

AutoCAD Electrical 2016 - Peer to Peer Cross Referencing

Many customers are not only responsible for producing the electrical drawings but also the instrument or pneumatic drawings as well. A job may have a mixed discipline design and could include pneumatic and electrical schematics.

In this type of situation, a component may be drawn in the pneumatic drawing such as a valve and have an associated solenoid defined in the electrical schematic. These types of components would be defined as “parent” devices. However because there is an international convention for numbering pneumatics and hydraulics (ISO1219 as an example), the component in the pneumatic circuit would have an entirely different component tag to the one in the schematic.

A valve in a pneumatic drawing may be numbered with a prefix of VAL

In the electrical schematic a solenoid being a coil may be numbered with a prefix of K

Therefore, though each device is represented as a parent device, you can still set up a peer-to-peer relationship between them so that the electrical schematic’s tag name will automatically cross-reference to the pneumatics’ drawing and the pneumatics’ tag cross-reference to the electrical schematics drawing.

To set this up:

Right click over the current activated project in the project manager and select *Properties*

Select the *Cross References* tab

Peer to Peer (example: Schematic -> Pneumatic)

Select the *Project Settings* tab

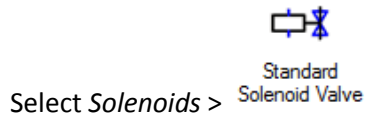
Ensure that you have included a pneumatic or hydraulic library as one of the libraries associated with the project

Select

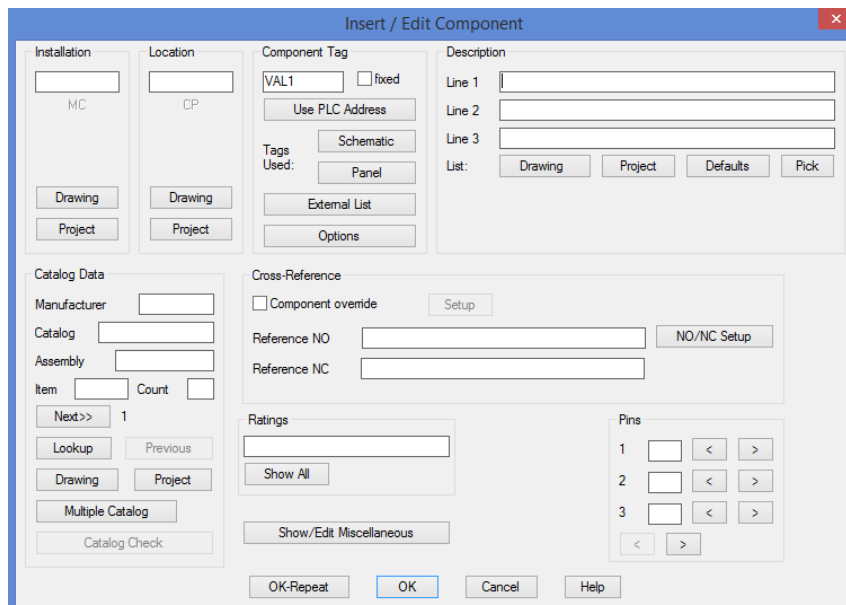
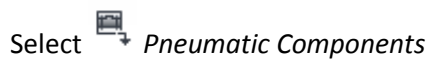
To draw this:



As an example, place the following down in an active drawing:



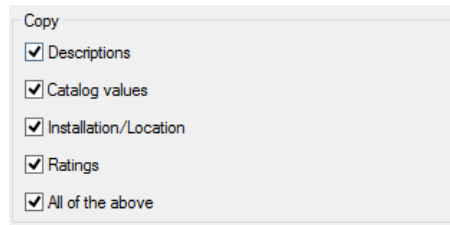
Select **Schematic** ribbon tab > **Insert Components** panel > ↓



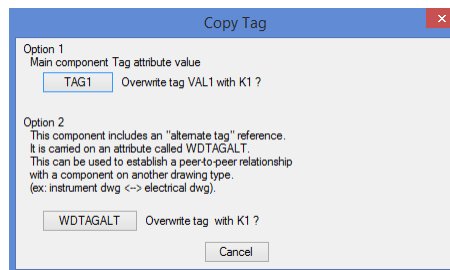
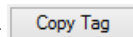
Select **Tags Used:** **Schematic**

Ensure **Show all components for all families** is selected

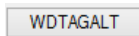
Ensure that you are copying all fields applicable

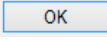


Highlight the associated device e.g. K1 and select



As we want 2 different numbering systems for the devices, select



Select  to close the Edit Component dialogue

The valve will now be referencing the solenoid and vice-versa whilst maintaining their own unique component tag.

