





Research In China

The Vertical Portal for China Business Intelligence

STUDY GOAL AND OBJECTIVES

This report provides the industry executives with strategically significant competitor information, analysis, insight and projection on the competitive pattern and key companies in the industry, crucial to the development and implementation of effective business, marketing and R&D programs.

REPORT OBJECTIVES

- ◆ To establish a comprehensive, factual, annually updated and costeffective information base on market size, competition patterns, market segments, goals and strategies of the leading players in the market, reviews and forecasts.
- To assist potential market entrants in evaluating prospective acquisition and joint venture candidates.
- To complement the organizations' internal competitor information gathering efforts with strategic analysis, data interpretation and insight.
- ◆ To suggest for concerned investors in line with the current development of this industry as well as the development tendency.
- ◆ To help company to succeed in a competitive market, and

METHODOLOGY

Both primary and secondary research methodologies were used in preparing this study. Initially, a comprehensive and exhaustive search of the literature on this industry was conducted. These sources included related books and journals, trade literature, marketing literature, other product/promotional literature, annual reports, security analyst reports, and other publications.

Subsequently, telephone interviews or email correspondence was conducted with marketing executives etc. Other sources included related magazines, academics, and consulting companies.

INFORMATION SOURCES

The primary information sources include Company Reports, and National Bureau of Statistics of China etc.

Copyright 2012 ResearchInChina

Research In China

The Vertical Portal for China Business Intelligence

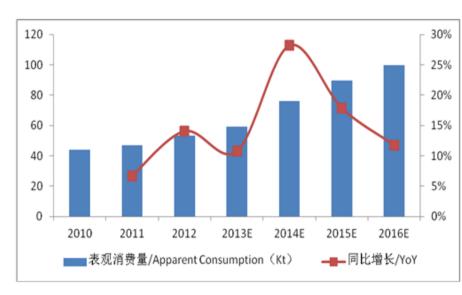
Abstract

Polyvinylidene Chloride (PVDC), Ethylene / Vinyl Alcohol Copolymer (EVOH), Polyethylene Naphthalate (PEN) are three well-known high barrier materials in the market. Featured with strong gas barrier property, organic solvent resistance, environmental protection and safety, these materials are widely used in food, drug packaging and other fields.

By 2012, the global PVDC resin capacity had been 214Kt, mainly contributed by Dow Chemical, Kureha, Asahi Kasei and other companies. Meanwhile, major Chinese PVDC resin producers included Juhua (capacity: 28 Kt/a) and Nantong Hui Yu Feng New Materials (a joint venture of Shuanghui, Kureha and Toyota Tsusho) (capacity: 10 Kt/a). In 2013, Juhua will expand the PVDC resin capacity to 34Kt/a, while in 2014, Nantong Hui Yu Feng New Materials will raise the PVDC resin capacity to 20Kt/a.

In China, PVDC resin is usually applied to the production of PVDC casing film. As of 2012, China's PVDC casing film capacity hit 80Kt/a, of which 35Kt/a (44%) came from Shuanghui and 12Kt/a (15%) was generated by Shandong Jinluo. Furthermore, China is developing PVDC plastic wrap and PVDC shrink film. In August 2012, Juhua developed PVDC plastic wrap resin independently.

China's Apparent Consumption of PVDC Resin, 2010-2016E



Source: ResearchinChina Global and China High Barrier Material Industry Report, 2013-2016

Copyright 2012ResearchInChina



In 2012, the global EVOH resin capacity reached 132Kt, mostly released by Kuraray, Nippon Gohsei and Taiwan ChangChun PetroChemical. China relies on the import of EVOH resin. In the future, in the wake of China's EVOH resin industrialization, the upgrading of food packaging and the fast-growing automotive industry, the demand for EVOH resin will ascend stably.

By 2012, Teijin, Toyobo and Mitsubishi Chemical had the ability of producing PEN. China is conducting the R & D of PEN products, and no one company can enforce mass production.

The report mainly covers the following aspects:

Overview of high barrier materials, containing definition, classification, industry chain and prospect;

Global and Chinese PVDC, EVOH and PEN markets, embracing definition, classification, production process, processing technology, capacity, output, sales volume, supply, demand, application and future development trends.

14 global and Chinese PVDC, EVOH and PEN enterprises, including PVDC producers Dow and Kureha, EVOH companies Kuraray and Nippon Gohsei, as well as PEN vendors Teijin and DuPont. The report introduces their profile, revenue, revenue structure, R & D investment, PVDC, EVOH and PEN business, business in China and prospect.

Research nChina

3 Major Global and Chinese PVDC Producers

3.1 Dow Chemical

3.1.1 Profile

3.1.2 Operation

The Vertical Portal for China Business Intelligence

Table of contents

7.2.5 PEN Business

7.3 Toray

7.4 Toyobo

3.1.3 Revenue Structure 1 Overview of High Barrier Materials 6 Polyethylene Naphthalate (PEN) 3.1.4 PVDC Business 6.1 Definition and Properties 1.1 Definition 3.2 Kureha 6.2 Production Process 1.2 Classification **3.3 BASF** 1.3 Industry Chain 6.3 Status Quo of Global and Chinese PEN Resin 3.4 SolvayPlastics Production 1.4 Prospect 3.5 Zhejiang Juhua 6.4 Application and Prospect 3.6 Henan Shuanghui Investment & Development Co., 6.4.1 PEN Film 2 Polyvinylidene Chloride (PVDC) Ltd. 6.4.2 Packaging Containers 2.1 Definition and Classification 3.7 Jiangsu Golden Material 6.4.3 PEN Fiber 2.1.1 Definition 6.4.4 PEN/PET Blends and Copolymers 2.1.2 Classification 4 Ethylene / Vinyl Alcohol Copolymer (EVOH) 2.2 Production Process 4.1 Definition and Properties 7 Major Global and Chinese PEN Producers 2.3 Global Supply & Demand Analysis and Forecast 4.2 Production Process 7.1 Teijin 2.4 China's Supply & Demand Analysis and 4.3 Global Supply and Demand Analysis Forecast 7.1.1 Profile 4.4 China's Supply and Demand Analysis 2.4.1 China's Capacity 7.1.2 Operation 4.5 Application and Prospect 2.4.2 China's Supply & Demand Analysis 7.1.3 Revenue Structure 4.5.1 EVOH Barrier Packaging Films and 2.5 Import & Export Analysis and Forecast 7.1.4 R & D Investment Co-extruded Plastic Sheets 2.6 Application and Prospect 7.1.5 PEN Business 4.5.2 EVOH Multilayer Fuel Tanks 2.6.1 PVDC Casing Film 7.1.6 DuPont Teijin Hongji Films Ningbo Co., Ltd. 4.5.3 EVOH Multilayer Composite Bottles 7.2 DuPont 2.6.2 PVDC Coating Film 4.5.4 Textile Materials 2.6.3 PVDC Plastic Wrap 7.2.1 Profile 4.5.5 Medical Materials 2.6.4 PVDC Shrink Film 7.2.2 Operation 2.6.5 PVDC Coextruded Stretch Film 7.2.3 Revenue Structure **5 Major Global and Chinese EVOH Producers** 7.2.4 R & D Investment 5.1 Kuraray

5.2 Nippon Gohsei

5.3 Taiwan ChangChun PetroChemical

- Permeability Comparison between Medium and High Barrier Materials
- High Barrier Material Industry Chain
- China's PVDC Resin Output and Apparent Consumption, 2010-2016E
- Key Performance Indicators of PVDC
- Classification and Application of PVDC
- Major Global PVDC Resin Producers and Their Capacity, 2012
- Global PVDC Resin Output, 2010-2016E
- Major PVDC Resin and Latex Producers and Their Capacity in China, 2012-2014E
- PVDC Resin Output in China, 2009-2016E
- China's Apparent Consumption of PVDC Resin, 2010-2016E
- China's Primary PVDC Export Volume and Value, 2010-2016E
- Export Value Breakdown of Chinese Primary PVDC by Destination, 2012
- Export Value Breakdown of Chinese Primary PVDC Exporting Provinces and Cities, 2012
- China's Primary PVDC Import Volume and Value, 2010-2016E
- Import Value Breakdown of Primary PVDC in China by Source, 2012
- Import Value Breakdown of Chinese Primary PVDC Importing Provinces and Cities, 2012
- Chinese Casing Film Production Enterprises and Their Capacity, 2012
- Major Chinese PVDC Coating Film Production Enterprises and Their Capacity, 2012
- Net Sales and YoY Growth Rate of Dow, 2008-2012
- Net Income and YoY Growth Rate of Dow, 2008-2012
- Sales Revenue of Dow by Division, 2012
- Revenue Structure of Dow's Performance Plastics Division, 2012
- Revenue Structure of Dow's Performance Materials Division, 2012
- Revenue Structure of Dow's Feedstocks and Energy Division, 2012
- Revenue Structure of Dow's Coatings and Infrastructure Solutions Division, 2012

- Revenue Structure of Dow's Agricultural Sciences Division, 2012
- Revenue Structure of Dow's Electronic and Functional Materials Division, 2012.
- Sales Revenue Breakdown of Dow by Region, 2012
- Divisions and Core Business of Kureha
- Net Sales and YoY Growth Rate of Kureha, FY2008-FY2012
- Net Income and YoY Growth Rate of Kureha, FY2008-FY2012
- Sales Revenue Breakdown of Kureha by Product, FY2012
- Sales Revenue of Kureha by Region, FY2008-2012
- Total R & D Investment and R & D Investment by Product of Kureha, FY2008-FY2012
- PVDC Subsidiaries of Kureha in China
- Divisions and Main Products of BASF
- Sales and YoY Growth Rate of BASF, 2008-2012
- Net Income and YoY Growth Rate of BASF, 2008-2012
- Sales of BASF by Division and Product, 2012
- R & D Innovation of BASF's Some Divisions
- R & D Investment of BASF, 2008-2012
- R & D Investment Breakdown of BASF by Division, 2012
- Four Bases and Main Products of BASF in China
- Combination of Barrier Properties (Diofan? Aqueous High Barrier Polymer Dispersions)
- Main Ixan? Barrier Polymer Resin Products
- Application of Ixan? Soluble Barrier Polymer Powders
- Revenue and YoY Growth Rate of Juhua, 2008-2012
- Net Income and YoY Growth Rate of Juhua, 2008-2012
- Revenue of Juhua by Product, 2008-2012
- Revenue of Juhua by Region, 2008-2012

- Gross Margin of Juhua by Product, 2008-2012
- Gross Margin of Juhua by Region, 2008-2012
- R & D Investment and YoY Growth Rate of Juhua, 2008-2012
- PVDC Capacity, Output, Sales Volume and Average Price of Juhua, 2009-2012
- Revenue and YoY Growth Rate of Shuanghui, 2008-2012
- Net Income and YoY Growth Rate of Shuanghui, 2008-2012
- Revenue of Shuanghui's PVDC Subsidiaries, 2012
- Revenue and YoY Growth Rate of Golden Material, 2008-2012
- Net Income and YoY Growth Rate of Golden Material, 2008-2012
- Revenue of Golden Material by Product, 2008-2012
- Revenue of Golden Material by Region, 2008-2012
- Gross Margin of Golden Material by Product, 2008-2012
- Properties of EVOH Resin
- Global EVOH Resin Producers and Their Capacity, 2012
- Global EVOH Resin Capacity Expansion, 2011-2014
- Global EVOH Resin Output and Consumption Breakdown by Region, 2011
- Global EVOH Resin Consumption Structure by Region, 2011
- Global EVOH Resin Consumption, 2012E-2016E
- China's EVOH Resin Consumption Structure, 2009 vs. 2011
- EVOH Resin Consumption and YoY Growth Rate in China, 2012E-2016E
- Global EVOH Resin Consumption Used for Barrier Packaging Film and Coextruded Plastic Sheets, 2012E-2016E
- EVOH Resin Consumption Used for Barrier Packaging Film and Coextruded Plastic Sheets in China, 2012E-2016E
- Advantages and Disadvantages of Several Types of Fuel Tanks
- Structure of Typical EVOH Multilayer Fuel Tank
- Global Fuel Tank-use EVOH Resin Consumption, 2012E-2016E

- China's Fuel Tank-use EVOH Resin Consumption, 2012E-2016E
- Global Multi-layer Composite Bottle-use EVOH Resin Consumption, 2012E-2016E
- China's Multi-layer Composite Bottle-use EVOH Resin Consumption, 2012E-2016E
- Net Sales and YoY Growth Rate of Kuraray, FY2008-FY2012
- Net Income and YoY Growth Rate of Kuraray, FY2008-FY2012
- Net Sales of Kuraray by Division, FY2009-FY2012
- R & D Expenditures and YoY Growth Rate of Kuraray, FY2008-FY2012
- EVOH Production Process of Kuraray
- EVOH Resin Models and Application of Kuraray
- EVOH Film Models and Performance of Kuraray
- Branches of Kuraray in China
- Net Sales and YoY Growth Rate of Nippon Gohsei, FY2008-FY2012
- Net Income and YoY Growth Rate of Nippon Gohsei, FY2008-FY2012
- Sales Revenue and Operating Income of Nippon Gohsei by Division, FY2011-FY2012
- Properties of PEN
- Net Sales and YoY Growth Rate of Teijin, FY2008-FY2012
- Net Income and YoY Growth Rate of Teijin, FY2008-FY2012
- Sales Revenue and Operating Income of Teijin by Division, FY2011-FY2012
- R & D Investment and YoY Growth Rate of Teijin, FY2008-FY2012
- Net Sales and YoY Growth Rate of DuPont, 2008-2012
- Net Sales and YoY Growth Rate of DuPont, 2008-2012
- Net Sales and Operating Income of DuPont by Division, 2011-2012
- R & D Investment and YoY Growth Rate of DuPont, 2008-2012
- Net Sales and YoY Growth Rate of Toray, FY2008-FY2012
- Net Income and YoY Growth Rate of Toray, FY2008-FY2012



- Net Sales Breakdown of Toray by Region, FY2012
- R & D Investment and YoY Growth Rate of Toray, FY2008-FY2012
- Net Sales and YoY Growth Rate of Toyobo, FY2008-FY2012
- Net Income and YoY Growth Rate of Toyobo, FY2008-FY2012
- Net Sales and Operating Income of Toyobo by Division, FY2011-FY2012
- R & D Investment and YoY Growth Rate of Toyobo, FY2008-FY2012
- Subsidiaries and Main Business of Toyobo in China
- Net Sales and Operating Income of Toyobo by Division, FY2013E

Research nChina

The Vertical Portal for China Business Intelligence

How to Buy

You can place your order in the following alternative ways:

- 1.Order online at www.researchinchina.com
- 2.Fax order sheet to us at fax number:+86 10 82601570
- 3. Email your order to: report@researchinchina.com
- 4. Phone us at +86 10 82600828/ 82601561

Party A:		
Name:		
Address:		
Contact Person:	Tel	
E-mail:	Fax	

Party B:				
Name:	Beijing Waterwood Technologies Co., Ltd (ResearchInChina)			
Address:	Room 502, Block 3, Tower C, Changyuan Tiandi Building, No. 18,			
	Suzhou Street, Haidian District, Beijing, China 100080			
Contact	Liao Yan	Phone:	86-10-82600828	
Person:				
E-mail:	report@researchinchina.com	Fax:	86-10-82601570	
Bank details:	Beneficial Name: Beijing Waterwood Technologies Co., Ltd			
	Bank Name: Bank of Communications, Beijing Branch			
	Bank Address: NO.1 jinxiyuan shijicheng,Landianchang,Haidian			
	District, Beijing			
	Bank Account No #: 110060668012015061217			
	Routing No # : 332906			
	Bank SWIFT Code: COMMCNSHBJG			

Title	Format	Cost
Total		

Choose type of format

PDF (Single user license)	.2,000 USD
Hard copy	2,100 USD
PDF (Enterprisewide license)	3,100 USD

※ Reports will be dispatched immediately once full payment has been received.
Payment may be made by wire transfer or credit card via PayPal.

