

# MAKING THERMAL TRANSFER EASIER





ARMOR is an international industrial company, one of the world leaders in ink chemistry and print consumables.

ARMOR employs over 1,900 people around the world in its 3 business areas:

- -AICP (ARMOR Industrial Coding & Printing) designs and manufactures ink consumables for Thermal Transfer printers: the most widespread technology for printing barcodes, logos, use-by dates and batch numbers on labels or directly onto flexible packaging.
- -AOP (ARMOR Office Printing) manufactures and markets office equipment consumables for inkjet, laser, fax and impact printers.
- -ASE (ARMOR Sustainable Energies) exploits the expertise of AICP and is fully committed to the sustainable development strategy of the ARMOR Group. The objective of this new activity is to take OPV (organic photovoltaic film) technology to the industrial stage and to position ARMOR as a renowned player in the energy transition field over the coming years.

### THE ARMOR GROUP

### **OUR VALUES**

### A people company



ARMOR is developing a management style based on trust and team spirit, conducting company relations in a respectful and constructive atmosphere. Each employee has the opportunity to be a part of progress and change. We want to be socially responsible and to build a company with a human face, by making sure that our actions reflect our convictions.

### **Customer orientation**



Placing customer service at the heart of the company policy means we are always striving to give customers the services they require and to listen to their needs. We want our customers to feel they are special. Throughout the world, they can rely on our enthusiastic and responsive teams for whom customer satisfaction is the main objective.

#### Innovation



Innovation will safeguard the company's future. We have chosen to adopt a long-term vision by focussing our R&D efforts on developing technologies to meet the challenges of the future, with new products which are environmentally friendly and protect the planet.

### Commitment



We strive to perform with excellence. We want everyone to share a single guiding objective: to be amongst the very best in all our business activities! We are committed to a collective "Can-Do" spirit enabling each individual to develop their full potential within the company, thus ensuring people are proud to work for ARMOR.



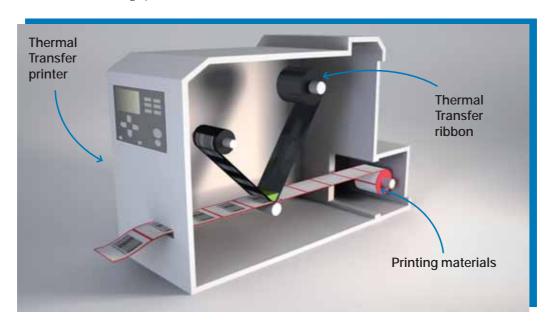
## ARMOR INDUSTRIAL CODING AND PRINTING

ARMOR is a world leader in the design and manufacture of ink films used in Thermal Transfer technology.

### THERMAL TRANSFER TECHNOLOGY: AN IDENTITY CARD FOR PRODUCTS

All the products and services available in the world have a name, a maker and a user, all of which add up to an identity that has to be recorded. If you replace the words "recorded" and "identity" by "label" and "barcode", you find yourselves in the world of Thermal Transfer.

In a world that can sometimes be hostile and damaging, there is one golden rule for TT: to remain legible in the face of anything that can be done to it, so that the message can be delivered intact, with no damage or mistakes, with no gaps or omissions.



Printing by Thermal Transfer consists of applying thermofusible ink onto a receptor using a heat source emitted by the printer.

Thermal Transfer technology is able to print on many different media and in very different environments, giving a high quality and long-lasting result.

These criteria make it one of the most widespread print technologies for product identification and traceability. It is the world's most-used technology for marking barcodes, logos, use-by dates and other batch numbers on labels and flexible packaging, in sector such as industry, logistics and distribution.



# ARMOR INNOVATES FOR YOU!

### **WE INNOVATE**

FORMULATION AND DEVELOPMENT, ORIGIN OF OUR EXPERTISE.

We dedicate more than 4% of our revenue to Research and Development in order to create new solutions that fulfill your future printing applications. And innovation doesn't stop at the laboratory and formulations. For many years now, ARMOR has been developing its engineering expertise, providing new solutions for its manufacturing facilities, most notably to the benefit of quality, productivity and service, but also safety and the environment.



PLANNING AND DEVELOPMENT, TO REMAIN THE PARTNER YOU CAN ALWAYS RELY ON.

ARMOR's development over the past 20 years has been supported by a number of successive investment plans totalling 120 million Euros. A recent example: 12 million Euros invested in a new high-performance coating machine.



COATING AND TRANSFORMING, KEYS OF THE PERFORMANCE.

The inner quality of our ribbons is linked to the total control of the ink grinding and then the coating onto the carrier film. Production capacity of jumbos, which are always manufactured to the highest quality, is being continuously increased. Slitting quality is the guarantor of good printer performance.

### **WE GUARANTEE**

A DECLARED LONG-TERM COMMITMENT.

This commitment to the future is manifested by the triple certification for Quality, Safety Environment (QSE) and the energy management systems certification:

- Quality ISO 9001
- Environment ISO 14001
- · Health & Safety OHSAS 18001
- Energy ISO 50001

Moreover, our converting subsidiaries are also ISO 9001 certified:

- ARMOR USA ISO 9001 ISO 14001 OHSAS 18001
- ARMOR Asia ISO 9001 ISO 14001 OHSAS 18001
- ARMOR China ISO 9001 ISO 14001 OHSAS 18001
- ARMOR Brasil ISO 9001











High speed coating machine.



Robotic slitting cell.

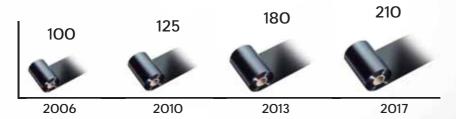


Coating on PET film



Slitting in rolls







Shipment to customers

### THINK GLOBALLY, ACT LOCALLY.

### A REAL GROUP FOR A WORLDWIDE APPROACH.

ARMOR covers the world market and is developing its business by using its expertise and a strategy that is common to all members of the Group.

All our ranges are designed and developed by the R&D department at the ARMOR TT Industrial & Expertise Centre located in France.

The ARMOR TTIEC is a unique site where our engineers make advances in production equipment, to the benefit of all the other Group production sites. Numerous patents have been, and will continue to be, filed. It is also a training centre for the employees at our subsidiaries.

The Quality Management System and the Sustainable Development policy are rolled out in the same way at all Group sites.

### ARMORUSA

Created in 1999



Staff: 70 people.

Certifications: ISO 9001, ISO 14001

& OHSAS 18001.

Activity: Slitting and sales.

Area: North America and South America (except Mercosur).

**Staff:** 600

Certifications: ISO 9 **OHSAS 1800** 

Activity: Cond

Area: EMEA (except Sub-



Created in 2014



Staff: 11 people. Activity: Slitting. Area: Mexico.



Created in 2007



Staff: 37 people.

Certifications: ISO 9001.

ISO 14001 & OHSAS 18001 in process.

Activity: Slitting and sales.

Area: Mercosur.



- Production and sales of Thermal Transfer film.
- Sales of Thermal Transfer film.
- Logistics centre.



### ARMOR, PROVIDING LOCAL SUPPORT IN A GLOBAL MARKET.

The task of each ARMOR business unit is to devote itself entirely to bring a dedicated service within its respective area.

Whether you are operating globally or locally, you will find a service specially adapted to your needs. Some ranges are intended for specific geographical areas in order to guarantee an offer suited to the needs of each market.

Local technical services bring added support to suggest the best solution for the most demanding applications.



Created in 1922







Created in 2004

Staff: 105 people.
Certifications: ISO 9001,
ISO 14001 & OHSAS 1800.

Activity: Coating (one grade),

slitting and sales.

Area: China and Hong Kong.







Created in 1999

Staff: 70 people. Certifications: ISO 9001, ISO 14001 & OHSAS 1800.

Activity: Slitting and sales.

Area: Asia Pacific

(except India, China and Hong Kong).





Created in 2014

Staff: 17 people.

Activity: Slitting and sales.

Area: India.



Staff: 5 people.

MOR Africa

**Activity:** Slitting and sales. **Area:** Sub-Saharan Africa.

### SUSTAINABLE DEVELOPMENT, MORE THAN A COMMITMENT, A RESPONSIBILITY.



### COMMITMENTS IN SUSTAINABLE DEVELOPMENT:



### Global Compact:

The United Nations Global Compact initiative invites companies to apply fundamental values in the fields of human rights, working conditions, environmental protection and fight against corruption.



### Responsible Care:

The Responsible Care charter is a voluntary effort of the chemical industry towards constant improvement of performance in the fields of health, safety and environment.



### Decaplan:

An internal action plan structured around 10 working groups and involving all the skills practiced within the company. Each of the 10 plans has the general objective of improving social & working conditions and/or environmental protection.



### SOLFREE®

## THE 1<sup>ST</sup> SOLVENT FREE PROCESS FOR TT RIBBONS.

ARMOR is the first manufacturer in the world to offer a ribbon produced entirely without any solvent being used during coating: a revolution for Thermal Transfer technology.

This new technology brings you another asset for the promotion of ARMOR TT ribbons towards end users involved in Sustainable Development: SolFree® reduces companies' carbon footprint!

A roll of AWR\*470 SolFree® saves 365g of CO<sub>2</sub>\* compared to other wax rolls produced using traditional processes.

\*based on average roll dimensions of 110mm x 300m.

ARMOR is now committed to apply the SolFree® process to other ribbons in the range, beginning with those selling in the highest volumes in order to maximise the number of environmentally-friendly rolls available.

### **CORPORATE SOCIAL RESPONSIBILTY**

Social responsibility is in the DNA of the ARMOR Group. We want to demonstrate through our actions that industry is able to respect the environment, contribute to the fulfilment of the people working for the company and promote human values in wider society.

Every year ARMOR publishes its CSR report which describes its many initiatives and achievements. The report can be downloaded from our website at www.armor-tt.com

### A COMPLETE RANGE TO MEET AL



### A range of products covered by international standards\*:

- Food contact approval: state that inks can be used for indirect and/or direct food contact.
- · Heavy metals analysis to answer several regulations like the European directive on RoHS.
- UL (United States) and CSA (Canada): guarantee length of life and legibility of the ink on a given print substrate.
- BS 5609: guarantees resistance to immersion in seawater of a printed label.
- REACH: as a European manufacturer, ARMOR is completely fulfilling REACH requirements. Our ribbons are free from the Substances of Very High Concern (SVHC).
- Halogens: in order to conform to the standards that apply to electrical and electronic equipment (EEE) manufacturers, our ribbons are designed without halogens or halogenated components.

<sup>\*</sup> These standards may refer to specific ribbon grades.

### L YOUR REQUIREMENTS.

### AXR®: resin ribbon

### High resistance and durability

The products in the AXR® range are intended for extremely demanding applications. The ARMOR resin ribbon range is made up of high technology products that are particularly recommended for synthetic label materials (PE, PP, PET...).

These high performance products are highly resistant to smudge, to high temperature, to solvents and to some detergents.

Some are adapted for specific applications (printing on textiles for example).

### APR®/APX®: wax-resin ribbon

### Performance and multi-purpose

The main features of the APR\*/APX\* wax-resin range are the high quality of its performances and its wide field of applications. This range of ribbons gives excellent results on coated papers and synthetics (PE, PP, PET...). It has good resistance to smudge, is capable of printing barcodes at 90° and has sharp definition. This range is recognised for the exceptional quality of its backcoating, which gives excellent protection to the print head.

### AWR®/AWX®: wax ribbon

### **Economy and quality**

The wax range, AWR\*/AWX\* is an economical identification solution developed for "flat head" technology. Its main feature is that it can be used on a wide range of label materials and is suitable for both vellum and coated papers. This range is recognised as being exceptionally sensitive and densely black. The quality of the backcoating gives excellent protection to the print head. The AWX\* range has good resistance to smudge.



## SUPPORTING YOUR DEVELOPMENT THROUGH NEW MARKETS.

### A CLEAR AND COHERENT SALES STRATEGY

ARMOR, a leader in Thermal Transfer technology, concentrates its energy on printer manufacturers (OEMs) and their main distributors. The sale of jumbos to slitters does not figure in our strategy. For you, this means you can approach your customers with total confidence in high product quality, enabling you to maintain your sales strategy.

## PRODUCTS ADAPTED TO YOUR CUSTOMERS' NEEDS, WITH PERSONALISED PRODUCTS AND TOOLS.

The product range is put together to help you to develop your existing and future applications, while establishing the loyalty of your customers through your products.

Our stocks mean you are able to quickly access the most popular products on the market. For your special applications, straightforward but flexible product ranges offer you high-performance solutions for any conditions.



### 2GO2, YOUR ARMOR EXTRANET: A COMPLETE, EFFECTIVE AND ACCESSIBLE PARTNERSHIP TOOL.

Your partnership with ARMOR automatically gives you access to 2go2, an online database containing the information relevant to our business relationship:

- · Your sales offer containing prices, conditions and services,
- Your stock list,
- Your monthly purchasing statistics (turnover, volume by ribbon, by month and year-to-date),
- · Sales aids.
- · Certifications.

And much more besides!



### READY-TO-USE MARKETING AND TECHNICAL TOOLS.

To help you to meet your customers' needs, ARMOR has made available to you the tools you require to promote your products:

- Thorough, professional documentation,
- A comprehensive and multilingual Internet site, the shop window for ARMOR ICP and an effective training tool for Thermal Transfer technology,
- Presentation tools for your company events,
- · Images, posters...



### **DISCUSSION FORUMS**

ARMOR Technical Club holds regular meetings hosted by the different ARMOR sites worldwide. These events are an opportunity for ARMOR to bring together its partners and to discuss our markets, TT technology and our vision for the future.



### ARMOR contacts

### **EMEA**

#### ARMOR S.A.S. - Head Office

20, rue Chevreul - CS 90508 44105 Nantes Cedex 4 **FRANCE** 

Tel +33 (O)2 4O 38 4O OO

e-mail: salesttr@armor-group.com

#### ARMOR GmbH (office)

Hessenring 113 D-61348 Bad Homburg **GERMANY** 

Tel +49 (O)61 72 66 45 45

e-mail: armor.de@armor-group.com

#### ARMOR UK Ltd. (office)

Suite 212, the Spirella Building Bridge Road, Letchworth Herts, SG6 4ET UNITED KINGDOM Tel +44 (O)1462 476 333

e-mail: armor-uk@armor-group.com

#### ARMOR AFRICA

P.O. Box 15612 Farrarmere 1518 - SOUTH AFRICA Tel +27 (O)10 O10 O057 e-mail: armor-africa@armor-group.com

### **AMERICAS**

#### ARMOR USA, Inc.

2900 Earhart Court, Suite 220 Hebron, KY, 41048 USA

Tel +1 859 689 2100

e-mail: armor-usa@armor-group.com

### ARMOR BRASIL, Ltda

Rua Candelária 341 Coroado - Manaus / AM CEP 69082-267 **BRAZIL** 

Tel +55 92 4009-7400

e-mail: armor-brasil@armor-group.com

### ARMOR SÃO PAULO (Office)

Rua Cláudio Soares 72, cj.1005 Pinheiros – São Paulo / SP CEP 05422-030 BRAZIL

Tel +55 11 4314-1511

e-mail: armor-brasil@armor-group.com

#### ARMOR MEXICO

Naps-Guanajuato S de RL de CV Carretera Estatal 431 KM 2.2 Hacienda la Machorra, Lote 95, Modulos 9 y 10 de Edificio Tech 04 Municipio del Marques, Parque Industrial TEcnologico Queretaro, C.P. 76246 MEXICO Tel: +52 (442) 153 7608 e-mail: armor-mexico@armor-group.com

### **ASIA - PACIFIC**

### ARMOR ASIA Imaging Supplies PTE Ltd

21 Changi North Way Pan Asia Logistics Centre SINGAPORE 498774 Tel +65 6221 90 44

e-mail: armor-asia@armor-group.com

### ARMOR JAPAN KK (office)

2-14-11-403 Kanda-Jimbocho Chiyoda-ku Tokyo 101-0051 - JAPAN Tel +81 3 5465 2021

e-mail: armor-japan@armor-group.com

### → ARMOR KOREA (office)

# 304-2 Daeryung Techno Town 3 Cha, 115, Gasan digital 2-ro, Geumcheon-gu, Seoul 153-772. KOREA Tel +82 (O)2 2662 1359

e-mail: armor-asia@armor-group.com

### ARMOR INDIA Coding and Imaging Supplies PVT Ltd

Plot No 22-C & 22-C(PART) KIADB Industrial Area Phase-1 BIDADI - BANGALORE RURAL - 562109 INDIA

Tel +91-9243607577/79/80

e-mail: armor-india@armor-group.com

#### ZHONGSHAN ARMOR INDUSTRY CO., Ltd

39B Industrial Main Road Xiaolan Industrial Zone Xiaolan, Zhongshan Guangdong 528415 CHINA

Tel +86 760 2212 5229

e-mail: armor-china@armor-group.com

ARMOR BEUING (office)
Room 602, Yuanchenxin Plaza
12 Yumin Road. Chaoyang, Beijing 100029 CHINA Tel +86 (10) 8225-2590

e-mail: armor-china@armor-group.com

### → ARMOR SHANGHAI (office)

Room 2205, HeChuang Building 450 Cao Yang Road Shanghai 200063 CHINA

Tel +86 21 6091 9508 - +86 21 6091 9509 e-mail: armor-china@armor-group.com





