

Sandvik QI442

Tracked HSI crusher

The QI442 is a large heavy duty tracked impact crusher, featuring the Sandvik market leading Prisec™ technology. Capable of operating in primary and secondary applications, it has been designed with productivity, safety and user friendliness at its core.



Key benefits

Reliability

- Market leading Sandvik C1621 Prisec™ impact chamber for unrivalled flexibility and performance
- Patented adjustment / braking system for relieving blockages whilst in operation, thereby maximizing uptime
- Rock box and under pan feeder featuring wear resistant liners for extended wear life
- Premium components selected throughout and FEA analysis on structural parts for durability
- Steel pipe work used extensively to give superior heat dissipation and maximum reliability
- Capable of operating in the most hostile environments

Productivity

- Adjustable apron curtains and tip speed enable a wide range of end product gradations to be achieved
- Load sensing system for feeder drive ensures continuous crushing
- Pre-screen with choice of screen media for effective removal of fines, thereby maximizing throughput and reducing wear
- Selection of hammers to suit a wide range of applications
- Full PLC control system with colour screen allowing visual data output and push button adjustment of all plant operating parameters
- Connected to Sandvik My Fleet with 7 year data subscription offering 24/7 fleet management, geo-fencing and remote operator support
- Prepared for modular double deck hanging screen as standard to provide a 1, 2 or 3 way split (see QI442 HS for full specification)

Cost of ownership

- Latest generation fuel efficient engines provide maximum performance and cost efficiency
- Fluid clutch drive for smoother power transmission for optimum fuel efficiency and maximum power transfer
- Well-proportioned fuel tank to maximize intervals between refueling

Safety

- Patented rotor locking and positioning device for quick and safe maintenance
- Unique 4 key trapped system to ensure safe inspection after the rotor has stopped turning
- Includes integrated lifting jib, chain hoist and lifting cradle for safe removal, rotation and fitment of hammers
- Mandatory audible and visual warning for safe operation whilst tracking and start-up / shut down
- Emergency stop buttons and conveyor pull stop cords around the plant for easy access during operation
- Wireless radio handset and proportional speed control for safe tracking onsite
- Spacious platforms provide safe access for service and maintenance
- Dust suppression spray bars and onboard water pump to minimize dust improving operator and onsite safety

Sustainability

- Latest emissions compliant Stage V engine for reduced emissions
- Dust suppression system minimizes dust emissions reducing environmental impact
- Rock box and underpan feeder featuring wear resistant liners for extended wear life

Technical specification

Key specifications	QI442
Hopper	
Length	4.2 m / 13' 9"
Rear loading width	2.53 m / 8' 4"
Rear loading width with extensions	4.09 m / 13' 5"
Capacity	6.0 m³ / 7.85 yds³
Capacity with extensions	10.2 m³ / 13.3 yds³
Rear loading height std	3.97 m / 13' 1"
Primary feeder	
Wear resistant lined feeder	2390 mm x 1270 mm / 7' 10" x 4' 2"
Drive	Hydraulic variable speed
Pre screen	
Type	Double deck
Screen size	2160 mm x 1360 mm / 7' 1" x 4' 6"
Impactor	
Type	Sandvik CI621 HSI
Feed opening	1360 mm x 800 mm / 54" x 32"
Hydraulic inlet opening	1360 mm x 1000 mm / 54" x 39"
Variable speed 4 bar rotor	1150 mm / 45" diameter
2 aprons	Hydraulic assist
Main conveyor	
Belt width	1200 mm / 48'
Discharge height	4.07 m / 13' 4"
Underpan feeder	
Type	Spring mounted stepped vibrating feeder
Width	1020 mm / 40"
Length	2.4 mm / 95"
Magnet	
Model	Single pole overband magnet
Type	Self cleaning suspended

Key specifications	QI442
Natural fines conveyor	
Belt width	650 mm / 26"
Discharge height	3.08 m / 10' 1"
Tracks	
Length (centres)	4.17 m / 13' 8"
Width (shoe)	500 mm / 20"
Control	Radio / Umbilical
Power pack	
Engine	CAT C13 Stage 5 / T4F 340 kW / 456 hp CAT C13 T3 328 kW / 440 hp Direct wet clutch drive
Drive type	660 litres / 174 USG
Diesel tank capacity	660 litres / 174 USG
Hyd tank capacity	
Transport dimensions	
Length	15.70 m / 52'
Width	3.27 m / 10' 7"
Height	3.62 m / 11' 11"
Standard weight	56,879 kg / 125,396 lbs
Operating dimensions	
Length	16.52 m / 54'
Width	6.72 m / 22'
Height	4.47 m / 14' 8"
Performance	
Max feed size	800 mm / 32"
Capacity (up to)	500 tph / 551 stph *
Travel speed	1.4 km/h / 0.87 mph
Max incline / Side to side	20° / 10°

Note. All weights and dimensions are for standard units only

Standard specification

- Primary pan feeder
 - Vibrating pre-screen
 - Underpan feeder
 - Hopper extensions for rear loading
 - Natural fines conveyor
 - Folding main conveyor complete with dust covers
 - Single pole overband magnet
 - Tool kit
- Light mast and cabinet lights
 - Pull stop cords on all conveyors
 - Dust suppression spray bars
 - Remote diesel pump
 - Radio control tracking, proportional
 - Hydraulic water pump
 - Hydraulic jacking legs
 - My Fleet telematics