## Using OPC90 with Wonderware ArchestrA and FSGateway

In order to have OPC90 and Wonderware ArchestrA to communicate reliably over a network you will need to have FS Gateway running on the OPC90 computer. Wonderware will connect to FSGateway using a SuiteLink DDE object to collect the OPC data from OPC90. This allows for a more robust redundancy setup.

## Add OPC90 connection in FSGateway

In the ArchestrA System Management Console, FS Gateway should be present under DA Server Manager > Default group > Local.

In order to add the OPC90 server, start OPC90 server and have it running in the background (typically OPC90 is setup to start as a service).

In the ArchestrA system management console right click on 'Configuration' under DA Server Manager > Default group > Local > ArchestrA.FSGateway.1 and select "Add OPC Object".

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Adds a OPC Object under this	hierarchy level		

Server node should be set to local host. Under "Server Name" browse to "Rovisys.OPC90server.1".

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Right click on: DA Server Manager > Default group > Local > ArchestrA.FSGateway.1 > Configuration > New\_OPC\_000 and click "add OPCGroup object".

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Adds a OPCGroup Object unde	er this hierarchy level	<u>ا</u>	

Click the "Browse OPC Items". You should see the devices in your OPC90 server. It is possible to add tags via drag-and-drop, but it is also possible to directly access the tags from ArchestrA by including the OPC90 path in the ArchestrA object.

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## Add FSGateway connection in ArchestrA

This is a fairly straightforward process. Begin by opening ArchestrA IDE and connecting to a GR Node. Create a new instance of Suite Link Client.

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Drag the new instance into an engine.

In the new Client, use the server node where FS Gateway is running. For server name use "FSGateway".

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Server name:	FSGateway	- C ()
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Priority:		62
Communication protocol:	SuiteLink	] f

Under the topic tab add a new topic. For the topic name use the Device Group Name. Device Group Name can be found in the ArchestrA System Management Console under:

DA Server Manager > Default group > Local > ArchestrA.FSGateway.1 > Configuration > New\_OPC\_000 > New\_OPC\_Group\_000

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Save, Close and Check. Deploy the Galaxy. Leave settings as default.

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Now go to the template toolbox and create a new instance of Analog Input



Move the instance into a suitable area.

To configure the Analog Input select the I/O tab and add a PV input source.

This follows the format of:

"Suite Link Client"."Device Group Name"."OPC device"."OPC Group"."OPC Block"."OPC Object"

For example:

DDESuiteLinkClient\_001.New\_OPC\_000\_New\_OPCGroup\_000.Device1.Test\_G roup.Test\_AIL.OUT

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Save, Close and Check. Deploy in Galaxy. View in Object Viewer.

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In the Object Viewer move the PV value into the Viewing Window via Drag-and-Drop or by using a string in the Attribute Reference bar. ("aAnalogInput\_001.PV.Value" by default)

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File Edit View Options Help				
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DTChiller_test [DTChi	MyContainedObjects		<default></default>	8/11/2
DTCompressor_Test	MyContainers		aAnalogInput_001	8/11/2
DTContainer_Test [D	MyDiscreteFieldAttributes		<default></default>	8/11/2
DTFMP Test [DTFMP	MyHistorizedAttributes		<derault></derault>	8/11/2
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