

Fully Automatic Dyeing Computers

Simplex Family, Model 520 Dyeing Computers are capable of operating different types of fully automatic machines with their special commands for processes. Consisting of two parts (HMI and PIO), the device provides convenience and flexibility at installation. The characteristics of its command constitution and the capabilities of its control loops (PPL) provide easy and quick project designing. A user-friendly color TFT screen supports icons that are special to commands and menus and provide convenient monitoring and usage. It can be used in many languages due to its multi language support. Functional shortcut keys provide quick access to submenus. This enables convenient projecting and installation at low costs.

The device provides sensitive control with high reliability and performance and it allows monitoring of operations being applied by PC. It can apply several processes at the same time due to its parallel command running ability which again shortens process duration. Using the communication port the device works fully integrated into Focus (Enmos Central Monitoring Software). It transfers and stores process information to a computer in real-time.



General Specifications

- Easy-to-use 800 x 480 7" Color TFT screen (256,000 colors)
- Quick access to commands and sub-menus
- Easy operating with shortcut keys
- 3 Level password protection
- Reports for occurred alarms
- Fully integrated into Focus (Enmos Central Monitoring Software)
- User based menu access
- Event log system
- Easy program copying feature via USB memory stick
- Easy installation with plug-in sockets
- Manual controlling capability
- Easy project management with SPM (Simplex Project Manager)
- Fast operations with 3 function keys
- Programmable parametric security limitations
- Program copying feature
- Ability to enter password protected command, alarm and system parameters
- Ability to handle calibrations from different points
- Temperature-Time Graphic
- Consumption Reports
- Easy project copying via SD/MMC card
- Remote I support with VNC
- Multi language support

Technical Specification

Commands	Information	Commands	Information
Temperature Control	Fast or Gradient Heating/Cooling	Circulation	MT AT1, MT AT2
Dosage	Progressive/Regressive Proportional Dosage (AT1, AT2)	Overflow	MT Overflow Washing
Dosage with Circulation	Dosage from AT1 to AT2	Pump / Reel	For Pump and Reel
Wait	Waiting along with the entered period	Chemical Request	For Liquid Chemical Kitchen
Warning	Fabric in, Fabric out, Add Salt, Add Soda, Add Chemical	Differential Pressure	Differential Pressure Function
Fill	MT, RT (Progressive or Regressive Fill), AT1, AT2	Heating	AT1 Heating, AT2 Heating, RT Heating
Normal Drain	MT, AT1, AT2, RT	Mixer	AT1 Mixer, AT2 Mixer, RT Mixer
Fast Drain	Drain with pump	PH Control	MT Automatic PH Control
Transfer	Transfer between MT, AT1, AT2, RT	Cycle Control	Automatic Regulation Control for Reels

■ Abbreviations: MT = Main Tank, AT1= Additional Tank 1, AT2= Additional Tank 2, RT = Reserve Tank

PIO Inputs / Outputs		Min	Max
Analog Input	PT100 (-200 / 800 °C)	2	16
	0/4-20mA (input resistance 110 ohm)	2	16
Analog Output	0/4-20mA (max. load resistance 250 ohm)	4	16
Digital Input	12-24V DC/AC	32	128
Counter Input	12-24V DC/AC 500 Hz	1	4
Digital Output	250V AC 1 A Relay NO	32	128
Communication Port	RS 485	2	2
	RS 232	1	1
	Ethernet	1	1
	USB	1	1

PIO-A

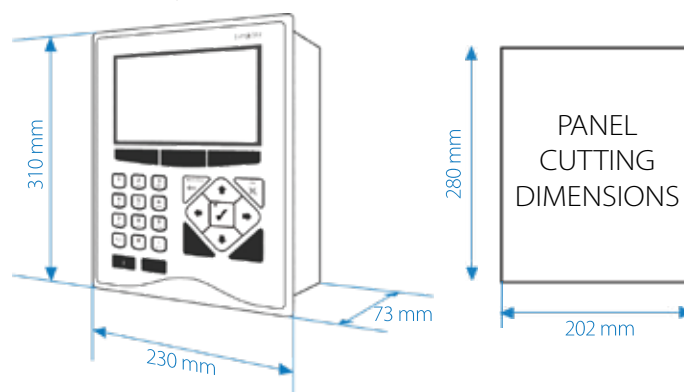


PIO-E



Programming	
Program Capacity	1000
Program Steps	100
Parallel Command	4
Sequential Programming	30

Technical Specification					
Operating Voltage	24V DC	Ethernet	10/100 Mbps	Isolation	2000V digital
Power Consumption	Max. 15W	Memory	128 MB Ram, 256 MB Flash	Keyboard	27 keys
Operating Temperature	0 – 60 °C	SD/MMC Card	Up to 2 GB	Screen	800 x 480 Color TFT
Humidity	10 – 90% (non-condensing)	USB	2.0 Host	Dimensions	310 x 230 x 73 mm



Fully Automatic Dyeing Computers

Simplex Family, Model 540 Dyeing Computers are capable of operating different types of fully automatic machines with their special commands for processes. Consisting of two parts (HMI and PIO), the device provides convenience and flexibility at installation. The characteristics of its command constitution and the capabilities of its control loops (PPL) provide easy and quick project designing. A user-friendly color TFT screen supports icons that are special to commands and menus and provide convenient monitoring and usage. It can be used in many languages due to its multi-language support. Functional shortcut keys provide quick access to submenus. This enables convenient projecting and installation at low costs. The device provides sensitive control with high reliability and performance and it allows monitoring of operations being applied by PC. It can apply several processes at the same time due to its parallel command running ability which again shortens process duration. Using the communication port the device works fully integrated into Focus (Enmos Central Monitoring Software). It transfers and stores process information to a computer in real-time.



General Specifications

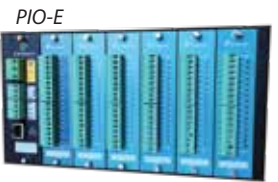
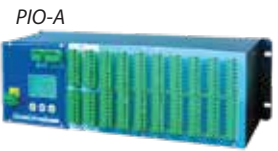
- Easy-to-use 800 x 600 10,4" Color TFT touch screen(256.000 colors)
- Quick access to commands and sub-menus
- Easy operating with shortcut keys
- 3 Level password protection
- Reports for occurred alarms
- Fully integrated into Focus (Enmos Central Monitoring Software)
- User based menu access
- Event log system
- Easy program copying feature via USB memory stick
- Easy installation with plug-in sockets
- Manual controlling capability
- Easy project management with SPM (Simplex Project Manager)
- Fast operations with 3 function keys
- Programmable parametric security limitations
- Program copying feature
- Ability to enter password protected command, alarm and system parameters
- Ability to handle calibrations from different points
- Temperature-Time Graphic
- Consumptions reports
- Easy project copying via SD/MMC card
- Monitoring and settings over standard web browser
- Multi Language support

Technical Specification

Commands	Information	Commands	Information
Temperature Control	Fast or Gradient Heating/Cooling	Circulation	MT AT1,MT AT2
Dosage	Progressive/Regressive Proportional Dosage (AT1,AT2)	Overflow	MT Overflow Washing
Dosage with Circulation	Dosage from AT1 to AT2	Pump / Reel	For Pump and Reel
Wait	Waiting along with the entered period	Chemical Request	For Liquid Chemical Kitchen
Warning	Fabric in, Fabric out , Add Salt, Add Soda, Add Chemical	Differential Pressure	Differential Pressure Function
Fill	MT,RT (Progressive or Regressive Fill), AT1, AT2	Heating	AT1 Heating, AT2 Heating, RT Heating
Normal Drain	MT, AT1, AT2, RT	Mixer	AT1 Mixer, AT2 Mixer, RT Mixer
Fast Drain	Drain with pump	PH Control	MT Automatic PH Control
Transfer	Transfer between MT, AT1, AT2, RT	Cycle Control	Automatic Regulation Control for Reels

■ Abbreviations: MT = Main Tank, AT1= Additional Tank 1, AT2= Additional Tank 2 , RT = Reserve Tank

PIO Inputs / Outputs		Min	Max
Analog Input	PT100 (-200 / 800 °C)	2	8
	0/4-20mA (input resistance 110 ohm)	2	8
Analog Output	0/4-20mA (max. load resistance 250 ohm)	4	16
Digital Input	12-24V DC/AC	32	128
Counter Input	12-24V DC/AC 500 Hz	1	4
Digital Output	250V AC 1 A Relay NO	32	128
Communication Port	RS 485	2	2
	RS 232	1	1
	USB		

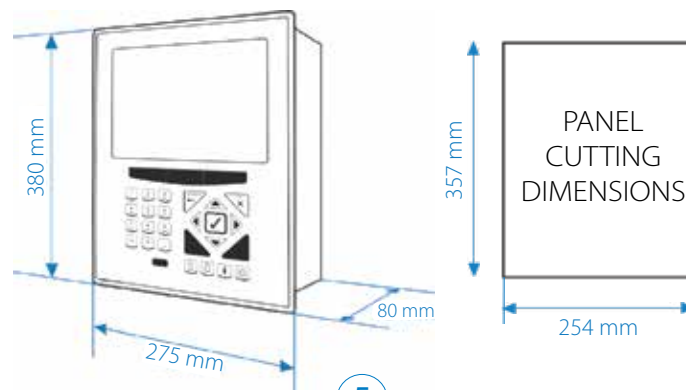


Programming

Program Capacity	1000
Program Steps	100
Parallel Command	4
Sequential Programming	30

Technical Specification

Operating Voltage	24V DC	Ethernet	10/100 Mbps	Isolation	2000V digital
Power Consumption	Max. 15W	Memory	128 MB Ram, 256 MB Flash	Keyboard	27 keys
Operating Temperature	0 – 60 °C	SD/MMC Card	Up to 2 GB	tScreen	800 x 600 Color TFT
Humidity	10 – 90% (non-condensing)	USB	2.0 Host	Dimensions	378 x 275 x 73 mm



Fully Automatic Dyeing Computers

Simplex Family, Model 640 Dyeing Computers are capable of operating different types of fully automatic machines with their special commands for processes. Consisting of two parts (HMI and PIO), the device provides convenience and flexibility at installation. The characteristics of its command constitution and the capabilities of its control loops (PPL) provide easy and quick project designing. A user-friendly color TFT screen supports icons that are special to commands and menus and provide convenient monitoring and usage. It can be used in many languages due to its multi-language support. Functional shortcut keys provide quick access to submenus. This enables convenient projecting and installation at low costs. The device provides sensitive control with high reliability and performance and it allows monitoring of operations being applied by PC.



It can apply several processes at the same time due to its parallel command running ability which again shortens process duration. Using the communication port the device works fully integrated into Focus (Enmos Central Monitoring Software). It transfers and stores process information to a computer in real-time.

General Specifications

- Easy-to-use 1024 x 768 12,1" Color TFT screen (256.000 colors)
- Quick access to commands and submenus
- Easy operating with shortcut keys
- 3 Level password protection
- Reports for occurred alarms
- Fully integrated into Focus (Enmos Central Monitoring Software)
- User based menu access
- Event log system
- Easy program copying feature via USB memory stick
- Easy installation with plug-in sockets
- Manual controlling capability
- Touch Screen features
- Easy project management with SPM (Simplex Project Manager)
- Programmable parametric security limitations
- Program copying feature
- Ability to enter password protected command, alarm and system parameters
- Ability to handle calibrations from different points
- Temperature-Time Graphic
- Consumption Reports
- Easy project copying via USB Flash Disc
- Remote control support with VNC
- Multi Language support

Technical Specification

Commands	Information	Commands	Information
Temperature Control	Fast or Gradient Heating/Cooling	Circulation	MT AT1,MT AT2
Dosage	Progressive/Regressive Proportional Dosage (AT1,AT2)	Overflow	MT Overflow Washing
Dosage with Circulation	Dosage from AT1 to AT2	Pump / Reel	For Pump and Reel
Wait	Waiting along with the entered period	Chemical Request	For Liquid Chemical Kitchen
Warning	Fabric in, Fabric out , Add Salt, Add Soda, Add Chemical	Differential Pressure	Differential Pressure Function
Fill	MT,RT (Progressive or Regressive Fill), AT1, AT2	Heating	AT1 Heating, AT2 Heating, RT Heating
Normal Drain	MT, AT1, AT2, RT	Mixer	AT1 Mixer, AT2 Mixer, RT Mixer
Fast Drain	Drain with pump	PH Control	MT Automatic PH Control
Transfer	Transfer between MT, AT1, AT2, RT	Cycle Control	Automatic Regulation Control for Reels

■ Abbreviations: MT = Main Tank, AT1= Additional Tank 1, AT2= Additional Tank 2 , RT = Reserve Tank

PIO Inputs / Outputs		Min	Max
Analog Input	PT100 (-200 / 800 °C)	2	8
	0/4-20mA (input resistance 110 ohm)	2	8
Analog Output	0/4-20mA (max. load resistance 250 ohm)	4	16
Digital Input	12-24V DC/AC	32	128
Counter Input	12-24V DC/AC 500 Hz	1	4
Digital Output	250V AC 1 A Relay NO	32	128
Communication Port	RS 485	2	2
	RS 232	1	1
	Ethernet	2	2
	USB	6	6



Programming	
Program Capacity	1000
Program Steps	100
Parallel Command	4
Sequential Programming	30

Technical Specification					
Operating Voltage	24V DC	Ethernet	10/100 Mbps	Screen	1024 x 768 Color TFT
Power Consumption	Max. 60W	Memory	4 GB Ram, 4 GB Flash	Dimensions	345 x 270 x 87 mm
Operating Temperature	0 – 60°C	USB	3.0 Host	Isolation	2000V digital
Humidity	10 – 90% (non-condensing)	Touch Screen	Resistive 4 Wire		

