



AUTOMATIC BLOW MOLDING MACHINE



Industrial 4.0



ECO Friendly



Blow Molding
Solution

Polaris

The Polaris logo consists of the brand name 'Polaris' in a white serif font, enclosed within a circular arrow graphic that suggests a continuous process or cycle.

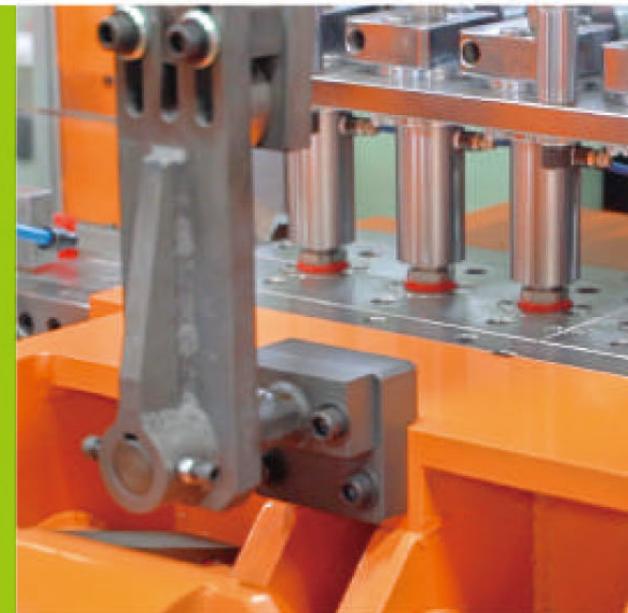
“ SERVICE FROM HEART
ACHIEVEMENT FROM COLLABORATION
從心服務, 成就合作 ”

品質 | 創新 | 專業 | 服務

**QUALITY, INNOVATION,
PROFESSIONALISM, CONSIDERATION.**

自1992年成立至今，
鎧鑫塑膠機械銷售及服務全世界
押出中空吹氣成型機(又稱吹塑機)、
PET拉吹機、一步法射拉吹機、模具及週邊配備，
提供客戶專業的產品技術評估建議、最優良的機械性能，
高品質的機械結構、完善和迅速的售後服務。

鎧鑫獲得ISO 9001:2015之品質認證，
製造機台皆符合CE標準。
近年來致力於創新研發先進的吹塑成型技術
並協同專業研究機構創新技術合作，
使鎧鑫享有“先進就是鎧鑫、鎧鑫就是第一”之美譽。



Since FULL SHINE's establishment in 1992, Full shine specializes in manufacturing Automatic Blow Molding Machine, PET stretch Blow Molding Machine, One Stage Injection Stretch/Blow Molding Machine, Molds and optional equipment.

FULL SHINE plastic machinery always symbolizes excellence in making blow molding machinery. FULL SHINE has earned an excellent reputation for quality machines and thorough services around the world, selling to all over the world. The key to our success comes from considerate services and quality assurance on FULL SHINE blow molding machines, coupled with efficient global marketing and competitive prices. Due to the support of our experienced personnel, innovative design, and quality-machine performance, our customers place complete trust and reliance on FULL SHINE.

FULL SHINE never stops striving to maintain our regulative concepts:
“Service from Heart; Achievement from Collaboration”.
As the most active and competitive manufacturer in Taiwan,
FULL SHINE has the ISO 9001:2015 Certificate and CE Certificate on all machinery.



鎔鑫結合產業界之實務技術經驗及學術界資訊，
開發出多層共押出之關鍵技術。
多層共押出將不同特性的塑料結合吹塑，如2~6層複合瓶或汽車零配件，
以結合不同塑料，發揮出各層塑料之特性，
以達到高阻氣性、高阻水性、使用回收料比率70%以上之特色。
鎔鑫並以三層共押出中空吹氣成型機之專業技術，
參加台灣舉辦之中小企業績優廠商選拔，並榮獲頒發金手獎，
肯定鎔鑫公司在多層共押出之技術成就。在全球化的競爭時代，
鎔鑫公司以立足台灣、專業創新、勇於挑戰、品牌行銷、
放眼國際的胸襟和永續經營的理念
來自我鞭策和期許開拓更寬闊的藍海市場。



FULL SHINE combines practical experience and academic information technology industry, developing of the key technologies of co-extrusion.

The multi-layer co-extrusion blow molding of plastic combined with different characteristics, such as 2 to 6 layers composite bottle or automobile components, with a combination of different plastics, play features layers of plastic in order to achieve high gas barrier properties, high resistance water-based, use of recycled materials ratio of more than 70% of the features.

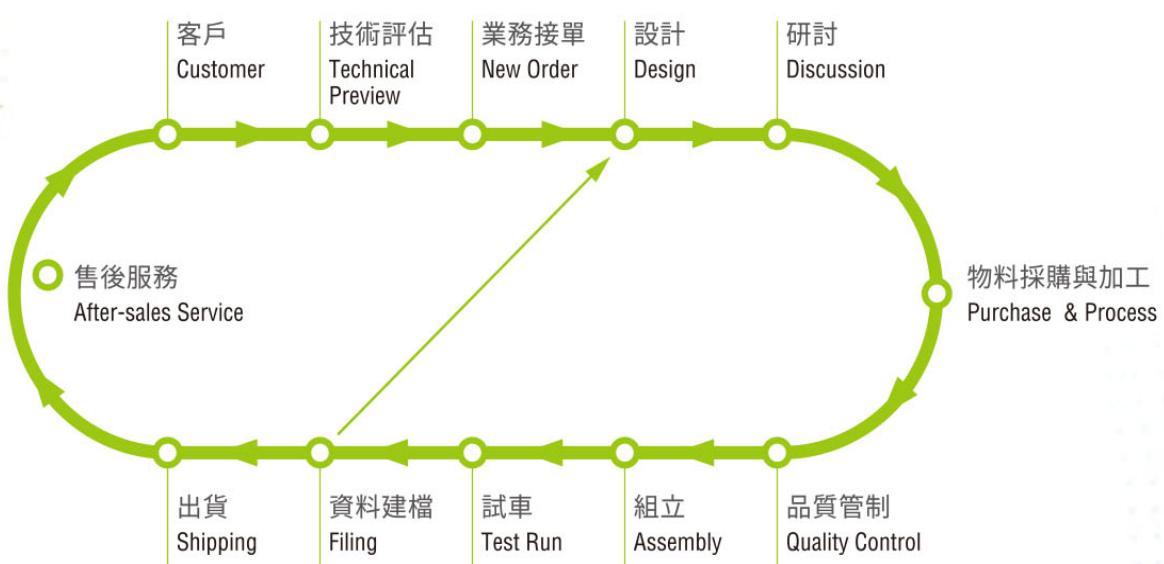
In the competitive era of globalization, FULL SHINE keeps running principle consistently - "Think globally, footing locally, Active & Creative, enjoys challenge, Brand Marketing, and Constant Operation".

To prospect the future, we set our sights on stable quality of present products, research and develop new technologies and design, expand the foreign market, promote FULL SHINE company.

We expect our company to go ahead to the goal of diversification.

生產流程

PRODUCTION PROCEDURE



機械配備與功能

- 1 Suitable for making plastic products from 5ml upto 500L. FULL SHINE provides various machinery for best choice, such as A, O, H, P, I, and L Series Blow Molding Machines.
- 2 Die Head is torpedo design with special flow channel for swift and complete mergence of plastic material inside and to provide better plasticized feature.
- 3 Various Die Heads from single, double, three, upto eight die heads for the better choice. Parison extrusion speed can be separately controlled by throttles.
- 4 Die Mouth Extrusion Adjustment by 3-point adjustment; simple and safe way for the operator.
- 5 High-melting Screw design by SACM 645 steel alloy for better mergence of resin. Force-feeding design for the customized screw as an option.
- 6 Based on specific material, incorporating with high-melting screw design, the machinery can process: PE, PP, PVC, PS, PETG, PA, TPR, TPU, ABS, PC, EVA and K-resin.
- 7 Cutting parison by electric-heated Hot Cutter for cutting the parison of different resin. Multi-die head is available by Cold Cutter.
- 8 Blow Pin is driven by air pressure for neck twist-off design for precise and forced neck flash removal.
- 9 Blow Pin up/down, left/right, front/back adjustment is done by slide-board unit with the hand wheels for easy and accurate adjustment.
- 10 Blow Pin Mandrel has the chill-water circulation or to add the air-exhaust feature for forming the bottle neck precisely.
- 11 Blow Pin Pre-lift design before mold open, which is suitable for removing neck flash and ensure the cutting ring of the mold for long-term use.
- 12 Blow Pin movement is driven by the solenoid valve for precise micro pre-lift movement to ensure the neck accuracy of small-necked bottles.
- 13 Central distance of Blow Pins can be adjusted by Full Shine's special design.
- 14 Hydraulic System from YUKEN proportional control to provide strong and powerful mechanical movement and hydraulic clamping circuit.
- 15 The moving areas are with the manual self-lubricated devices to ensure the parts for better durability and wear-proof.
- 16 FULL SHINE special-designed Brake system for the Carriage to provide stable movement and swift positioning.
- 17 Mold Carriage connects to the bottle line-up frame.
- 18 Extruder Platen with the special design for up/down adjustment to provide the flexible distance between the extruding mouth and the mold. Mold Platen moving system is driven by roller chain for stable performance.
- 19 **Option:** Auto Jar Neck Cutting Device, for cutting jar-neck / wide-neck bottles with flat and smooth neck surface.
- 20 **Option:** Parison Wall Thickness Controller, from MOOG, Japan to provide multi-point thickness control to ensure the equal-thickness parison, available for 100 and 400-point control, and with the separate hydraulic system and stainless steel oil tank to provide the stable and high-performance close-loop servo circuit.
- 21 **Option:** Top & Bottom Deflashing Device is to remove the overflow around the plastic products automatically. The device is driven by pneumatic and hydraulic system to ensure the complete deflashing performance, and also can add the post-cooling function.
- 22 **Option:** Innovative Blowing Unit Left/Right Swift Movement, driven by the hydraulic system for fast and efficient mold-changing.
- 23 **Option:** HMI Touch Screen from Japan, to provide all function-and-setting control on the screen, such as mold file saving, error message report, and I/O monitor.
- 24 **Option:** Computerized Keypad Screen from Taiwan, to provide all function-and-setting control on the keypad, such as mold file saving, error message report, and I/O monitor.
- 25 **Option:** Servo Control System for Machine Operation, from Yuken, Japan or Taiwan, with the close-loop system for accurate machine performance and saving power; furthermore, available for upgrading to fully-electric system.
- 26 Customized design of blow molding machines are available to meet the customer's special request.
- 27 Innovative design and user-friendly machine to provide fast mold-changing, material-changing, and color-changing to satisfy the customer's request: on-time production.
- 28 PVC machinery with the special-designed screw, the barrel ventilator and air-exhaust design to ensure stable heating performance and to prevent the over-burned PVC issue.

機械型號索引系列

	Screw Diameter (M/M) 螺桿直徑 (m/m)	Machine Series 機械類別	Mold Head 模頭	Mold Station 模架	Product Type 產品形式
FS	40	H Horizontal 平移式開關模採用線性滑軌	S Single Mold Head 單模頭	S Single Mold Station 單模架	O Original 一般
	45	P Parallel 平行式移模	D Double Mold Head 雙模頭	D Double Mold Station 雙模架	C Two Colors 雙色
	55	O Standard / Oblique 標準型 / 斜移式	T Three Mold Head 三模頭		D Two Layers 雙層
	65	A Pneumatic 空壓式	S Four Mold Head 四模頭		T Three Layers 三層
	75	L Frontal 前向取出機型	S Eight Mold Head 八模頭		F Four Layers 四層
	80	I Lateral 側向取出機型			S Six Layers 六層
	90				V View Stripe 視窗
	100				P PC Baby Bottle PC奶瓶
	120				

FS

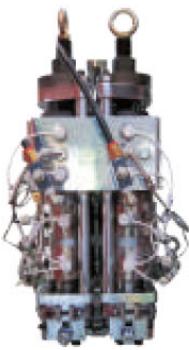
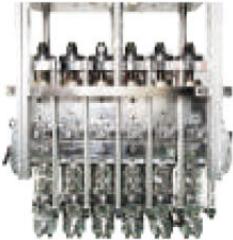
65

P

D

S

D

廣口切割系統
Auto Cutting System雙模頭加裝厚薄控制器
PE Double Head with Parison Control Cylinder單模頭
PE Single Head雙模頭
PE Double Head三模頭
PE Three Head吹氣單元
Blowing unit六模頭
PE Six Head單模頭
PVC Single Head雙模頭
PVC Double Head油壓系統採用日本油研(YUKEN)之比例控制閥
Hydraulic System from YUKEN, Japan厚薄控制器，採用日本
MOOG之厚薄控制器。
Parison Wall Thickness Controller,
made in Japan by MOOG.電腦式控制面板，採用台灣製造之螢幕。(選配)
Computerized Screen, made in Taiwan (Optional Device).吹塑模具
Blow Mold

下降吹氣系統，採用風壓驅動系統，適合沖斷各種瓶口的功能，且吹氣針切口部位具有水冷卻及強制導正之導槽設計，使瓶口口徑成形正確。

Pneumatic-driven Blowing System, Which is Capable of Deflashing the Bottle Neck. the Blowing Pin is Circulated by Chilled-water and Guiding Groove for Forcing to Guide and Accurate Bottle Neck During Calibrating.

MONO/ MUTLI LAYER CO EXTRUSION AUTOMATIC BLOW MOLDING MACHINE

全自動單層/多層共押出中空吹氣成型機

P 系列 SERIES

平移式移模 / 開關模採線軌控制
Parallel Motion



多層共押出

適合吹塑由二層至六層之塑膠容器，例如農藥瓶、蕃茄醬瓶和化妝品瓶等。多層共押出技術採用鍍鑫特殊設計之模頭，讓不同屬性之塑料結合。

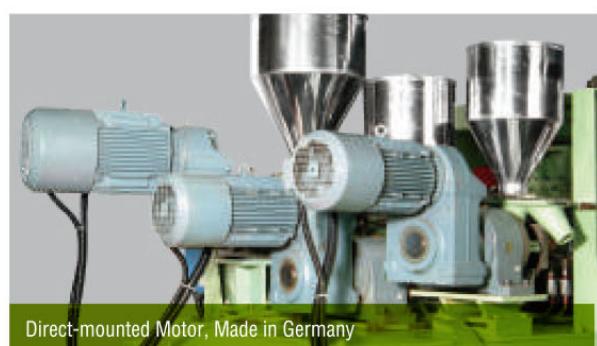
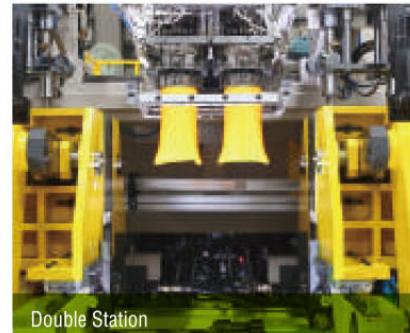
共押出技術可結合不同的塑料，如外層為亮面層，內層為阻隔層，並以接合層將內外結合以達到所需之塑料特性及成效。多層共押出應用為鍍鑫引領之先進技術。

MUTLI LAYER CO EXTRUSION

Applicable for single and double station with single to multiple die heads for producing up to SIX-LAYER CONTAINERS (2 TO 6-LAYER CO-EXTRUSION), such as chemical, catchup or cosmetic bottles.

Co-extrusion application allows unrelated materials with different characteristics to be combined in one parison through Full Shine special-designed die head. This combination binds different materials, such as combining high-gloss outside layer and barrier layer by an adhesive layer between them in order to achieve the perfect outcome. Co-extrusion application is the advanced technology by the leading brand: Full Shine.





- 曲臂式鎖模機構，配合德製線性滑軌為基礎滑動運作，移模迅速且穩定性高。
- 螺桿傳動方式採直結式德製齒輪箱搭配變頻馬達驅動，此為省能設計。
- 仰頭式模頭作動方式，使下料迅速，避免沾黏模具，縮短生產時間並方便校正調整。
- HMI觸控式電腦螢幕(日本富士)，搭配PLC電控系統，修改容易，方便於當地維護。
- 吹氣座配置快速移動變換位置功能，以油壓馬達驅動，以利模具更換、節省時間，此功能屬創新便捷設計。
- 吹氣系統加裝瓶口微抽裝置，使小瓶口口徑成型更精準。
- 可加裝選配自動廣口切割機、成品輸送帶、和厚薄控制器。
- 高效能之螺桿設計，適合生產各種不同的塑料。
- 裝配鋸鑫設計之移模剎車系統，移模穩定，定位精確。
- 選配移模加裝伺服馬達搭配閉迴路(Close-loop)系統，定位準確。

- Curved Arms for Strong Mold Clamping, Equipped with Linear Slide Guideway, Made in Germany for Swift Movement
- Screw Drive in the Control of Direct-mounted Gear Box and Inverter Motor as Power Saving Feature
- Die Head Unit with Head-lifted Device for Cutting Melted Material Swiftly and for Easy Alignment Adjustment
- HMI Touch Screen (10.4") from Japan, Fuji, Incorporating with PLC System for Easy Maintenance.
- Blowing Unit Driven by Hydraulic Motor for Changing Mold Easily-- Innovative Design
- Blowing Unit, Capable of Equipping Pre-lift Feature to Form Small Bottle Neck Precisely
- Equipped with Auto Cutting Device, Conveyor, Parison Wall Thickness Controller as Option.
- High-efficient Plasticizing Extrusion Screw for Processing Materials Completely.
- FULL SHINE Special-designed Brake System for the Carriage to Provide Stable Movement and Swift Positioning.
- Close-loop System with Servo Motor and Servo Circuit for Mold Carriage Movement, as Option

AUTOMATIC BLOW MOLDING MACHINE

全自動押出中空吹氣成型機

H 系列 SERIES

平移式移模 / 開關模採導桿控制
Horizontal Motion

O 系列 SERIES

斜移式模架
Oblique-slide Motion



Die Head with View Stripe & Blow Pin Unit



Four Column Slide Bar for Mold Clamping



移模方式採用導桿搭配油壓系統
作動，採V型斜移作動方式。

Carriage Movement by Tie Bars with Hydraulic System to Move as V-type Oblique Movement.

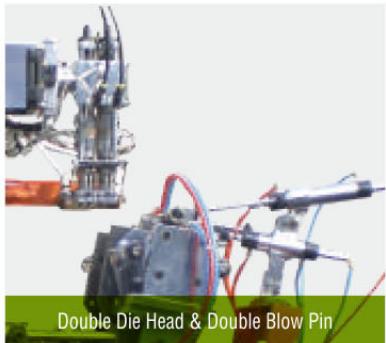
- 開閉模採用圓形鋼柱導桿形式，平移式移模以德製線性滑軌為基礎滑動運作方式。
- 螺桿傳動方式採直結式德製齒輪箱搭配變頻馬達驅動。
- 仰頭式模頭作動方式，使下料迅速，避免沾黏模具。
- HMI觸控式電腦螢幕(選配)，搭配PLC電控系統，修改容易，方便於當地維護。
- 吹氣座配置快速移動變換位置功能，以油壓馬達驅動，以利模具更換、節省時間，此功能屬創新便捷設計。
- PLC系統搭配獨立式電控箱。
- 可加裝選配自動廣口切割機、成品輸送帶和厚薄控制器。
- 高效能之螺桿設計，適合生產各種不同的塑料。
- 裝配鎧鑫設計之移模剎車系統，移模穩定，定位精確。

- Fine Steel Slide Bars for Swift Mold Opening and Closing with Horizontal Motion of Carriages by Linear Slide Way.
- Screw Drive by the Control of Direct-mounted Gear Box and Inverter Motor.
- Mold Head with the Head Lift-up Device for Swift Material Extrusion.
- HMI Touch Screen (Option), Incorporating with PLC System for Easy Maintenance.
- Blowing Unit Driven by Hydraulic Motor for Changing Mold Easily - Innovative Design.
- PLC Program with Separate Eletric Control Panel.
- Equipped with Auto Cutting Device, Conveyor, Parison Wall Thickness Controller as Option.
- High-efficient plasticizing Extrusion Screw for Processing Materials Completely.
- FULL SHINE Special-designed Brake System for the Carriage to Provide Stable Movement and Swift Positioning.

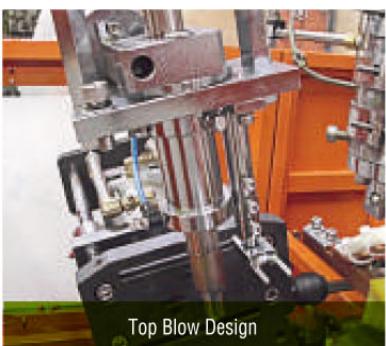


A 系列 SERIES

風壓式鎖模
Air Clamping Type



Double Die Head & Double Blow Pin



Top Blow Design



■此機種為風壓鎖模設計，簡易設計，生產快速，適合多種

小容量產品或棒棒冰容器之生產。

■螺桿驅動採變頻器搭配皮帶輪齒輪箱驅動馬達。

■新型雙模頭生產設計。

■機台鎖模成型方式為風壓驅動。可升級為油壓驅動(選配)。

■移模方式為前後搖擺方式，成品由正前方下料槽取出。

■獨立式電控箱搭配簡易式面板。

■簡易型吹瓶機，適合初期較低資金投資生產。

■ This Type Is the Pneumatic-clamping Blow-molding Machine, Suitable for Making Popsicle (Ice-lolly) & Various Small-size Bottles.

■ Extrusion Is Driven by the Inverter Motor With Pulley-drive Gear Box.

■ Innovative Design for Double Die Head Production.

■ Mold Clamping Is Driven By Pneumatic System, Available for Upgrading to Hydraulic-drive System (Option).

■ Carriage Movement Is the Swing Movement For Taking the Finished Products from the Front of the Machine.

■ Independent Electric Control Box with Simple Control Panel.

■ Simple-type Blow Molding Machine, Suitable For Low and Initial Blow Molding Machinery Investment.



MODEL TYPE	Air Clamping 風壓鎖模 / Single Station 單模架		
	FS-40ASSO	FS-40ASSO	FS-40ADSO
1 Material 使用塑料	PE/PP	PVC	PE/PP
2 Screw diameter 螺桿直徑 m/m	40	40	40
3 Screw L/D ratio 螺桿比例 L/D	22/1	22/1	22/1
4 Screw R.P.M. speed 螺桿轉速 r.p.m.	15-50	15-50	15-50
5 Inverter motor 變頻馬達 HP	5	5	5
6 Oil hydraulic drive motor 幫浦驅動馬力 HP	*	*	*
7 Optional air compressor 空氣壓縮機搭配馬力 HP	5	5	5
8 Air pressurer 空氣壓力 kg/cm ²	4-6	4-6	4-6
9 Clamping force 鋼模壓力 Ton	0.5	0.5	0.5
10 Oil tank capacity 油箱容量 Gallon	*	*	*
11 Number of heaters 加熱點數 ZONE	3	3	5
12 Heating capacity 加熱容量 KW	4.5	5.2	6
13 Total install power 總電力 KW	11	12	13
14 Extruding capacity per hour 押出量 kg/hr	15	15	15
15 Dry circle 每小時空循環 time/hr	1800	1800	1280
16 product capacity 產品容量 c.c./L	20-400	20-400	10-100
17 Product weight 產品重量 g.	10-30	10-30	5-15
18 Max. diameter of product 產品最大直徑 m/m	10-75	10-75	10-50
19 Extruding mouth outer diameter 模嘴外徑 m/m	40	40	25
20 Mold center distance 模中心距離 m/m	*	*	50
21 Clamping distance 關閉模極限 m/m	60-230	60-230	60-230
22 Height of mold capacity 容模長度 m/m	80-330	80-300	80-330
23 Width of mold capacity 容模寬度 m/m	220	220	220
24 Machine net weight 機器淨重 kg	550	650	700
25 Machine dimension 機器尺寸 m	1.95*1.0*1.8	1.95*1.0*1.9	1.95*1.15*1.8

本目錄中所有規格若有變動,恕不另行通知

Figures and data in this catalogue are subject to change without notice due to constant research and development

TABLE OF PRODUCT SPECIFICATION

產品規格表 (P/H/O SERIES)

MODEL	FS-45PSSO	FS-55PSSO	FS-65PSSO	FS-75PSSO	FS-90PSSO	FS-45PDSO	FS-55PDSO	FS-65PDSO	FS-75PDSO	FS-90PDSO	FS-45PTSO	FS-55PTSO	FS-65PTSO	FS-75PTSO	FS-90PTSO			
TYPE	Single Die Head 單模頭 / Single Station 單模架						Double Die-head 雙模頭 / Single Station 單模架						Three Die-head 參模頭 / Single Station 單模架					
1 Material	使用塑料																	
2 Screw diameter	螺桿直徑	mm	45	55	65	75	90	45	55	65	75	90	45	55	65	75	90	
3 Screw L/D ratio	螺桿比例	L/D	24/1	24/1	24/1	26/1	26/1	24/1	24/1	24/1	26/1	26/1	24/1	24/1	24/1	26/1	26/1	
4 Screw R.P.M. speed	螺桿轉速	r.p.m.	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60		
5 Inverter motor	變頻馬達	HP	10	10	20	30	60	7.5	10	20	30	60	7.5	10	20	30	60	
6 Oil hydraulic drive motor	幫浦驅動馬力	HP	7.5	10	15	15	30	7.5	10	15	15	30	7.5	10	15	15	30	
7 Optional air compressor	空氣壓縮機搭配馬力	HP	10	15	7.5	10	15	5	7.5	7.5	10	15	7.5	10	10	15	20	
8 Air pressurer	空氣壓力	kg/cm ²	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8		
9 Clamping force	鎖模壓力	Ton	1.5	4.4	6.9	10	13	3.3	4.4	6.9	10	13	3.9	4.4	6.9	10	13	
10 Oil tank capacity	油箱容量	Gallon	60	80	80	120	250	55	60	80	120	250	55	60	80	120	250	
11 Number of heaters	加熱點數	ZONE	4	5	5	5	7	6	7	8	8	10	8	9	10	10	12	
12 Heating capacity	加熱容量	KW	10	13.6	16.8	18	20.5	10.25	13.6	17.5	19	20.5	12	15	19.3	21.5	25	
13 Total install power	總電力	KW	21.5	30	43.5	48	62	22	29.5	37	50	62.5	23.5	32	39	52.5	67	
14 Extruding capacity per hour	押出量	kg/hr	32	36	55	75	100	24	36	55	75	100	24	36	55	75	100	
15 Dry circle	每小時空循環	time/hr	1030	880	720	650	650	1030	880	720	650	650	1000	850	720	650	650	
16 product capacity	產品容量	c.c./L	60-1000	150-2500	500-5000	5L-10L	10L-20L	40-500	100-1250	280-2200	0.5L-3.5L	1L-5L	20-325	40-825	100-1000	180-2000	1L-3L	
17 Product weight	產品重量	g.	4-20	5-40	40-280	200-370	500-900	5-40	10-100	20-170	40-170	80-280	5-25	10-50	10-90	15-145	15-200	
18 Max. diameter of product	產品最大直徑	m/m	65	70	50-200	80-260	150-340	20-70	30-85	40-100	40-130	100-160	20-55	30-55	30-80	95	110	
19 Extruding mouth outer diameter	模嘴外徑	m/m	42	50	150	200	280	42	50	65	80	150	37	40	55	80	98	
20 Mold center distance	模中心距離	m/m	*	*	*	*	*	100	120	140	160	200	85+85	100+100	120+120	120+120	140+140	
21 Clamping distance	開閉模極限	m/m	110-370	150-410	140-530	165-590	185-645	110-370	150-410	150-530	165-590	185-645	110-370	150-410	150-530	165-590	185-645	
22 Height of mold capacity	容模長度	m/m	370	400	480	500	520	370	400	480	500	520	370	400	480	500	520	
23 Width of mold capacity	容模寬度	m/m	300	320	430	520	600	300	350	430	520	600	300	350	430	520	600	
24 Machine net weight	機器淨重	kg	3000	3500	4400	7300	8300	3200	3700	4600	7500	8500	3400	3900	4900	7900	8900	
25 Machine dimension	機器尺寸	m	3x1.4x2.3	3.2x2x2.8	3.6*1.6*2.6	4.2*1.7*2.7	5.2*1.9*3.5	3*1.4*2.3	3*1.5*2.3	3.6*1.6*2.6	4.2*1.7*2.7	5.2*1.9*3.5	3*1.4*2.3	3*1.5*2.3	3*1.6*2.6	4.2*1.7*2.7	5.2*1.9*3.5	

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MODEL	FS-55PTDO	FS-65PTDO	FS-75PTDO	FS-90PTDO	FS-45PSSD	FS-55PSSD	FS-65PSSD	FS-75PSSD	FS-45 PSSV	FS-55 PSSV	FS-65 PSSV	FS-75 PSSV	FS-90PSSV			
TYPE	Three Die-head 參模頭 / Double Station 雙模架				Two-layer 雙層 / Single Die-head 單模頭 / Single Station 單模架				Single Die-head Single Station Viewstite 單模簡單模架加高視窗				Two Color 複色 / Single Head & Station 單頭單模架			
1 Material	使用塑料				PE/PP	PE/PP	PE/PP	PE/PP	PE	PE	PE	PE	PE/PP	PE/PP	PE	PE
2 Screw diameter	螺桿直徑	mm	55	65	75	90	45/25	55/25	65/25	75/25	45/25	55/25	65/25	75/25	90/25	90/25
3 Screw L/D ratio	螺桿比例	L/D	24/1	24/1	26/1	26/1	24/1	24/1	24/1	24/1	24/1	24/1	24/1	24/1	26/1	26/1
4 Screw R.P.M. speed	螺桿轉速	r.p.m.	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60
5 Inverter motor	變頻馬達	HP	10	20	30	60	7.5/2	10/2	20/2	30/2	7.5/2	10/2	20/2	30/2	60/2	60/2
6 Oil hydraulic drive motor	幫浦驅動馬力	HP	10	15	15	30	7.5	10	15	15	7.5	10	15	15	30	30
7 Optional air compressor	空氣壓縮機搭配馬力	HP	15	15	20	30	5	7.5	7.5	10	5	7.5	7.5	10	15	15
8 Air pressure	空氣壓力	kg/cm ²	4-6	5-7	5-7	6-8	4-6	5-7	5-7	5-7	4-6	4-6	5-7	5-7	5-7	5-7
9 Clamping force	鎖模壓力	Ton	4.4	6.9	10	13	3.3	4.4	6.9	10	3.9	4.4	6.9	9.5	9.5	13
10 Oil tank capacity	油箱容量	Gallon	80	120	160	250	55	60	80	120	55	60	80	120	250	250
11 Number of heaters	加熱點數	ZONE	9	10	10	12	6	7	7	7	6	7	7	7	7	9
12 Heating capacity	加熱容量	KW	15	19.3	21.5	25	12	15	19.5	22	11.5	14.5	18.8	23	29.5	29.5
13 Total install power	總電力	KW	32	40	56.5	68	25	32	40.5	44	24.5	31.5	40.5	54.5	72.5	72.5
14 Extruding capacity per hour	押出量	kg/hr	36	55	75	100	24	42	55	75	30	42	61	81	106	106
15 Dry circle	每小時空循環	time/hr	850*2	720*2	650*2	650*2	1030	880	720	650	1030	880	720	650	650	650
16 product capacity	產品容量	c.c./L	15-300	50-600	100-1000	280-2000	60-1000	150-2500	1L-5L	5L-10L	60-1000	150-2500	500-5000	5L-10L	10L-20L	10L-20L
17 Product weight	產品重量	g.	5-25	8-45	10-70	20-110	10-100	20-170	40-280	80-500	10-100	20-170	40-280	80-500	120-370	120-370
18 Max. diameter of product	產品最大直徑	m/m	10-55	20-70	30-90	40-90	20-100	30-140	50-200	80-260	20-100	30-140	50-200	80-260	150-340	150-340
19 Extruding mouth outer diameter	模嘴外徑	m/m	40	55	80	98	56	80	150	200	56	80	150	200	280	280
20 Mold center distance	模中心距離	m/m	100+100	120+120	120+120	140+140	*	*	*	*	*	*	*	*	*	*
21 Clamping distance	開閉模極限	m/m	150-410	150-530	165-590	185-645	110-370	150-410	150-530	165-590	110-370	150-410	150-530	165-590	185-645	185-645
22 Height of mold capacity	容模長度	m/m	400	480	500	520	370	400	480	500	370	400	480	500	520	520
23 Width of mold capacity	容模寬度	m/m	320	360	430	520	300	350	430	520	300	350	430	520	600	600
24 Machine net weight	機器淨重	kg	7800	8400	9400	10500	3800	4700	7600	8600	3600	3800	4700	7600	8600	8600
25 Machine dimension	機器尺寸	m	3*1.9*2.5	3.6*2.0*2.8	4.2*2.3*3.0	5.2*2.3*3.5	3*1.9*2.8	3.1*2*2.8	3.6*1.6*3.1	4.2*1.7*3.2	3*1.4*2.9	3*1.5*2.9	3.6*1.6*3.2	4.2*1.7*3.3	5.2*1.9*4.1	5.2*1.9*4.1

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FS-55 PFSD	FS-65 PFSD	FS-75 PFSD	FS-90 PFSD	FS-45PSDO	FS-55PSDO	FS-65PSDO	FS-75PSDO	FS-90PSDO	FS-100PSDO	FS-45PDDO	FS-55PDDO	FS-65PDDO	FS-75PDDO	FS-90PDDO	FS-100PDDO	FS-55PFDO	FS-65PFDO	FS-75PFDO	FS-90PFDO	FS-100PFDO
Four Die-head 脣模頭 / Single Station 單模架					Single Die-head 單模頭 / Double Station 雙模架					Double Die-head 襪模頭 / Double Station 雙模架					Four Die-head 脣模頭 / Double Station 雙模架					
PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP
55	65	75	90	45	55	65	75	90	100	45	55	65	75	90	100	55	65	75	90	100
24/1	24/1	26/1	24/1	24/1	24/1	24/1	26/1	26/1	28/1	24/1	24/1	24/1	26/1	26/1	28/1	24/1	24/1	26/1	26/1	28/1
15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60
10	15	30	60	7.5	10	20	30	60	75	10	10	20	30	60	75	10	20	30	60	75
10	15	15	30	7.5	10	15	15	30	40	7.5	10	15	15	30	40	10	15	15	30	40
15	15	20	20	10	15	15	20	30	30	10	15	15	20	30	30	15	15	20	30	30
6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8
4.4	6.9	10	13	3.9	4.4	6.9	10	13	26	3.9	4.4	6.9	10	13	26	4.4	6.9	10	13	26
60	80	120	250	60	80	120	160	250	300	60	80	120	160	250	300	80	120	160	250	300
11	13	13	15	4	5	5	5	7	9	6	7	8	8	10	16	11	13	13	15	23
16.5	20.8	25.7	30	9.5	12.5	16.8	18	20.5	35	10.25	13.6	17.5	19	22	37	16.5	20.8	25.7	27	39
33.5	44	61	72	22	28	37	53	63	111	26	30	38	54	65	113	23	40	51.5	70	115
36	55	75	100	24	36	55	75	100	180	32	36	55	75	100	180	36	55	75	100	180
750	750	650	650	1030*2	880*2	720*2	650*2	650*2	480*2	1030*2	880*2	720*2	650*2	650*2	480*2	750*2	750*2	650*2	650*2	480*2
30-300	100-500	300-1000	500-2500	40-500	65-1250	150-2500	500-5000	5L-10L	10L-20L	30-200	40-500	100-1000	280-2000	700-4000	2L-6L	50-250	100-400	200-600	250-1000	700-4000
10-25	10-40	15-90	40-170	5-40	10-100	20-170	40-280	80-450	500-1000	4-20	5-40	10-65	20-110	40-180	80-450	5-20	10-30	20-50	20-70	40-180
70	70	90	90	10-75	20-100	30-140	50-200	100-280	200-300	10-65	20-70	30-85	40-110	50-150	100-220	20-65	20-70	30-90	30-90	40-90
37	42	50	75	56	80	150	200	280	420	42	50	65	80	150	200	37	42	50	75	100
85+85+85		120+120+120		*	*	*	*	*	*	100	120	140	160	180	250	85+85+85	100+100+100	100+100+100	120+120+120	120+120+120
150-410	150-530	165-590	185-645	110-370	150-410	150-530	165-590	185-645	225-755	110-370	150-410	150-530	165-590	185-645	225-755	150-410	150-530	165-590	185-645	225-755
400	480	500	520	370	400	480	500	520	560	370	400	480	500	520	560	400	480	500	520	560
350	430	520	600	300	320	360	430	520	560	300	320	360	430	520	520	320	360	430	520	560
4100	5200	8300	9300	4500	5500	7900	8500	9700	11500	5000	6000	8200	9100	10100	11900	5500	6500	9700	10900	12500
3.1*1.8*2.3	3.1*1.9*2.9	4.3*2*3	5.3*2.2*3.7	3*1.8*2.5	3*1.9*2.5	3.6*2*2.8	4.2*2.3*3.0	5.2*2.3*3.5	6.2*2.5*4	3*1.8*2.5	3*1.9*2.5	3.6*2*2.8	4.2*2.3*3.0	5.2*2.3*3.5	6.2*2.5*4	3*2.2*2.7	3.6*2.3*3	4.2*2.6*3.2	5.2*2.6*3.7	6.2*2.6*4

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FS-45PDSV	FS-55PDSV	FS-65PDSV	FS-75PDSV	FS-90PDSV	FS-45PSSP	FS-55PSSP	FS-65PSSP	FS-45PSSO	FS-55PSSO	FS-65PSSO	FS-45PDSO	FS-55PDSO	FS-65PDSO	FS-45PSSO	FS-55PSSO	FS-65PSSO			
Double Die-head Single Station Viewstripes 雙模頭單模架加視窗					Single Die-head 單模頭 / Single Station 單模架					Single Die-head 單模頭 / Single Station 單模架					Double Die-head 叢模頭 / Single Station 單模架				
PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PC	PC	PC	PVC	PVC	PVC	PVC	PVC	PVC	PVC	PETG	PETG	PETG	PETG	PETG
45/25	55/25	65/25	75/25	90/25	45	55	65	45	55	65	45	55	65	45	55	65	45	55	65
24/1	24/1	24/1	26/1	26/1	26/1	26/1	26/1	24/1	24/1	24/1	24/1	24/1	24/1	24/1	26/1	26/1	26/1	26/1	26/1
15-60/5-25	15-60/5-25	15-60/5-25	15-60/5-25	15-60/5-25	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60	15-60
7.5/2	10/2	20/2	30/2	60/2	10	15	25	10	15	25	10	15	25	10	15	25	10	15	25
7.5	10	15	15	30	7.5	10	15	7.5	10	15	7.5	10	15	7.5	10	15	7.5	10	15
5	7.5	7.5	10	15	7.5	7.5	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7
4-6	5-7	5-7	5-7	6-8	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7	5-7
3.9	4.4	6.9	9.5	13	3.9	4.4	6.9	3.3	4.4	6.9	3.9	4.4	6.9	3.9	4.4	6.9	2.8	3.3	4.4
55	60	80	120	250	55	60	80	55	60	80	55	60	80	55	60	80	55	60	80
8	9	10	10	12	4	5	5	4	5	5	4	5	5	6	7	7	6	7	7
14.5	18.8	20.3	25	36	9.5	12.5	16.8	9.5	12.5	16.8	10.25	13.6	16.8	10.25	13.6	17.5	9.5	12.5	16.8
27.5	36.5	43	57	80	23	32	40	23	32	40	23.5	33	40	23.5	33	41	23	32	40
30	42	61	81	106	24	36	55	24	36	55	24	36	55	24	36	55	24	36	55
1030	800	720	650	1030	880	720	1030	880	720	1030	880	720	1030	880	720	1030	880	720	1030
40-500	100-1250	280-2200	0.5L-3.5L	1L-5L	200-900	300-1800	1L-4L	200-1000	500-2000	1L-4L	60-400	200-900	500-1500	200-900	500-1800	800-2500			
5-40	10-100	20-170	40-170	80-280	10-65	20-170	40-200	10-65	20-170	40-200	5-30	10-50	25-110	10-65	120-170	40-200			
20-70	30-85	40-100	40-130	100-160	20-90	30-120	50-200	10-100	30-140	50-200	20-70	30-85	40-95	10-90	30-120	50-180			
42	50	65	80	150	60	80	120	60	80	120	40	50	65	60	80	120			
100	120	140	160	200	*	*	*	*	*	*	100	120	140	*	*	*	*	*	*
110-370	150-410	150-530	165-590	185-645	110-370	150-410	150-530	110-370	150-410	150-530	110-370	150-410	150-530	110-370	150-410	150-530	110-370	150-410	150-530
370	400	480	500	520	370	400	480	370	400	480	370	400	480	370	400	480	370	400	480
300	350	430	520	600	300	350	430	300	350	430	300	350	430	300					

ACCUMULATOR BLOW MOLDING MACHINE

儲料式押出中空吹氣成型機



I 系列
SERIES

側向取出
Lateral Take-out



L 系列
SERIES

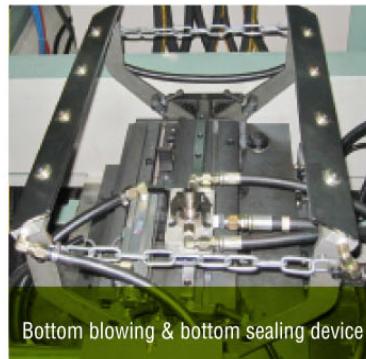
前向取出
Frontal Take-out



- 搭配德製傳動齒輪箱及日製變頻器驅動，無動力損耗，取代傳統型以油壓馬達驅動。
- 壓出平台可上下左右調整，採油壓馬達控制。
- 模頭設計為模頭心式，搭配油壓控制之射料活塞，儲料缸型採先進先出設計模頭，儲料迅速，縮短換色時間。
- 開閉模採德製滾珠線性螺桿，定位精準、移模穩定、模架裝配電眼等安全裝置，及搭配安全門。
- 油壓驅動吹針上下，有水冷卻裝置，下吹裝置及側吹裝置，可搭配生產水塔、化學桶、冰桶等異型產品。
- 空壓驅動之展料裝置，使成品圓周更均勻，適合吹塑大型容器。
- 選購之高夾取力機械手臂，附有冷卻系統以防止塑料黏附，將吹塑完成的成品，自動取出，使用輕量化鋁合金材質設計。
- 子母缸設計之油壓缸，子缸加速關模，驅動母缸鎖模，有效發揮油壓驅動高速效能，模架由導軌控制，移動迅速。
- 換模簡單、方便，客製化之油壓脫模裝置，對生產凹型的產品，可快速脫模
- 導柱式關模結構，使關模時模板平均受力，無模板結構變形之虞，上下平衡出力迫緊油缸設計。
- 油壓系統採YUKEN閥控制，壓力及流量比例式油壓迴路設計，壓力可依產品需求做多段控制，獨立式全密封油箱設計，保持油路最佳清潔度
- 獨立式控制主機，搭配富士FUJI 10.4"吋彩色觸控式螢幕，功能詳細、操作簡易、貼近人性化設計。

- Equip with gear box, made in Germany, and inverter, made in Japan, which can adjust screw ration speed and reduce power wastage.
- Extrusion platen can be adjusted up and down, leftwards and rightwards by the control of hydraulic motor.
- Die head is with special -designed core, hydraulic controlled injection piston and cylinder, and First in and First out design,which is capable of fast accumulation and shortens the time of changing color.
- Close and open mold is controller by linear slide way, make in Germany, for accurate positioning and stable carriage movement.Mold carriage is equipped with light curtain/electric eye protection, and safety gate.
- Blow pin movement is hydraulic-driven with water-cooling design. This machine is also with bottom blowing and side blowing option.
- Parison enlarger is pneumatic-driven, which makes equivalent products shape, suitable for blow molding huge containers.
- Optional robot arm is with water cooling design to avoid material stick, and is capable of taking our heavy products automatically. The material is light aluminum alloy.
- Mold carriage is operated by double piston cylinder. Sub Cylinder speed up mold close, and Main Cylinder is driven with higher clamping force.
- Carriage movement is controlled by slide rails for easy mold changing. Special-designed mold core-pull function is suitable for making concave products, such as handle jerry cans, expelling products rapidly.
- With guide bar of molds clamping, the mold platens are with equal clamping force, without the concern of platen deformation.Top and bottom clamping force is with main-cylinder design.
- Hydraulic system is YUKEN hydraulic valves with proportional flow and proportional pressure control circuit, which can be adjusted based on different products features. Separate and airtight oil tank maintains oil purity.
- Separate control cabinet is equipped with Fuji 10.4" colorful HMI.





MODEL	型號	FS-75ISSO	FS-90ISSO	FS-100ISSO	FS-120ISSO	FS-75LSSO	FS-90LSSO	FS-100LSSO	FS-120LSSO
TYPE	樣式	Single Die Head 單模頭 / Accumulator 儲料式							
1 Material	使用塑料	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP	PE/PP
2 Screw diameter	螺桿直徑 mm	75	90	100	120	75	90	100	120
3 Screw L/D ratio	螺桿比例 L/D	26/1	26/1	28/1	30/1	26/1	26/1	28/1	30/1
4 Screw R.P.M. speed	螺桿轉速 r.p.m.	20-65	20-65	20-65	20-65	20-65	20-65	20-65	20-65
5 Inverter motor	變頻馬達 HP	30	60	75	100	30	60	75	100
6 Oil hydraulic drive motor	幫浦驅動馬力 HP	15	30	40	75	15	30	40	75
7 Optional air compressor	空氣壓縮機搭配馬力 HP	15	20	20	20	15	20	20	20
8 Air pressurer	空氣壓力 Kg/cm ²	6-8	6-8	6-8	6-8	6-8	6-8	6-8	6-8
9 Clamping force	鎖模壓力 Ton	18	35	53	98	18	35	53	98
10 Oil tank capacity	油箱容量 Gallon	80	140	200	210	80	140	200	210
11 Number of heaters	加熱點數 ZONE	6	7	10	10	6	7	10	10
12 Heating capacity	加熱容量 KW	26	32	36	45	26	32	36	45
13 Total installed power	總電力 KW	60	92	111	150	60	92	111	176
14 Extruding capacity per hour	押出量 Kg/hr	100	140	180	210	100	140	210	270
15 Product capacity	產品容量 L	1-10	30-50	50-100	100-250	1-10	30-50	50-100	100-250
16 Extruding mouth outer diameter	模嘴外徑 mm	200	350	450	600	200	350	450	600
17 Power of thickness control	厚薄控制動力 HP	5	7.5	10	10	5	7.5	10	10
18 Clamping distance	開閉模極限 mm	220-700	340-1010	350-1200	500-1800	300-900	350-1050	350-1250	500-2300
19 Length of mold capacity	容模長度 mm	500	750	1200	1200	740	900	1200	1500
20 Width of mold capacity	容模寬度 mm	500	750	1000	1200	600	820	1000	1300
21 Machine net weight	機器淨重 ton	7.2	12	18	22	9	15	22	28
22 Machine dimension	機器尺寸 m	4.5*2.8*2.8	5.2*3.3*3.3	5.5*3.5*3.3	6*3.5*3.3	3.8*2.8*22.8	5*3*3.3	5.5*3.5*3.5	5.7*9.6*6

本目錄中所有規格若有變動,恕不另行通知 Figures and data in this catalogue are subject to change without notice due to constant research and development



- **20%** Virgin material outer layer /外層
- **80%** Regrind from scrap inner layer/內層

“ SAVE THE EARTH ; SAVE / REDUCE PLASTIC ! ”
友善地球；塑料減量，便利不減

塑膠製品為現代生活帶來許多便利。
然而，廢塑料的管理不當讓好處轉化為嚴重的環境問題。

從現在開始，大多數法律和政策都規定“考量目的性及必要性來使用塑膠製品將有助於減少環境污染”
從循環經濟的角度減少塑膠使用、推進再生設計是不可避免的趨勢。減碳、減塑，是未來一大課題。

鎧鑫的單層機，可以使用再生回收料，用於生產家庭日化品或戶外用品，如沐浴乳瓶等。
廣泛來說，只要非應用於食品/醫療包裝，其餘包裝容器皆可添加回收料，至於比例為何？這取決於客戶的需求。然而，鎧鑫的單層機，可滿足100%再生塑料製程，且不會影響產品品質。友善環境，讓塑膠原料更有效的回收再生循環利用。

不僅如此，鎧鑫的Co-ex（多層）吹瓶機擁有穩定且耐用的吹瓶成型工藝，最多可減少80%的全新塑料用量。
所有的多層機都屬於客製化，機器規格可以根據客戶的要求量身打造。

Plastic has provided many benefits to modern society. However, the improper handling of used packaging is turning its benefits into significant environmental problems.

From now on, most laws and policies regulate the “conscious and efficient use of plastic to reduce environmental pollution.” It is an inevitable trend to reduce the use of plastics and promote recycling design from the perspective of circular economy. Carbon reduction and plastic reduction are a priority in the future.

FULL SHINE single-layer machines can also be added with recycled materials for the production of household daily chemicals or outdoor products. Such as shower gel bottles, etc. From the perspective of all items, as long as it is not for food/medical purposes, Recycling materials can be added to the packaging container. In fact, it depends on the customer's needs. However, the FULL SHINE single-layer machine Plastics can use 100% recycled plastics without affecting product quality. It is environmentally friendly and allows plastic raw materials to be recycled more effectively.

Furthermore, FULL SHINE Co-ex (Multilayer) blow molding machine, brings a long-time proven bottle formation process that reduces up to 80% new resin plastic use. All co-extrusion machines are customized made, machine specification can request by customer need, custom made for all customers.

OPTIONAL EQUIPMENT

機械選配配備

Full Shine Blow Molding Shine your Creativity

Full Shine



攪拌機
Mixer



乾燥機
Hopper Dryer



吸料機
Auto Loader



比例器
Proportional Device



廣口瓶口切割機
Auto Jar Neck
Cutting Machine



測漏機
Leaking Tester



模內貼標機
In-mold Labeling
Machine



自動雙面貼標機
Auto 2-side
Labeling Machine



粉碎機
Crusher



色母計量器
Master-batch Feeder



氣/水冷式冷凍機
Air / Water
Cooling Chiller



吹塑及射出模具
Blow Mold &
Injection Mold



機台作動採伺服迴路
Servo Motor System
for Machine Movement



輸送帶
Belt-type Conveyor



工業用精密淨油機
Industrial Precise
Oil Filter



模溫機
Mold Temperature
Controller

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 **FullShine**

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