



Magnetic Drive Pump

APPLICATION

Alkali and caustic chemical pumping.
For use in the industrial, firefighting, and building construction industries.
Oils for heat transfer
Fluid circulation of radioactive, toxic, and acidic liquids.
Recycling and waste management.



FEATURES

Specific magnets were used for long-lasting pumps.
Pumps manufactured in accordance with DIN/EN/ISO Performance standards.
Superior silicone grease must be used to prevent stuck incidents between all mating parts.
Designed to protect against overloading.
Quick disassemble and reassemble.

BENEFITS

It has been designed to be compact in order to take up less space.
The level of vibration and noise should be negligible.
Magnet power provides precise efficiency with minimal slippage.
During the dispatch process, least manpower was used.
All rotating components are connected by a common shaft.





SPECIFICATIONS :

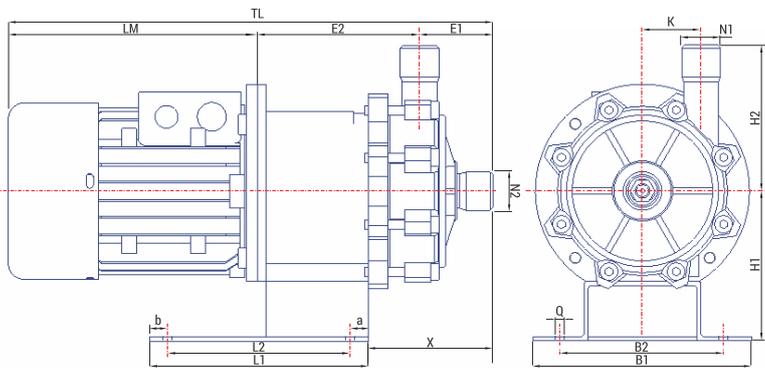
Flow upto	:	max. 165 lpm or max. 43.7 US gpm
Head upto	:	max. 19 m or 62 ft
Max. Motor power	:	0.75 kW or 1 HP
Magnets	:	Ferrite/Rare Earth/Specially Designed
Temperature Range	:	-35°C to +200°C
Impeller Type	:	Semi Open
Drive	:	Close Couple
Flange Type	:	Threaded BSP
Material Grade	:	SS304, SS316, SS316L, Hastelloy, Cast Iron and Duplex.

Higher capacity available on request

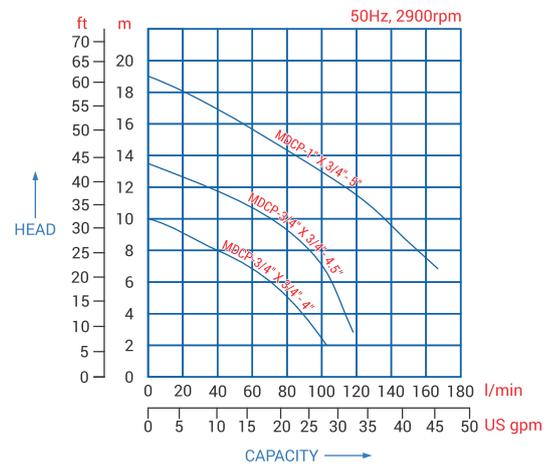
TECHNICAL DATA TABLE :

PUMP MODEL	BORE		MAX CAPACITY	MAX HEAD	MOTOR	PUMP WEIGHT
	SUCTION	DISCHARGE				
	mm	mm	l/min	m	kW/HP	kg
MDCP-3/4" X 3/4"- 4"	20	20	102	10	0.37/0.5	18
MDCP-3/4" X 3/4"- 4.5"	20	20	125	13.5	0.55/0.75	20
MDCP-1" X 3/4"- 5"	25	20	165	19	0.75/1	31

GENERAL ASSEMBLY DRAWING:



PERFORMANCE CHART :



DIMENSION TABLE : (All dimensions are in mm)

PUMP MODEL	E1	E2	H1	H2	LM	TL	X	K	L1	L2	a	b	B1	B1	Q	N1	N2
MDCP - 3/4" X 3/4"- 4"	50	112	100	100	210	372	77	40	150	118	16	16	150	120	10X4 NOS.	R-3/4" BSP	R-3/4" BSP
MDCP - 3/4" X 3/4"- 4.5"	50	112	100	100	210	372	77	50	150	118	16	16	150	120	10X4 NOS.	R-3/4" BSP	R-3/4" BSP
MDCP - 1" X 3/4"- 5"	60	113	100	100	230	403	87	45	150	118	16	16	150	120	10X4 NOS.	R-3/4" BSP	R-1" BSP



SEAL LESS MAGNETIC DRIVE PROCESS PUMPS





FEATURES & BENEFITS

Features :

- Single stage Horizontal Centrifugal pump
- Pumps designed according to DIN EN ISO 2858
- Specially developed Magnets for longer life
- Double bearing cartridge design for better performance
- Hydraulically balanced impeller for minimum bearing loads
- Simple modular construction for ease of maintenance
- Back pullout design to facilitate inspection and maintenance
- High level of durability and reliability
- Optional dry run relay available
- Options for leak detection are available that eliminate any leakage to environment



Benefits :

- As harmful or risky liquids, exotic liquids, acids, alkalis, corrosives, contaminants and toxics are pumped, magnetic drive pumps are commonly utilized.
- Ideal for ultra-pure liquids and liquids that are difficult to seal.
- To prevent hazardous liquids from leaking to the surroundings, sealed pumps used in these types of services can leak over time or require complicated, costly double seals, which can result in safety hazards, downtime and increased maintenance requirements.
- Very much suitable to liquids which crystallize on mechanical seal faces and causes seal failure. To avoid this flush system is used which increases cost of maintenance, energy consumption and seal flushing liquids.
- As there is no Mechanical seal, it improves pump performance, reliability and availability of pump.
- Removing the seals also prevents the friction loss, wear, costs and noise.
- The magnetic coupling will soften any shock or spike torques. Even in extreme situations, it will act as a fuse.
- Since the pump chamber is totally isolated from the electric motor by a wide air gap, there is virtually no heat transfer from the electric motor.

**SPECIFICATIONS & TECHNICAL DATA TABLE****MMPC Series
SS Magnetic Drive Process Pump (Close Coupled)****Specifications**

Flow upto	:	max. 100 m ³ /h
Head upto	:	max. 100 m
Max. Motor power	:	30 HP
Temperature Range	:	-35°C to +250°C
Max. Working Pressure	:	PN16 / PN25
Max. Kinematic Viscosity	:	0.5 to 350 mm ² /s
Solid Handling Range	:	5% hard Solids and 150 microns diameter
Flange Class	:	Class 150 / Class 300
Drive	:	Close Couple
Impeller Type	:	Close
Magnets	:	Ferrite/Rare Earth/Specially Designed

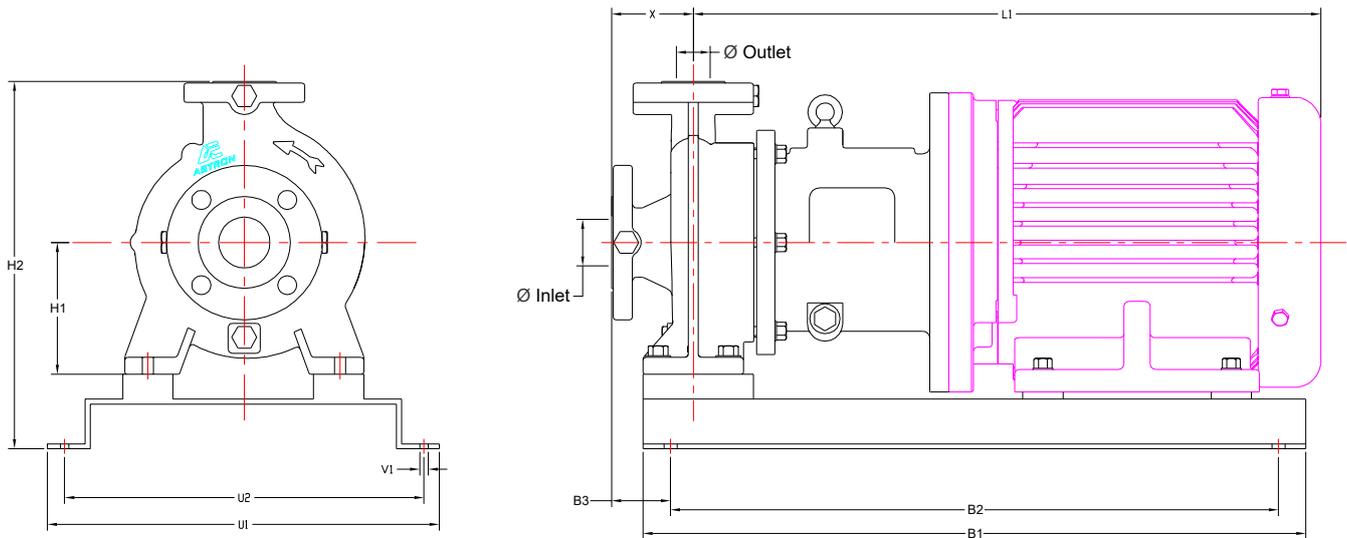
**Technical Data Table**

Pump Model	2 POLE (2900 RP M)			4 POLE (1450 RPM)		
	Nominal Duty Point		Motor	Nominal Duty Point		Motor
	Q m ³ /h	H m	hp / kw	Q m ³ /h	H m	hp/kw
MMPC 25 x 25-125	4	20	1/0.75	2	5	0.25/0.18
MMPC 32 x 25-125	5	20	1.5/1.1	3	5	0.25/0.18
MMPC 50 x 32-125	12.5	20	3/2.2 - 5/3.7	6.3	5	0.5/0.37
MMPC 65 x 40-125	25	20	5/3.7 - 7.5/5.5	12.5	5	1/0.75
MMPC 80 x 50-125	50	20	7.5/5.5 - 10/7.5	25	5	1.5/1.1
MMPC 32 x 25-150	5	30	2/1.5	3	10	0.5/0.37
MMPC 50 x 32-160	12.5	32	5/3.7 - 7.5/5.5	6.3	8	1/0.75
MMPC 65 x 40-160	25	32	7.5/5.5 - 10/7.5	12.5	8	1.5/1.1
MMPC 80 x 50-160	50	32	12.5/9.3 - 15/11	25	8	2/1.5
MMPC 50 x 32-200	12.5	50	10/7.5 - 12.5/9.3	6.3	12.5	1.5/1.1
MMPC 65 x 40-200	25	50	12.5/9.3 - 15/11	12.5	12.5	2/1.5
MMPC 80 x 50-200	50	50	20/15 - 30/22.5	25	12.5	4/3
MMPC 50 x 32-250	12.5	80	15/11 - 20/15	6.3	20	3/2.2
MMPC 65 x 40-250	25	80	20/15 - 30/22.5	12.5	20	4/3



G. A. DRAWING & DIMENSION TABLE

General Assembly Drawing



Dimension Table

Pump Model	Size Description			Dimension In Millimetres									
	Ø Inlet mm	Ø Outlet mm	Impeller (nominal) mm	Pump				Support					
				X	L1	H1	H2	B1	B2	B3	U1	U2	V1
MMPC 25 x 25-125	25	25	125	82	425	112	340	465	405	62	300	270	Ø16
MMPC 32 x 25-125	32	25	125	82	475	112	340	465	405	62	300	270	Ø16
MMPC 50 x 32-125	50	32	125	80	665	112	338	604	554	46	338	308	Ø16
MMPC 65 x 40-125	65	40	125	80	665	112	338	604	554	46	338	308	Ø16
MMPC 80 x 50-125	80	50	125	100	700	132	380	650	600	50	338	308	Ø16
MMPC 32 x 25-150	32	25	150	82	475	112	340	465	405	62	300	270	Ø16
MMPC 50 x 32-160	50	32	160	80	665	132	380	604	554	46	338	308	Ø16
MMPC 65 x 40-160	65	40	160	80	665	132	380	604	554	46	338	308	Ø16
MMPC 80 x 50-160	80	50	160	100	800	160	430	650	600	50	338	308	Ø16
MMPC 50 x 32-200	50	32	200	80	720	160	430	700	675	50	350	320	Ø16
MMPC 65 x 40-200	65	40	200	100	800	160	430	700	675	50	350	320	Ø16
MMPC 80 x 50-200	80	50	200	100	900	160	470	750	700	50	450	410	Ø16
MMPC 50 x 32-250	50	32	250	100	800	180	490	700	675	50	400	370	Ø16
MMPC 65 x 40-250	65	40	250	100	850	180	500	750	700	50	450	410	Ø16

**SPECIFICATIONS & TECHNICAL DATA TABLE****MMPB Series
SS Magnetic Drive Process Pump (Long Coupled)****Specifications**

Flow upto	:	max. 100 m ³ /h
Head upto	:	max. 100 m
Max. Motor power	:	60 HP
Temperature Range	:	-35°C to +250°C
Max. Working Pressure	:	PN16 / PN25
Max. Kinematic Viscosity	:	0.5 to 350 mm ² /s
Solid Handling Range	:	5% hard Solids and 150 microns diameter
Flange Class	:	Class 150 / Class 300
Drive	:	Long Couple
Impeller Type	:	Close
Magnets	:	Ferrite/Rare Earth/Specially Designed

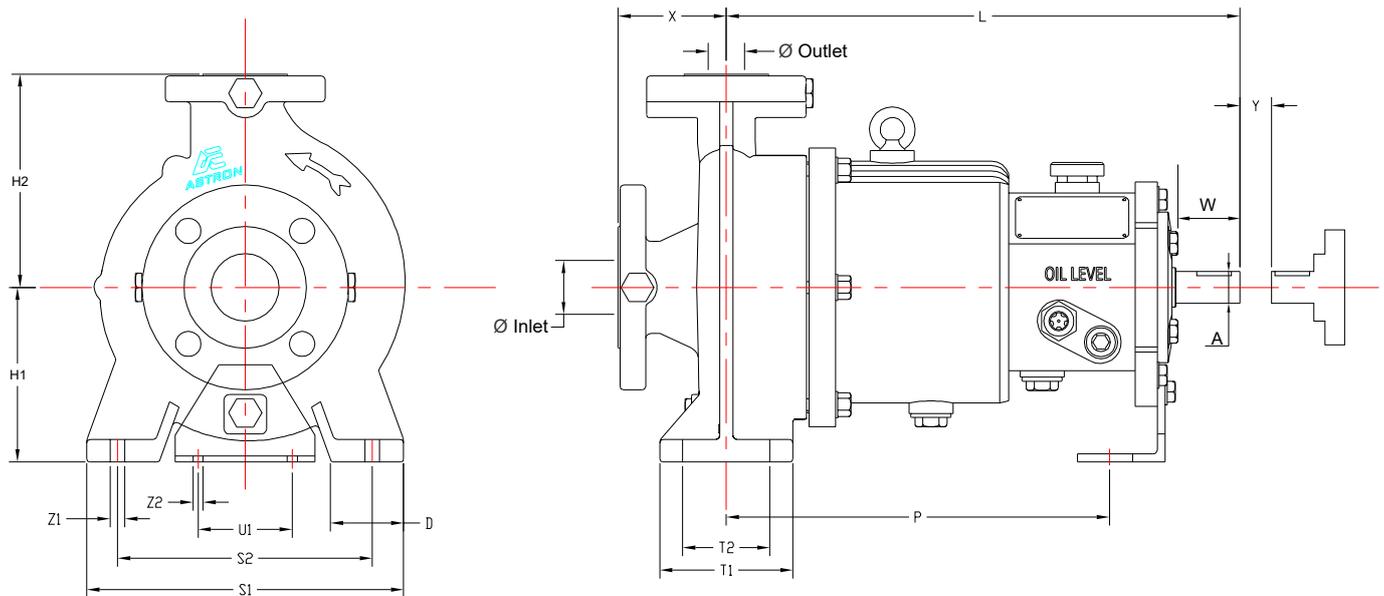
**Technical Data Table**

Pump Model	2 POLE (2900 RP M)			4 POLE (1450 RPM)		
	Nominal Duty Point		Motor	Nominal Duty Point		Motor
	Q m ³ /h	H m	hp / kw	Q m ³ /h	H m	hp/kw
MMPB 25 x 25-125	4	20	1/0.75	2	5	0.25/0.18
MMPB 32 x 25-125	5	20	1.5/1.1	3	5	0.25/0.18
MMPB 50 x 32-125	12.5	20	3/2.2 - 5/3.7	6.3	5	0.5/0.37
MMPB 65 x 40-125	25	20	5/3.7 - 7.5/5.5	12.5	5	1/0.75
MMPB 80 x 50-125	50	20	7.5/5.5 - 10/7.5	25	5	1.5/1.1
MMPB 100 x 65-125	100	20	12.5 / 9.3	50	5	3 / 2.2
MMPB 32 x 25-150	5	30	2/1.5	3	10	0.5/0.37
MMPB 50 x 32-160	12.5	32	5/3.7 - 7.5/5.5	6.3	8	1/0.75
MMPB 65 x 40-160	25	32	7.5/5.5 - 10/7.5	12.5	8	1.5/1.1
MMPB 80 x 50-160	50	32	12.5/9.3 - 15/11	25	8	2/1.5
MMPB 100 x 65-160	100	32	20 / 15	50	8	5 / 3.7
MMPB 50 x 32-200	12.5	50	10/7.5 - 12.5/9.3	6.3	12.5	1.5/1.1
MMPB 65 x 40-200	25	50	12.5/9.3 - 15/11	12.5	12.5	2/1.5
MMPB 80 x 50-200	50	50	20/15 - 30/22.5	25	12.5	4/3
MMPB 100 x 65-200	100	50	40 / 30	50	12.5	7.5 / 5.5
MMPB 50 x 32-250	12.5	80	15/11 - 20/15	6.3	20	3/2.2
MMPB 65 x 40-250	25	80	20/15 - 30/22.5	12.5	20	4/3
MMPB 80 x 50-250	50	80	50 / 37	25	20	7.5 / 5.5
MMPB 100 x 65-250	100	80	60 / 45	50	20	10 / 7.5



G. A. DRAWING & DIMENSION TABLE

General Assembly Drawing



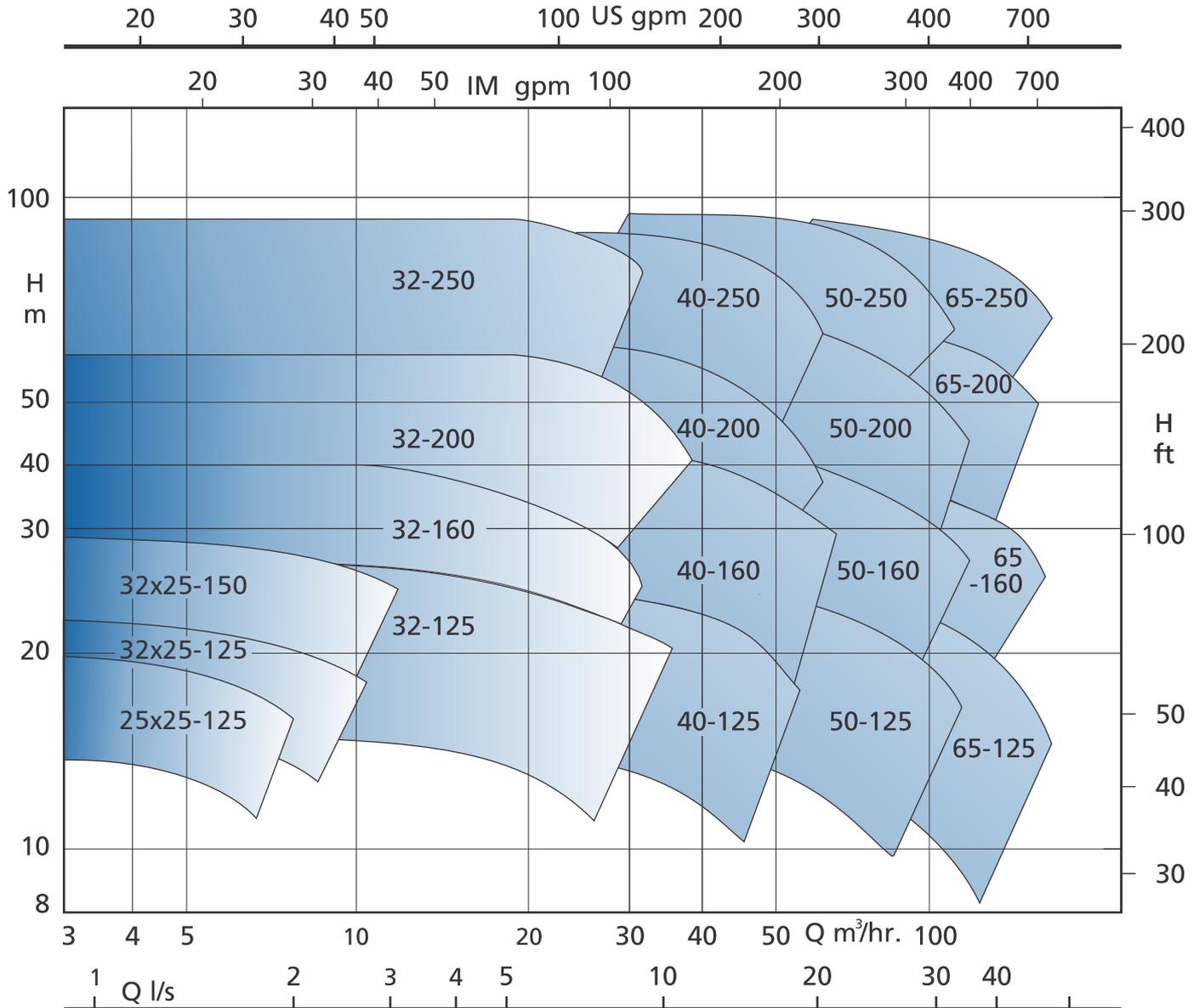
Dimension Table

Pump Model	Size Description			Dimension In Millimetres															
	Ø Inlet mm	Ø Outlet mm	Impeller (nominal) mm	Pump				Support							Clearance Holes For Bolts		Shaft End		
				X	L	H1	H2	D	T1	T2	S1	S2	U1	P	Z1	Z2	A	W	Y
MMPB 25 x 25-125	25	25	125	80	332	112	142	50	100	80	190	140	50	270	M12	M12	20	35	15
MMPB 32 x 25-125	32	25	125	80	332	112	142	50	100	80	190	140	50	270	M12	M12	20	35	15
MMPB 50 x 32-125	50	32	125	80	385	112	140	50	100	70	190	140	110	285	M12	M12	24	50	100
MMPB 65 x 40-125	65	40	125	80	385	112	140	50	100	70	210	160	110	285	M12	M12	24	50	100
MMPB 80 x 50-125	80	50	125	100	385	132	160	50	100	70	240	190	110	285	M12	M12	24	50	100
MMPB 100 x 65-125	100	65	125	100	385	160	180	65	125	95	280	212	110	285	M12	M12	24	50	100
MMPB 32 x 25-150	32	25	150	80	332	112	142	50	100	80	190	140	50	270	M12	M12	20	35	15
MMPB 50 x 32-160	50	32	160	80	385	132	160	50	100	70	240	190	110	285	M12	M12	24	50	100
MMPB 65 x 40-160	65	40	160	80	385	132	160	50	100	70	240	190	110	285	M12	M12	24	50	100
MMPB 80 x 50-160	80	50	160	100	385	160	180	50	100	70	265	212	110	285	M12	M12	24	50	100
MMPB 100 x 65-160	100	65	160	100	500	160	200	65	125	95	280	212	110	370	M12	M12	32	80	100
MMPB 50 x 32-200	50	32	200	80	385	160	180	50	100	70	240	190	110	285	M12	M12	24	50	100
MMPB 65 x 40-200	65	40	200	100	385	160	180	50	100	70	265	212	110	285	M12	M12	24	50	100
MMPB 80 x 50-200	80	50	200	100	385	160	200	50	100	70	265	212	110	285	M12	M12	24	50	100
MMPB 100 x 65-200	100	65	200	100	500	180	225	65	125	95	320	250	110	370	M12	M12	32	80	140
MMPB 50 x 32-250	50	32	250	100	500	180	225	65	125	95	320	250	110	370	M12	M12	32	80	100
MMPB 65 x 40-250	65	40	250	100	500	180	225	65	125	95	320	250	110	370	M12	M12	32	80	100
MMPB 80 x 50-250	80	50	250	125	500	180	225	65	125	95	320	250	110	370	M12	M12	32	80	100
MMPB 100 x 65-250	100	65	250	125	500	200	250	80	160	120	360	280	110	370	M16	M12	32	80	140



PERFORMANCE CURVE & APPLICATION

2 POLE - 2900 RPM



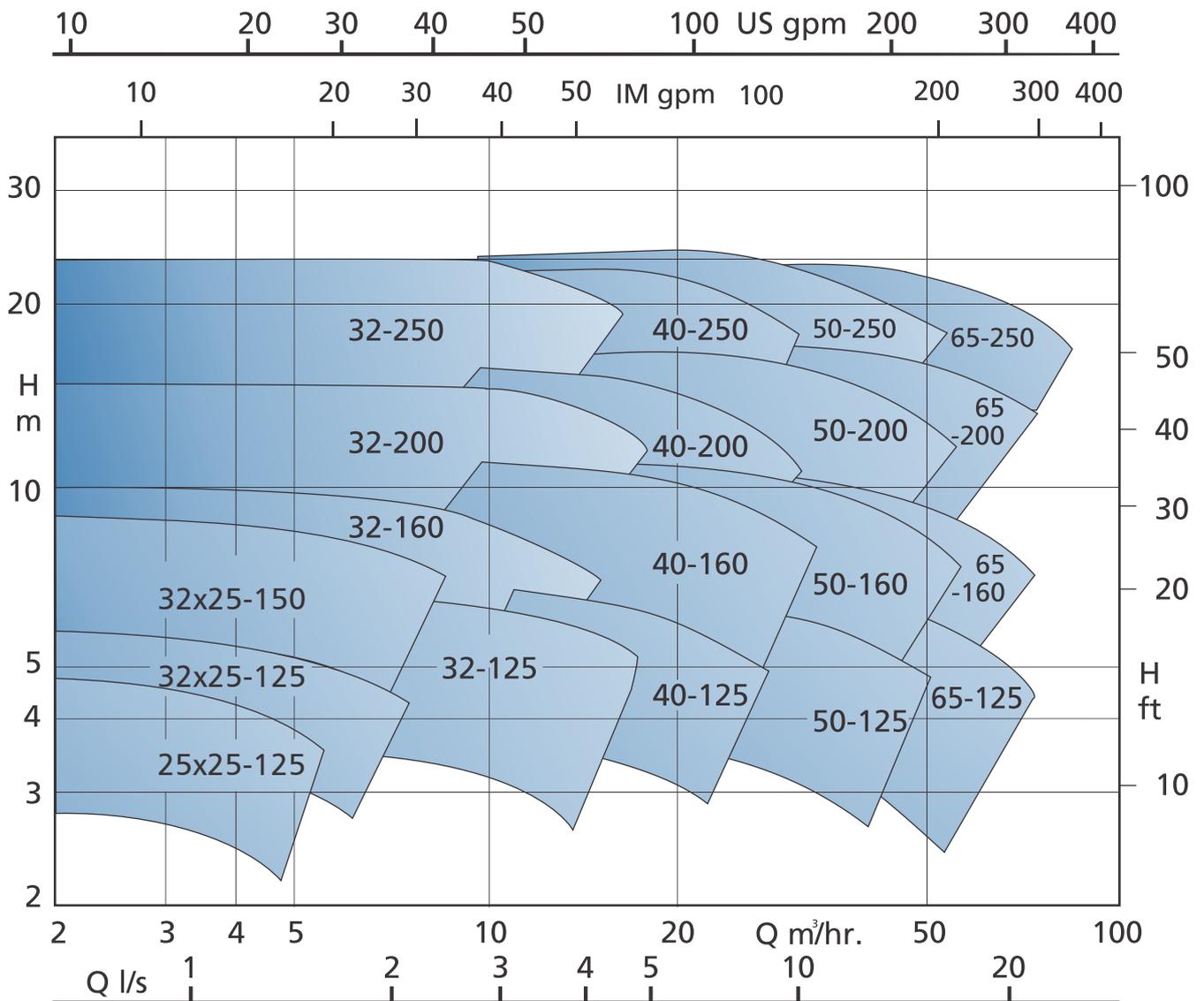
Application

- Acid/Base Pumps
- Chemical Feed/Process/Transfer Pumps
- Hot Oil Pumps
- High/Low Temperature pumps
- Coolant Pumps
- High Purity Water Pumps
- Pharma Liquid/Solution Pump
- Solvent Transfer
- Boiler Feed Pump
- Desalination Pumps
- Caustic Pumps
- Pesticides Pumps
- Fertilizer Pump



PERFORMANCE CURVE & INDUSTRIES

4 POLE - 1450 RPM



Industries We Serve



Chemical Industry

Pharmaceutical Industry

Food & Beverage Industry

Water & Wastewater Industry

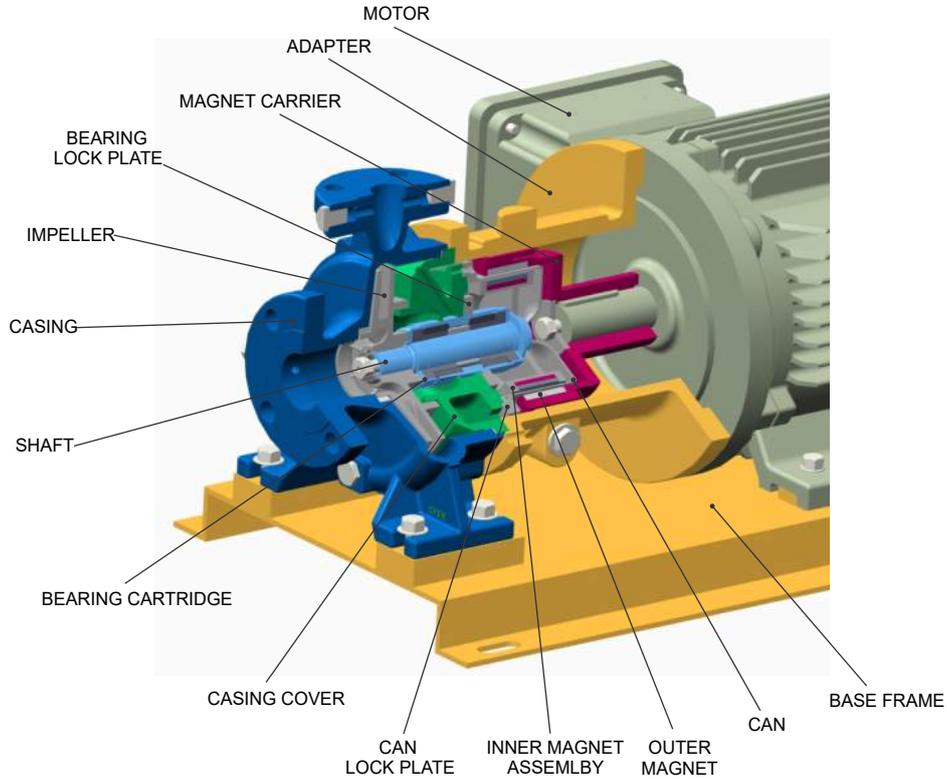
Paper & Pulp Industry

Agrochemical Industry



LIST OF COMPONENTS WITH MOC

MMPC Series Model



List Of Components With MOC

Item	Description	Material
1	CASING	SS304 / SS304L / SS316 / SS316L DUPLEX ALLOY / HASTELLOY
2	IMPELLER	
3	CASING COVER	
4	SHAFT	SS304 / SS316 / SS316L
5	BEARING CARTRIDGE	SIC + TC +TC + SS316
6	CAN	SS316L/ HAST-C
7	INNER MAGNET ASSEMBLY	FERRITE & SPECIAL MAGNET
8	OUTER MAGNET	FERRITE & SPECIAL MAGNET
10	BEARING LOCK PLATE	SS304 / SS316
11	CAN LOCK PLATE	SS304/ SS316
12	MAGNET CARRIER	CI / WPS
13	ADAPTER	CI / WPS
14	BASE FRAME	MS
15	MOTOR	CROMPTON / ABB / AS PER CLIENT REQUIREMENT
	GASKET	PTFE
	FASTENERS	SS304 / SS316 / SS316L