

We have been making every effort to satisfy our customers by providing them with best products and best services.

# PULP MOLDED PRODUCT & TURNKY MACHINE

We have been every effort

to **SATISFY** 



our customers by providing them with the

**BEST PRODUCTS AND BEST SERVICES** 

# HISTORY

#### 興中歷史

### 誠信 創新 堅持



**興中環保科技**生產紙塑食品包裝、工業緩衝包裝、**3C**電子產品精美紙塑包裝,同時也供應整廠紙塑設備;母公司—興中紙業公司,曾經是台灣最大的紙業製造商,對台灣造紙產業貢獻卓著,目前興中環保科技則是台灣最大的紙塑產品生產及設備製造廠,以品質創新技術,引領台灣紙塑工業邁向全世界。

本公司擁有最專業之團隊,基於對環保產業的一份責任感與使命,多年來全力投入技術研發與設備改良,並積極開發生產環保製品;我們擁有一流設備與技術,並累積多年的實務經驗,期盼以團隊的優勢與努力,為世界的環保盡一份心力。

Hsing Chung Molded Pulp Co., Ltd. (HCMP) produces all kinds of molded pulp products ex. food tableware, industrial buffer packaging, and exquisite packaging for 3C electronic products. Moreover, HCMP also provide pulp molding Turn-key total solution services. Hsing Chung Molded Pulp is also a subsidiary of Hsing Chung Paper Making Co., Ltd which had been the biggest paper manufacturer and had been a great contribution for paper industry of Taiwan. Nowadays, Hsing Chung Molded Pulp Co., Ltd. is a pioneer of molded pulp products and equipment manufacturer. We are leading molded pulp industry of Taiwan to the world by quality, innovation, advanced technology and equipment.

We have owed the most experienced team, based on senses of responsibility and mission for environmental protection, we deeply involved in technology researching and equipment improving for years and developed relative Eco-Friendly products actively. We have owned the most advanced and efficient equipment, skills and accumulated plentiful practical experiences and expecting to give a hand to earth environment protection by proving superiorities and efforts of our team.

1918 年 成立台灣興業株式會社

1959年 更名為台灣興中紙業(股)公司

1999 年 改隸經濟部、成為國營事業

2001年 民營化更名中興紙業 (股)公司

2002 年 投入紙漿模塑環保事業

2003年成立興中環保科技(股)公司

2004年 投入紙塑成型機之研發與改良

2006年 投入整廠輸出服務

2006年 成立模具開發部

2008 年 成立機械研發部

2010 年 成立機械事業部

2013年成立大陸東莞廠(歐旻企業)

1918-Taiwan Kougyou Kabusiki Gaisya established.

1959- Name changed to Taiwan Chung Hsing Paper Making Company.

1999- Reorganized and became a subsidiary of Economic Ministry, as a State-owned Enterprise.

2001- Has been privatized and changed the name to Hsing Chung Paper Industrial Co., Ltd.

2002- Has been getting involved in business of ECO Molded Pulp Products.

2003-Hsing Chung Molded Pulp Co., Ltd. established.

2004- Has been getting involved in developing Molded Pulp Forming Machine.

2006- Has been getting involved in Turnkey Machinery Supply (Supplied to Vietnam, Thailand,

China, Spain...etc.)

2006- Mold developing division established.

2008- R & D division established.

2010- Machinery business division established.

2013- Factory in Dongguan, China established.(OMEXEY ENTERPRISE.CO.,LTD.)





# 紙塑廠競爭關鍵

#### COPMPETITION KEY POINT OF MOLDED PULP FORMING PLANT

【專業研發團隊】機械設計、繪圖、程式設計

【 優質的經營團隊 】 生產、品質、銷售、研發

【 產品研發 】 模具廠 ( 繪圖 、 模具製作 、 快速打樣 )

【累積長期生產技術】製漿、造紙、紙塑

【製程全面自動化】製漿、生產、加工

【研發空間大】土地、廠房、人力、技術

【材料製程】本公司運用造紙技術的延伸,完整掌握原料特性並發揮極致經驗、技術與製程,以自動化成就企業之競爭優勢。

【生產設備】自動化設備可降低人為的疏失,有效控制生產品質與成本,自動化設備之有效運用,有助於成本之快速回收。因應人事、原物料與熱源成本之變動,自動化設備是最佳的選擇。

【設計加工】從概念或樣品經由 AutoCAD / Pro-E / SOLIDWORKS 機械製圖軟體系統繪製成 3D 圖檔,再經電腦編程 CNC 加工製成模具,產品原型製作,全部自行廠內完成。

【發展能力】具備 120 台先進模內乾燥成型機, 20 台電腦控制 CNC 加工機, 2 台 5 米多面龍門加工機, 700 位經驗豐富的技術及操作人員, 廠區佔地面積:台灣 33 公頃(可擴展廠區約 3,550,000 平方呎,)、大陸 12 公頃(1,324,187 平方呎)。

**Professional R&D team:** machine designing, drawing, programming / **Experienced running team:** production, quality, sales, research & development / **Products R&D:** mold tooling plant (drawing, mold tooling, rapid prototyping)

**Accumulated production techniques:** pulping, paper making, pulp forming / **Automatic process:** pulping, production, tooling **Expandable capability:** Plenty of factory buildings, space, manpower, production technology and equipment

Material & Process: With accumulated and extended pulping and paper making techniques, we ultimately applied the characteristic of pulp materials and produce superior products. Our plentiful experiences, advanced techniques, and automatic process are our superiorities of competition.

**Equipment:** Automated equipment reduced human negligence, effectively costs and quality control, effective application of automatic equipment, all these factors helps to recover the investment shortly. In order to respond to the changing of personnel, raw materials, heat energy costs, automatic equipment will be the best choice.

**Designing & Tooling:** From concept or counter sample to draw 3D mechanical drawing through CAD / ProE / SolidWorks software, then proceed with CNC mold tooling, prototyping. All these tooling process are completed in-house.

**Developing capabilities:** Owned 120 sets of advanced dry-in-mold automatic thermoforming machine, 20 sets of CNC machine center, 2 sets of 5 meters multi face milling machine center, 700 skillful operators and technicians. Factory space: Taiwan 33 hectares. (approx. 3,550,000 square feet.), China 12 hectares. (approx. 1,324,187 square feet.)



# 2 TURNKEY Company with a state of the state

### 整廠輸出



# 設備設計與輸出

【整廠設備規劃】按預算、原料、產品、產量、廠房面積將整套設備做最妥適的規劃。

【製漿系統】電腦化 PLC 中央控制系統、製漿、加藥設備,共用真空及空壓系統。

【製程設計】科技化:全套設備之系統規劃(成型系統、熱壓系統、模具系統及原料供應系統)均為業界最新科技。

電腦化:從原料供應比例、熱能控制、運轉、生產週期至產品重量厚薄,均可由電腦改變參數,簡易方便。

自動化:從原料供應至成品輸出,均為自動化生產, 一人可多機操作,減少人力支出。

【模具設計&加工】可代客戶設計、加工及做基本訓練。

【加工設備】覆膜系統、裁切系統、自動堆疊系統,按產品、產量做規劃。

**Full system layout**: Properly full system layout according to budget, materials, products, capacity and plant space.

**Pulping System**: Pulping, additive dosing, utility, vacuum and air compress system all are controlled in PLC computerized center **Process design**: full set of systems arrangement (Forming, Hot pressing, Mold tooling and Raw material supplying system) all are advanced technic and science combination in the world. From materials supply ratio, heat energy, machine running, production cycle time and products thickness all are computer controlled by changing parameters on computer, easy and convenient.

From materials supply to finished products all are automatic, one operator could control several machines, minimized the labor costs.

After process Equip: Laminating, Trimming, Punching and Stacking system, could arrange properly according to products and capacity.







## 紙塑製程機械

#### DRY IN MOLD THER MOFORMING MACHINE

#### 先進的模內乾燥紙漿模塑機械

- 1. PLC 觸控面板
- 3. 極小脱模角度、表面光滑
- 5. 高良率
- 7. 操作人員少
- 9. 產出產品尺寸精準、不變形
- 11. 容易操作、節省空間、更換模具快速

- 2. 直接熱壓、直接模內乾燥
- 4. 產出時間短
- 6. 模板實際使用面積大
- 8. 產品厚度從 0.5~1.5mm
- 10. 簡潔、井然的機械結構

#### Advanced direct-hot-press, dry-in-mold thermoforming machine

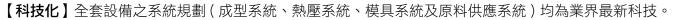
- 1. PLC touch screen panel.
- 2. Hot press and dry directly in the mold.
- 3. Minimized draft angle and smooth surface.
- 4. Short production cycle time.
- 5. High yield.
- 6. Large mold platen spaces.
- 7. Less operators
- 8. Production thickness from 0.5~1.5mm.
- 9. Keep the accurate size and shape without deformation.
- 10. Tidy and simple machine structure.
- 11. Easier to operate, less working space, exchange mold quickly.



# 3 EQUIPMENT

### 先進設備

# 製程設計 設備優勢



【電腦化】從原料供應比例、熱能控制、運轉、生產週期至產品重量厚薄,均可由電腦改變參數,簡易方便。

【自動化】從原料供應至成品輸出,均為自動化生產,一人可多機操作,減少人力支出。

**Science and Technology**: System planning of full set of equipment (Forming system, Heat pressing system, Molding system and Raw material supplying system) all are advanced technic combination in the world. **Computerization**: All are computer controlled by changing parameters from material supply ratio, thermo energy control, machine running, production cycle to product's weight and thickness, easy and convenient. **Automation**: All are automated production from material supply to finished products, one operator could control many machines, minimized the labor costs.

	機型 Model	模板尺寸 Max.Mold Platen Sizes	成型模具 Forming Mold	熱壓模具 Hot Pressing Mold	熱壓系統 Hot pressing system	產出週期 Production Cycle	機種 Model of Machine
主機系統	НСРМ003	Max:1210X760mm	1	1	電熱、熱煤油 Electricity、Heat transfer oil	25~120	成型機 Forming Machine
	HETP001	Max:1350X950mm	1	2	電熱、熱煤油 Electricity、Heat transfer oil	25~120	成型機 Forming Machine
	НСРМ008	Max:1350X1150mm	1	1	電熱、熱煤油 Electricity、Heat transfer oil	25~120	成型機 Forming Machine
	HCMP-F800	Max:795X725mm	2		電熱 Electricity Heat	20~40	覆膜機 Filming Machine
	HETP06	Max:1350X1150mm				行程 :500mm	兩段堆疊、輸送堆疊機 2Steps Stack / Release Stacker





紙塑產品製程 PROCESSES OF

PROCESSES OF MOLDED PULP PRODUCTS

#### 現有的三種基本紙漿模塑產品製程

#### 【紙漿模塑產品-工業包材】

紙漿產品以半自動成型機成型後自然蔭乾或進烘箱隧道烘乾,產品厚度約從3mm~5mm,一面稍平整,一面非常粗糙。主要用為易碎,較重產品(汽車零件、馬達、家俱)的支撐,緩衝包裝,其它產品如:植物盆、花盆、醫療托盤及醫療盆、壺等,此即所謂工業包材。

Molded pulp product—Industrial Packaging: Industrial packaging produced by semi-automatic forming machine. After forming, dried naturally or dried by passing through tunnel oven. Production thickness is 3~5mm. Product surface is one side flat and rough at another side. Mainly are for supporting or buffering fragile or heavy products. (ex. Auto parts, motor or furniture.) Other packaging likes seedling pot, flower pot, urinal bottle, bedpan liner, spittoon, ampoule and surgical tray... etc.

#### 【紙漿模塑產品-精緻工業包材】

產品於成型段成型後由轉接模交模到熱壓段熱壓,直接做模內乾燥為成品,無需額外的烘箱等乾燥設備,產品厚度從約 0.6mm ~ 2mm,一面有網紋、一面光滑,熱壓後產品密度高,可成形極小的脱模角度且可把結構及特徵壓製得很清楚明顯。 主要用於手機、平板電腦…等高單價產品,體積小的 3C 電子產品包材,產品近似熱成型(吸塑)塑膠材料,此即所謂精緻工業包材。

Molded pulp product—Exquisite Industrial Packaging: Molded packaging transfer to hot pressing part from forming part then direct-hot-press and dry-in-mold, no further tunnel oven needed, products thickness from 0.6mm to 2mm, one side with wire mesh mark, and extremely smooth surface at the other side, due to high density after pressed, small radius and draft angle could be made and clear features could be pressed according to designs. Mainly packaging are for smartphone, tablet or 3C products which is small but with high unit price, It's similar to thermoformed blister plastic packaging.

#### 【紙漿模塑產品 - 客製化產品】

產品於製程中須再做其他二次加工或特殊的處理,例如同時使用不同配比的漿料,添加特殊的添加劑及顏色染劑,產品成型後再以模具加壓做二次整形、沖切、沖孔、特殊側切,壓粘製成中空、雙層包材及印刷。

**Molded pulp product—Customized Packaging**: In the process some products need secondary process or special treatment ex. Mix pulps with different ratio, adding dyes and other additives. After pressing, stamping, punching, swivel cutting, glue and press for two layer packaging and printing.

# 4 FEATURES

# 紙漿纖維模塑產品

#### 綠色環保包材 環境保護世界趨勢

我們的自動紙漿模塑生產線可用於生產一次性的可堆肥餐具食品容器、醫療包裝、工業用緩衝材料、高檔電子產品的精 美包裝,用途多樣化,不勝枚舉。

紙漿纖維材料種類繁多,如:木漿、蔗渣漿、竹漿、棕梠纖維、再生循環回收的 OCC、ONP 材料等…這些材料模塑時,都不會釋出有毒或危險物質,導致危害環境。

綠色紙漿纖維模塑包裝,是傳統的紙板、 瓦楞紙箱、  $EPS \times PP \times PET$ 等,常用塑料包裝的最佳替代品,使用紙漿纖維模塑包裝,是世界環保的趨勢。

漸漸的,生態環境友好的紙漿模塑製品的應用,不僅僅限於餐具和粗糙皺紋多的工業緩衝包裝,而且也被廣泛的應用於周遭的實用產品,諸如:水瓶、牛奶瓶、洗滌劑瓶、化妝品盒、CD盒、刮鬍刀架、鞋盒、咖啡過濾器、高科技手機、平板、3C產品包裝,這些產品具有堅硬的結構,細膩、光滑的表面 ,更多超乎想像和更具創新性、實用性產品,已經被發明與廣泛使用。

#### Green Packaging World Eco-Friendly Trend

#### Molded fiber packaging is the global solution for environmental packaging material

Our production lines of automatic forming machines produce disposable and compostable tableware, medical containers, industrial buffer material and exquisite packaging for high value electronic products. We have wide variety of designs for diversification purposes. Existed and used pulp: Wood pulp, Bagasse pulp, Palm fiber pulp and Recycled OCC & ONP material. Will not release toxic and harmful material while in production process.

Green molded pulp packaging is a best substitute for traditional cardboard box, corrugated cartons, vacuum and thermoformed PVC, EPS, PP, PET, and foam plastic materials etc., Furthermore, molded pulp packaging is also word Eco-friendly trend.

Gradually, the application of Eco-Friendly molded pulp products are not just limited to tableware and rough & wrinkly industrial buffer packaging but also been applied for all practical objects around you such as water, milk, detergent bottle, cosmetics, CD, razor holder even for cell phone, tablet ....3C products holder which with rigid structure and delicate, smooth surface, more and more innovation products invented beyond our imagination.





## 紙塑品產特色 CHARACTERISTIC OF PRODUCTS

【產品特色】無毒、無味、防水、防油、自然降解性強,可回收做為非食品包材原料,無污染。

【產品用途】食品類:餐盒、餐盤、餐碗/排食品類:精品包裝、禮盒包裝、文創藝品、功能性用品、工業包裝。

#### 【產品優勢】

1. 內部各種成型結構提供物件最堅固保護。 2. 易於回收處置符合世界環保趨勢。

3. 可根據需求模塑成型各種高品質外表。 4. 生產時不添加有毒物質、結構性強。

- 5. 小巧精緻產品同時也能保護大且重的物件、中性不會產生靜電。
- 6. 紙漿模塑包材是由原生紙漿、回收紙、廢紙板製成,對環保衝擊極小,在這個環保新紀元正是 EPS、PE、 PP 及其他發泡塑膠材料 最好的替代品。
- 7. 是現今最好的綠色環保包材,是自然的材料,可降解、可回收、無毒、防水、防油、堅韌的、無靜電、 可緩衝吸震、可微波。

Characteristic of Products: Non-toxic, tasteless, waterproof, oil resistance. High nature biodegradability, recyclable for making non-food packing materials, no pollution to environment.

**Product uses**: Food grade: lunch box, lunch plate, lunch bowl. Non-food grade: exauisite packaging, gift box packaging, cultural creative art work, functional packaging, industrial packaging.

#### Advantage of Products:

- 1. Internal forming constructions provide the strongest protection for different shape products.
- 2. Easy to recycled, conforms to the environmental protection trend.
- 3. Be thermoformed according to the request to produce high quality appearance.
- 4. No adding toxic materials in production and has rigid structure.
- 5. Our products are small and exquisite, but can protect large and heavy items. It's neutral and no static electricity.
- 6. Molded pulp products are made of original pulp, recycled paper, waste paper board has minimal impact to the environment. In the new era of environmental aware, molded pulp products are the best alternatives to EPS, PE, PP and other foaming plastic materials.
- 7. Molded pulp products is the best Green Packaging, it's natural, biodegradable, recyclable, non-toxic, waterproof, oil resistance, strong, static electricity free, shock absorbent and microwavable.

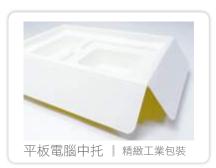


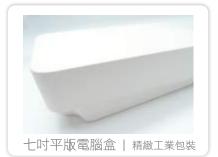
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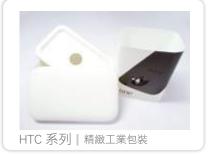
# 產品資訊

# 精工包材 創意禮盒 文創藝品 功能用品







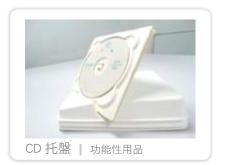




















護角墊 | 功能性用品

# 食品包材 **TABLEWARE**













































# ISO 9001 Certificate and Test Report



















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2008 年 成立機械研發部

2010 年 成立機械事業部

2013年成立大陸東莞廠(歐旻企業)

1918-Taiwan Kougyou Kabusiki Gaisya established.

1959- Name changed to Taiwan Chung Hsing Paper Making Company.

1999- Reorganized and became a subsidiary of Economic Ministry, as a State-owned Enterprise.

2001- Has been privatized and changed the name to Hsing Chung Paper Industrial Co., Ltd.

2002- Has been getting involved in business of ECO Molded Pulp Products.

2003-Hsing Chung Molded Pulp Co., Ltd. established.

2004- Has been getting involved in developing Molded Pulp Forming Machine.

2006- Has been getting involved in Turnkey Machinery Supply (Supplied to Vietnam, Thailand,

China, Spain...etc.)

2006- Mold developing division established.

2008- R & D division established.

2010- Machinery business division established.

2013- Factory in Dongguan, China established.(OMEXEY ENTERPRISE.CO.,LTD.)





# 紙塑廠競爭關鍵

#### COPMPETITION KEY POINT OF MOLDED PULP FORMING PLANT

【專業研發團隊】機械設計、繪圖、程式設計

【 優質的經營團隊 】 生產、品質、銷售、研發

【 產品研發 】 模具廠 ( 繪圖 、 模具製作 、 快速打樣 )

【累積長期生產技術】製漿、造紙、紙塑

【製程全面自動化】製漿、生產、加工

【研發空間大】土地、廠房、人力、技術

【材料製程】本公司運用造紙技術的延伸,完整掌握原料特性並發揮極致經驗、技術與製程,以自動化成就企業之競爭優勢。

【生產設備】自動化設備可降低人為的疏失,有效控制生產品質與成本,自動化設備之有效運用,有助於成本之快速回收。 因應人事、原物料與熱源成本之變動,自動化設備是最佳的選擇。

【設計加工】從概念或樣品經由 AutoCAD / Pro-E / SOLIDWORKS 機械製圖軟體系統繪製成 3D 圖檔,再經電腦編程 CNC 加工製成模具,產品原型製作,全部自行廠內完成。

【發展能力】具備 120 台先進模內乾燥成型機, 20 台電腦控制 CNC 加工機, 2 台 5 米多面龍門加工機, 700 位經驗豐富的技術及操作人員, 廠區佔地面積:台灣 33 公頃(可擴展廠區約 3,550,000 平方呎,)、大陸 12 公頃(1,324,187 平方呎)。

**Professional R&D team:** machine designing, drawing, programming / **Experienced running team:** production, quality, sales, research & development / **Products R&D:** mold tooling plant (drawing, mold tooling, rapid prototyping)

Accumulated production techniques: pulping, paper making, pulp forming / Automatic process: pulping, production, tooling Expandable capability: Plenty of factory buildings, space, manpower, production technology and equipment

**Material & Process:**With accumulated and extended pulping and paper making techniques, we ultimately applied the characteristic of pulp materials and produce superior products. Our plentiful experiences, advanced techniques, and automatic process are our superiorities of competition.

**Equipment:** Automated equipment reduced human negligence, effectively costs and quality control, effective application of automatic equipment, all these factors helps to recover the investment shortly. In order to respond to the changing of personnel, raw materials, heat energy costs, automatic equipment will be the best choice.

**Designing & Tooling:** From concept or counter sample to draw 3D mechanical drawing through CAD / ProE / SolidWorks software, then proceed with CNC mold tooling, prototyping All these tooling process are completed in-house.

**Developing capabilities:** Owned 120 sets of advanced dry-in-mold automatic thermoforming machine, 20 sets of CNC machine center, 2 sets of 5 meters multi face milling machine center, 700 skillful operators and technicians. Factory space: Taiwan 33 hectares. (approx. 3,550,000 square feet.), China 12 hectares. (approx. 1,324,187 square feet.)



# 2 TURNKEY CONTRACTOR OF THE PROPERTY OF THE P

### 整廠輸出



# 設備設計與輸出

【整廠設備規劃】按預算、原料、產品、產量、廠房面積將整套設備做最妥適的規劃。

【製漿系統】電腦化 PLC 中央控制系統、製漿、加藥設備,共用真空及空壓系統。

【製程設計】科技化:全套設備之系統規劃(成型系統、熱壓系統、模具系統及原料供應系統)均為業界最新科技。

電腦化:從原料供應比例、熱能控制、運轉、生產週期至產品重量厚薄,均可由電腦改變參數,簡易方便。

自動化:從原料供應至成品輸出,均為自動化生產, 一人可多機操作,減少人力支出。

【模具設計&加工】可代客戶設計、加工及做基本訓練。

【加工設備】覆膜系統、裁切系統、自動堆疊系統,按產品、產量做規劃。

**Full system layout**: Properly full system layout according to budget, materials, products, capacity and plant space.

**Pulping System**: Pulping, additive dosing, utility, vacuum and air compress system all are controlled in PLC computerized center **Process design**: full set of systems arrangement (Forming, Hot pressing, Mold tooling and Raw material supplying system) all are advanced technic and science combination in the world. From materials supply ratio, heat energy, machine running, production cycle time and products thickness all are computer controlled by changing parameters on computer, easy and convenient.

From materials supply to finished products all are automatic, one operator could control several machines, minimized the labor costs.

After process Equip: Laminating, Trimming, Punching and Stacking system, could arrange properly according to products and capacity.







## 紙塑製程機械

#### DRY IN MOLD THER MOFORMING MACHINE

#### 先進的模內乾燥紙漿模塑機械

- 1. PLC 觸控面板
- 3. 極小脱模角度、表面光滑
- 5. 高良率
- 7. 操作人員少
- 9. 產出產品尺寸精準、不變形
- 11. 容易操作、節省空間、更換模具快速

- 2. 直接熱壓、直接模內乾燥
- 4. 產出時間短
- 6. 模板實際使用面積大
- 8. 產品厚度從 0.5~1.5mm
- 10. 簡潔、井然的機械結構

#### Advanced direct-hot-press, dry-in-mold thermoforming machine

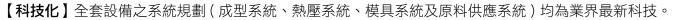
- 1. PLC touch screen panel.
- 2. Hot press and dry directly in the mold.
- 3. Minimized draft angle and smooth surface.
- 4. Short production cycle time.
- 5. High yield.
- 6. Large mold platen spaces.
- 7. Less operators
- 8. Production thickness from 0.5~1.5mm.
- 9. Keep the accurate size and shape without deformation.
- 10. Tidy and simple machine structure.
- 11. Easier to operate, less working space, exchange mold quickly.



# 3 EQUIPMENT

### 先進設備





【電腦化】從原料供應比例、熱能控制、運轉、生產週期至產品重量厚薄,均可由電腦改變參數,簡易方便。

【自動化】從原料供應至成品輸出,均為自動化生產,一人可多機操作,減少人力支出。

**Science and Technology**: System planning of full set of equipment (Forming system, Heat pressing system, Molding system and Raw material supplying system) all are advanced technic combination in the world. **Computerization**: All are computer controlled by changing parameters from material supply ratio, thermo energy control, machine running, production cycle to product's weight and thickness, easy and convenient. **Automation**: All are automated production from material supply to finished products, one operator could control many machines, minimized the labor costs.

主機系統	機型 Model	模板尺寸 Max.Mold Platen Sizes	成型模具 Forming Mold	熱壓模具 Hot Pressing Mold	熱壓系統 Hot pressing system	產出週期 Production Cycle	機種 Model of Machine
	НСРМ003	Max:1210X760mm	1	1	電熱、熱煤油 Electricity、Heat transfer oil	25~120	成型機 Forming Machine
	HETP001	Max:1350X950mm	1	2	電熱、熱煤油 Electricity、Heat transfer oil	25~120	成型機 Forming Machine
	НСРМ008	Max:1350X1150mm	1	1	電熱、熱煤油 Electricity、Heat transfer oil	25~120	成型機 Forming Machine
	HCMP-F800	Max:795X725mm	2		電熱 Electricity Heat	20~40	覆膜機 Filming Machine
	HETP06	Max:1350X1150mm				行程 :500mm	兩段堆疊、輸送堆疊機 2Steps Stack / Release Stacker





紙塑產品製程 PROCESSES OF

PROCESSES OF MOLDED PULP PRODUCTS

#### 現有的三種基本紙漿模塑產品製程

#### 【紙漿模塑產品-工業包材】

紙漿產品以半自動成型機成型後自然蔭乾或進烘箱隧道烘乾,產品厚度約從3mm~5mm,一面稍平整,一面非常粗糙。主要用為易碎,較重產品(汽車零件、馬達、家俱)的支撐,緩衝包裝,其它產品如:植物盆、花盆、醫療托盤及醫療盆、壺等,此即所謂工業包材。

Molded pulp product—Industrial Packaging: Industrial packaging produced by semi-automatic forming machine. After forming, dried naturally or dried by passing through tunnel oven. Production thickness is 3~5mm. Product surface is one side flat and rough at another side. Mainly are for supporting or buffering fragile or heavy products. (ex. Auto parts, motor or furniture.) Other packaging likes seedling pot, flower pot, urinal bottle, bedpan liner, spittoon, ampoule and surgical tray... etc.

#### 【紙漿模塑產品-精緻工業包材】

產品於成型段成型後由轉接模交模到熱壓段熱壓,直接做模內乾燥為成品,無需額外的烘箱等乾燥設備,產品厚度從約 0.6mm ~ 2mm,一面有網紋、一面光滑,熱壓後產品密度高,可成形極小的脱模角度且可把結構及特徵壓製得很清楚明顯。 主要用於手機、平板電腦…等高單價產品,體積小的 3C 電子產品包材,產品近似熱成型(吸塑)塑膠材料,此即所謂精緻工業包材。

Molded pulp product—Exquisite Industrial Packaging: Molded packaging transfer to hot pressing part from forming part then direct-hot-press and dry-in-mold, no further tunnel oven needed, products thickness from 0.6mm to 2mm, one side with wire mesh mark, and extremely smooth surface at the other side, due to high density after pressed, small radius and draft angle could be made and clear features could be pressed according to designs. Mainly packaging are for smartphone, tablet or 3C products which is small but with high unit price, It's similar to thermoformed blister plastic packaging.

#### 【紙漿模塑產品 - 客製化產品】

產品於製程中須再做其他二次加工或特殊的處理,例如同時使用不同配比的漿料,添加特殊的添加劑及顏色染劑,產品成型後再以模具加壓做二次整形、沖切、沖孔、特殊側切,壓粘製成中空、雙層包材及印刷。

**Molded pulp product—Customized Packaging**: In the process some products need secondary process or special treatment ex. Mix pulps with different ratio, adding dyes and other additives. After pressing, stamping, punching, swivel cutting, glue and press for two layer packaging and printing.

# 4 FEATURES

### 產品特色

# 紙漿纖維模塑產品



我們的自動紙漿模塑生產線可用於生產一次性的可堆肥餐具食品容器、醫療包裝、工業用緩衝材料、高檔電子產品的精 美包裝,用途多樣化,不勝枚舉。

紙漿纖維材料種類繁多,如:木漿、蔗渣漿、竹漿、棕梠纖維、再生循環回收的 OCC、ONP 材料等…這些材料模塑時,都不會釋出有毒或危險物質,導致危害環境。

綠色紙漿纖維模塑包裝,是傳統的紙板、 瓦楞紙箱、  $EPS \times PP \times PET$ 等,常用塑料包裝的最佳替代品,使用紙漿纖維模塑包裝,是世界環保的趨勢。

漸漸的,生態環境友好的紙漿模塑製品的應用,不僅僅限於餐具和粗糙皺紋多的工業緩衝包裝,而且也被廣泛的應用於周遭的實用產品,諸如:水瓶、牛奶瓶、洗滌劑瓶、化妝品盒、CD盒、刮鬍刀架、鞋盒、咖啡過濾器、高科技手機、平板、3C產品包裝,這些產品具有堅硬的結構,細膩、光滑的表面 ,更多超乎想像和更具創新性、實用性產品,已經被發明與廣泛使用。

#### Green Packaging World Eco-Friendly Trend

Molded fiber packaging is the global solution for environmental packaging material

Our production lines of automatic forming machines produce disposable and compostable tableware, medical containers, industrial buffer material and exquisite packaging for high value electronic products. We have wide variety of designs for diversification purposes. Existed and used pulp: Wood pulp, Bagasse pulp, Palm fiber pulp and Recycled OCC & ONP material. Will not release toxic and harmful material while in production process.

Green molded pulp packaging is a best substitute for traditional cardboard box, corrugated cartons, vacuum and thermoformed PVC, EPS, PP, PET, and foam plastic materials etc., Furthermore, molded pulp packaging is also word Eco-friendly trend.

Gradually, the application of Eco-Friendly molded pulp products are not just limited to tableware and rough & wrinkly industrial buffer packaging but also been applied for all practical objects around you such as water, milk, detergent bottle, cosmetics, CD, razor holder even for cell phone, tablet ....3C products holder which with rigid structure and delicate, smooth surface, more and more innovation products invented beyond our imagination.





## 紙塑品產特色 CHARACTERISTIC OF PRODUCTS

【產品特色】無毒、無味、防水、防油、自然降解性強,可回收做為非食品包材原料,無污染。

【產品用途】食品類:餐盒、餐盤、餐碗/排食品類:精品包裝、禮盒包裝、文創藝品、功能性用品、工業包裝。

#### 【產品優勢】

- 1. 內部各種成型結構提供物件最堅固保護。 2. 易於回收處置符合世界環保趨勢。
- 3. 可根據需求模塑成型各種高品質外表。 4. 生產時不添加有毒物質、結構性強。
- 5. 小巧精緻產品同時也能保護大且重的物件、中性不會產生靜電。
- 6. 紙漿模塑包材是由原生紙漿、回收紙、廢紙板製成,對環保衝擊極小,在這個環保新紀元正是 EPS、PE、 PP 及其他發泡塑膠材料 最好的替代品。
- 7. 是現今最好的綠色環保包材,是自然的材料,可降解、可回收、無毒、防水、防油、堅韌的、無靜電、 可緩衝吸震、可微波。

Characteristic of Products: Non-toxic, tasteless, waterproof, oil resistance. High nature biodegradability, recyclable for making non-food packing materials, no pollution to environment.

**Product uses**: Food grade: lunch box, lunch plate, lunch bowl. Non-food grade: exauisite packaging, gift box packaging, cultural creative art work, functional packaging, industrial packaging.

#### Advantage of Products:

- 1. Internal forming constructions provide the strongest protection for different shape products.
- 2. Easy to recycled, conforms to the environmental protection trend.
- 3. Be thermoformed according to the request to produce high quality appearance.
- 4. No adding toxic materials in production and has rigid structure.
- 5. Our products are small and exquisite, but can protect large and heavy items. It's neutral and no static electricity.
- 6. Molded pulp products are made of original pulp, recycled paper, waste paper board has minimal impact to the environment. In the new era of environmental aware, molded pulp products are the best alternatives to EPS, PE, PP and other foaming plastic materials.
- 7. Molded pulp products is the best Green Packaging, it's natural, biodegradable, recyclable, non-toxic, waterproof, oil resistance, strong, static electricity free, shock absorbent and microwavable.

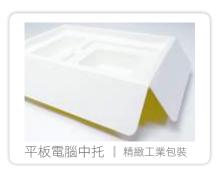


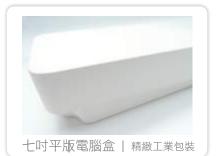
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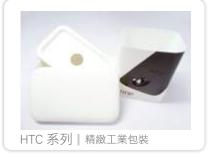
# 產品資訊

# 精工包材 創意禮盒 文創藝品 功能用品







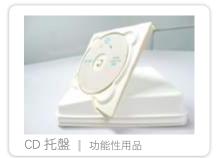




















護角墊 | 功能性用品

# 食品包材 **TABLEWARE**











L501

Size: 262x202x35mm

Case Pack: 500



Case Pack: 500































# ISO 9001 Certificate and Test Report

















