

technologies for your future

TAMPOPRINT® GmbH

Lingwiesenstraße 1 70825 Korntal-Münchingen GERMANY

Tel. +49 7150 928-0 Fax +49 7150 928-400

info@tampoprint.de www.tampoprint.com

TAMPOPRINT® IBERIA S.A.U.

Polígono Industrial Martorelles C/ Sant Martí, s/n (entre Gorgs y Mogent) 08107 Martorelles (Barcelona), SPAIN

Tel. +34 93 2327161 Fax +34 93 2471500

tampoprint@tampoprint.es www.tampoprint.com

TAMPOPRINT® INTERNATIONAL CORP.

1400 26th Street, Vero Beach FL 32960 USA

Tel.+1 772 778-8896, 800 810-8896 Fax +1 772 778-8289

info@tampoprint.com www.tampoprint.com



The reproduction of trademarks and brands used in this brochure, even if not explicitly expressed, does not justify the assumption that such names or symbols may be considered as free as defined by the Trademark Act and may therefore freely be used. The rights are the property of the respective owner. TAMPOPRINT products are permanently updated to keep pace with the latest technological developments. For this reason, figures and descriptions are non-binding. Our machines are manufactured based on the currently valid European Machinery Directives as well as the European product standards EN 1010-1 and EN 1010-2.

 $\label{thm:copyright} \textbf{@} \ \textbf{TAMPOPRINT GmbH}. \ \textbf{Subject to technical changes and other modifications}.$

All locations are certified ISO 9001:2015



LEADSPad Printing Clichés



LASER MARKING PAD PRINTING CONSUMABLES SERVICE Clichés Product Range

TAMPOPRINT®

Worldwide



Pad printing machines

Summary







Cliché cylinders



Cliché plates



Thin cliché plates



Cliché bands



Service



Accessories



Additional consumables



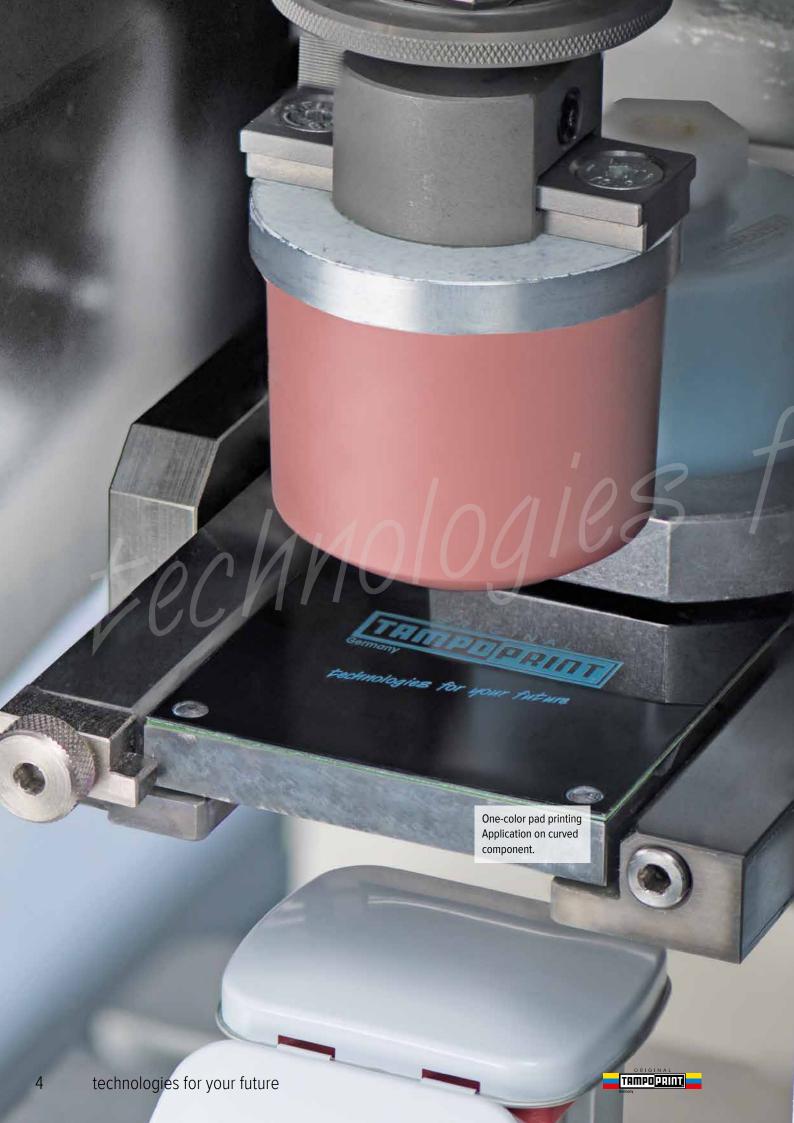




Everything from a single source

PROCESS OWNERSHIP

Consulting
Application technology
Development
Standard machines
Special machines
Consumables
Service
Accessories
Service
Retrofit



We take care of the entire process

Our Mission

Your Partner for Laser Marking and Pad Printing

As a company that has been supporting customer applications worldwide for decades through in-house developments in the field of pad printing and lasers, the definition of the company mission with "100 % process ownership" is almost logical. We see ourselves as a "one-stop shop" for all customers who need a partner who takes care of their needs right from the start. Our strength here lies in the

turn-key solution, from the entry-level machine in the manual processing sector to the fully automated high-tech solution. We accompany our customers throughout their product life cycle and beyond. Driven by our mission, we not only take care of the machine, but also offer our customers all consumables from our own production sites as well as from selected suppliers.







Cliché Production

Highest material quality from scratch

In our own cliché production, we set our standards high right from the start by producing the cliché raw material ourselves. Our many years of expertise form the foundation on which we are constantly building. We are experts in our business and know exactly what is important in the production of raw clichés. With meticulous care and precise coordination, we ensure that every pad printing cliché is of a constantly high quality.

Innovation is a key driver for us. We have developed new cliché technologies that have significantly advanced pad printing. This has enabled the transition from analog to

digital imaging and opens up new possibilities for our customers in their printing processes. We are continuously working to further improve our products and open up new possibilities in pad printing.

Third-party products also benefit from our claim for quality and the high performance of our clichés. With our flexible and variably adjustable cutting and punching tools, we produce pad printing clichés for almost all third-party brands to meet your individual requirements.



Cliché production

In-house developed cliché material for ideal printing results





Cliché Cylinders

High-performance clichés for rotary pad printing

Our cliché cylinders are used for precise all-round printing of rotationally symmetrical parts and for decorative mass printing of caps. Using a high-precision laser engraving process, cliché cylinders are directly engraved with screen and line motifs. This enables us to image your pad printing cliché immediately after approval in our cliché studio.

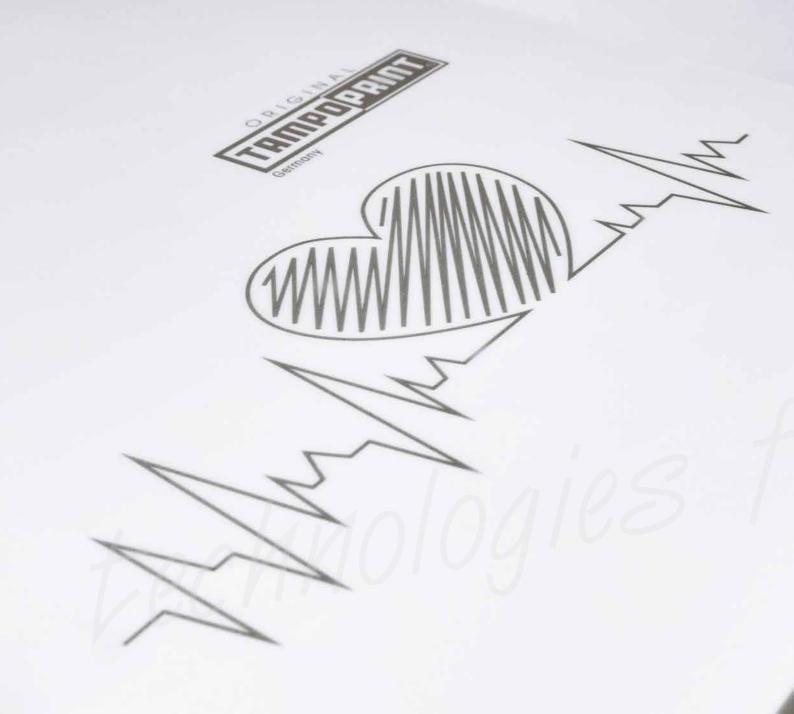
Advantages

- Large selection of high-performance cliché cylinders
- Cliché cylinder imaging with high-performance lasers
- In-house prepress department
- Optimally matched to rotary printing requirements
- Ready-to-print cliché cylinders 100 % reproducible
- In-house production and continuous further development of the cliché material



Cliché cylinders Ceramic cylinders and CP cliché cylinder





UNIVERSALLY APPLICABLE

Cliché Plates

Original TAMPOPRINT pad printing clichés

Classic pad printing is universally suitable for decorative and technical marking. To perfect the printing result, we have developed special flat cliché types for a wide range of requirements.

For high or low quantities, halftone or line engraving - in our portfolio you will find your suitable flat cliché. In standard sizes for TAMPOPRINT machines or custom-made for other brands

Advantages

- Large selection of pad printing clichés
- Pad printing clichés for all system sizes
- Pad printing clichés for third-party products
- In-house prepress department
- Optimally matched to pad printing requirements
- Ready-to-print pad printing clichés
- In-house production and continuous further development of the cliché material



Cliché pates

Ceramic cliché plate, steel cliche plate





Thin Cliché Plates

Original TAMPOPRINT pad printing clichés

Discover the advantages of our aluminum thin clichés with special coating - the perfect alternative for fast production and flexible order processing. With these clichés, you can image directly yourself and on your own, whether by laser or photo technique. They allow you to create line and halftone engravings independently, quickly and easily

Whether you need line engraving for clear contours or halftone engraving for fine shading - there are no limits to what you can do with our aluminum thin plates. The flexibility and simplicity of imaging allows you to respond quickly to changing requirements and orders.

Advantages:

- Large selection of pad printing clichés
- Pad printing clichés for all system sizes
- Pad printing clichés for third-party products
- Independent production of print-ready clichés
- Laser-capable pad printing clichés
- In-house prepress department
- Ready-to-print pad printing clichés
- Optimally matched to pad printing requirements
- In-house production and continuous further development of the cliché material



Thin cliché plates (for laser engraving and UV exposure)
Aloxid-special, Magnet-Aloxid, record-special, Magnet-screen and Magnet-Eco clichés





Cliché Bands

Original TAMPOPRINT pad printing clichés

The TAMPOPRINT cliché bands were specially developed for the TAMPOPRINT machine HYBRID 90-2. A pad printing machine with integrated cliché production. The cliché band is inserted into the machine, lasered "on demand" in the machine and then used for the printing.

Advantages

- Laser-capable cliché band
- Variable deep laser engraving possible
- Short set-up times
- Fast print image change without changing the cliché
- Printing process and cliché production at the same time
- Optimally matched to pad printing requirements



Cliché bands

microflex-cliché band HYBRID and INTAGLIO laser cliché band HYBRID





Selection guide

Pad Printing Cliché

Pad printing clichés for every application

In our cliché studio, we have been working on new cliché materials and developing suitable imaging processes for decades. This means that today we can produce the optimal pad printing cliché for every application. Our years of experience enable us to address the special features of pad printing and use them for the best result.

Production output of pad printing clichés

The production output corresponds to the service life of a pad printing cliché, which is influenced by various factors. The handling of the pad printing cliché and the entire system play a decisive role. Thanks to the perfect coordination and development of the TAMPOPRINT pad printing components, they have a significantly longer service life compared to competitor products.

Pad printing cliché type	Max. number of printed parts	Production	Do-It-Yourself	Motif
Ceramic cliché	3 Mio.	Laser	_	Line
Steel cliché	1 Mio.	Etching	_	Line, screen
Steel cliché SST	1 Mio.	Etching	_	Line, screen
Aloxid-special cliché	80.000	Laser	yes	Line
Aloxid-special cliché -R ¹⁾	80.000	Laser	yes	Line
Magnet-Aloxid cliché	80.000	Laser	yes	Line
Magnet-Aloxid cliché -R ¹⁾	80.000	Laser	yes	Line
record-special cliché	80.000	Etching	yes	Line, screen
Magnet-screen cliché	20.000	Alcohol	yes	Line, screen
Magnet-Eco cliché	6.000	Water	yes	Line, screen
microflex-cliché band HYBRID	10.000	Laser	yes	Line
Cliché band CTP	10.000	Laser	yes	Line
CP cliché cylinder	35 Mio. ²⁾	Laser	_	Line, screen
Ceramic cylinder	350 Mio. ²⁾	Laser	_	Line, screen

^{1) -}R = Thin cliché with reduced coating thickness

The stated production output corresponds to the values determined by TAMPOPRINT, taking into account a wide range of influencing factors.



²⁾ with 2 lanes and 8 motifs/lane

Cliché types overview

Areas of Application

CLICHÉ CYLINDERS

Manufacturing method: Direct laser engraving

CP CLICHÉ PLATE

Line motifs / screen motifs

The CP cliché cylinder is an in-house development of the TAMPOPRINT GmbH for rotary pad printing. Impressive features of the cliché cylinder are its high service life and low weight. A high-performance laser engraves the print images directly onto the cliché cylinder. This guarantees the highest registration accuray in the radial and axial directions.

CERAMIC CLICHÉ CYLINDER

Line motifs / screen motifs

After extensive material research,

TAMPOPRINT was able to bring the ceramic
cliché to series production readiness, so that today it
enjoys extreme popularity. These are all-ceramic cliché sleeves with aluminum lids for rotary pad printing. The ceramic
cliché is characterized by unsurpassed running performance
and acid resistance; no risk of corrosion.

CLICHÉ BANDS

Manufacturing method: Direct laser engraving

MICROFLEX-CLICHÉ BAND HYBRID Line motifs

Trend-setting plastic cliché band, exclusively developed for the HYBRID pad printing machine series. The cliché is produced by the integrated laser component. There is no need to remove the ink/doctoring cup.

CLICHÉ BAND CTP

Line motifs

The CTP cliché band was specially developed by TAMPOPRINT for use in the CTP machine series. The cliché is a 25 mtr. cliché band which is provided with a coating specially developed by TAMPOPRINT.

CLICHÉ PLATES

Manufacturing method: Direct laser engraving

CERAMIC CLICHÉ PLATE

Line motifs

The TAMPOPRINT all-ceramic cliché plate is characterised by an unsurpassed service life and resistance to acids; no risk of corrosion.

Manufacturing method: Etching

STEEL CLICHÉ PLATE

Line motifs / screen motifs

TAMPOPRINT Steel cliché plates are made of high-quality chromium steel (hardnesss 63 Rc). Very high service lives can be achieved without difficulty. Through special recasting processes and a high chrome content, our steel cliché has secured a high market share for many years due to its quality. TAMPOPRINT steel clichés are also largely imaged by laser.

STEEL CLICHÉ PLATE SST

Line motifs / screen motifs

Due to the SST quality with particularly fine etching base, improved ink coverage is achieved. Compared to the steel cliché, it has an increased susceptibility to corrosion.



THIN CLICHÉ PLATES

Manufacturing method: Direct laser engraving

ALOXID-SPECIAL-CLICHÉ PLATE Line motifs

The Aloxid special cliché developed by TAMPOPRINT especially for laser processing is an aluminum cliché with a special coating. The line motif is created by means of layer removal by a laser system with extremely precise engraving depth and contour sharpness. A cliché that particularly stands out due to its top operating performance.

MAGNET-ALOXID-CLICHÉ PLATE Line motifs

The Magnet-Aloxid cliché - a development of TAMPOPRINT, matched to our cliché laser system solutions. It is a magnetic aluminum cliché with a special coating. Of course, this cliché is also available ready for printing and is ideal for ALLROUND use. This cliché can also be used in transverse doctor blade operation. The line motif is created by means of layer removal by a laser system with extremely precise engraving depth and contour sharpness.

THIN CLICHÉ PLATES

Manufacturing method:

Photo technique & washout

MAGNET-SCREEN-CLICHÉ PLATE

Line motifs / Screen motifs

For low to medium performance requirements, this alcohol washout cliché is characterized by high ink coverage, density and fine resolution. It is used both for line motifs and for high-quality, register-accurate halftone multicolor printing motifs.

MAGNET-ECO-CLICHÉ PLATE Line motifs / screen motifs

As an ideal do-it-yourself cliché for the environmentally conscious user and beginner, this inexpensive all-round cliché is preferably used for low output requirements. Print motifs with fine lines and large-sca

put requirements. Print motifs with fine lines and large-scale print areas can be realized without any problems. The water-washable Magnet-Eco cliché was developed for use in "open" pad printing systems. In addition, it can also be used for short runs on "hermetic" pad printing machines.

Manufacturing method:

Photo technique & washout

RECORD-SPECIAL-CLICHÉ PLATE

Line motifs / screen motifs

The record special cliché is a development from TAMPOPRINT. Made from band steel, it is ideally suited for printing motifs with the finest fonts, lines and screens. It is a cost-effective alternative to steel clichés for medium to high mileage requirements.





Service

Everything from a single source

We support you

As a full-service supplier, we are also there for you after the purchase! We will quickly and reliably find the right solution for your technical concerns. Whether troubleshooting, maintenance or repair, our service technicians are on site for you worldwide or with fast problem solving, thanks to remote maintenance in real time.

Advantages

- Support on site or remote maintenance in real time
- Reliable supply of spare parts
- Individual service and maintenance concepts
- Production of ready-to-print pad printing clichés
- Comprehensive training offers
- Process optimization

Service offersReliable production due to regular inspection



Technical spare parts and retrofit
Test prints, sampling and production outsourcing

Year-round training offers Basic and industry-specific training





Working around the world
We are there for you - by remote maintenance or on site





Service

Our Cliché Studio

Artwork production by professionals

Our cliché department has been in existence for over 40 years. Decades of experience in the field of pad printing and its special features in artwork and cliché production are available to you through our team.

Template files and scannable reflective artwork are professionally processed at our DTP workstations. This guarantees the best possible quality of your print motifs and your ready-to-print pad printing clichés. The more complete your specifications and your artwork, the more cost-effective we can offer you artwork production.

We will be happy to provide you with a quote for print-ready artwork production and any repro costs incurred.

Template specifications

File formats and image resolution:

- *.ai, *.eps, *.svg, *.pdf (without password protection)
- *.psd, *.tif, *.png (image resolution 300 dpi at 1:1 motif size)
- *.bmp (image resolution 1200 dpi at 1:1 motif size)
- *.dxf, *.dwg

Fonts: converted to paths
Color mode: CMYK

Dimensions: specification of exact dimensions in mm

Reflective artwork: scanable

Otherwise, we will be happy to create the necessary data or film templates for you for optimum cliché quality.

Our Service

- Advice on selecting the right type of cliché
- Print image adjustments
- Preparation of supplied artwork
- Production of ready-to-print clichés

Artwork production/DTP

Artwork production by professionals





Print-ready clichésA print-ready result in the shortest possible time

Quality control

Highest quality through our many years of expertise





Consulting

Comprehensive support for pad printing cliché selection



YOUR NEEDS, OUR GOAL



Magnetic holding plate

For clamping plastic or aluminum thin cliché plates in pad printing machines.



Accessories

Auxiliaries

A wide range of printing accessories enables clean and practical work: Holding plate and interleaving paper provide protection and stability. Foil rolls for automatic cleaning of printing pads prevent dust and ink particles from affecting the printed image. All these useful auxiliaries, and many more, accompany the entire process, make your work easier and you achieve high-quality print results.

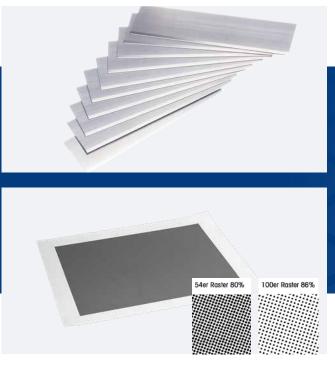
Accessories

- Interleaving paper
- Magnetic holding plate
- Holding plate Aloxid
- Screen film
- Hold-down plug
- Cliché spray
- Doctor blade
- Wiper POM

Our advice: Remove dried ink residues during the printing process with adhesive foil.

Doctor blade

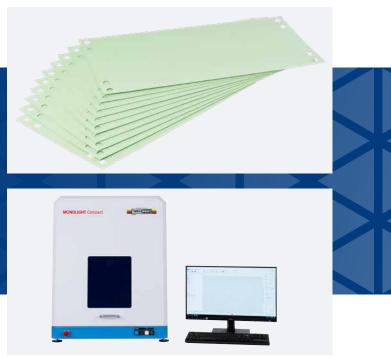
For wiping excess ink from the ready-to-print cliché



Screen film Screen film for the production of clichés

Interleaving paper

Required for the damage-free use of your thin cliché



MONOLIGHT Compact

Production of pad printing clichés by yourself





Additional Consumables

For the professional pad printing

Pad printing accessories such as pad printing clichés, printing inks, printing pads or ink/doctoring cups are an important component of our development activities at TAMPOPRINT. Based on our many years of experience, we know down to the last detail how the properties of a product can be brought into perfect harmony with the adhesion and viscosity of the printing medium and the properties of the cliché as well as the properties of the printing pad and the ink.

Advantages

- Large and versatile selection
- Perfectly matched to the pad printing process
- For all common pad printing systems
- Practical auxiliaries for the user
- Perfect printing results

Accessories and much more can be found in our TAMPOPRINT® online catalog. Take a look!

Printing pad

Selection of our printing pads for ideal printing results





Pad printing inks

Standard ink types/shades and auxiliaries (for example thinner, hardener, retarder, etc.)

Ink-/doctoring cups

Large selection with designs in plastic, aluminum, stainless steel





Auxiliaries

Selection of practical auxiliaries for the pad printing process



Thank you

For your Interest and your Trust

Your Partner for Laser Marking and Pad Printing

We offer you everything from a single source: from consulting, machines and consumables down to service.

New product designs, product markings and plagiarism protection are possible with pad printing and laser machines. Use our experience for optimized or new production processes. Our core competencies are industrial pad printing and laser marking. Of course, both processes can be combined and integrated into automations using software developed in-house.

Our reliable, uncomplicated and efficient standard pad printing machines for classic pad printing are suitable for numerous tasks in industry. The standardization of our machines has many advantages for our customers: The industrial marking systems deliver optimal printing results, high process stability and offer ease of operation, maintenance friendliness and cost savings.

We offer our customers complex, semi- and fully automated industrial marking systems for large quantities and high cycle rates. These include the modular system MAP (Modular Automation Platform) or the rotary automations ROTOPRINT as well as CLOSURE PRINT COMPACT. Rotary pad printing offers speed combined with frequent motif changes. For applications where production flexibility and user-friendliness are particularly important, our semi-automatic systems of the MODULE-ONE series score highly.

Our industrial marking systems, which combine pad printing and laser technology, enable special solutions in pad printing that are perfectly matched to the requirement. The combined systems offer versatile application possibilities when printing on the smallest areas, combined with individual laser engraving.

Similar decoration processes such as offset printing or screen printing, embossing or etching reach their physical and economic limits in comparison. It is possible for pad printing and also our laser systems to print or mark concave as well as convex and uneven surfaces. Take your time to get to know pad printing and develop your own ideas and concepts.

In recent decades, pad printing has undergone a transformation from the so-called "open" ink/doctoring system to the closed, i.e. "hermetic", ink/doctoring system (invented by TAMPOPRINT and first introduced to the global market in 1983 with the "ENCODER" pad printing machine).

For some years now, there has been another technical revolution, the integrated printing cliché production within the printing process, integrated into the standard pad printing machine.

Today, the "hermetic" system and its use dominate the market. Advantages for the user include:

- No health hazards such as solvent evaporation
- Constant ink consistency
- Cleanliness and time savings during ink changes
- Stable printing process
- No drying of the printing ink during downtimes
- Minimized waste during set-up
- Fast changeover of the pad printing machines

Send us your request!

Contact:

Phone: +49 71 50 928-0 info@tampoprint.de



Contact

Our Contact Persons

Sales Manager Consumables and Spare parts

Thomas Mäule Tel. +49 7150 928-361

e-mail t.maeule@tampoprint.de

Technical Product Manager for Printing Inks

Rafael Sliwa Tel. +49 7150 928-248

e-mail r.sliwa@tampoprint.de

Sales Manager Machines

Dietmar Scholz Tel. +49 7150 928-368

e-mail d.scholz@tampoprint.de

Product Management and Sales Laser

Yuen Wah Lee Tel. +49 7150 928-310

e-mail y.lee@tampoprint.de

Head of Sales Automation

Bernd Gottschalk Tel. 49 7150 928-214

e-mail b.gottschalk@tampoprint.de

Sales Manager Closure Systems

Thilo Reichelt Tel. +49 7150 928-129

e-mail t.reichelt@tampoprint.de

Service Supervisor

Roland Heubach Tel. +49 7150 928-328

e-mail r.heubach@tampoprint.de

