



Lab 9 - AUTOMATION & FLUID POWER



The laboratory is conceived to give the student a clear overview of the concepts involved in industrial automation. It includes a PLC automation trainer complete with a comprehensive series of industrial process simulation modules. A Pneumatic and electro pneumatic trainer, with a comprehensive set of typical components used in pneumatic control applications. The components are mounted on modules that can be installed on a panel frame or a bench for teacher demonstration and student use.

A Hydraulics trainer designed to study and experiment oleo-dynamic power and control circuits, with panels including a number of components conveniently installed and exposed for training and experimenting.

Each module is provided with a user manual that explains its characteristics and use.

TRAINING STATIONS LIST

9.1	PLC PROCESS SIMULATOR
9.2	INDUSTRIAL AUTOMATION BY PLC
9.3	PNEUMATICS & ELECTRO PNEUMATICS AUTOMATION
9.4	HYDRAULICS (OLEODYNAMICS) AUTOMATION

Equipment List

LAB N°	Item N°	TITLE	CODE	Total Qty	Stud WS 1	Stud WS 2	Stud WS 3	Stud WS 4	Stud WS 5	Stud WS 6	Stud WS 7	Stud WS 8	Teach WS	LAB
9		PLC AUTOMATION AND FLUID POWER LABORATORY.												
		For 16 to 32 students working at the same time. See complete catalogue to see product description and other details.												
		PLC AUTOMATION												
9	1	INDUSTRIAL AUTOMATION BY PLC	B37B											
9	1 1	PLC TRAINER (OMRON or CROUZET)	C3729 AA	4	<i>1</i>	<i>1</i>			<i>1</i>	<i>1</i>				
9	1 2	PLC SIMULATION PANEL	B3729D C3729D	4	<i>1</i>	<i>1</i>			<i>1</i>	<i>1</i>				
9	1 3	STAR-DELTA CIRCUIT	B3729H	2	<i>1</i>				<i>1</i>					
9	1 4	TRAFFIC LIGHT	B3729K C3729K	2		<i>1</i>				<i>1</i>				
9	1 5	CONVEYOR BELT SYSTEM	B3729N	1										<i>1</i>
9	1 6	3-STOREY ELEVATOR CONTROL	B3729O	1										<i>1</i>
9	1 7	WASHING MACHINE SIMULATOR	B3729W C3729W	2	<i>1</i>				<i>1</i>					
9	2	PLC PROCESS SIMULATOR	C3730											
9	2 1	UNIVERSAL PLC SIMULATOR	C3730	4			<i>1</i>	<i>1</i>			<i>1</i>	<i>1</i>		
9	3	INDUSTRIAL AUTOMATION BY PLC EXPANSION	B37U											
9	3 1	PLC TRAINER (OMRON or CROUZET)	C3729 AA	4			<i>1</i>	<i>1</i>			<i>1</i>	<i>1</i>		
9	3 2	XY POSITIONING SYSTEM	B3729G1	2	<i>1</i>				<i>1</i>					
9	3 3	ROTOR RESISTANCE STARTER CIRCUIT	B3729I	2	<i>1</i>				<i>1</i>					
9	3 4	DAHLENDER CIRCUIT	B3729J C3729J	2	<i>1</i>				<i>1</i>					
9	3 5	PARKING LOT	B3729L	2	<i>1</i>				<i>1</i>					
9	3 6	SILO SYSTEM	B3729M	2	<i>1</i>				<i>1</i>					
9	3 7	TANK LEVEL CONTROL	B3729Q C3729Q	2		<i>1</i>				<i>1</i>				
9	3 8	REACTOR VESSEL CONTROL	B3729R	2		<i>1</i>				<i>1</i>				
9	3 9	MIXER	B3729S	2		<i>1</i>				<i>1</i>				
9	3 10	RUNNING LIGHT SYSTEM	B3729T	2		<i>1</i>				<i>1</i>				
9	3 11	ANTENNA POSITIONING SYSTEM	B3729Y	2		<i>1</i>				<i>1</i>				
9	4	FUZZY LOGIC	B3732											
9	4 1	PID/FUZZY LOGIC PROCESS CONTROLLER	B3732 PLC	1										<i>1</i>
9	4 2	FLAME (BRIGHTNESS) CONTROL SYSTEM SIMULATOR	B3732A	1										<i>1</i>
9	4 3	OVEN (TEMPERATURE) CONTROL SYSTEM SIMULATOR	B3732B	1										<i>1</i>
9	4 4	PRESSURE CONTROL SYSTEM SIMULATOR	B3732C	1										<i>1</i>
9	4 5	INPUT/OUTPUT KIT	B3732 IOK	1										<i>1</i>
9	5	PNEUMATICS & HYDRAULICS AUTOMATION												
9	5 1	PNEUMATICS & ELECTRO PNEUMATICS AUTOMATION	B38P											
9	5 2	PNEUMATICS TRAINER	B38P	4	<i>1</i>	<i>1</i>			<i>1</i>	<i>1</i>				
9	5 3	ELECTROPNEUMATICS TRAINER	B38E	4			<i>1</i>	<i>1</i>			<i>1</i>	<i>1</i>		
9	5 4	SILENT COMPRESSOR	B38C	4	<i>1</i>		<i>1</i>	<i>1</i>		<i>1</i>		<i>1</i>		
9	5 5	HYDRAULICS AUTOMATION	B39											
9	5 5 1	HYDRAULICS TRAINER	B39	1										1
FM	1	FURNITURE												
FM	1 1	WORK TABLE	F1110A	8	<i>1</i>	<i>1</i>	<i>1</i>	<i>1</i>	<i>1</i>	<i>1</i>	<i>1</i>	<i>1</i>		
FM	1 2	MOBILE LOWER CABINET	F11 4146	8	<i>1</i>	<i>1</i>	<i>1</i>	<i>1</i>	<i>1</i>	<i>1</i>	<i>1</i>	<i>1</i>		
FM	1 3	STUDENT STOOL	F11 1718	24	<i>3</i>	<i>3</i>	<i>3</i>	<i>3</i>	<i>3</i>	<i>3</i>	<i>3</i>	<i>3</i>		
FM	1 4	TEACHER'S DESK	F11 2126	1										<i>1</i>
FM	1 5	TEACHER'S CHAIR	F11 5000	1										<i>1</i>
FM	1 6	CABINET FOR TOOLS & INSTRUMENTS	F11 3310	4										<i>4</i>
FM	1 7	TROLLEY	F1151 R1	4										<i>4</i>