

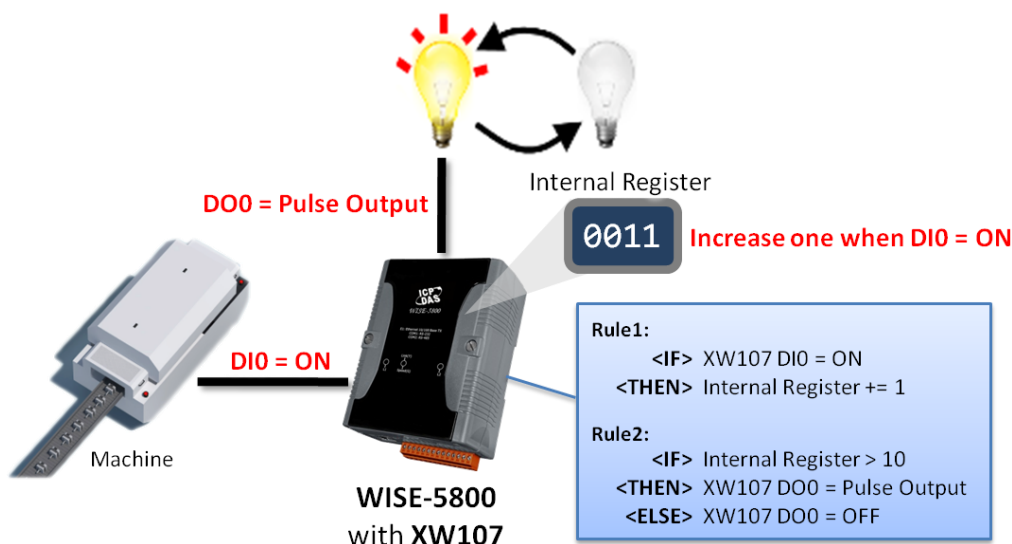
# WISE-580x DO Attribute

## Application Example



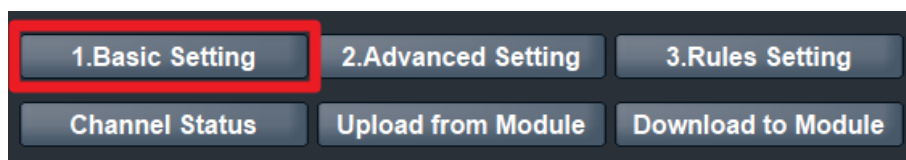
### ● Scenario :

Assume in a product line terminal equips a sensor and a warning light that are connected respectively to the DI channel 0 and DO channel 0 on a WISE-5800 controller (with a XW-Board XW107), when a finished product passes the sensor, the sensor will send out an “ON” signal to the DI channel 0 of the XW107. When the amount of the finished product reached 10, the warning light will start to flash so that the related personnel will be able to perform further process.



### ● Steps :

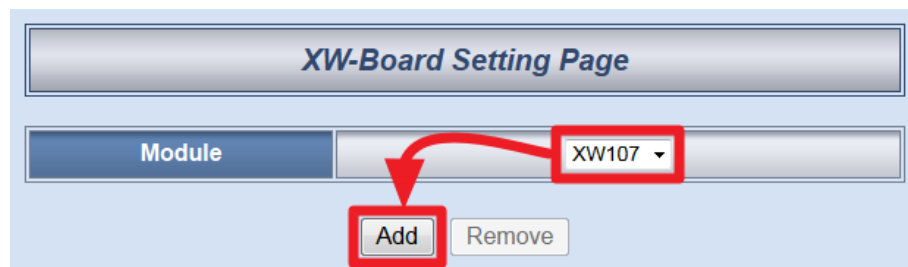
1. Open the WISE WEB page, and get into the “1.Basic Setting” page.



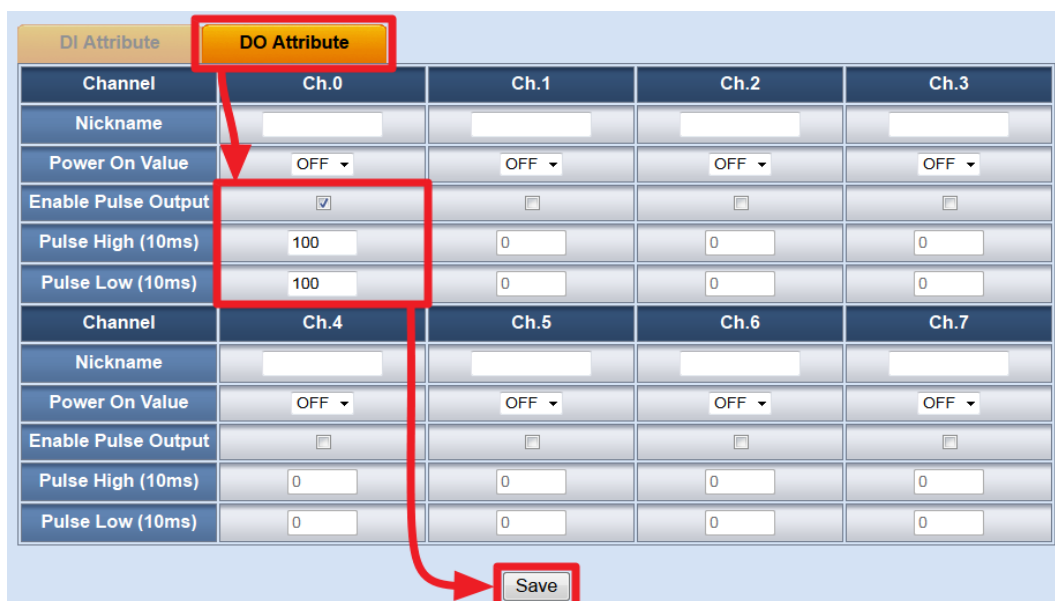
2. After getting into the Basic Setting page, click “XW-Board Setting” to get in the setting page.



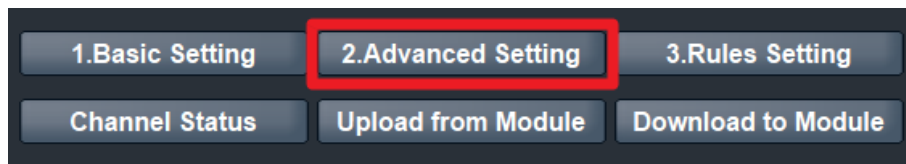
- On the “XW-Board Setting”(on the right side), in the “Module” field, select “XW107’ from the dropdown list, and then click the “Add” button.



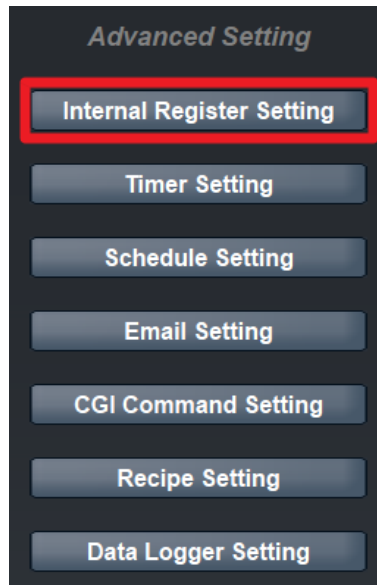
- Get into the “DO Attribute Setting” page, click the “Enable Pulse Output” checkbox, and assign the time period to the “Pulse High” field and “Pulse Low” field (In this case, the time will be the time period of the light ON and OFF time, and will continue this ON/OFF cycle.) Click “Save” button to complete the setting.



5. Click on “2.Advanced Setting” to get into the setting page.



6. On the “Advanced Setting” page, click “Internal Register Setting” to get into the Internal Register Setting page.



7. On the “Internal Register Setting”(on the right side), check the box of “No.01” to enable the No.01 Internal Register and assign its Initial value to be “0” and click “Save” button.

**Internal Register Setting Page**

Enable	<input checked="" type="checkbox"/> No.01	<input type="checkbox"/> No.02	<input type="checkbox"/> No.03	<input type="checkbox"/> No.04	<input type="checkbox"/> No.05	<input type="checkbox"/> No.06
Nickname	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
Initial value	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>
Enable	<input type="checkbox"/> No.07	<input type="checkbox"/> No.08	<input type="checkbox"/> No.09	<input type="checkbox"/> No.10	<input type="checkbox"/> No.11	<input type="checkbox"/> No.12
Nickname	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
Initial value	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>
Enable	<input type="checkbox"/> No.13	<input type="checkbox"/> No.14	<input type="checkbox"/> No.15	<input type="checkbox"/> No.16	<input type="checkbox"/> No.17	<input type="checkbox"/> No.18
Nickname	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
Initial value	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>
Enable	<input type="checkbox"/> No.19	<input type="checkbox"/> No.20	<input type="checkbox"/> No.21	<input type="checkbox"/> No.22	<input type="checkbox"/> No.23	<input type="checkbox"/> No.24
Nickname	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
Initial value	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>
Enable	<input type="checkbox"/> No.25	<input type="checkbox"/> No.26	<input type="checkbox"/> No.27	<input type="checkbox"/> No.28	<input type="checkbox"/> No.29	<input type="checkbox"/> No.30
Nickname	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
Initial value	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>
Enable	<input type="checkbox"/> No.31	<input type="checkbox"/> No.32	<input type="checkbox"/> No.33	<input type="checkbox"/> No.34	<input type="checkbox"/> No.35	<input type="checkbox"/> No.36
Nickname	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
Initial value	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>
Enable	<input type="checkbox"/> No.37	<input type="checkbox"/> No.38	<input type="checkbox"/> No.39	<input type="checkbox"/> No.40	<input type="checkbox"/> No.41	<input type="checkbox"/> No.42
Nickname	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
Initial value	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>
Enable	<input type="checkbox"/> No.43	<input type="checkbox"/> No.44	<input type="checkbox"/> No.45	<input type="checkbox"/> No.46	<input type="checkbox"/> No.47	<input type="checkbox"/> No.48
Nickname	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
Initial value	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0"/>

**Save**

8. Click on “3.Rules Setting” page to get into the Rule Setting WEB page.

<b>1.Basic Setting</b>	<b>2.Advanced Setting</b>	<b>3.Rules Setting</b>
Channel Status	Upload from Module	Download to Module

9. Check the “Rule 1” checkbox to enable “Rule 1”, then click “Rule 1” “Edit” button for “Rule 1” editing.



10. On the “Rule1 Setting Page”(on the right side), select “DI” as IF Condition for “Rule 1”, and then click on the right side button to get into the “DI Condition Setting” page to edit detailed information.

Rule1 Setting Page			
Description			
IF		THEN	ELSE
Condition1	None	Action1	Action1
Condition2	DI	Action2	Action2
Condition3	None	Action3	Action3
Operator	None		

Clear Save

11. In the “Module & Channel” section, select “XW107” and channel “0” from the dropdown list. In the “Channel Value” field, select “ON” from the dropdown list. Click “Save” button to save the settings and return to Rules 1 Setting Page.

DI Condition Setting

Module & Channel: XW107 Channel 0

Channel Value: ON

Save

12. In the “THEN” section, in the “Action1” field, select “Internal Register” from the dropdown list; and then click on the right side button to get into the “Internal Register Action Setting” page to edit detailed information.

**Rule1 Setting Page**

Description

IF		THEN		ELSE	
Condition1	DI	Action1	None	Action1	None
Condition2	None	Action2	None	Action2	None
Condition3	None	Action3	None	Action3	None
Operator	None				

13. In the "Index" field, select "1" and in the "Operator" field, select "+=" and in the "Value" field, select "Assign Value as" and input "1". Click "Save" button to save the settings and get back to the "Rule1 Setting Page".

**Internal Register Action Setting**

Index	Operator	Value
1	+=	Assign Value as 1

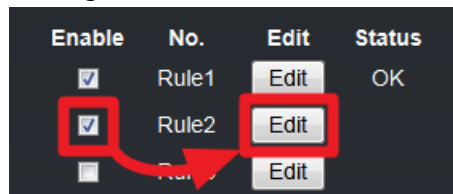
14. Make sure all Rule 1 settings are accurate, click "Save" button to save the settings.

**Rule1 Setting Page**

Description

IF		THEN		ELSE	
Condition1	DI	Action1	Internal Register One Time Repeat	Action1	None
Condition2	None	Action2	None	Action2	None
Condition3	None	Action3	None	Action3	None
Operator	None				

15. Check the “Rule 2” checkbox to enable “Rule 2”, then click “Rule 2” “Edit” button for “Rule 2” editing.



16. On the “Rule2 Setting Page”(on the right side), select “Internal Register” as IF Condition for “Rule 2”, and then click on the right side button to get into the “Internal Register Condition Setting” page to edit detailed information.

**Rule2 Setting Page**

Description:

IF		THEN	ELSE	
Condition1	None	Action1	Action1	None
Condition2	None	Action2	Action2	None
Condition3	None	Action3	Action3	None
Operator	None			

Clear Save

17. In the “Index” field, select “1” and in the “Operator” field, select “>” and in the “Value” field, select “Assign Value as” and input “10”. Click “Save” button to save the settings and get back to the “Rule2 Setting Page”.

**Internal Register Condition Setting**

Index	Operator	Value
1	>	Assign Value as 10

Save

18. In the “THEN” section, in the “Action1” field, select “DO” from the dropdown list; click the button next to the “Action 1” field as indicated to get into the “DO Action Setting” page.

**Rule2 Setting Page**

Description

IF		THEN		ELSE	
Condition1	Internal Register	Action1	None	Action1	None
Condition2	None	Action2	DO	Action2	None
Condition3	None	Action3	Internal Register	Action3	None
Operator	None				

19. In the “Module & Channel” section, select “XW107” and channel “0” from the dropdown list. In the “Channel Value” field, select “Pulse Output” from the dropdown list. Click “Save” button to save the settings and return to Rules 2 Setting Page.

**DO Action Setting**

Module & Channel

Channel Value

20. In the “ELSE” section, in the “Action1” field, select “DO” from the dropdown list; click the button next to the “Action 1” field as indicated to get into the “DO Action Setting” page.

**Rule2 Setting Page**

Description

IF		THEN		ELSE	
Condition1	Internal Register	Action1	DO One Time Repeat	Action1	None
Condition2	None	Action2	None	Action2	DO
Condition3	None	Action3	None	Action3	Internal Register
Operator	None				Rule Status



21. In the “Module & Channel” section, select “XW107” and channel “0” from the dropdown list. In the “Channel Value” field, select “OFF” from the dropdown list. Click “Save” button to save the settings and return to Rules 2 Setting Page.

**DO Action Setting**

Module & Channel: XW107 Channel 0

Channel Value: OFF

Save

22. Make sure all Rule 2 settings are accurate, click “Save” button to save the settings.

**Rule2 Setting Page**

Description:

IF		THEN		ELSE	
Condition1	Internal Register	Action1	DO One Time Repeat	Action1	DO One Time Repeat
Condition2	None	Action2	None	Action2	None
Condition3	None	Action3	None	Action3	None
Operator	None				

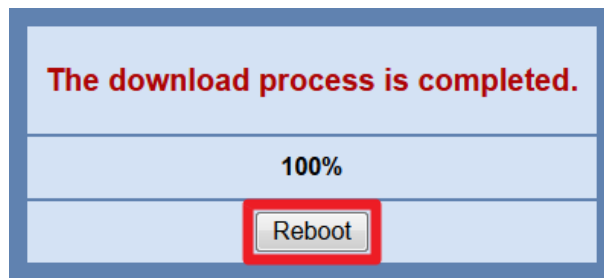
Clear Save

23. After finish the rule editing, click the “Download to Module” button and input the password.

1.Basic Setting 2.Advanced Setting 3.Rules Setting

Channel Status Upload from Module Download to Module

24. After the download process is completed, click “Reboot” button to make the new updated settings take effect.



- **Rule Overview :**

**Rule Overview**

**Rule1(Enable)**  
Description:  
< IF >  
    XW107 DI0 = ON  
< THEN >  
    Internal Register 1 += 1 (One Time)

**Rule2(Enable)**  
Description:  
< IF >  
    Internal Register 1 > 10  
< THEN >  
    XW107 DO0 = Pulse Output (One Time)  
< ELSE >  
    XW107 DO0 = OFF (One Time)