

Carbon-Preforms

Fiber composite components



TFP Technology: Your partner for preforms & reinforcement structures

TFP Technology GmbH is a German manufacturer of textile fiber placements and preforms.

TFP is the acronym for „Tailored-Fiber-Placement“.

With the manufacturing process TFP bundled fiber strands - called **rovings** - are placed tailor-made and specifically fixed onto a carrier fabric.

The substrate is steered between the stitches by machine and is moved thus that the Rovings can be placed in any direction.

Our customers - from the most different industrial branches - appreciate above all:

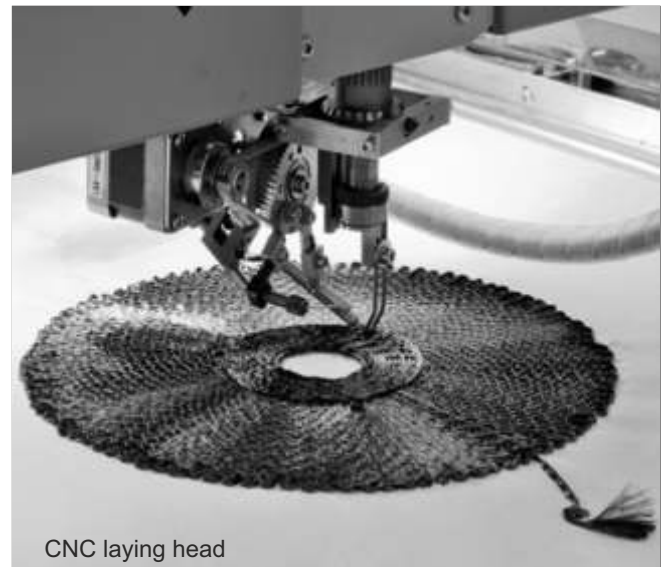
- ▶ the competence and experience of our employees in the area of CNC-fiber laying
- ▶ the efficiency of our modern, computer-controlled machines
- ▶ our willingness to innovate in implementation new ideas and R&D projects

Materials:

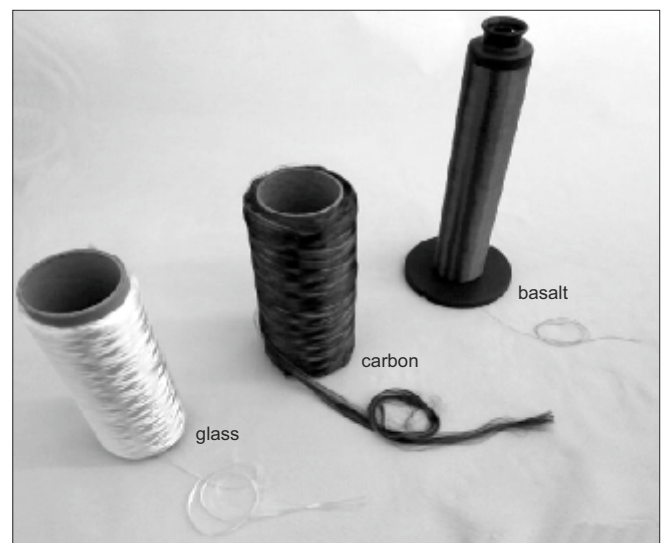
The material selection is absolutely arbitrary. We process, among other things

- Aramid fiber
- Glass fiber
- Carbon fiber
- Basalt
- Ceramics

Also combinations of different materials and functional elements are possible. The automated and accurate fiber arrangement serves to make the full tensile strength of the selected fibers for the respective product.



CNC laying head



We process rovings in various strengths.

TFP - Tailored Fiber Placement

Innovations of the highest quality - „Made in Germany“



Fiber laying in the TFP Technology GmbH:



The fiber laying can take place in any direction, that is between 0 and 360 grades.

Advantages of the TFP technology:

- ▶ preform production close to the final product
- ▶ high level of automation
- ▶ optimal fiber adjustment
- ▶ very high strength / stiffness of elements
- ▶ considerable weight reduction
- ▶ local reinforcements possible
- ▶ production almost without rejects
- ▶ highly cost efficiency
- ▶ no additional tool costs
- ▶ mass production possible

Applications:

The applications are very different. Here are some examples:

- ▶ Automotive
- ▶ Racing (formula cars, speedboats ...)
- ▶ Aeronautics / Space
- ▶ Medical technology (prostheses, orthoses ...)
- ▶ Industry (robot components, machine components ...)
- ▶ Bullet-proof (protection) equipment
- ▶ Snowboard, surfboard, bike frames
- ▶ Phone Cases
- ▶ Drones ...