pankl TURBOSYSTEMS

Pankl Turbosystems GmbH (PTSYS) in Mannheim, Germany is a high-tech solution provider in the development, production and testing of innovative and custom air management systems for combustion engine and fuel cell applications, active in the high-performance automotive, aerospace, marine, commercial diesel and industrial sectors.

Our product portfolio consists of electrically-assisted turbochargers, fuel cell air supplies (FCAS), electric turbo-compound systems, high-performance turbochargers (wastegated, variable turbine and multistage), and external wastegate and anti-lag valves.

PTSYS' leading-edge electrified systems are fitted with high-efficiency permanent magnet synchronous motors and SiC power electronics. Our FCAS systems for next generation high-performance fuel cells – from 30kW to over 300kW – are acknowledged for their class-leading power densities and are optimized for highly-dynamic transient response and start-stop operation.

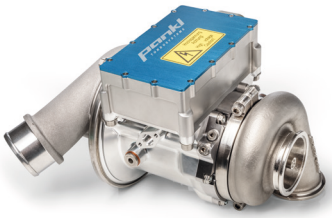
COMPETENCIES

TECHNOLOGY	Ultra-high-speed electric motors, SiC Inverters, Oil-free aerodynamic bearings, Low-inertia rotating assemblies, Customized aerodynamic development
PRODUCTS	Electrically-assisted turbochargers, fuel cell air supply systems, high-performance turbochargers and turbo compound systems
SERVICES	Development, Consulting, Testing, Prototypes and Serial Production

Pankl Turbosystems GmbH | Rudolf-Diesel-Straße 24 | 68169 Mannheim | Deutschland | sales-turbo@pankl.com | www.pankl-turbosystems.com

Electric-Assisted Turbocharger Integrated SiC Inverter

Reducing emissions and improving performance for state-of-the-art hybrid powertrains.

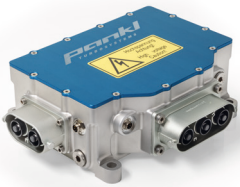


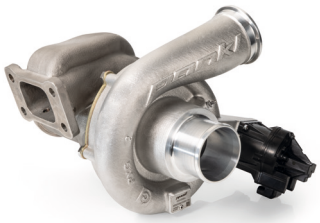
Fuel Cell Air Supply (FCAS)

FCAS for next generation high-performance fuel cells from 30kW to 600kW are recognized for their weight/size ratio and are optimized for transient response and start-stop operation.

SiC Power electronics for ultra-high-speed PMSM

Applied wide-bandgap technology improves power density and power conversion efficiency.





High Performance Turbocharger

Customized high performance turbochargers for global niche markets deliver high power and reduced fuel consumption for gasoline, diesel and H_2-ICE.

High-Efficiency Compressor and Turbine Stage Development

Increasing system efficiency of our turbomachinery.