

A man and a woman in light blue shirts are in a factory setting, examining a coffee bag. The man is holding the bag, and the woman is pointing at it. In the background, there is a large industrial machine with a touchscreen display showing a grid of product images. The scene is brightly lit with green laser lines from the machine.

The tape triangle: Practical solutions for flexo success

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Introduction

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What is PSA

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How does PSA affect printing performance and mounting tape application

04

Which tape offers the best PSA balance for flexographic printing

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Introduction of tesa

A history of 125 innovative years: At tesa, adhesion defines us.
It's who we are.

Innovation with impact: 7,000+ products built on more than 125 years of know-how



7,000+ products

in our portfolio, from innovative adhesive technologies to specialized and tailor-made solutions for our customers.



100 innovations

introduced each year, with 600+ experts worldwide collaborating to develop pioneering adhesive solutions.



125+ years

of continuous innovation and expertise in adhesive technologies serving customers worldwide.

The background of the slide is a photograph of three scientists in a laboratory. They are wearing white lab coats and safety glasses. The scientist in the center is holding a roll of white adhesive tape, and the other two are looking at it. The lab coats have the tesa logo on the chest. The scene is brightly lit, suggesting a clean and professional environment.

“We create sustainable adhesive solutions
that improve the work, products and lives
of our customers.”

Our mission

01

Introduction

02

What is PSA

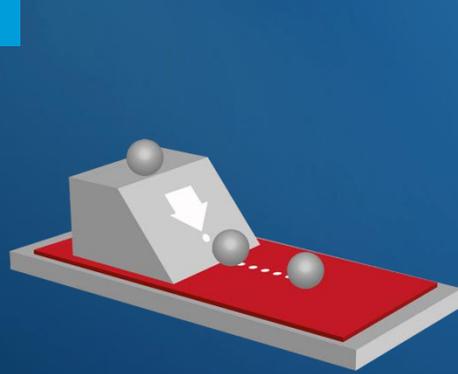
03

How does PSA affect printing performance and mounting tape application

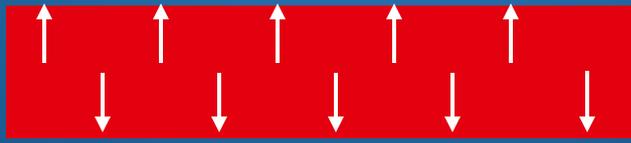
04

Which tape offers the best PSA balance for flexographic printing

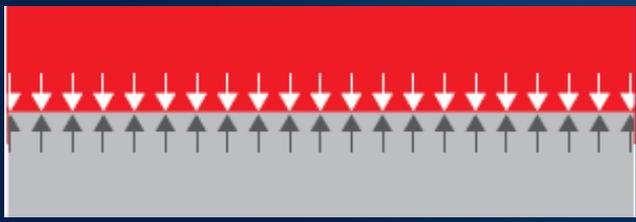
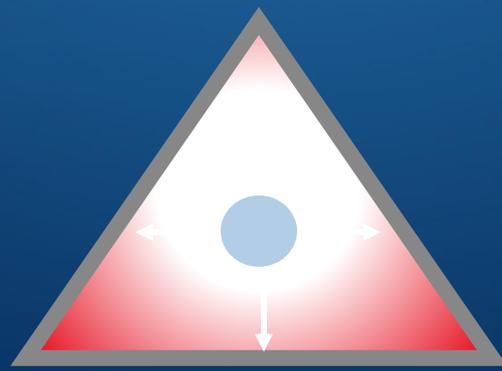
What is PSA?



“Contact adhesion“ of the adhesive to the substrate (<1s)

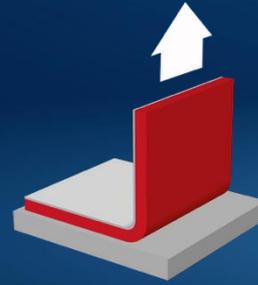


Tack



Bonding strength of adhesive to substrate – peel adhesion

Adhesion



Cohesion



Inner strength of adhesive – “holding power“



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Which tape offers the best PSA balance for flexographic printing

Step 1: Mounting

Three different surface tack level

- **Low**
Best choice for fast plate repositioning
- **Medium**
Suitable choice for most applications
- **High**
Recommended for cold temperature or dirty conditions where surface tack is needed



Step 2: Printing

How to avoid plate edge lifting in printing process?

- Main impact



Adhesion / Cohesion
(Adhesive Design)



Solvent Resistance



Climate Resistant



Step 3: Plate demounting

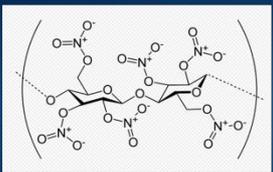
- **Target:** Easy and without adhesive residues
- **Main impacts:**



Adhesion / Cohesion
(Adhesive Design)



Ink resistance



Solvent based printing inks may contain binders like nitro cellulose. The interaction between adhesive and binders can lead to hard plate demounting and plate damage.



Step 4: Tape demounting

- **Target:** Easy and without adhesive residues
- Main impacts:



Adhesion / Cohesion
(Adhesive Design)

- Sleeve surfaces and condition
- Tape backing (flex vs. classic)



Designed for all conditions

tesa® flexographic plate mounting tapes are engineered to deliver consistent performance across all sleeve types and press conditions.

Diverse sleeves
in the market

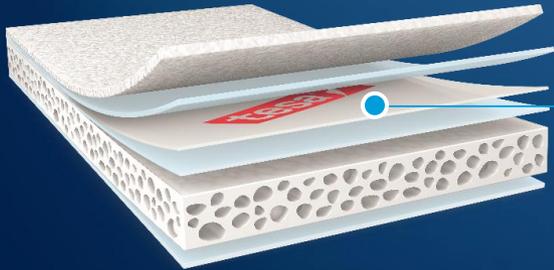
Changing surface
conditions



Two product designs

Classic design

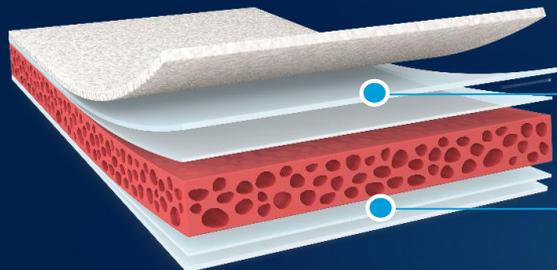
PET reinforcement film leads to stable tape design and easy tape demounting



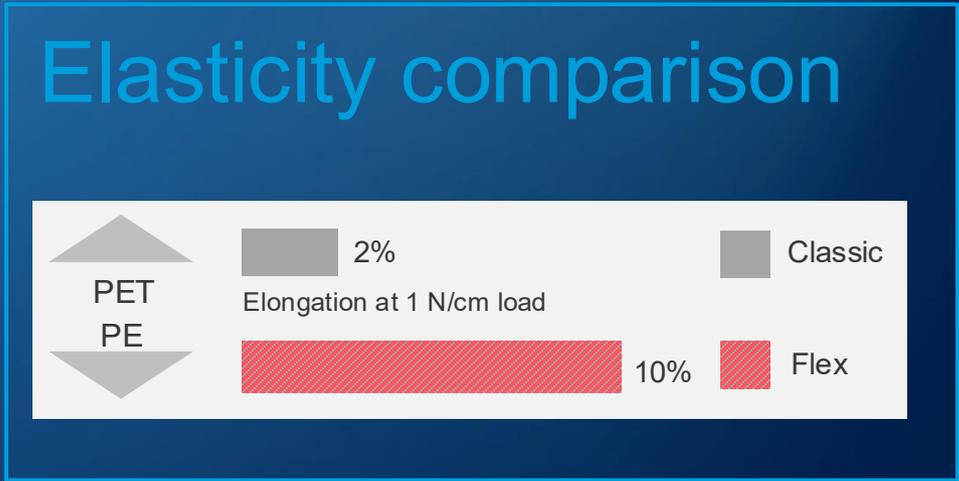
- PET reinforcement layer – stiff and rigid
- Direct and firm peel off

Flex design

PE reinforcement layers lead to flexible tape design which supports excellent conformability on various sleeve surfaces (e.g. thin walled or scratched sleeves)



- PE reinforcement layer
- More elastic peel off



tesa® Softprint

For each step, specific tape properties to fulfill customer demands

Process step	Customer demand	Tape properties



tesa® Softprint

For each step, specific tape properties to fulfill customer demands

Process step	Customer demand	Tape properties
	Fast and simple	
	Mounting	
	Workable under dirty conditions	
		
		



tesa® Softprint

For each step, specific tape properties to fulfill customer demands



Process step	Customer demand	Tape properties
Mounting	Fast and simple	Tack
	Workable under dirty conditions	Tack



tesa® Softprint

For each step, specific tape properties to fulfill customer demands

Process step	Customer demand	Tape properties
	Fast and simple	Tack
	Workable under dirty conditions	Tack
	No plate edge lifting	
		



tesa® Softprint

For each step, specific tape properties to fulfill customer demands



Process step	Customer demand	Tape properties
Mounting	Fast and simple	Tack
	Workable under dirty conditions	Tack
Printing	No plate edge lifting	Adhesion + Cohesion (Adhesion design)
		Temperature + humidity resistance
		Solvent resistance



tesa® Softprint

For each step, specific tape properties to fulfill customer demands



Process step	Customer demand	Tape properties
Mounting	Fast and simple	Tack
	Workable under dirty conditions	Tack
Printing	No plate edge lifting	Adhesion + Cohesion (Adhesion design)
		Temperature + humidity resistance
		Solvent resistance
Demounting	Easy plate and tape demounting	



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For each step, specific tape properties to fulfill customer demands



Process step	Customer demand	Tape properties
Mounting	Fast and simple	Tack
	Workable under dirty conditions	Tack
Printing	No plate edge lifting	Adhesion + Cohesion (Adhesion design)
		Temperature + humidity resistance
		Solvent resistance
Demounting	Easy plate and tape demounting	Adhesion + Cohesion (Adhesion design)
		Ink resistance (Solvent based inks)



Agenda

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**How does PSA
affect printing
performance and
mounting tape
application**

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**Which tape
offers the best
PSA balance for
flexographic
printing**

Combining the extremes:

tesa® Softprint neXt

Easy plate mounting & repositioning



Outstanding performance against plate edge lifting



Easy plate & tape demounting



Now available for Classic and Flex





tesa[®] softprint neXt

Product	Level of plate repositioning	Prevention of plate lift		Solvent resistance (plate side)	Level of plate demounting	Ink resistance
		Room temp.	High temp. / humidity			
tesa [®] Softprint neXt FE-X EA	●●●●*	●●●●	●●●	●●●●	●●●●	●●●●



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our company



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[Sustainability report](#)