

This article was downloaded by:

On: 22 January 2011

Access details: *Access Details: Free Access*

Publisher *Taylor & Francis*

Informa Ltd Registered in England and Wales Registered Number: 1072954 Registered office: Mortimer House, 37-41 Mortimer Street, London W1T 3JH, UK



## The Journal of Adhesion

Publication details, including instructions for authors and subscription information:

<http://www.informaworld.com/smpp/title~content=t713453635>

## Contents Lists and Abstracts from the China Journal “Technology on Adhesion & Sealing”

**To cite this Article** (1991) 'Contents Lists and Abstracts from the China Journal “Technology on Adhesion & Sealing”', The Journal of Adhesion, 35: 1, 79 – 83

**To link to this Article:** DOI: 10.1080/00218469108030437

**URL:** <http://dx.doi.org/10.1080/00218469108030437>

PLEASE SCROLL DOWN FOR ARTICLE

Full terms and conditions of use: <http://www.informaworld.com/terms-and-conditions-of-access.pdf>

This article may be used for research, teaching and private study purposes. Any substantial or systematic reproduction, re-distribution, re-selling, loan or sub-licensing, systematic supply or distribution in any form to anyone is expressly forbidden.

The publisher does not give any warranty express or implied or make any representation that the contents will be complete or accurate or up to date. The accuracy of any instructions, formulae and drug doses should be independently verified with primary sources. The publisher shall not be liable for any loss, actions, claims, proceedings, demand or costs or damages whatsoever or howsoever caused arising directly or indirectly in connection with or arising out of the use of this material.

# Contents Lists and Abstracts from the China Journal "Technology on Adhesion & Sealing"

**Vol. 10 No. 1 February 1989**

## **Contents**

Synthesis of polyester amide adhesive and study of its properties ..... Wang Yunheng and Li Chunzhen ....	[1]
Polyethylene Chloride-modified Graft Neoprene Adhesive MCC-1 ..... He Jinliang, Wang Liya, Zhu Jiang and Chen Jianhong ....	[5]
Development of the low toxicity urea-formaldehyde resin adhesive for particleboard ..... Xu Ruijian ....	[8]
Study on the Room Temperature Fast-curing Powdered Conductive Copper Adhesive 254–21 ..... Zhao Yong ....	[13]
New development in research on adhesion proofing agent for surgical operation at home and abroad ..... Ding Fengquan and Zong Shuyun ....	[16]
Present situation of construction sealing past at home and abroad ..... Lu Dehe and Dai Mengzhuo ....	[19]
Application of SY-14 Adhesive in aluminium alloy bicycle frame ..... Lai Shihong, Zou Xianwu, Tang Falun and Zhen Ruiqi ....	[22]
Sealing adhesion-rivet jointing of the division of fuel tank of a certain type airplane ..... Qiu Jianhui ....	[26]
Adhesive-bonding of long stringer in the tensile fatigue test ..... Li Yonggen ....	[29]
Solving several problems in equipment overhaul by different bonding methods ..... Qiu Kaixian ....	[31]
Application of anaerobic adhesive in vacuum technique ..... Shi Changlong ....	[35]
Application of bonding-technology in electric motors ..... Chen Hongrang ....	[37]
Composition and application of modified PVC adhesive ..... Lu Yuming and Wang Peishen ....	[39]
Three applied examples of bonding technology ..... Dai Guohua ....	[40]
Using bonding technology to repair the feed tank of CQ6100 Lathe ..... Zhu Weixing ....	[41]
Application of bonding technology in chemical analysis and examination of hot zinc-spraying process ..... Zhou Tianzeng ....	[42]
Adhesive-bonding of large water trough ..... Nie Fang and Dong Hongbin ....	[44]

### **Synthesis of Polyester Amide Adhesive and Study of Its Properties**

Wang Yunheng, Li Chunzhen

(Hebei Institute of Technology)

### Abstract

The preparation of polyester amide, a new polymer, which was prepared by using a copolyester and different polyamides as raw materials, in the presence of a catalyst and through the exchange reaction in macromolecule chains, is described in this paper. This new polymer has been characterized by infrared spectrometry and other methods. The results showed that this exchange reaction exists.

#### **Polyethylene Chloride-modified Graft Neoprene Adhesive MCC-1**

He Jinliang, Wang Liya, Zhu Jiang, Chen Jianhong

(Hubei Research Institute of Chemistry)

### Abstract

The preparation, properties and applied results of Polyethylene Chloride (CPE)-modified Graft Neoprene Adhesive MCC-1 are described in this paper. MCC-1 was prepared by graft copolymerization of methyl methacrylate onto both neoprene and CPE initiated with benzoyl peroxide in toluene. By modifying with high chloride content CPE, the adhesive cost has been lowered and the bonding strength of it has been improved. MCC-1 can be used for shoe making, etc.

#### **Development of Low Toxicity Urea-Formaldehyde Resin Adhesive for Particleboard**

Xu Ruijian

(East China Institute of Technology)

### Abstract

The basic principle of the production of low toxicity urea-formaldehyde (LUF) resin and the special process and its parameters are dealt with in this paper. The experimental results showed that the application of LUF in the production of particleboard is successful.

#### **Study on the Room Temperature Fast-Curing Powdered Copper Conductive Adhesive 254-21**

Zhao Yong

(Ha' erbin Energy Saving Products Making Factory)

### Abstract

The effect of proportion of room temperature fast-curing powdered copper conductive adhesive on the electric conductivity and the effect of the different proportion on curing speed and working temperature, and the moisture resistance, pot life and storage life of the conductive adhesive are studied in this paper.

The experimental results showed that its volume resistivity is  $\leq 2 \times 10^{-3} \Omega \cdot m$  and shear strength is  $\geq 7$  MPa.

**Vol. 10 No. 2 April 1989****Contents**

Cryogenic adhesives and their applications in rocket and spacecraft .....	Li Shiepin and Wang Hongkui ....	[1]
Study on a bonding agent for decorative stone .....	Wang Dequan ....	[6]
New type elastomer-based sealing adhesives .....	He Daogang ....	[10]
Protective adhesive tape for surfaces .....	Lin Zhongqiang ....	[14]
The composition of a general purpose primer for anaerobic adhesives and sealants .....	Cai Zhengying and Yang Yingtai ....	[18]
Room Temperature Curing Sealing Adhesive SG-100 for cable .....	Zhu Baogen ....	[19]
Biphenol A epoxide resin-based adhesive for magnetic head .....	Zhao Rujian, Zhu Zhenguang, Lin You and Xu Lanjie ....	[23]
Manufacturing technology of pressure-sensitive adhesive film .....	Liao Baoyun and Liu Jianjun ....	[25]
Application of slideway coating technique in machine tool repair .....	Wang Renhan ....	[28]
Bonding and sealing of high temperature strong acid descaling bath .....	Huang Wenhui, Ji Guoqin, Li Fuzhi and You Shan ....	[30]
Application of bonding technology on dies .....	Yie Hanqi ....	[33]
Analysis of the failure of an epoxy adhesive used in bonding feed pump .....	He Pingxiu ....	[36]
Using an adhesive to bond acidproof lining to descaling bath and waste acid storage bath .....	Wang Chunxiang ....	[38]
Two examples of adhesion .....	Cai Junwei ....	[39]
Polystyrene sealant and its uses .....	Chen Ende ....	[40]

**Cryogenic Adhesives and Their Applications in Rocket and Spacecraft**

Li Shiepin, Wang Hongkui

(Beijing Institute of Materials and Technology)

**Abstract**

The regular changes of the mechanical properties of cryogenic adhesives with temperature are researched and two features of the cryogenic adhesives are pointed out: 1. Peak values appear in the mechanical properties as temperature drops and 2. The low temperature shear strength is influenced greatly by the processes. The application, features and technology of the cryogenic adhesives in modern rocket and spacecraft and the problems appearing in the application of the cryogenic adhesives made in China are discussed.

**Study on a Bonding Agent for Decorative Stones**

Wang Dequan

(Henan Building Materials Research and Designing Institute)

**Abstract**

The composition, preparation and properties of a new type inorganic bonding agent and the performance of the materials used in the bonding agent are described in this paper. The bonding agent is good for pasting up natural marble and other decorative stones.

**Vol. 10 No. 3 June 1989****Contents**

Synthesis and properties of rosin polyurethane adhesive ..... Liu Guozheng, Wang Xingfeng and Wei Guiying ....	[1]
Study on medium temperature curing resin systems ... Zhang Xuezhong and Chu Hong ....	[6]
Study and application of a high temperature and fused salt corrosion proof inorganic adhesive, a special-purpose adhesive for salt-bath furnace ..... Zhong Kehuang, Li Zhongyi and Li Jinhua ....	[10]
Development of alkaline lignin bonding agent ..... Zhao Qingtao, Ji Weichang, Chui Cangyi and Wang Yuxiang ....	[15]
Adhesive for composite film for food packages ..... Ou Ya ....	[18]
Bonding Agent SB-237 and its application ..... Zhai Guangyu, Wang Jinguo, Guo Dazhong, Liu Gang and Zhao Qingzhi ....	[21]
A new type optical structural adhesive, Adhesive GJJ82-1 ..... Wang Shuwen ....	[23]
Sealing Adhesive DH-1 ..... Zhao Qinghua and Wan Taixin ....	[25]
New technique for bonding an optical dial to the metal base of the dial ..... Wang Shuwen ....	[27]
Study on bonded results of the self interface of butadiene-styrene rubber and neoprene ..... Jiang Songhe ....	[29]
A test for the properties of adhesives and study on their application ..... Chen Bofeng ....	[34]
Using an adhesive to repair cast iron pipe die ..... Li Dingyi and Zhong Ciyun ....	[37]
Bonding and sealing the air holes and sand holes in a pressure-proof casting with Adhesive FZ-II ..... Li Fuzhi ....	[39]
Mending worn leatherette seats of trains ..... Li Defa ....	[41]

**Synthesis and Properties of Rosin Polyurethane Adhesive**

Liu Guozhen, Wang Xingfeng, Wei Guiying

(Guangzhou Institute of Chemistry, Academia Sinica)

**Abstract**

The synthesis of rosin polyurethane and effects of its various components on the viscosity and the elasticity of polymer is reported in this paper. It is found that the modified rosin may increase the elasticity and hardness of the polymer, and the polyurethane may increase its adhesion. The polymer has good bonding strength, and water-, oil-, and solvent-resistance. The determination of DTA-TG-DTG shows that the polymer has good thermal stability, and the temperature of its weight loss rises with the increase of the esterificity of rosin.

**Study on Medium Temperature Curing Resin Systems**

Zhang Xuezhong, Chu Hong

(Beijing No. 621 Institute)

### Abstract

Latent curing agent N—bisphenol A-epoxide system can be cured at 125°C. The hydroscopicity, storage stability and physical-mechanical properties of a few curing systems are compared, and the effect of temperature on the tensile fracture morphology of the cast material are analyzed primarily in this paper. Compared with dicyandiamine, an accelerating agent-epoxide curing system, the present system has a similar modulus and higher strength and toughness. The prominent advantage of the latter system is that the storage stability of the preimpregnated material is up to four months. At the present, this is one of the medium temperature curing systems which are used in advanced composites that have the longest storage period.

#### **Study and Application of a High Temperature and Fused Salt Corrosion Proof Inorganic Adhesive, a Special-purpose Adhesive for Salt-bath Furnace**

Zhong Kehuang, Li Zhongyi

(Bonding Technology Research Institute of Xiangfan City);  
Li Jinhua (State-run Xiangdong Machinery Plant)

### Abstract

The special-purpose adhesive for salt-bath furnace is a high temperature and fused salt corrosion proof inorganic adhesive prepared by taking acid aluminum phosphate as the base stock and kaolinite as filler components. The selection of the base stock, curing mechanism and the composition of the filler, main properties, DTA curves, application technique and initial applied results of the adhesive are mainly described in this paper.

#### **Development of Alkaline Lignin Bonding Agent**

Zhao Qingtao, Ji Weichang, Chui Cangyi, Wang Yuxiang

(Jilin Chemical Engineering Institute)

### Abstract

The methods for preparing a structural material bonding agent by condensing the alkaline lignin in the waste liquor of soda pulping process with formaldehyde and phenol are described. The optimum condition was determined by orthogonal design, and a bonding agent was prepared under the condition. The bonding strength and moisture content of plywood manufactured by the bonding agent exceeded the National Standard GB738-75 and the demands of GB738-75 for adhesives of the second class.