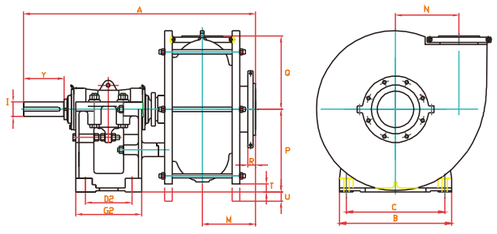
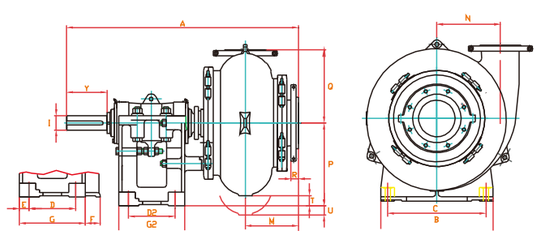
OUTLINE DIMENSION



(WG/WGH)



(WGHP)

Pump Model	A	B	C	D	E	F	G	D_2	G_2	Y	I	M	N	P	Q	R	T	U	Weight(kg)
6×4D-WG	1006	492	432	213	38	75	289	–	–	164	65	203	260	330	343	33	16	–	460
8×6E-WG	1286	622	546	257	54	83	365	–	–	222	80	295	352	457	405	29	54	–	1120
10×8F-WG	1591	857	762	349	45	45	540	–	–	281	100	330	416	610	533	48	60	–	2250
10×8S-WG	1720	920	760	–	–	–	–	640	780	280	120	330	416	450	533	48	–	102	2285
12×10G-WG	2010	1207	851	–	–	–	–	749	876	356	140	368	522	851	665	48	238	–	4450
14×12G-WG	2096	1207	851	–	–	–	–	749	876	356	140	424	610	851	787	48	121	–	5400
18×16T-WG	2320	1150	900	–	–	–	–	880	1041	350	150	431	692	650	914	58	–	274	11370
20×18H-WG	2775	1397	1194	–	–	–	–	921	1124	408	180	558	914	1067	1067	57	42	–	15670
24×20H-WG	2827	1397	1194	–	–	–	–	921	1124	408	180	591	1029	1067	1245	57	–	117	18730
28× 24H-WG	2845	1397	1194	–	–	–	–	921	1124	408	180	600	1219	1067	1372	64	–	411	22388
8×6S-WGH	1725	920	760	–	–	–	–	640	780	280	120	301	400	450	548	43	–	50	2450
8×6S-WGHP																		155	3460
10×8S-WGH	1774	920	760	–	–	–	–	640	780	280	120	330	475	450	620	48	–	206	3188
10×8S-WGHP																		295	4689
12×10G-WGH	2062	1219	851	–	–	–	–	749	876	356	140	400	605	851	800	60	40	–	4638
12×10G-WGHP																	–	55	6710
16×14TU-WGH	2367	1460	1200	–	–	–	–	860	1050	350	150	448	765	900	1008	72	–	120	12247
16×14TU-WGHP																		230	14394

All dimensions are in millimeter(mm)

HEBEI TIIEC MACHINERY CO.,LTD.

Head Office
Hebei TIIEC Machinery Co.,Ltd
Tel: (+86)-311 85832151
E-mail: marketing@atlas-pump.com
Add: No.201 Taihang Street, Hi-Tech Zone, Shijiazhuang Hebei,China

Peru
Atlas Equipment Peru S.A.C
Tel:(+51)-1-2334803
E-mail: marketing@atlas-pump.com
Add: Huachipa,Peru

Australia
Atlas Equipment Australia Pty Ltd
Tel: (+61)488 001 924
E-mail: marketing@atlas-pump.com.au
Add: No.7 Contest Link Road, Henderson, WA 6166

South Africa
Atlas Equipment SA(Pty) Ltd
Tel: (+27)011 825-7777
E-mail: sales@atlas-pump.co.za
Add: 38 Jansen Road,14 Innes Park Jetpark Boksburg,South Africa

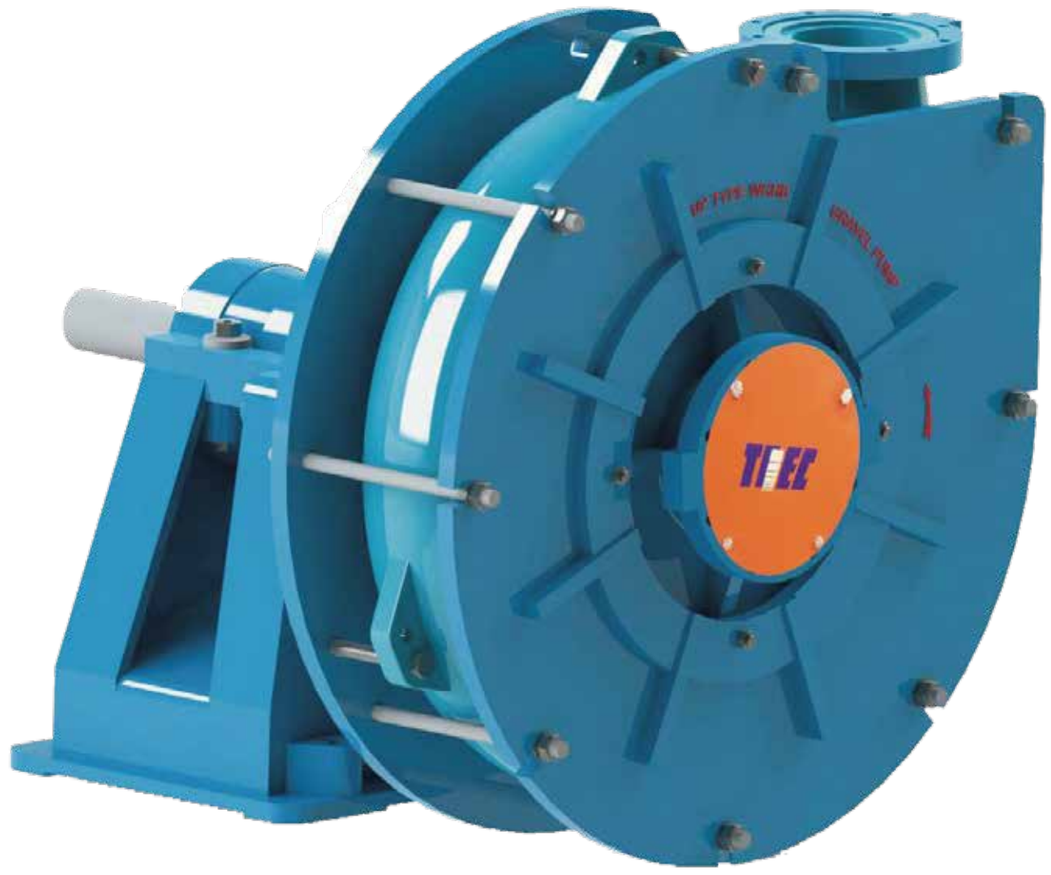
www.tiiec.com

TIEC GROUP | INDUX® ATLAS

WG(H)

Gravel Pump

Mining | Coal | Metallurgy | Dredging



WG(H) GRAVEL & DREDGE PUMP

WG(H) pumps are designed for continuous pumping of highly abrasive slurries that containing large particles which other pumps can not handle. Large passage inside casing make it the best choice for gravel, dredging and other applications where large particles need to be handled, especially for big flow, high concentration, high head media. Low NPSH requirement and robust design ensures long life under severe duties.

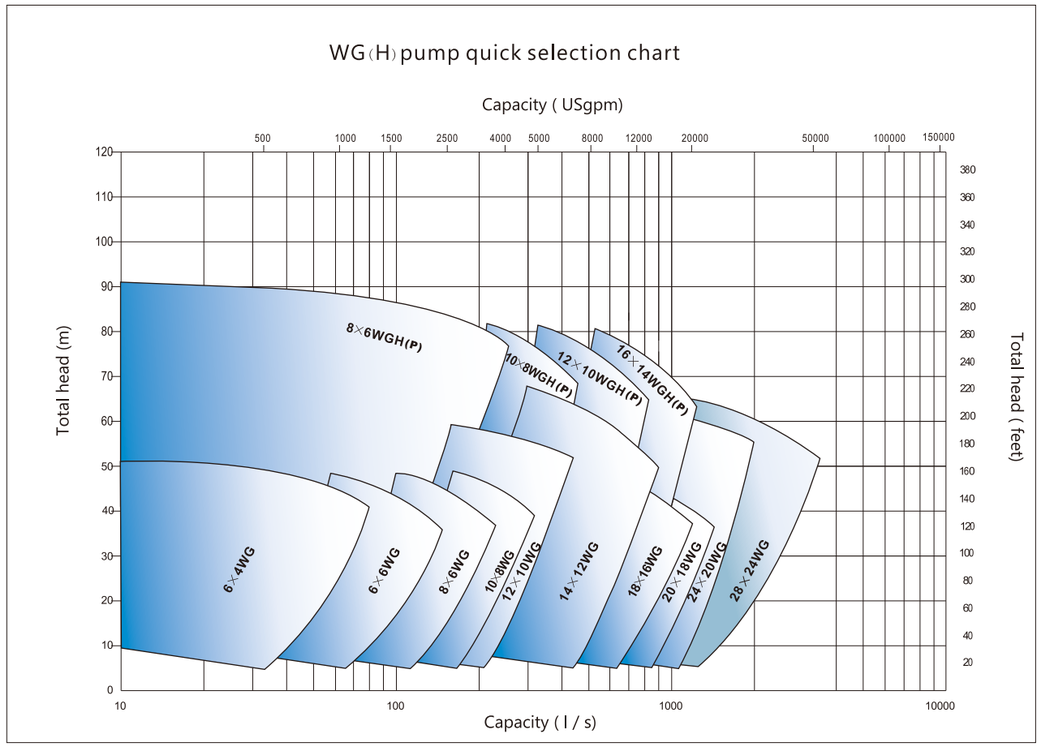
Model Description

14 X 12 G - WG(H)(P)

- WG(H)(P): WG means Gravel pump; WGH means high head Gravel pump; WGHP means high head high pressure Gravel pump
- G: Frame Code
- 12: Discharge size (in)
- 14: Suction size (in)

- Pump Range：4″~ 24″
- Capacity to：9500m³/hr
- Head to：78m

QUICK SELECTING CHART



TYPICAL APPLICATIONS

Usage of versatile wear-resistant and corrosion-resistant materials allows WG Series slurry pumps in operate various industries, help to reduce operation cost and downtime. Applicable especially in slag delivery, dredging and coal washing.

Metallurgy

Large passage, excellent anti-cavitations performance, diverse wear-resistance material options plus lower turning speed, enhanced shaft design together with rigid bearing make WG(H) pumps are for slag delivery in metallurgy applications.

Dredge

Large passage, excellent anti-cavitations performance, discharge pipe's 360°fitting position make WG(H) pumps very popular in gravel and dredging applications.

Tunnel Construction

Could be used as earth removal pumps along with Tunnel Boring Machine to pump earth and rocks out of tunnel construction site.
The large passage is capable of conveying large sized rocks, and the excellent performed wear resistance material could handle heavy abrasion of the high speed rocks.

Coal Washing

In the process of coal washing, WG(H) pumps are widely used for delivering lump coal because its wide passage, rigid casing to deal with high pressure.

All rights reserved. all the intellectual property are copyrighted by TIIEC Group.

STRUCTURE & FEATURES

Wide Passage

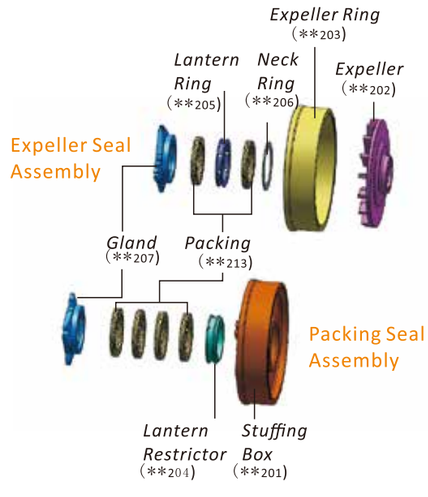
Single casing, wide passage allow handling extraordinarily large particles, realize good anti-cavitation and anti-abrasion performance

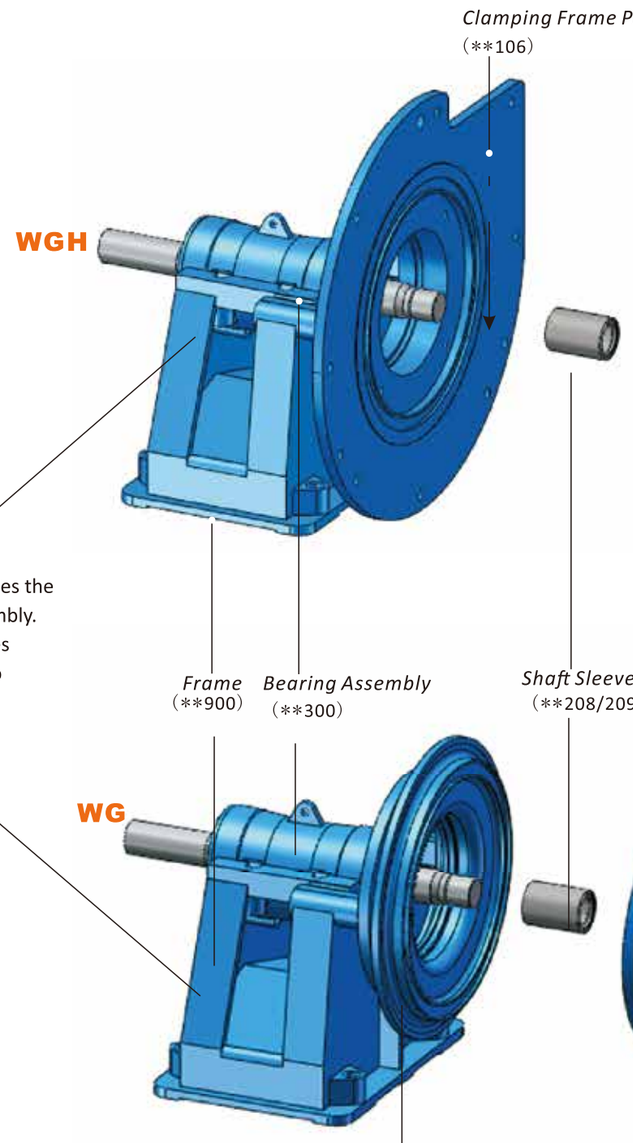
Wet Parts

Casing, impeller, back liner and door are made of high-chrome abrasive resistance metal ensures long life

Shaft Seal

Gland seal / Expeller seal / Mechanical seal are optional.





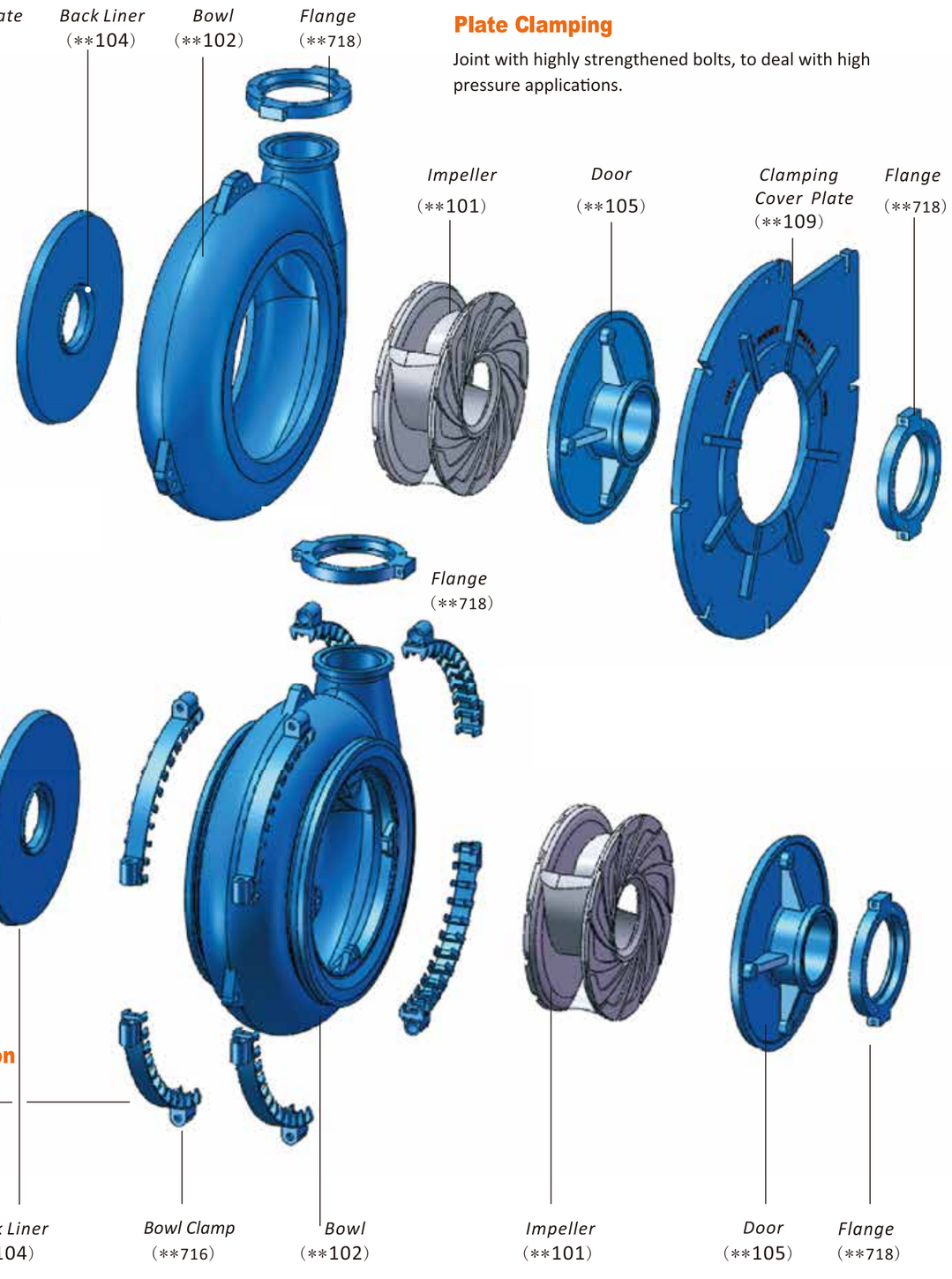
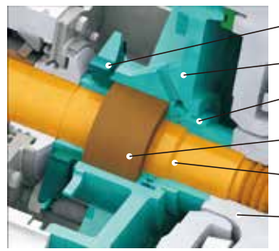


Plate Clamping

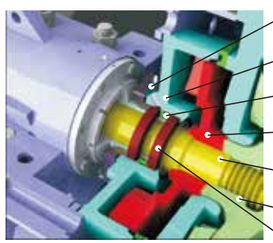
Joint with highly strengthened bolts, to deal with high pressure applications.

All rights reserved. all the intellectual property are copyrighted by TIIEC Group.

SHAFT SEALS



Packing Seal



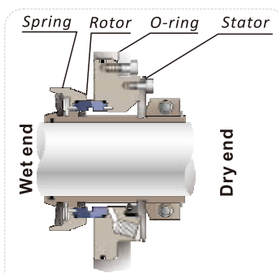
Expeller Seal

For more details, please consult TIIEC

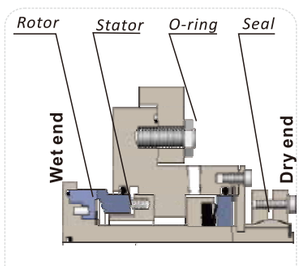
Packing Seal – Most popular type of seal. Clean water at a certain pressure being injected into the packing through the lantern restrictor, preventing leakage from casing. Simple structure, easy to maintenance and low cost.

Expeller Seal – The expeller generate a reverse centrifugal force to prevent the leakage. It can be used for single-stage pump or the first pump of multiple pumps in series when the positive pressure at suction side is larger than that at discharge side by no more than 10%. No gland water is needed.

Mechanical Seal – Suitable for applications where no extra substance is allowed to mix with the fluid being pumped, such as chemical or food industry.



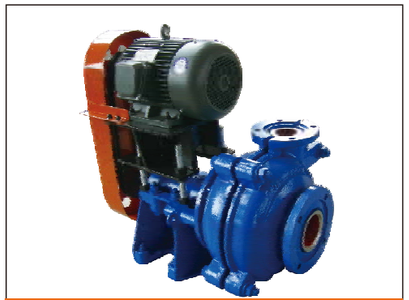
Flushless mechanical seal



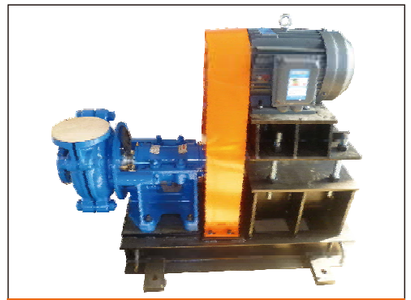
Water flush mechanical seal

Water flush seals are preferential unless field condition are inapplicable

DRIVE ARRANGEMENTS



CV



ZV(Z)

CR(Z)/CL(Z)

DC(Z)

CLEAR WATER PERFORMANCE

Model	Max.Motor Power Kw	Capacity Q(m^3/h)	Head H(m)	Pump Speed n(r/min)	Eff. η%	NPSH (m)	Max.Partical Size (mm)
6×4D-WG	60	300	45	1400	58	4	82
8×6E-WG	120	500	37	1400	60	3.5	127
10×8F-WG	260	950	43	1000	65	8	178
10×8S-WG	560	950	43	1000	65	8	178
12×10G-WG	600	1530	52	850	65	9	220
14×12G-WG	600	1700	65	700	73	5	241
18×16T-WG	1200	3300	40	500	72	6.3	254
20×18H-WG	1400	4300	39	400	66	8	330
24×20H-WG	1400	5600	57	400	70	7	380
28 X24H-WG	2000	9500	58	325	85	9	380
8×6S-WGH	560	880	78	1100	71	4.8	140
10×8S-WGH	560	1300	70	950	72	5	180
12×10G-WGH	600	2220	67	700	73	8.2	210
16×14TU-WGH	1200	3050	59	500	72	6.5	230

MATERIAL OPTIONS

Hard Metals

Material Code	Material Description	Performance Comparison: Hardness HRC	Anti-Brush	PH Value (3 7 12)	Max. Particle Size	Applicable Parts: Impeller	Applicable Parts: Liner	Applications
AT01	Medium-Cr Martensitic White Iron	⩾55	0.9			●	●	Mud & slag applications.
AT03	Ni-Martensitic White Iron	⩾56	0.8			●	●	Neutral water-sand slurry or lower impact load.
AT05	27% Cr White Iron	⩾56	1.0 (Datum)			●	●	High impact load abrasion PH rate ranging from 5 to 12.
AT07	Chromium/Molybdenum	⩾58	1.2			●	●	High impact load abrasion.
AT08	27% Cr White Iron	⩾56	1.0			●	●	Same as AT05, suit for thick wall parts.
AT11	Low Alloy With Iron	38-42	0.7			●	●	Fine particles ,light abrasion.
AT12	30% Cr Hyper eutectic Chromium White Iron	⩾62	1.5			●		Highly abrasive ,fine particles.
AT33	33% Cr Erosions & Corrosion Resistence White Iron	⩾43	0.7			●	●	Acidic slurries like Phosphoric.
AT49	28% Cr Low Carbon White Iron	⩾45	0.7			●	●	FGD process in power plant
AT530	Super high-Cr White Iron	63-68	1.8			●		Severe abrasive ,fine particles.

All rights reserved. all the intellectual property are copyrighted by TIIEC Group.