

Main_Program [OB1]

Main_Program Properties

General

Name	Main_Program	Number	1	Type	OB
Language	LAD	Numbering	Manual		

Information

Title	"Main Program Sweep (Cycle)"	Author		Comment	
Family		Version	0.1	User-defined ID	

Name	Data type	Default value
▼ Temp		
OB1_EV_CLASS	Byte	
OB1_SCAN_1	Byte	
OB1_PRIORITY	Byte	
OB1_OB_NUMBR	Byte	
OB1_RESERVED_1	Byte	
OB1_RESERVED_2	Byte	
OB1_PREV_CYCLE	Int	
OB1_MIN_CYCLE	Int	
OB1_MAX_CYCLE	Int	
OB1_DATE_TIME	Date_And_Time	
Constant		

Network 1: SP6-12

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Problem SP6-12 Batch Control

Additional internal memory:

Tag Address

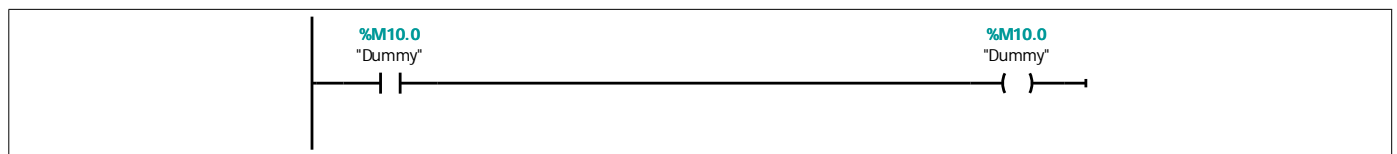
Run M5.0 BOOL On while station running

Int_Reset M5.1 BOOL Internal reset

Step_1 to Step_15 M0.1 to M1.7 BOOL Step-in-progress bits

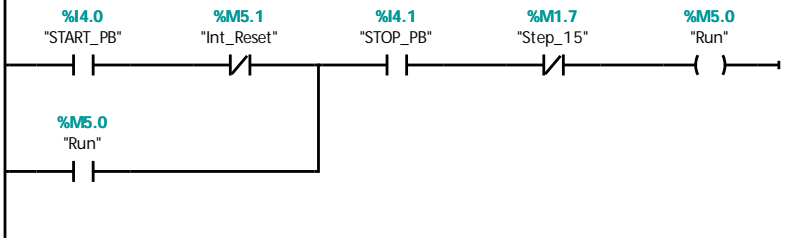
Stir_Step_Tic DB1 TON_SFB Tic for stir step retentive timer

Stir_Step_Ctr DB2 CTU_SFB Counter for stir step retentive timer

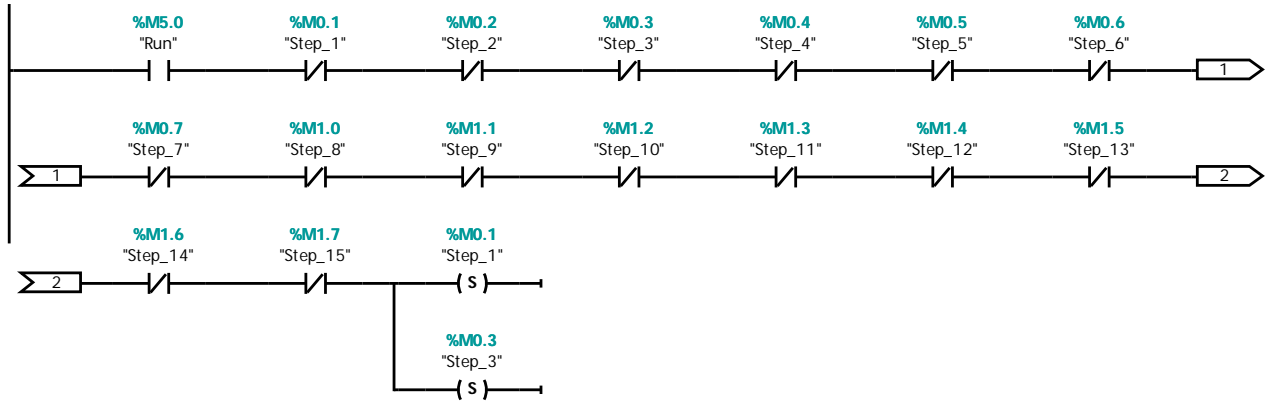


Network 2: Start/stop

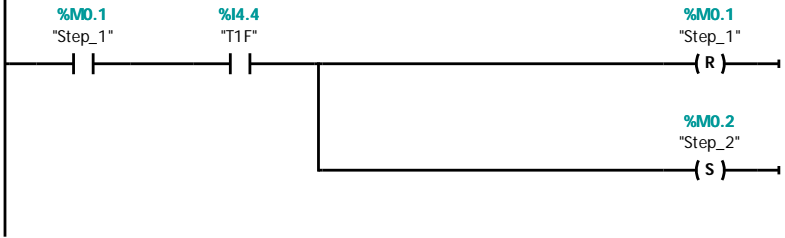
During reset prevent start



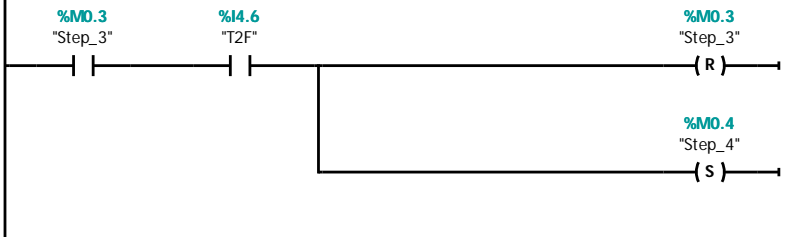
Network 3: Initial start



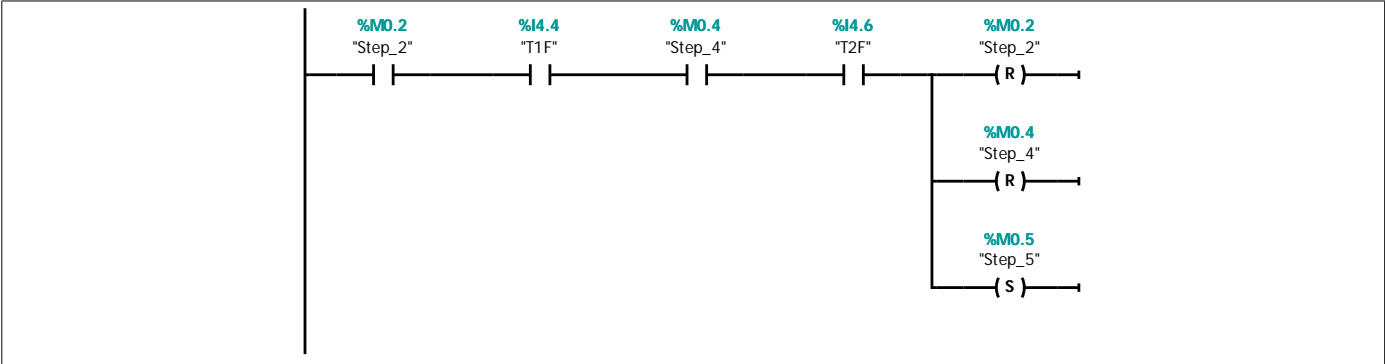
Network 4: Step 1 Fill Tank 1



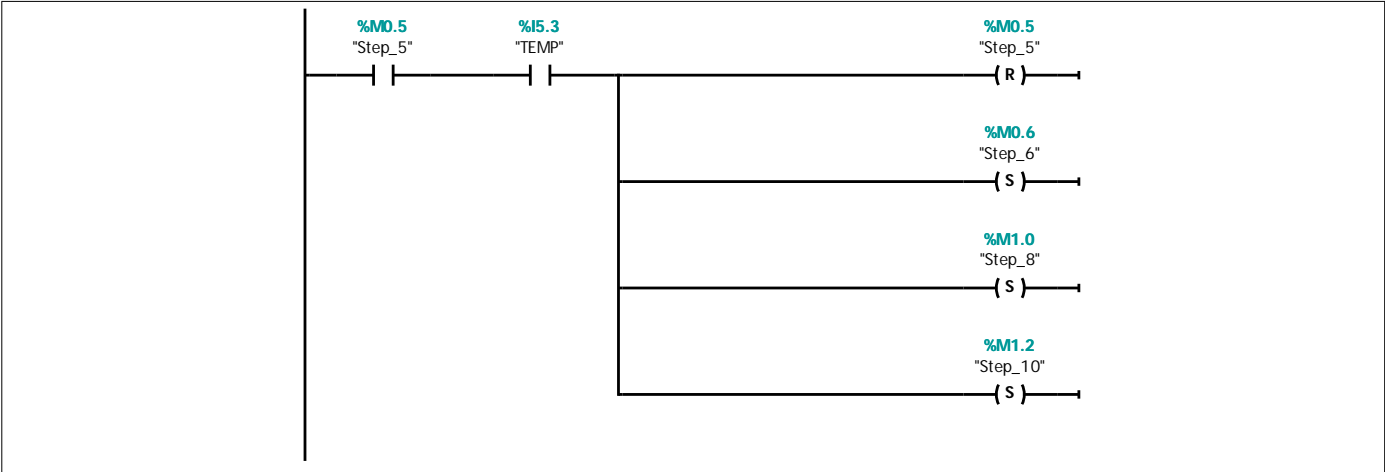
Network 5: Step 3 Fill Tank 2



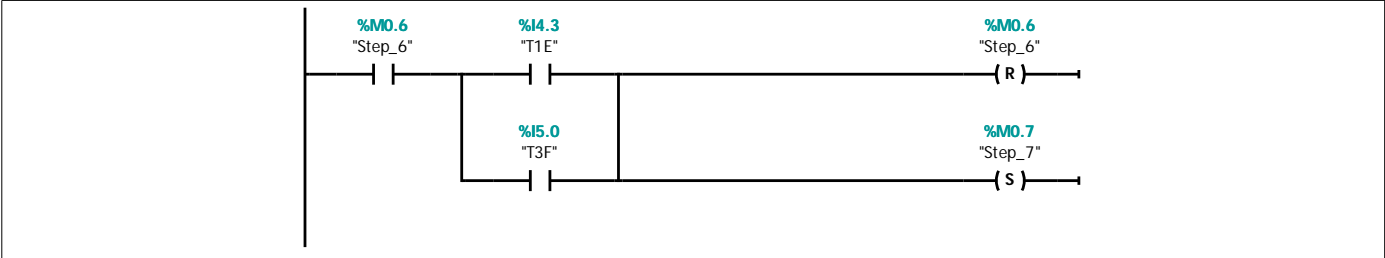
Network 6: Steps 2 and 4 Wait for Tanks 1 and 2 to be full



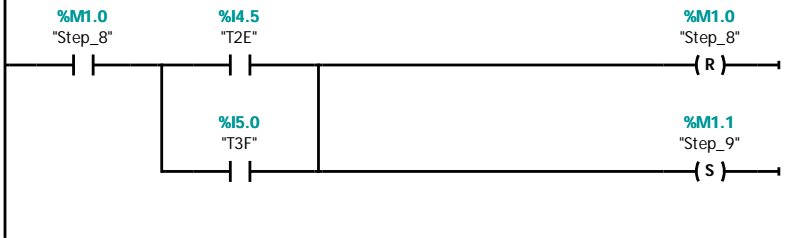
Network 7: Step 5 Heat Tank 2



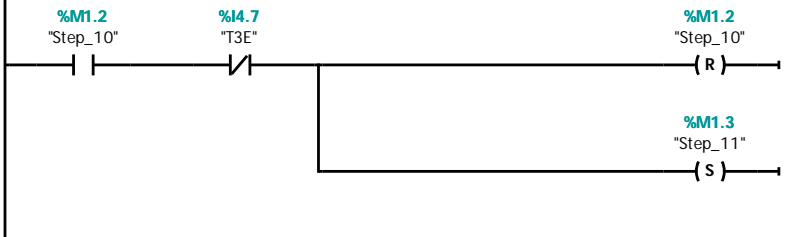
Network 8: Step 6 Empty Tank 1



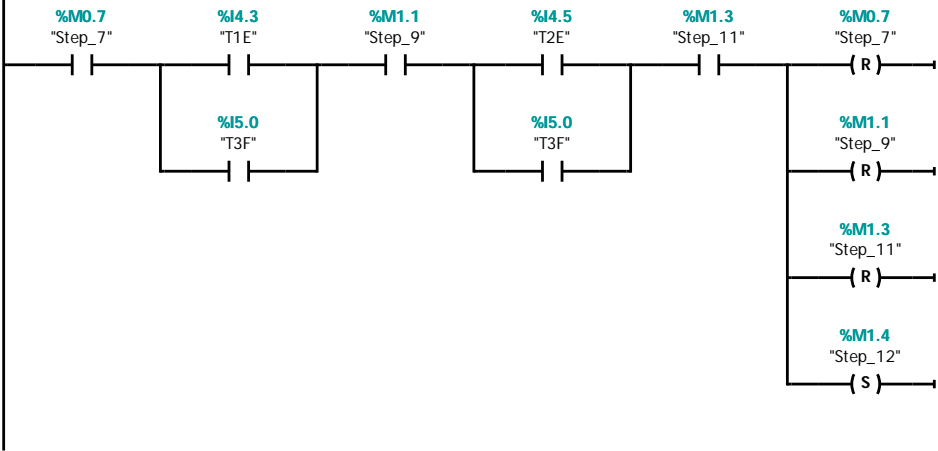
Network 9: Step 8 Empty Tank 2



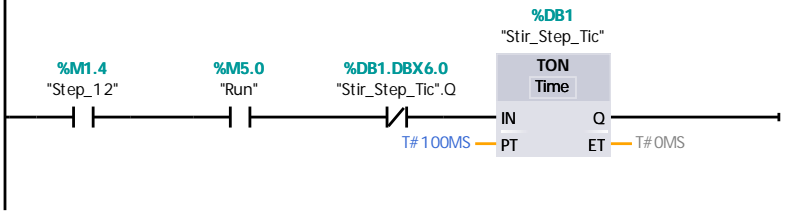
Network 10: Step 10 Wait for liquid in Tank 3



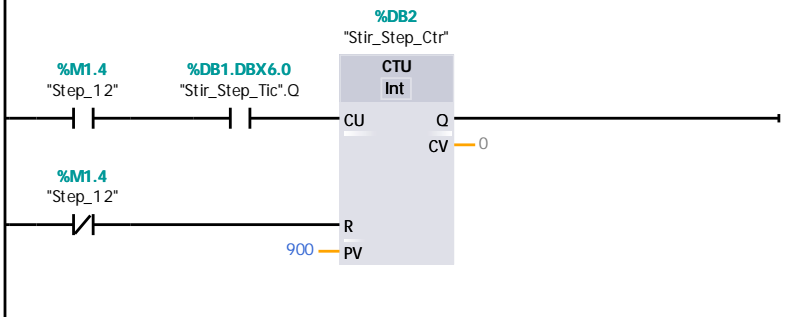
Network 11: Step 7, 9, 11 Wait for Tanks 1 & 2 to be empty and stirrer start



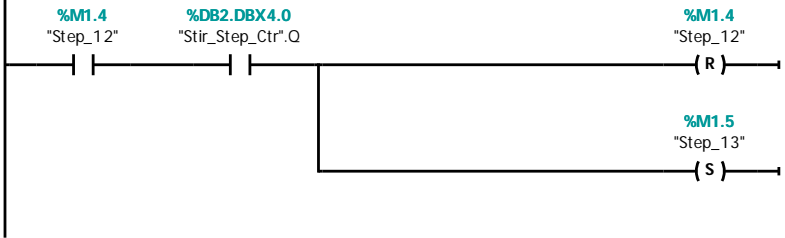
Network 12: 0.1 sec tic for stir step retentive timer



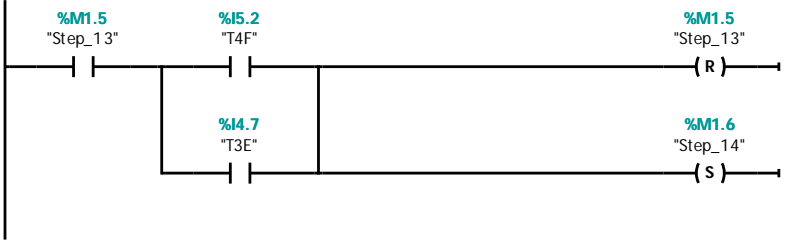
Network 13: Stir step counter for retentive timer



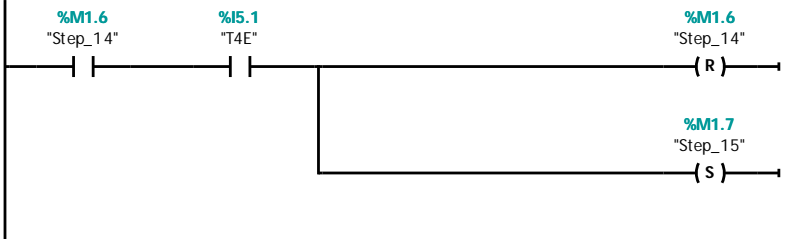
Network 14: Step 12 Stir Tank 3 for 90 sec



Network 15: Step 13 Transfer to Tank 4

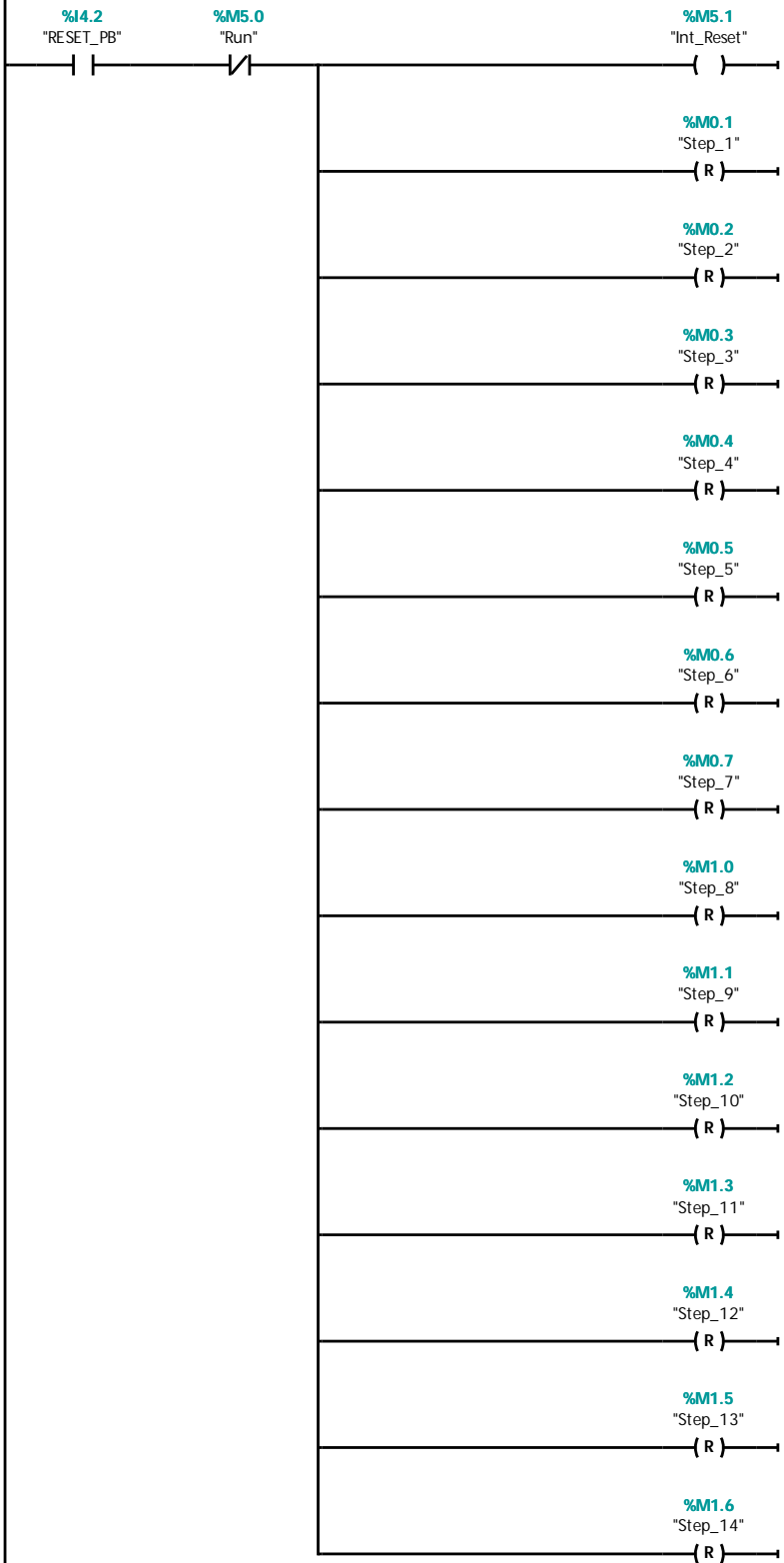


Network 16: Step 14 Empty Tank 4

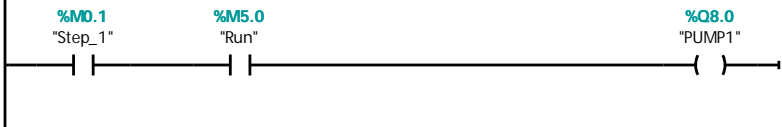
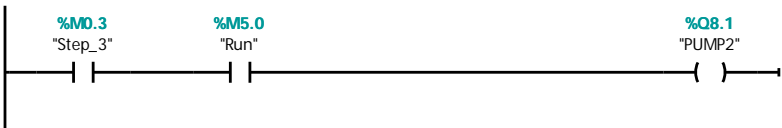
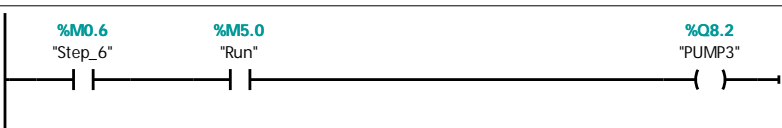
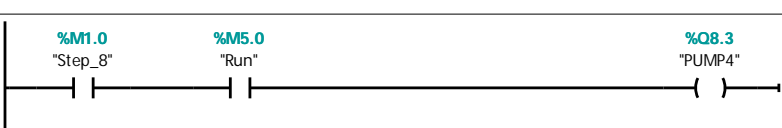
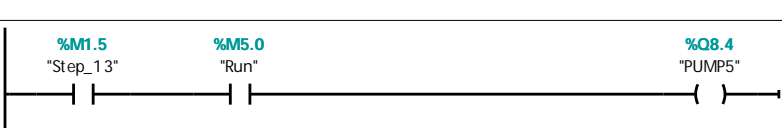
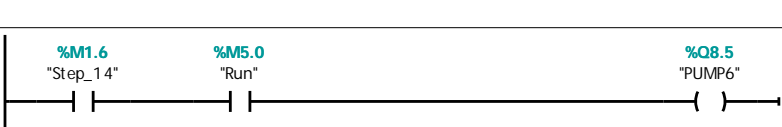


Network 17: Step 15 - Unlatch run

Totally Integrated Automation Portal		
<div><div></div><div><div>%M1.7 "Step_15"</div><div>%M5.0 "Run"</div><div>%M1.7 "Step_15"</div></div><div><div></div><div></div><div></div><div>(R)</div></div></div>		
Network 18: Reset		



Network 19: Pump 1 motor control, on to run Pump 1

Totally Integrated Automation Portal		
		
Network 20: Pump 2 motor control, on to run Pump 2		
		
Network 21: Pump 3 motor control, on to run Pump 3		
		
Network 22: Pump 4 motor control, on to run Pump 4		
		
Network 23: Pump 5 motor control, on to run Pump 5		
		
Network 24: Pump 6 motor control, on to run Pump 6		
		
Network 25: Tank 2 heater control, on to heat tank 2		
Can not turn off		

%M0.5
"Step_5"

%Q8.6
"HEATER"



Network 26: Tank 3 stirrer motor control, on o stir Tank 3 contents

%M1.3
"Step_11"

%Q8.7
"STIRRER"

%M1.4
"Step_12"

