

# 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:

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Problem SP6-8 Hole Drilling Station 1 Control

Additional internal memory:

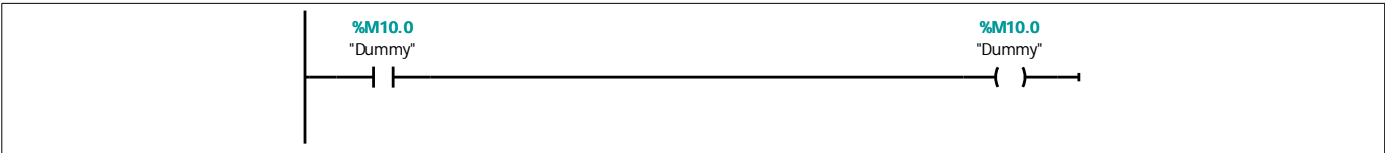
Tag Address

Run M5.0 BOOL On while station running

Int\_Reset M5.1 BOOL Internal reset

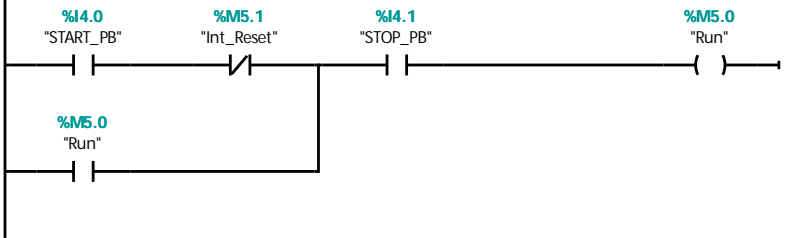
Step\_1 to Step\_6 M0.1 to M0.6 BOOL Step-in-progress bits

Gate\_Tmr DB1 TON\_SFB Gate 1 timer

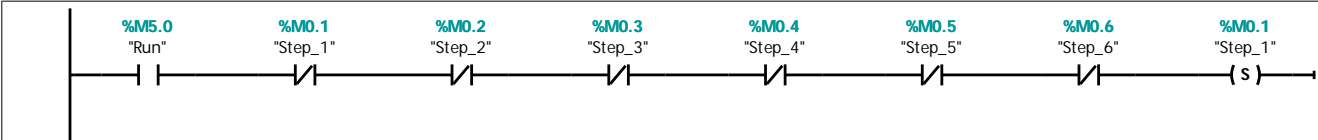


## Network 2: Start/stop

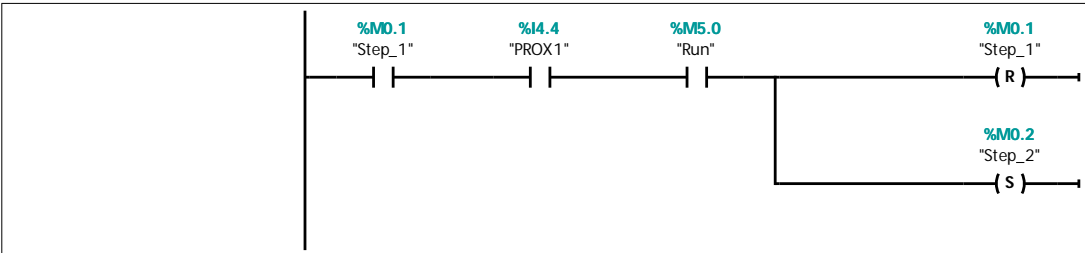
During reset prevent start



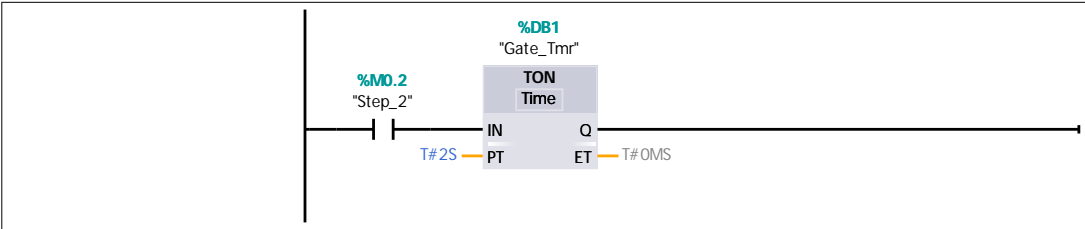
Network 3: Initial start



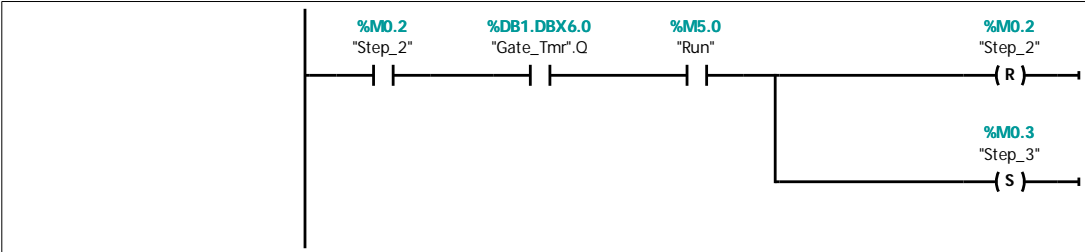
Network 4: Step 1 Wait for part



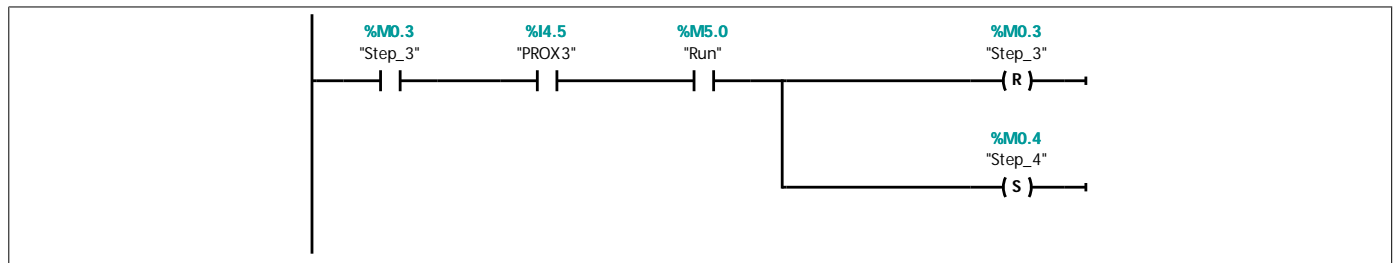
Network 5: Gate 1 open timer



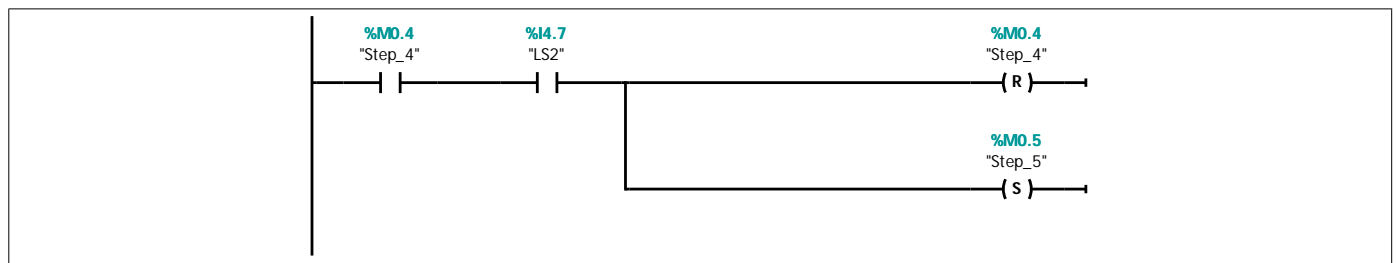
Network 6: Step 2 Open Gate 1



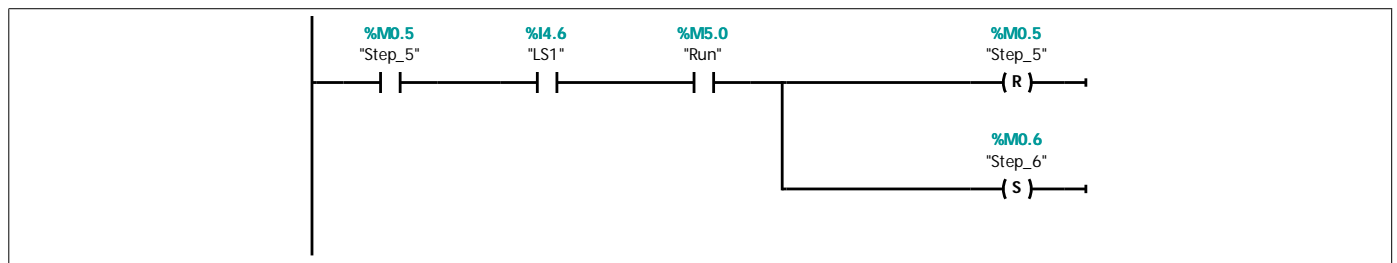
## Network 7: Step 3 Open Gate 2



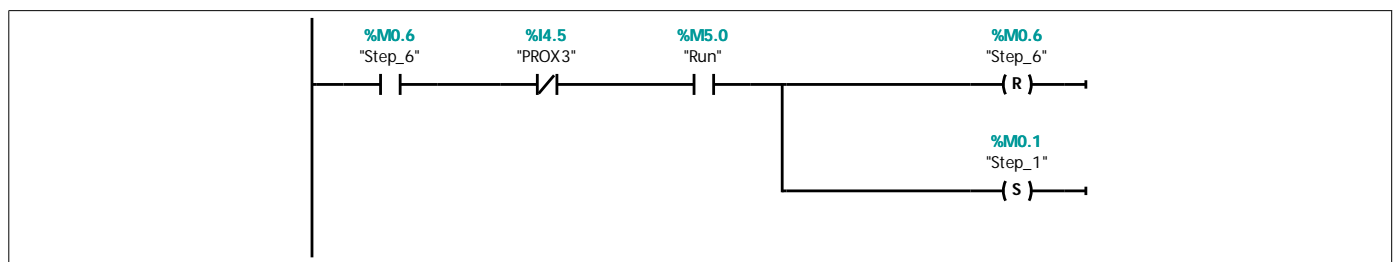
## Network 8: Step 4 Extend drill



## Network 9: Step 5 Retract drill

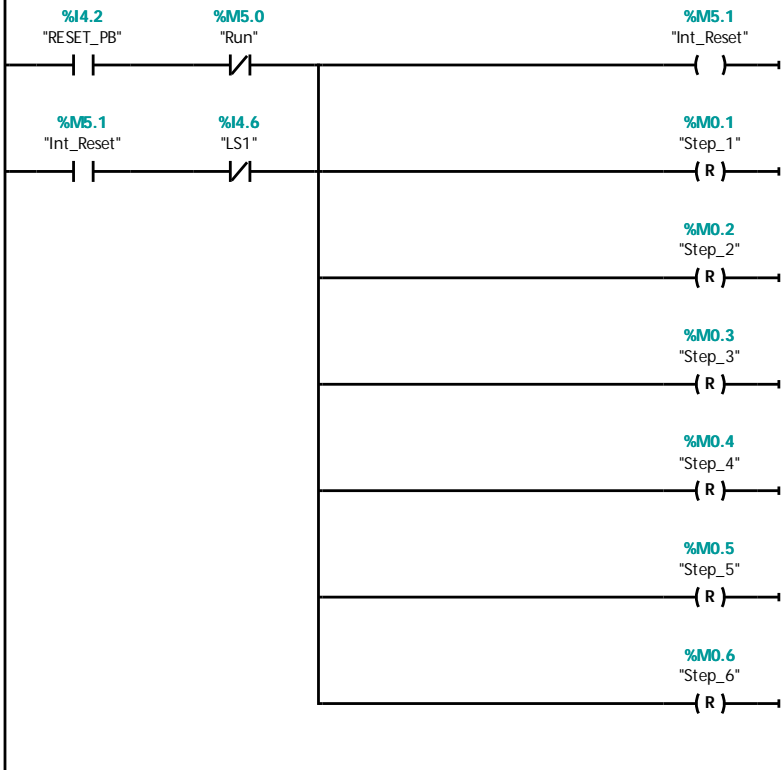


## Network 10: Step 6 Move out part



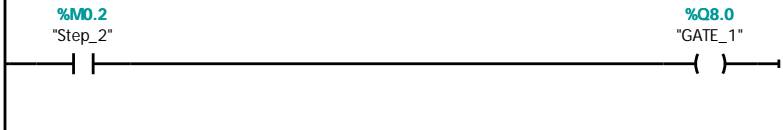
## Network 11: Reset

Keep internal reset on while retracting drill.



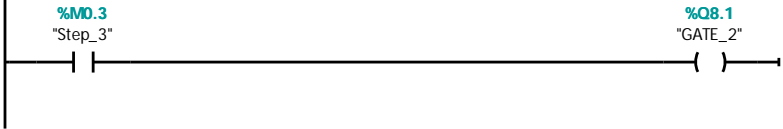
**Network 12: Gate 1 cylinder control, on to open gate 1**

Can not turn off when paused.



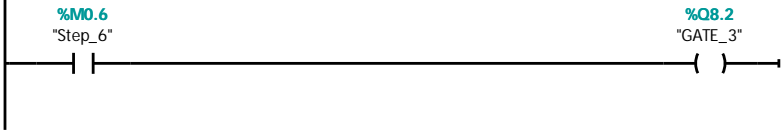
**Network 13: Gate 2 cylinder control, on to open gate 2**

Can not turn off when paused.



**Network 14: Gate 3 cylinder control, on to open gate 3**

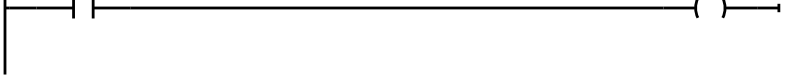
Can not turn off when paused.



**Network 15: Drill extension cylinder control, on to extend drill**

%M0.4  
"Step\_4"

%Q8.3  
"DRILL\_EXTEND"



**Network 16: Drill retraction cylinder control, on to retract drill**

%M0.5  
"Step\_5"

%Q8.4  
"DRILL\_RETRACT"

%M5.1  
"Int\_Reset"



**Network 17: Drill motor control, on to cause drill to rotate**

%M0.4  
"Step\_4"

%Q8.5  
"DRILL\_MOTOR"

%M0.5  
"Step\_5"

%M5.1  
"Int\_Reset"

