**PARTZSCH** 

**ELEKTROMASCHINENBAU** 

## ALWAYS INMOTION FOR YOUR SUCCESS



CHRISTIAN PARTZSCH

Managing director

» We at PARTZSCH Elektromaschinenbau GmbH give our very best at all times. Every day, we strive to meet our own high standards and in particular, of course, to satisfy our customers. We are proud to have grown within just a few years into a global supplier in the field of electrical machines and drives. This was possible because we attach top priority to absolute quality and work constantly to improve ourselves even further.

As part of the PARTZSCH Group, we are party to the know-how of all the Group's member companies and can use this know-how to the benefit of our customers. «

## YOUR ADVANTAGES AT A GLANCE

- 60 years of experience
- Know-how and manufacturing facilities for electrical machines up to the highest outputs and for voltage levels up to 21 kV
- State-of-the-art machinery base accommodating the highest weights and diameters
- 40,000 m² of production space

- References in numerous branches and with all renowned manufacturers
- From the component to the complete drive – everything from a single source
- Embedded in a successful group of companies

## PARTZSCH ELEKTRO-MASCHINENBAU

We at PARTZSCH Elektromaschinenbau GmbH see our daily task and passion in the development, construction, calculation and sales of electrical machines. We are specialised in the manufacturing of winding components for electric motors and generators. Under the brand "Swiss Traction Germany" we develop, produce and sell gearless lift drives for passenger and cargo lifts. We cover the complete range of services of CNC manufacture for mechanical machining up to and including complex welded constructions. We are proud to be one of the most innovative mid-size electrical engineering companies in the branch. With our in-house engineering department, we develop components tailored to your special product demands. As a matter of course, we also offer service and maintenance for your electrical machines and equipment and perform repairs of any kind.

## OUR PRODUCTS AND SERVICES

- Manufacture of magnetic circuits for gearless wind turbines
- Production of machine components
- Manufacture of components for textile machines
- Swiss Traction lift drives



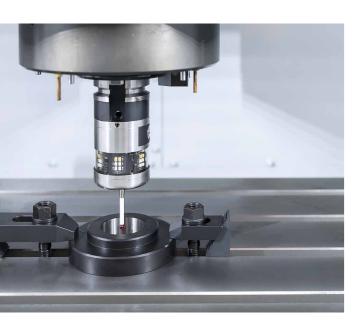


## QUALITY IS MANU-FACTURED, NOT SIMPLY MEASURED

Our credo: Quality is manufactured, not simply measured! This is the reason why the most important components for measuring are already installed on our machines. In addition, we perform initial sample and series tests with creation of the appropriate reports.

The overarching goal of our work is customer satisfaction. Accordingly, on-schedule delivery of a flawless quality product is one of our top priorities.

Quality determines the thoughts and actions of our employees, and they contribute actively to continuous quality improvement along the whole process chain.



The stipulations of ISO 9001, in combination with individual customer specifications, form the basis for all activities. Through internal audits and monitoring by an accredited certification body, our quality management system is evaluated with regard to its effectiveness, certified and adapted continuously to the growing demands of the market.

#### Test and measuring equipment

- Mitutoyo measuring machine Euro-C-A9106, measuring range 1,000 x 700 x 500 for components up to 500 kg
- ROMER portable measuring arm RA-7525 SE for precise mobile measurements in the process chain
- MessTESA micro-hite M900 and various process-oriented manual test and measuring devices integrated into the production process
- Twinner T12 for the measurement of cylindershaped parts
- Hardness testing equipment
- and much more

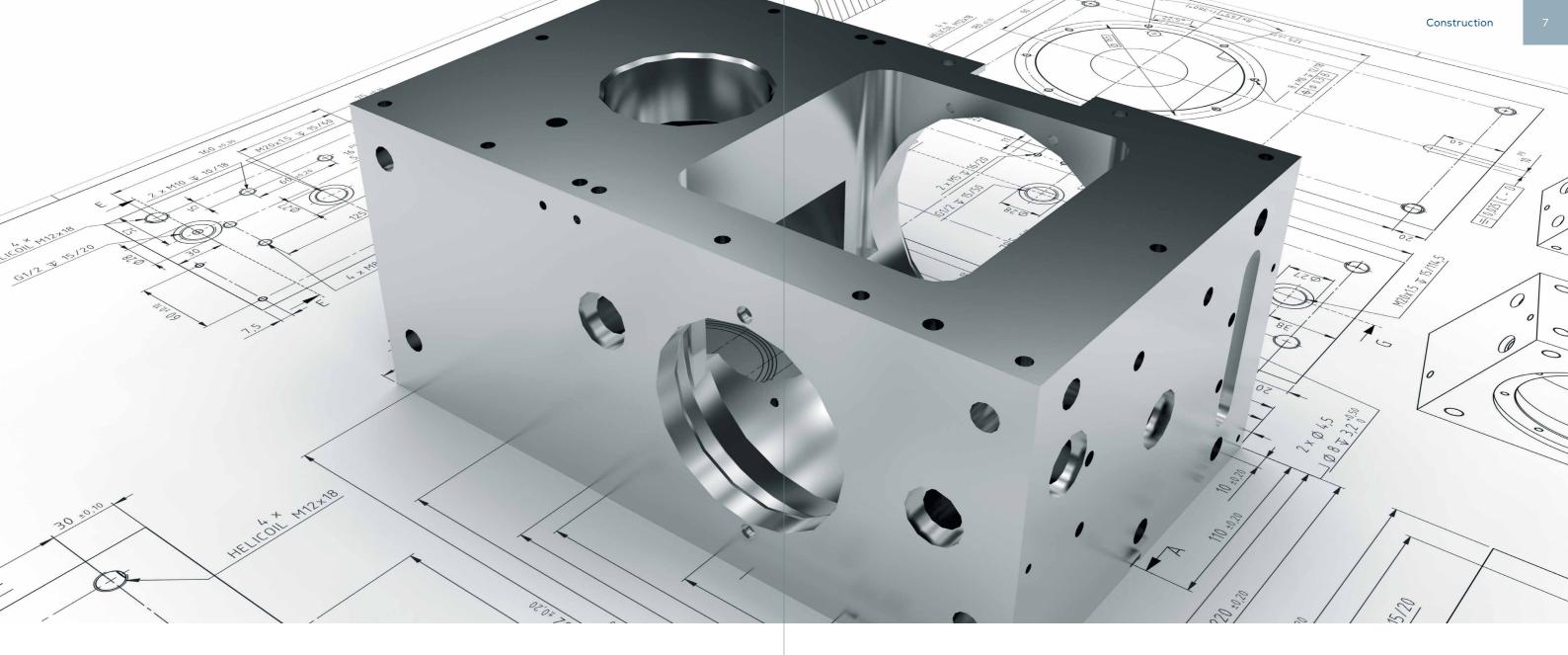


#### **Our certifications**

- DQS ISO 9001:2015
- IQ Net 9001:2015
- TÜV Rheinland Welding Procedure Qualification Record (WPQR)
   EN 1090-2:2008+A1:2011
- TÜV Rheinland EN 1090-1:2009+A1:2011
- TÜV Rheinland CL1 acc. to DIN EN 15085-2
- SGU Management nach SCC\*\* Checkliste
- Checklist Certificate CL1 EN 15085-2
- Class D certificate acc. to DIN 18800-7:2008-11

#### Our state-of-the-art fleet of machines

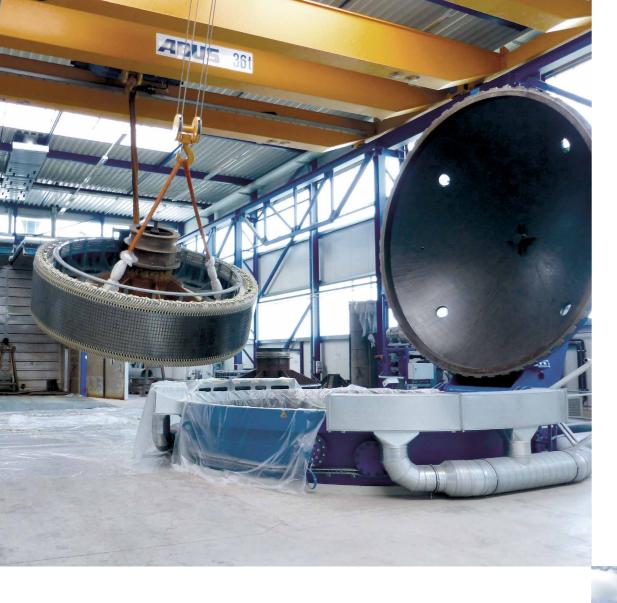
- Impregnation systems
- High-speed balancing and overspeed test systems for rotor weights up to 32 t
- Heavy duty lathe POREBA for rotor weights up to 40 t
- Washing, drying and sandblasting system
- State-of-the-art load test bay
- OmniTrac<sup>™</sup> 3D laser tracking system
- Hedelius T8-3200
- EMCO MaXXturn 110 x 3500
- BIMATEC SORALUCE floor-type millingboring machine FP 8000
- and much more



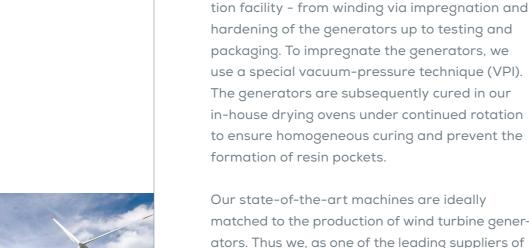
## WE FIND SOLUTIONS

When it comes to special components for your machinery base or electric equipment, we are the right partner for you! If you have any questions or inquiries, do not hesitate to contact us. Our qualified engineering team of technicians and engineers would be pleased to elaborate solutions together with you, taking into account your particular product requirements. We develop and manufacture fixtures of any kind for you from different materials, such as steel and aluminium, with greatest precision and in accordance with highest quality demands.

Our engineering department also serves our in-house production. This makes us independent of suppliers and allows us to react quickly and flexibly to new challenges.



# FOR YOUR POWER FROM RENEWABLE ENERGIES



Our state-of-the-art machines are ideally matched to the production of wind turbine generators. Thus we, as one of the leading suppliers of wind turbine generators, can cover the complete range of manufacturing by way of systems and machines produced in our company.

To manufacture core assemblies for wind turbine generators, we use segmented laminations that conduct magnetic flux very well and suppress

undesirable eddy currents in the generator. All

work steps are performed in our own produc-

#### Our state-of-the-art machinery base

- Spreading machines
- Coil winding machines
- Taping machines

## YOUR ADVANTAGES AT A GLANCE

- Manufacture and assembly of generators up to 10 MW at the same location
- Fleet of modern machines adapted to the generator outputs
- Experience over many years



## STRAIGHT TO THE TOP

Lift drives from Swiss Traction a brand of PARTZSCH

Head straight for the top. With SwissTraction lift motors, heights of up to 65 metres can be overcome almost effortlessly. Place your trust in decades of experience, which enable the PARTZSCH Group and SwissTraction to offer their customers the best possible technologies in the field of lift motors. Quiet running and requiring only a bare minimum of maintenance thanks to the patented permanent-magnet synchronous drive technology – the ZEFIR series is your ideal choice for the most varied types of buildings.

Lift motors of the ZEFIR series are also available with our patented drum drive as an option. The gearless drives produce nearly no noise and require next to no maintenance. Even individual customer wishes, such as different rope groove types, different rope diameters or different brake systems for your lifts, can be accommodated by SwissTraction. Experience the benefits at first hand, and allow yourself to be carried straight to the top with SwissTraction!

## **YOUR ADVANTAGES AT A GLANCE**

- Extremely quiet running for maximum passenger comfort
- Low weight and space requirement perfect for sophisticated building projects
- Air cooling minimises susceptibility to faults
- Energy-efficient high efficiency thanks to patented permanent-magnet synchronous drive technology
- High torque / high stall torque for fast travelling
- High positioning accuracy thanks to implemented encoder system

## **NEW IN OUR PORTFOLIO DRUM DRIVES:**





Our lift motors are available in six sizes for a range of useful loads between 225 kg and 14,000 kg - either as a patented permanent-magnet synchronous drive or as a drum drive.

**Z 18X** MINI CLASS

Useful load: 225 ... 630 kg Lifting height: Up to 20 m



**Z 24X** MAGIC CLASS

Useful load: 225 ... 1,250 kg Lifting height: Up to 35 m



COMPACT CLASS

Useful load: 400 ... 2,000 kg Lifting height: Up to 35 m



MEDIUM CLASS Useful load: 800 ... 2,000 kg

Lifting height: Up to 35 m



Z 52X PREMIUM CLAS

Useful load: 1,250 ... 5,600 kg Lifting height: Up to 35 m





**Z 62X BISON CLASS** eful load: 1,600 ... 14,000 kg Lifting height: Up to 35 m



## **MACHINE BUILDING** FROM A TO Z

This production division is specialised in the manufacture of parts for electrical machines. In our production facility, we produce shafts, brackets and transmission elements, such as pulleys, couplings, terminal boxes and similar components. According to your own preferences and requirements, your parts are produced from steel, stainless steel, non-ferrous metals or plastics. We know how important delivery on schedule is for your company. Keeping this in mind, we always work reliably.

### We are always active for you with state-ofthe-art technology in the following fields

- Shaft production and rotor machining
- Case and stator machining
- Manufacture of add-on, replacement and new parts
- Subassembly production
- Tools and fixtures
- Machining of field coils and pole cores
- Construction work
- Machine bases
- Machine columns
- Cross-arms

## **YOUR ADVANTAGES AT A GLANCE**

- Flexible production possibilities thanks to CNC-controlled and conventional turning machines
- Reliable delivery on schedule
- Manufacture of add-on, replacement and new parts for all drive components
- Customised solutions offered thanks to our in-house engineering department



We use the full spectrum of manufacturing possibilities in electrical engineering, knowing the needs and expectations of our customers.

#### Technologies

- Milling
- Turning
- Grinding
- Sawing
- Surface treatment (smooth, textured and wet paints)
- Welding (MAG, WIG, resistance spot welding and weld cladding, braze welding)
- Sandblasting (with quartz sand, granules or walnut shells)
- Heat treatment

#### **Equipment base**

- Annealing furnace:
- for stress-relief annealing
- Dimensions of the combustion chamber
   (L x W x H in mm):
   1,250 x 3,200 x 1,000
- Max. temperature: 1,000 °C
- Wagner band saw WPB 340A
- Sandblasting system:
- Footprint (L x W in mm): 1,000 x 600



MILLING	Traversed distances in mm		
Type of machine	Х	У	Z
SORALUCE floor-type milling-boring machine FP 8000	8,000	1,500	3,200
Boring and milling machine BFKF 110	2,100	1,400	875
Hedelius T8-3200	3,220	865	1,000
Hedelius C80M	2,300	800	600
AXA VPC40-U	2,300	1,200	600
AXA VPC40	2,000	1,100	700
DMG DMU 125	1,000	800	750
DMG DMU 75 monoBLOCK	750	650	560
DMG DMU 70	750	600	520
DMG DMU 50	500	450	400

TURNING	Traversed distances in mm		
Type of machine	Max. length	Max. Ø	
EMCO MaXXturn	3350	610 From 90 onwards	
Monforts RNC 500 (2x)	Bars up to 42 mm Machining of chucks up to 220 mm Max. turning length 1,000 mm		
Traub TND 350/360			
Index G 200 (2x)			
Hanwka SL 26H			
Femco HL25			

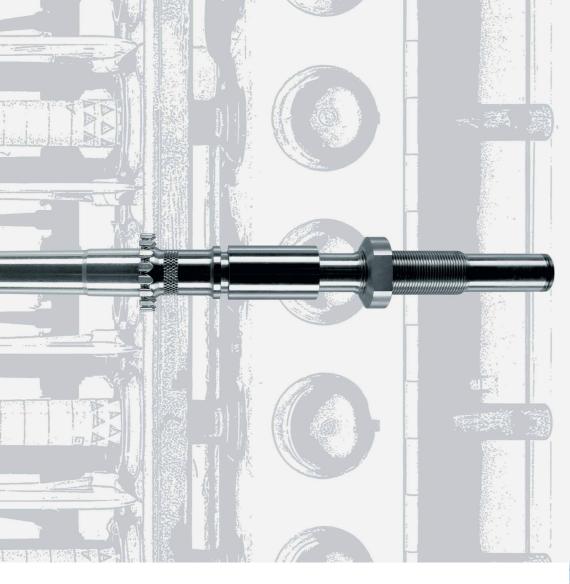
GRINDING	Traversed distances in mm	
Work		
Flat grinding	Table clamping area 500 x 220	
Cylindrical grinding	Max. grinding length 1,000	
SA6U - 1000	Max. grinding length: 1,000	



## SORALUCE FLOOR-TYPE MILLING-BORING MACHINE

MILLING-BORING MACHINE FP 8000

Technical specifications			
X axis (longitudinal)	mm	7,000	
Z axis (vertical)	mm	3,200	
Y axis (transverse)	mm	1,500	
Cutter heads		Diagonal and angular cutter heads, cutting kit	
Drive power	kW	43	
Toolholder		SK50 – Big Plus	
Speed range	min <sup>-1</sup>	5,000	
Vantiant la suin en tromin en tromin en trolon	mm	Diameter: 2,000	
Vertical boring-turning traversing table	mm	Traversing axis: 1,500	
Rapid traverse X/Y/Z	mm/min	35,000	
CNC		TNC 640	
Cooling lubricant system		External and internal cooling up to 50 bar	
Tool changer chain magazine	Locations	60	
Max. weight of workpieces for the fixed table	kg	20,000 (higher weights by agreement)	
Max. weight of workpieces for the rotary table of the vertical boring and turning mill	kg	3,000	
Max. weight of workpieces for the positioning table	kg	8,000	





## **CENTRED ON YOUR NEEDS**

For more than 125 years, we have been constructing and producing high-speed spindles for textile machines with success. Based on this experience, we have extensive special knowledge and meet highest quality standards with reference to the surface design and smooth run of spindles. High fracture strength is achieved by way of a material-saving hardening technique. The efficient lightweight design reduces the drive energy and provides for low energy consumption. Our spindles are low-vibration and low-noise and require only little maintenance.

#### **Our services**

- It is possible to install any commercially available sleeve coupling, even in corrosionprotected design for wet spinning, or overrunning clutches
- Robust top parts with reinforced taper to prevent bending when changing the cop
- Efficient lightweight design to reduce the required drive energy
- We produce wharves in hardened or coated design with smallest possible wharf diameter
- Brake systems in all standard variants
- Internally or externally locked bottom parts of spindles CS 1, CS 1S, CS1 12, CS1 12S, HP-S68, HP-S68/3, NASA, HF 1, HF 21, HF 3 with bearings from renowned manufacturers

#### **Equipment base**

- Index G200
- CNC turning machines Femco HL-25
- CNC turning machine Hanwha SL 26H
- TBT ML 200-2-8
- TBT ML 200-2-8

## **YOUR ADVANTAGES AT A GLANCE**

- Highest quality standards
- Flexible production
- Efficient production of small, medium and large product series
- Constant surface quality thanks to the use of special grinding, polishing and chroming techniques
- Certified acc. to DIN EN ISO 9001:2015



# EVERYTHING FROM A SINGLE SOURCE - POWER FOR YOUR VISION



We as a member of the PARTZSCH Group can proudly say that the spirit of innovation meets the idea of service, enabling all customer wishes to become reality. As one of the leading mid-size companies in the electrical engineering branch, the PARTZSCH Group manufactures a broad spectrum of products related to electric motors and generators – from its own range of wires to wind turbine generators.

We are able to rely on comprehensive expertise and a vertical range of manufacture which enables even the most challenging customer wishes to become reality.

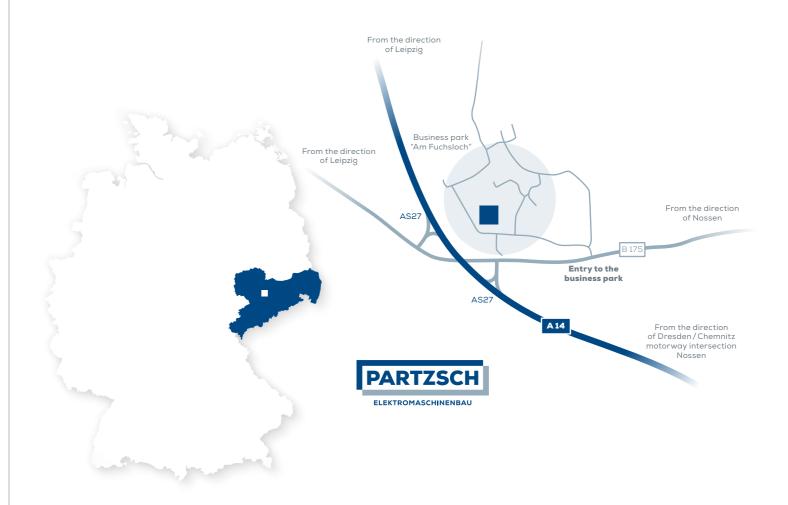


## SERVICE MAKES THE DIFFERENCE

Our qualified team would be pleased to elaborate solutions together with you, taking into account your particular product requirements. Contact us! We are looking forward to hearing from you.

## **FAST AND FLEXIBLE**

Our central location and excellent links to the A14 motorway guarantee fast and flexible deliveries.





ELEKTROMASCHINENBAU

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