1000EX-4

Uses the new Smart Counterweight System

These are the first rough terrain cranes with Tadano's Smart Counterweight system, which allows the counterweight to be moved between two mounting positions. This feature improves lifting capacity by up to 20%.

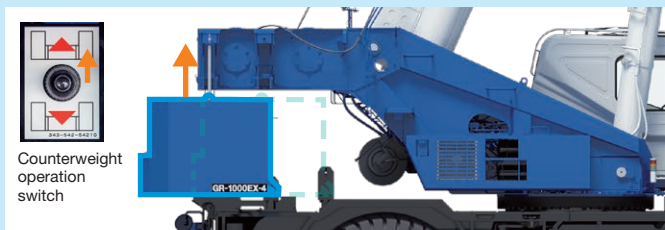
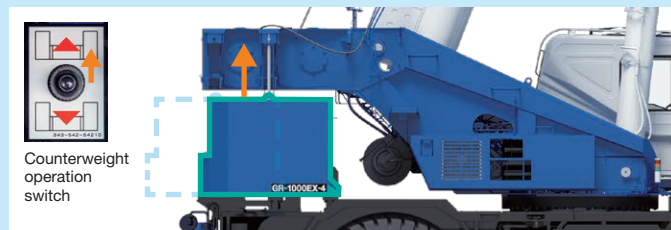
Smart Counterweight 1(Front position)



Smart Counterweight 2(Rear position)



Hoist the counterweight and set it in either the front or rear position.



Slew the crane 180° and fully extend the counterweight cylinder.
Connect the weight with the slewing table and retract the cylinder, fixing it in place.

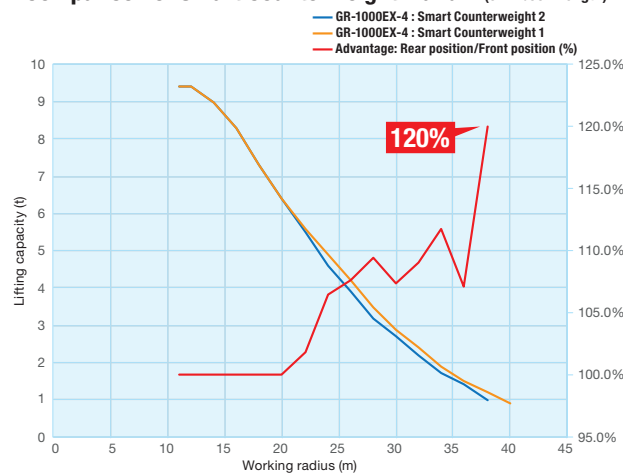


Tail Swing: 4,190 mm

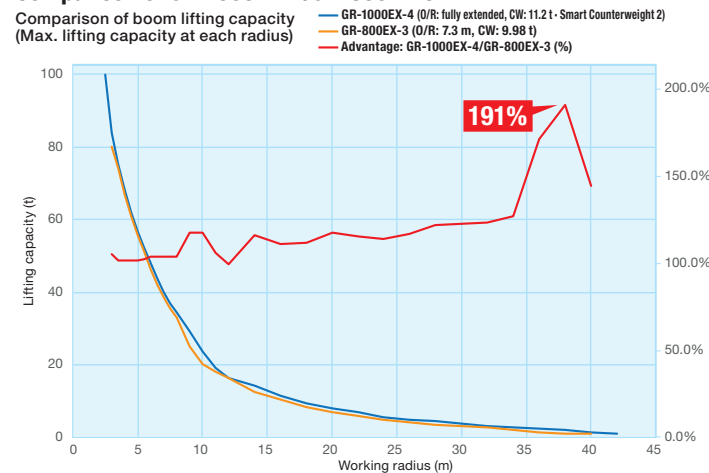


Tail Swing: 4,790 mm

Comparison of Smart Counterweight 1 and 2 (51m boom length)



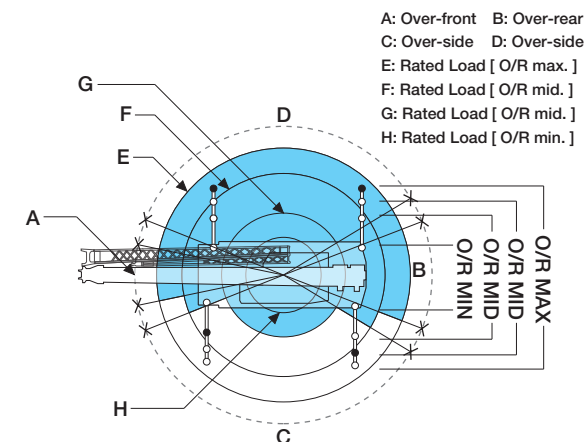
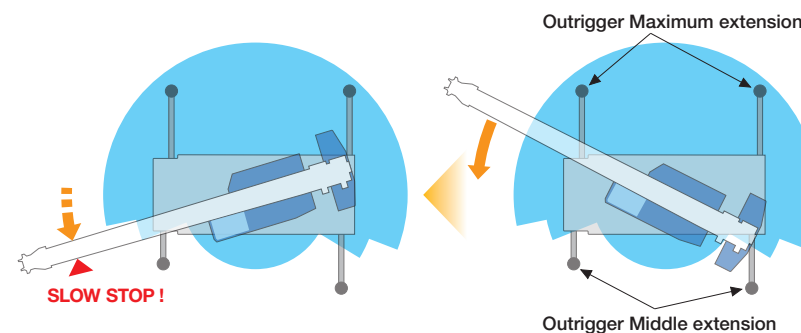
Comparison of GR-1000EX-4/GR-800EX-3



Asymmetric Outrigger Extension Width Control

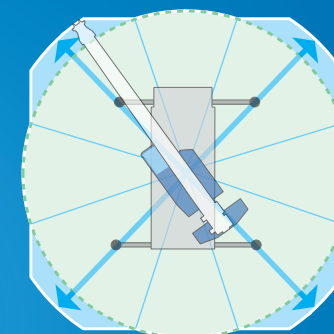
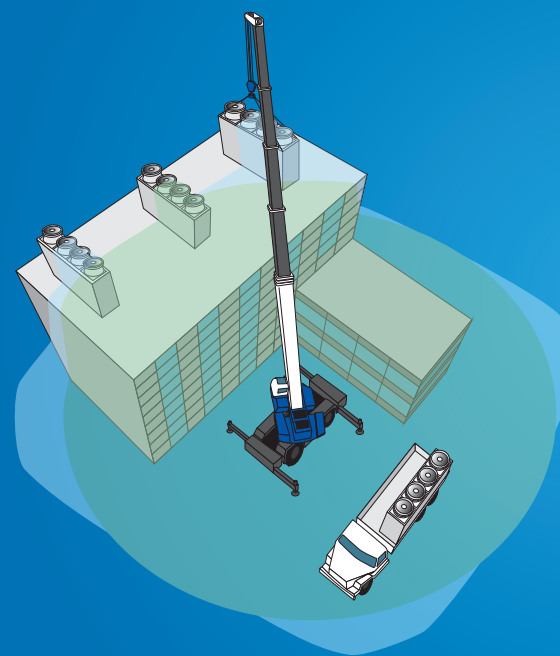
When operating the crane with the asymmetric outriggers extended, the AML-E detects the extension width of all of the crane's outriggers (front, rear, left and right) to measure maximum work capacity in each area. When slewing the boom from the longer outrigger area to the shorter outrigger area, the AML-E detects the motion and displays the maximum capacity according to the extension width of each of the outriggers, and brings the motion to a slow stop before it reaches the maximum capacity.

The AML-E's slow stop function will help to minimize any safety risks even in the cases of operator error.

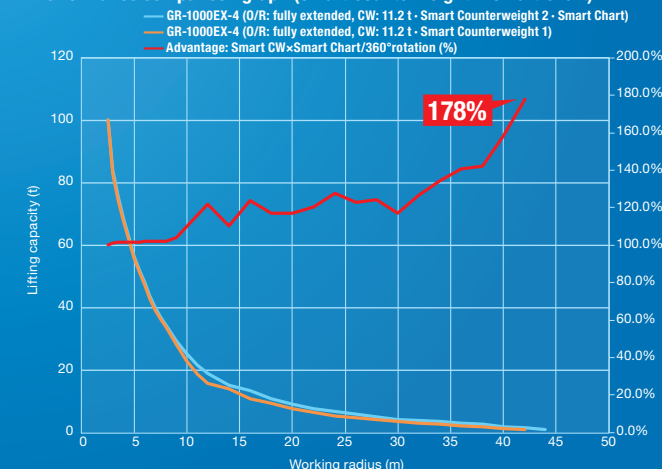


Smart Chart System

The newly developed Smart Chart expands the working area, allowing you to get the best crane performance in any outrigger extension setup.



Performance comparison graph (Smart Counterweight + Smart Chart)



In maximum outrigger extension setups

The Smart Chart taps the potential of a crane by expanding the conventional circular working area into a square one, improving work safety and efficiency.

Carrier

The GR-1000EX-4, GR-900EX-4 and GR-700EX-4 has a compact width/height 2-axle carrier which offers improved maneuverability and reduced footprint for ease of transportation.

Travel Speed: 36 km/h

High Performance Engine

Mitsubishi 6M60-TLU3R
4 cycle, turbo charged and after cooled,
6-cylinder, direct injection diesel type.

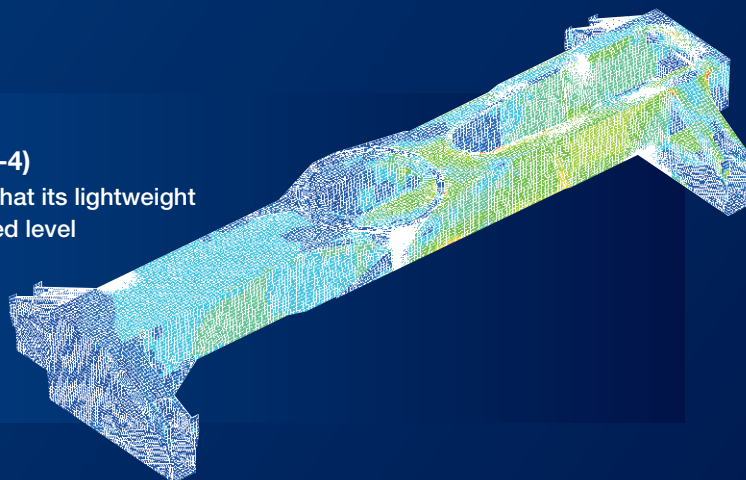
Horse power (kW): Gross 200 (267) at 2,600 min⁻¹ {rpm}
Max. torque ft-lb (Nm): 785 at 1,400 min⁻¹ {rpm}

Photo: GR-1000EX-4 (optional model)

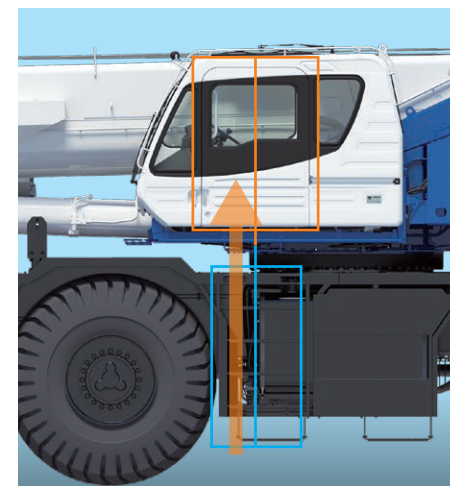
New Carrier Frame (GR-1000EX-4, GR-900EX-4)

The new carrier frame design is developed and built so that its lightweight is compatible with its high rigidity to achieve an advanced level of performance. As a result, the rigidity is enhanced and leads highly stabilized maneuverability for the new model of crane.

*Compared with our conventional crane models



Improved Accessibility to Cab



Axle

Front: Full floating type, steering and driving axle with planetary reduction.

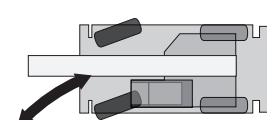
Rear: Full floating type, steering and driving axle with planetary reduction and non-spin rear differential.



Photo: GR-1000EX-4 (optional model)

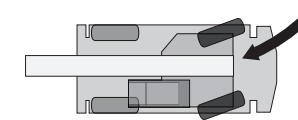
4 Steering Modes

Hydraulic power steering controlled by steering wheel.



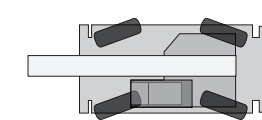
2 wheel front

Front steering only.
This steering method is the same as that of general vehicles.



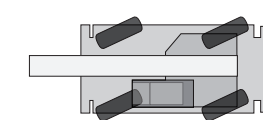
2 wheel rear

Rear steering only.
The rear end of the vehicle swings outward like a forklift. Useful for easy approach of a narrow area.



4 wheel coordinated

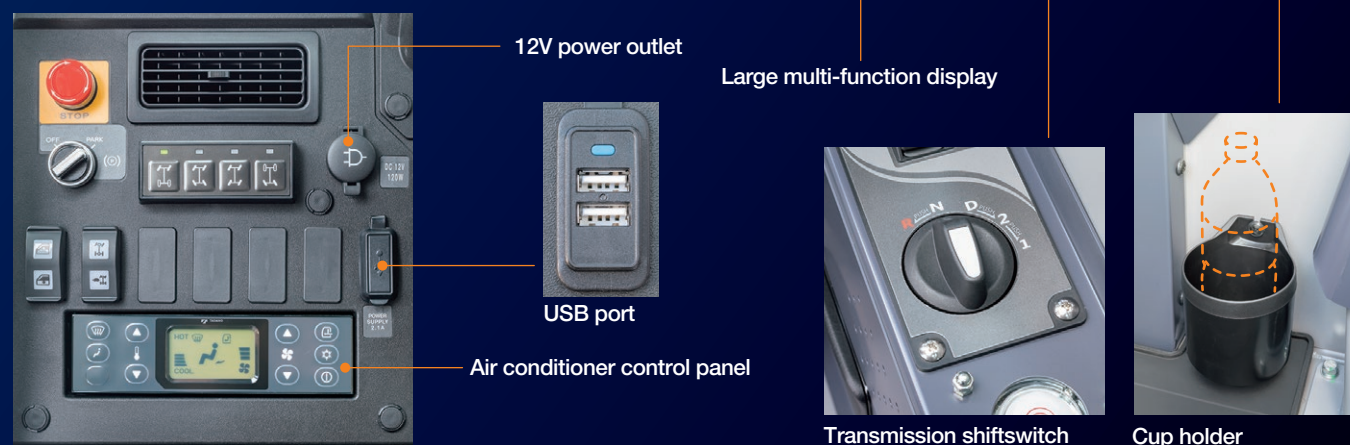
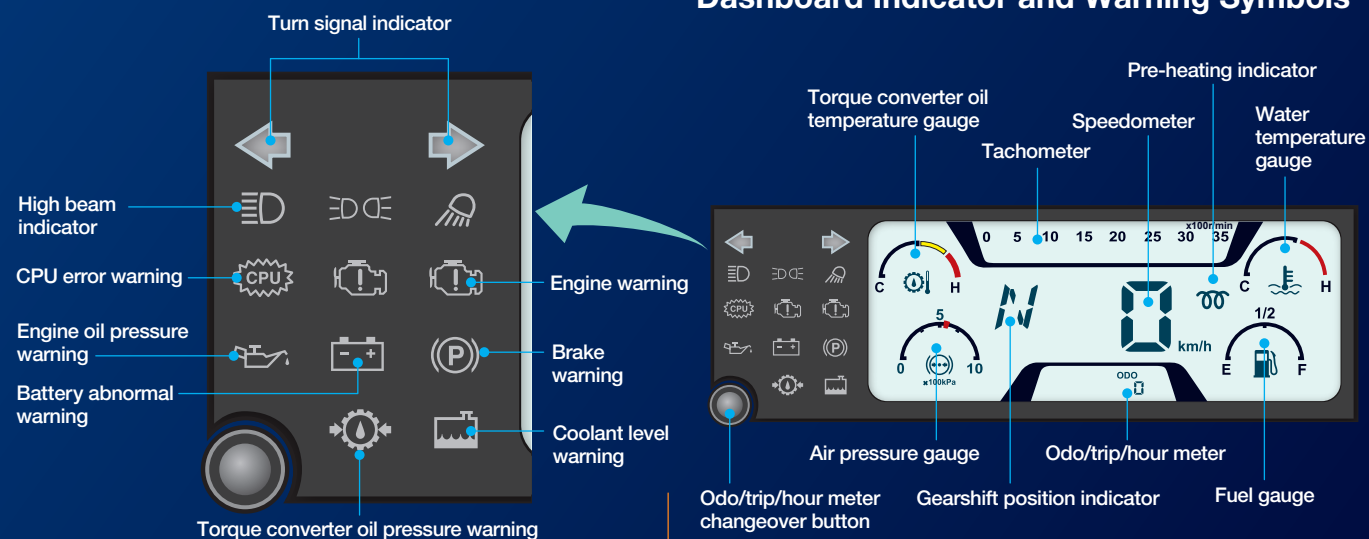
Front and rear wheels are steered in opposite directions. The turning radius is decreased. Useful for movement in a small area.



4 wheel crab

Front and rear wheels are steered in the same direction. The vehicle can move diagonally. Useful for pulling over.

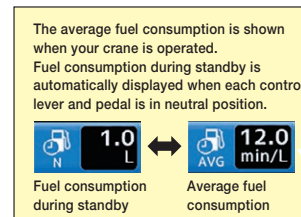
Dashboard Indicator and Warning Symbols



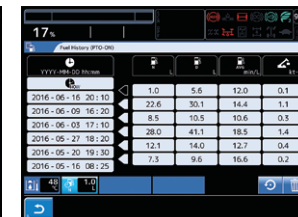
Reduced Fuel Consumption

Fuel Monitoring

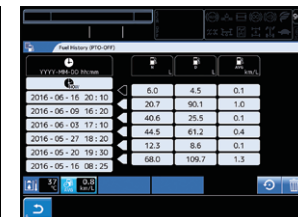
Checking fuel consumption enables an operator to prevent wasteful fuel consumption from unnecessary acceleration and idling.



Preset menu display (during crane operation)



Fuel consumption history display (during crane operation)



Fuel consumption history display (during traveling)

Positive Control System

Effectively controls the quantity of hydraulic pump discharge during crane operation in response to the amount of movement applied, and reduces CO₂ consumption.

Eco Mode System

Controls the maximum engine speed at the time of crane operation and enables fuel consumption and CO₂ emission to decrease by Max. 23% with Eco mode 1, and Max. 37% with Eco mode 2, and noise level is reduced.

Automatic Pump Disconnect

When the automatic pump disconnect switch is set to ON and the crane is not in use for a duration of time, the crane's hydraulic pump automatically shuts off, helping to reduce fuel consumption. Three settings are available for the duration of the crane operation standby before the pump shuts off: MIN, MID and MAX.

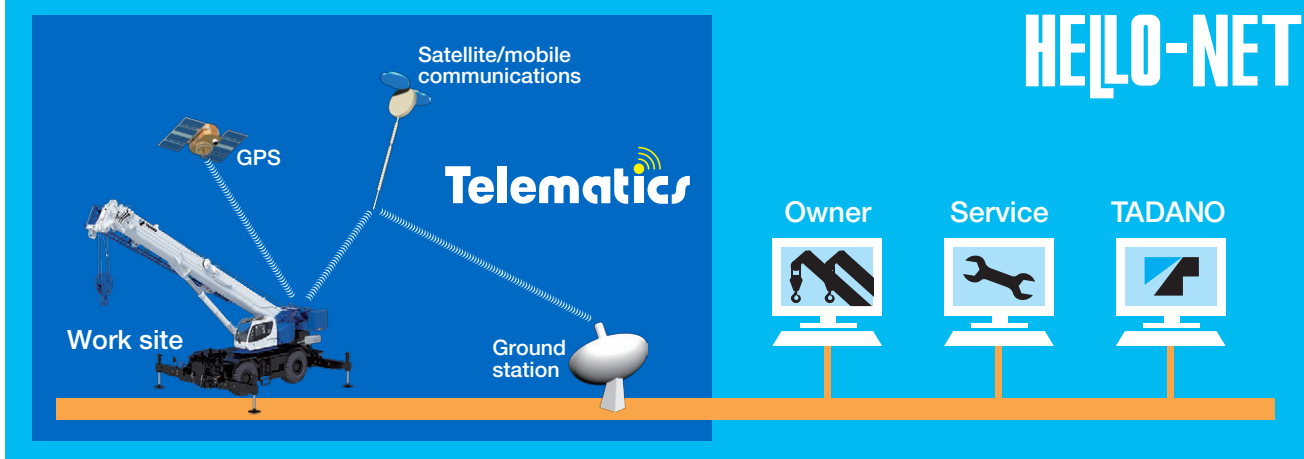
MIN: 1 minute MID: 3 minutes MAX: 5 minutes

Fuel consumption
CO₂ emissions

Down
max.
8%

HELLO-NET

HELLO-NET is a tool that connects the crane operations with owners, their service staff and the manufacturer through satellite. This high quality telematic tool collects data of the crane including working history, maintenance data and machine location. HELLO-NET can be accessed by the manufacturer to assist with downtime and to help improve Tadano support services.



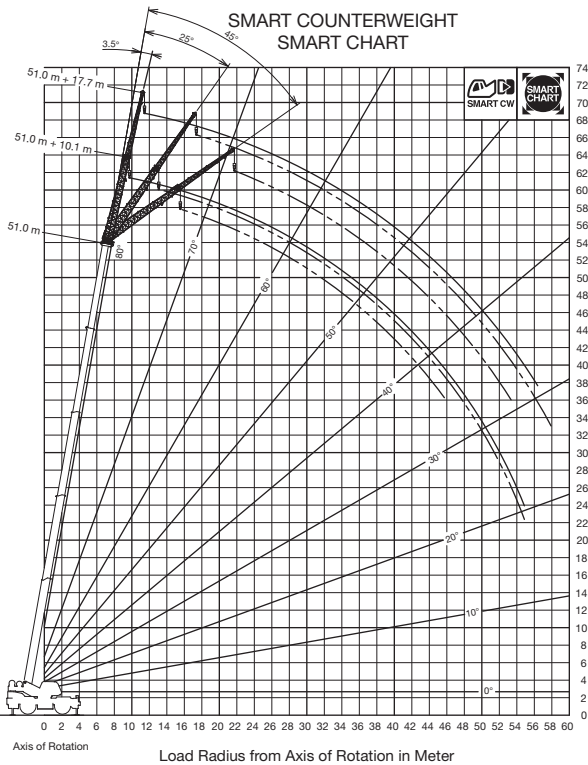
Telematics (machine data logging and monitoring system) with HELLO-NET via internet (*availability depends on the situation).

DETAILS: The availability of data communication systems, such as satellite or mobile communications which serve to widen the service area differs according to individual countries. Besides, there are some countries where the system itself is not in use yet. For details, please contact your distributor or our sales staff in charge.

WORKING RANGE & DIMENSIONS

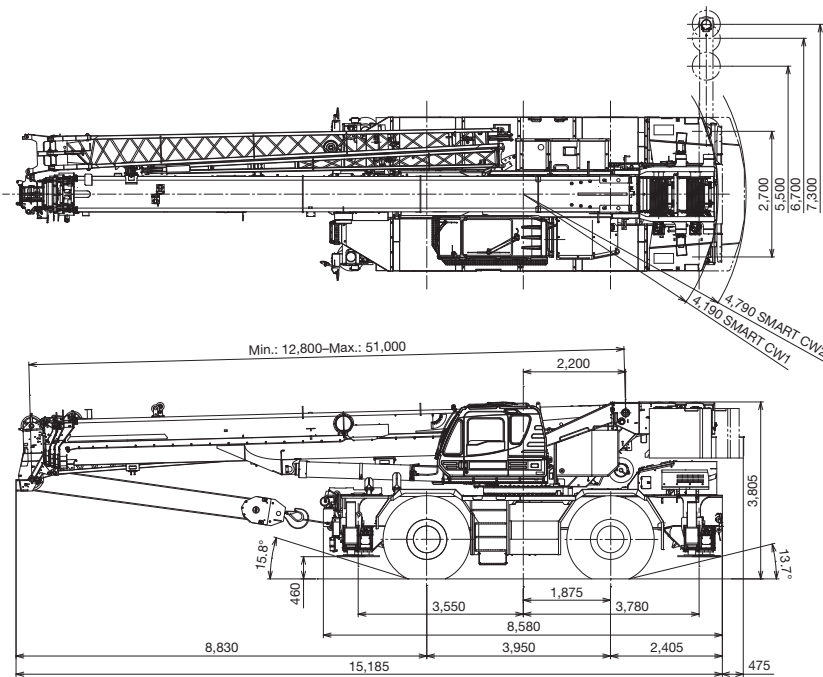
GR-1000EX-4

WORKING RANGE



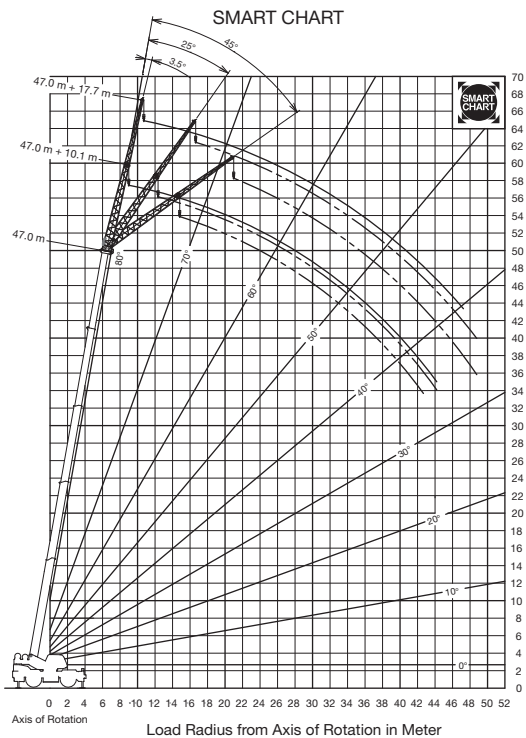
DIMENSIONS

Note: Dimension is with boom angle at -1.5 degree.
(mm)



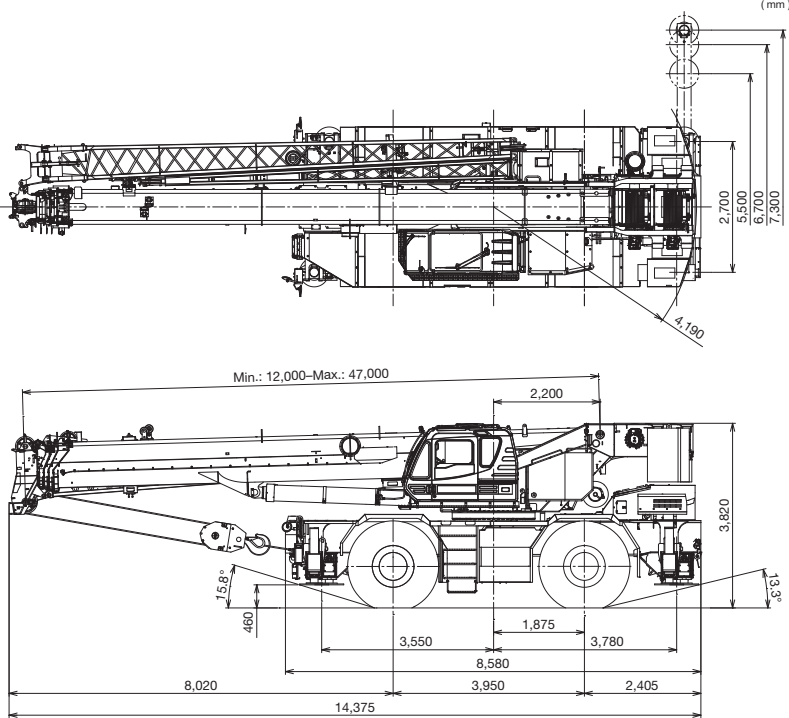
GR-700EX-4

WORKING RANGE



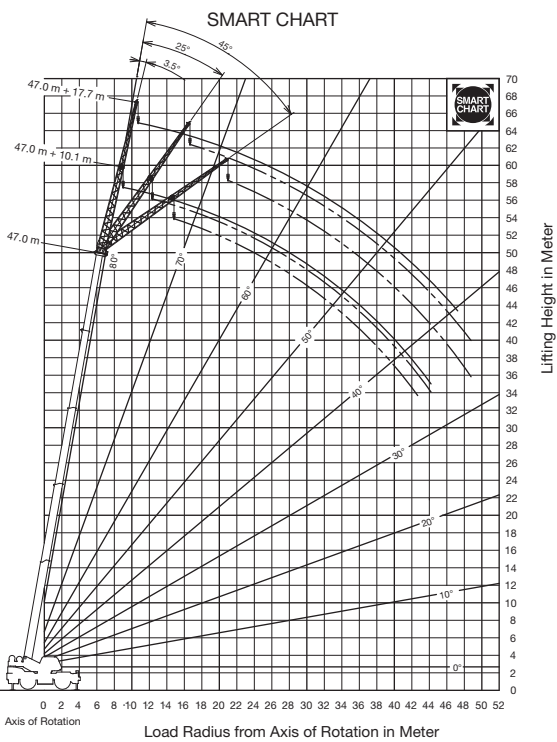
DIMENSIONS

Note: Dimension is with boom angle at -1.5 degree.
(mm)



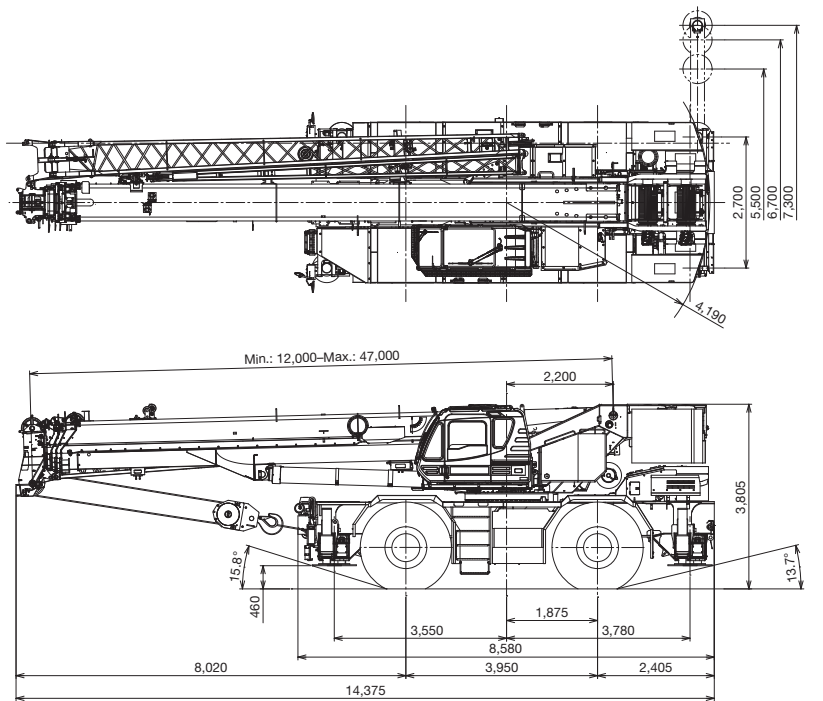
GR-900EX-4

WORKING RANGE



DIMENSIONS

Note: Dimension is with boom angle at -1.5 degree.
(mm)



Standard Equipment



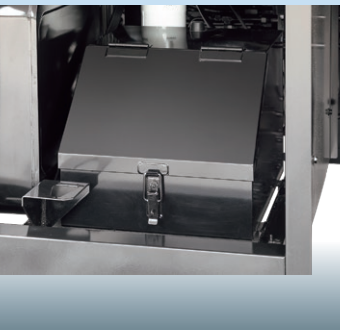
Front steps



Right side steps



Rear steps



Tool box



Battery Disconnect Switch



Work Light