



AMXI

系列
SERIES

磁力驅動無軸封泵浦
MAGNETIC DRIVE SEAL-LESS PUMP



榮獲
PATENTED IN
德國、台灣
GERMANY, TAIWAN (R.O.C.),
日本、大陸
JAPAN, CHINA (P.R.C.),
韓國、英國新型專利
KOREA, UK
其他國家專利申請中
OTHER COUNTRIES ARE PENDING.

[http : //www.assoma.com.tw](http://www.assoma.com.tw)

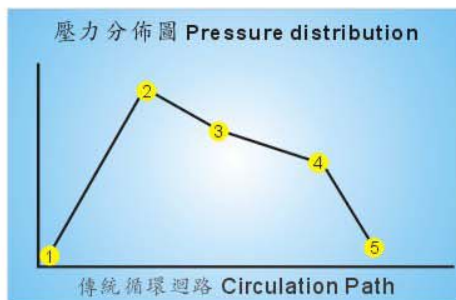
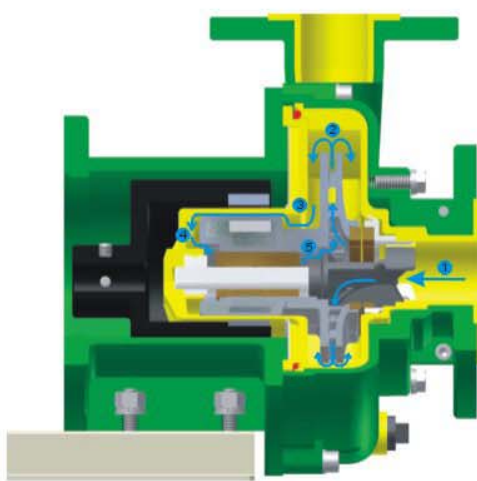
專利功能 Patented Function

AMXI系列是全球內襯氟化塑料磁力驅動泵浦中，唯一具有優異長效耐空轉特性及軸向推力緩衝機構兩項專利，且性能優異的系列機種。

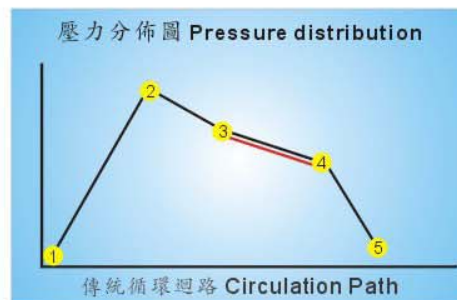
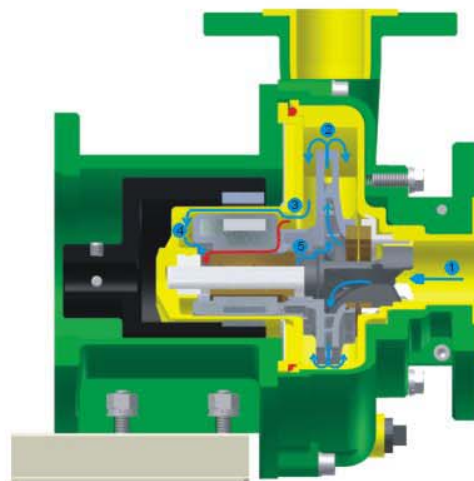
ASSOMA AMXI series is the only one in the world, using a metallic outer casing lined with ETFE engineering plastics, equipped with two patents: A distinct construction to reduce overheating from DRY RUN and an axial BUFFER SYSTEM to absorb vibration and shock by abnormal operation.

AMXI系列是協磁公司專為克服無軸封泵浦經常遇到的異常現象，如“空轉”、“汽化”等導致泵浦嚴重損壞的全新系列產品。

AMXI is a new series specially designed to overcome harmful damage to a sealless magnetic drive pump by some abnormal conditions, such as dry run, and cavitation, etc.



■ 傳統循環迴路
Traditional Circulation Path



■ 協磁專利循環迴路
ASSOMA Patented Circulation Path
For Cooling

強固的結構 Robust Structure

AMXI系列不僅適用於一般化學輸送及製程用途，由於其強固的金屬外殼護罩及內襯氟化塑料設計，更適用於高溫、高壓，強酸、強鹼等嚴峻條件。

AMXI series is not only used for general chemical transportation and processing, due to its robust structure of metallic outer casing lined with ETFE engineering plastics, but also suitable to use under high temperature, high pressure, critical acid or alkaline applications.

AMXI系列已獲多項國際專利，其優異的機械及水力性能除在實驗室中長期驗證外，並參加多項國際性展覽，普獲好評。

AMXI series obtained several patents worldwide. It is well receipt by customers for its outstanding mechanical structure and hydraulic performance. It has been verified satisfactorily on the long trial run in the lab and displayed in several international exhibitions, and highly appraised by the public.

由泵浦流體設計軟體計算出最佳流道幾何，配合流場分析，掌握流動特性，使流體損失降為最低，提高葉片流體效率。

The geometry of impeller and casing are generated by professional hydraulic design programs. In addition, Computerized Fluid Dynamic (CFD) method is used to control stream pattern, thus reducing hydraulic loss and increasing pump efficiency.

高效率水力設計 High Efficient Flow Design

AMXI的軸承潤滑迴路，首創雙面對流冷卻設計，在同樣的潤滑熱量下，可帶走更多流量，即使空轉時，也可降低熱平衡溫度，提高抗空轉能力。



The revolutionized bearing design with dual-channel circulation on both inner and outer surfaces of bearing contributes to rapidly heat dissipation.

The circulation leakage of sealless pump is fully utilized to reinforce convectional heat transfer that lowers thermal balancing temperature and prevents damage even under dry running.

專利耐空轉結構 Patented Dry-run Design

以電腦輔助設計及分析強調可靠度及最佳化的現代設計理念。



Using fully computer aided design and analysis to assist product development.

This modern design concept helps ASSOMA's products lead to high technical industry.

結合CAD/CAE的科技產品 Integrate CAD/CAE System



高強度本體結構 High Strength Construction

全系列採用金屬內襯氟化塑膠材質，可同時符合強度與耐蝕性需求。

The AMXI series uses a metallic outer casing and a volute made from engineering plastic to provide the required structural strength as well as the needed corrosion resistance.

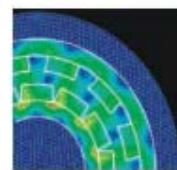
專利緩衝止推系統 Patented Buffer System

獨具創意的動態式緩衝座，除具備緩衝作用以吸收泵浦葉輪在吸入條件惡劣時之振動外，並提供止推環與葉輪磨損環間一動態式的平面接觸，藉以保持摩擦面之有效接觸面積，並大幅提高止推環可靠度及使用壽命，可降低疲勞損害。

Our innovative dynamic buffer is specially designed to absorb vibrations and shock caused by adverse operating conditions. At the same time, the dynamic buffer is self-adjusting, allowing a better face to face contact between the thrust ring and the wear ring, thus, minimizing wear and prolonging their service life.

高性能磁偶合器 High Performance Magnetic Coupling

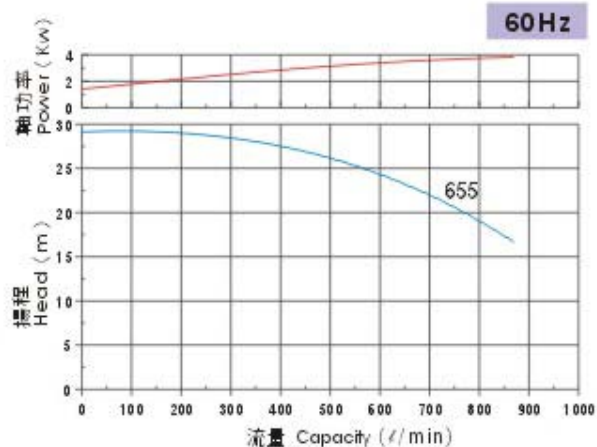
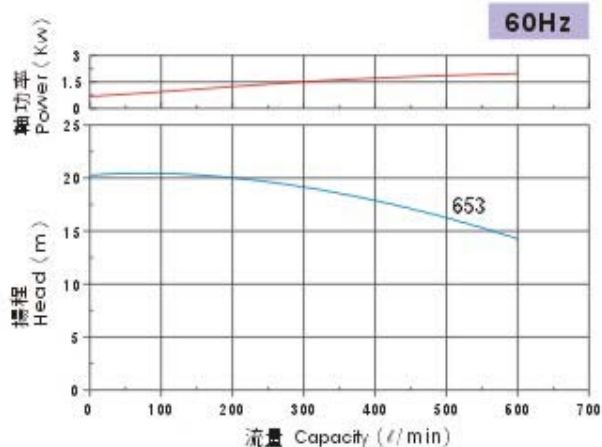
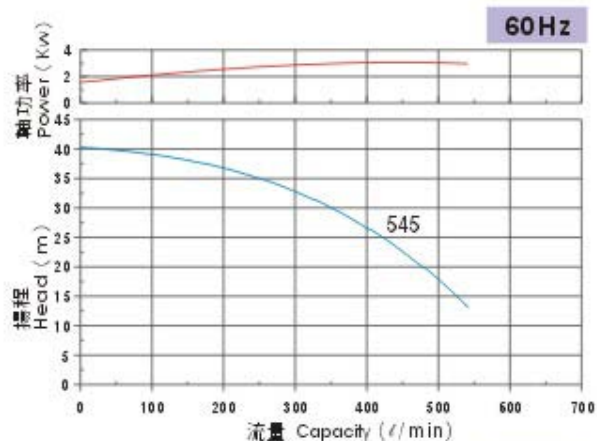
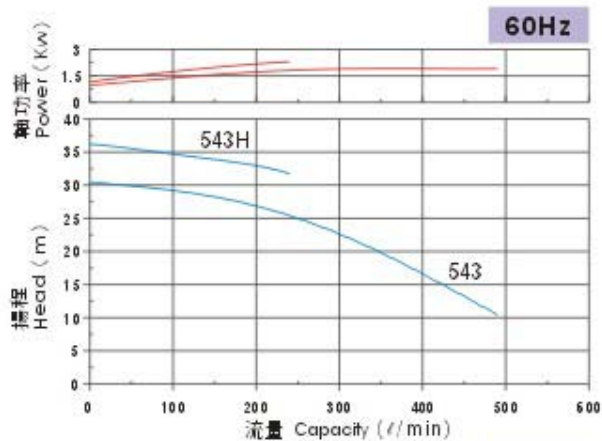
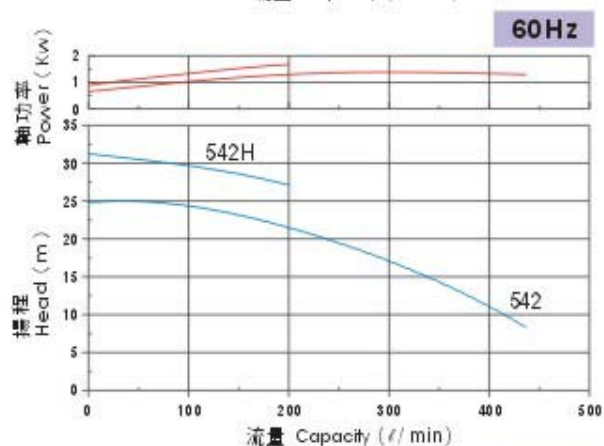
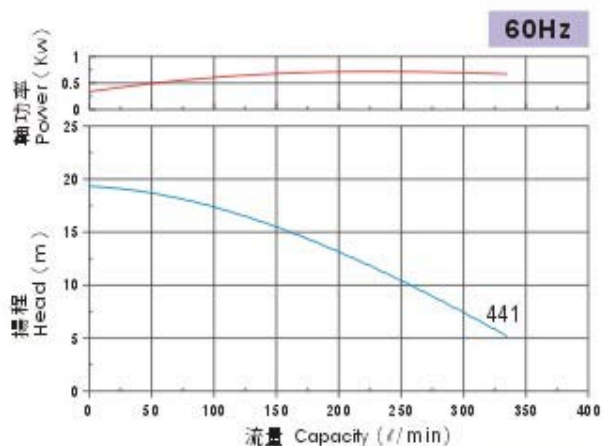
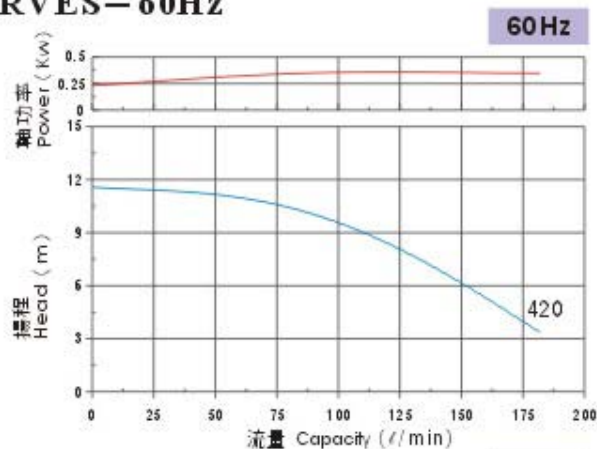
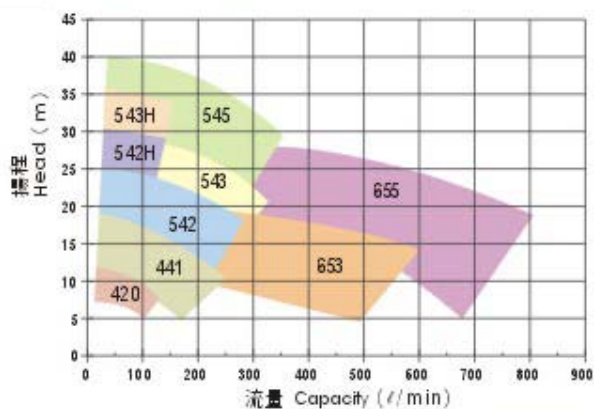
利用磁場分析軟體計算磁扭矩，提高磁鐵利用率，確保足夠的偶合動力餘裕以避免滑脫。



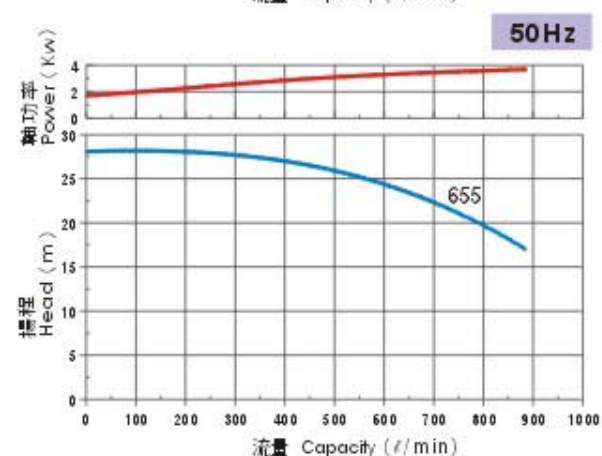
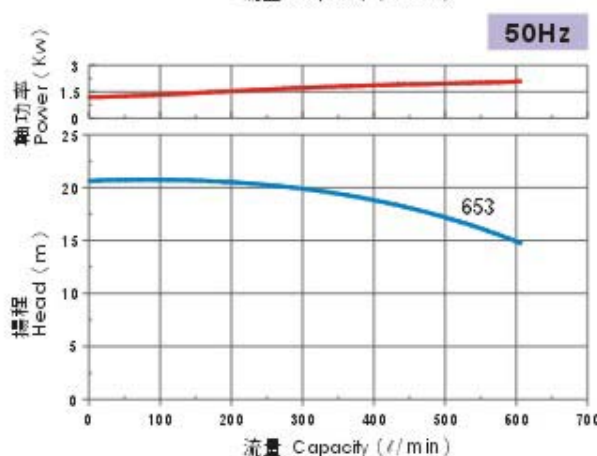
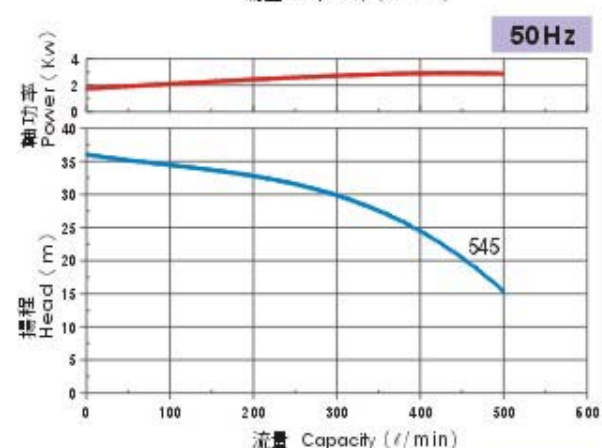
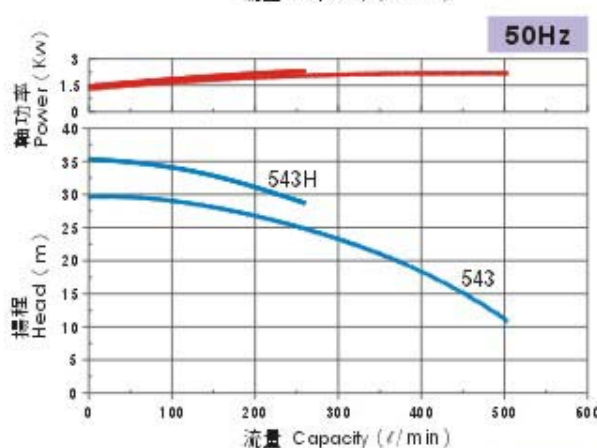
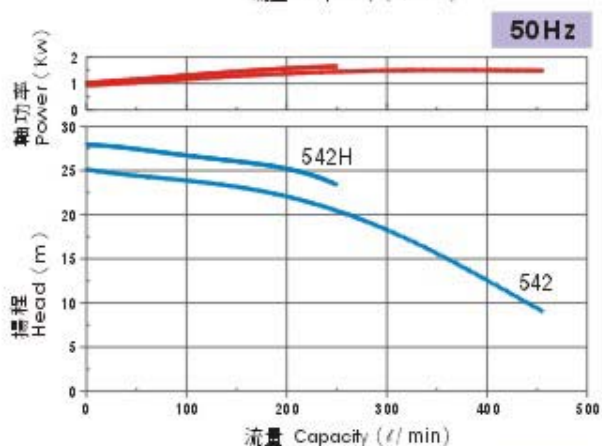
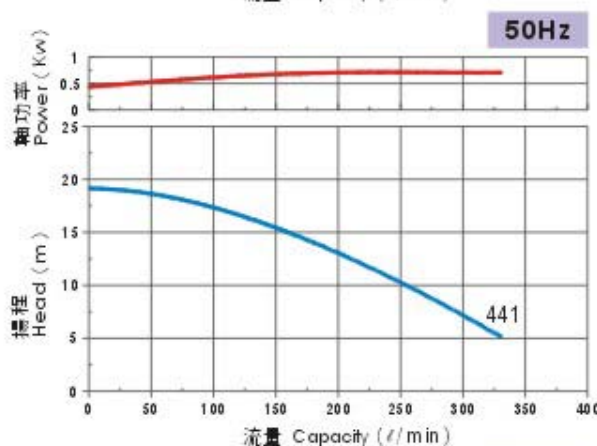
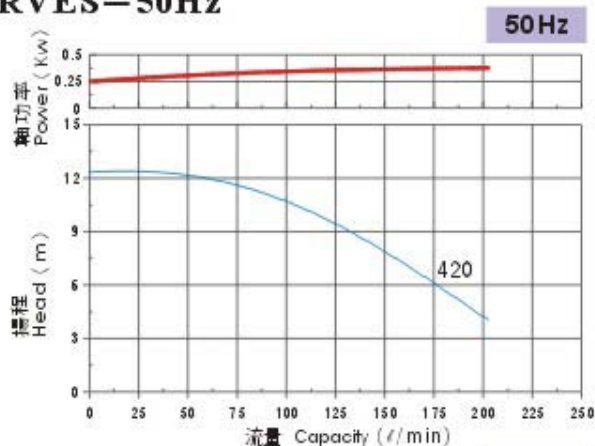
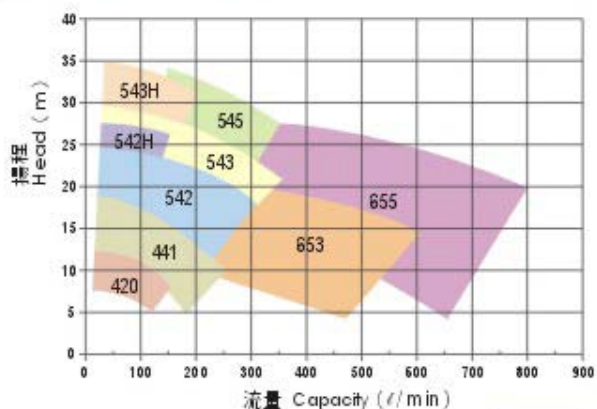
We utilize magnetic field analysis programs to calculate magnetic torque to maximize magnet utilization and ensure sufficient torque

margin to prevent decoupling.

性能曲線圖 PERFORMANCE CURVES—60Hz



性能曲線圖 PERFORMANCE CURVES—50Hz



規格表 SPECIFICATIONS

機 型 Model	入口*出口配管 Connection Suction x Discharge (mm)	頻 率 Frequency	額定流量 Rated Capacity (l/min)	額定揚程 Rated Head (m)	最高揚程 Max. Head (m)	馬達輸出功率 Motor Output (kw)
AMXI-420	40x25	50Hz 60Hz	100 100	10.7 9.6	12.3 11.6	0.4
AMXI-441	40x40	50Hz 60Hz	150 150	15.5 15.5	19.2 19.3	0.75
AMXI-542	50x40	50Hz 60Hz	200 200	22.2 21.5	25.1 24.8	1.5
AMXI-542H	50x40	50Hz 60Hz	100 100	26.7 29.9	28.0 31.3	1.5
AMXI-543	50x40	50Hz 60Hz	250 250	25.2 25.1	29.7 30.5	2.2
AMXI-543H	50x40	50Hz 60Hz	150 150	33.2 33.9	35.4 36.2	2.2
AMXI-545	50x40	50Hz 60Hz	250 250	31.0 34.8	35.7 40.1	3.7
AMXI-653	65x50	50Hz 60Hz	400 400	18.8 17.9	20.6 20.3	2.2
AMXI-655	65x50	50Hz 60Hz	500 500	26.0 26.2	28.1 29.1	3.7

型式表示 PUMP IDENTIFICATION

AMXI - 5 4 2 F E A C V - 0

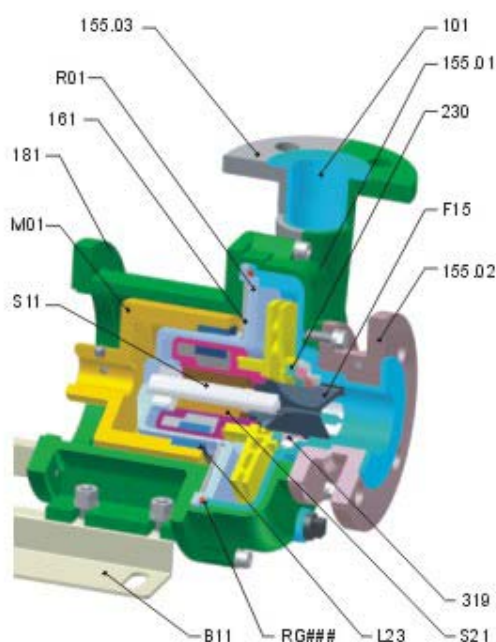
① 系列名稱 Series Symbol	AMXI 系列 Series
② 入口配管 Suction Connection	4: 40 A(1½") 5: 50 A(2") 6: 65 A(2½")
③ 出口配管 Discharge Connection	2: 25 A(1") 4: 40 A(1½") 5: 50 A(2")
④ 馬力額 Motor Power	0: 1/2 Hp (0.4kw) 1: 1 Hp (0.75kw) 2: 2 Hp (1.5kw) 3: 3 Hp (2.2kw) 5: 5 Hp (3.75kw)
⑤ 配管形式 Type of Connection	F: 法蘭 Flange
⑥ 本體材質 Casing Material	E: ETFE+CF

⑦ 軸心材質	A: 995 Al ₂ O ₃ S: SSiC
⑧ 軸承材質 Bearing Material	A: 995 Al ₂ O ₃ C: CARBON R: PTFE 含填充料 PTFE with filler S: SSiC
⑨ O形環材質 O-Ring Material	E: EPDM V: VITON K: 高氣 Special fluoroelastomer
⑩ 馬達型式 Motor Type	0: IP54 1: IP55 2: eG3安全防爆型 Explosion proof eG3 3: d2G4耐壓防爆型 Explosion proof d2G4 S: 特殊馬達 Special motor



DN	Standard	n-Ø	D2	D1	DN	Standard	n-Ø	D2	D1
25A	ISO	4-Ø18	100mm	125mm	50A	ISO	4-Ø18	125mm	165mm(Inlet) 160mm(Outlet)
	JIS	4-Ø19	90mm			JIS	4-Ø19	120mm	
	ANSI	4-Ø16	3½"			ANSI	4-Ø19	4 ¾"	
40A	ISO	4-Ø18	110mm	150mm	65A	ISO	4-Ø18	145mm	178mm
	JIS	4-Ø19	105mm			JIS	4-Ø19	140mm	
	ANSI	4-Ø16	3¾"			ANSI	4-Ø19	5 ½"	

材質構造圖 MATERIAL

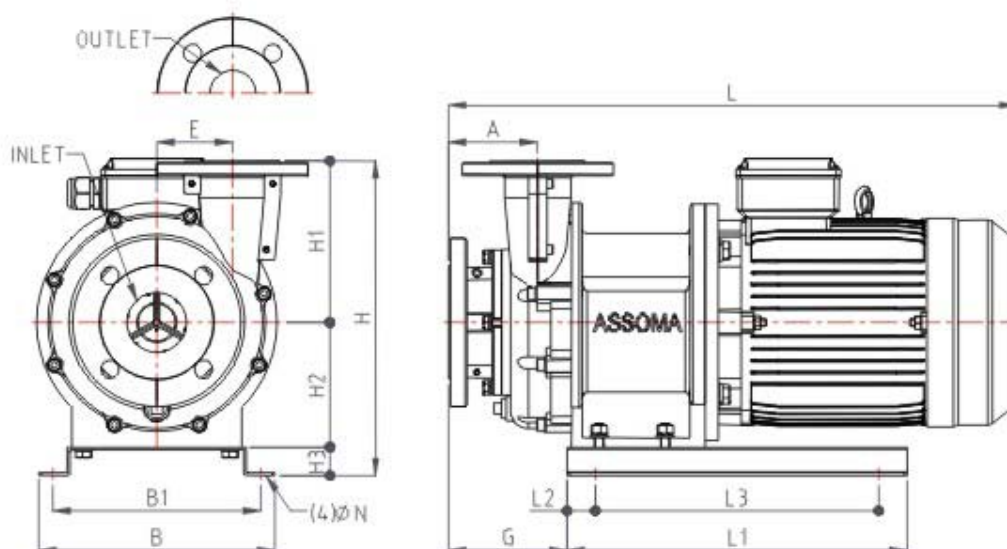


編號 Part code	名稱 Part name	ACE	ACV	SSE	SSV
101	前蓋 Pump casing	ETFE+CF			
155.01	前蓋護體 Casing armour	PCD			
155.02	入口護體 Inlet armour	PCD			
155.03	出口護體 Outlet armour	PCD			
161	後蓋背板 Backup plate	SUS304			
181	托架 Bracket	PC			
230	葉片磨損環組 Impeller wear ring assembly	ETFE+CF			
	葉片組 Impeller				
319	前磨損環 Front wear ring	CARBON		SSiC	
	前緩衝座 Front buffer	ETFE			
	前止推環 Front thrust ring	995 CERAMIC		SSiC	
B11	底座 Base plate *	SUS304			
F15	前軸心支撐 Front support, shaft	ETFE+CF			
L23	包膠內軸 Magnet capsule	ETFE+CF, Nd-Fe-B			
M01	外軸 Drive magnet	Nd-Fe-B			
R01	後蓋止推組 Rear casing / thrust ring	ETFE+CF			
	後蓋 Rear casing				
	後止推環 Rear thrust ring	995 CERAMIC		SSiC	
RG###	O形環 O-ring *	EPDM	VITON	EPDM	VITON
S11	軸心 Shaft	995 CERAMIC			
S21	軸承 Bearing	CARBON			

備註: * SUS316, FRP底座或全氟化橡膠O形環材料可供選擇。詳情可洽協盛公司。

Note: * SUS316, FRP base plate or FFKM o-ring is also available up to customer's request.

外型尺寸圖 DIMENSIONS



項目 Item 型式 Model	尺寸 mm													
	A	B	B1	E	G	H	H1	H2	H3	L	L1	L2	L3	N
AMXI-420	87	140	110	55	129	225	130	75	20	441	200	20	98	12
AMXI-441	102	160	130	72	149	256.5	141.5	85		487	210	35	130	
AMXI-542	88	260	204	80	137	281.5	161.5	90	30	498	300	20	200	14
AMXI-543						524								
AMXI-545						115	323.5			591				
AMXI-653	94	250	220		128	333	171	132		533	360	30	300	
AMXI-655										125				

備註 Note:

(1) 泵浦尺寸將因馬達廠牌和安裝方式之不同而有所區別。

Dimension of the pump will differ depending on the brand and installation of the motor.

(2) 泵浦出入口法蘭規格可依客戶不同規格需求 (ISO, ANSI, JIS) 承製。

Pump flange specification is available with ISO, ANSI, and JIS standard upon customer's request.

ASSOMA JAPAN CO., LTD

TEL: (81) 48-810-5481
FAX: (81) 48-810-5482
1-17-2, Higashi Urawa, Midori-ku, Saitama-city, Saitama, Japan 336-0926
E-mail: inazumi@assoma.co.jp

A-MAN CO., LTD

TEL: (82) 031-434-9948
FAX: (82) 031-434-9916
Rm211, No. 2, Shilwa Machinery Selling Complex 2166-2 Jungwang-dong, Shiheung-city, Gyeonggi-do, Korea
E-mail: seanhong@a-man.co.kr

DYNAPUMPS

TEL: (61) 8-9478-2722
FAX: (61) 8-9478-2750
88 Belgrave Street, Belmont WA 6104, Australia
E-mail: Charlie@dynamumps.com.au

P.V.S. TRADING ENGINEERING CO., LTD

TEL: (66) 2-944-6810
FAX: (66) 2-944-6820
130/39-40 Moo 12 Soi Ramindra 40, Ramindra Rd., Klongkum, Buengkum, Bangkok 10230, Thailand
E-mail: pvsc@ksc.th.com

TANGERINE ENGINEERING PTE LTD

TEL: (65) 6748-6211
FAX: (65) 6748-9722
502 Chai Chee Lane, #01-03 CMKS Building, Singapore 49025
E-mail: sales@tangerine.com.sg

協磁股份有限公司台中辦事處 ASSOMA INC. TAICHUNG OFFICE

TEL: (886) 4-2462-2388
FAX: (886) 4-2462-6398
台中市西屯區福瑞街160號樓之2
SF.-2, No. 160, Fumei Street, Situn District, Taichung City 40764, Taiwan, R.O.C.
E-mail: daniel@assoma.com.tw

上海協志貿易有限公司 ASSOMA INC. SHANGHAI OFFICE

TEL: (86) 21-6768-1081 (86) 21-6768-1089
FAX: (86) 21-6764-8067
上海市松江區新橋鎮香申村金都西路959號4幢
Tent 4, No. 959, Jindu West Road, Chunshen Village, Xingiao Town, Songjiang Area, Shanghai, China
E-mail: assomapump@vip.163.com

上海協志貿易有限公司深圳分公司 ASSOMA INC. SHANGHAI OFFICE (SHENZHEN BRANCH)

TEL: (86) 755-2650-0300 (86) 755-2650-3347
FAX: (86) 755-2650-1327
深圳市南山區新科技園區科苑路達大廣5樓519房
Room 519, East 5F, Jianda Building, Keyuan Road, Science Park, Shenzhen, China
E-mail: assoma_sz@vip.163.com

北京世紀朝陽科技發展有限公司 BEIJING CEN-SUN TECHNOLOGY DEVELOPMENT CO., LTD.

TEL: (86) 10-8239-8036
FAX: (86) 10-8239-8026
北京市海澱區北四環中路209號健翔園6號樓2202室
Room 2202, No. 6 Jian Xiang Yard, No. 209 North Fifth-Ring Zhong Road, Hai Dian District, Beijing, China
E-mail: feihu.h@vip.163.com

台灣南部總代理弓海企業有限公司 KUNG HAI ENTERPRISE CORP.

TEL: (886) 7-236-5930~2
FAX: (886) 7-236-9500
高雄市新興區七賢一路251號19F
19F-1, No. 251, Cisian 1st Road, Sinsing District, Kaohsiung, Taiwan R.O.C.
E-mail: kunghai@seed.net.tw

專營：磁力驅動無軸封泵浦、化工用耐酸鹼泵浦、直立式泵浦、過濾機、定量泵浦
SPECIALIZES IN MAGNETIC DRIVE SEAL-LESS PUMPS, INDUSTRIAL CHEMICAL RESISTANT PUMPS, VERTICAL PUMPS & METERING PUMPS.

協磁股份有限公司

桃園縣蘆竹鄉坑口村三德街15巷14弄10號
NO.10, ALLEY 14, LANE 15, SAN-TE STREET, KENG KOU VILLAGE,
LUJHU TOWNSHIP, TAOYUAN COUNTY, 338, TAIWAN, R.O.C.
TEL: (886) 3-354-7606
FAX: (886) 3-354-7612
http://www.assoma.com.tw
E-mail: sales@assoma.com.tw

