

ANC-100e Wonderware FSGateway (now known as OIGateway), Ethernet/IP to Data Highway Plus Application Note

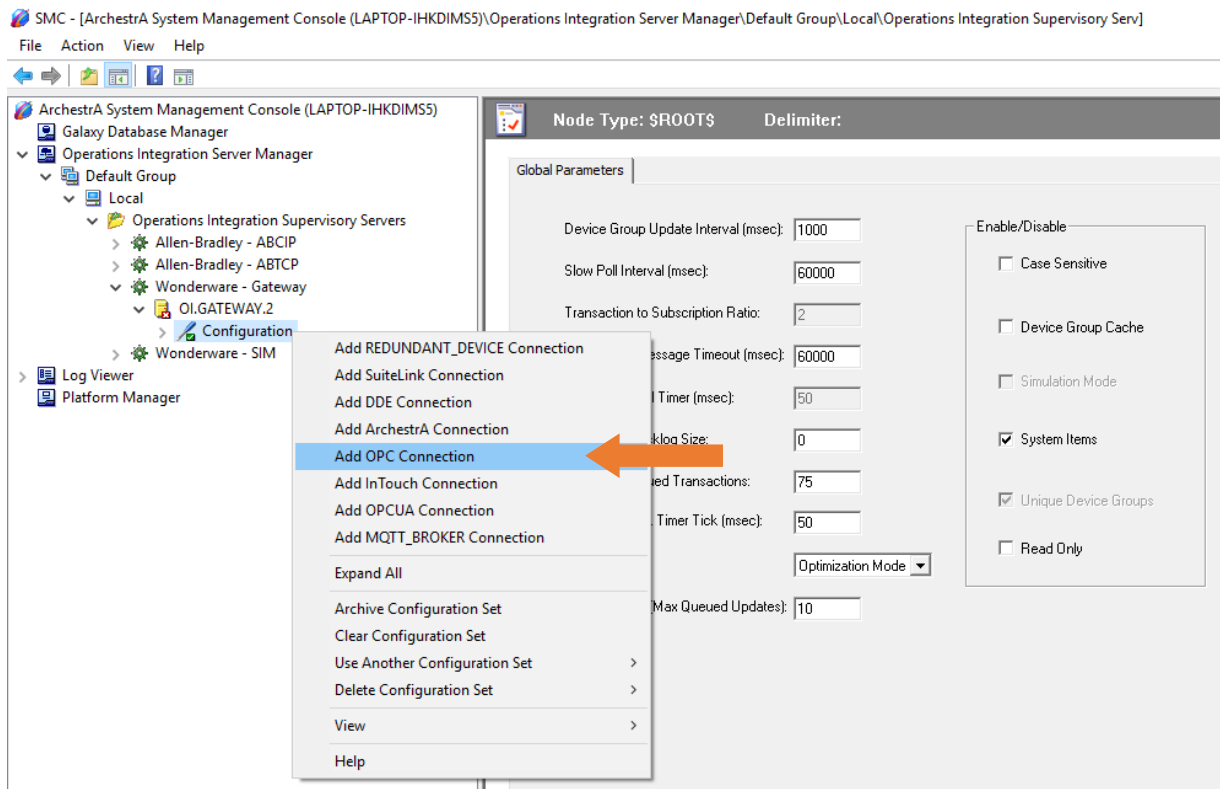
SMC User Setup

This document provides information on how to setup the Automation Networks ANC-100e/ANC-120e with a PC running Wonderware OIGateway on Ethernet/IP for communications to a SLC5/04 on AB's DH+.

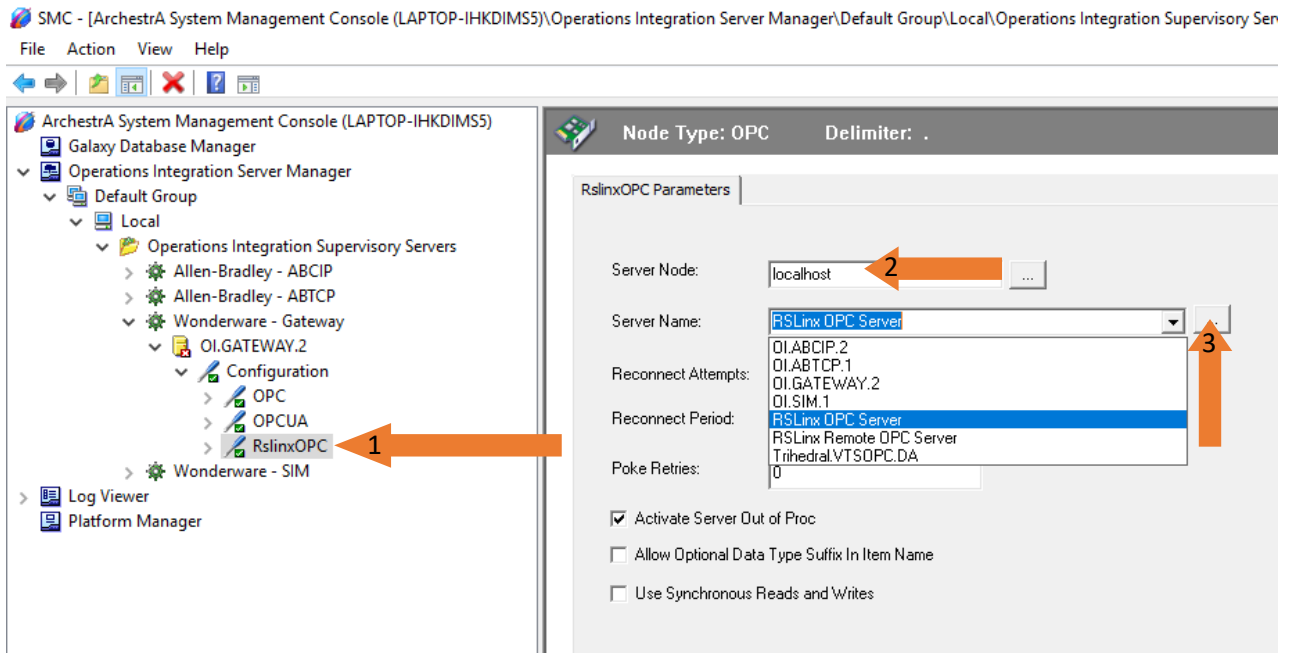
The ANC-100e will communicate with many devices that are DH+ nodes which include AB Panelviews, SLC 5/04s, and PLC-5s etc.

- ❖ *Note: Before proceeding, make sure*
 - *Network adapter is correctly configured to access ANC-100e/ANC-120e*
 - *ANC-100/120e is connected to the PC or Ethernet network and DH+ network.*
 - *Install and configure RSLinx (OEM version minimum, Professional or higher recommended) so that it communicates with the PLC. RSLinx needs to have at least one topic defined.*
 - *Install the latest version of the FSGateway or OIGateway. If a previous version was installed, be sure to uninstall it using Control Panel - Add/Remove Programs. To check the version number of the server, use Control Panel - Add/Remove Programs - select Wonderware ABCIP DAServer, then click Support Information.*

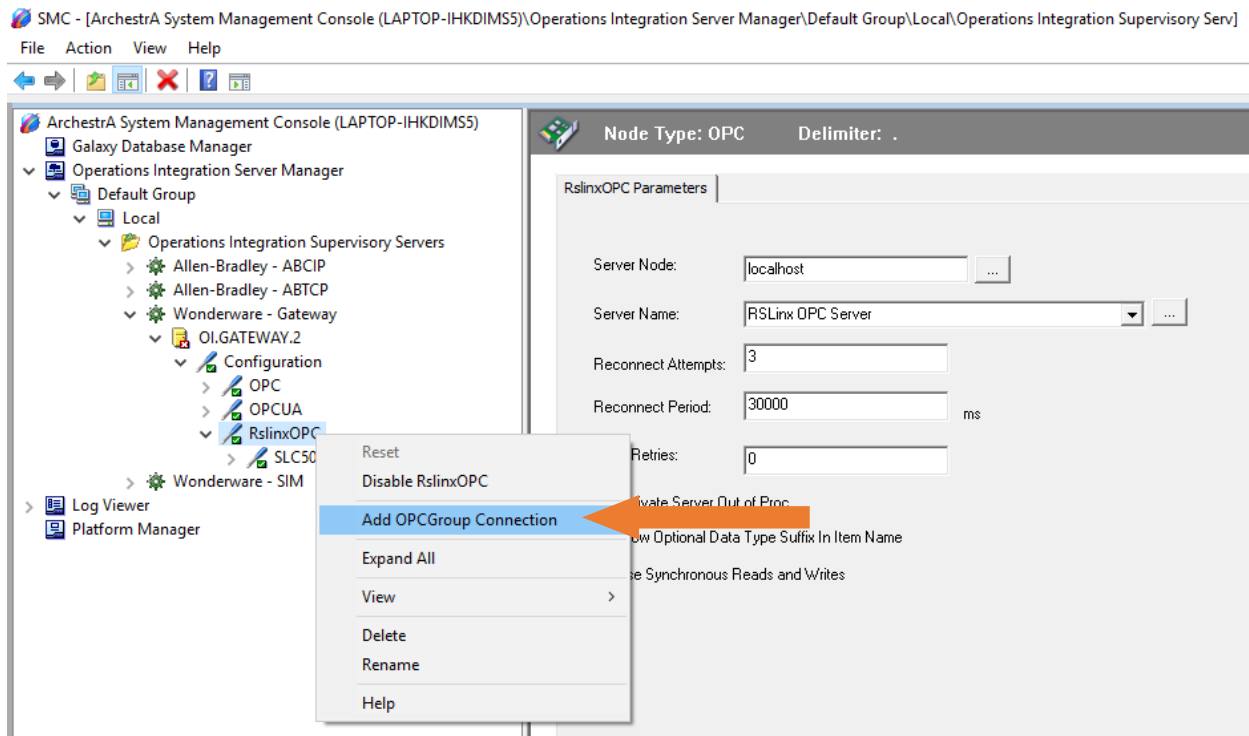
1. Open System Management Console
2. Select Start/Programs/Wonderware/System Management Console to launch the System Management Console (SMC).
3. From the System Management Console, navigate in the OI Server Manager (Operation Integrations Server Manager) to Operations Integration Supervisory Servers to Wonderware Gateway.
4. Expand the OI.Gateway.2 icon.
5. Click on Configuration object. The Global Parameters dialog box will appear on the right pane of the window.
6. Right click the Configuration object and select Add OPC Connection.



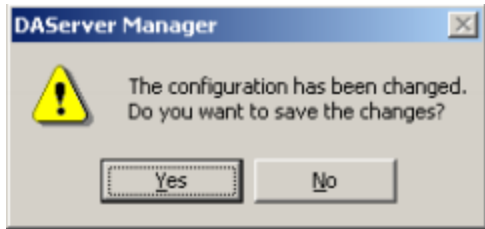
7. A new default New_OPC_000 object is added to the hierarchy tree.
8. Right click New_OPC_000 and select Rename to change it to a meaningful name such as RSLinxOPC.
9. Accept the default Server Node name of localhost (On the OPC Parameters window RSLinxOPC Parameters area, which indicates that RSLinx is running on the same computer with OIGateway).
10. Click on the browse button to browse the OPC server, then select the RSLinx OPC Server.



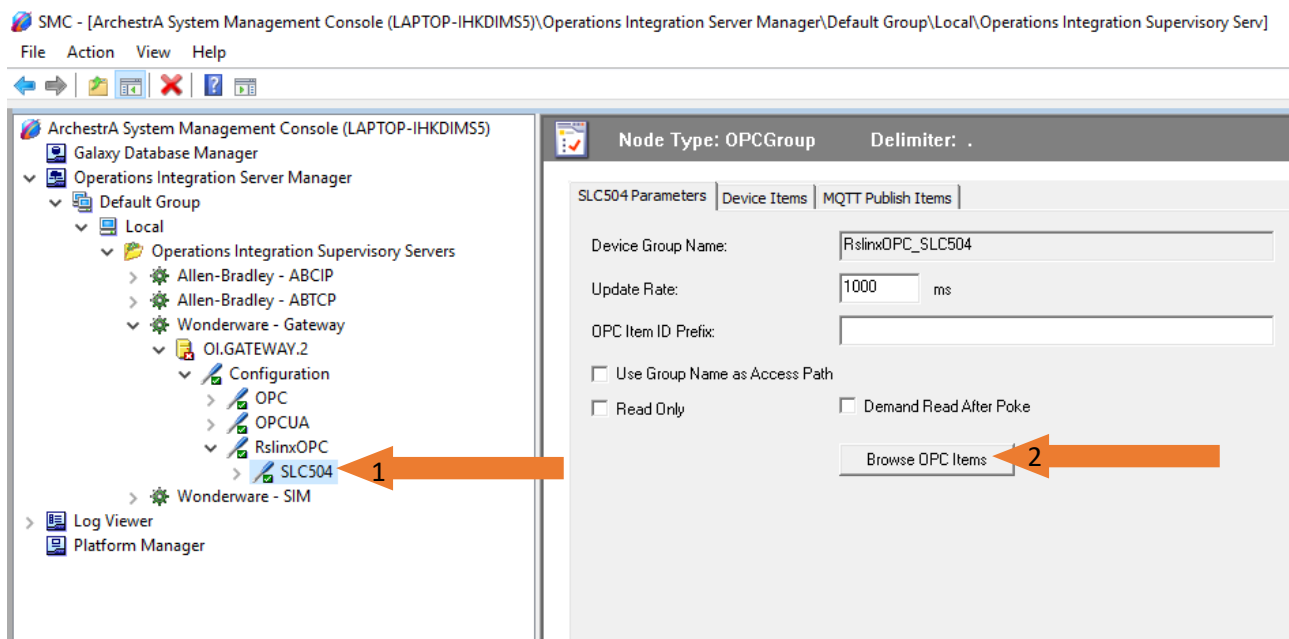
- 11. Right-click RSLinxOPC to add a new OPC group object New_OPC_Group_000.
After every change, if you haven't saved the configuration, you will be prompted to save it.



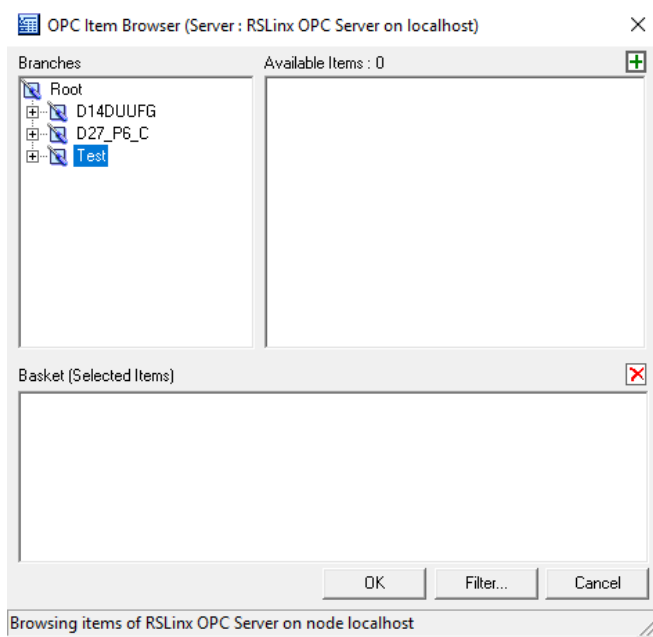
12. Click Yes to save the changes:



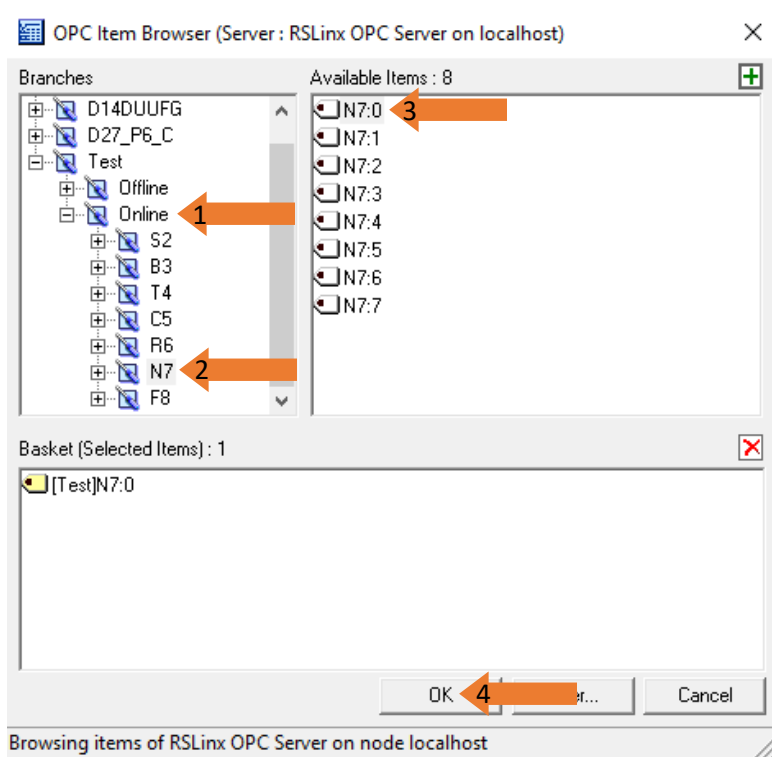
13. Rename the default New_OPC_Group_000 to a meaningful name such as SLC504
14. Click the Browse OPC items button.



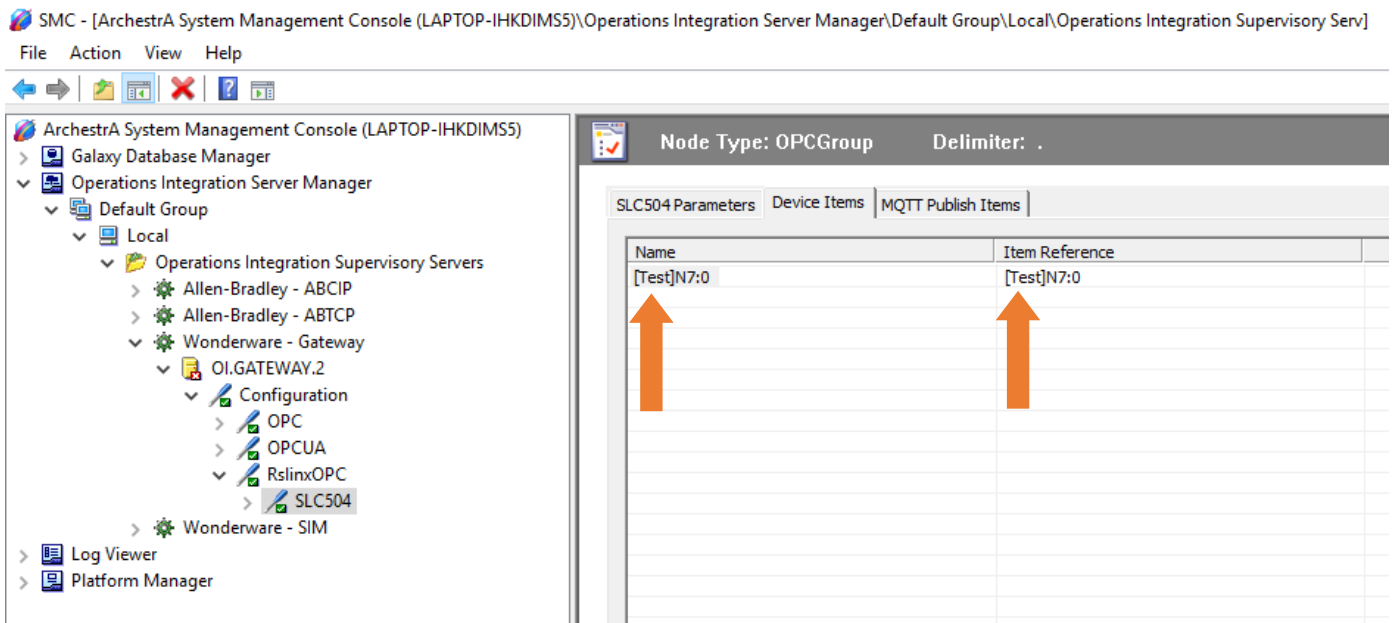
15. In our case we made the topic: Test in Rslinx. Select and expand the topic (Test) defined in RSLinx.



16. Expand the Online folder and select items in the PLC. In our case we selected the tag N7:0 and clicked OK to return to the OPC Group Parameters tab field

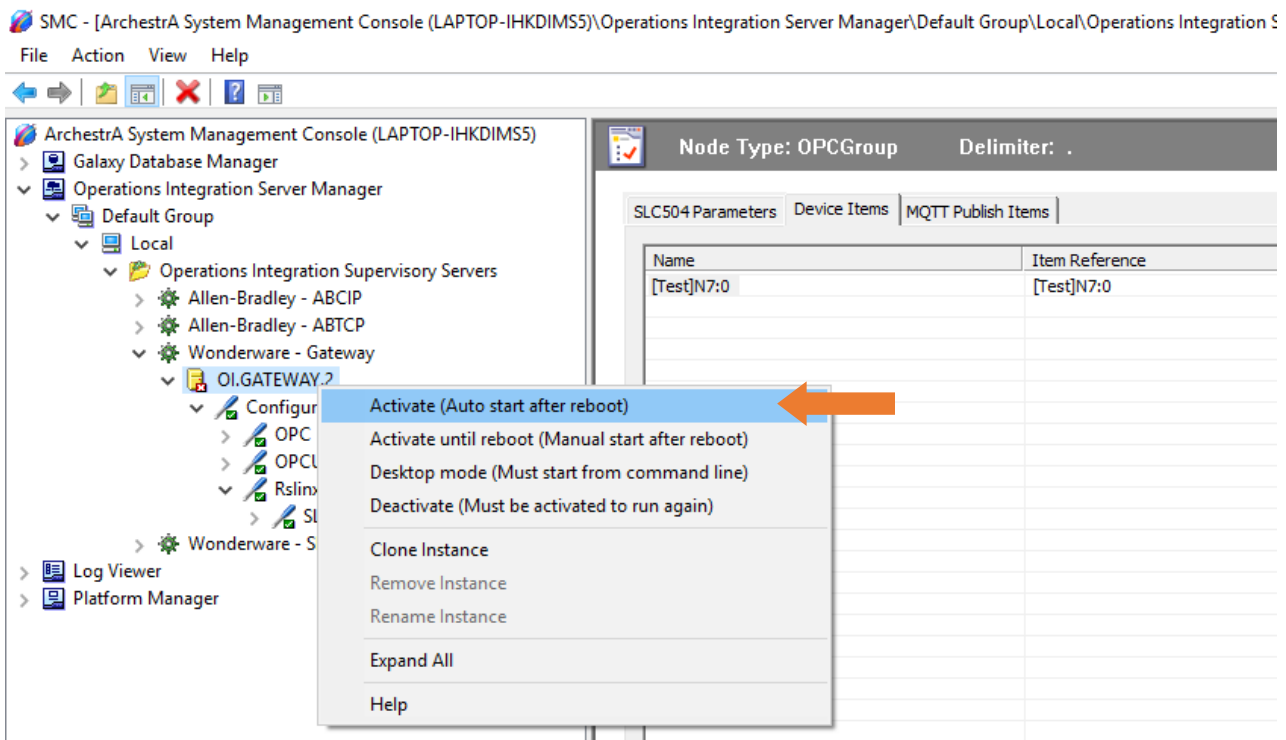


17. Select the Device Item tab to display all the items we just added.



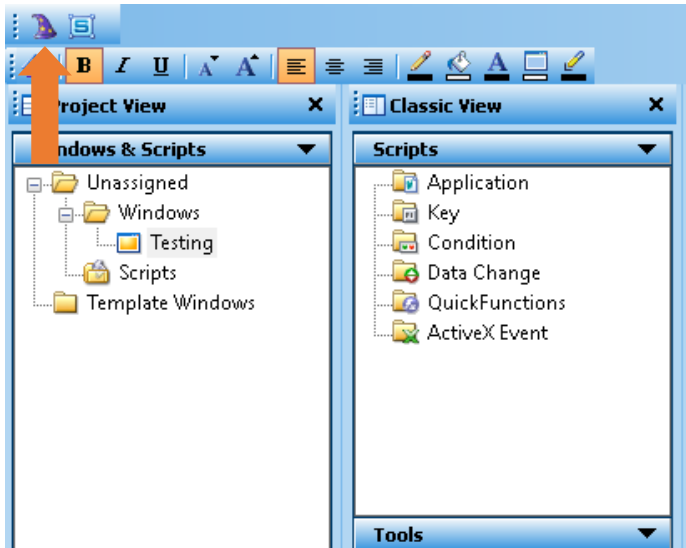
The Device Items table includes two columns: Name and Item Reference. This is where aliases are assigned for each item reference.

18. The OIGateway is now ready for use. In order to use it, you must activate it. Right-click OIGateway.2 and click on Activate Server on the shortcut menu.

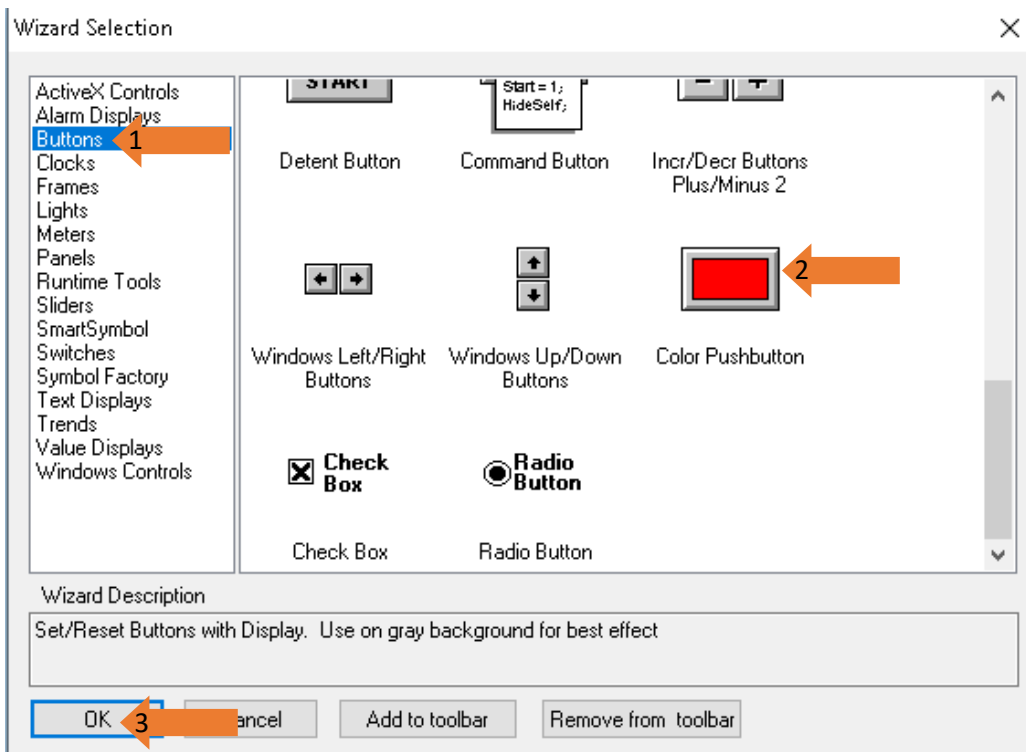


19. Now we are going to test the connection to the PLC by making an example of a TAG in the PLC

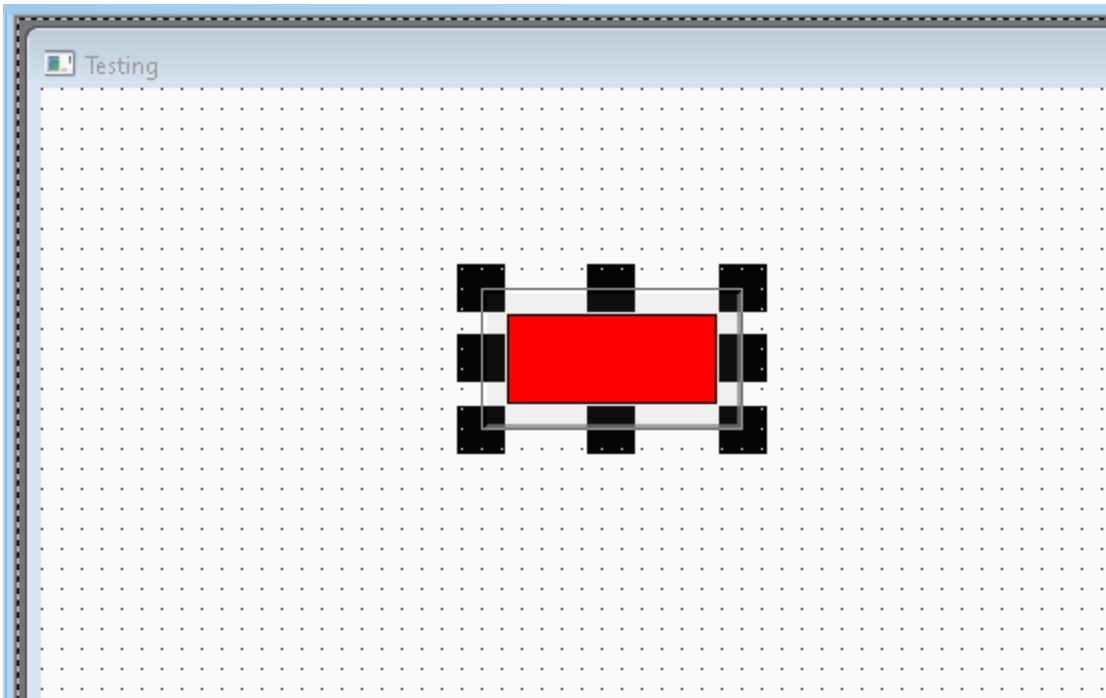
20. Inside Intouch 2017, go to the **Wizards...** button and click on it.



21. Inside the wizard we are going to select a button.

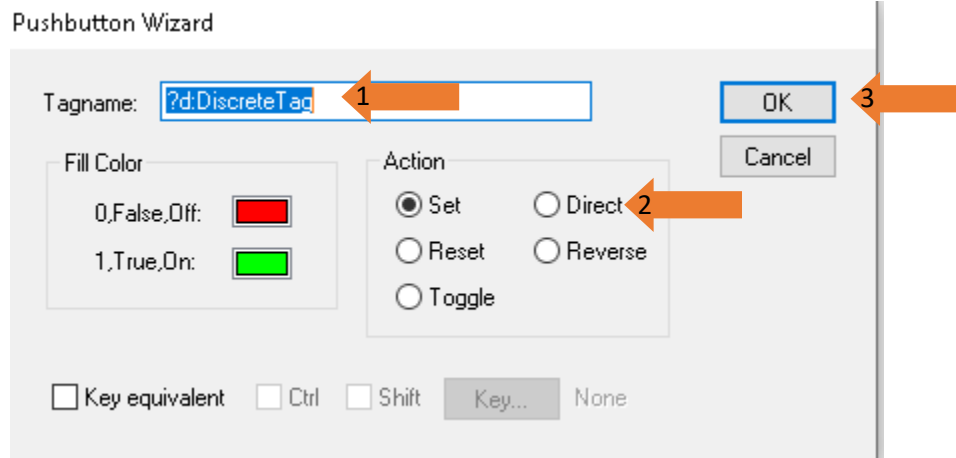


22. Resize your button and double left click on it.

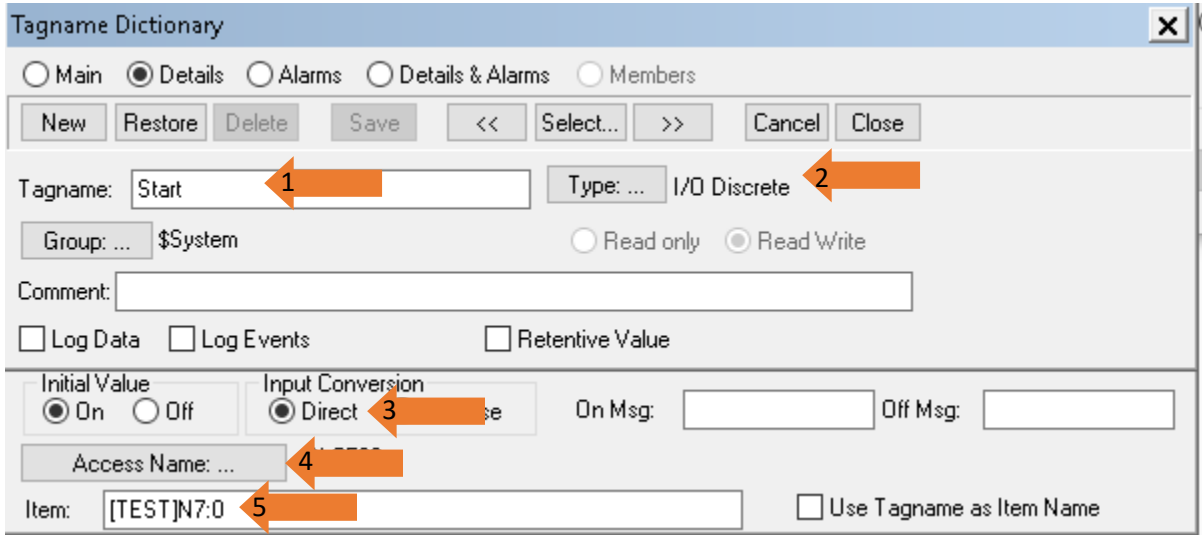


23.

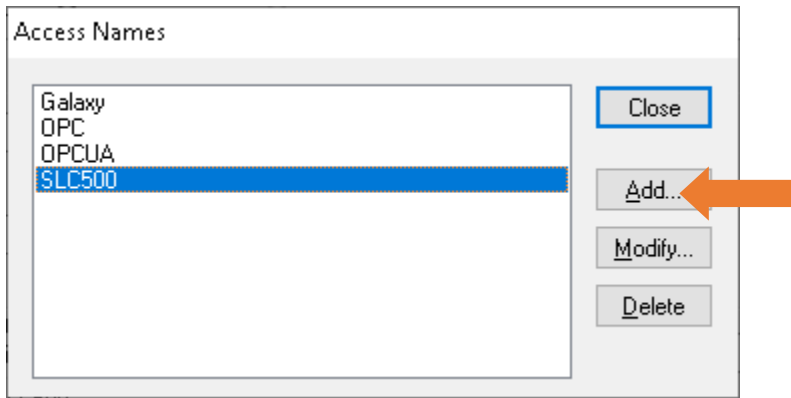
24. Next, a configuration window will appear. Select Tagname name: In our case we choose Start and in Action we choose, Direct.



25. Once we setup the name and other options, double left clicks in the Tagname field, this will open the Tagname Dictionary. Here you will change the Type... to I/O Discrete (this is important when you are pulling data from the outside), the Input Conversion to Direct, the Access Name and the Item.



26. When you click the Access Name button this will launch a new window. Click in the Add button.



27. Here you will select and modify:

Add Access Name

Access Name:

Node Name:

Application Name:

Topic Name:

Which protocol to use

DDE SuiteLink Message Exchange

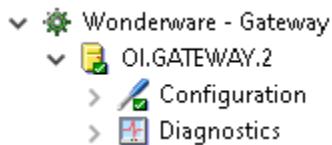
When to advise server

Advise all items Advise only active items

Enable Secondary Source

OK Cancel Failover

- A) Access Name: A name for the Access Name
- B) Node Name: From where you are pulling the information. If you are pulling it from the same machine you are working on, then you can leave it blank or use localhost.
- C) Application Name: Here it goes the name of the application you established in Wonderware, but instead of using the whole name OI.GATEWAY.2, you only use the word contained inside the two dots. In this case GATEWAY.



- D) Topic Name: It is the name of the OPC Object plus the name of the group: RslinxOPC_SLC504 in other words the Device Group Name.

Node Type: OPCGroup Delimiter: .

SLC504 Parameters | Device Items | MQTT Publish Items

Device Group Name:

Update Rate: ms

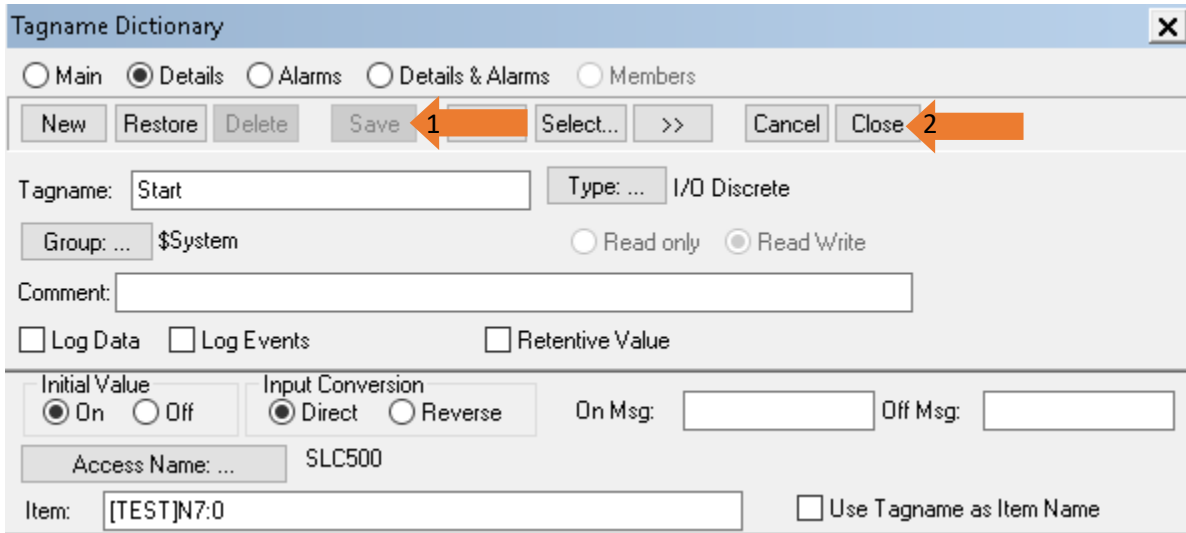
OPC Item ID Prefix:

Use Group Name as Access Path

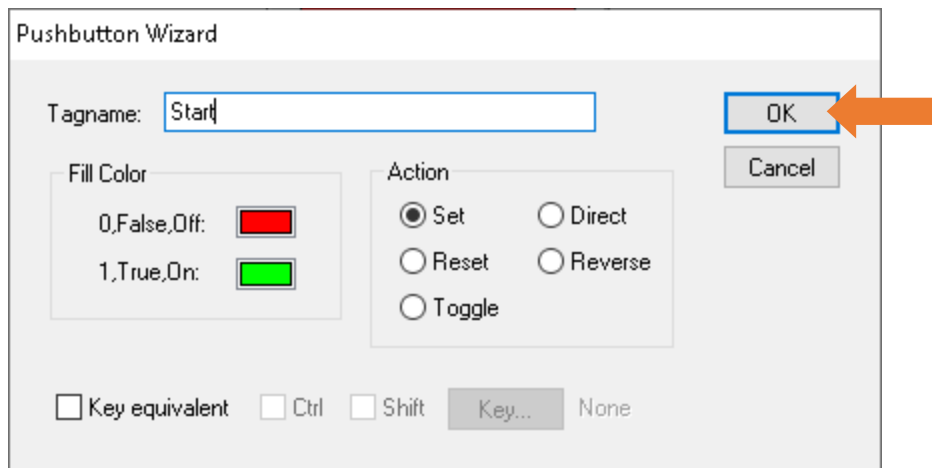
Read Only Demand Read After Poke

Browse OPC Items

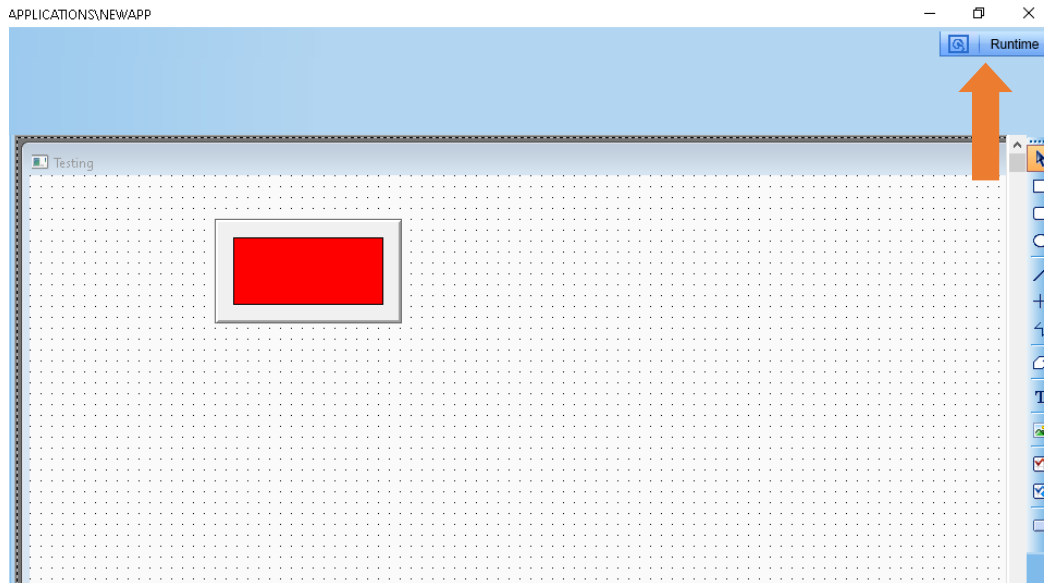
30. Now we Save our changes and close the Tagname dictionary.



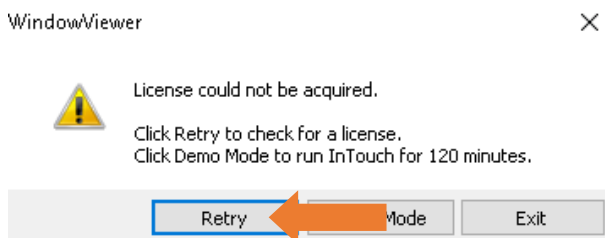
31. Now you should close the Pushbutton Wizard. Clicking on OK.



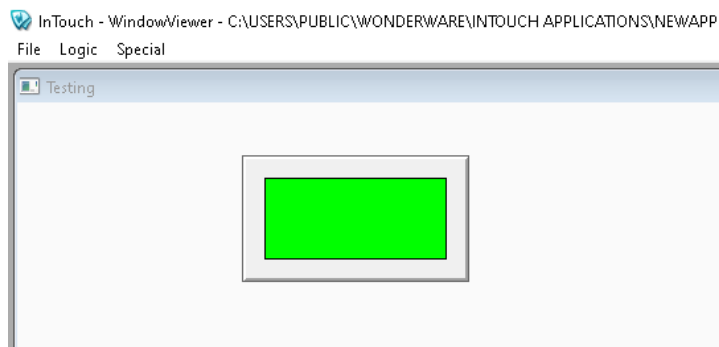
32. Now we will Run the application using the Runtime button:



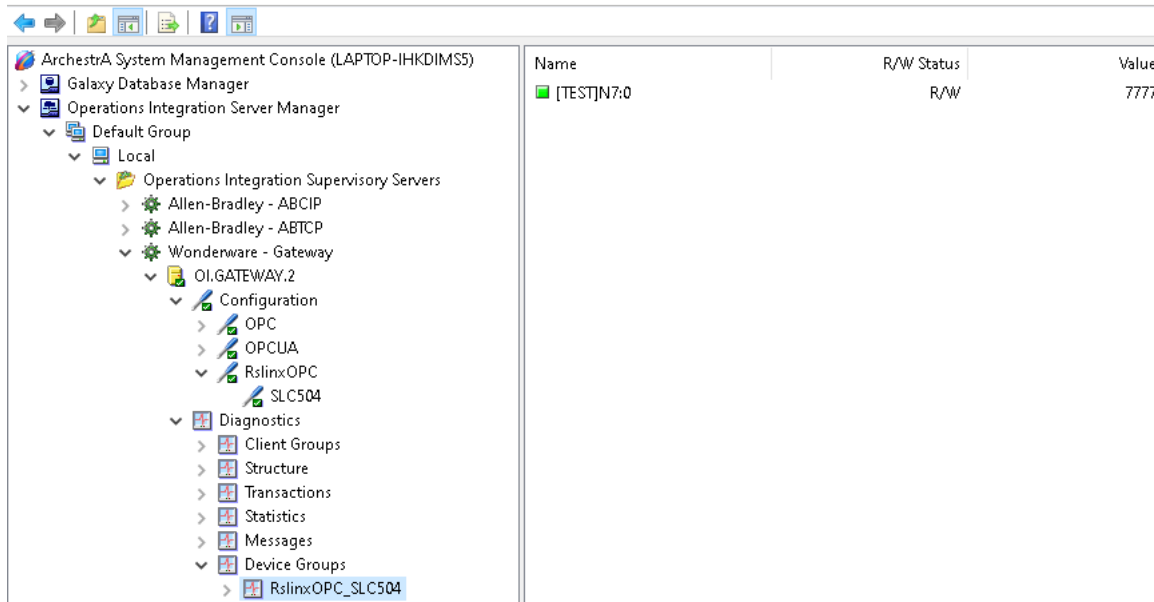
33. If you do not have a license for the Intouch software, you can still work with the application by choosing Demo.



34. This is our application button running.



35. While our application is running, we can go back to SMC and check inside Diagnostics and then to Device Groups and then check the Device Group Name. There you will see the status of your communication.



36. Our data file N7:0 has a value of 7777. So, this means the connection is successful.