



Aviation Applications

Flexible hoses, connections & moulded parts
for the greatest demands

Flexible connections for the greatest demands

The Masterflex Group

The Masterflex Group is the world's leading specialist for the development and production of sophisticated connection and hose systems made of high-performance plastics and fabrics. The Masterflex Group includes six major brands for a wide range of connection requirements: Masterflex, Matzen & Timm, Novoplast Schlauchtechnik, Fleima-Plastic, Masterduct and APT. With numerous production and sales locations throughout Europe, Asia and the Americas, the Masterflex Group can be found almost anywhere in the world.

www.masterflexgroup.com



Flexible connections for the greatest of demands

Matzen & Timm has been a certified partner for the aviation industry for many years. Within the Masterflex Group, the company based in Norderstedt near Hamburg is the aviation specialist for lightweight construction. The product portfolio includes flexible hoses, connections and moulded parts for a huge variety of aircraft applications. In addition to special solutions for individual installation situations and complex connection requirements, Matzen & Timm also offers a wide range of standard products. As the industry specialists, almost all well-known aircraft manufacturers apply Matzen & Timm products and engineering.

MATZEN & TIMM Connecting Values

Lightweight technology for all temperatures

also manufactures for specialised applications in small series.

All products are characterised by:

- lightweight
- high flexibility
- extremely high temperature resistance
- individual and demand-oriented construction
- a guaranteed high standard & reliability

References

Our customers in the aviation industry include almost all major OEMs, international market leaders and established companies in the field. For us, close cooperation in a spirit of partnership is an essential guarantee for meeting the highest quality standards.

AIRBUS

 **EMBRAER**

DIEHL
Aviation

 **SAFRAN**



Lightweights for all temperatures

Proven expertise in the Aviation industry

As a manufacturer with its own R&D department, Matzen & Timm accompanies your product from concept and design, through the simulation (FEM), certification and prototyping to series production. Always at your side with experience and expertise. Special requirements and innovative solutions can therefore be easily implemented. Matzen & Timm has a wealth of laboratories, analysis and testing facilities at its disposal. The industry's highest standards are constantly being monitored.

Matzen & Timm has been developing, producing and providing connection solutions of the highest quality worldwide for over 60 years. All products are manufactured at certified locations of the Masterflex Group. A large proportion of the products are manufactured by hand, which makes the components particularly efficient and durable. They are always applied when maximum precision and long-term reliability are required.



History

Matzen & Timm was founded in 1925 as a trading company. The company has been active in the aviation industry since the 1960s, during which time the cooperation with Airbus also began. The experience gained in these years was transferred to the company's production facility in the 1970s and then from 1980 onwards into the company's first own product developments. Today, Matzen & Timm develops and produces hoses and specialised fittings of the highest quality for sophisticated applications, especially within the aviation industry.



Aviation Solutions

Passengers hardly ever see them and yet our components guarantee essential functions in the aircraft. Our products are extremely light, secure, space-saving and permanently reliable. They are used in many areas:



Auxiliary Power Unit (APU)

We provide the power even when standing still...



Galley

We make sure it tastes good...

Cabin

We provide fresh air in the cabin...



Cockpit

We make the flying quieter...



Lavatory

We save water...



Our products

Product Overview

ECU-Systems

(Spiral wire reinforced hoses, rectangular bellows with metal flanges, reinforcement rings and frames)

Air Distribution Systems including PSU

(insulated and uninsulated hoses, spirally corrugated hoses, bellows and shaped parts)

Bleed Air Systems

(high temperature and pressure resistant bellows, elbows, moulded parts and special hoses with metal flanges and rings)

APU-Systeme

(high temperature-resistant exhaust bellows)

Drainage

(preformed and spiral wire reinforced T-pieces, Y-pieces, moulded parts and special hoses for waste water)

Fuel Lines

(fuel emergency drain, shrouds, compensators)

Protection, cooling or ventilation

of cables, electronics, hydraulic pumps, galleys or batteries

Flat gaskets

(individually shaped components)

Special Installation Situations

(e.g. stitched, noise-reducing insulation)

Extruded profiles and shaped parts

Electrically conductive hoses and moulded parts

and much, much more





Engineering Services

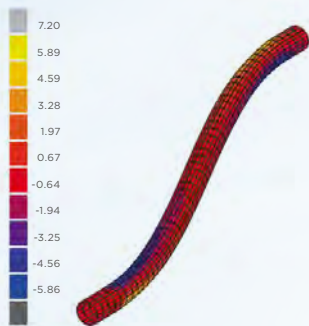
Every day we face the increasingly high demands placed on the material, performance, service life, safety and quality of each individual component for aviation. In addition to large-series orders, we develop, manufacture and qualify prototypes or pre-series according to customer-specific requirements. We also test special parts and manufacture hoses, moulded parts and bellows.

High Quality Materials

The material used plays an integral role. Depending on the application, we have a wide range of high-quality technical woven and knitted fabrics at our disposal: Glass, polyamide, polyester and aramid fibres such as Nomex® or Kevlar® and even ceramic material. Special rubbers such as silicone, Neoprene®, CSM and special elastomers such as Viton®, Nitril® or Butyl are used for coatings.

Modern Techniques

With modern CAD-Systems, FEM simulations and in-house tool design, we can implement almost any customer-specific requirement, in some cases by „industrial handcrafting“. The customised production by experienced specialists ensures a high quality, which we validate and document on in-house test benches (e.g. climatic chamber, pressure test benches for high-/low-pressure tests, leakage tests, tensile tests, fire tests or movement tests).



Certified Quality

We regularly participate successfully in certifications and audits and have all relevant approvals and qualifications - including EN 9100:2016 (equivalent to AS 9100D and JISQ 9100:2016, as well as ISO 9001:2015). This certification corresponds to the QSF-C of the German Aerospace Industries Association (Bundesverband der deutschen Luft- und Raumfahrtindustrie e.V.). (BDLI).

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