



Xylem Rental Guide

Flygt | Godwin | PIMS | Sanitaire | Wedeco

0845 707 8012

24/7 Rapid Response

xylem
Let's Solve Water

Welcome to our Rental Guide

Through its market leading brands, Xylem has over 100 years experience in the water and wastewater environment, having developed the first electric submersible wastewater pump and offering clean water pumps, monitoring and control systems, Ozone and UV treatment in addition to aeration and filtration systems.

Our Rental division, specialises in the rental of Flygt electric submersible pumps, Godwin prime assisted diesel pumps and Wedeco and Sanitaire treatment systems.

We are delighted to add the hire of Xylem packaged treatment plants to our already extensive rental fleet, plus new supporting services through our comprehensive portfolio of TotalCare Services.

We are unique in the market place, as we only rent products that we manufacture, and our skilled team of engineers offer unprecedented technical backup and design of bespoke pumping and treatment systems, whether temporary or semi-permanent, for anything from a small amount of nuisance water to the movement of sewage and major flow diversion schemes.

By choosing Xylem Water Solutions for your rental requirements, you gain automatic access to a wealth of experience and technical knowledge. Our engineers can assess your needs, design your pumping or treatment system and install it..

Offering a 24/7 rapid response service, with fully owned transportation including lifting cranes and strategically located regional depots throughout the UK and Ireland, you can be confident in our ability to react quickly to your rental needs.



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General Guide to Pump Selection

Check:-

The Electrical Supply available – What Voltage, Single or 3 Phase and the Maximum Amperage. If the Power Supply is inadequate, please ask for details of Generators or consider using a Flygt Prime Assisted Diesel Pump.

Total Head Requirement - The most important calculation to get right! It is the sum of the Total Static Head (the vertical distance from the Suction Strainer to the point of Discharge) plus any Friction Loss allowances. When sizing a pump, the critical thing to determine is the Total Generated Head (TGH) requirement.

Calculation:-

Static Suction (strainer to the pump) + **Static Delivery** (from pump to the point of Discharge) + **Friction Loss** (resistance incurred by liquid when flowing through hoses) = **Total Generated Head**.

Dirty Water or Solids Handling?

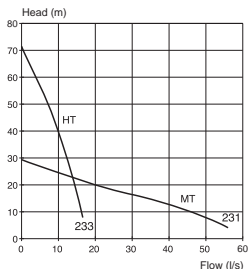
Use Drainer Submersibles (BS Series) and General Purpose Diesels for Dirty Water pumping and where particles are relatively small e.g. sand and gravel.

Use Sewage Submersibles (C/N Series) and Solids Handling Diesels for Sewage pumping and where particles are larger e.g. stones and debris.

Guide to Performance Data

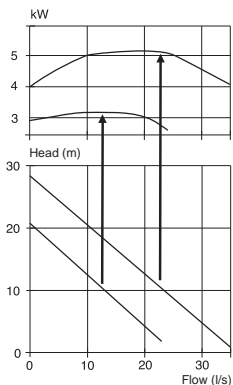
The following curves are QH charts showing the performance of the hydraulic unit at constant shaft speeds. Q is represented as litres per second, and total head, H, is in metres.

The data represented in this section is for your guidance only. Detailed information can be obtained from your local Xylem Sales Engineer.



BS and D Pumps

The curve is the specified performance of the impeller selected. The values shown are for a BS 2125 pump. Impeller characteristics are coded as follows: LT=Low head. MT=Medium head. HT=High head. SH=Super High Head.



C, D, H and N Pumps

The power consumption is shown on the chart. The power consumption values for two selected performance duty points are shown by plotted straight lines from the lower to the upper chart. The lower chart and corresponding table provide performance data for different impellers used in a high head 3102 pump. Additional charts for LT, MT and SH models are shown for each respective pump type.

Impeller Code	No. of vanes	Outlet dia. mm CP vers	Through let, mm	Motor rating kW	rpm	Available versions
252	1	80	Ø52	4.4	2850	CP/CS
254	1	80	Ø46	4.4	2850	CP/CS

Pumping Definitions

Pumping is the addition of energy to a fluid, which is used mainly for the purpose of moving the fluid from one point to another.

Centrifugal Pumps

One which transfers energy to the liquid by means of an impeller; i.e. "a rotating device equipped with suitable vanes". (The liquid is therefore delivered in a continuous and uninterrupted flow).

Positive Displacement Pumps

One which transfers energy to a liquid by means of a reciprocating piston, or similar device, giving an intermittent or "pulsed flow".

Ejector or Jet Pumps

By mixing a high speed drive medium with a low velocity pumped medium, an energy exchange is achieved converting velocity energy into pressure, giving a continuous flow.

Q = Capacity or Volume

H = Total Head

Total Head = Static Head + Friction loss head.

Static Head

The head against which the pump must work when the liquid is stationary.

Friction loss head

The head generated by friction of moving liquid, against the walls of the discharge pipes.

P = Pump total pressure in metres.

Net Positive Suction Head (npsh)

Energy from an outside source i.e. static head or atmosphere pressure required to ensure liquid enters the pump volute.

Cavitation

Cavitation occurs when there is insufficient n.p.s.h. i.e., too low a suction pressure induces cavitation. This causes erosion to the metal surfaces due to the vapour bubble collapsing, allowing the liquid to rush into the subsequent spaces at high velocity, thus creating a water hammer effect.

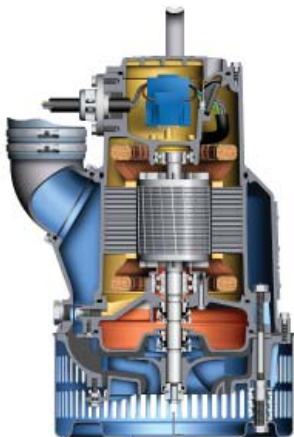
Flygt 2000 Series Dewatering Pumps

Introduction

Flygt Type BS - Pumps are suitable for a very broad field of application. They are used for dewatering on construction sites for houses, streets and roads, tunnels and rock caverns, harbours and dams, for drainage and ballast pumping in shipyards, for drainage in the event of flooding in mines and industrial plants, for cooling, clean water and raw water supply, water spraying, etc.

The Type BS - Pump is of transportable design and requires no installation. All you need to do is to lower it into water and start it. There is a type BS pump suitable for all applications - be it for high capacities, high heads, confined spaces or explosive environments.

The Type BS - Impeller is an open or semi-open channel impeller, made of abrasion resistant high chromium steel and designed specifically for handling media containing highly abrasive materials, such as clay, sand and drilling fines etc.



Flygt 2000 Series Dewatering Pumps

Can be installed in a variety of applications



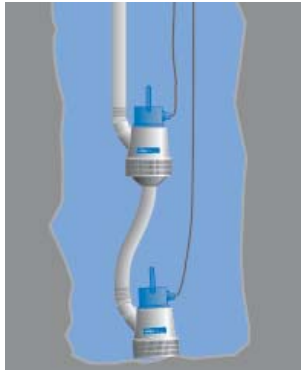
The Type BS - Pump can stand directly on the sump floor



or can be suspended from a rope or chain



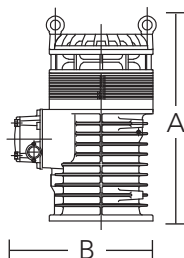
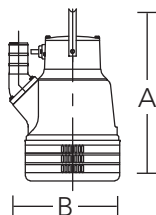
The compact design enables Type BS - Pumps to be used in confined spaces - a 200mm diameter pipe is sufficient for the slimmest pump



The head generated can be increased by connecting two or more Type BS - Pumps in series

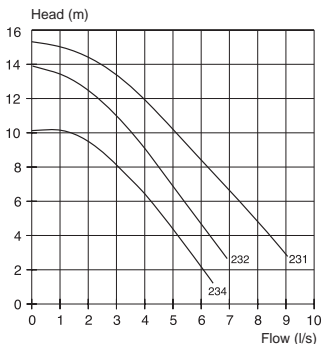
Flygt 2000 Series Dewatering Pump Dimensions

Pump type	A (mm)	B (mm)	Strainer Opening (mm)
BS2052	530	200	5x18
BS2066	520	385/405/288	7x21
BS2102			
MT	505	390/430	7x40
HT	505	375/390/335	7x40
BS2125			
MT	710	485/515/535	6x50
HT	710	465/390	6x50
BS2151			
LT	745	640/655	10x42
MT	745	640/655	10x42
HT	745	570/590	10x42
BS2201			
Cast Iron			
MT	1200	620	15x45
HT	1050	430	10x10
Aluminium			
MT	1253	500	15x45
HT	1050	430	10x10
BS2250			
MT	1144	885/912	15x45
HT	1144	830	15x45
BS2400			
MT	1250	780	10x10
HT	1250	680	10x10
BS2610	570	230	7 x 16
BS2620	620	275	7 x 16
BS2640			
MT	760	375	8 x 18
HT	760	342	8 x 18
BS2660			
MT	832	430	9 x 18
HT	832	430	9 x 18
BS2670			
MT	955	500	10 x 20
HT	955	480	10 x 20
BS2840			
MT	762	592	10mm Dia
HT	762	553	10mm Dia
BS2860			
MT	889	668	10mm Dia
HT	889	646	10mm Dia
BS2870			
MT	991	740	12mm Dia
HT	991	719	12mm Dia



Flygt BS2052 and BS2066

BS 2052

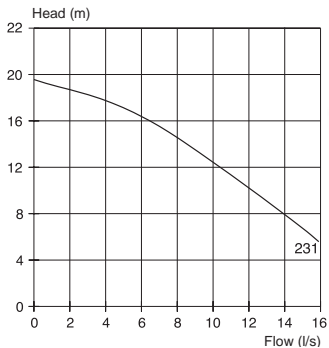


Motor 1kW, 2700rpm
Max. power input 1.4kW
Weight 18kg

Dimensions:
A - 530mm
B - 200mm
Hose Size: 50mm



BS 2066



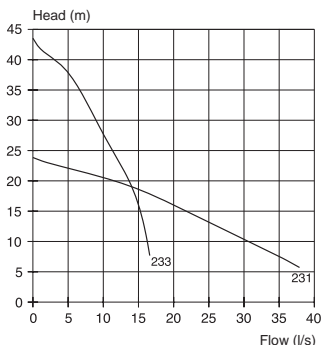
Motor 2.2kW, 2800rpm
Max. power input 2.8kW
Weight 30kg

Dimensions:
A - 520mm
B - 362/375mm
Hose Size: 75mm



Flygt BS2102 and BS2125

BS 2102 MT & HT



Motor 3.7kW/ 5.2kW, 2850rpm
Max. power input 4.5kW/6.3kW
Weight 50kg



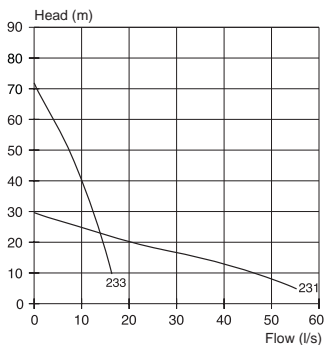
Dimensions:

A - 505mm

B - MT - 395/430mm HT - 375/390mm Hose

Size: HT 75mm MT 100mm

BS 2125 MT & HT



Motor MT 8.0kW, 2800rpm
Max. power input 9.5kW
Weight MT 83kg HT 92kg



Dimensions:

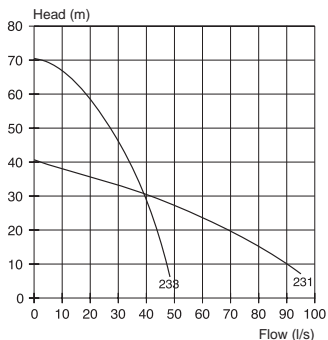
A - 710mm

B - MT 485/515/535mm HT 465mm

Hose Size: HT 75mm MT 150mm

Flygt BS2151 and BS2201

BS 2151 MT & HT

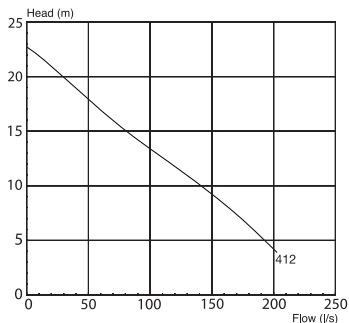


Motor 20kW, 2900rpm
Max. power input 23kW
Weight 165kg



Dimensions:
A - 745mm
B - MT 640/655mm HT - 570/590mm
Hose Size: HT 100mm LT 150mm

BS 2201 LT



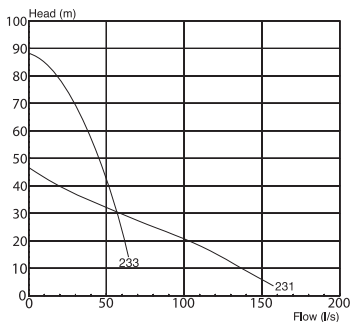
Motor 37kW, 1465rpm
Max. Power input 41kW
Weight - 280kg



Dimensions:
A - 1330mm
B - 500mm
Hose Size: 200mm

Flygt BS2201 and BS2250

BS 2201 MT & HT

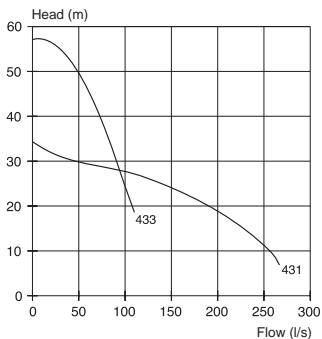


Motor 37kW, 2920rpm
Max. power input 41kW
Weight - 280kg



Dimensions:
A - 1330mm
B - 500mm
Hose Size: MT 200mm, HT 100mm

BS 2250 MT/HT



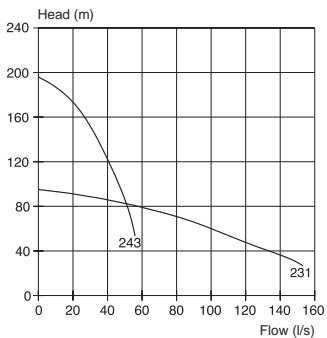
Motor 54kW, 1470rpm
Max. power input 58kW
Weight 540kg



Dimensions:
A - 1100mm
B - 950mm
Hose Size: HT 150mm, MT 200mm, MT 250mm

Flygt BS2400

BS 2400 MT & HT



Motor 90kW, 2970rpm
Max. power input 97kW
Over temperature protection in stator windings
Weight MT 900kg HT 985kg



Dimensions:
A - MT 1250mm HT 1251mm
B - MT 778mm HT 680mm
Hose size: HT - 100mm MT - 150mm



Introduction

Clearing your worksite of unwanted water is critical to productivity. Flooding means time delays, cost overruns and unsafe working conditions. To get to the bottom of any dewatering job, rely on Flygt 2600 pumps.

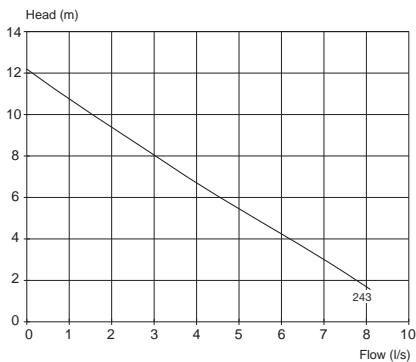
Undertaking tough dewatering jobs is what the Flygt 2600 series does best. It ensures that you can get on with the work at hand safely and reliably. All this, thanks to extreme portability, automatic operation, easy maintenance, lasting performance.

The Flygt 2600 series is built to last. Radically engineered from the ground up, these robust dewatering pumps feature innovative hydraulics, durable materials and a practical, ergonomic design. The result is unmatched wear resistance, consistent performance over time.

Flygt 2600 pumps cover low, medium, high and super-high pressures to handle most any application for worksites of every size.

Flygt BS2610

BS 2610 MT 110V Single Phase

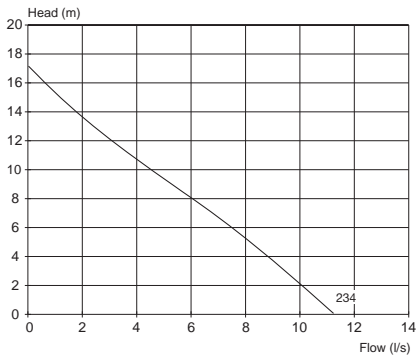


Rated Power 0.85kW
Weight 21kg



Dimensions:
Max. Height - 570mm
Max. Width - 230mm
Discharge \varnothing - 2"
Strainer Hole: 7x16mm

BS 2610 MT 400V 3 Phase

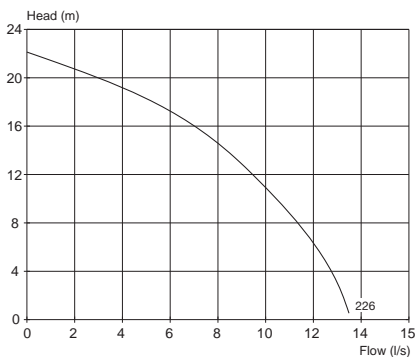


Rated Power 1.2kW
Weight 21kg



Dimensions:
Max. Height - 570mm
Max. Width - 230mm
Discharge \varnothing - 2"
Strainer Hole: 7x16mm

BS 2620 MT

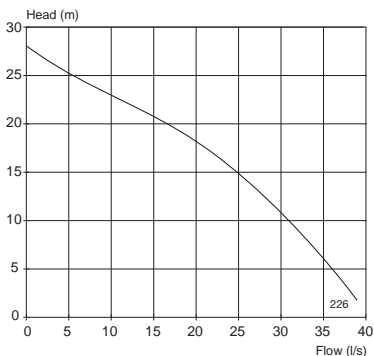


Rated Power 2.2kW
Weight 32kg



Dimensions:
Max. Height - 620mm
Max. Width - 275mm
Discharge \varnothing - 3"
Strainer Hole: 7x16mm

BS 2640 MT



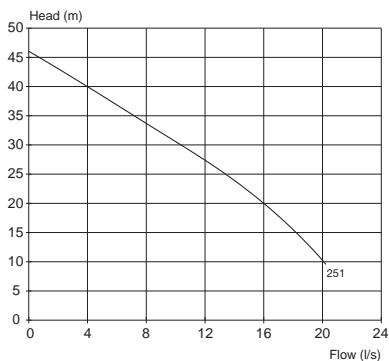
Rated Power 5.6kW
Weight 51kg



Dimensions:
Max. Height - 760mm
Max. Width - 375mm
Discharge \varnothing - 4"
Strainer Hole: 8x18mm

Flygt BS2640 and BS2660

BS 2640 HT

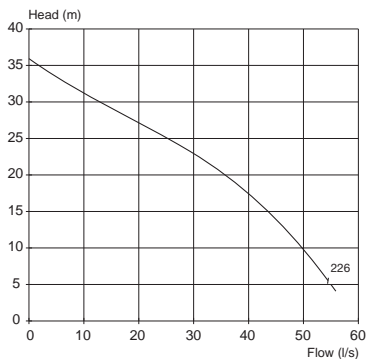


Rated Power 5.6kW
Weight 51kg



Dimensions:
Max. Height - 760mm
Max. Width - 342mm
Discharge Ø - 3"
Strainer Hole: 8x18mm

BS 2660 MT

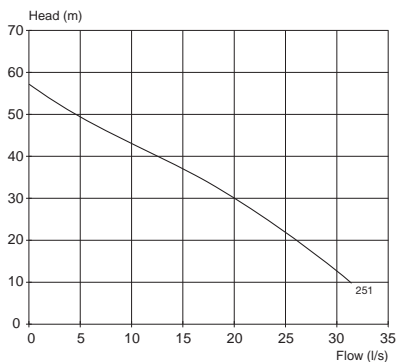


Rated Power 10kW
Weight 78kg



Dimensions:
Max. Height - 832mm
Max. Width - 430mm
Discharge Ø - 6"
Strainer Hole: 9x18mm

BS 2660 HT

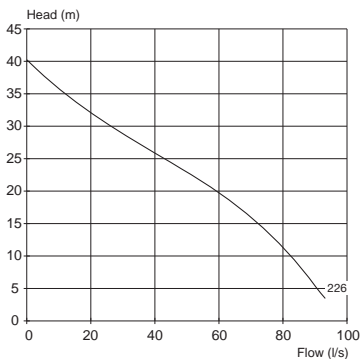


Rated Power 10kW
Weight 78kg



Dimensions:
Max. Height - 832mm
Max. Width - 430mm
Discharge \varnothing - 4"
Strainer Hole: 9x18mm

BS 2670 MT



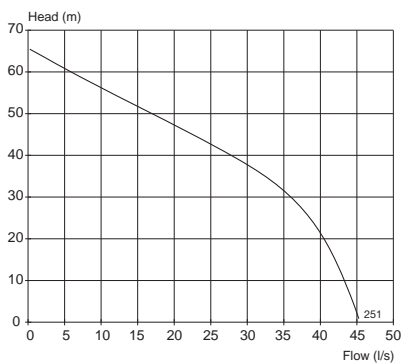
Rated Power 18kW
Weight 141kg



Dimensions:
Max. Height - 955mm
Max. Width - 500mm
Discharge \varnothing - 6"
Strainer Hole: 10x12mm

Flygt BS2670

BS 2670 HT



Rated Power 18kW
Weight 141kg



Dimensions:
Max. Height - 955mm
Max. Width - 480mm
Discharge \varnothing - 4"
Strainer Hole: 10x12mm

Flygt BIBO 2800 Range

For decades whenever a dewatering challenge seemed too tough or too harsh, the answer has been simple; Flygt BIBO.

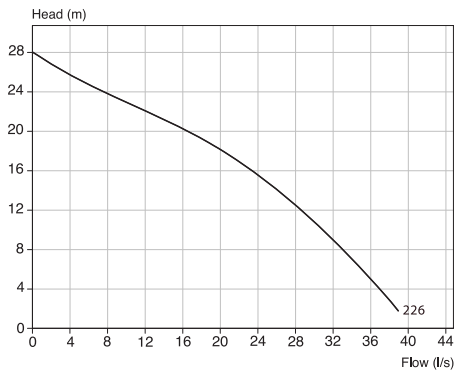
From the product brand and pumps that set the standard in dewatering comes a new and superior series of submersible dewatering pumps: Flygt BIBO 2800 series. It still has the iconic look; a shape that means stability and robustness. Inside the pumps you will find the latest technology such as the Dura-Spin hydraulic system and Plug-In seal. The range handles flows of up to 100 l/s with heads to 90 m and available with power ratings from 3.7 to 18kW.

Specifically targeted at mining operations, tunnelling and construction site applications.



Flygt BS2840

BS2840 MT

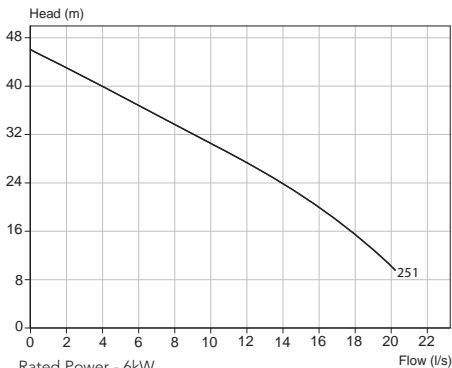


Rated Power - 5kW
Weight - 56kg



Dimensions:
Height - 762mm
Width - 367mm
Discharge - 100mm

BS2840 HT

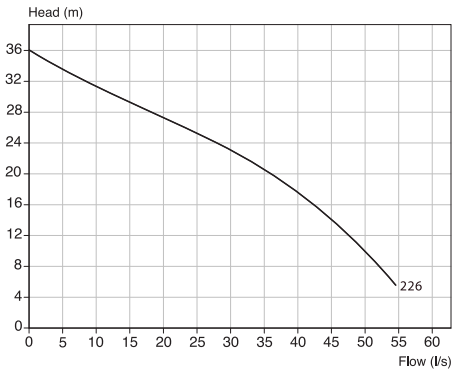


Rated Power - 6kW
Weight - 56kg



Dimensions:
Height - 762mm
Width - 367mm
Discharge - 80mm

BS2860 MT

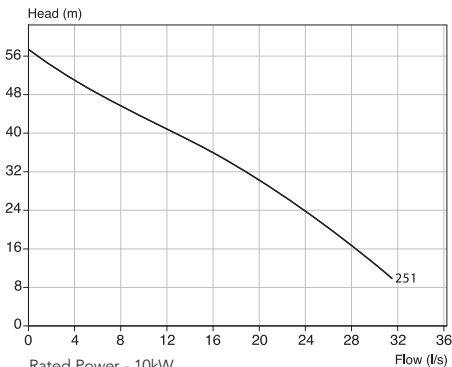


Rated Power - 10kW
Weight - 91kg



Dimensions:
Height - 889mm
Width - 425mm
Discharge - 150mm

BS2860 HT



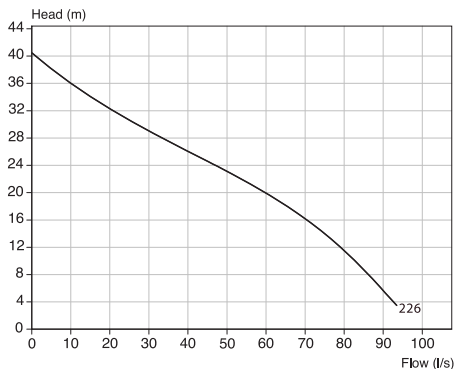
Rated Power - 10kW
Weight - 91kg



Dimensions:
Height - 889mm
Width - 425mm
Discharge - 100mm

Flygt BS2870

BS2870 MT

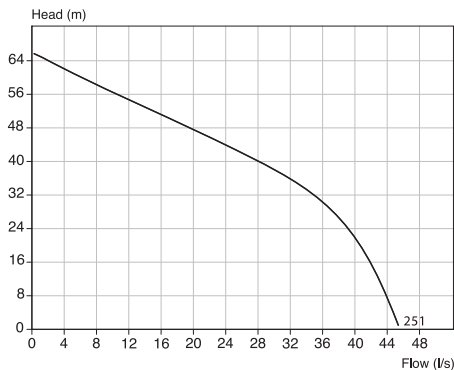


Rated Power - 18kW
Weight - 125kg



Dimensions:
Height - 991mm
Width - 500mm
Discharge - 150mm

BS2870 HT



Rated Power - 18kW
Weight - 125kg



Dimensions:
Height - 991mm
Width - 500mm
Discharge - 100mm

Flygt 2000 Series Electrical Information

Pump Model	kW (Shaft Power)	Voltage	Phase	FLC Amps	DOL Starting Current AMPS	Starting Method	Minimum Generator in Kva to Start/Run
BS2052	1.0	110	1	14.0	46	CAP	5
BS2052	1.0	230	1	3.8	17	CAP	5
BS2052	1.0	400	3	2.2	9.9	DOL	7.5
BS2066	2.2	400	3	4.5	26	DOL	20
BS2071	3.0	400	3	6.6	43	DOL	30
BS2075	3.7	400	3	7.1	36	DOL	25
BS2075	5.5	400	3	11.0	50	DOL	35
BS2084	7.5	400	3	13.0	78	DOL	55
BS2102	5.2	400	3	10.0	71	DOL	50
BS2125	8.0	400	3	15.0	125	DOL	90
BS2151	20.0	400	3	35.0	281	SOFT	100
BS2201	37.0	400	3	65.0	430	SOFT	150
BS2250	54.0	400	3	104.0	590	SOFT	450
BS2400	90.0	400	3	148.0	1245	SOFT	425
KS2610	0.9	110	1	11.0	38	CAP	5
KS2610	1.2	400	3	2.7	12	DOL	10
BS2620	2.2	400	3	4.7	27	DOL	20
BS2640	5.6	400	3	11.0	48	DOL	35
BS2660	10.0	400	3	19.0	107	DOL	75
BS2670	18.0	400	3	32.0	213	DOL	150
BS2840	5.6	400	3	11.0	78	DOL	55
BS2860	10.0	400	3	19.0	115	DOL	80
BS2870	18.0	400	3	33.0	238	SOFT	85

When two pumps are driven by the same generator, the rating required is 1.5 times that indicated for a single pump

Some form of time lag should be connected to prevent both pumps from starting simultaneously, unless the generator has been selected for pumps to start simultaneously.

The Information contained within this document is for guidance only and is accurate to the best of our knowledge at time of going to print.

Flygt 3000 C Series Solids Handling Pumps

Introduction

This series of pumps covers an extensive performance range and can be used in a variety of applications: from pumping sewage in treatment plants and municipal applications to irrigation, industrial effluent, process water and raw water handling to applications in aquaculture and agriculture.

An extensive range of hydraulic sections, i.e. impellers and volutes, are available to handle the different types of media.

Built-in cooling system on all pumps rated above 9kW. Vanes are at the top of the pump impeller circulate cooling water through a narrow slot around the stator housing.

Channel Impeller

C - Pumps are equipped with a shrouded, single or multi-vane impeller that runs in a volute. The shape and size of the impeller is designed to minimise clogging, which makes this pump ideal for wastewater applications.



Nevaclog®

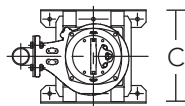
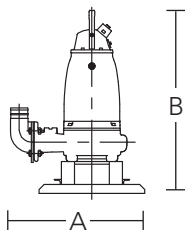
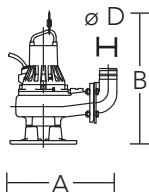
The Nevaclog® impeller is designed specially for smaller C - Pumps. Nevaclog® has excellent flow passing properties, because all the parts that might cause clogging when water is flowing at low speed through the impeller channel have been eliminated. This, coupled with the volute's design is what enables wastewater to flow freely.



Flygt 3000 C Series - Solids Handling Pumps

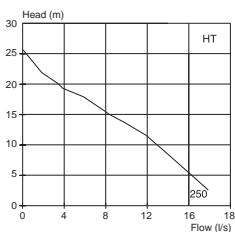
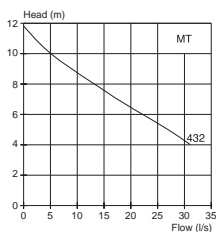
C - Pumps

Pump type	A	B	C	øD
CS3085 MT	480	603	350	75
CS3085 HT	450	512	320	75
CS3085 LT 1	638	660	380	100
CS3085 LT 2	638	655	400	100
CS3102 LT/150	720	718	400	150
CS3102 LT/100	640	718	400	100
MT	640	703	383	100
HT	640	698	340	100
CS3127 LT	870	776	439	200
MT/150	780	761	430	150
MT/100	700	761	406	100
HT (curve 480-485)	700	722	407	100
HT (curve 250-259)	700	714	380	80
HS	550	741	403	100
CS3152 LT	1150	1327	576	250
CS3152 MT	900	1228	530	200
CS3152 HT/100	773	1190	530	100
CS3152 HT/150	845	1190	530	150
HS3152	845	1190	490	150
CS3201 LT	1417	1598	1000	250
CS3201 MT	1150	1442	576	200
CS3201 HT	1050	1453	576	150
HS3201	1050	1453	576	150
CS3300 LT	1675	1920	1000	250
CS3300 MT	1624	1915	1000	200
CS3300 HT/200	1494	1827	1000	200
CS3300 HT/150	1443	1827	1000	150
FS3085	605	535	317	100
FS3102	660	619	315	100
FS3127	750	693	415	100
FS3152 LT	735	1055	465	100
FS3152 HT	710	1035	440	100
NS3301	1438	1680	1000	250



Flygt C3085 and C3102

C3085 MT/HT



Discharge size: 75mm

Height: 655mm

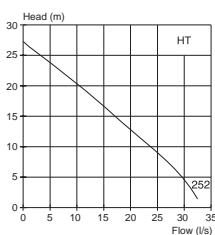
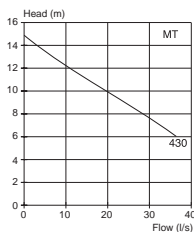
Motor rating: 2.0kW

Weight: 71kg

Maximum width: 638mm

Impeller Code	No. of vanes	Outlet dia. mm CP vers	Through let, mm	Motor rating kW	rpm	Available versions
432 MT	1	100	Ø76	2.0	1400	CP/CS
252 HT	1	80	Ø40	2.4	2840	CP/CS

C3102 MT/HT



Discharge size: 75mm/100mm

Height: 718mm

Motor rating: 3.1kW

Weight: 116kg

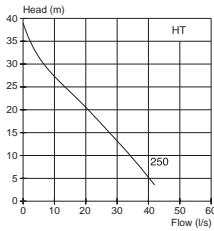
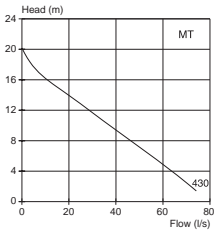
Maximum width: 640mm

Impeller Code	No. of vanes	Outlet dia. mm CP vers	Through let, mm	Motor rating kW	rpm	Available versions
430 MT	1	100	Ø76	3.1	1400	CP/CS/MT
252 HT	1	80	Ø52	4.4	2850	CP/CS/MT

Flygt C3127 and C3152



C3127 MT/HT

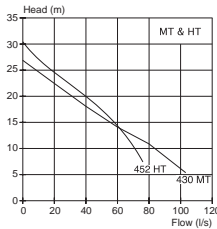
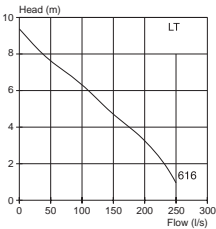


Discharge size: 100/150mm
 Height: 761mm
 Motor rating: 5.9/7.4kW

Weight: 175kg
 Maximum width: 780mm

Impeller Code	No. of vanes	Outlet dia. mm CP vers	Through let, mm	Motor rating kW	rpm	Available versions
430 MT	1	100/150	100x110	5.9	1450	CP/CS
250 HT	1	80	Ø58	7.4	2900	CP/CS

C3152 LT/MT/HT



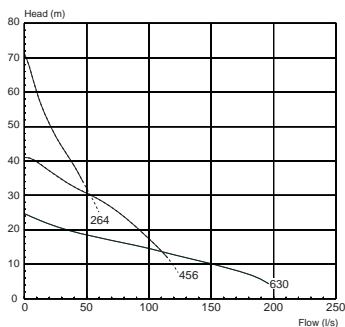
Discharge size: 150/200mm
 Height: 1228mm
 Motor rating: 13.5kW

Weight: 426kg
 Maximum width: 900mm

Impeller Code	No. of vanes	Outlet dia. mm CP vers	Through let, mm	Motor rating kW	rpm	Available versions
616 LT	2	250	102x102	8.8	950	CP/CT/CS
430 MT	1	250	100x115	13.5	1450	CP/CT/CS
452 HT	1	150	76x76	13.5	1450	CP/CT/CS
265 SH	1	100	40x40	150	2920	CP/CT/CS

Flygt C3201 and C3300

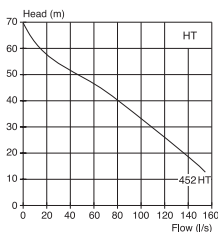
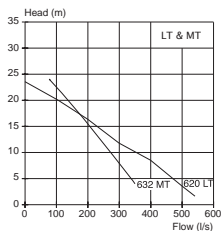
C3201 MT/HT/SH



Discharge size: 200/250mm
 Height: 1442mm
 Motor rating: 30/22kW
 Weight: 588kg
 Maximum width: 1150mm

Impeller Code	No. of vanes	Outlet dia. mm CP vers	Through let, mm	Motor rating kW	rpm	Available versions
630 MT	1	200	144x120	22	965	CP/CT/CS
456 HT	1	150	Ø100	30	1250	CP/CT/CS
264 SH	1	100	76	30	2920	CP/CT/CS

C3300 LT/MT/HT



Discharge size: 200/250mm
 Height: 1915mm
 Motor rating: 54/44kW

Weight: 1218kg
 Maximum width: 1624mm

Impeller Code	No. of vanes	Outlet dia. mm CP vers	Through let, mm	Motor rating kW	rpm	Available versions
620 LT	3	300	Ø102	44	975	CP/CT/CS
632 MT	1	250	Ø190	44	970	CP/CT/CS
452 HT	1	150	90x96	54	1450	CP/CT/CS

Flygt 3000 N Series Solids Handling Pumps

N Pump Technology

Sustained high efficiency for wastewater handling

With its unique semi-open, self-cleaning impeller, the N-pump series can handle fluids with high concentrations of fibrous material, whilst still maintaining a high level of pumping efficiency over long duty periods. The special relief groove in the volute reduces the risk of clogging by creating a self-cleaning flow path through the pump.

N Series Pumps

N series pumps are available, contact your local Flygt Rental Centre for curve details: N 3085, N 3102, N 3127, N 3153, N 3171, N 3202, N 3301



Adaptive N-impellers



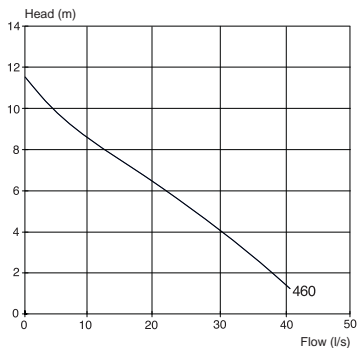
The Adaptive N-hydraulics further improves the self-cleaning characteristics of N-technology with unmatched clog-free performance. This is achieved through the unique axial movement of the Adaptive N-impeller.

The Adaptive N-impeller is designed to move axially upwards when needed, allowing the most bulky of rags and toughest of debris to pass through smoothly. After the debris has passed, the hydraulic pressure returns the impeller to its original position.

The axial movement of this hydraulic reduces stress on the shaft, seals, and bearings, thereby extending their lifespan. Ultimately clog-free performance requires almost none, or at the very most, simple maintenance and servicing. All in all, the Adaptive N-hydraulics is your assurance of highly economical and reliable pumps that give you peace of mind.

Flygt N3085 and N3102

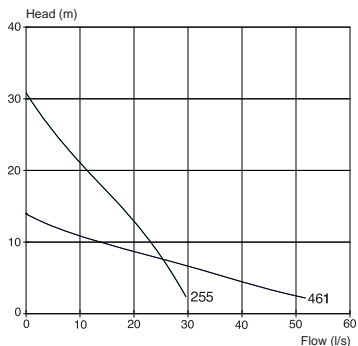
N3085 MT



Discharge size: 75mm
 Height: 655mm
 Motor rating: 2.0kW
 Weight: 71kg
 Maximum width: 450mm

Impeller Code	No. of vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	Available versions
460 MT	2	80	2.0	1400	NP/NS/NT

N3102 MT/SH

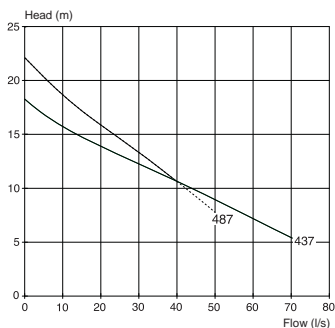


Discharge size: 80mm/100mm
 Height: 705mm
 Motor rating: 3.1/4.2kW
 Weight: 116kg
 Maximum width: 610mm

Impeller Code	No. of vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	Available versions
461 MT	2	100	3.1	1440	NP/NS
255 SH	2	80	4.2	2890	NP/NS

Flygt N3127 and N3153

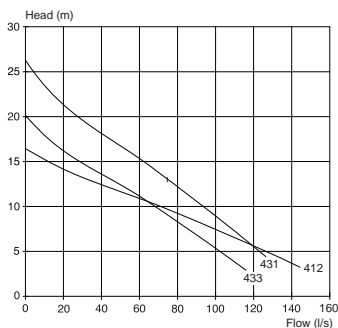
N3127 MT/HT



Discharge size: 100/150mm
 Height: 765mm
 Motor rating: 5.9kW
 Weight: 170kg
 Maximum width: 725mm

Impeller Code	No. of vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	Available versions
437 MT	2	100/150	5.9	1450	NP/NS/NT
487 HT	2	100	5.9	1450	NP/NS/NT

N3153 LT/MT

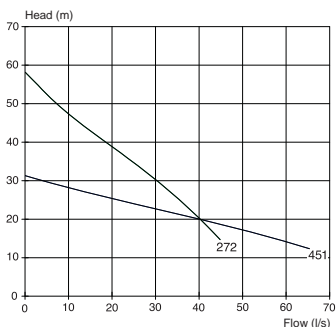


Discharge size: 150/200mm
 Height: 1068mm
 Motor rating: 13.5kW
 Weight: 252kg MT 279kg LT
 Maximum width: 834mm

Impeller Code	No. of Available vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	versions
412 LT	2	200	13.5	1455	NP/NT/NS
431 MT	2	150	13.5	1455	NP/NT/NS
433 MT	2	150	13.5	1455	NP/NT/NS

Flygt N3153 and N3171

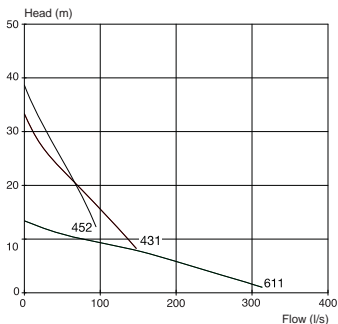
N3153 HT/SH



Discharge size: 80/100mm
 Height: 1052mm
 Motor rating: 13.5/15.0kW
 Weight: 242kg
 Maximum width: 763mm

Impeller Code	No. of vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	Available versions
451 HT	2	100	13.5	1455	NP/NT/NS
272 SH	2	80/100	15.0	2910	NP/NT/NS

N3171 LT MT and HT

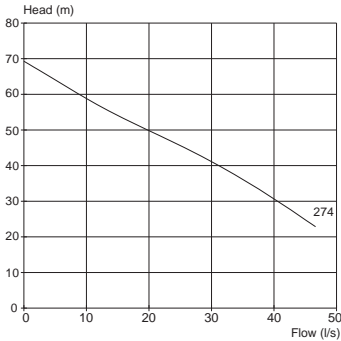


Discharge size: 100/250mm
 Height: 1299mm
 Motor rating: 15/22kW
 Weight: 460kg
 Maximum width: 1151mm

Impeller Code	No. of vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	Available versions
611 LT	2	250	15.0	965	NP/NS/NT
431 MT	2	150	22.0	1460	NP/NS/NT
452 HT	2	100	22.0	1460	NP/NS/NT

Flygt N3171 and N3202

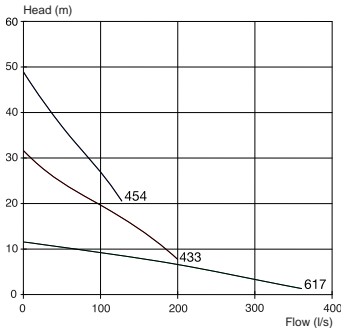
N3171 SH



Discharge size: 100mm
 Height: 1179mm
 Motor rating: 22kW
 Weight: 366kg
 Maximum width: 884mm

Impeller Code	No. of vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	Available versions
274 SH	2	108	22.0	2925	NP/NS/NT

N3202 LT MT and HT

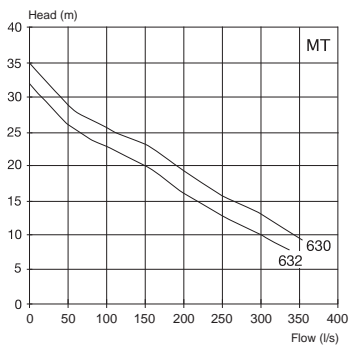
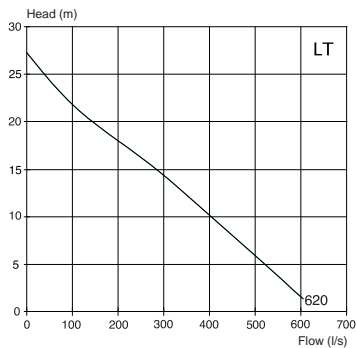


Discharge size: 150/300mm
 Height: 1571mm
 Motor rating: 22/45kW
 Weight: 900kg
 Maximum width: 1439mm

Impeller Code	No. of vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	Available versions
617 LT	2	250	22.0	970	NP/NS/NT
433 MT	2	200	30.0	1475	NP/NS/NT
454 HT	2	150	45.0	45.0	NP/NS/NT

Flygt N3301

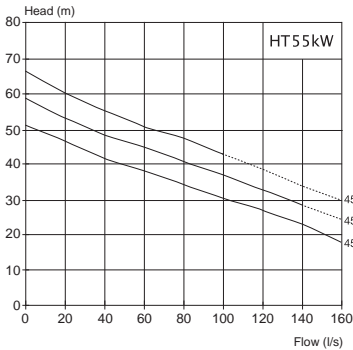
N3301 LT and MT 55kW



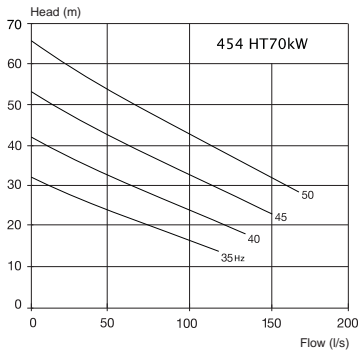
Discharge size: 250mm
 Height NS: 1705mm
 Motor rating: 55kW
 Weight: 1110kg
 Maximum width NS: 1439mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
620 LT	2	250	55	985	NP/NT/NS/NZ
630 MT	2	250	55	985	NP/NT/NS/NZ
632 MT	2	250	55	985	NP/NT/NS/NZ

N3301 HT 55kW



N3301 454 HT Impeller 70kW VFD Curves



Discharge size: 150mm
 Height NS: 1641mm
 Motor rating: 55/70kW
 Weight: 920kg
 Maximum width NS: 1242mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
454 HT	2	150	70	1475	NP/NT/NS/NZ
454 HT	2	150	55	1400	NP/NT/NS/NZ
456 HT	2	150	55	1400	NP/NT/NS/NZ
458 HT	2	150	55	1400	NP/NT/NS/NZ

A Selection of impellers are available on request; also Variable Frequency Drive Starters

Flygt N Type Chopper Pumps

Introduction

Chopper pumps with N Impeller Technology

Flygt Chopper pumps have the unique patented N Impeller along with a Hard Iron chopper ring which drastically reduces the risk of clogging. Rugged, wear resistant and self cleaning, it cuts through solids without clogging or sacrificing pump efficiency.

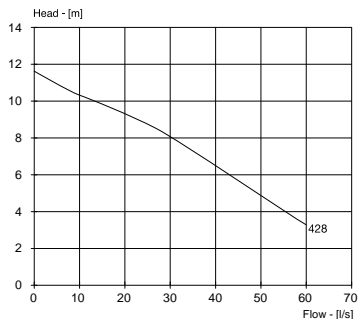
The Flygt Chopper pump range brings to an end troublesome and costly clogging with its heavy-duty and highly dependable chopping abilities. By adding the chopper function to the well proven Flygt N-pump, outstanding performance in heavy duty applications has been achieved. This new pump design has undergone extensive testing in the field. The results from these tests show considerably fewer running problems and considerably lower energy consumption.

Typical applications:

- Agriculture
- Aquaculture
- Food processing
- Pulp and paper
- Harsh wastewater facilities.



N3127 Chopper MT

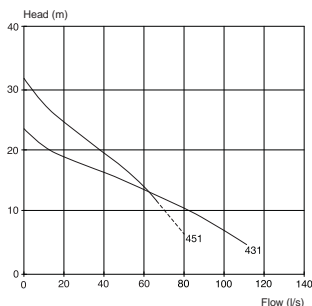


Discharge size: 100/150mm
 Height NS: 765mm
 Motor rating: 4.7kW
 Weight: 170kg
 Maximum width NS: 725mm

Impeller Code	No. of vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	Available versions
428 MT	2	100/150	4.7	1455	NP/NS/NT/NZ

Flygt N Type Chopper Pumps

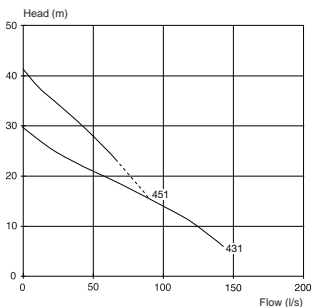
N3153 Chopper MT and HT



Discharge size: 100/150mm
 Height NS: 1068mm
 Motor rating: 13.5kW
 Weight: 252kg
 Maximum width NS: 763mm

Impeller Code	No. of vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	Available versions
431 MT	2	150	13.5	1455	NP/NS/NT
451 HT	2	100	13.5	1455	NP/NS/NT

N3171 Chopper MT and HT



Discharge size: 100/150mm
 Height NS: 1225mm
 Motor rating: 22.0kW
 Weight: 362kg
 Maximum width NS: 884mm

Impeller Code	No. of vanes	Outlet dia. mm NP vers	Motor rating kW	rpm	Available versions
431 MT	2	150	22.0	1460	NP/NS/NT
451 HT	2	100	22.0	1460	NP/NS/NT

Flygt Great and Grey Solids Handling Pumps

Introduction

After revolutionizing the market for small and midrange wastewater pumps, the Flygt N Pumps are now available in the larger units.

- Incorporating the N Pump technology the potential for blockage is substantially reduced
- Due to sustained efficiency, energy costs can be cut by up to 50%
- Heads of up to 90mts achieved
- Flows in excess of 700l/s

Applications

- General by-pass over-pumping
- Pump replacement
- Application proving
- Storm water handling
- Industrial effluent handling
- Irrigation

Pumps from 90 to 250kW available to rent in NP/NS/NT and NZ build (see Page 37).
Ex units available on request.



Flygt N and C Installation Method

Flygt centrifugal pumps are designed to pump wastewater containing solids and fibres in suspension. The pump can also be used for pumping raw water.

Liquid temperature:	max 40°C (105°F)
Liquid density:	max 1100kg/m ³
The pH of the pumped liquid:	6 - 11
Depth of immersion:	max 20 m (65 ft)

For pumping in an explosive or flammable environment the pump can be ATEX certified.

The Flygt pump is fully submersible, compact and easy to install. It is available in four versions, depending of the type of installation:

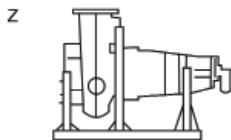
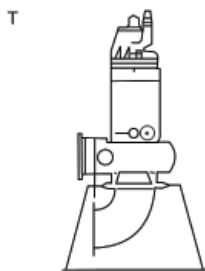
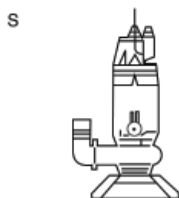
C/NP: This system with guide bars and discharge connection permits automatic connection of the pump to the discharge line. The pump can be lifted up for inspection without anyone having to enter the sump. The pump works completely or partially submerged under water.

C/NS: A transportable pump designed for operating completely or partially submerged in the pump liquid. It is equipped with base stand and hose connection.

C/NT: The pump is installed vertically dry on a base stand and connected directly to the inlet and outlet lines. The submersible design of the pump prevents damage in the event of flooding.

C/NZ: The pump is installed horizontally dry on a base stand and connected directly to the inlet and outlet lines. The submersible design of the pump prevents damage in the event of flooding.

For other applications, contact your local Flygt Rental Centre for information.

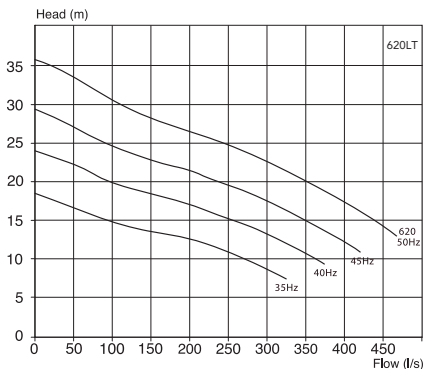


Flygt N3315

N3315 90kW 620/470mm



Rated Power: 90kW
 Weight: 1330kg
 Dimensions:
 Height - 2056mm
 Width - 1330mm
 Discharge - 300mm

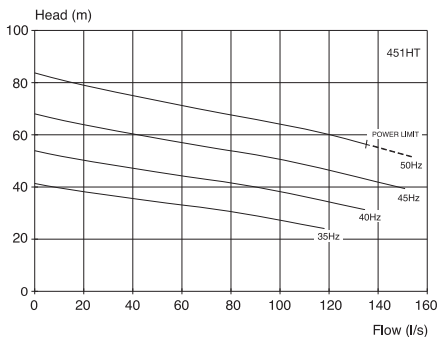


Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
620	3	300	90	985	NP/NS/NT/NZ

N3315 105kW 451/440mm

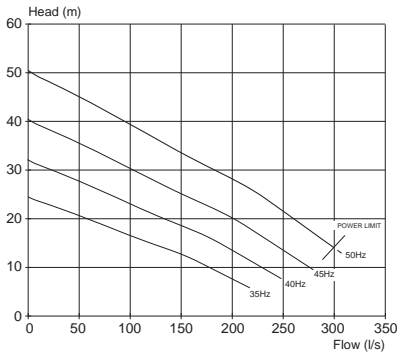


Rated Power: 105kW
 Weight: 1150kg
 Dimensions:
 Height - 1992mm
 Width - 1017mm
 Discharge - 150mm



Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
451	3	150	105	1480	NP/NS/NT/NZ

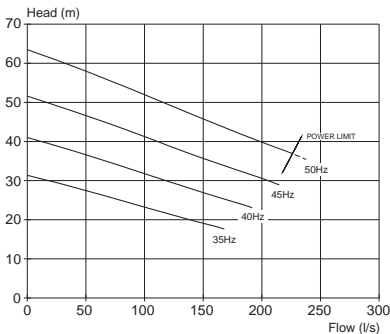
N3231 85kW 480/360mm



Rated Power: 85kW
 Weight: 1380kg
 Dimensions:
 Max. Height - 2060mm
 Max. Width - 1570mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
480-360	3	200	85	1475	NP/NS/NT/NZ

N3231 105kW 480/400mm

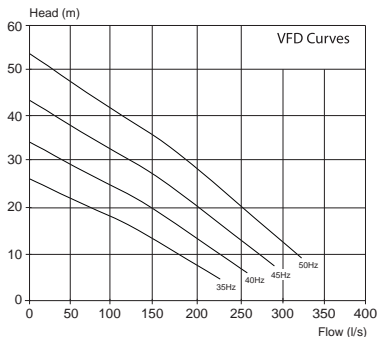


Rated Power: 105kW
 Weight: 1590kg
 Dimensions:
 Max. Height - 2060mm
 Max. Width - 1570mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
480-400	3	200	105	1480	NP/NS/NT/NZ

Flygt N3231

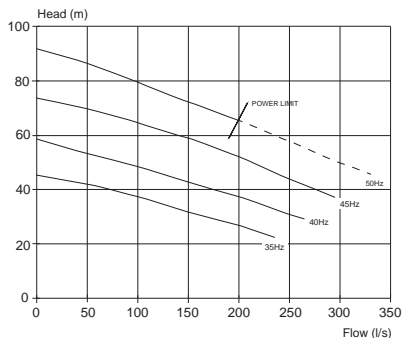
N3231 125kW 470/370mm



Rated Power 125kW
 Weight 1760kg
 Dimensions:
 Max. Height - 2185mm
 Max. Width - 1390mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
470-370	3	200	125	1450	NP/NT/NS/NZ

N3231 170kW 470/490mm

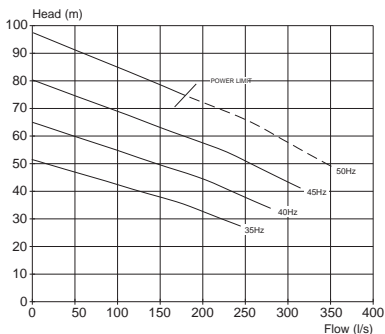


Rated Power 170kW
 Weight 1760kg
 Dimensions:
 Max. Height - 2305mm
 Max. Width - 1570mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
470-490	3	200	170	1480	NP/NT/NS/NZ

A Selection of impellers are available on request; also Variable Frequency Drive Starters

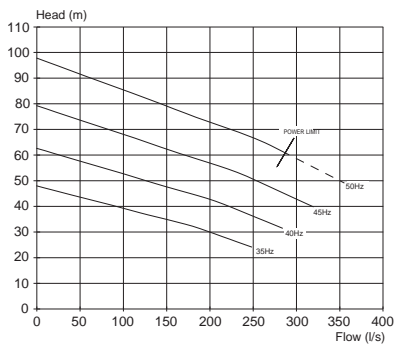
N3231 170kW 480/490mm



Rated Power 170kW
 Weight 1760kg
 Dimensions:
 Max. Height - 2305mm
 Max. Width - 1570mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
480-490	3	200	170	1480	NP/NS/NT/NZ

N3231 215kW 480/490mm

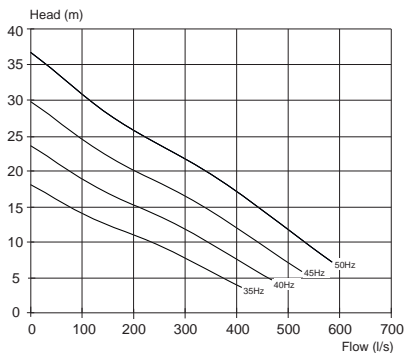


Rated Power 215kW
 Weight 1910kg
 Dimensions:
 Max. Height - 2305mm
 Max. Width - 1570mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
480-490	3	200	215	1485	NP/NS/NT/NZ

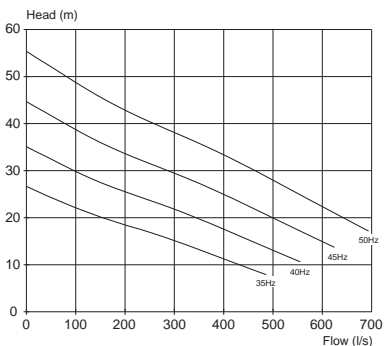
Flygt N3312

N3312 100kW 670/450mm



Rated Power: 100kW
 Weight: 1975kg
 Dimensions:
 Max. Height - 2240mm
 Max. Width - 1650mm

N3312 180kW 670/545mm

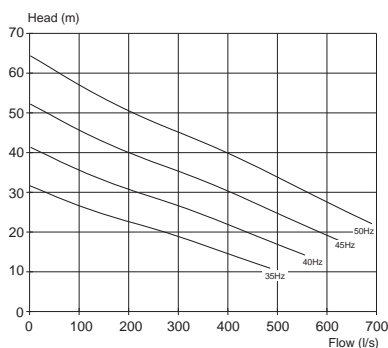


Rated Power: 180kW
 Weight: 2275kg
 Dimensions:
 Max. Height - 2975mm
 Max. Width - 1875mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
670-450	3	300	100	985	NP/NT/NS/NZ
670-545	3	300	180	990	NP/NT/NS/NZ

A Selection of impellers are available on request; also Variable Frequency Drive Starters

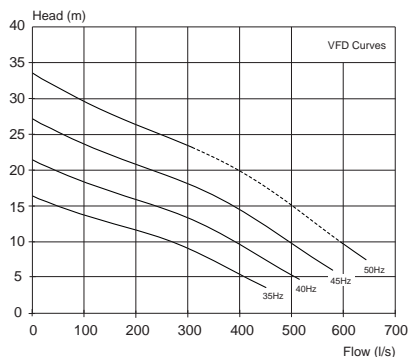
N3312 250kW 670/585mm



Rated Power: 250kW
 Weight: 3125kg
 Dimensions:
 Max. Height - 2975mm
 Max. Width - 1875mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
670-585	3	300	250	990	NP/NS/NT/NZ

N3356 90kW 670/470

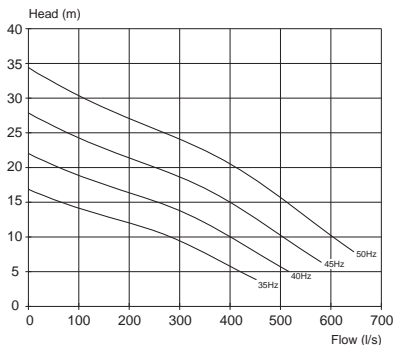


Rated Power: 90kW
 Weight: 2200kg
 Dimensions:
 Max. Height - 2400mm
 Max. Width - 1875mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
670-470	3	350	90	985	NP/NT/NS/NZ

Flygt N3356 / N3400

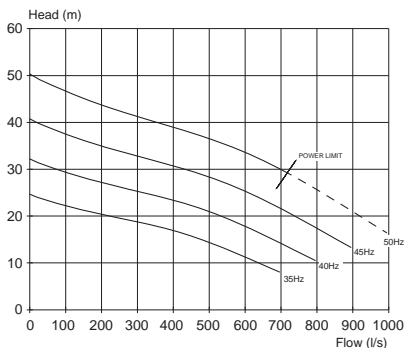
N3356 100kW 670/475mm



Rated Power: 100kW
 Weight: 1750kg
 Dimensions:
 Max. Height - 2275mm
 Max. Width - 1900mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
670-475 NZ	3	350	100	985	NP/NT/

N3400 250kW 670/575mm



Rated Power: 250kW
 Weight: 3750kg
 Dimensions:
 Max. Height - 3428mm
 Max. Width - 1900mm

Impeller Code	No. of vanes	Outlet dia. mm NS vers	Motor rating kW	rpm	Available versions
670-575	3	400	250	990	NP/NT/NZ

ATEX Approved Explosion Proof Submersible Pumps

Many of the Flygt range of pumps can be provided certified for use in Zone 1 and Zone 2 hazardous areas.

Pumps are certified: **EEx d IIB T4** or **EEx d IIB T3**

According to the pump model:

ATEX category II 2G

The pumps are constructed and approved in accordance with:

BS EN 50018, BS EN 50019, BS EN 13463-1, BS EN 60079-1, BS EN 60079-7

As appropriate according to the pump model.

For availability of 'Ex' units and any other technical assistance contact your nearest Flygt Rental Centre.

- Copies of the relevant 'Ex' certification can be made available on request.
- The pumps are maintained in accordance with BS EN 60079 Part 19.
- Before any Flygt 'Ex' pump is made available for Rental all parts, flame paths etc; are checked and recorded using regularly calibrated instruments and procedures in accordance with BS EN 60079-19

Explosion Pumps Available:

B Pumps	C & N Pumps (ring for confirmation)	Mixers
2201	3085	4620
2400	3102	4630
	3127	4640
	3153	4650
	3171	4660
	3202	
	3301	
	3231	
	3312	
	3356	
	3400	

Monitoring & Control

Practical easy-to-use monitoring and control systems are essential to ensure that your system runs reliably and at optimal efficiency.

Xylem's Rental team is able to call upon the broad portfolio of these Monitoring and Control products and solutions ranging from hardware such as pump controllers, sensors, electrical start equipment and control panels. We also have software for running the system; the Flygt AquaView supervision software provides PC based SCADA (Supervision, Control and Data Acquisition) know-how. The applications range from those operating in wastewater treatment plants and pump stations, quarries and mines, waterways, to products pumping ground water from building sites.

By combining these new system controls with our TotalCare provision, we can help to ensure the on-going quality and life of customers' pumps, whilst weekly electronic preventative checks increase the pumps operational effectiveness.

- Pump control panels
- Starters
- Level/pump sensors
- Pump controller / supervision
- SCADA software systems
- Inverters VFD/VSD – PumpSmart
- WITS accredited Telemetry Outstations / RTU's / Pump Controllers



We specialise in electrical submersible pumps, therefore, it is logical that we are the experts when it comes to the starter and controls that are required for a temporary pumping installation. From a simple single phase starter to a complex multi pump 3 phase control panel, Rental Engineers are available to give advice on all aspects of electromotive power.

Our Rental team carry a comprehensive range of starters, isolators, control equipment, alarm and monitoring devices. Also, sufficient cable to suit day to day usage is stocked both at Nottingham and at all Rental Depot locations. For the larger and more complex installations we are able to select and supply the appropriate extension cables and junction boxes to connect the pump to the control panel.

We can also supply ATEX Certified "Ex" junction boxes and cables glands for use in hazardous areas. If level regulators (floats) are used as the level control we can supply the required I/S protection relays.

Variable Frequency Drive Unit - 30kW - 160kW

The variable speed drive control panel is for motors rated from 30kW and up to and including 160kW. The control panel is floor standing on a stand plinth with IP65 rating, suitable for outdoor use.

- Weather proof enclosure to IP65 rating and complete with mounting stand and lifting eye bolts
- Incoming mains isolator
- Line contactor
- ABB 160kW, 415V, 3 phase, 50Hz ACS800 type variable speed drive
- Multifunction control
- Motor thermal switch relay
- Mains and motor terminals
- Telemetry control terminals
- Remote control terminals
- Door mounted indication lamps
- Door mounted VFD keypad
- Door mounted start, stop, reset and E Stop pushbuttons
- E stop to category 0
- Hand / off / auto selector switch
- Dimensions are – 1800H (including floor mounting stand) x 800W x 600D
- Weight – 235kg approx.

Soft Start Unit - 1.0 - 15kW

Specification :

- IP54 Zintex Panel
- Rain canopy
- Load break door interlocked isolator
- Soft starter
- Special wide ranging overload unit to protect different size pumps
- Earth leakage protection.
- Hand/auto switch.
- Door mounted alphanumeric keypad showing run & trip conditions and also containing – stop/reset-start buttons, Hand or auto LED's, running LED and flashing tripped LED.
- Door mounted emergency stop (also to terminals)
- Thermal Switch or Klixon trip circuit
- Analogue output related to motor current
- Inter-panel interlock system
- Lifting hook
- Motor & control connections wired to terminals
- 12vdc control for floats
- 24vdc , 100ma for optional alarm.
- 24vdc , 500ma for optional ultrasonic unit
- 24vac power supply customer use



The Heart of the Panel

- Designed and manufactured especially for Rental from Xylem
- Unique wide ranging overload
- Simple kilowatt selection will set up the overload protection
- Built in earth leakage
- Thermal Switch or Klixon

Digital Display

- Kilowatt selected
- Running amps
- Hand, auto, running and tripped led
- Start and stop pushbutton
- Last eight fault history

Specification :

- IP54 free standing panel
- Load break door interlocked isolator
- Rain canopy
- Torq-master 2000 soft starter
- Motor output hard wired to 3 x 70mm stud terminals
- Main contactor
- By-pass contactor
- Door mounted keypad (hand control)
- 24v ac control system
- Float switch control (hard wired)
- Emergency stop circuit
- Hand/auto selector switch
- Remote connection via terminals (auto control)
- Standard 't' bar locking system
- Lifting bar with hook
- Earth leakage protection
- Motor Thermal Switch or Klixon hard wired to terminals
- Extra relay for telemetry – wired to terminals
- Terminals for panel interlocking system
- 24vdc , 100ma for optional alarm
- 24vdc , 500ma for optional ultrasonic unit



The Heart of the Panel

- Soft start unit
- Pin locked menu
- Adjustable pump range by amps
- Adjustable too many starts protection
- Float less control
- Thermal Switch or Klixon connections
- Electronic overload
- Under load trip
- Electronic shear pin

Information

- Motor current
- Ambient temperature
- RMS Volts
- Run hours
- Service time indication (for the motor)
- Motor status
- Printable 1000 event data log

3000 Series Solids Handling Pumps - Electrical Information

Pump Model	kW (Shaft Power)	Voltage	Phase	FLC Amps	DOL Starting Current AMPS	Starting Method	Minimum Generator in Kva to Start/Run
3085	1.3	400	3	3.1	19	DOL	15
3085	2.0	400	3	4.5	19	DOL	15
3085	2.4	400	3	4.7	28	DOL	20
3102	3.1	400	3	6.9	33	DOL	25
3102	4.2	400	3	8.3	72	DOL	50
3127	4.7	400	3	9.6	56	DOL	40
3127	5.9	400	3	12.0	77	DOL	55
3127	7.4	400	3	14.0	114	DOL	80
3152 - 4 Pole	13.5	400	3	27.0	162	SOFT	40
3152 - 2 Pole	15.0	400	3	28.0	229	SOFT	55
3153	7.5	400	3	16.0	91	SOFT	25
3153	9.0	400	3	19.0	107	SOFT	25
3153	11.0	400	3	24.0	132	SOFT	35
3153 - 4 Pole	13.5	400	3	28.0	150	SOFT	35
3153 - 2 Pole	15.0	400	3	27.0	213	SOFT	50
3170	15.0	400	3	31.0	210	SOFT	50
3171	22.0	400	3	41.0	248	SOFT	60
3201	30.0	400	3	56.0	365	SOFT	85
3202	37.0	400	3	66.0	460	SOFT	110
3202	45.0	400	3	82.0	605	SOFT	150
3300	44.0	400	3	82.0	515	SOFT	150
3300	54.0	400	3	100.0	535	SOFT	150
3301 - 6 Pole LT	55.0	400	3	113.0	660	SOFT	225
3301 - 4 Pole MT	55.0	400	3	103.0	435	SOFT	150
3301	70.0	400	3	132.0	565	SOFT	195
3315LT - 6 Pole	90.0	400	3	185.0	1160	VFD	195
3315 HT - 4 Pole	105.0	400	3	199.0	1105	VFD	210
3231 - 4 Pole	85.0	400	3	159.0	710	VFD	170
3231 - 4 Pole	105.0	400	3	200.0	955	VFD	210
3231 - 4 Pole	125.0	400	3	234.0	1525	VFD	245
3231 - 4 Pole	170.0	400	3	300.0	2020	VFD	315
3231 - 4 Pole	215.0	400	3	395.0	2945	VFD	415
3312 - 6 Pole	100.0	400	3	202.0	1150	VFD	210
3312 - 6 Pole	180.0	400	3	360.0	2215	VFD	375
3312 - 6 Pole	250.0	400	3	465.0	2645	VFD	485
3356 - 6 Pole	90.0	400	3	185.0	1160	VFD	195
3356 - 6 pole	100.0	400	3	202.0	1150	VFD	210
3400 - 6 Pole	250.0	400	3	465.0	2645	VFD	485

When Two pumps are driven by the same Generator, the rating required is approximately 1.5 times that indicated for a Single Pump.

Some form of time lag should be connected to prevent both pumps from starting simultaneously, unless the Generator has been selected for that number of pumps to start simultaneously.

The Information contained within this document is for guidance only and is accurate to the best of our knowledge at time of going to print.

Godwin

Godwin Pumps one of our own market leading brands, has over 100 years of experience in the design, manufacture, and supply of diesel pumps. Godwin Pumps is renowned for quality, reliability, and long life.

Today, the product range is used throughout the world, in construction, industry, oil refineries, chemical plants, mines, specialist offshore pumping, irrigation and water distribution.

Our Rental division offers Godwin's range of automatic self-priming pumps with an additional and wider range of Diesel driven Dri - Prime® pumps. The new Godwin pumps can be skid or trailer mounted for use in mobile applications which can provide exceptional energy efficiency and a significantly reduced clogging capability.

Godwin CD series

The Godwin CD range is ideal for high volume, medium head pumping and is capable of handling large solids.

Godwin HL series

The Godwin HL range is ideal for medium volume, high head pumping and is also capable of handling large solids-handling.

Godwin CD, HL, Heidra and NC series pumps are now available to rent from Xylem.

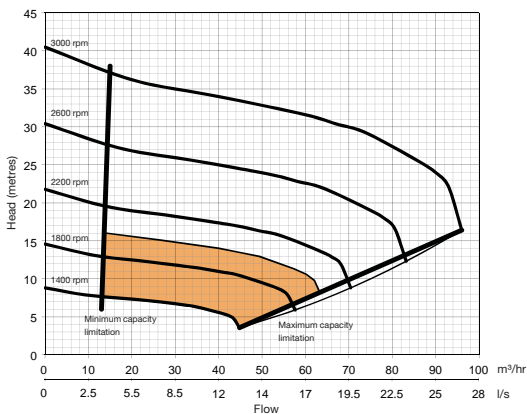
All models are available trailer mounted for safe on site transportation or with a skid base. Cast Iron pump end construction, and sound attenuated enclosures.



Godwin CD series

CD80D Dri-Prime® Hush-Pac

The CD80M can handle solids up to 40mm in diameter. Allows for dry running for prolonged periods while automatically priming and repriming. This makes it an extremely effective pump, suitable for both slurry, clean water applications as well as small dewatering and bypass applications.



Overall dimensions

Length
1621mm
Width
853mm
Height
1333mm

Engine Option

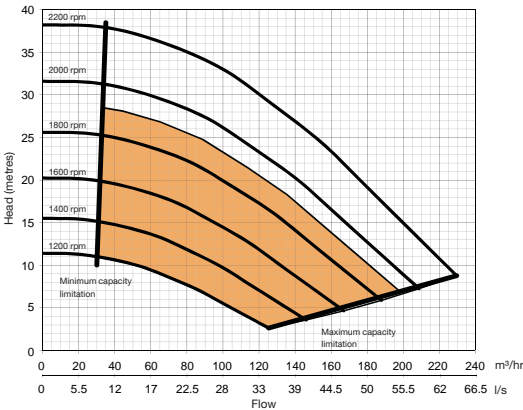
 Kubota Z482

CD80M Kubota Z48

Suction connection	80mm	Wet Weight	725kgs
Delivery connection	80mm	Impeller diameter	166mm
Max capacity	65m³/hr	Max working pressure	4.0bar
Max Head	15M	Max operating speed	2000rpm
Max Solids	40mm	Engine	Kubota Z482
Max Suction Lift	8.5M	DbA rating (at 3m)	65

CD100M Dri-Prime® Hush-Pac

Able to perform in the toughest conditions, the CD100M can handle solids up to 45mm in diameter. Allows for dry running for prolonged periods while automatically priming and repriming. This makes it an extremely effective pump, suitable for both slurry, clean water, sewer bypass and general dewatering and many other applications.



Overall dimensions

Length 1940mm
Width 1050mm
Height 1500mm

Engine Option

 Perkins 403D-15

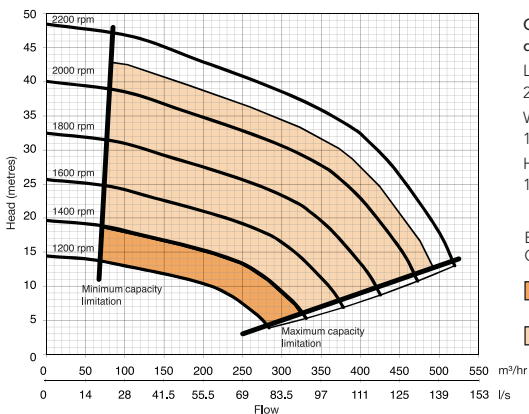
CD100M Perkins 403D-15

Suction connection	100mm	Wet Weight	1168kgs
Delivery connection	100mm	Impeller diameter	220mm
Max capacity	200m³/hr	Max working pressure	3.8bar
Max Head	29M	Max operating speed	2000rpm
Max Solids	45mm	Engine	Perkins 403D-15
Max Suction Lift	8.5M	DbA rating (at 3m)	70

Godwin CD series

CD150M Dri-Prime® Hush-Pac

Able to perform in the toughest conditions, the CD150M can handle solids up to 75mm in diameter. Allows for dry running for prolonged periods while automatically priming and repriming. This makes it an extremely effective pump, suitable for both slurry and clean water applications. The powerful CD150M has proven itself a pump of choice for contractors, local authorities, industrial and environmental companies.



Overall dimensions

Length
2190mm
Width
1050mm
Height
1500mm

Engine Options

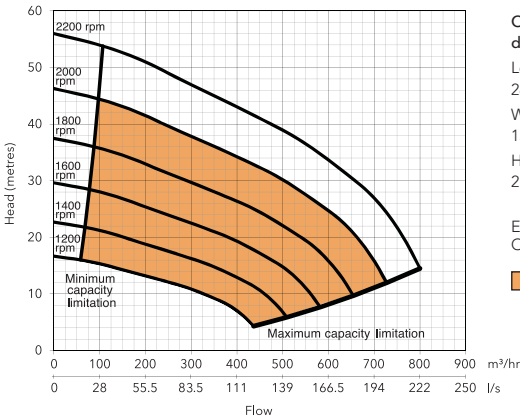
- Perkins 404D-22
- Perkins 1104D-44TA

CD150M Perkins 404D-22

Suction connection	150mm	Wet Weight	1403kgs
Delivery connection	150mm	Impeller diameter	260mm
Max capacity	329m³/hr	Max working pressure	4.8bar
Max Head	19M	Max operating speed	1500rpm
Max Solids	75mm	Engine	Perkins 404D-22
Max Suction Lift	8.5M	DbA rating (at 3m)	70

CD225M Dri-Prime® Hush-Pac

The CD225 can handle solids up to 75mm in diameter. This makes it an extremely effective pump, suitable for both slurry and clean water applications. The powerful CD225 has proven itself a pump of choice for Mines, Quarries, and environmental companies.



Overall dimensions

Length
2890mm
Width
1300mm
Height
2100mm

Engine Option

JCB 444 IPUT
3TCA-85

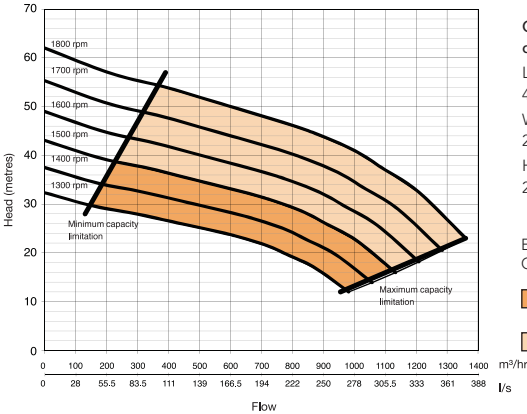
CD225M JCB 444 IPUT 3TCA-85

Suction connection	200mm	Wet Weight	2459kgs
Delivery connection	200mm	Impeller diameter	290mm
Max capacity	800m³/hr	Max working pressure	5.5bar
Max Head	54M	Max operating speed	1800rpm
Max Solids	75mm	Engine	JCB 444 IPUT 3TCA-85
Max Suction Lift	8.5M	DbA rating (at 3m)	71

Godwin CD series

CD300M Dri-Prime® Hush-Pac

The CD300M can handle solids up to 95mm in diameter. This makes it an extremely effective pump, suitable for both slurry and clean water applications. The powerful CD300M has proven itself a pump of choice for mines, quarries and many other high capacity applications.



Overall dimensions

Length
4850mm
Width
2065mm
Height
2545mm

Engine Options

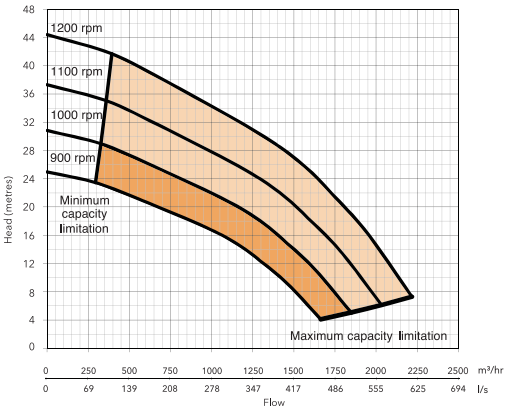
- Perkins 1106D-E66TA
- Caterpillar C9

CD300M Caterpillar C9

Suction connection	300mm	Wet Weight	6620kgs
Delivery connection	300mm	Impeller diameter	362mm
Max capacity	1380m³/hr	Max working pressure	6.0bar
Max Head	54M	Max operating speed	1800rpm
Max Solids	95mm	Engine	Caterpillar C9
Max Suction Lift	8.5M	DbA rating (at 3m)	80

CD400 Dri-Prime® Open Set



The CD400 can handle solids up to 125mm in diameter. This makes it an extremely effective pump, suitable for both slurry and clean water applications. The powerful CD400 has proven itself a pump of choice for Mines, Quarries, and environmental companies.



Overall dimensions

Length
5000mm
Width
2205mm
Height
2405mm

Engine Options

-  Perkins 1106D-E66TA
-  Caterpillar C9

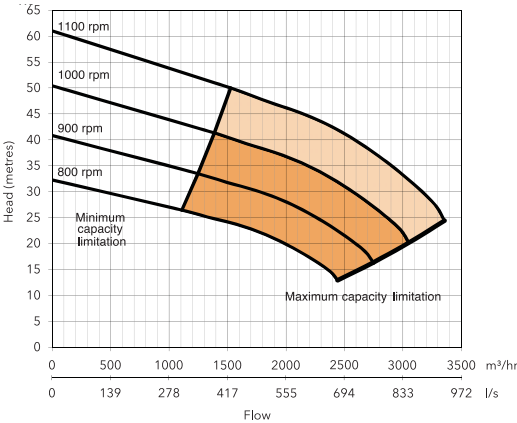
CD400 Caterpillar C9

Suction connection	450mm	Wet Weight	7750kgs
Delivery connection	400mm	Impeller diameter	500mm
Max capacity	2218m³/hr	Max working pressure	4.4bar
Max Head	42M	Max operating speed	1200rpm
Max Solids	125mm	Engine	Caterpillar C9
Max Suction Lift	8.5M		

Godwin CD series

CD500 Dri-Prime® Open Set

The CD500M features the unique Godwin high pressure oil bath mechanical seal design. This allows for dry running for prolonged periods while automatically priming and repriming. Able to perform in the toughest conditions, the CD500M can handle solids up to 80 mm in diameter. This makes it an extremely effective pump, suitable for both slurry and clean water applications. The powerful CD500M has proven itself a pump of choice for mines, quarries and many other high capacity applications.



Overall dimensions

Length
5400mm
Width
2670mm
Height
2500mm

Engine Options

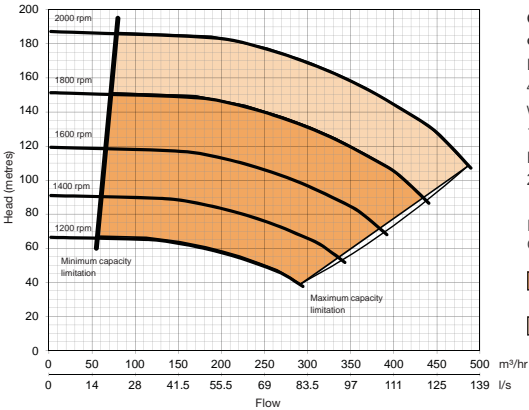
- Caterpillar C15
- Caterpillar C18

CD500 Caterpillar C18

Suction connection	500mm	Wet Weight	11750kgs
Delivery connection	450mm	Impeller diameter	610mm
Max capacity	3357m³/hr	Max working pressure	6.0bar
Max Head	50M	Max operating speed	1100rpm
Max Solids	80mm	Engine	Caterpillar C18
Max Suction Lift	8.5M		

HL160M Dri-Prime® Open Set

The HL160M can handle solids up to 35mm in diameter. This makes it an extremely effective pump, suitable for both slurry and clean water applications. The powerful HL160M has proven itself a pump of choice for mines, quarries and many other high capacity applications.



Overall dimensions

Length
4000mm

Width
1950mm

Height
2350mm

Engine Options

- Volvo TAD951VE
- Caterpillar C15

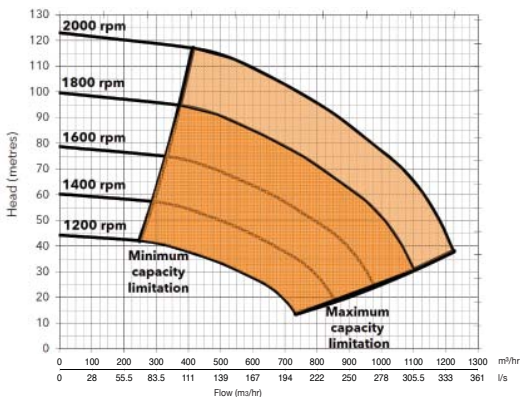
HL160M Caterpillar C15

Suction connection	200mm	Wet Weight	7050kgs
Delivery connection	150mm	Impeller diameter	508mm
Max capacity	486m³/hr	Max working pressure	18.5bar
Max Head	187M	Max operating speed	2000rpm
Max Solids	35mm	Engine	Caterpillar C15
Max Suction Lift	8.5M		

Godwin HL series

HL250M Dri-Prime® Open Set

The HL250M features the unique Godwin high pressure oil bath mechanical seal design. This allows for dry running for prolonged periods while automatically priming and repriming. Able to perform in the toughest conditions, the HL250M can handle solids up to 65mm in diameter. This makes it an extremely effective pump, suitable for both slurry and clean water applications. The powerful HL250M has proven itself a pump of choice for mines, quarries and many other high capacity applications.



Overall dimensions

Length
4000mm
Width
1950mm
Height
2350mm

Engine Options

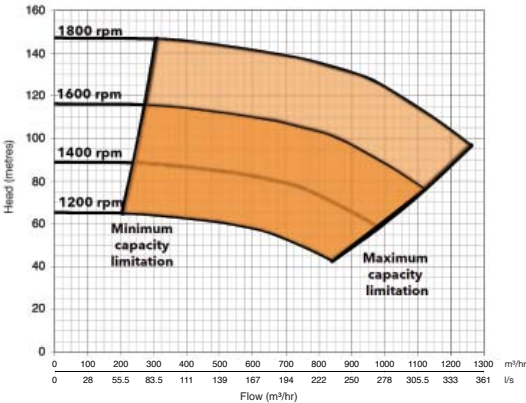
- Volvo TAD951VE
- Caterpillar C15

HL250M Caterpillar C15

Suction connection	300mm	Wet Weight	7000kgs
Delivery connection	250mm	Impeller diameter	440mm
Max capacity	1224m³/hr	Max working pressure	12.1bar
Max Head	117M	Max operating speed	2000rpm
Max Solids	65mm	Engine	Caterpillar C15
Max Suction Lift	8.5M		

HL260M Dri-Prime® Open Set

The HL260M features the unique Godwin high pressure Glycol mechanical seal design. This allows for dry running for prolonged periods while automatically priming and repriming. Able to perform in the toughest conditions, the HL260M can handle solids up to 50mm in diameter. This makes it an extremely effective pump, suitable for both slurry and clean water applications. The powerful HL260M has proven itself a pump of choice for mines, quarries and many other high capacity applications.



Overall dimensions

Length
4300mm
Width
1980mm
Height
2525mm

Engine Options

- Volvo TAD1215VE
- Caterpillar C18

HL260M Caterpillar C18

Suction connection	250mm	Wet Weight	6850kgs
Delivery connection	200mm	Impeller diameter	540mm
Max capacity	1260m³/hr	Max working pressure	16bar
Max Head	147M	Max operating speed	1800rpm
Max Solids	50mm	Engine	Caterpillar C18
Max Suction Lift	8.5M		

Godwin NC series

Godwin NC series

With two of the world's market leading pump brands, Flygt and Godwin, now under the Xylem umbrella, we have combined the world's most reliable portable pumps with the world's most efficient self-cleaning hydraulics to bring you the most efficient and reliable Godwin pumps ever.

The new range of Godwin NC pumps are not only reliable, they come equipped with the non-clogging, performance of the proven Flygt N-technology.



This breakthrough combination gives you a best-in-class portable pump that delivers sustained hydraulic efficiency to handle tough wastewater pumping applications.

Self-cleaning Flygt N-technology saves costs

The high efficiency of Flygt N-technology is sustained over time due to its self-cleaning ability, keeping energy/fuel costs to a minimum.

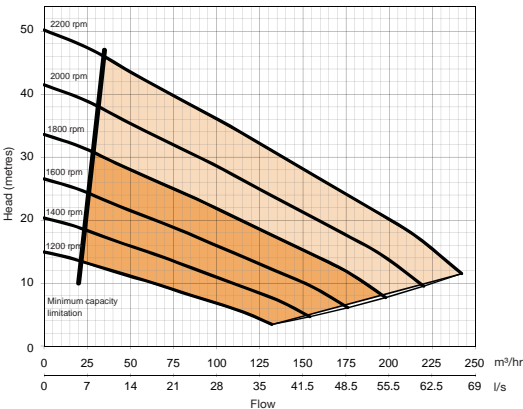
Without a doubt, no matter what the challenge, you will always have the peace of mind knowing that our Godwin NC Series Dri-Prime® pumps are on the job.

Godwin pumps, now with sustained high efficiency N hydraulics

- Self-cleaning reliability
- Hydraulic efficiency
- Non-stop optimum performance
- Long term energy/fuel savings
- Optimized operating speed for low energy/fuel consumption
- Low downtime
- Extended service intervals
- Minimum maintenance
- Service friendly

NC100 Dri-Prime® Hush-Pac

Features the unique patented N-technology with its innovative self-cleaning impeller. Able to perform in the toughest conditions, the NC100 can handle solids up to 35mm in diameter. This makes it an extremely effective pump, suitable for both sewage and clean water applications. The powerful NC100 has proven itself a pump of choice when pumping stringy material and general dewatering applications.



Overall dimensions

Length
2190mm
Width
1050mm
Height
1500mm

Engine Options

- Perkins 403D-15
- Perkins 404D-22

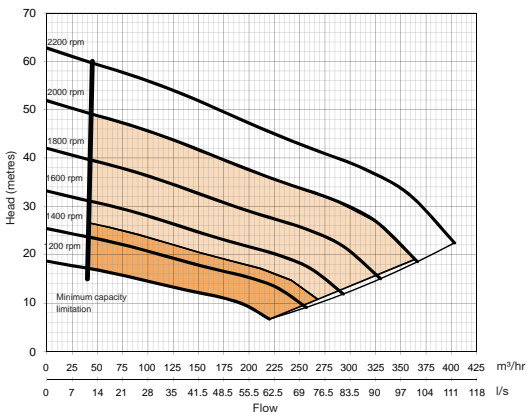
NC100 Perkins 403D-15

Suction connection	100mm	Impeller diameter	256mm
Delivery connection	100mm	Max working pressure	5.0bar
Max capacity	188 m³/hr	Max operating speed	1800rpm
Max Head	27M	Engine	Perkins 403D-15
Max Suction Lift	8.5M	DbA rating (at 3m)	69
Wet Weight	1475kgs		

Godwin NC series

NC150 Dri-Prime® Hush-Pac

Features the unique patented N-technology with its innovative self-cleaning impeller. Able to perform in the toughest conditions, the NC150 can handle solids up to 42mm in diameter. This makes it an extremely effective pump, suitable for both sewage and clean water applications. The powerful NC150 has proven itself a pump of choice when pumping stringy material and general dewatering applications.



Overall dimensions

Length
2190mm
Width
1050mm
Height
1500mm

Engine Options

- Perkins 404D-22
- Perkins 1104D-44T

NC150 Perkins 404D-22

Suction connection	150mm	Impeller diameter	265mm
Delivery connection	150mm	Max working pressure	6.0bar
Max capacity	241m³/hr	Max operating speed	1600rpm
Max Head	26M	Engine	Perkins 404D-22
Max Suction Lift	8.5M	DbA rating (at 3m)	68
Wet Weight	1525kgs		

Heidra Hydraulic Submersible Hush-Pac

When the suction lift is greater 8.5 m, Heidra pumps take over where Dri-Prime pumps leave off. Heidra hydraulic submersibles are basically Dri-Prime pumps that have been engineered to work submerged in the liquid they pump. Tough and reliable, Heidra pumps are designed for general pumping of light slurries and municipal sludges

Liquid bath mechanical seal = dry-running and reduced maintenance costs

Seals in pumps that often run dry can overheat and fail. Godwin mechanical shaft seals run in a liquid bath, which dissipates heat through the pump casing and allows the pump to run dry. This provides more reliable operation, frees operators from closely monitoring the pumps, while reducing maintenance costs.

Durable pump-end = long lifetime

Cast iron, the standard build, offers excellent durability.

Open impeller = versatility and fewer stoppages

With their open impeller design, Godwin Heidra pumps handle solids of up to 125mm in diameter, reducing the risk of stoppages. The open impeller also means you can use Godwin pumps in a wide range of applications from water and wastewater, to drilling muds and industrial fluids.



Godwin Heidra NC series

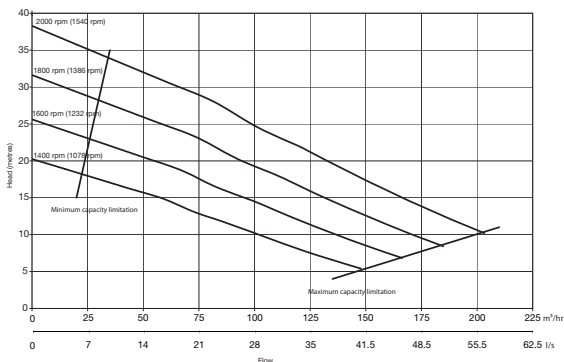
Heidra HNC100 - Duetz Power Pack

An extremely powerful yet compact pump. Able to perform in the toughest conditions, the Heidra 100NC can handle solids up to 35mm in diameter. The powerful Heidra 100NC has proven itself a pump of choice when pumping stringy material and general dewatering applications.



Overall dimensions

Length	2200mm
Width	1050mm
Height	1845mm



HNC100 Duetz F4M2011

Delivery	100mm Bauer	Wet Weight	1550kgs
Inlet	100mm c/w Strainer	Pump Weight	135kgs
Max capacity	200 m³/hr	Impeller diameter	256mm
Max Head	35 metres	Max working pressure	4.0bar
Suction Lift	No Limit	Max operating speed	2200rpm
		Engine	Duetz F4M2011

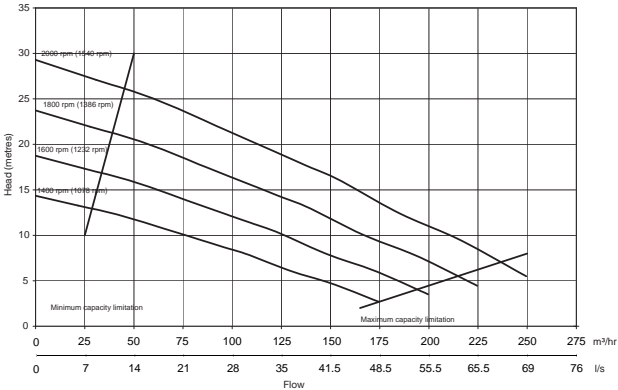
Heidra HNC150 - Duetz Power Pack

An extremely powerful yet compact pump with flow capabilities to 225 m³/hr and discharge heads to 29 metres. Able to perform in the toughest conditions, the Heidra 150NC can handle solids up to 42mm in diameter. The powerful Heidra 150NC has proven itself a pump of choice when pumping stringy material and general dewatering applications.



Overall dimensions

Length	2200mm
Width	1050mm
Height	1845mm



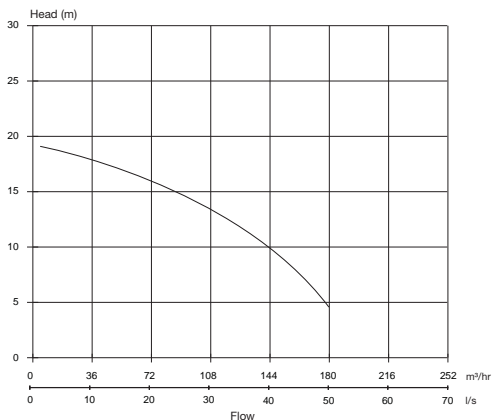
HNC150 Duetz F4M2011

Delivery	150mm Bauer	Wet Weight	1550kgs
Inlet	150mm c/w Strainer	Pump Weight	155kgs
Max capacity	225m ³ /hr	Impeller diameter	280mm
Max Head	29M	Max working pressure	5.7bar
Suction Lift	No Limit	Max operating speed	2000rpm
		Engine	Duetz F4M2011

Flygt Robot Range - Solids Handling

Flygt 100VX Robot

Heavy duty pump, for pumping raw sewage and slurries. The Vortex Flow design allows solids of up to 80mm to pass through. Ideal for sewer by-pass work and where large solids are in suspension.



100VX

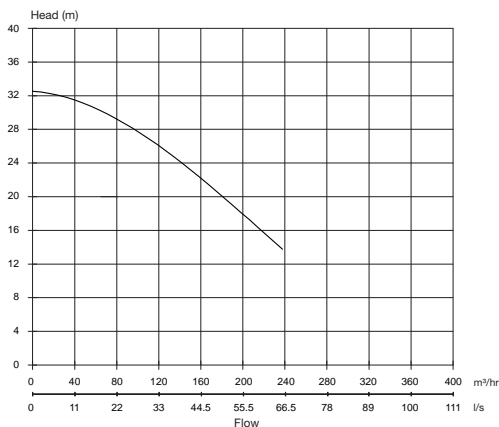
Connection Size	100mm	Air Handling	50m³/h
Max Capacity	180m³/h	Operating Speed	1500rpm
Max Head	19M	Wet Weight	1484kg
Suction Lift	9M	Fuel Tank	150lts
Max Solids	80mm	Engine	Duetz F2M2011

Fuel consumption 7.2 litres per hour at full speed

Flygt Robot Range - Solids Handling

Flygt 150VX Robot

Silenced, Heavy Duty pump, for pumping Raw Sewage and Slurries. The Vortex Flow design allows solids of up to 100mm to pass through. Ideal for Sewer by-pass work and where large solids are in suspension.



150VX

Connection Size	150mm	Air Handling	50m³/h
Max Capacity	240m³/h	Operating Speed	1750rpm
Max Head	32M	Wet Weight	1990kg
Suction Lift	8M	Fuel Tank	142lts
Max Solids	100mm	Engine	Duetz F4M2011

Fuel consumption 7.2 litres per hour at full speed

Water Treatment

Our new Treatment Rental division has a vast range of treatment products available for short term or semi-permanent treatment requirements in the event of compliance failure, short term outages or planned maintenance work. Xylem has the technology available to ensure you maintain consent whatever your needs.

Our range incorporates a number of the premium Xylem brands with market leading technology in both Water & Wastewater Treatment combined with our nationwide service centres and 24/7 call out make Xylem truly a one-stop shop for both transport & treatment of both water & wastewater.



Sanitaire Silver Series II

Sanitaire Silver Series II - Diffuser Grid

For a combination of high aeration efficiency and low operating costs, there's the Sanitaire Silver Series II membrane diffuser – the most widely used fine bubble diffused aeration system available today.

The Sanitaire Silver Series II is well established and time proven in the market. This product is widely utilised in the municipal water industry for standard and low-pressure aeration applications; and our LP (low pressure) membrane is an excellent solution for applications where the back pressure allowed on the blower is already defined, such as a refurbishment.

Xylem can now offer a complete fine bubble aeration system (4m x 2m) with our market leading Sanitaire Silver Series II fine bubble membrane diffusers and a 600m³/hr blower unit.



Description	kW	Voltage
Lift Out S/S Aeration Grid 4m x 2m c/w 72 x 9" Sanitaire Membrane Diffuser Heads 600m ³ /h Blower Unit 3m x 2m x2m	30	400/3/50

AERZEN Air Blower

Xylem can now offer Air Blowers complete with VFD available within the rental fleet which can be hired with or without one of our Aeration Grids.

Dimensions – 3m x 2m x 2m

Maximum Air Flow – 600m³/h

Total load in kW drawn by Blower – 30kW



Wedeco Spektron



Wedeco Spektron

The Wedeco Spektron shines new light on the environmentally friendly process of using UV disinfection for drinking water. Featuring highly efficient UV lamp technology and advanced flow distribution, the Spektron series suits modern drinking water treatment plants and covers a wide array of applications from domestic water supply and industrial uses to large municipal water plants with a capacity of more than one thousand m³/h per unit.



Xylem now has Wedeco Spektron 400 and 600 UV reactors available to rent together with their own control panel for ease of use and inspection. The Spektron range can be used in a number of applications where water treatment is needed.

Description	kW	Voltage
Spektron 400 300mm Dia x 2.5m S/S UV Reactor c/w 8 x 330w UV Lamps & Control Panel	2.9	400/3/50
Spektron 600 350mm Dia x 2.9m S/S UV Reactor c/w 12 x 330w UV Lamps & Control Panel	4.3	400/3/50

Wedeco Containerised LBX 850e UV Treatment

LBX 850e Containerised UV Rig

The LBX reactor is a compact wastewater UV Disinfection system suitable for low UV transmissivity applications. The reactor includes high efficiency low pressure Ecoray UV lamps and includes its own dedicated smart dose controller including SCADA connection. Housed in a dedicated enclosure for ease of installation and transport the unit is a self-contained UV disinfection solution for wastewater applications.



- Container Size – Standard 20 Foot ISO shipping container – Length 6.05m, Width 2.44m, Height 2.59m
- Container Weight – Approx 4.5 Tonnes - Dry
- Inlet Connection – DN400 PN16
- Outlet Connection – DN400 PN16
- Electrical Supply – TP&N – 40A (400/3/50)
- Lamps – 32 off 150W Ecoray Lamps
- Total load in kW drawn by panel & lamps – 10kW



Flygt Mixers

Flygt Submersible Mixers consist of a drive unit and propeller, integrated into a compact unit. The mixer is mounted on a guide bar, to enable it to be raised and lowered, to operate at different depths. It can also be angled upwards or downward and can be swivelled to the sides. Its mixing action can therefore be directed to any point in a lagoon or tank.

This flexibility aided by the large blade propeller, running at relatively low speeds, sets in motion large volumes of sludge and water. The Flygt submersible mixer is at least three times as efficient as a conventional mixer. This is due to the high efficiency hydraulic design and the fact that the motor and propeller are integrated into a lightweight, compact unit. No energy is lost in complicated gearing, support bearings and heavy shafts. Also, the mixer can be run intermittently, thus providing further energy savings.

Compact design

The machines are either direct-driven or include a reduction gearbox between the motor and the propeller. However, all models are well integrated into a compact unit. So no energy is lost in long heavy shafts and support bearings.

Circular tanks

One mixer is normally sufficient for tank volumes up to 2,000m³. Depending on the characteristics of the liquid and the desired degree of agitation, more than one mixer may be necessary for larger tank volumes.

Rectangular tanks

If the length, width and depth dimensions of the tank differ considerably, several mixers may be necessary to ensure good results. Rectangular tanks are often located underground. Since Flygt Mixers are installed from the top, installation in underground tanks is easy.

For specific duties on the range of Flygt Submersible Mixers please contact your local service centre.



Homogeneous liquid manure in a couple of hours.

Flygt Submersible Mixers have an important role to play in agriculture, for homogenising liquid manure. Even if the manure is old, with a thick dry crust and all the solids have settled at the bottom of the tank, it will be possible by mixing for the whole tank contents to become homogeneous. This is due to the fact that the mixer can operate at different depths, can be orientated in any direction and will quickly set in motion large volumes of the manure.

Wide field of applications in industry

Flygt Submersible Mixers are used for keeping liquids of different viscosities in suspension, for mixing dry solids into liquids, for thickening after sedimenting and decanting, and for transporting liquids,

Good environment in fish farming

Whether in netting enclosures in open water or in dammed bays, Flygt submersible mixers will maintain ideal fish farming conditions at a modest cost. The mixer will supply a briskly-flowing current of fresh water with good oxygen contents and an abundance of natural food. At the same time, fish droppings will be removed. The risk of rotting and formation of decay gases is eliminated. By establishing circulation between the bottom and the surface, the mixer also evens out the water temperature, which favours the growth of the fish.

Improving the efficiency in sewage treatment plants

Flygt Submersible Mixers have been widely adopted in sewage treatment plants throughout the world. Particularly in thickening, sludge and storm water ponds, in buffer tanks and in the mixing of chemicals and lime into the water, the efficiency and low operating costs of the mixers can be utilised to the greatest possible extent.

Flow creation

For low head, high capacity laminar flows the large propeller mixer can be used in lake reservoirs, fish farms as well as process mixing.

Flygt Mixers

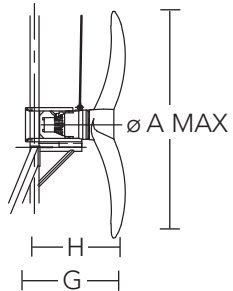
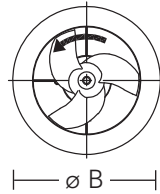
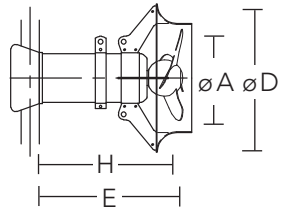
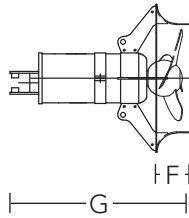
As shown:

4620 1.5kW mixer fitted on a portable, free standing steelwork - available to rent.



Available Flygt Mixers

Type	A Max Ø mm	B Max Ø mm	C mm	D mm	E mm	F mm	G mm	H mm	I mm	Weights (max) kg (lbs)
4410	2500	-	-	-	-	-	1110	1010	100	230(507)
4430	2500	-	-	-	-	-	1110	1010	100	263 (580)
4630	390	636	405	559	469	117	574	457	50	61(134)
4640	390	636	405	559	509	117	614	497	50	64 (141)
4650	650	1027	675	931	721	195	878	700	100	177 (390)
4660	650	1027	675	931	831	195	988	810	100	218 (481)
4670	880	1372	908	1256	835	264	992	816	100	363 (800)
4680	880	1372	908	1256	985	264	1192	966	100/150	482 (1063)



Aeration - Flygt Radial Aerators

Fields of application

The efficient mixing characteristics and the simple design of our Ejectors and Aerators make them suitable for aerating biological ponds, fishfarm ponds, lakes and waterways.

The function of the ejectors

The principle on which the Ejector operates is simple and well-known. A drive jet from a Flygt Submersible pump is led into the Ejector. The drive jet flows through a nozzle into the ejector housing, which has a delivery pipe for the medium, e.g. air, which is to be pumped (the secondary flow). A drop in pressure occurs when the drive jet passes through the mixing tube. This partial vacuum automatically entrains the pump medium with the drive jet and the contents of the primary and secondary flows are mixed intensively with each other.

The function of the Radial Aerator

Aeration by means of high efficiency mixing.

Air dispersion by the same method as the Ejector is distributed radially within a tank, basin or lagoon, via the series of diffusers mounted around a central turbine impeller. As with the Ejectors, being totally submerged significant advantages arise over other forms of aeration.

Low noise levels.

No sprays or liquid dispersion in the atmosphere.

Installation

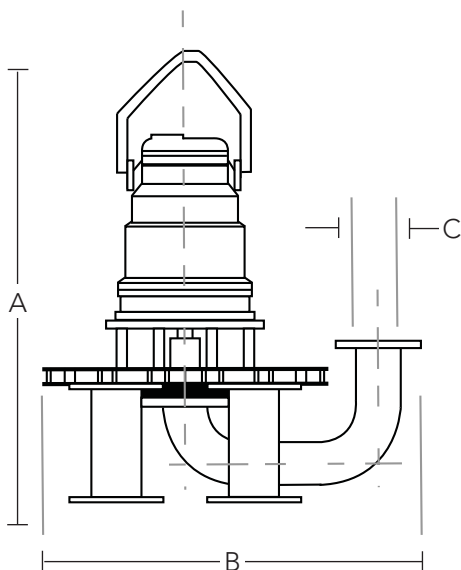
Installation of these aeration products is straightforward either by bolting to the tank floor or they even will be suspended by their own weight in certain circumstances.

Applications

Subject to the tank configuration the ejector or aerator can be selected to: Replace existing aeration equipment during breakdown or maintenance periods. Upgrade existing treatment capacity without major investment. Increase oxygen levels. Reduce ammonia levels.



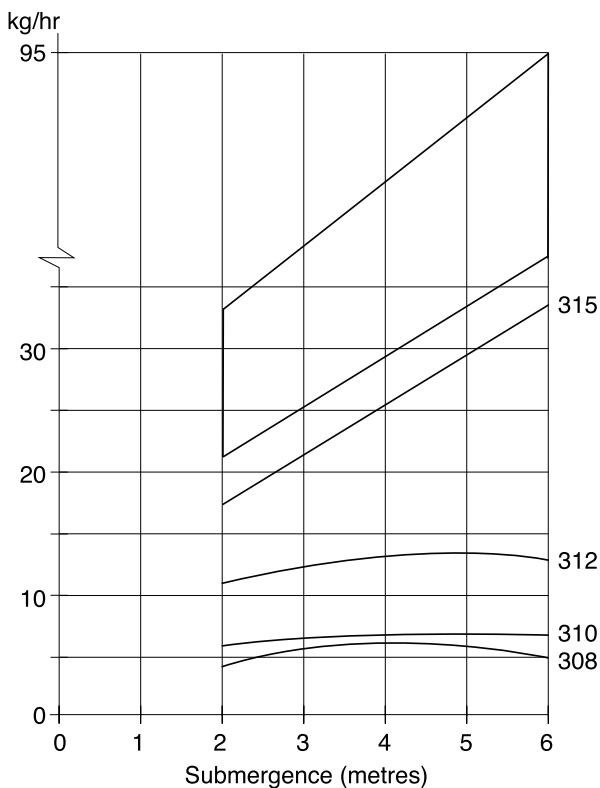
Dimensions and Weight - Flygt Radial Aerators



Type	Power	Current	Dimensions (mm)			Weight kg*
			a	b	c	
308	2.4	4.5	610	660	50	75
310	4.4	8.5	700	660	50	105
312	5.9	11.0	800	950	80	180
315	13.5	25.0	1130	995	100	295
320	22	42.0	1320	1150	150	500

* Weight includes 10m of cable

Flygt Radial Aerators - Oxygen Transfer Rate



Flygt Flyjet and Hydroejector

Utilising the principles of an Ejector; the Flyjet and Hydroejector can be used to resuspend solids which have settled in storage tanks.

They can be used in storm water retention tanks at sewage works; for example. 4" and 6" jet pipes are available.



Pump Flotation Modules

The concept

Our range of pump flotation modules has been developed to provide a light-weight and cost-effective alternative to the traditional steel pontoon. The flotation modules are prefabricated from light-weight, foam-filled, GRP (Glass fibre Reinforced Polymer) and are available in four sizes.

General applications

Pump Flotation Modules can be supplied to suit Flygt 2000 Series / BS dewatering pumps, C/N-series wastewater pumps and slurry pumps.

• Applications include:

- Mine dewatering
- Tailing dams
- Underground dams
- Sewage treatment
- Quarries
- Aeration ponds
- Construction site dewatering
- Flooding control

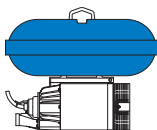
Installation

The pump and integral module can be simply installed by use of a central lifting attachment. Once in the water, the module can be towed by boat, if required, and secured in position by anchor or guy ropes. The float module remains visible above the water surface for easy recovery.

Design features:

- Compact and lightweight
- Stainless steel metal parts
- Easily mounted to pumps on site
- Lifting points for easy installation
- Easy to transport as an integral unit
- Foam filled to prevent sinking

By having the pump floating close to the surface, it increases service life through reduced maintenance since it is no longer working within high solids environment.



PFM550

PFM550

PFM 550	Part Number
2201	691 69 00
3140	*
3152/3153	*
3170/3171	*
5100 (<52kW)	*
5150 (<52kW)	*

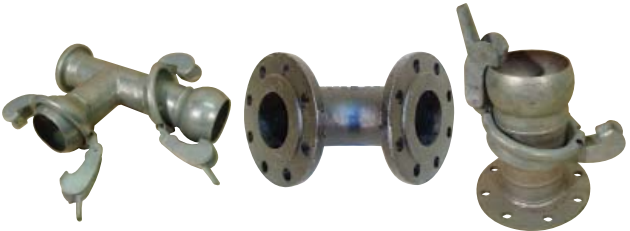
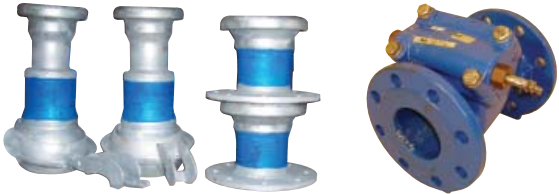
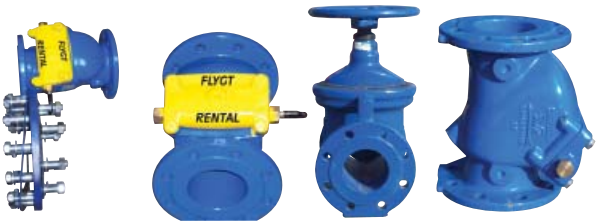
* On request

1400 x 1400 x 540mm 20kg

Hoses and Fittings

To complement our comprehensive range of pumps, extensive stocks of pipework and hoses are held. Our Rental engineers can supply all your needs from 2" hose increasing in size to steel pipes in excess of 450mm.

Also BSP pipe and cast iron fittings to suit most applications including valve, taper, hose spigot, flexible couplings and hose clamps, specialised hoses for high pressure applications are also stocked.



Hoses and Fittings

A pump relies on a secure link between the source and the discharge point. Poor hoses will leak, collapse and cause unwanted problems. So, at Xylem we only sell those hoses we use ourselves – “Cheap hose is expensive hose in the long run”.



**Wire-armoured
Suction Hose**

		Specification		
Bore dia.		Outside dia.	Working Pressure	Weight per 6m incl. cpgs
mm		mm	bars	kg
51		63	8	12
76		89	8	26
102		116	8	35
150		169	5	60

A tough hose developed for the construction industry, with a tube of smooth synthetic rubber, covered with weather resistant synthetic rubber, reinforced with cords of synthetic textile and an embedded helix of high-tensile steel wire.

It is flexible and heavy, yet easy enough to manoeuvre.

It seals well onto the pipe fittings, withstands high pressure and is also tough.

It is ideal for suctions and for discharge where the bend must not collapse.



**PVC Suction and
Discharge Hose**

		Specification		
Bore dia.		Outside dia.	Working Pressure	Weight per 6m incl. cpgs
mm	in.	mm	bars	kg
50	2	58	5	6
75	3	87	5.5	10
100	4	115	4.5	25
150	6	167	3	40

PVC is a high grade hose, flexible, lightweight, with exceptional resistance to abrasion and weathering. The smooth bore offers minimum resistance to flow.

The strengthened PVC helix is embedded in the hose wall for extra strength.



Polythene Delivery Hose

		Specification		
Bore dia.		Outside dia.	Working Pressure	Weight per 6m incl. cpgs
mm	in.	mm	bars psi	kg
50	2	65	2.5	8
75	3	90	3.5	14
100	4	115	4.5	18
150	6	170	6.75	43

This is a proven semi-rigid delivery hose, which is well known throughout the industry.

It is damage resistant, but also lightweight and simple to handle.

Friction loss is kept to a minimum in this smooth bore hose.

Friction Loss in Pipe Fittings Chart



Friction Loss In Smooth Bore Pipe

Losses in m/100 or ft./100ft

I.G.P.M.	2"	3"	4"	6"	8"	10"	12"	m ³ /h
50	10	1.4	0.3					10
75	20	3	0.7					15
100	35	5	1	0.1				20
150		12	2.5	0.35				30
200		18	4.5	0.6				50
300		40	10	1.2	0.4			75
400			18	2.2	0.7			100
500			28	3.5	1.1	0.35		125
600			38	4.5	1.5	0.5		150
700				6.5	2	0.7		175
800				8	2.7	0.8		200
900				10	3.4	1	0.4	225
1000				13	4	1.4	0.5	250
1200				18	6	2	0.8	300
1400				26	8	3	1	350
1600				32	11	4	1.5	400
1800				36	14	4.5	2	450
2000				38	17	5	2.5	500
2500					25	9	4	650
3000					38	12	5	750
4000						21	8	1000
5000						32	13	1250

m³/h x 4 = g.p.m. approx

The table refers to new pipes and moderate corrosion could increase resistance by 30%. To calculate resistance of Bends and Fittings, an 'equivalent length' for each accessory needs to be added to the actual length of pipe. The equivalent length in feet can be estimated by multiplying the factors in the adjacent table by the pipe diameter in inches.

Example :- A 6" Gate Valve is equivalent to 12 ft of extra pipe

Mitre elbow or tee	5
Round elbow	3
Slowbend	2
Square edged entrance	3
Gate valve fully open	2
Globe valve fully open	10
Non-return valve (flap type)	3
Foot-valve and strainer (clean)	5

Weight Reference Guide - Pumps

Pump Type	BS/NS/CS Weight Inc Base Stand	Pump Type	Weight
2052	18kgs	Large Submersible Pump Range	
2066	30kgs	3315LT 90kW	1'430kgs - Pump Only
2102	50kgs	3315HT 105kW	1'280kgs - Pump Only
2125 Aluminium	89kgs	3231 85kW	1'380kgs - Pump Only
2125 Cast Iron	180kgs	3231 105kW	1'590kgs - Pump Only
2151	165kgs	3231 125kW	1'530kgs - Pump Only
2201MT Aluminium	280kgs	3231 170kW	1'760kgs - Pump Only
2201MT Cast Iron	445kgs	3231 215kW	1'910kgs - Pump Only
2201HT Aluminium	240kgs	3312 100kW	1'975kgs - Pump Only
2201HT Cast Iron	350kgs	3312 180kW	2'275kgs - Pump Only
2250	540kgs	3312 250kW	3'125kgs - Pump Only
2400	985kgs	3356 100kW	1'650kgs - Pump Only
2610 MT	21kgs	3400 75kW	2'700kgs - Pump Only
2620 MT	32kgs	3400 250kW	3'750kgs - Pump Only
2640 MT & HT	51kgs	Original Flygt Diesel Range	
2660 MT & HT	78kgs	Flygt ROBOT 100VX - Full Fuel Tank	1'484kgs
2670 MT & HT	141kgs	Flygt ROBOT 150VX - Full Fuel Tank	1'990kgs
2840 MT & HT	56kgs	Godwin Diesel Range - Wet Weight	
2860 MT & HT	91kgs	CD80D - Kubota Z482 Engine - Hush-Pac Skid	725kgs
2870 MT & HT	125kgs	CD100M - Perkins 403D-15 Engine - Hush-Pac Skid	1'168kgs
3085MT	71kgs	CD150M - Perkins 404D-22 Engine - Hush-Pac Skid	1'403kgs
3102MT	116kgs	CD225M - Perkins 1104D-E44TA Engine - Hush-Pac Skid	2'459kgs
3102SH	114kgs	CD225M - JCB, 444 IPUT 3TCA-85 Engine - Hush-Pac Skid	2'450kgs
3127MT	170kgs	CD300M - Caterpillar C9 Engine - Hush-Pac Skid	6'620kgs
3127HT	155kgs	CD400M - Caterpillar C9 Engine - Open Set Skid	7'750kgs
3152LT	426kgs	CD500M - Caterpillar C15 Engine - Open Set Skid	11'750kgs
3152MT	321kgs	HL160M - Caterpillar C15 Engine - Open Set Skid	7'050kgs
3152HT	280kgs	HL250M - Caterpillar C15 Engine - Open Set Skid	7'000kgs
3153 LT	379kgs	HL260M - Caterpillar C18 Engine - Open Set Skid	6'850kgs
3153MT	252kgs	NC100 - Perkins 403D-15 Engine - Hush-Pac Skid	1'475kgs
3153HT	232kgs	NC150 - Perkins 404D-22 Engine - Hush-Pac Skid	1'525kgs
3153SH	242kgs	HPP150 Deutz FM2011 Power Pack - Hush-Pac Skid	1'550kgs
3171LT	460kgs	HPP150 John Deer Engine	2'297kgs
3171MT	362kgs	HNC100 Pump Only	135kgs
3171HT	321kgs	HNC150 Pump Only	155kgs
3201MT	588kgs	Mixers	
3201HT	540kgs	4620	18kgs
3202LT	900kgs	4630	60kgs
3202MT	610kgs	4640	63kgs
3202HT	580kgs	4650	174kgs
3300LT	1'175kgs	4660	209kgs
3300MT	1'188kgs	4670	345kgs
3300HT	988kgs	Panels	
3301LT	1'360kgs	15kW Soft Start	30kgs
3301MT	1'030kgs	90kW Soft Start	130kgs
3301HT	920kgs	160kW VFD	235kgs

The weights above **DO NOT** include Cable, Chains or Hoses

The weights contained within this guide are an estimate only and the actual weight of the item to be lifted must be separately assessed and verified

The Information contained within this document is for guidance only and is accurate to the best of our knowledge at time of going to print.

Weight Reference Guide - Accessories

Cast Iron Pipe & Fittings	Size (M)	2" - 50mm kg	3" - 80mm kg	4" - 100mm kg	6" - 150mm kg	8" - 200mm kg	10" - 250mm kg	12" - 300mm kg
Gate Valve Metal Wedge		17	23	35	65	104	170	228
NRV Cast Iron Flap Type		12	16	21	37	69	132	187
D/F Bend Short			11	13	22	34	55	77
D/F Bend Long			16	21	34	52	74	101
Duck Foot Bend			15	19	33	50	82	116
Equal Tee			17	21	36	54	87	115
Radial Tee			26	34	55	83	121	164
"Y" Piece			17	20	36	54	89	127
Taper			8	10	15	22	33	46
VJFA			4	5	7	11	15	20
Cast Iron Pipe Cement lined kg/M.No Flanges			16	20	30	40	52	66
NP 16 Flange			5	6	8	10	15	19
Hoses								
Wire Armoured Hose C/W Bauers	6	12	26	35				
PVC Suction & Discharge Hose C/W Bauers	6	6	10	25				
Polythene Semi Rigid Hose C/W Bauers	6	8	14	18	43			
Wire Armoured Hose C/W Bauers	3				35	50	95	
Wire Armoured Hose C/W Flanges	3				65	95	125	
Steel "Bauer" Type Pipe & Fittings								
		2" - 50mm	3" - 76mm	4 1/2" - 108mm	6 1/2" - 159mm	7 1/2" - 194mm		
Galvanised pipe	1	3	5	8	15	20		
Galvanised pipe	2	3	7	12	20	30		
Galvanised pipe	3	7	11	16	32	40		
Bauer Ball Connector		0.2	0.3	1	1.5	2		
Bauer Level Closure Ring		0.5	1	1.5	4	6		
Bauer Socket		0.1	0.3	0.6	1.2	2.5		
Bauer 90 Deg Bend C/W Closure Ring		1	2.5	5.5	11	13		
Bauer Equal Tee C/W 2 Closure Rings		1.5	4	8	15			
Bauer Flanged with ball & Closure Ring		3	5	8	14	22		
Bauer Flanged with Socket		3	4	5	7	15		

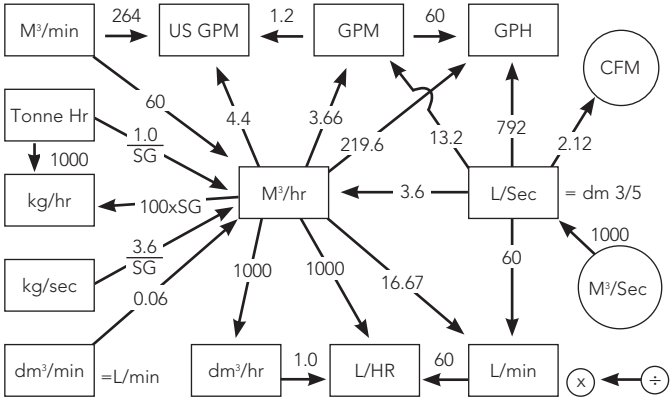
The weights contained within this guide are an estimate only and the actual weight of the item to be lifted must be separately assessed and verified

Conversion Factors

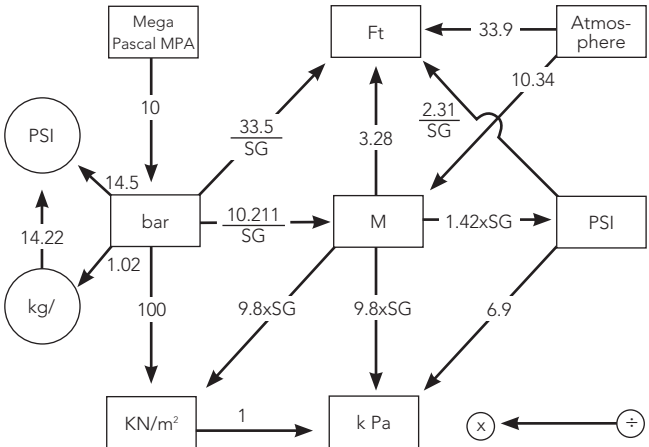
Inches	x	25.4	=	mm	x	0.0394	=	Inches
Feet	x	0.3048	=	m	x	3.281	=	Feet
Yards	x	0.9144	=	m	x	1.0936	=	Yards
Miles	x	1.609	=	km	x	0.6214	=	Miles
Ft ²	x	0.0929	=	m ²	x	10.764	=	Ft ²
Miles ²	x	2.59	=	km ²	x	0.3861	=	Miles ²
In ³	x	16387	=	mm ³	x	0.000061	=	In ³
Ft ³	x	0.02832	=	m ³	x	35.31	=	Ft ³
Gals (Imp)	x	4.546	=	L	x	0.22	=	Gals (Imp)
Gals (Imp)	x	0.004546	=	m ³	x	220	=	Gals (Imp)
Gals (US)	x	3.785	=	L	x	0.2642	=	Gals (US)
LBS	x	0.4536	=	kg	x	2.2046	=	LBS
Tons	x	1016	=	kg	x	0.000984	=	Tons
Gal/Min (Imp)	x	0.2727	=	m ³ /h	x	3.6667	=	Gal/Min (Imp)
Gal/Min (Imp)	x	0.0757	=	L/Sec	x	13.21	=	Gal/Min (Imp)
L/Sec	x	3.6	=	m ³ /h	x	0.277	=	L/Sec
Gal/Min (Imp)	x	1.2	=	USGPM	x	0.833	=	Gal/Min (Imp)
PSI	x	0.06895	=	Bar	x	14.504	=	PSI
PSI	x	0.703 S.G	=	M Liquid	x	1.422xS.G	=	PSI
Ft Liquid	x	0.02989xS.G	=	Bar	x	33.456 SG	=	Ft Liquid
STD. ATM	x	1.01225	=	Bar	x	0.9879	=	STD. ATM
HP	x	0.7457	=	kW	x	1.341	=	HP

Conversion Factors

Flow Conversions



Head/Pressure Conversions



Flange Sizes

Normal Bore	Table	Dia. Flange	P.C.D	Bolt Dia.	No. of Bolts	Flange Thickness Grey Cast Iron
1"	D&E	4.50"	3.25"	.50"	4	.50"
1.25"	D&E	4.75"	3.44"	.50"	4	.625"
1.5"	D	6.00"	4.50"	.625"	4	.688"
2"	E	6.00"	4.50"	.625"	4	.750"
50mm	NP16	165mm	125mm	M16	4	20mm
2.5"	D	6.50"	5.00"	.625"	4	.688"
	E	6.50"	5.00"	.625"	4	.750"
3"	D&E	7.25"	5.75"	.625"	4	.750"
80mm	NP10	200 (7.87)	160 (6.30)	M16	8	21 (.83)
	NP16	200 (7.87)	160 (6.30)	M16	8	21 (.83)
4"	D	8.50"	7.00"	.625"	4	.750"
	E	8.50"	7.00"	.625"	8	8.75"
100mm	NP10	220 (8.66)	180 (7.09)	M16	8	22 (.87)
	NP16	220 (8.66)	180 (7.09)	M16	8	22 (.87)
5"	D	10.00"	8.25"	.625"	8	.813"
	E	10.00"	8.25"	.625"	8	.875"
6"	D	11.00"	9.25"	.625"	8	.813"
	E	11.00"	9.25"	.750"	8	8.75"
150mm	NP10	285 (11.22)	240 (9.49)	M20	8	23 (.91)
	N16	285 (11.22)	240 (9.49)	M20	8	23 (.91)
7"	D	12.00"	10.25"	.625"	8	.875"
	E	12.00"	10.25"	.750"	8	1.00"
8"	D	13.25"	11.50"	.675"	8	.875"
	E	13.25"	11.50"	.750"	8	1.00"
200mm	NP10	340 (12.38)	295(11.61)	M20	8	245 (.96)
	NP16	340 (12.38)	295(11.61)	M20	12	245 (.96)
9"	D	14.50"	12.75"	.625"	8	.875"
	E	14.50"	12.75"	.750"	12	1.00"
10"	D	16.00"	14.00"	.750"	8	1.00"
	E	16.00"	14.00"	.750"	12	1.00"
250mm	NP10	400 (15.75)	350(13.78)	M20	12	26 (1.02)
	NP16	400 (15.75)	355 (13.98)	M25	12	26 (1.02)
12"	D	18.00"	16.00"	.750"	12	1.00"
	E	18.00"	1.00"	.875"	12	1.125"
300mm	NP10	455 (17.91)	400 (15.75)	M20	12	27.5 (1.08)
	NP16	455 (17.91)	410 (16.14)	M25	12	27.5 (1.08)

NP10 and NP16 are for cold water pressure of 10 bar and 16 bar and are the current British Standard. They are unnecessarily heavy for most contractors' pumps.

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In the UK, Xylem offers five market leading brands that primarily serve the municipal and industrial markets with regard to the movement and treatment of clean water and wastewater. The Flygt, Godwin, Leopold, Sanitaire and Wedeco brands are all market leaders, each investing heavily in research and development to bring you highly efficient and effective products.

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Case Story - Abberton Reservoir

ABBERTON RESERVOIR – KEEPING THE WATER PUMPING

When major refurbishment works were outlined for Abberton Reservoir near Colchester, a solution was needed to keep the region's water supply pumping whilst the existing pumping station was demolished and rebuilt. Xylem's Rental Services devised the perfect temporary pumping solution.

Abberton Reservoir, situated on the outskirts of Colchester in the scenic Essex countryside, is a large freshwater reservoir covering over 660 hectares. The reservoir is owned and operated by Essex & Suffolk Water (ESW), part of Northumbrian Water Group, and plays a strategic role in supplying drinking water to 1.5 million people in Essex.

Water stored in Abberton Reservoir is pumped 2km to Layer de-la-Haye Water Treatment Works where it is treated and then distributed to ESW's customers in Essex and parts of East London. During the 1990s it became clear that the predicted population rise in these regions would substantially increase the future demand for water and as a result, ESW needed to look at viable options to sustainably increase the volume of water stored.

The most sustainable option was to enlarge the capacity of Abberton Reservoir. Therefore, ESW decided to proceed with a £150million investment to ensure Abberton Reservoir could not only capture and store an increased volume of water to help ease demand pressures, but also to provide a secure supply of water for many years into the future.

The Abberton Reservoir expansion incorporated a number of projects including raising the height of the main dam by 3.2m, building four new smaller dams around the perimeter of the reservoir, raising the B1026 causeway and moving the highway to accommodate the new reservoir footprint and the construction or refurbishment of a number of pumping stations.

In addition, the expansion work also included the huge task of demolishing and reconstructing the main pumping station, which is responsible for pumping the water to the local treatment works.

To enable this to be done, a new temporary pumping station was built alongside the existing station, to enable the continued pumping of water from the reservoir. This allowed contractors to demolish the original pumping station and build a completely new, raised pumping station, upon the footprint of the original.

Construction of the temporary station gave rise to a number of challenges. It had only one draw-off level and, should there have been a drought, the available water could have been below that of the station. Furthermore, its location adjacent the reservoir bank made it more susceptible to high turbidity and water quality issues.

Rental experts from Xylem have a proven track record of devising innovative solutions to temporary pumping challenges. Xylem's rental engineers devised a plan to build a purpose built, floating pontoon, which would house their Flygt submersible pumps and be positioned in the centre of the reservoir to draw the best quality water available at any level, with minimal silt content. The pontoon would be guided out into the centre of the reservoir and then anchored down on each corner, to ensure it remained in prime position on the water.



Xylem Rental installed four Flygt NS3301 pumps within the floating pontoon, three of the Flygt pumps were for regular pumping duty with the fourth installed as a standby pump for periods of heavier pumping requirements.

Over 300 metres of heavy duty pipework was also installed to connect the pontoon to the temporary pumping station, with Flygt variable frequency drives installed in the station, to ensure optimal running of the pumps and the most efficient pumping possible. The rental solution from Xylem meant that the main pumping station could be decommissioned and work could begin on this significant part of the expansion works.

The new Abberton Pumping Station is now fully operational and the expansion project has been a huge success. The level of the reservoir has been raised by a total of three metres, which will eventually lead to a sixty per cent increase in the overall capacity of the reservoir.

Mick Boyle, Rental Manager at Xylem Water Solutions, commented: "The project at Abberton Reservoir has been a huge success. The installation Xylem provided enabled ESW to continue to supply water to their supply region as usual and highlighted our ability to design bespoke temporary dewatering systems and ensure that our customers achieved the end result they desired."

Kevin Packard, Acceptance Engineer at ESW, commented: "We were delighted with Xylem's innovative approach to our pumping needs during this project. The bespoke solution meant that we could continue to supply the best quality water to our customers while the new pumping station was being built".

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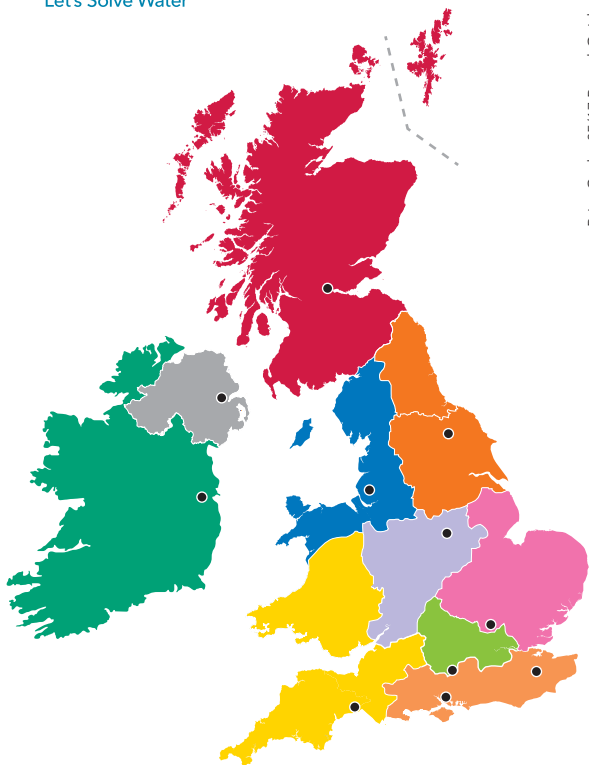
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