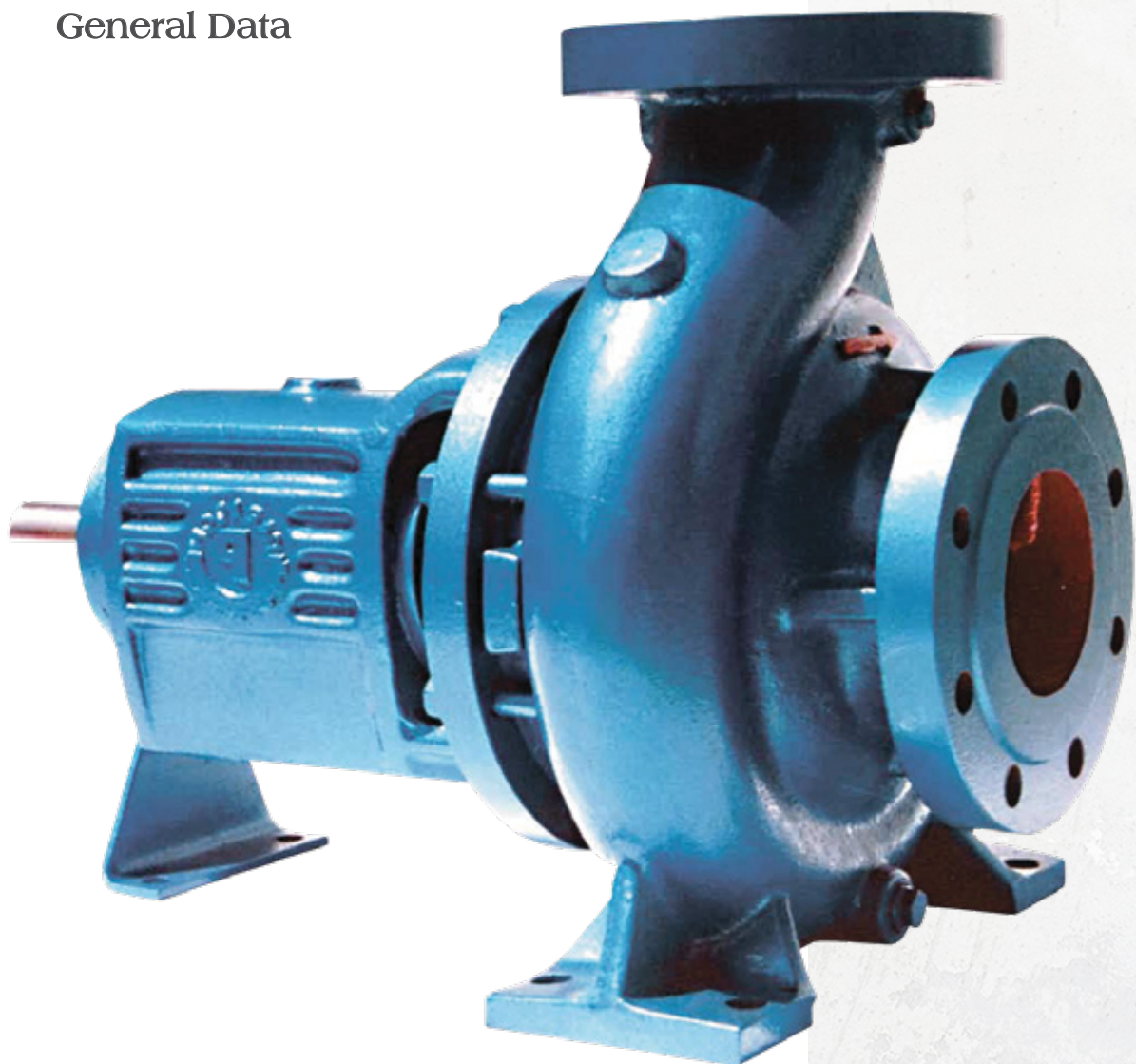


PARAGON PUMPS

SINGLE STAGE
BACK PULL-OUT END-SUCTION
CENTRIFUGAL PUMP:
PA & PA High Efficiency
General Data

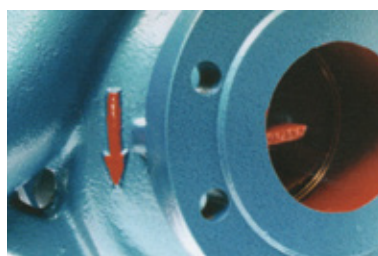


FEATURES AND BENEFITS

The Paragon
PA Series pumps
meet the
DIN 24255
specification
for end suction,
horizontal
centrifugal pumps.

PARAGON PUMP Company was founded by a dedicated pump professional with over 55 years of worldwide experience. The company's goal is to provide high quality products at extreme competitive prices supported by the best customer service in the industry.

To assure high quality, performance and reliability, Paragon Pumps are manufactured to international standards in facilities with **ISO 9001, Singapore Green Building Product (SGBP) Green Mark Certification**. Paragon Pump backs up its commitment to quality with a full one-year (12 months) warranty.



PA SERIES

The PA Series offers many features and benefits that improve performance, increase reliability and reduce maintenance time and cost.

- Heavy-duty cast iron casing with integral cast feet suitable for 10 bar working pressure. Also available for working pressures up to 16 bar. Centreline discharge ensures that the casing is self-venting.

- Flanges to ISO 2501 PN16 as standard. Also available with ANSI 125# or JIS 10k drilling.
- Back pull out design for fast and easy maintenance when fitted with a spacer type coupling because suction and discharge piping and drive motor remain in place.
- Maximum interchangeability for low spare parts inventory with four bearing frames and four shaft sizes for 50 sizes of pumps.
- Replaceable wear rings to assure optimum efficiency and performance at all times.
- Shaft seal is available as packing or as mechanical seal to suit all types of applications.
- Double shrouded, hydraulically balances impellers with back vanes to minimize gland pressure in cast iron or bronze as standard. Also available in stainless steel or zinc free bronze.
- Heavy-duty cast iron bearing housing with sealed greased ball bearings as standard. Also available with greased & oil lubricated bearings.
- Heavy-duty shaft in stainless steel for longer life and to assure product purity.
- Stainless steel shaft sleeve for product purity, longer mechanical seal life and to prevent damage to the shaft from packing or the mechanical seal.
- Operating temperature from -10°C to 105°C as standard. Available for up to 160°C with cooling and suitable mechanical seal selection.
- Suitable for both 50 cycle and 60 cycle speeds up to 3500rpm.





TECHNICAL INFORMATION

Design : DIN 24255

Operating Pressure :
1000 kpa standard
1600 kpa optional

Hydrostatic Test Pressure :
1500 kpa standard
2400 kpa optional

Operation Temperature :
-10°C to 105°C standard
160°C optional

Operation Speeds :
50 Hz, 1450 & 2900 rpm
60 Hz, 1750 & 3500 rpm

APPLICATIONS

PARAGON PA Series pumps can be used for the following services in the Commercial, Residential, Agricultural, Industrial, Process, Petroleum and Food & Beverage industries.

- Air Conditioning
- Fire Protection
- Plumbing
- Circulating
- Transfer
- Pressure Boosting
- Cooling Towers
- Irrigation
- Water Treatment & Supply
- Oil & Gas

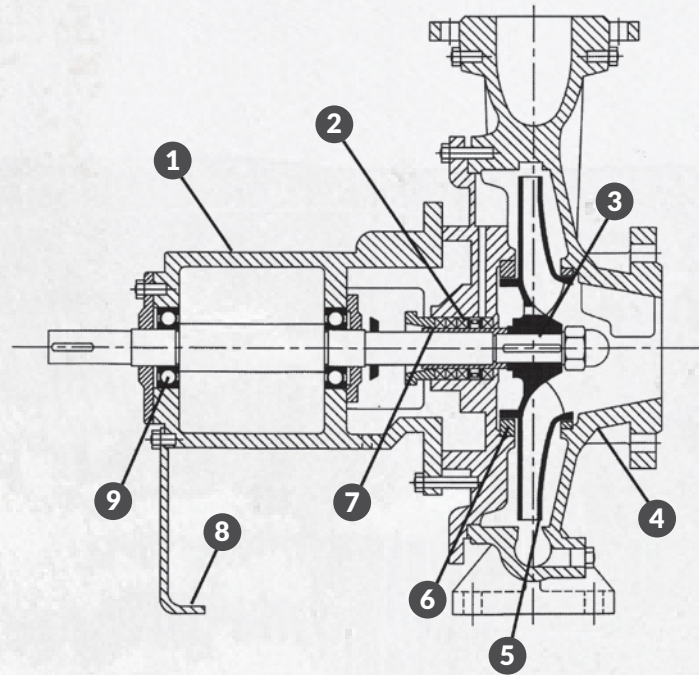


MATERIALS OF CONSTRUCTION

	PA High Efficiency		PA				
	CAST IRON PUMP		CAST IRON PUMP			STAINLESS STEEL PUMP	
Casing	Cast Iron	Cast Iron	Cast Iron	Cast Iron	Cast Iron	304SS	316SS
Impeller	Bronze	Cast Iron	Bronze	304SS	Cast Iron		
Wear Ring	NA	NA	Cast Iron	Cast Iron	Cast Iron		
Shaft	420SS	420SS	420SS	420SS	420SS		
Shaft Sleeve	420SS	420SS	420SS	420SS	420SS		
Gland	NA	NA	Ductile Iron	Ductile Iron	Ductile Iron		
Mech Seal	Carbon Sic - EPDM		Carbon Sic - Viton				

INTERNATIONAL STANDARD

PA SERIES fully complies to both performance and dimensional standards for the International Standard DIN 24255



1. BEARING HOUSING

Rugged cast iron construction with four bearing housing covering the complete range of fifty pumps for maximum interchangeability.

2. STUFFING BOX

Standard stuffing box includes gland packing and lantern ring with internal flushing or single mechanical seal with internal or external flush.

3. SHAFT

One piece stainless steel shaft in four sizes covering the complete range of fifty pumps for maximum interchangeability.

4. CASING

The cast iron volute casing is heavy duty design with integrally cast feet, vertical top centreline discharge and axial suction nozzle with cast inlet vane to improve flow into the impeller and reduce required NPSH.

5. IMPELLER

Double shrouded type, hydraulically balanced (ISO 1940/G6.3) and positive drive shaft key and domed impeller lock nut.

6. WEAR RINGS

Replaceable wear rings are standard on all casings for PA only and on rear covers for larger pumps which assures hydraulic performance and reduces maintenance time and cost.

7. SHAFT SLEEVE

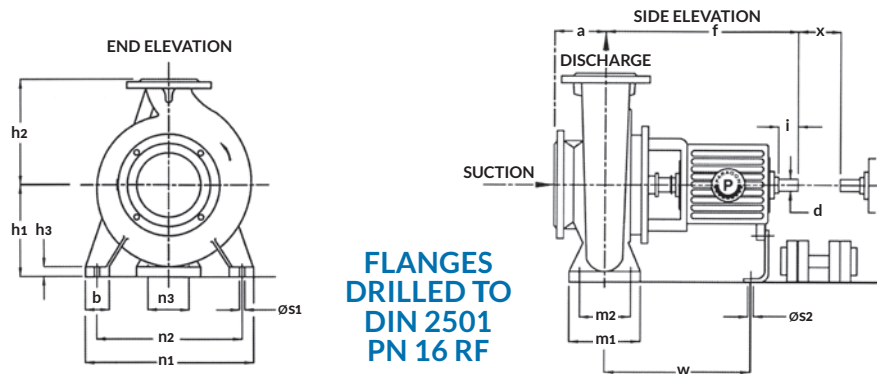
Replaceable fully machined, positively driven, hook type stainless steel shaft sleeve prevents damage to the shaft from gland packing or mechanical seal and reduces maintenance cost.

8. SUPPORT FOOT

Removable and adjustable support foot provides added rigidity and ease of maintenance.

9. BEARINGS

All pumps come with sealed grease lubricated ball bearings as standard. Greased bearings or oil lubricated bearing also available.

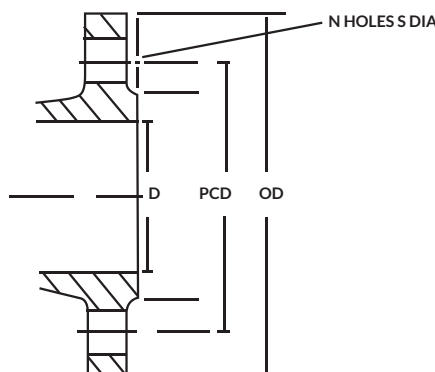


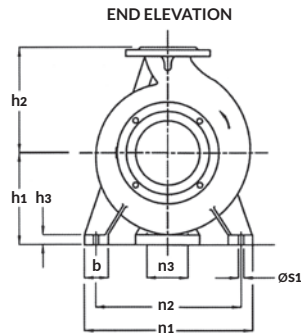
PA

PUMP SIZE	BEARING HOUSING	SUCTION	DISCHARGE	PUMP DIMENSIONS																SHAFT END		COUPLING KEY	NET WEIGHT
				a	f	h1	h2	b	m1	m2	n1	n2	n3	h3	øS1	øS2	w	x	d	i			
32-13	25	50	32	80	360	112	140	50	100	70	190	140	100	14	14	14	267	140	24	50	8x7	28	
32-16	25A	50	32	80	360	132	160	50	100	70	240	190	100	14	14	14	267	140	24	50	8x7	36	
32-20	25	50	32	80	360	160	180	50	100	70	240	190	110	14	14	14	267	140	24	50	8x7	43	
32-26	25A	50	32	100	360	180	225	65	125	95	320	250	110	14	14	14	267	140	24	50	8x7	63	
40-13	25	65	40	80	360	112	140	50	100	70	210	160	100	14	14	14	267	140	24	50	8x7	31	
40-16	25A	65	40	80	360	132	160	50	100	70	240	190	100	14	14	14	267	140	24	50	8x7	37	
40-20	25	65	40	100	360	160	180	50	100	70	265	212	110	14	14	14	267	140	24	50	8x7	46	
40-26	25A	65	40	100	360	180	225	65	125	95	320	250	110	14	14	14	267	140	24	50	8x7	63	
40-32	35	65	40	125	470	200	250	65	125	95	345	280	110	14	14	14	342	140	32	80	10x8	96	
40-32G	45	65	40	125	526	200	250	65	125	95	345	280	110	14	14	14	367	140	42	110	12x8	96	
50-13	25	65	50	100	360	132	160	50	100	70	240	190	100	14	14	14	267	140	24	50	8x7	34	
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80-32G	45	100	80	125	526	250	315	80	160	120	400	315	110	16	18	14	367	140	42	110	12x8	120	
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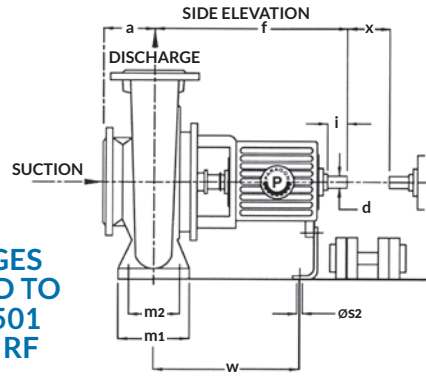
Dimensions in mm

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50	165	4	18	125
65	185	4	18	145
80	200	8	18	160
100	220	8	18	180
125	250	8	18	210
150	285	8	22	240
200	340	12	22	295
250	405	12	26	355
300	460	12	26	410
350	520	16	26	470
400	580	16	30	525





**FLANGES
DRILLED TO
DIN 2501
PN 16 RF**

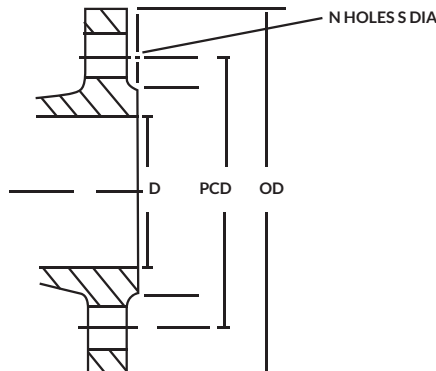


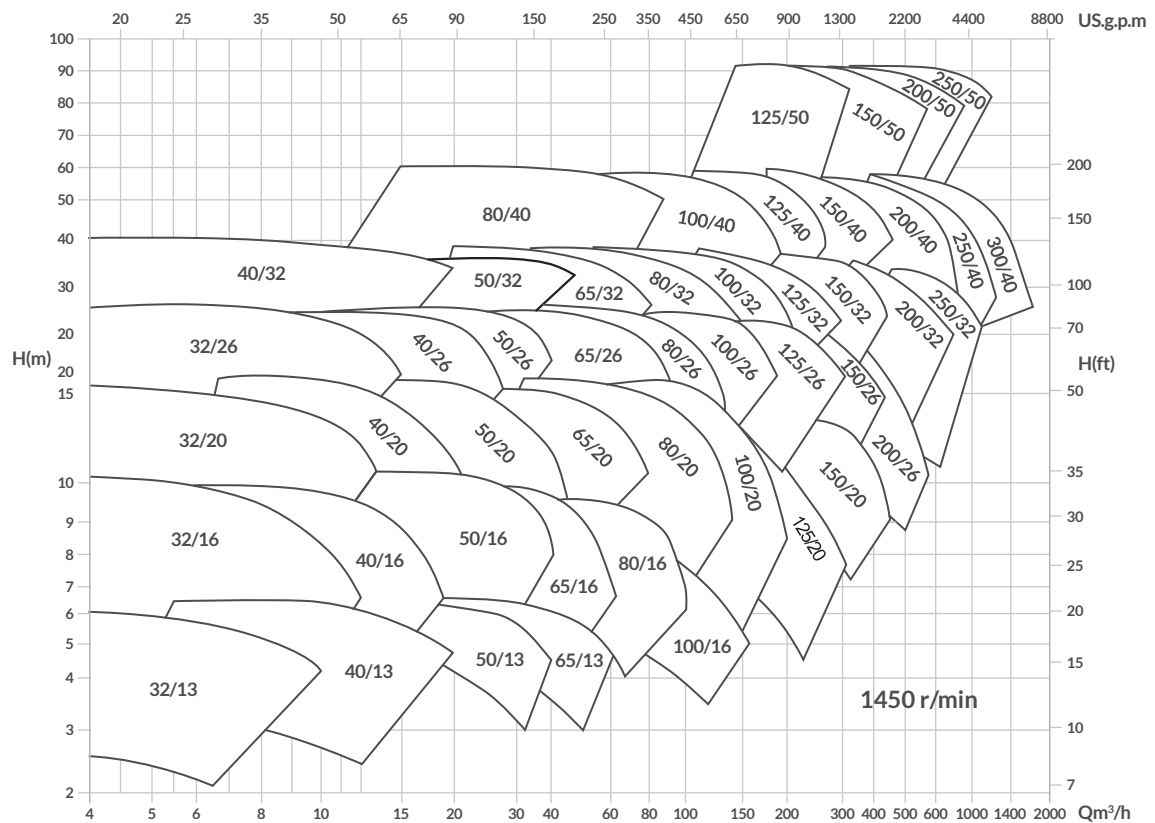
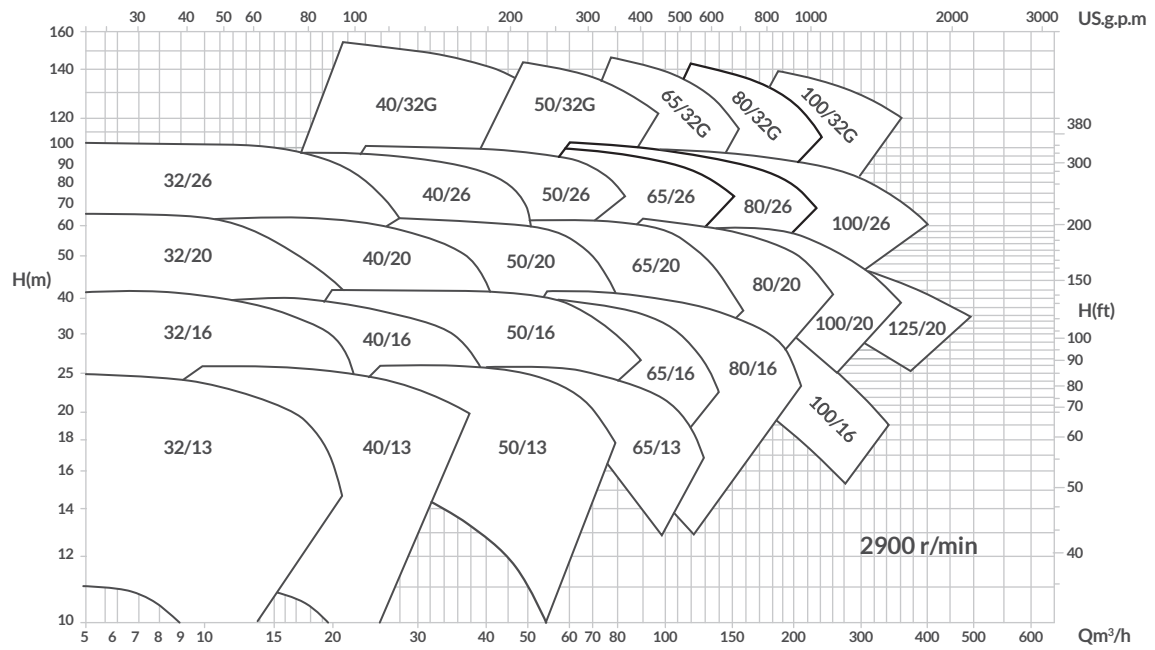
PA High Efficiency

PUMP SIZE	BEARING HOUSING	SUCTION	DISCHARGE	PUMP DIMENSIONS																		SHAFT END		COUPLING KEY	NET WEIGHT
				a	f	h1	h2	b	m1	m2	n1	n2	n3	h3	øS1	øS2	w	x	d	i					
32-13	25	50	32	80	360	112	140	50	100	70	190	140	100	14	14	14	267	140	24	50	8x7	28			
32-16	25	50	32	80	360	132	160	50	100	70	240	190	100	14	14	14	267	140	24	50	8x7	36			
32-20	25	50	32	80	360	160	180	50	100	70	240	190	110	14	14	14	267	140	24	50	8x7	43			
32-26	25	50	32	100	360	180	225	65	125	95	320	250	110	14	14	14	267	140	24	50	8x7	63			
40-13	25	65	40	80	360	112	140	50	100	70	210	160	100	14	14	14	267	140	24	50	8x7	31			
40-16	25	65	40	80	360	132	160	50	100	70	240	190	100	14	14	14	267	140	24	50	8x7	37			
40-20	25	65	40	100	360	160	180	50	100	70	265	212	110	14	14	14	267	140	24	50	8x7	46			
40-26	25	65	40	100	360	180	225	65	125	95	320	250	110	14	14	14	267	140	24	50	8x7	63			
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50-13	25	65	50	100	360	132	160	50	100	70	240	190	100	14	14	14	267	140	24	50	8x7	34			
50-16	25	65	50	100	360	160	180	50	100	70	265	212	110	14	14	14	267	140	24	50	8x7	38			
50-20	25	65	50	100	360	160	200	50	100	70	265	212	110	14	14	14	267	140	24	50	8x7	48			
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50-32	25	65	50	125	360	225	280	65	125	95	345	280	110	18	14	14	342	140	24	50	10x8	105			
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300-40	65	350	300	300	720	425	670	120	250	190	760	660	140	30	30	19	515	140	60	140	18X10	550			

Dimensions in mm

D	OD	N	S	PCD
32	140	4	18	100
40	150	4	18	110
50	165	4	18	125
65	185	4	18	145
80	200	8	18	160
100	220	8	18	180
125	250	8	18	210
150	285	8	22	240
200	340	12	22	295
250	405	12	26	355
300	460	12	26	410
350	520	16	26	470
400	580	16	30	525





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Valiant Industrial Building, Singapore 349312

Tel : 6841 2818 Website: www.paragonpumpasia.com