

The learning system for automation and technology



Media	Type of media	Catalogue Product	Allocation of media to products											
	Software	Software for measurement, open and closed-loop control	Fluid Lab® + Easyport											
		Process simulation software	CIROS® Automation Suite/Robotino® SIM, 3D-View, Fluid Lab® PA											
		Process visualisation software	Win CC, InTouch											
		Programming software	STEP7, CoDeSys, FST, LOGO! Soft, WinNC, Robotino® View											
		Circuit diagram design/simulation	FluidSIM® (EasyPort)											
		Design engineering software (CAE/CAD/CAM)	EPLAN, CAM-Concept											
		Task/document database	Mechatronics Assistant											
		Training programs	WBTs/CBTs											
		Workbooks	Workbooks and textbooks for the learning systems											
			Exercises and solutions											
	Workplace systems	Laboratory/control system variants	Catalogue product/learning system											
				Furniture	Fluid engineering laboratory furniture	Profile plate/Learnline/Learntop								
					Electrical engineering laboratory furniture	Basic/Swing								
				Control systems	Control system for mounting frames (ER format)	EduTrainer® Compact LOGO!								
						EduTrainer® Compact SIMATIC S7								
					Control system for mounting frames (A4 format or rack)	EduTrainer® Compact with PLC from Festo, Allen-Bradley								
						EduTrainer® Logic Control								
						EduTrainer® with SIMATIC S7								
						EduTrainer® Universal with PLC from Festo, Mitsubishi, Allen-Bradley								
								Exercises and solutions	Training programs (WBTs/CBTs)	Task/document data base	Development software	Circuit diagram design/simulation	Programming software	Process visualisation software
	Technology-orientated training packages	Training content/technology/process	Catalogue product/learning system											
				Electrical engineering	Contacting control systems	EduCabinet IA + basic equipment kit								
					Contacting control systems	EduTrainer® "Operating and reporting", "Contactor board" + "Equipment set" (AA)								
				Open-loop control technology	Pneumatics/electropneumatics	TP 101/102 (pneumatics) TP 201/202 (electropneumatics)								
					Hydraulics/electrohydraulics	TP 501/502 (hydraulics) TP 601/602 (electrohydraulics)								
					Sensor technology	TP 240 (sensors in pneumatics) TP 1110 (object sensing)								
					Digital technology	e.g. TP 201 + EasyPort and FluidSIM® pneumatics or LOGO!								
					Programmable logic controllers	TP 301 (PLC)								
				Measurement and closed-loop control technology	Closed-loop pneumatics	TP 111 (closed-loop pneumatics)								
					Measurement, open and closed-loop control in pneumatics	TP 210 (measurement, open and closed-loop control in pneumatics)								
Closed-loop hydraulic control/proportional hydraulics	TP 511 (closed-loop hydraulics) TP 701/702 (proportional hydraulics)													
Operating and monitoring	Measurement, open and closed-loop control in hydraulics	TP 610 (measurement, open and closed-loop control in hydraulics)												
	Operating and monitoring	EduTrainer® "Touch panel/operator panel" (AA)												
Bus technology	Operating and monitoring	EduCabinet IA + operating and monitoring kit												
	AS-interface	TP 401 (AS-interface)												
Drive technology	Profibus-DP	TP 402 (Profibus-DP)												
	Pneumatics	TP 220 (drives in pneumatics)												
	Electrics	TP 801 (servo motor)/TP 802 (stepper motor)												
		EduCabinet IA + drive technology kit												
		EduCabinet IA + frequency converter kit												
		EduCabinet IA + fieldbus kit												
	Robotino®	Training content/technology/process	Catalogue product/learning system											
				Mechatronics	Closed-loop control technology	Robotino® with optional I/O expansion card								
					Sensor technology, image processing	Robotino®								
					Drive technology	Robotino®								
				Information technology	Driverless transport systems	Robotino® + Logistic Kit								
					Navigation, locating	Robotino® with optional gyroscope, Navigation Kit								
					Visual programming	Robotino® View								
					Artificial intelligence	Robotino®								
						Wireless communication								
						Robotino®								
	Mechatronics/factory automation learning systems	Training content/technology/process	Catalogue product/learning system											
				Stations/complete systems	MPS®	Handling	Distributing, handling, pick & place station, MPS® 202-Mechatronics							
						Sorting/storing	Sorting, buffering and storing station							
						Identifying	Inspection station or MPS® 202-Mechatronics							
						Networking	AS-interface distributing station, MPS® 203-Fieldbus							
						Safety engineering	Expansion set for MPS® stations							
						Transportation/driving	Sorting, buffering, separating and conveyor module station							
				Desktop systems	MPS® Transfer System Project kits	Processing/assembly	Processing, punching, assembly station, fluidic muscle							
						Diagnostics/remote maintenance	MPS® 203-Fieldbus or MPS® 203-IT							
						Storing	Storing and sorting station							
Handling with robots	Robot station, MPS® 202-Mechatronics													
Training factories		Transportation/driving	Transfer line with DC or AC drive											
		Positioning	Drilling module for pneumatic axis/NC axis											
		Handling	Stacking magazine, turning, deflector and ejection module											
		Sorting/storing	Deflector and ejection module											
		Identifying	Borehole checking, measurement, RFID (DP) and camera inspection module											
		Networking	All variants in AS-interface or Profibus-DP											
		Drilling module for pneumatic axis/NC axis												
		Automated CNC processing/robotics												
		Automated discrete production processes												
		CIM – The automated factory for discrete manufacturing processes												
		Factory planning/flexible manufacturing processes												
	Process automation learning systems	Training content/technology/process	Catalogue product/learning system											
				Stations/complete systems	MPS® PA	Mixing	Mixing station							
						Filtering	Filtering station							
						Tempering	Reactor station							
						Bottling	Bottling station							
						Closed-loop control technology	Compact workstation							
				Desktop systems		Process engineering	EduKit PA							
				Training factories		Open and closed-loop control, process automation	Complete system MPS® PA-204							
						Automation of hybrid production processes	AFB training factory for hybrid production							
					Machines and tools	Training content/technology/process	Catalogue product learning system							
Machining		Turning	EMCOMAT											
		Milling	EMCOMILL											
		CNC turning	EMCO Concept TURN											
		CNC milling	EMCO Concept MILL											