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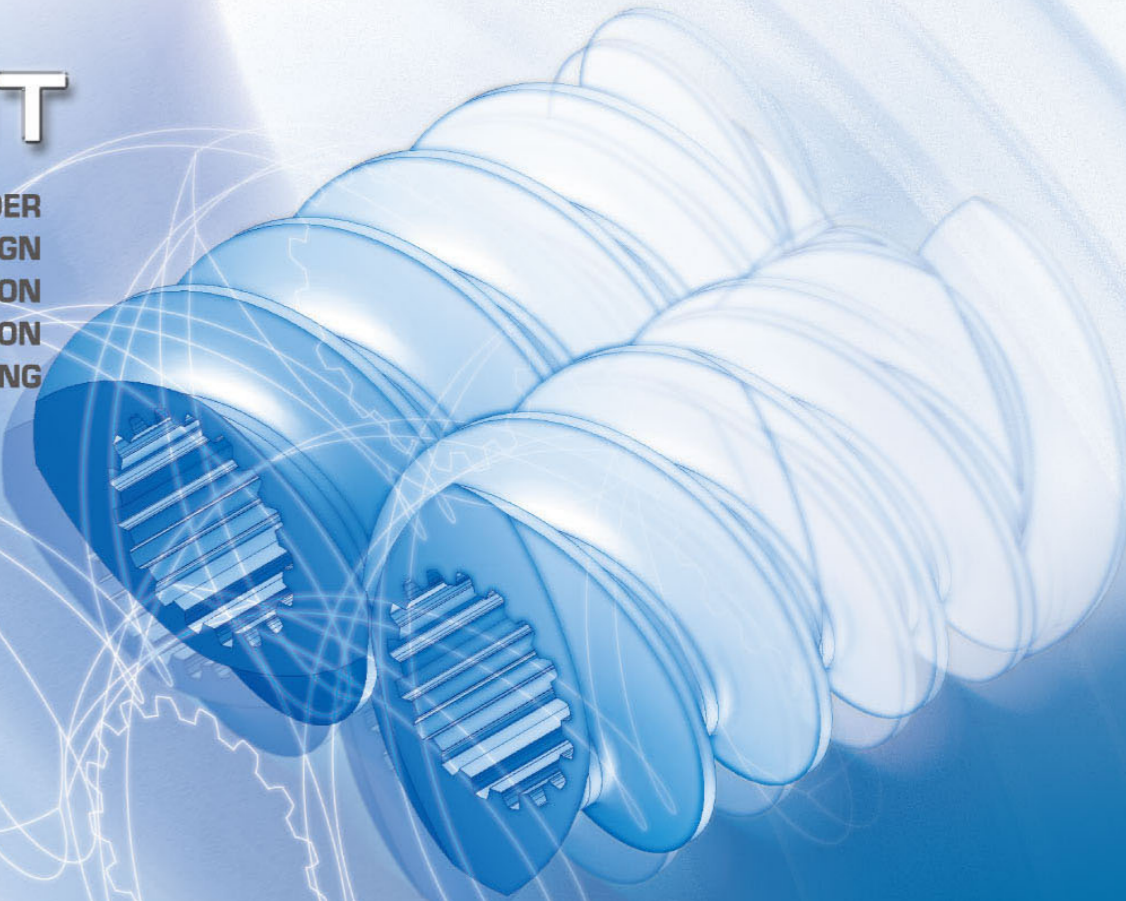
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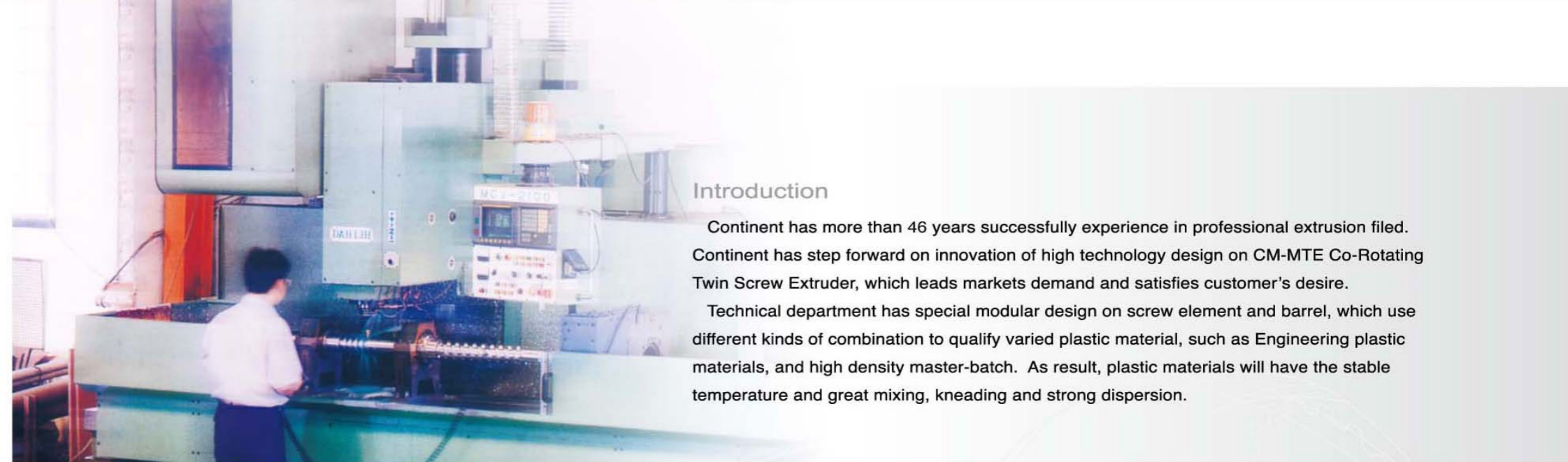
Http://www.continent-machine.com

 **CONTINENT**

CO-ROTATING TWIN SCREW EXTRUDER  
MODULAR DESIGN  
SCREW ELEMENT CONFIGURATION  
STRONG MIXING STRONG DISPERSION  
STRONG KNEADING



CONTINENT MACHINERY INDUSTRIES CO., LTD.



### Introduction

Continent has more than 46 years successfully experience in professional extrusion filed. Continent has step forward on innovation of high technology design on CM-MTE Co-Rotating Twin Screw Extruder, which leads markets demand and satisfies customer's desire.

Technical department has special modular design on screw element and barrel, which use different kinds of combination to qualify varied plastic material, such as Engineering plastic materials, and high density master-batch. As result, plastic materials will have the stable temperature and great mixing, kneading and strong dispersion.

### 公司簡介

世洲機械股份有限公司從1967年至今已經有46年製造押出機之經驗，經多年研發，已製造出高扭力、高產能、嚙合度良好之雙螺桿押出機，此種押出機可做典型的塑膠加工如粉末製造粒子，強化材料和填充劑之添加以做原料特性之改質，工程塑膠之複合，高濃度色母之製造等之應用。

公司成立以來，一直秉持著「客戶第一，務實管理，提升品質，永續經營」的企業理念。我們最大目標是希望能提供給客戶最佳的品質、最快速交期、最合理的價格及最周全的服務。

同時並加強員工素質與工作品質的認知，厚植技術基礎，不斷研發新機種及提升技術水平。

我們始終深信「品質是最佳的推銷員」，客戶的肯定正是我們最佳的成就。

### 工廠管理 Plant management



專業團隊  
Specialized Team



品質管理 Quality Control



研發設計 Research & Development



生產製造 Production



工作刀具的精密檢測 Tooling Inspection

# CM-MTE Series

CM-MTE系列



積木式同向旋轉  
雙螺桿押出機

CM-MTE Co-Rotating Twin Screw Extruder



■ 自動電腦控制系統：

1. PID溫度控制功能
2. 自動溫度設定
6. 記錄功能
7. 印表機功能
8. 語言切換
9. 警報功能

■ Automatic Computer Control System:

1. PID temperature control function
2. Automatic temperature set up
6. Recording function
7. Printer function
8. Language translation
9. Alarm function

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■ 規格表/Specifications

機型 Model	驅動馬力 Driving Motor(HP)	直徑 Diameter(mm)	最大轉速 Max Rotating Speed(rpm)	材質 Material
CM-MTE31	30	31	600	氮化鋼 及特殊合金 Nitride Steel & Special Alloy
CM-MTE45	30~50	45	300/360	
CM-MTE47	75~100	47	600	
CM-MTE58	125~200	58	400/600	
CM-MTE72	150~300	72	400/600	
CM-MTE75	200~350	75	400/600	
CM-MTE77	250~350	77	400/600	
CM-MTE92	300~700	92	600/800	
CM-MTE112	600~1000	112	600	



## 機台特點/Machinery Characters

❖ 強制潤滑油系統  
Force Lubrication Oil System

❖ 齒輪精密研磨  
Gear High Grinding

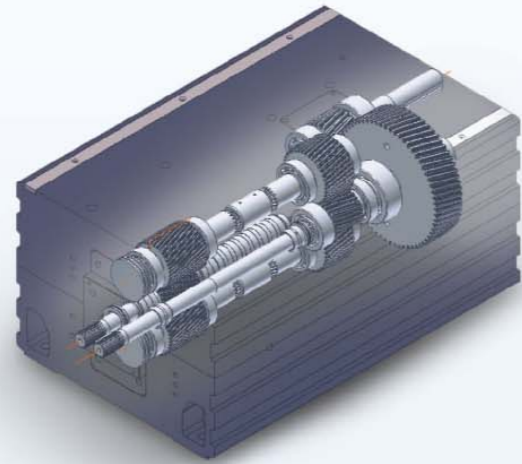
❖ 高馬力  
Strong Horse Power

❖ 低噪音  
Low Noise

❖ 使用壽命長  
Longer service life

❖ 手動操作易調整  
Easy manual operating

❖ 高準確的解除  
Accurate adjustment



### ■ 高扭力齒輪箱：

採多段式止推軸承，各段都可均勻分散螺桿之背壓，故可在最小的空間承受最大的推力，增加齒輪的壽命。齒輪材質採用合金鋼處理，加上精密研磨，又藉著強制式噴油潤滑系統作用，抑制齒輪及軸承發熱，故可實現理想化的高速、高馬力、高扭力、低噪音、壽命長之齒輪箱工藝。

### ■ GEAR BOX

Adopting multiple-thrust bearings which spread out driving forces evenly to screws. Gears are made in special Alloy steel and high accurately grinding. Gear box designs in force Lubrication Oil System is to extend longer service life.

### ■ 螺桿扭力限制器：

扭力限制器是本設備之標準配備，裝配於馬達與齒輪箱之間，當螺桿承受過載之壓力瞬間跳脫，則馬達會自動停止運轉。螺桿扭力限制器之作用乃保護齒輪箱以免受損。

### ■ TORQUE LIMITER: (Safety Clutch)

Screw Torque Limiter is twin Screw extruder's stander equipment, where places between Motor and Gear Box. When screws bear too much pressure and overload, at this moment, Screw Torque Limiter is automatically function to protect gear box and screws form damage. Motor will be self-activating stop.

### ■ 料管種類/Functions of Barrel :

脫氣段料管  
Venting zone



水路示意圖  
Water circulation



閉合段料管  
Close type



側面進料段料管  
Side feeder



雙合金料管組裝圖  
Bimetallic Barrel



雙合金內襯套  
Inject bimetallic barrel



進料脫氣料管  
Feeding zone



### Screw & Barrel Modular Design :

- High wear resistant & corrosive resistant
- Efficient heating transmission



Screw element interchangeable

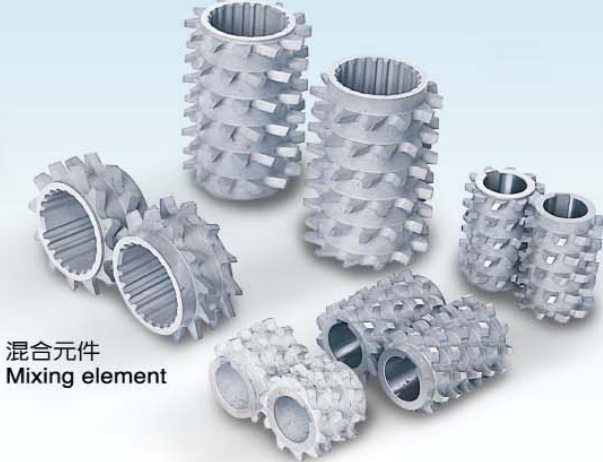
### ■ 螺桿元件/Screw elements :



輸送元件  
Conveying screw element



捏合元件  
Kneading elements



混合元件  
Mixing element



Co-Rotating Twin Screw Extruder : special design for laboratory and sampling



■ 本設備提供給各學校或研發單位及各公司之實驗室使用，押出量較小，可避免試料時浪費太多的原料成本，機台較小可節省佔地空間，節省電力成本。設備內全部模組化的設計，螺旋組件可快速度替換拆卸容易，旋組件配有強力捏合塊，及組氣逆流分散，及齒型混合等特殊元件可供選用。

■ 機型介紹/Description

機型	Model	MTE31
驅動馬力	Motor (HP)	30
馬達轉速	Motor (RPM)	1750
螺桿直徑	Screw Diam. (mm)	Ø31
組塊溝深	Channel Depth	4.6
長徑比	L/D (mm)	32~48
螺桿轉速	Screw RPM	600
扭力	Torque (N-M)	290
組塊材質	Screw Material	熱模合金鋼
加熱區數	Heating Zones	8-12
冷卻系統	Cooling System	油冷/水冷 Water/Oil
料管材質	Barrel Material	氮合鋼/特殊合金 Special Alloy

■ 塑料配方/Resin Output kg/hr

Organic masterbatch PP,PS.LDPE.EVA...	10-30
Inorganic masterbatch ABS.PP.PA.POM.PBT.	10-40
Polymer alloy ABS. PC. PA. PE	10-40
Enforcing engineering resins PP.PA.PBT.POM	15-50
Foil & frame retardant Engineering plastics ABS.PBT.PP.PA.HDPE	15-50
Engineering resins ABS. PBT. PP. PA. HDPE	15-50
Polymer alloy ABS. PA. PP. PBT. POM	15-60
Holt melt SBS	25-80

押出量：視原料及配方而定 Output : Depends on formulation



Co-Rotating Twin Screw Extruder : Special design for small output or laboratory use.



■ 機型介紹/Description

機型	Model	MTE45
驅動馬力	Motor (HP)	30~50
馬達轉速	Motor (RPM)	1750
螺桿直徑	Screw Diam. (mm)	Ø45
組塊溝深	Channel Depth	6
長徑比	L/D (mm)	32~48
螺桿轉速	Screw RPM	300/360
扭力	Torque (N-M)	560~780
組塊材質	Screw Material	熱模合金鋼
加熱區數	Heating Zones	8-12
冷卻系統	Cooling System	油冷/水冷 Water/Oil
料管材質	Barrel Material	氮合鋼/特殊合金 Special Alloy

■ 塑料配方/Resin Output kg/hr

Organic masterbatch PP,PS.LDPE.EVA...	30-70
Inorganic masterbatch ABS.PP.PA.POM.PBT.	50-110
Polymer alloy ABS. PC. PA. PE	30-70
Enforcing engineering resins PP. PA. PBT. POM	40-100
Engineering resin ABS. PBT. PP. PA. HDPE	40-100
Polymer alloy ABS. PA. PP. PBT. POM	40-90
Holt melt SBS	50-130

押出量：視原料及配方而定 Output : Depends on formulation

■ Modular Design:

Screw element and barrel is modular system, high performance of screw configuration, easy arrange and replace screw elements. Strong kneading, mixing (left/right hand), and conveying elements, which use in different character resins.

■ Advantages:

Provide accurately testing value  
Excellent heating exchange  
Provide safety and reliability

■ Automatic Control System:

Computer PC control system  
Easy operation  
Accurate temperature control  
Alarm function



Co-Rotating Twin Screw Extruder : Special design for small output or laboratory use.



■ 機型介紹/Description

機型	Model	MTE47
驅動馬力	Motor (HP)	75~100
馬達轉速	Motor (RPM)	1750
螺桿直徑	Screw Diam. (mm)	Ø47
組塊溝深	Channel Depth	8
長徑比	L/D (mm)	32~48
螺桿轉速	Screw RPM	600
扭力	Torque (N-M)	800~1100
組塊材質	Screw Material	熱模合金鋼
加熱區數	Heating Zones	8-12
冷卻系統	Cooling System	油冷/水冷 Water/Oil
料管材質	Barrel Material	氮合鋼/特殊合金 Special Alloy

■ 塑料配方/Resin Output kg/hr

Organic masterbatch PP,PS,LDPE,EVA...	50-130
Inorganic masterbatch ABS,PP,PA,POM,PBT.	80-220
Polymer alloy ABS, PC, PA, PE	50-150
Enforcing engineering resins PP, PA, PBT, POM	100-190
Engineering resin ABS, PBT, PP, PA, HDPE	100-190
Polymer alloy ABS, PA, PP, PBT, POM	100-190
Holt melt SBS	80-230

押出量：視原料及配方而定 Output : Depends on formulation

■ Modular Design:

Screw element and barrel is modular system, high performance of screw configuration, easy arrange and replace screw elements. Strong kneading, mixing (left/right hand), and conveying elements, which use in different character resins.

■ Advantages:

Provide accurately testing value  
Excellent heating exchange  
Provide safety and reliability

■ Automatic Control System:

Computer PC control system  
Easy operation  
Accurate temperature control  
Alarm function



CM-MTE 58 Co-Rotating Twin Screw Extruder : suitable for large production line.



■ Modular Design:

Screw element and barrel is modular system, geometry design, high performance of screw configuration, easy arrange and replace screw elements. Strong kneading, mixing (left/right hand), and conveying elements, which use in different character resins.

■ Advantages:

It is suitable used for compounding and high concentrate color masterbatch.

■ Automatic Control System:

Modify recording  
Production recording  
Control panel

■ 本設備可用在製作高分子原料、工程塑膠之複合、粉末製粒、強化材料和填充劑之添加以做原料特性之改質及高濃度色母之中、小量生產。設備內全部模組化的設計，螺旋組件可快速度替換拆卸容易，螺旋組件配有強力捏合塊及阻氣逆流分散及齒型混合等特殊元件可供選用，搭配不同附屬設備可做不同塑料之生產。

■ 機型介紹/Description

機型	Model	MTE58
驅動馬力	Motor (HP)	125~200
馬達轉速	Motor (RPM)	1750
螺桿直徑	Screw Diam. (mm)	Ø58
組塊溝深	Channel Depth	10
長徑比	L/D (mm)	32~48
螺桿轉速	Screw RPM	400/600
扭力	Torque (N-M)	1700~2000
組塊材質	Screw Material	熱模合金鋼
加熱區數	Heating Zones	8-12
冷卻系統	Cooling System	油冷/水冷 Water/Oil
料管材質	Barrel Material	氮合鋼/特殊合金 Special Alloy

■ 塑料配方/Resin Output kg/hr

Model	MTE58
Organic masterbatch PP,PS,LDPE,EVA	80-200
Inorganic masterbatch ABS,PP,PA,POM,PBT	120-340
Polymer alloy ABS, PC, PA, PE	80-200
Enforcing engineering resins PP, PA, PBT, POM	170-290
Engineering resin ABS, PBT, PP, PA, HDPE	120-340
Polymer alloy ABS, PA, PP, PBT, POM	170-300
Holt melt SBS	120-340

押出量：視原料及配方而定 Output : Depends on formulation

# CM-MTE 72



CM-MTE 72 Co-Rotating Twin Screw Extruder : suitable for large production line.



### 機型介紹/Description

機型	Model	MTE72
驅動馬力	Motor (HP)	150~300
馬達轉速	Motor (RPM)	1750
螺桿直徑	Screw Diam. (mm)	Ø72
組塊溝深	Channel Depth	10
長徑比	L/D (mm)	32~48
螺桿轉速	Screw RPM	400 / 600
扭力	Torque (N-M)	1800~2800
組塊材質	Screw Material	熱模合金鋼
加熱區數	Heating Zones	8-12
冷卻系統	Cooling System	油冷/水冷 Water/Oil
料管材質	Barrel Material	耐磨耗合金 / 雙金屬 Special Alloy

### 塑料配方/Resin Output kg/hr

Model	MTE72
Organic masterbatch PP,PS,LDPE,EVA	200-500
Inorganic masterbatch ABS,PP,PA,POM,PBT	500-800
Polymer alloy ABS, PC, PA, PE	300-500
Enforcing engineering resins PP, PA, PBT, POM	400-700
Engineering resin ABS, PBT, PP, PA, HDPE	400-600
Polymer alloy ABS, PA, PP, PBT, POM	400-700
Holt melt SBS	500-800

押出量：視原料及配方而定 Output : Depends on formulation

■ 本設備 (MTE72) 可依客戶不同原料配方及產量做選擇，適用在高分子原料、工程塑膠之複合、粉末製粒、強化材料和填充劑之添加以做原料特性之改質及高濃度色母之生產。

設備內全部模組化的設計，螺旋組件可快速度替換拆卸容易，螺旋組件配有強力捏合塊及阻氣逆流分散及齒型混合等特殊元件可供選用，搭配不同附屬設備，可做不同塑料之生產。

### Modular Design:

Configuration of screw elements can be arrange for different kinds of resin character. It is suitable used for compounding, high concentrate master batch with different colors and TPU resin. Material of screw elements adopts high Alloy steel with special treatment, which provides high wear resistant & corrosive resistant. The screw shaft with a spine connection can be easily extracted from gear box to minimize the re-assembling time.

### Advantage:

- Function of screw element
- Conveying element: conveying, degassing, decompression, provides short lead and long lead screw element.
  - Kneading elements: for disperse mixing & melting with a higher level of shear action.
  - Mixing elements: It is tooth sharp for repeat splitting & spiral rotation.

# CM-MTE 75/77

CM-MTE 75/77 Co-Rotating Twin Screw Extruder : suitable for large production line.



### 機型介紹/Description

機型	Model	MTE 75	MTE 77
驅動馬力	Motor (HP)	200~350	250~350
馬達轉速	Motor (RPM)	1750	1750
螺桿直徑	Screw Diam. (mm)	Ø75	Ø77
組塊溝深	Channel Depth	10	12
長徑比	L/D (mm)	32~48	32~48
螺桿轉速	Screw RPM	400/600	400/600
扭力	Torque (N-M)	2100	2300~3700
組塊材質	Screw Material	熱模合金鋼	
加熱區數	Heating Zones	8-12	
冷卻系統	Cooling System	油冷/水冷 Water/Oil	
料管材質	Barrel Material	耐磨耗合金 / 雙金屬 Special Alloy	

### 塑料配方/Resin Output kg/hr

Model	MTE75	MTE77
Organic masterbatch PP,PS,LDPE,EVA	70-160	230-570
Inorganic masterbatch ABS,PP,PA,POM,PBT	130-320	570-920
Polymer alloy ABS, PC, PA, PE	70-160	340-570
Enforcing engineering resins PP, PA, PBT, POM	120-300	460-800
Engineering resin ABS, PBT, PP, PA, HDPE	100-130	460-690
Polymer alloy ABS, PA, PP, PBT, POM	120-300	460-800
Holt melt SBS	130-320	570-920

押出量：視原料及配方而定 Output : Depends on formulation

■ 本設備分淺溝 (MTE75) 及深溝 (MTE77) 二種可依客戶不同原料配方及產量做選擇，適用在高分子原料、工程塑膠之複合、粉末製粒、強化材料和填充劑之添加以做原料特性之改質及高濃度色母之生產。

設備內全部模組化的設計，螺旋組件可快速度替換拆卸容易，螺旋組件配有強力捏合塊及阻氣逆流分散及齒型混合等特殊元件可供選用，搭配不同附屬設備，可做不同塑料之生產。

### Modular Design:

Configuration of screw elements can be arrange for different kinds of resin character. It is suitable used for compounding, high concentrate master batch with different colors and TPU resin. Material of screw elements adopts high Alloy steel with special treatment, which provides high wear resistant & corrosive resistant. The screw shaft with a spine connection can be easily extracted from gear box to minimize the re-assembling time.

### Advantage:

- Function of screw element
- Conveying element: conveying, degassing, decompression, provides short lead and long lead screw element.
  - Kneading elements: for disperse mixing & melting with a higher level of shear action.
  - Mixing elements: It is tooth sharp for repeat splitting & spiral rotation.

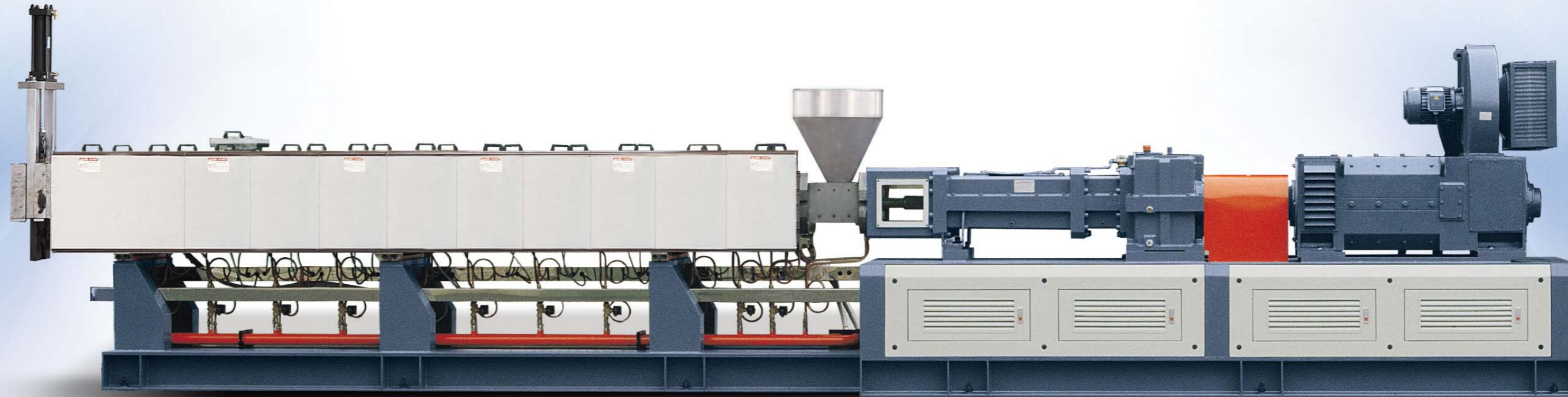


CM-MTE 92/112 Co-Rotating Twin Screw Extruder: Suitable for large production line.

■ 本機種可應用於TPU的原料生產線。

本設備可用在製作高分子原料、工程塑膠之複合、粉末製粒、強化材料和填充劑之添加以做原料特之性質或高濃度色母之生產。

設備內全部模組化的設計，螺旋組件可快速度替換拆卸容易，螺旋組件配有強力捏合塊及阻氣逆流分散及齒型混合等特殊元件可供選用，搭配不同附屬設備可做不同塑料之生產。



■ 機型介紹/Description

機型	Model	MTE 92	MTE 112
驅動馬力	Motor (HP)	300~700	600~1000
馬達轉速	Motor (RPM)	1750	1750
螺桿直徑	Screw Diam. (mm)	Ø92	Ø112
組塊溝深	Channel Depth	16	22
長徑比	L/D (mm)	32~48	32~48
螺桿轉速	Screw RPM	600/800	600
扭力	Torque (N-M)	2800~6500	6700~11000
組塊材質	Screw Material	熱模合金鋼	
加熱區數	Heating Zones	8-12	
冷卻系統	Cooling System	油冷/水冷	Water/Oil
料管材質	Barrel Material	氮合鋼/特殊合金	Special Alloy

■ Modular Design:

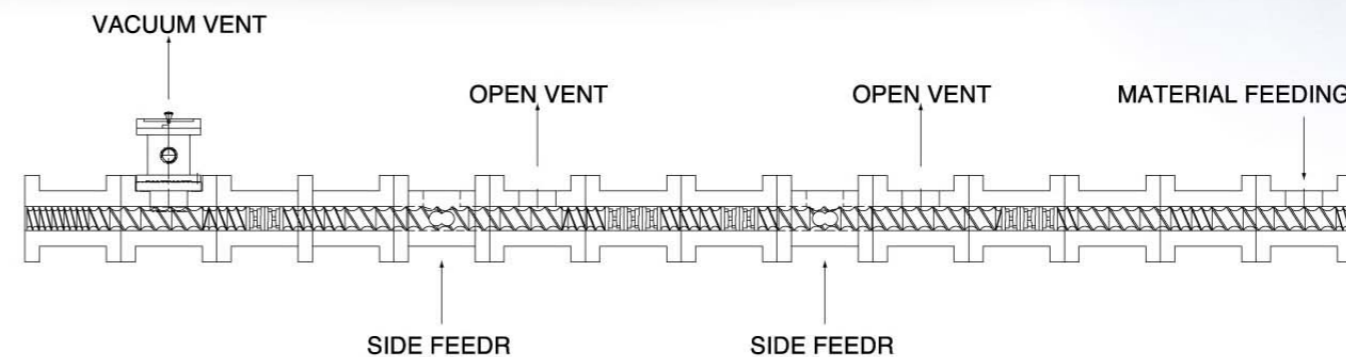
Screw and barrel are modular design, which are interchangeable and easy assembled. This module is suitable used for compounding, high concentrate master batch with other additives. For additives such as fillers, fiber glass, carbon black, silica, calcium, talc carbonate or others can be feed on the side of extruder. Barrel geometry design is purpose for different resin or additive, which includes degassing, side feeding, venting, open type, and close type. Inside of barrel equipped water circulation to have stable temperature control.

■ Advantages:

- Functions of Barrel:
1. Feeding zone: Extruder can be equipped with feed hoppers or metering devices.
  2. Venting zone: Take out the moisture, gas, water, air and other dirties.
  3. Closing type: Multiple segment type
  4. Side Feeder: Fiber glass, CaCo3, Carbon or other corrosive resin can be feeding in extruder on the side. Barrel adopts bimetallic steel is to increase wear resistance and corrosive resistance, which extend service life.

■ Automatic Control System:

- 電腦開機啓動模式 / Computer operating function
- 多段溫度設定 / Temperature setting
- 警報記錄 / Alarm function recording
- 多項轉速 / Screw rotating speed indicate



■ 塑料配方/Resin Output kg/hr

Model	MTE92	MTE112
Organic masterbatch PP,PS,LDPE,EVA	510-750	850-1700
Inorganic masterbatch ABS,PP,PA,POM,PBT.	750-1300	1700-2500
Polymer alloy ABS, PC, PA, PE	510-850	1270-1700
Enforcing engineering resins PP,PA,PBT,POM	680-1000	1270-1700
Engineering resins ABS,PBT,PP,PA,HDPE	680-1000	1270-1700
Polymer alloy ABS,PA,PP,PBT,POM	680-1000	1700-2500
Holt melt SBS	750-1350	1700-2500

押出量：視原料及配方而定 Output: Depends on formulation





Suitable Material : TPR, TPU, EVA, HDPE, LDPE, PP, SBS, TPE

水中造粒/CM-UW Under Water Pelletizer

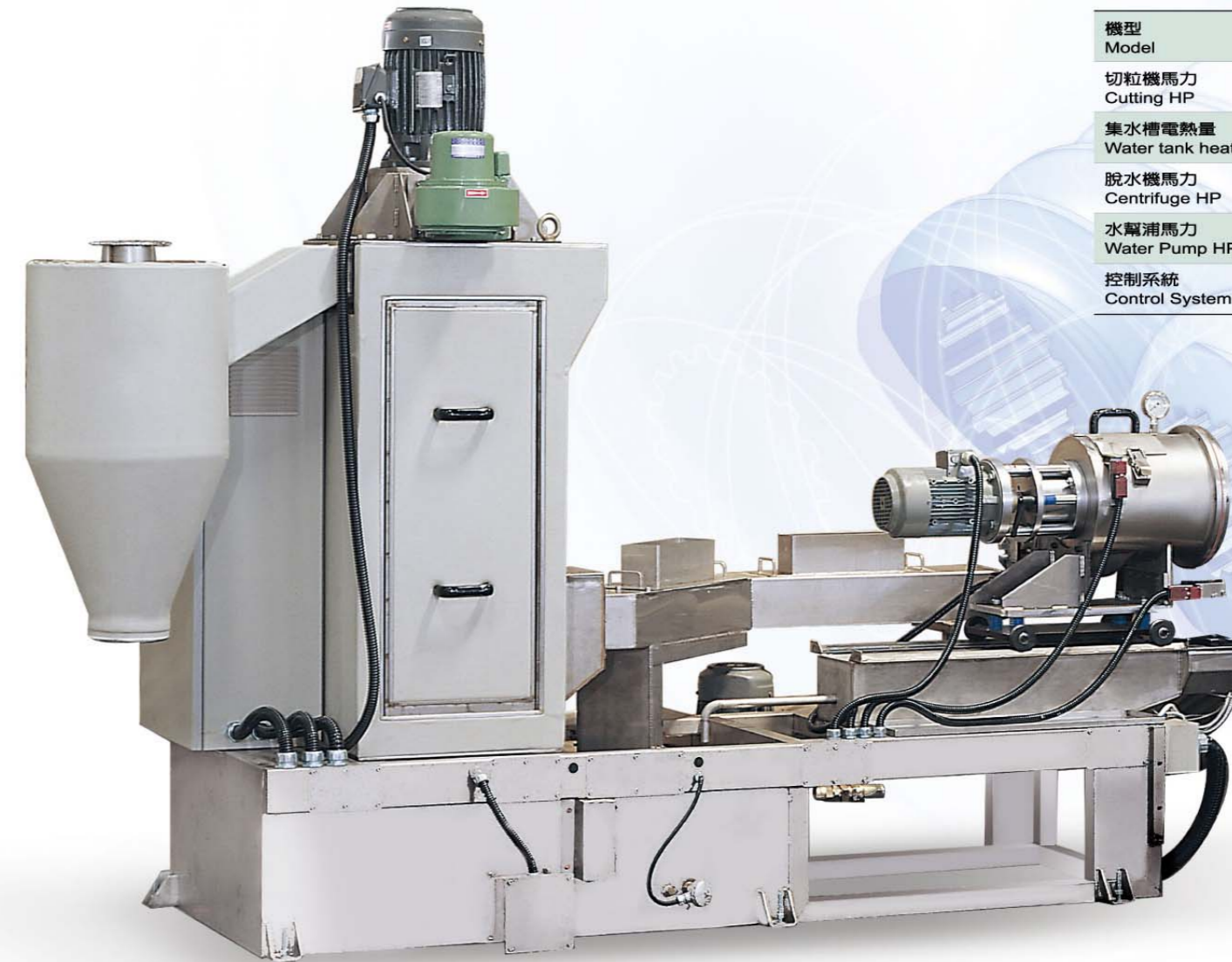


機型 Model	CM-UW250	CM-UW400	CM-UW500	CM-UW750
切粒機馬力 Cutting HP	3 HP	5 HP	7.5 HP	10 HP
集水槽電熱量 Water tank heater	6 KW	8 KW	12 KW	18 KW
水幫浦馬力 Water pump HP	3 HP	5 HP	7.5 HP	7.5 HP
離心式脫水機馬力 Centrifuge HP	3 HP	5 HP	10 HP	10 HP
控制系統 Control System	PC電腦自動控制 PC computer automatic control			

水中造粒	CM-UW250	CM-UW400	CM-UW500	CM-UW750
PA 6 n.e.	100~200	120~260	250~650	600~1800
PET PP, PE, PS, PC, SAN	120~250	200~350	300~750	650~2200
PMMA, polymer blends	180~300	220~400	350~900	700~2500
Polyolefins, polyamide +15% fillers	180~300	220~400	350~900	700~2500
Polyolefins, polyamide +30% fillers	200~350	220~450	400~1000	800~2800
Polyolefins, polyamide +60% fillers	220~450	250~600	500~1300	1000~3600

水環造粒/CM-WR Water Ring Pelletizer

Suitable Material : LDPE, HDPE, EVA, PS, PP with centrifuge  
Suitable Material : PP + Tio2, LLDPE + Tio2, LDPE + Tio2 without centrifuge



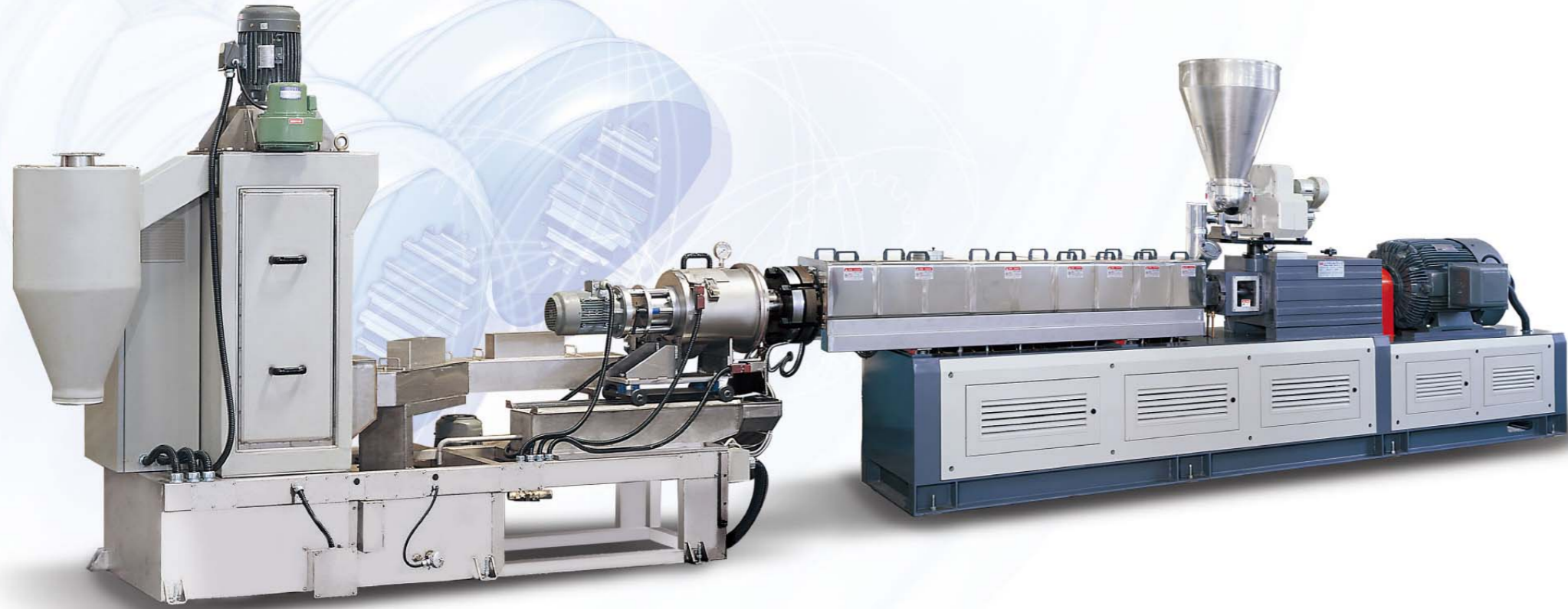
機型 Model	CM-WR250	CM-WR500	CM-WR1000
切粒機馬力 Cutting HP	2 HP	3 HP	5 HP
集水槽電熱量 Water tank heater	6 KW	8 KW	12 KW
脫水機馬力 Centrifuge HP	5 HP	5 HP	10 HP
水幫浦馬力 Water Pump HP	2 HP	3 HP	5 HP
控制系統 Control System	PC電腦自動控制 PC computer automatic control		

CM-MTE系列

### CM-MTE 58 WR Water Ring Pelletizr Production Line



CM-MTE 水環造粒生產線



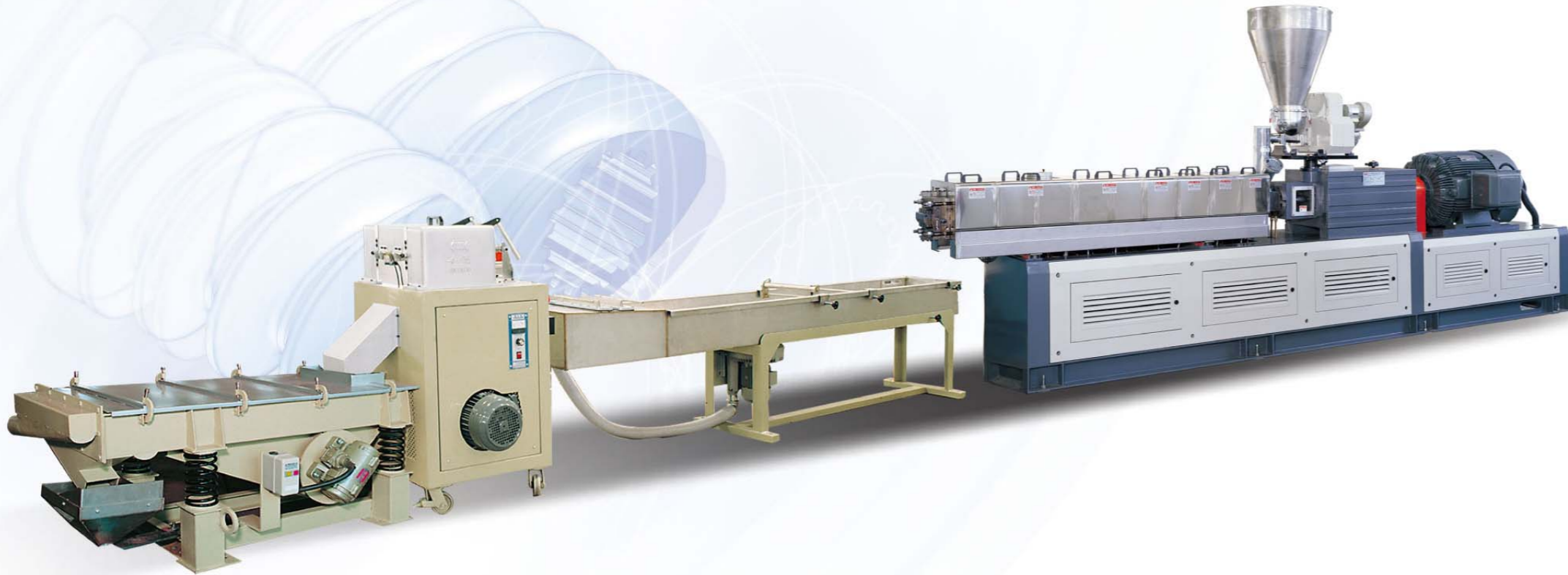
CM-MTE系列

### CM-MTE 77 UW Under Water Production Line



CM-MTE 水中造粒生產線





■ 儲料桶  
Silo

■ 震動篩選機  
Pellets vibrated strainer

■ 除濕機  
Water take-off unit

■ 單邊式切粒機  
Single side cutting machine



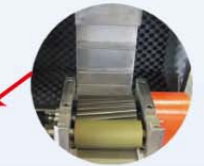
■ 側供料  
Side feeder



■ 比例式餵料器  
Proprtion type feeder



■ 偏心切粒式機  
Bias center type  
strand pelletizer

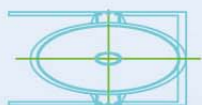
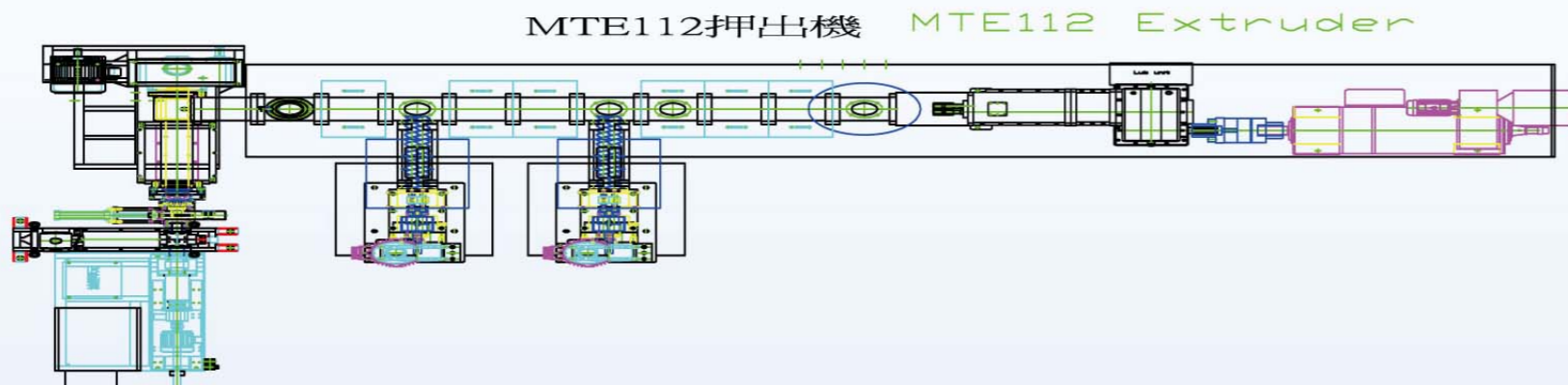


■ 自動油壓換網裝置  
Auto. Hydraulic  
screen changer

CM-MTE 112 UW Under Water Production Line



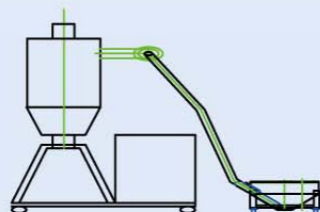
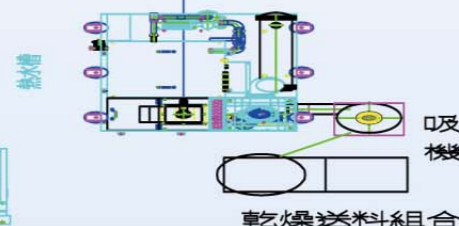
水中造粒送料系統  
UNDER WATER  
PRA165押出機  
PRA165  
Second Extruder



1000KG 儲料桶  
1000kg Storage Tank



送料機



1000KG 儲料桶 送料機  
1000kg Storage Tank

