

POWERSCREEN® GLADIATOR MT1150SR

PORTABLE ELECTRIC CONE CRUSHING PLANT



TECHNICAL SPECIFICATION - REV 1 01/01/2022





GLADIATOR MT1150SR



OVERVIEW

SPECIFICATION

Transport	Length	64' 6" (19.66m)
	Height	14' (4.27m)
	Width	11' 11" (3.63m)
Working	Length	64' 6" (19.66m)
	Height	15' (4.57m)
	Width	12' 10" (3.9m)

Plant Colour RAL 5021, RAL 7024

Total Weight: 113,000lbs (51,256kg)

Axle Load: 60,000lbs (27,216kg)

King Pin Load: 53,000lbs (24,040kg)

The Powerscreen Gladiator MT1150SR is a wheeled, electric drive closed circuit cone crushing / screening plant. This closed circuit crushing and screening plant incorporates the tried and tested TC1150 cone crushing chamber coupled with the 20' x 6' H6203 Horizontal screenbox for recirculation.

FEATURES & BENEFITS

- Output potential of up to 450 tph / 496 US tph - depending on material type and crusher settings.
- Accepts clean 'all in feed'.
- Excellent product shape.
- High reduction ratio.
- Metal detector as standard
- Access ladders on both sides to access the upper deck.
- E-Stops on both sides of the unit.

APPLICATIONS



Aggregate
 Sand & gravel
 Blasted rock
 River rock



Recycling
 C&D waste
 Overburden
 Foundry waste



Mining
 Processed ores
 Processed minerals



GLADIATOR MT1150SR



CONE CRUSHER

- Crusher type:** 1150 Automax® crusher fitted as standard with short throw eccentric
- Liners:** Manganese steel alloy mantle & concave
- Standard concave:** Medium Coarse (MC)
- Lubrication:** Pumped system having a chassis mounted lube tank with air blast cooler
- Adjustment:** Hydraulic setting adjustment, automatic overload release & hydraulic unblocking
- Control:** 2 Operating modes available:
 - Autoset Mode: fixed parameters
 - Maxset Mode: load sensing, parameters auto adjust & maximise performance. Variable speed.
- Concave options:** Extra Coarse (XC)
 Fine (F)
 Common upper frame for all liners
- Mounted:** Mounted on 4 x isolators
- Drive:** 300hp (224kW) WEG electric motor @1800rpm

CRUSHER OPTIONS

LINER PROFILE	MAXIMUM FEED SIZE	MAXIMUM RECOMMENDED CSS
Fine	120mm (4.7")	32mm (1.26")
Medium Course	190mm (7.5")	38mm (1.6")
Extra Coarse	220mm (8.7")	45mm (1.8")





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SCREENBOX

20' x 6' 4" (6.1m x 1.93m) (All 3 decks)

3 deck triple shaft horizontal screenbox

Oval stroke adjustable up to maximum of 3/4" (19mm)

Oval stroke angle adjustable from 30° - 60°

Breaker-box with wear resistant steel replaceable wearplate

Hi-torque screen motor mounted direct to

Screenbox, pulley driven

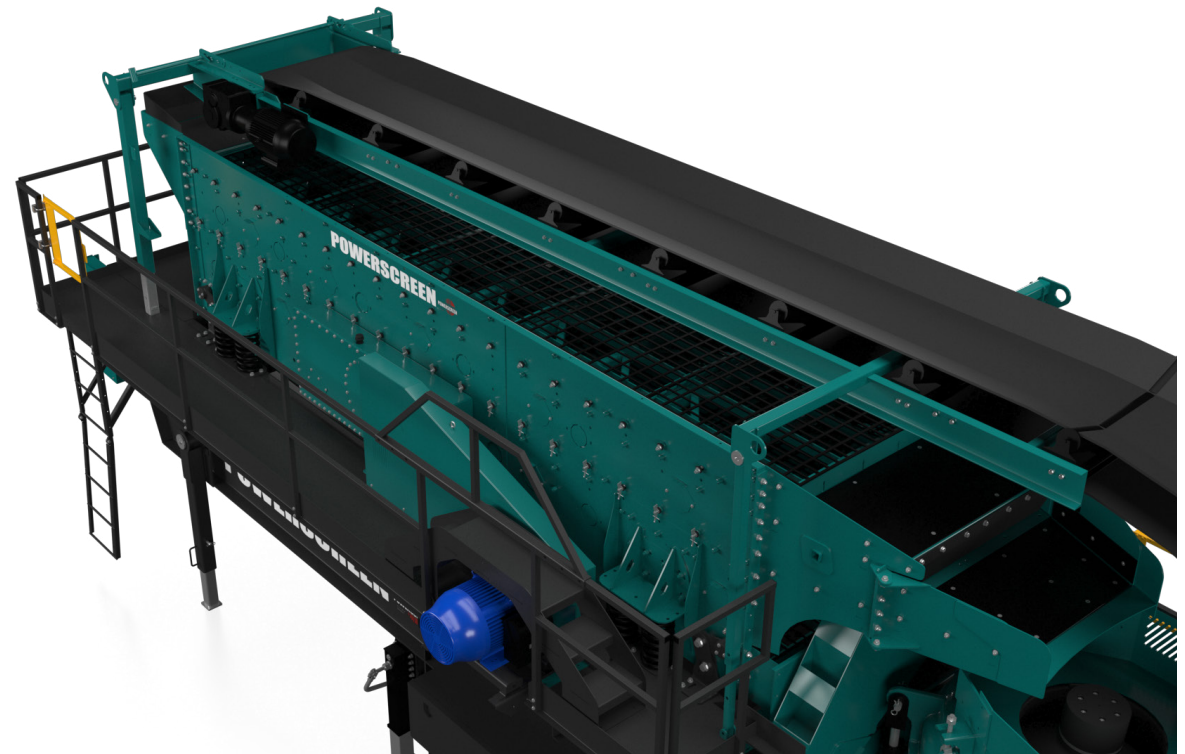
Steel springs

Wear plates on pipeunits

Side tensioned all decks

Quick release wedge tensioning system
(optional depending on screen media)

40hp (30kW), 1200rpm screen motor





GLADIATOR MT1150SR



DISCHARGE CONVEYOR

Belt Width:	54" (1370mm)
Belt Type:	Plain
Belt Spec:	3 ply 3/16" x 1/16"
Max Speed:	350 ff/min (107 m/min)
Discharge Height:	5' 6" (1.69m)
Stockpile Capacity:	9.4 yd ³ (7.2m ³)
Motor:	10hp (7.5kW)

Flexco™ scraper





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OVER SCREEN CONVEYOR

Belt Width:	42" (1060mm)
Belt Type:	Plain
Belt Spec:	3 ply 330 PIW
Max Speed:	350 ff/min (107 m/min)
Motor:	20hp (15kW) WEG

Conveyor is manually raised and lowered for transport - lifting and bottle jack points are included. There is an intentional break in the conveyor to aid easy Cone mantle change.





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UNDER CRUSHER CONVEYOR

Belt Width:	36" (915mm)
Belt Type:	Plain
Belt Spec:	3 ply 330 PIW
Max Speed:	350 ff/min (107 m/min)
Motor:	10hp (7.5kW) WEG

Conveyor is fully skirted.





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CROSS CONVEYOR

Belt Width:	24" (610mm)
Belt Type:	Plain
Max Speed:	350 ff/min (110 m/min)
Motor:	5hp (3.75kW)





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↓ CHUTES

RETURN CHUTE

Fabricated from 3/16" mild steel.
Keyed liners made from 3/8" AR.
Reversible to discharge to feed conveyor or to the outside of the plant.

OVERFLOW CHUTE

Discharges to under crusher conveyor.

MIDDLE DECK CHUTES

Keyed 3/8" AR liners
Can discharge to either side





GLADIATOR MT1150SR



BOGIE

Type:	Heavy duty sprung triple axle
Size:	12 no. 11R X 22.5
No of Axles:	3
No of Studs:	10
Brakes:	Air brakes





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OTHER

EXTERNAL POWER REQUIREMENTS

460V
3 Phase
60 Hz

	Power
Cone	300hp (224kW)
Screenbox	40hp (30kW)
Discharge Conveyor	10hp (7.5kW)
Over Screen Conveyor	20hp (15kW)
Under Crusher Conveyor	10hp (7.5kW)
Cross Conveyor	5hp (3.7kW)
Optional Magnet	2hp (1.5kW)
Total Power Required	387hp (290kW)

CONTROL SYSTEM

Manual push button
Electrical option

SCREEN CHUTE

Top deck to cone
Middle deck to cone or chutes via removable doors
Chute is hinged to allow access to cone for mantle change

PLATFORMS

Self closing gates x 2
Fabricated ladders x 2
Fabricated from 3/16" diamond plate
Cone maintenance platform

UNDER SCREEN HOPPER

Fabricated from 3/16" mild steel

LANDING JACKS

2 x crank down landing jacks



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↓ OPTIONS

- Manual button switchgear panel - 300hp soft starter, 40hp screen starter and conveyor starters, 2 extra starters for off plant conveyors. No lead cord included.
- Deluxe switchgear panel - as above to include quick release plug and external interlocking
- 100ft lead cord
- 4 no of 6" x 16" levelling hydraulic jacks with 13hp Honda power unit
- 6 no of 6" x 24" run on hydraulic jacks with 13hp Honda power unit
- Long throw chamber



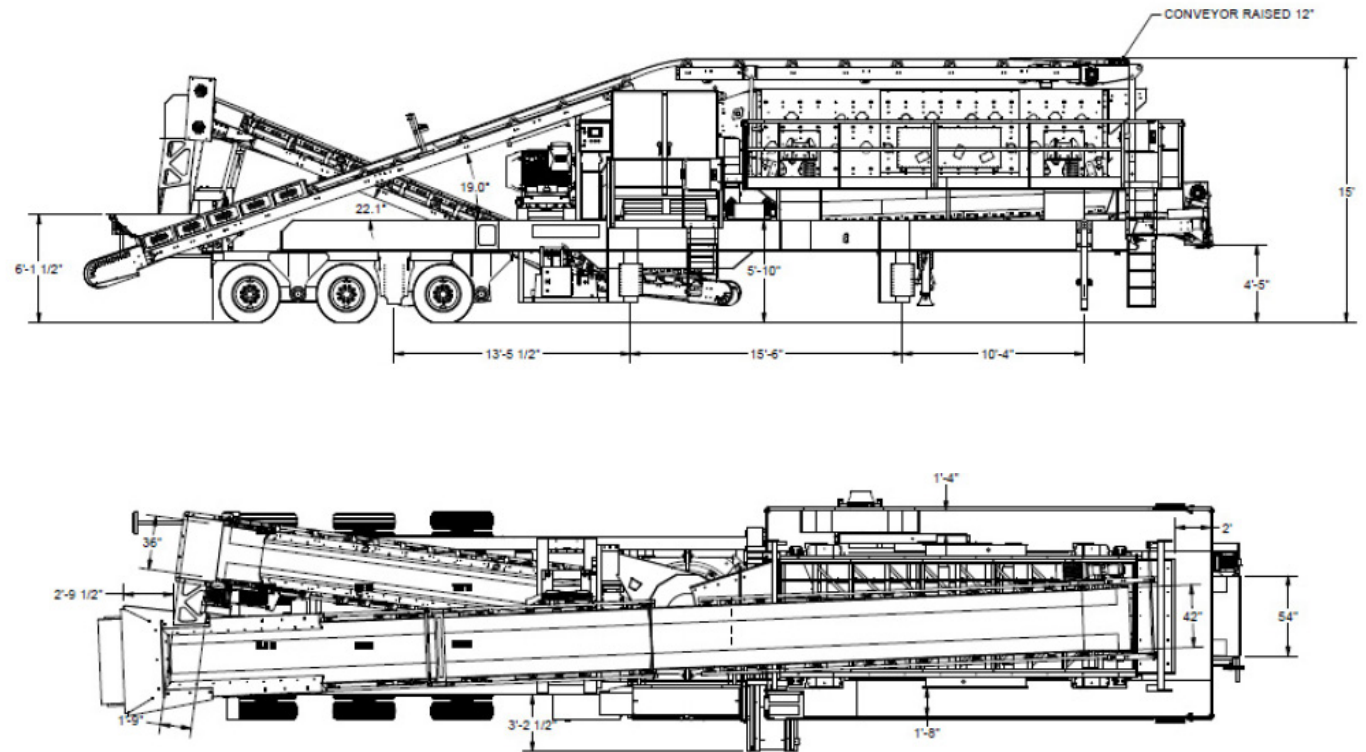


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DIMENSIONS

Figure 1: Gladiator MT1150SR
Working Position



- Total Weight:** 113,000lbs (51,256kg)
- Axle Load:** 53,000lbs (24,040kg)
- King Pin Load:** 60,000lbs (27,216kg)

[MORE DIMENSIONS OVERLEAF](#)

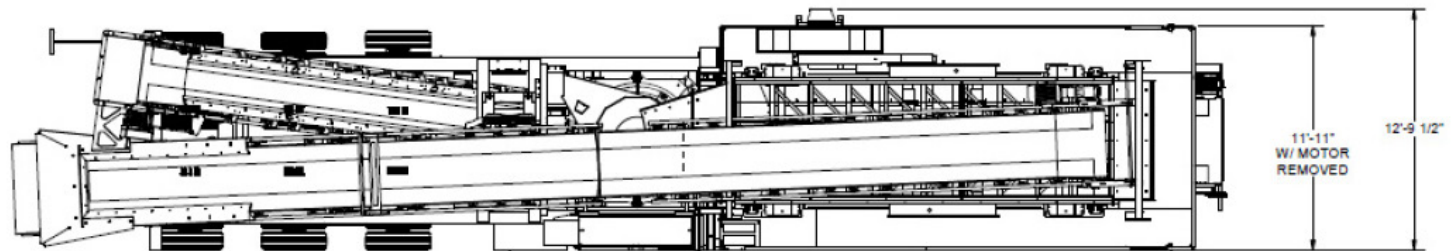
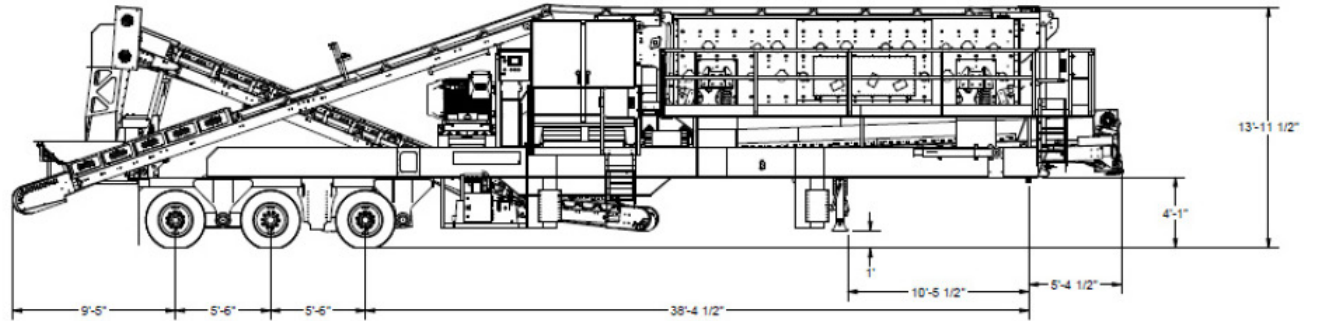


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↓ DIMENSIONS

Figure 2: Gladiator MT1150SR
Transport Position



- Total Weight:** 113,000lbs (51,256kg)
- Axle Load:** 53,000lbs (24,040kg)
- King Pin Load:** 60,000lbs (27,216kg)



Please consult Powerscreen if you have any other specific requirements in respect of guarding, noise or vibration levels, dust emissions, or any other factors relevant to health and safety measures or environmental protection needs. On receipt of specific requests, we will endeavour to ascertain the need for additional equipment and, if appropriate, quote extra to contract prices.

All reasonable steps have been taken to ensure the accuracy of this publication, however due to a policy of continual product development we reserve the right to change specifications without notice.

It is the importers' responsibility to check that all equipment supplied complies with local legislation regulatory requirements.

Plant performance figures given in this brochure are for illustration purposes only and will vary depending upon various factors, including feed material gradings and characteristics. Information relating to capacity or performance contained within this publication is not intended to be, nor will be, legally binding.

GET IN TOUCH

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