

KOLEKTOR

KOLEKTOR MOBILITY
PRESENTATION



ABOUT US

- HEADQUARTERS | Idrija, Slovenia, EU
- 3369 employees
- EUR 396 million in turnover
- 18 legal entities
- FIELDS | passenger cars, commercial vehicles, industry
- Following the megatrend of the green transition to a carbon-free society

*All information is related to the fiscal year 2023

KEY MILESTONES

1963

Year of foundation - start of production of Commutators

2003

Start of electronics (BLDC) development

2006-08

Start of production of Magnetic components

2017

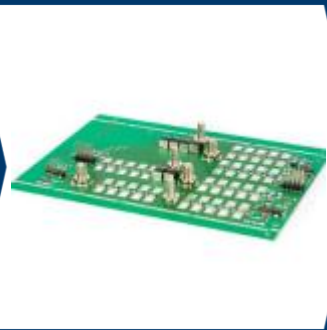
Opening of Competence center for Magnetic Materials

2023

Celebrating 60 years of Kolektor



KOLEKTOR



60
KOLEKTOR

1995

Independent marketing under KOLEKTOR brand name

2005

Start of production of Hybrid components

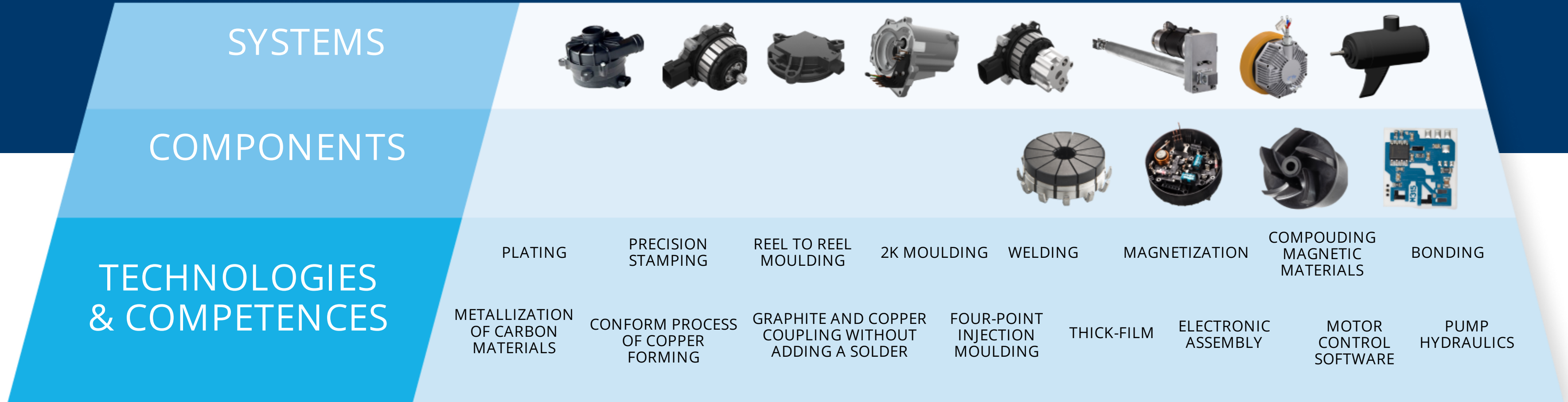
2013

SOP of first motor/drive production for non Automotive

2020

SOP of high volume electrical drive system for Automotive Customer

GROWTH BASED ON COMPETENCES & HIGH VERTICAL INTEGRATION



PERMANENT MAGNET BRUSHLESS MOTORS & DRIVES



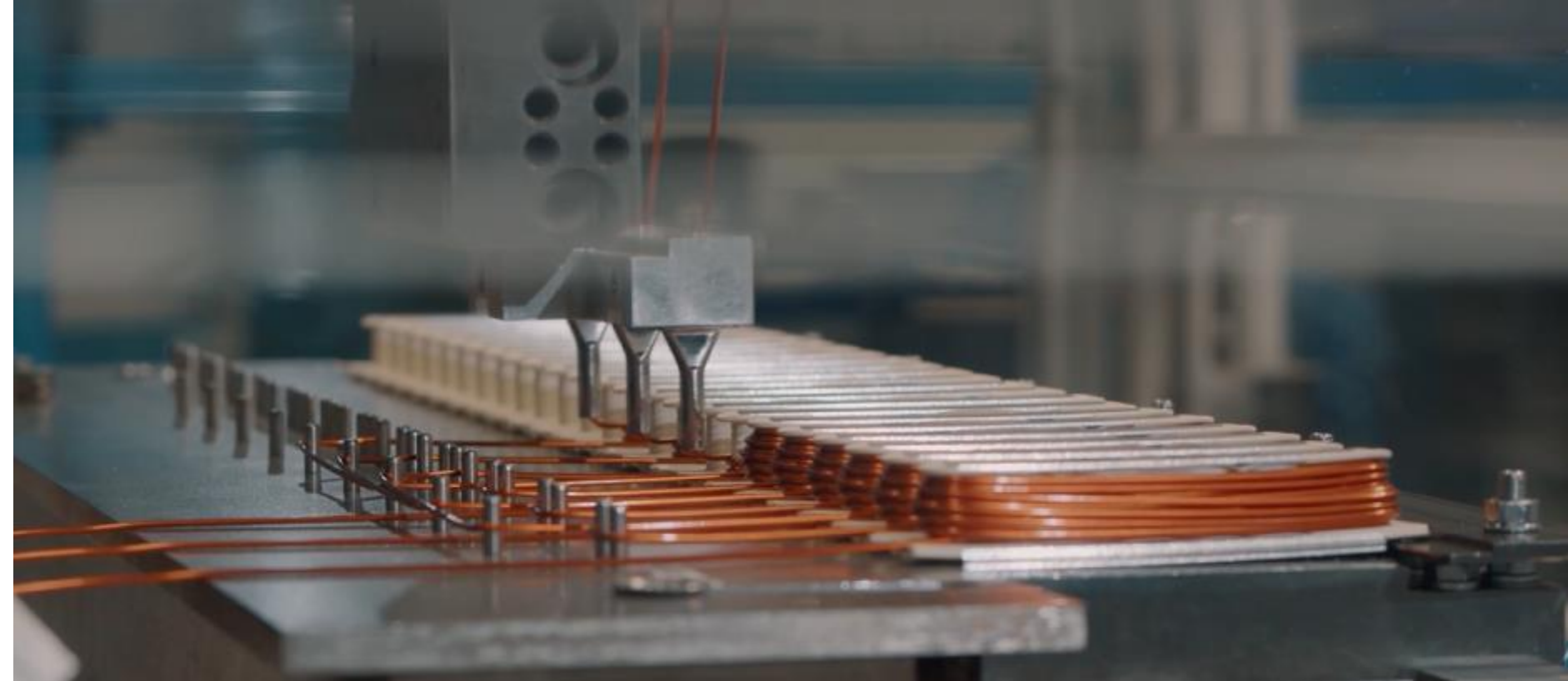
MISSION

To become a leading provider of innovated brushless drives.



VISION

To become one of top 3 supplier in the selected niches.



Over 20 years of experience



Product development of systems



In house production of electronics, motor components and systems



Strong competencies in motor control, motor design and industrialisation technologies

AUTOMOTIVE & COMMERCIAL VEHICLE DRIVES

DRIVES AND
VACUUM PUMPS



ACTUATOR DRIVES AND
ELECTRIC OIL PUMPS



ELECTRICAL
MOTORS



Oil mist separation



E-transmission



E-clutch



INDUSTRIAL AND OFF-HIGHWAY DRIVES

TRACTION DRIVES



PROPULSION DRIVES



AUXILIARY DRIVES



AGV / AMR



Marine



City truck / BUS



INDUSTRIAL AND OFF-HIGHWAY DRIVES

OVERHEAD MONORAILS



Industrial automation



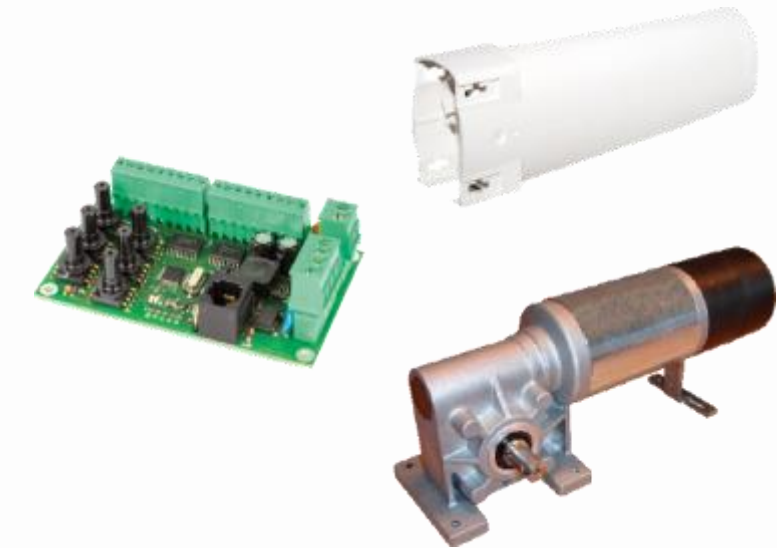
ELECTRIFIED STAIRS /
WHEEL CHAIRS



Rehab & Medical engineering



INTERIOR WINDOW
TREATMENT



Building automation



ELECTRONICS PRODUCT GROUPS

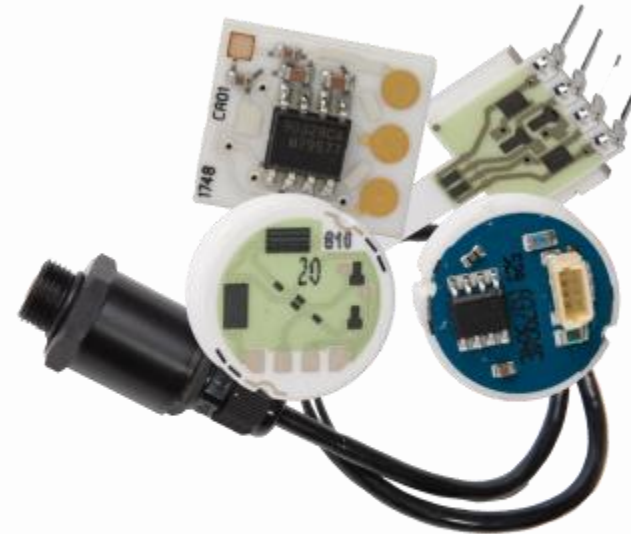
ASSEMBLED
PC-BOARDS (PCBA)



Air conditioning
Power modules
Circuit breakers
IoT modules



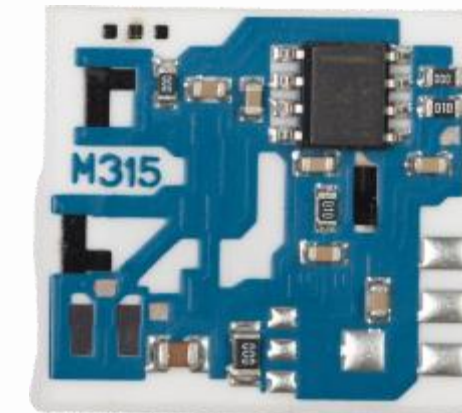
SENSING ELEMENTS
AND SENSORS



Fuel transfer line
Automatic transmission
Engine Oil / Engine Fuel
Water pumps



THICK FILM NETWORKS
AND HYBRIDS



Exhaust system
Start-stop system
Battery discharge
Laser printers



PRODUCT DESIGN

PRODUCT LIFECYCLE MANAGEMENT

REQUIREMENTS MANAGEMENT

Polarion Requirements



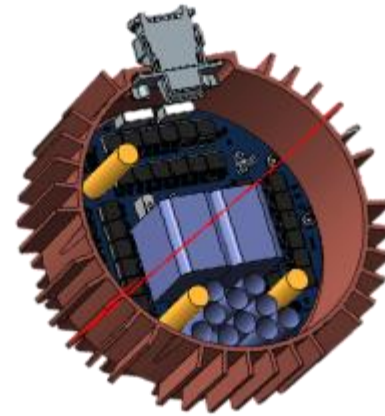
SYSTEM DESIGN

System design
Polarion
PTC/Creo



MECHANICAL DESIGN

Mechanical Construction
(PTC/Creo)



HARDWARE DESIGN

Electronic Hardware Design
(Altium Designer)



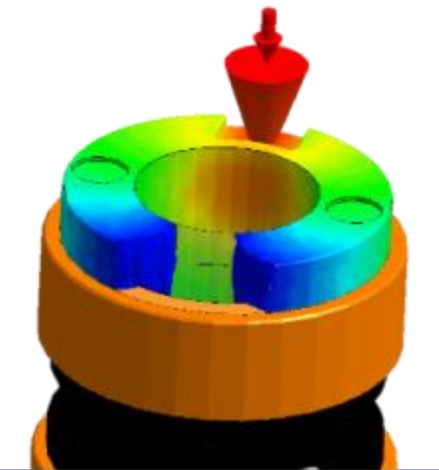
SOFTWARE DESIGN

Embedded Software Development
(Polarion, Matlab/Simulink, C
compilers, Github)



SIMULATION

- Altair
- Ansys
- Creo Simulate
- Moldex
- Moldflow
- Matlab/Simulink
- LT Spice



SUPPORTED BY

PROTOTYPE
SHOP



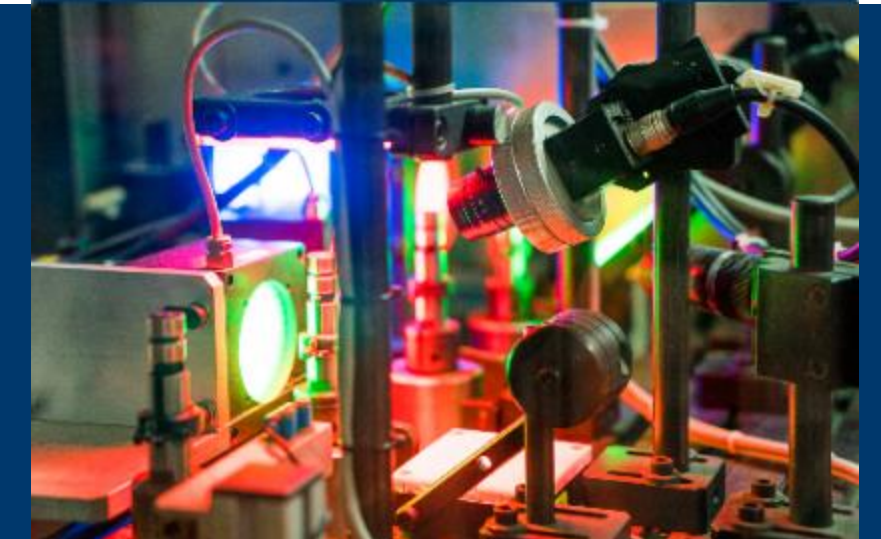
TOOL SHOP



MACHINE BUILDING AND
AUTOMATIZATION



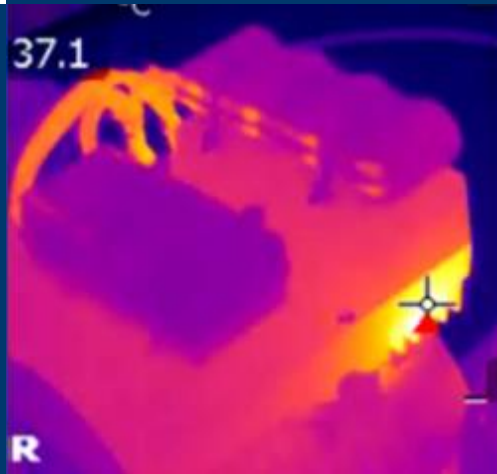
END-OF-LINE
TESTING



TESTING & VALIDATION CAPABILITIES

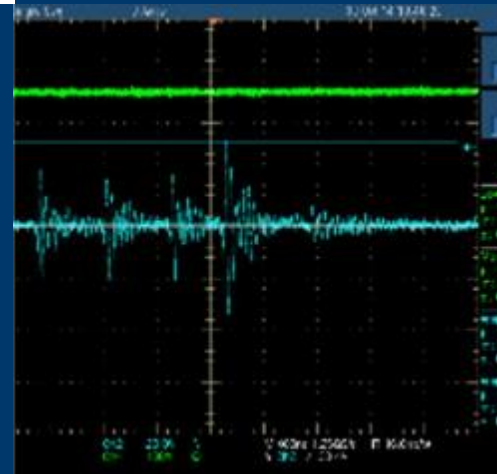
design & process validation tests can be performed internally

THERMAL TESTS



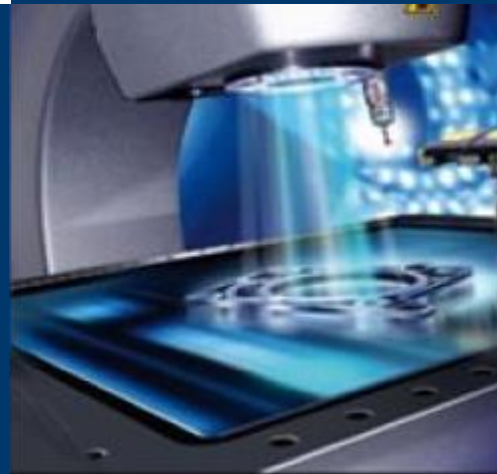
- Temperature Chambers
- Climatic Test Chambers
- Temperature Shock Chambers
- IR Measurement Equipment

ELECTRIC & ELECTRONIC



- Power Supplies
- Oscilloscopes with Probes
- Multi-meters
- Precise RLC Meters
- Low Resistance
- HV Insulation
- CTI Tester
- Nondestructive Insulation

DIMENSIONAL MEASUREMENTS



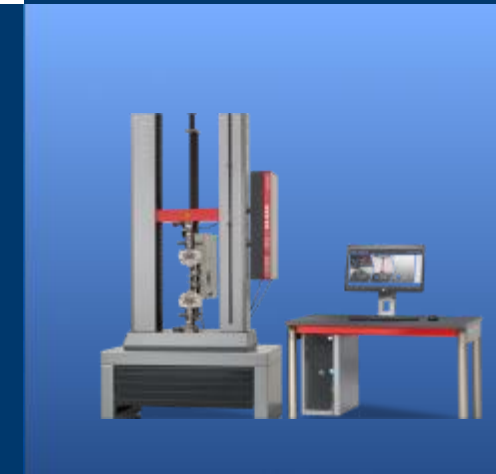
- High resolution optical 3D scanner
- Coordinate Measuring Machine
- 3D Optical Measuring Machine
- Form tester
- Conturograph

ADVANCED ANALYSIS



- SEM/EDX microscope
- CT Scanner
- Optical 3D microscope
- Confocal 3D microscope

MECHANICAL PROPERTIES



- Tensile strength
- Flexural strength
- Impact strength
- Hardness & Microhardness
- Spin testers

MOTOR & MOTOR CONTROL TESTS



- Computer Guided Test Benches
- Universal Test Benches
- Back-to-Back Test Benches

OUR CUSTOMERS

Automotive



Industrial | Commercial vehicle | AGV
















Medical mobility



Marine | Nautics



KOLEKTOR MOBILITY - WORLDWIDE

	<p>Kolektor Mobility Headquarters (SI)</p> <p>Kolektor Sikom (SI)</p> <p>Commutators</p> <p>Drives</p>		<p>Kolektor ATS (RS)</p> <p>Hybrid components</p>
	<p>Kolektor Ascom (SI)</p> <p>Electronics</p> <p>Drives</p>		<p>Kolektor Siegert (D)</p> <p>Electronics</p>
	<p>Kolektor ATP (SI)</p> <p>Hybrid components</p>		<p>Kolektor Conttek (D)</p> <p>Hybrid components</p>
	<p>Kolektor KFH (SI)</p> <p>Commutators</p> <p>Magnetics</p>		<p>Kolektor Sinyung (KR)</p> <p>Commutators</p> <p>Hybrid components</p> <p>Magnetics</p>
	<p>Kolektor CCL (BA)</p> <p>Commutators</p> <p>Magnetics</p> <p>Hybrid components</p>		<p>Kolektor Sentronics (CN)</p> <p>Electronics</p> <p>Commutators</p>
	<p>Kolektor Tesla (CZ)</p> <p>Hybrid components</p>		<p>Kolektor Orodjarna (SI)</p> <p>Automation</p> <p>Tools</p> <p>Machine Building</p> <p>Machine Vision</p>
	<p>Kolektor Microtel (IT)</p> <p>Electronics</p>		

