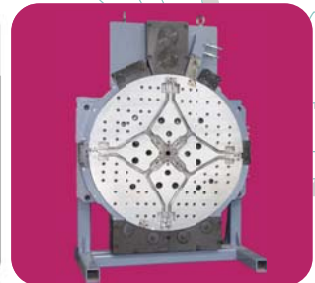
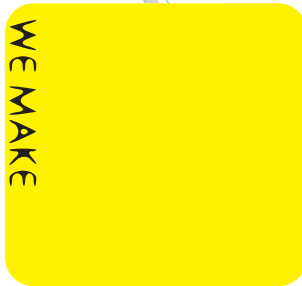


Inj. Molding Machine  
**Multitech**

百科机械



**多色 / 多物料**  
注塑成型系统综合解决方案  
**Multi-color / material**  
Injection Molding General Solution



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## 立式双色双物料注塑机 Vertical multi-color/material injection molding machine

V-2C——立式双色双物料注塑机 Vertical multi-color/material IMM. (with vertical injection)

H-2C——侧射式双色双物料注塑机 Vertical multi-color/material IMM. (with horizontal injection)

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## 独立射台系列

Independent injection unit series

mV/mH 微型射座 Micro-injection unit

Va 顶射台 Top injection unit

Ha 侧射台 Sided injection unit

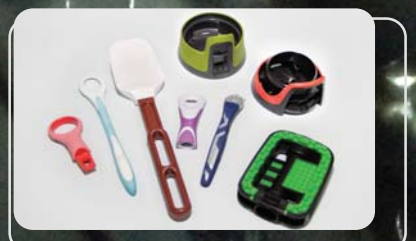
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独立  
转盘

Independent turntable

# 指引

# Index



## 卧式多色多物料注塑成型机 Multi-color multi-material horizontal injection molding machine

LMT-2C/3C——L型双射座系列 L90 double injection cylinders series

MT-2C——平行双射座系列 Parallel double injection cylinders series

### 应用案例—Application Example

三色剪刀 Three-color scissors

三色名片盒 Three-color cardcase

## 多色多物料注塑成型技术 Multi-color multi-material injection molding technology

转盘双色技术 Turn table two-color technology

转盘三色技术 Turn table three-color technology

转芯  
技术

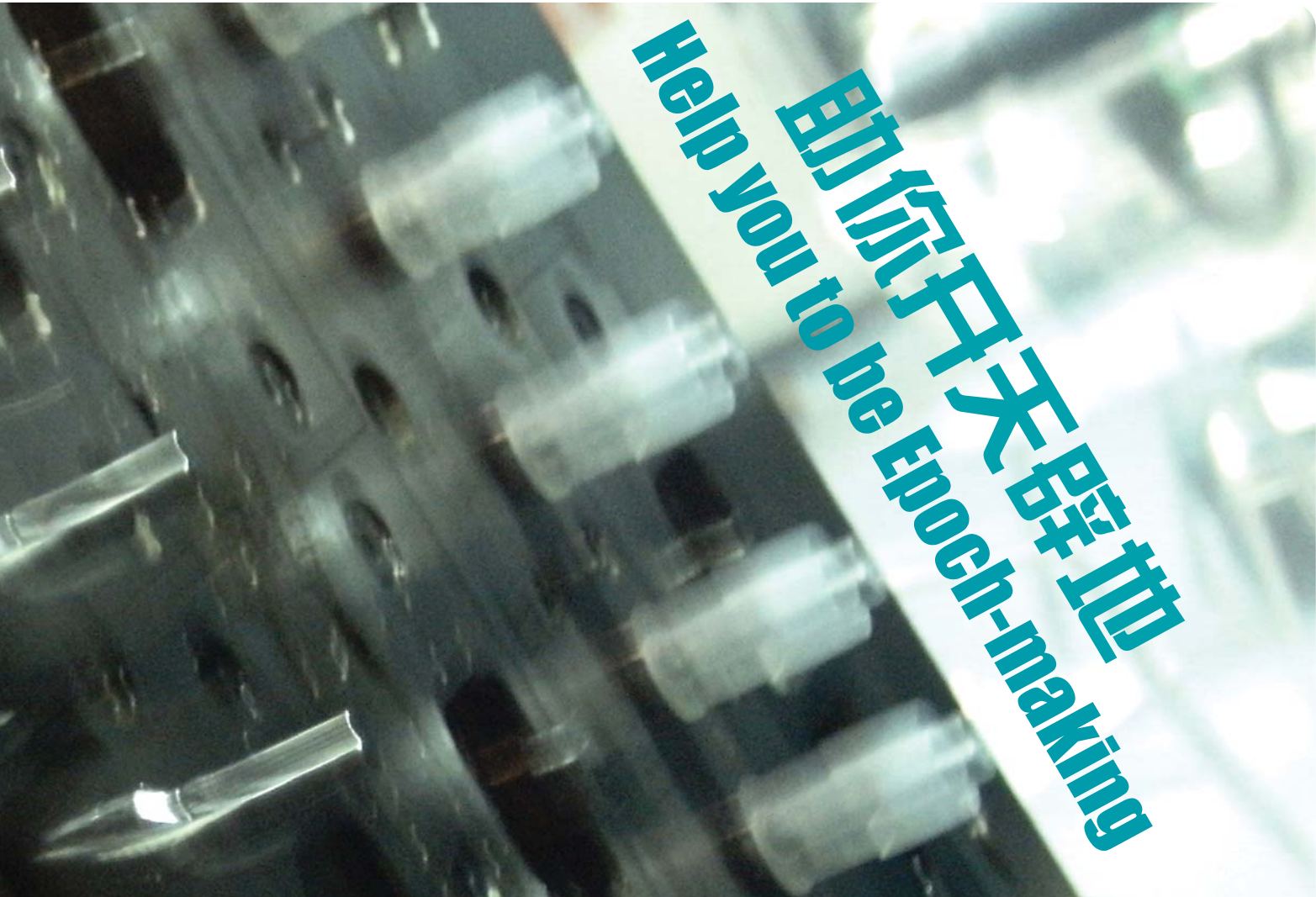
Turn core technology

缩芯  
注塑

Abbreviated core injection

移位  
注塑

Displacement injection

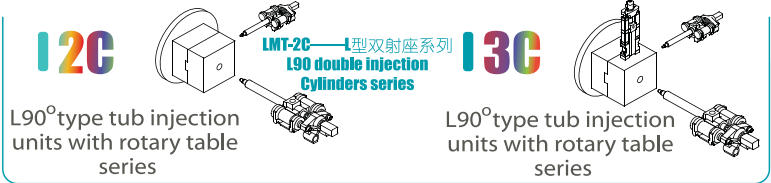


帮助你开天辟地  
Help you to be Epoch-making



# 卧式多色多物料注塑成型机

## 2c/3c-material injection molding machine



- 采用台湾LNC或奥地利KEBA新型高速精密控制器，辅以自主开发的软件程序，具有良好的人机交换性。
- 液压系统采用德国BOSCH大流量、高应答半闭比例阀及进口压力传感器，配合特别设计的高刚性油压回路，实现精密半闭控制，整个系统具有高响应，低噪音、低耗能之特点，同时具有极高的重复精度。
- 高精度转模装置，双工位双向180度往复旋转，采用伺服电机驱动，移模快速平稳，定位顺畅、精准。
- 两套独立的比例压力/流量控制油路，控制两套射出系统及顶出系统，可根据塑料制品的特点灵活多变的设置最优化的注塑工艺，确保注塑产品高生产质量，低成本周期，进而拥有更强的市场竞争力。
- 转盘式动模板设计，特别适合“单面覆盖注塑”的双色塑胶制品，也可使用两套普通模具（模厚一样）同时生产两种不同的单色塑胶制品。

Use of Tai Wan LNC or Austria KEBA the latest high speed precision controller, with self-developed software program, has the good man-machine interaction performance.

Hydraulic system with Germany Bosch large flow, high response half closed loop proportional valve and import pressure sensor, achieve precision half closed loop control. The overall system has the high response, the low noise and the low energy consumption as well as the extremely high repeat accuracy.

High precision mode change devices and digital duplex two way 180 degrees rotating back and forth, used by servo motor will cause shift mold to be quick and smooth, positioning to be smooth and accurate.

Two sets of independent proportion pressure/flow control oil circuit control two sets of injections system and ejector system, according to the characteristic of flexible settings to optimize the injection process, to ensure that the production of plastic products of high quality, low-cycle and thus has a stronger market competitiveness.

Turn table movable template design, particularly suitable for "one-side coverage injection" of the two color plastic products also use of two common mold (same mold thick) to produce two different color plastic products at the same time.



LMT180-3C (三色)

规格 Specification	机型 Model	单位 Unit	M30				A			B			C			D			
螺杆直径 Screw Diameter		mm	Φ18	Φ20	Φ22	Φ25	Φ25	Φ30	Φ35	Φ30	Φ35	Φ40	Φ35	Φ40	Φ45	Φ40	Φ45	Φ50	
螺杆行程 Screw Stroke		mm	120						140			160			220				
理论注射量 Theoretical Injection Volume		cm <sup>3</sup>	30	37	45	59	69	99	135	113	154	201	154	201	254	276	350	432	
注射质量(PS) Injection Weight (PS)		g(oz)	28.4(1)	35(1.2)	42(1.5)	54(1.9)	64(2.2)	93(3.2)	126(4.4)	105(3.7)	143(5)	187(6.6)	143(5)	187(6.6)	236(8.3)	257(9)	326(11.5)	402(14)	
塑化能力 Plasticizing Capacity		g/s	4.3	5.8	7.5	10.7	6	9	15	12.3	18.8	26.8	15	21.4	27.6	21.4	27.6	35.2	
射出速度 Injection Speed	主射胶系统 Main Inj.Sys	mm/s	LMT180-2C 282				LMT180-2C 179			LMT180-2C 133	LMT330-2C 259		LMT180-2C 103	LMT330-2C 210	LMT430-2C 235	LMT330-2C 159			LMT430-2C 187
射出速度 Injection Speed	副射胶系统 Sub Inj.Sys	mm/s	LMT180-2C 192				LMT180-2C 123	LMT330-2C 225		LMT180-2C 91	LMT330-2C 167	LMT430-2C 210	LMT330-2C 129		LMT430-2C 162	LMT330-2C 103			LMT430-2C 129
最大注射压力 Max Injection Pressure		Mpa(kgf/cm <sup>2</sup> )	349(3564)	283(2887)	233(2386)	181(1848)	286(2912)	198(2022)	146(1485)	267(2722)	196(2000)	150(1530)	254(2592)	195(1985)	154(1568)	245(2494)	193(1970)	156(1596)	
螺杆转速 Screw Speed Rotation		r.p.m	0~300				0~240			0~300			0~240			0~240			
喷嘴接触力 Nozzle Contact Force		kN(tf)	33.6(3.4)				40.7(4.1)			40.7(4.1)			56.8(5.8)			86.2(8.8)			
喷嘴突出模板尺寸 Nozzle Out From Platens		mm	≥45				≥45			≥45			≥45			≥45			
电热功率 Heater Power		kW	3				5.7			6.9			10			12.1			
温度控制段数 Temperature Control Segments			4				4			5			5			6			

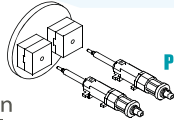
规格 Specification	机型 Model	单位 Unit	a			b			c			d			e			
螺杆直径 Screw Diameter		mm	Φ22	Φ25	Φ30	Φ25	Φ30	Φ35	Φ30	Φ35	Φ40	Φ35	Φ40	Φ45	Φ40	Φ45	Φ50	
螺杆行程 Screw Stroke		mm	120						140			160			220			
理论注射量 Theoretical Injection Volume		cm <sup>3</sup>	45.6	59	85	68.7	99	134.7	113	154	201	173	226	286	276.5	350	432	
注射质量(PS) Injection Weight (PS)		g(oz)	42.4(1.5)	54.8(1.9)	79(2.8)	64(2.2)	92(3.2)	125(4.4)	105(3.6)	143(5)	187(6.6)	161(5.7)	210(7.4)	266(9.4)	257(9)	325.5(11.5)	402(14)	
塑化能力 Plasticizing Capacity		g/s	5.3	7.5	12.3	6	9	15	12.3	18.8	26.8	15	21.4	27.6	21.4	27.6	35.2	
射出速度 Injection Speed	主射胶系统 Main Inj.Sys	mm/s	MT180-2C 194			MT180-2C 140	MT330-2C 272		MT180-2C 111	MT330-2C 216	MT430-2C 255		MT330-2C 161	MT430-2C 189	MT330-2C 129			MT430-2C 151
射出速度 Injection Speed	副射胶系统 Sub Inj.Sys	mm/s	MT180-2C 133	MT330-2C 243		MT180-2C 96	MT330-2C 176	MT430-2C 221	MT330-2C 140		MT430-2C 175	MT330-2C 104		MT430-2C 131	MT430-2C 104			
最大注射压力 Max Injection Pressure		Mpa(kgf/cm <sup>2</sup> )	340(3471)	263(2688)	183(1867)	365(3724)	253(2586)	186(1900)	320(3262)	234(2396)	180(1835)	314(3204)	240(2453)	190(1938)	302(3076)	238(2431)	193(1969)	
螺杆转速 Screw Speed Rotation		r.p.m	0~300			0~240			0~300			0~240			0~200			
喷嘴接触力 Nozzle Contact Force		kN(tf)	40.7(4.1)			40.7(4.1)			56.8(5.8)			86.2(8.7)			108.8(11.1)			
喷嘴突出模板尺寸 Nozzle Out From Platens		mm	≥45			≥45			≥45			≥45			≥45			
电热功率 Heater Power		kW	4.1			6			8.2			8.5			12.1			
温度控制段数 Temperature Control Segments			4			5			5			6			6			

- 射速达到200~280mm/s时射出油路必须提升为高响应方向阀控制;
- When injection speed reaches 200-280mm/s, injection hydraulic circuit must be upgraded to high response directional valve control;



I2C

Two parallel injection units with rotary table series



MT-2C——平行双射座系列  
Parallel double injection cylinders series



◀ MT330-2C [平行双色]



◀ MT180-2C [平行双色]

E			F		
Φ45	Φ50	Φ55	Φ60	Φ65	Φ70
	240			300	
382	471	570	848	995	1154
355(12.5)	438(15.4)	530(18.6)	788(27.8)	925(32.6)	1073(37.8)
18.6	23.7	29.1	37.4	45.4	54.5
LMT330-2C 126		LMT430-2C 148	LMT430-2C 88		
LMT430-2C 102					
244(2489)	198(2016)	163(1666)	198(2022)	169(1723)	146(1486)
	0~160			0~160	
	108.8(11.1)			134.3(13.7)	
	≥45			≥45	
	13			21	
	6			6	

f		
Φ45	Φ50	Φ55
	240	
381.7	471	570
355(12.5)	438(15.4)	530(18.7)
18.6	23.7	29.1
MT430-2C 140		
257(2625)	208(2126)	172(1757)
	0~230	
	134.3(13.7)	
	≥45	
	13.1	
	6	

规格 Specification	机型 Model	单位 Unit	LMT180-2C		MT180-2C		LMT330-2C		MT330-2C		LMT430-2C		MT430-2C	
			主射胶系统 Main Inj.Sys (M30)A,B,C	副射胶系统 Sub Inj.Sys (M30)A,B	主射胶系统 Main Inj.Sys a,b,c	副射胶系统 Sub Inj.Sys a,b	主射胶系统 Main Inj.Sys B,C,D,E	副射胶系统 Sub Inj.Sys A,B,C,D	主射胶系统 Main Inj.Sys b,c,d,e	副射胶系统 Sub Inj.Sys a,b,c,d	主射胶系统 Main Inj.Sys C,D,E,F	副射胶系统 Sub Inj.Sys B,C,D,E	主射胶系统 Main Inj.Sys c,d,e,f	副射胶系统 Sub Inj.Sys D,c,d,e
选用射胶系统 Option Injection System		Series.No	1764(180)		3234(330)		3234(330)		4214(430)		4214(430)		4214(430)	
锁模力 Clamping Force		kN(tf)	1764(180)		1764(180)		117.7(12)		117.7(12)		172.3(17.6)		172.3(17.6)	
开模行程 Opening Force		kN(tf)	63.9(6.5)		63.9(6.5)		850		850		950		950	
合格行程 Clamping Stroke		mm	600		600		280		280		350		350	
最小模厚 Min. Mold Thickness		mm	220		220		1130		1130		1300		1300	
最大开距 Max. Opening		mm	820		820		730*730		730*730		750*980		750*980	
柱间距(H*W) Distance Between Tie Bars		mm	530*630		530*630		690*690		690*690		845*845		845*845	
最大模具尺寸(H*W) Max Mold Size		mm	550*550		550*550		1000		1000		1600		1600	
最大移模重量 Max Mold Weight		KG	800		800		Φ980		Φ980		Φ1200		Φ1200	
转盘直径 Turntable Diameter		mm	Φ780		Φ780		180		180		200		200	
成品顶出距离 Ejector Distance		mm	150		150		78.4(8)		78.4(8)		122.5(12.5)		122.5(12.5)	
顶出力 Ejector Force		kN(tf)	59(6)		59(6)		3+3		3+3		17		3+3	
顶杆数量 Mandrel Number		pcs	13		3+3		17.2(175)		17.2(175)		17.2(175)		17.2(175)	
系统压力 System Pressure		Mpa(kgf/cm <sup>2</sup> )	17.2(175)		17.2(175)		820		820		930		930	
油箱容积 Oil Tank Capacity		L	400		400		45(60)		45(60)		55(75)		55(75)	
电机功率 Electric Power		kW(HP)	30(40)		30(40)		7610*3795		7485*1776		8215*4395		8215*2294	
机械尺寸 L*W Machine DimensionsH		mm	5668*2935 2130		5668*1600 2130		2420		2446		2670		2670	
机械重量 Machine Weight		tf	13.0		12.0		24.5		21.5		34.0		29.0	

- 射速达到281~400mm/s时射出油路必须提升为伺服阀控制; 如果不选配伺服阀, 射速将会限制在280mm/s以内
- When injection speed reaches 281 ~ 400mm / s, injection hydraulic circuit must be upgraded to servo valve control, if servo valve is not used, injection speed will be limited to 280mm / s or less

# 独立射台系列

## Independent injection unit series

### mV/mH 微型射座

micro-injection unit

- mV/mH系列微型射座包括射座和独立的落地式油压和电控单元，带脚轮的可移动式控制单元，移动快捷方便
- 可与现有任何注塑机连接，客户不用再投资双色或三色机，即可实现多物料注塑成型，优化生产系统，提高设备利用率
- 设备小巧玲珑，占地面积小，节能省电。
- 注塑单元结构紧凑，可垂直或水平地安装在模具上
- 拆装简单方便，只需经过简单的培训，客户就能自行拆装到任一塑机上
- 注塑单元安装具有较强的灵活性，模具入水设计可以有更多自由，进而可以简化模具结构
- 控制单元和主机的连接端口是电流输入/输出触点，非常简便
- 可选择较小的塑化量，实现微量注射



mH 微型射座  
micro-injection unit

- mV/mH series micro-injection unit included injection unit and independent floor type hydraulic and electric control unit. The portable control unit with casters can move fast and convenient.
- Any injection molding machine can be connected. Customers no longer need to invest two-color or tri-color machine and then realizes multi-material injection molding, optimize production systems and improve equipment utilization
- The equipment is small and exquisite; less occupying land area, energy saving.
- The construction of the injection molding unit is compact and can be installed directly onto the mould, either horizontally or vertically.
- Easy disassembly. After simple training, customer will be able to disassemble and reinstall on other press
- Injection unit has a strong flexibility to install, design of the injection point for mold can have more freedom and then the mold structure can be simplified
- The connection port of the control unit and main engine's is the current input/output electronic contact. It is simple
- Can choose a smaller amount of plasticizer to achieve micro-injection.



mV 微型射座  
micro-injection unit

### mV/mH 控制单元

Control unit



规格 SPECIFICATION	机型 Model	单位 Unit	mV-28		mH-28	
			Φ16	Φ18	Φ20	Φ22
螺杆直径	Screw Diameter	mm	Φ16	Φ18	Φ20	Φ22
理论注射量	Theoretical Injection Volume	cm <sup>3</sup>	22	28	34.5	41.8
注塑质量 (PS)	Injection Weight(PS)	g(oz)	20.5(0.7)	26(0.92)	32(1.1)	38.8(1.3)
最大注射压力	Max.Injection Pressure	Mpa(kgf/cm <sup>2</sup> )	214 (2187)	169 (1728)	137 (1400)	113 (1157)
射出速率	Injection Rate	cm <sup>3</sup> /s	36	46	58	68.5
射出速度	Injection Speed	mm/s	180		180	
螺杆转速	Screw Speed Rotation	r.p.m	0~220		0~220	
射嘴突出安装面	Nozzle Out From installation base	mm	≥ 20		—	
系统压力	System Pressure	Mpa(kgf/cm <sup>2</sup> )	17.2(175)		17.2(175)	
油箱容量	Oil Tank Capacity	L	50		50	
电机功率	Electric Power	KW(HP)	5.5(7.5)		5.5(7.5)	
电热功率	Heater Power	KW	2.5		2.5	
机械尺寸	Machine Dimensions	mm	477*447 1180(1410)		1125*616 1898	
机械重量	Machine Weight	tf	0.15		0.4	

直接安装在模具上  
Install on mold directly

# Va 顶射台

top injection unit

直接安装在哥林柱上  
Install on tie bar directly



- 此系列副射台包括射座和独立的落地式油压和电控单元，带脚轮的可移动式控制单元，移动快捷方便
  - 可与现有任何注塑机连接，客户不用再投资双色或三色机，即可实现多物料注塑成型，优化生产系统，提高设备利用率
  - 此系列副射台垂直安装在注塑机定模板上，可以节省机器占地空间
  - 拆装简单方便，只需经过简单的培训，客户就能自行拆装到任一塑机上
  - 此系列副射台提供多种规格可选择，能最大范围的满足客户需求
- Va series top-injection unit included injection unit and independent floor type hydraulic and electric control unit. The portable control unit with casters can move fast and convenient.**
- Any injection molding machine can be connected. Customers no longer need to invest two-color or tri-color machine and then realizes multi-material injection molding, optimize production systems and improve equipment utilization.**
- This deputy injection unit is installed vertically in the fixed platen of the injection molding machine so as to save floor space.**
- Easy disassembly. After simple training, customer will be able to disassemble and reinstall on any machines.**
- This deputy injection unit have various specifications can be chosen, great extent to meet customers requirements.**

规格 SPECIFICATION	机型 Model	单位 Unit	Va56					Va110			Va180		
			Φ18	Φ20	Φ22	Φ25	Φ28	Φ28	Φ32	Φ36	Φ38	Φ42	Φ46
螺杆直径 Screw Diameter		mm	Φ18	Φ20	Φ22	Φ25	Φ28	Φ28	Φ32	Φ36	Φ38	Φ42	Φ46
理论注射量 Theoretical Injection Volume		cm <sup>3</sup>	29	36	44	56	71	89	112	142	159	194	233
注塑质量 (PS) Injection Weight(PS)		g(oz)	27(0.95)	33.6(1.2)	41(1.4)	52(1.8)	66(2.3)	80(2.8)	104(3.6)	132(4.6)	148(5.2)	180(6.4)	216(7.6)
最大注射压力 Max.Injection Pressure		Mpa(kgf/cm <sup>2</sup> )	318 (3241)	257 (2625)	213 (2169)	164 (1680)	131 (1339)	191 (1953)	146 (1495)	115 (1181)	202 (2066)	166 (1691)	138 (1410)
射出速率 Injection Rate		cm <sup>3</sup> /s	43	52	64	82	104	89	116	147	121	148	178
射出速度 Injection Speed		mm/s	169					144			107		
螺杆转速 Screw Speed Rotation		r.p.m	0~240					0~240			0~240		
喷嘴突出安装面 Nozzle Out From installation base		mm	≥45					≥45			≥45		
系统压力 System Pressure		Mpa(kgf/cm <sup>2</sup> )	17.2(175)					17.2(175)			17.2(175)		
油箱容量 Oil Tank Capacity		L	110					110			160		
电机功率 Electric Power		KW(HP)	7.5(10)					7.5(10)			15(20)		
电热功率 Heater Power		KW	3.6					5.5			8.5		
机械尺寸 Machine Dimensions	L*W*H	mm	●(975)*958 1387					●(1130)*953 1596			●(1176)*952 2041		
机械重量 Machine Weight		tf	0.6					0.9			1.2		

- 考虑使用安装，定模板外形尺寸必须 ≥ 括号内定尺寸，才能配此射台；
- For installation, the Length of fixed molding platen must be over the length of the injection unit.

# Ha 侧射台

sided injection unit



直接安装在哥林柱上  
Install on tie bar directly

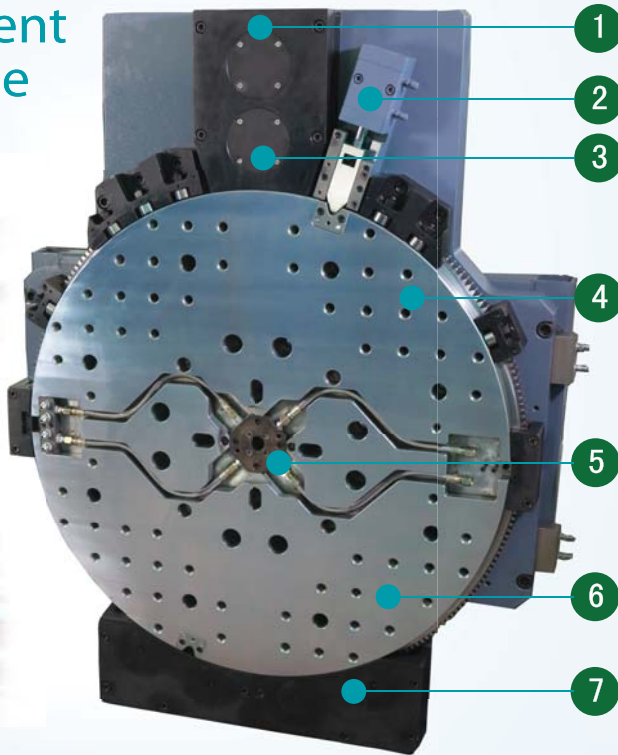
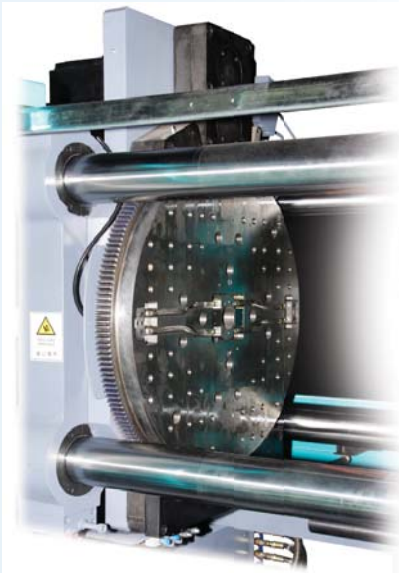
- 此系列副射台的射座和油压、电控单元集成在一起，结构布局配管简洁合理
  - 可与现有任何注塑机连接，客户不用再投资双色或三色机，即可实现多物料注塑成型，优化生产系统，提高设备利用率
  - 拆装简单方便，只需经过简单的培训，客户就能自行拆装到任一塑机上
  - 此系列副射台水平安装在注塑机侧面，高度比较低，不受屋顶天花高度限制
  - 此系列副射台提供多种规格可选择，可提供比较大的射胶量，能最大范围的满足客户需求
- The injection unit, hydraulic and electric control unit of this deputy injection unit in this series integrated together can provide a simple and reasonable piping layout and structure.**
- Any injection molding machine can be connected. Customers no longer need to invest two-color or tri-color machine and then realizes multi-material injection molding, optimize production systems and improve equipment utilization.**
- Easy disassembly. After simple training, customer will be able to disassemble and reinstall on any machines.**
- This deputy injection unit is installed directly onto the side of the injection molding machine horizontally. Since the height is quite low, it is not limited due to ceiling height restrictions.**
- This deputy injection unit have various specifications can be chosen and can provide a relatively large injection volume, great extent to meet customers requirements.**

规格 SPECIFICATION	机型 Model	单位 Unit	Ha60			Ha100			Ha200		
			Φ22	Φ25	Φ28	Φ25	Φ30	Φ35	Φ35	Φ40	Φ45
螺杆直径 Screw Diameter		mm	Φ22	Φ25	Φ28	Φ25	Φ30	Φ35	Φ35	Φ40	Φ45
理论注射量 Theoretical Injection Volume		cm <sup>3</sup>	46	59	74	69	99	135	154	201	254
注塑质量 (PS) Injection Weight(PS)		g(oz)	43(1.5)	55(1.9)	69(2.4)	64(2.2)	93(3.2)	126(4.4)	143(5.0)	187(6.6)	236(8.3)
最大注射压力 Max.Injection Pressure		Mpa(kgf/cm <sup>2</sup> )	234 (2386)	181 (1848)	144 (1473)	286 (2912)	198 (2022)	146 (1485)	254 (2592)	159 (1685)	154 (1568)
射出速率 Injection Rate		cm <sup>3</sup> /s	49	63	79	69	99	135	126	165	208
射出速度 Injection Speed		mm/s	128			140			131		
螺杆转速 Screw Speed Rotation		r.p.m	0~265			0~240			0~240		
系统压力 System Pressure		Mpa(kgf/cm <sup>2</sup> )	17.2(175)			17.2(175)			17.2(175)		
油箱容量 Oil Tank Capacity		L	120			160			160		
电机功率 Electric Power		KW(HP)	7.5(10)			11(15)			22.5(30)		
电热功率 Heater Power		KW	4			5.7			9		
机械尺寸 Machine Dimensions	L*W*H	mm	1775(2150)*1557 1432(1700)			2065(2440)*1550 1842(1942)			2367(2742)*1705 1527(1711)		
机械重量 Machine Weight		tf	1.6			1.8			2.3		



# R独立转盘

independent turn table



## R独立转盘标准参数

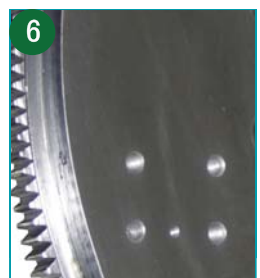
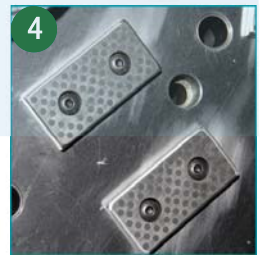
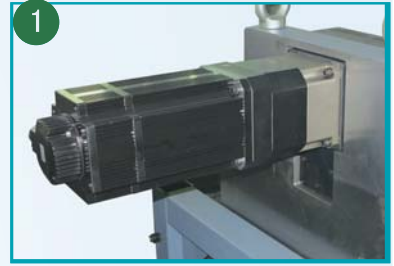
R turn table standard parameter

机型 Model	单位 Unit	转盘直径 Dia (mm)	安装最小柱间距 Distance Between Tie bars (mm)	机台最小柱开距 Min.Opening (mm)	转盘重量 Turntable Weight (Kg)	水路 Water Manifold (进水) (出水) (In) (Out)	转盘厚度 Turntable Thickne (mm)
R520		Φ520	410*410	615	380	(主路) 1 1 (main) (1set) (分路) 2 2 (sub) (2sets)	120
R600		Φ600	460*460	780	450	(主路) 1 1 (main) (1set) (分路) 2 2 (sub) (2sets)	120
R750		Φ750	560*560	900	900	(主路) 1 1 (main) (1set) (分路) 2 2 (sub) (2sets)	150
R850		Φ850	630*630	1000	1300	(主路) 2 2 (main) (2sets)	170
R980		Φ980	710*710	1200	1450	(主路) 2 2 (main) (2sets)	170
R1100		Φ1100	810*810	1300	1800	(主路) 2 2 (main) (2sets) (分路) 4 4 (sub) (4sets)	180
R1200		Φ1200	880*880	1400	2200	(主路) 2 2 (main) (2sets) (分路) 4 4 (sub) (4sets)	180

● 机台在安装转盘后的最大开距=机台原最大开距-转盘厚度

● Opening after turn table installation = Max. opening of horizontal injection molding machine - Thickness of turn table

- 1 精密伺服电机驱动，旋转快速平稳，停止位置准确  
Precision servo motor-driven, fast and smooth rotation, the stop position is accurate
  - 2 精密定位装置  
Lock pin equipment
  - 3 高效率齿轮传动结构  
High efficiency gear transmission structure
  - 4 高耐磨平面自润滑耐磨片支承，摩擦力极小并且无需加润滑油  
Self-lubricating wear-resistant surface with high wear-resistant film support, minimal friction and oil less
  - 5 中央同步运水装置，可选择油、水、气、讯号回路  
Simultaneous water transport device, can choose water, air and signal circuit
  - 6 盘面镀铬防锈，美观耐用  
The chrome-plate surface will be rust-proof, beautiful and durable.
  - 7 特别设计转盘支承结构，有效防止装模后转盘前倾下垂  
The special design turntable supporting structure effectively prevents the drooping forward of the turntable after being installed.
- ★ 自带转盘控制系统，可以选择原机控制  
Turn table could be self-controlled or controlled by original machine control.
  - ★ 安装简便，维护成本低  
Easy installation, low maintenance costs



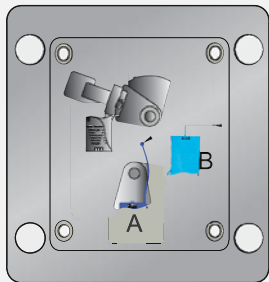
转盘最大负载 Max.Mold Weight (Kg)	转动角度 Angle of Rotation (度Degree)	合适机台案例 Machine Brand Case (厂家Machine)	
600	0-180°-0 (正反L/R turn 180°)	住友 SUMITOMO SE75T 德马格 Demag80T	雅宝 Arburg 100T 海天 HaiTian MA1200
600	0-180°-0 (正反L/R turn 180°)	住友 SUMITOMO SE100T/130T 发那科 FANUC S150iA 德马格 Demag110T/125T 恩格尔 Engel120T	雅宝 Arburg150T 日精 NISSEI FNX110T/140T
1000	0-180°-0 (正反L/R turn 180°)	住友 SUMITOMO SE180T 德马格 Demag200T	雅宝 Arburg200T 海天 HaiTian MA2500
1100	0-180°-0 (正反L/R turn 180°)	住友 SUMITOMO SE200T/250T 发那科 FANUC S-2000i250B 德马格 Demag 250T	雅宝 Arburg 250T 海天 HaiTian MA2500 恩格尔 Engel 220T
1200	0-180°-0 (正反L/R turn 180°)	住友 SUMITOMO SE280T/315T 发那科 FANUC S-300A 德马格 Demag350T	雅宝 Arburg320T 海天 HaiTian MA3800
1300	0-180°-0 (正反L/R turn 180°)	住友 SUMITOMO SE350T/385T 德马格 Demag420T	雅宝 Arburg400T 海天 HaiTian MA4700/5300
1500	0-180°-0 (正反L/R turn 180°)	住友 SUMITOMO SE450T/500T 德马格 Demag 500T	雅宝 Arburg500T 海天 HaiTian MA6000

# 应用案例 Example

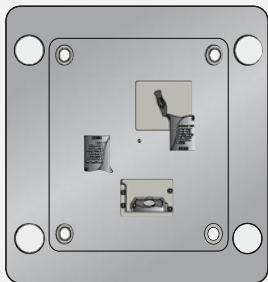


## 三色名片盒 Three-color cardcase

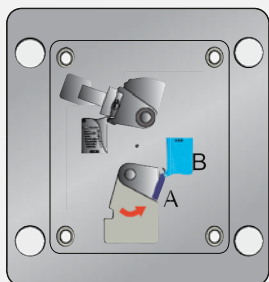
### 活动模板 movable Platen 定模板 fixed Platen



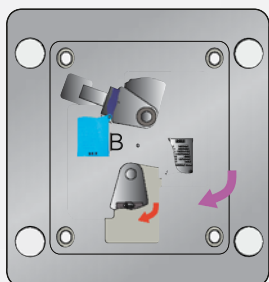
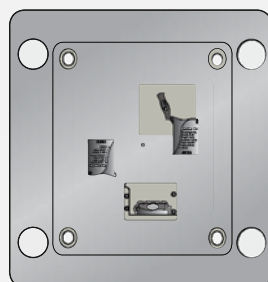
主射台注射第一色 (盒盖)  
The 1st Injection Unit  
侧射台注射第二色 (盒身)  
The 2nd Injection unit



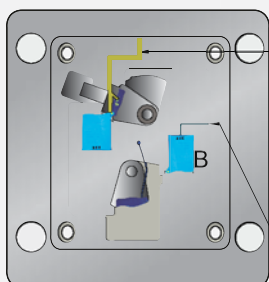
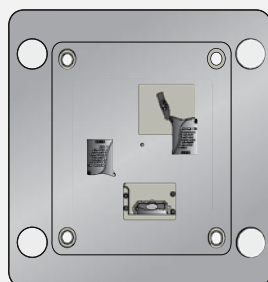
开模后, A, B组件留在模具模台上  
After mold open, Mold components A, B stay on the dynamic model



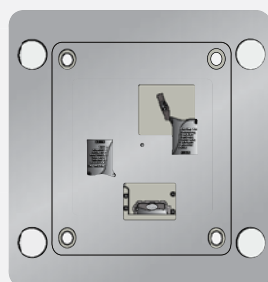
开模后, 转芯托出至某个位置时, 通过模具上的机构, 使摆块逆时针旋转70度将组件A, B组装在一起  
Mold open end, centre rod move forward, at the same time, Coil A turn counterclockwise at 70, Assemble Coil A, Coil B plastic components



转芯带动模具转70度后, 转芯回缩在回缩至某个位置时, 通过模具上的机构, 使摆块顺时针旋转70度复位  
Centre Rod turn 180 and move backward to the mold base, at the same time, the Empty Coil A Coil B disconnect to their own position



顶射台注射第三色 (转轴 LOGO)  
The 3rd Injection Unit (at the top)  
侧射台注射下一循环的第二色 (盒身)  
The 2nd Injection Unit (at the side door)  
主射台注射下一循环的第一色 (盒盖)  
The 1st Injection Unit (at the center position)



合模注射第三色 (转轴 LOGO), 同时注射下一摸的第一, 二色 (盒盖, 盒身)  
Mold close and start the production again from 2nd production cycle in jecton unit 1st, 2nd, 3rd production at the same time

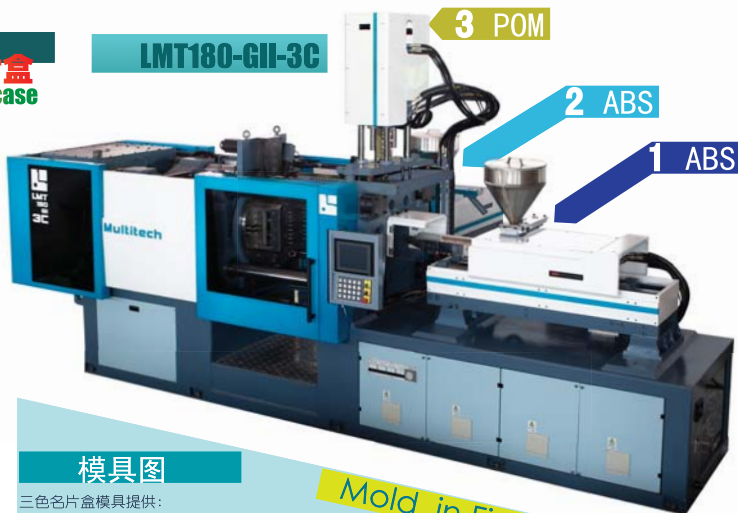
## 流程说明 Process description:

合模 => 主射台注射第一色 (盒盖), 侧射台注射第二色 (盒身)

注1 => 开模 => 转芯托出, 通过模具上的机构, 使摆块逆时针旋转70度, 将组件A&B 组装在一起 => 转芯旋转180度 => 转芯回缩, 通过模具上的机构, 使摆块顺时针旋转70度复位 => 合模 => 三射台同时注射, 注射一, 二, 三色注2 => 开模 => 产品顶出 => 顶退 => 合模 => (进入下一循环)

注1 每次生产时注射第一啤只有主射台和侧射台射胶, 此后每啤三个射台都要射胶

注2 第三色注射 (转轴, LOGO), 完成一个名片盒, 同时第一, 二色分别注射 (盒盖, 盒身)

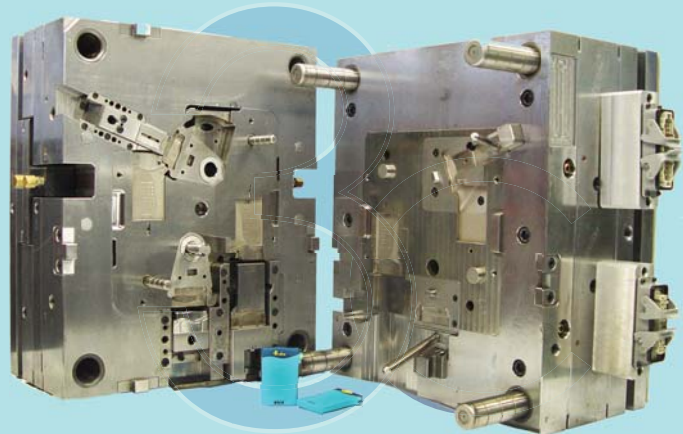


### 模具图

三色名片盒模具提供:  
3-component tool manufactured by:



Mold in Figure



### 产品图

3 POM (销轴, LOGO)

1 ABS (盒盖)

2 ABS (盒身)



Mold closed => 1st in jecton unit and 2nd in jecton unit process at the same time Note 1 => Mold opened => center-Rod rotated counterclockwise at 70 to assembly the pastic component => Centre Coil rotated 180 => Centre-Rod move back machanical structure will separate the empty coil => Mold closed => In jecton unit 1st, 2nd and 3rd process at the same time Note 2 => Mold oppend => Ejector forward => Ejector backward => Mold closed => start the auto mode production

Note 1 During each new production the first cycle only 1st & 2nd in jecton unit processed

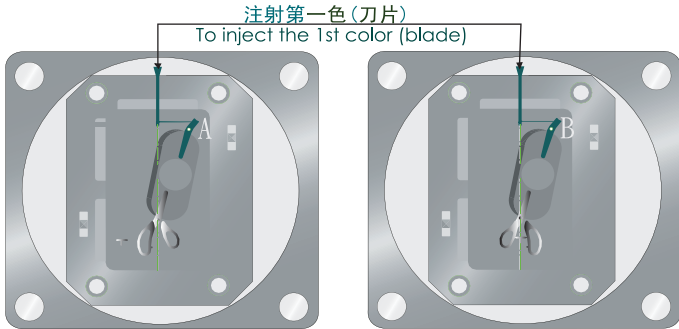
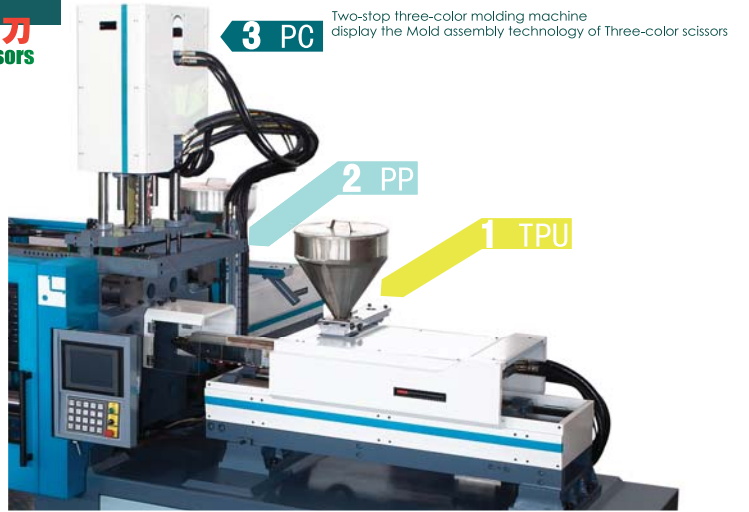
Note 2 A fter first cycle, all the process for in jecton by 1st, 2nd & 3rd in jecton unit



# 应用案例 Example

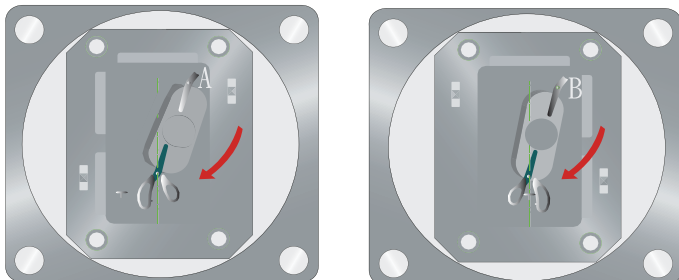
## 三色剪刀 Three-color scissors

活动模板 movable Platen 定模板 fixed Platen



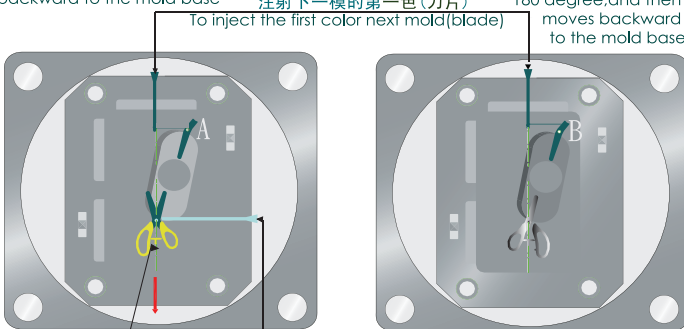
开模后, A组件留在动模上  
Component A stays on the movable mold

B组件留在定模上  
Component B stays on the fixed mold



开模后, 动模“模芯”托起, 旋转180° 后回位  
After mold opening, centre rod moves forward and then turns 180 degree, and then moves backward to the mold base

定模“模芯”托起, 旋转180° 后回位  
Centre rod of fixed mold moves forward and then turns 180 degree, and then moves backward to the mold base



合模, 注射第二色(转轴)  
Mold closed and then inject the 2nd color (shaft)

合模, 注射第三色(刀柄)  
Mold closed and then inject the 3rd color (hilt)

合模, 注射第二、三色(转轴、刀柄), 同时注射下一模的第一色(刀片)  
After mold closed, injects 2nd and 3rd color (shaft, hilt), injection 1st (blade) is processed for next cycle at the same time

### 模具图 Mold in Figure

### Mold in Figure



三色剪刀模具提供:  
3-component tool manufactured by:

HONGRITA | 鸿利捷

### 流程说明 Process description:

合模 => 顶射台注射第一色(刀片) 注1 => 开模 => 产品顶出 注2 => 顶退 => 动定模“模芯”托出, 旋转180°, 动定模“模芯”回位 => 合模三射台同时注射。  
注射一、二、三色 注3 => 开模 => 产品顶出 => 顶退 => 动定模“模芯”托出, 旋转180°, 动定模“模芯”回位 => 合模 => (进入下一循环)

Mold closed => 1st injection (blade) Note 1 => Mold open => Ejector forward Note 2 => Ejector backward => Centre rod move forward and turn 180 degrees, centre rod move backward => Mold closed and injection unit 1st 2nd and 3rd process at the same time Note 3 => Mold open => Ejector forward => Ejector backward => Centre rod move forward and turn 180 degrees, centre rod move backward => Mold close => (Start the auto mold production)

- 注1 每次生产时第一啤只有顶射台射胶, 此后每啤三个射台都要射胶  
Note 1 During each new production for the first cycle, only 1st & 2nd injection unit process. For next cycle, 1st, 2nd and 3rd injection unit process at the same time
- 注2 每次生产时第一啤只有顶射台射胶, 还没有形成一个完整的产品, 所以有顶出动作, 但无产品顶出  
Note 2 During each new production for the first cycle, only 1st injection and ejector forward process. There is no complete product ejected.
- 注3 二、三色分别注射转轴、刀柄, 完成一把剪刀, 同时第一色注射下一模的刀片  
Note 3 The 2nd & 3rd color to inject shaft and hilt to complete a scissors. In the meantime, the first color injects the blade for next cycle



### 产品图

3 PC 三色三物料  
Three-color three materials

2 PP

1 TPU

两站式三色成型机  
展示三色剪刀模内装配技术

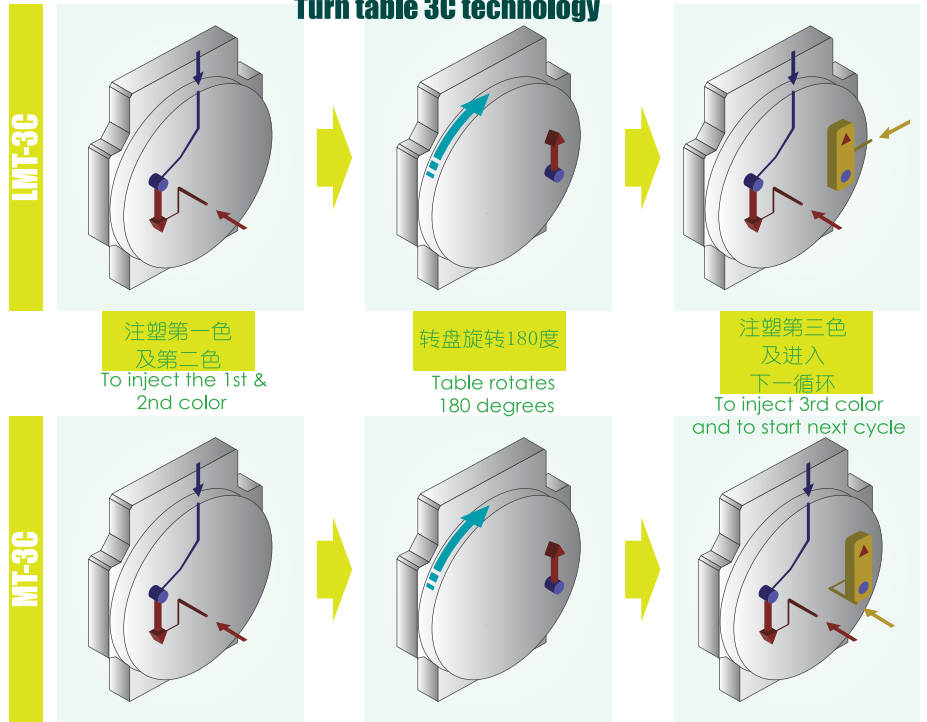
# 多色多物料注塑成型技术

Multi-color multi-material injection molding technology



## 转盘三色技术

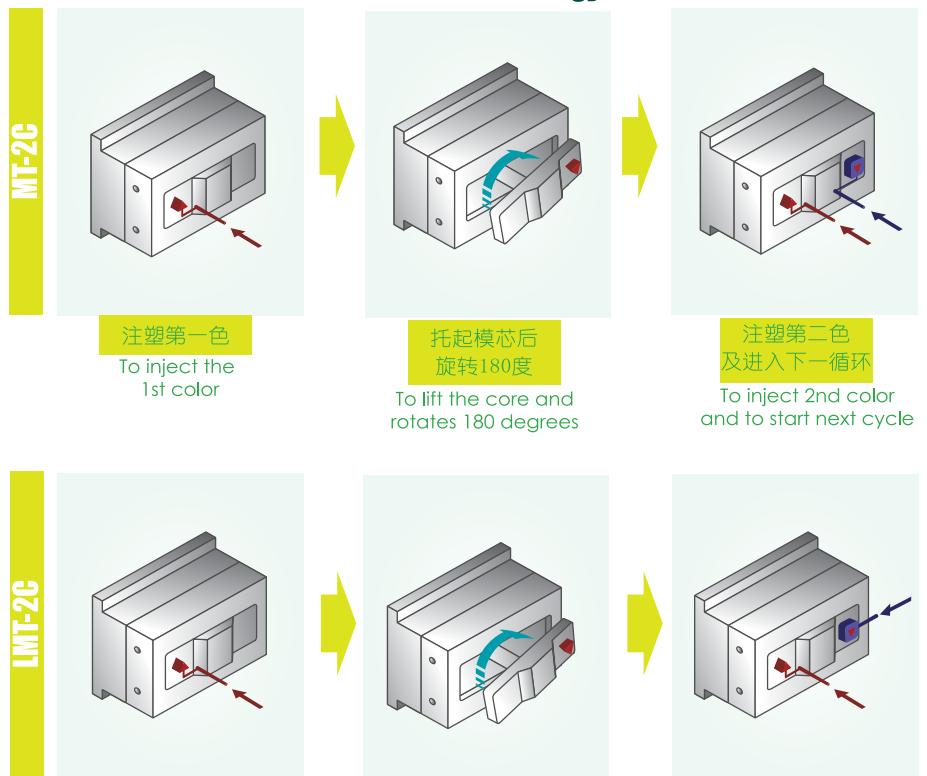
Turn table 3C technology



第一工位注入两种不同色别的胶料, 转盘旋转 180 度至第二工位即末工位, 完成第三种胶料的注塑  
After 1st & 2nd color injection finished at 1st station table, rotates 180 degrees into 2nd station to inject 3rd color

## 转芯技术

Turn core 2C technology



第一工位注塑完成后将“模芯”托起, 再旋转180度, 完成第二色的注塑, 可生产第二色胶料包裹或穿越第一色胶料的产品

Upon completion of the first color injection mold core hold up, and then rotated 180 degrees to complete the injection of the second color. To produce the second color of the plastic material wrapped through the first color of the rubber products



## 应用案例 Example

### Va 頂射台 top injection unit

客戶在開廠初期，所投入的注塑機以單色臥式機為主。後期業務擴展，需要考慮雙物料注射成型方案。以百科的頂射台Va 110 (射膠量: 110-140g)配合他們的進口單色臥式機。客戶主要以此機種生產雙色的運動產品。

At the beginning, the customer only invested the horizontal machines. Later on, it needs the two-shot molding because of business growing. To be cost effective, it decided to install Multitech top injection single color unit-Va 110 (Injection volume: 110-140g) on their imported horizontal injection machines. The customer mainly produces sport products by using this combination.



客戶廠房實景拍攝  
Real factory photo from customer

客戶名稱：  **OECHSLER** 裕克施樂塑料制品(太倉)有限公司

## 应用案例 Example

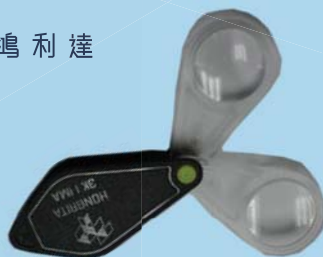
### mV/ mH 微型射座 Micro-injection unit

針對第二啤射膠量不多，微型射座是另一選擇。客戶以百科的微型射座mH-28 (射膠量:1-3g)配合他們的單色進口臥式機，主要生產雙色的醫療產品。另外，客戶亦把其配合至雙色進口臥式機，以生產三色的生活用品。

Micro-injection unit is another option if the second shot is smaller amount of plasticizer. The customer installed Multitech micro-injection unit mH-28 (injection volume: 1-3g) on their imported single color and two color horizontal injection machines. The customer mainly produces medical and lifestyle products by using this combination.



客戶名稱：  **HONGRITA** | 鴻利達



客戶廠房實景拍攝  
Real factory photo from customer



Representative/Agent



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2017-08

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