

TECHNICAL DATA SHEET

Goodwin submersible pumps have been manufactured since 1982 and are recognised as market leaders in terms of performance and reliability. The pumps have been continually developed over 4 decades resulting in machines that can perform in the most demanding environments.

Standard Engineering Features

- Single piece cast iron body to enhance rigidity and reduce wear
- Bearings run in oil bath for lubrication and cooling
- Twin volute casing design to reduce rotational imbalance and increase lifetime of bearings and seals
- Rotating inducer creates hydrodynamic shock waves to re-suspend settled particles beneath the pump inlet
- Carefully chosen wear resistant materials to maximise service lifetime
- Single stage, open vane impeller
- Precision bearings
- Non pressurised mechanical seal

Applications

- Open pit mine dewatering
- Mine tailings recovery and reprocessing
- Minerals processing separation, purification, concentration
- Power plant ash removal and cleaning
- Lagoon dredging and silt removal
- River water and dam desilting
- Harbour and dry-dock cleaning
- Steel slag transport
- Rolling mill scale and metal cutting swarf transport
- Sewage and waste transfer



Goodwin

Pump Data -

Design fluid handled	Slurry	
Maximum fluid SG	2.8 kg/l	
Maximum fluid solids content	65 % by weight	
Maximum particle size	32 mm	
Maximum fluid temperature	90 °C	
Recommended pH range	4-10	
Weight with lifting hitch	508 kg	
Outlet diameter	100 mm	
Maximum flow	230 m³/hr @ 1500rpm	
Maximum head	51 m (5.0 bar) @ 1800rpm	
Impeller diameter	320 mm	
Impeller tip speed	24 m/s @ 1800rpm	
Peak efficiency	62 %	
Maximum submergence depth*	28 m	
Motor displacement	63cc	
Speed range	1200 - 1800rpm	



Coating System

Surface preparation	Class 2.5
Undercoat	Two component high build epoxy coating. 125µm thickness (typical).
Top coat	Acrylic polyurethane high gloss. 50µm thickness (typical). Yellow to RAL 1003 / BS4800 08-E-51.

Other Data —

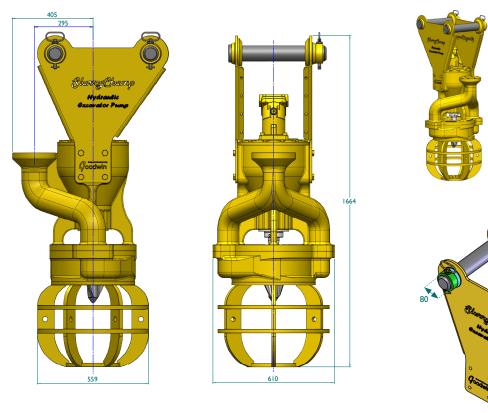
Outlet flange configuration	100mm PN16 M16*2.0P 8 places ø180mm PCD			
Hydraulic service live ports	SAE J518 Code 62 3/4 inch 6000psi			
Hydraulic service drain port	3/4 inch - 1600F-ZB			
Required hydraulic oil supply	RPM	Water	Slurry SG 2.0 Kg/l	
	1200rpm	73 Litres per minute @ 65 bar	73 Litres per minute @ 130 bar	
	1500rpm	93 Litres per minute @ 98 bar	93 Litres per minute @ 196 bar	
	1800rpm	108 Litres per minute @ 130 bar	108 Litres per minute @ 260 bar	
Allowable hydraulic pressure	Maximum Continuous 400 bar - Normal Operation 260 bar			

^{*}As standard, can be deeper if required.

Dimensions



100mm Pump (Fits 100mm PN16) M16*2.0P- 8 Places ø180mm PCD



Pump Curve

