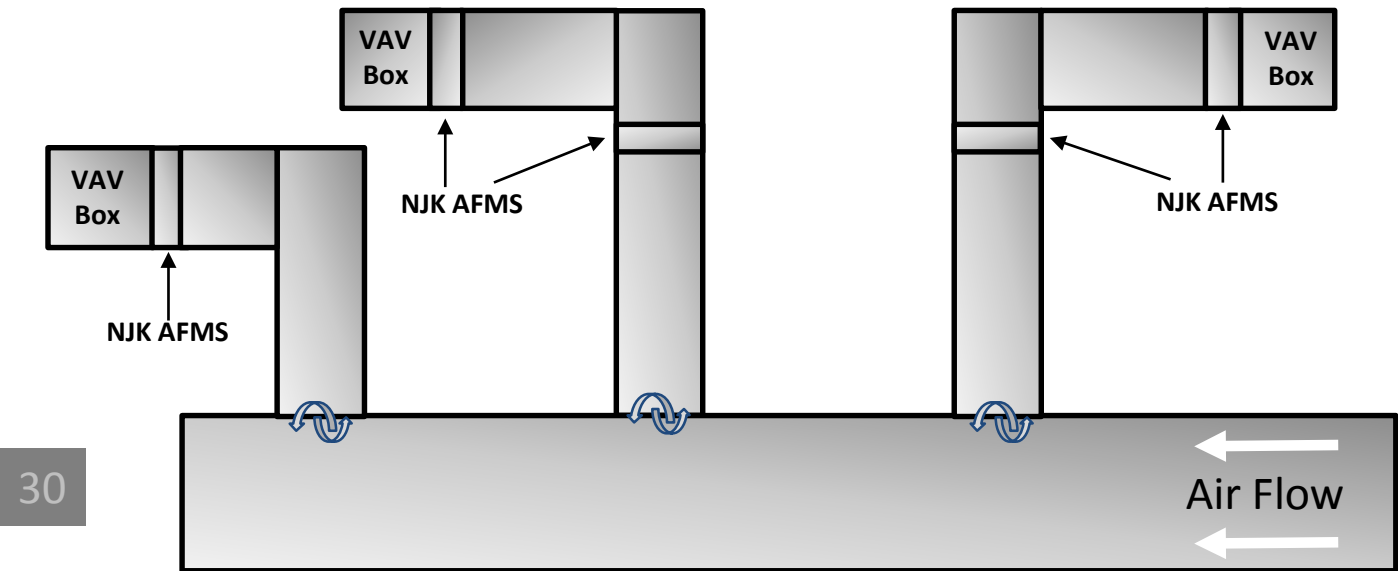


NJK-02 - Location and Mounting: Examples

Multiple Take-Off Branch Mounting

In the Multiple Take-Off mounting installation below the NJK Sensor Flow Frames are to be mounted in more than one branch duct connections from the main plenum. In a Supply Air Plenum the air will be turbulent as it enters the branch duct connections. Mount the NJK Flow Frame a minimum of 2 duct diameters downstream from the main plenum.

Install sensors downstream on the inlet of the VAV Box. This will allow the NJK Sensors to accurately read flow at the VAV Box and will be out of the turbulent air at the branch duct connections to the main plenum.



Mounting Near Dampers and Louvers

The preferred mounting of the NJK Airflow Station is upstream of dampers and louvers. The Airflow Station can be mounted downstream as well with proper placement. As dampers close (dampers are less than 100% open), less airflow passes over the Flow Frame at the top edge of the duct in the example below as air is directed downward. This provides an artificially low airflow signal. Before and After Dampers

At the same time, airflow passes over the bottom of the Flow Frame, in this example, providing an artificially high airflow signal. Placement of the Flow Measuring Module placed on the side of the Flow Frame, perpendicular to the dampers or louvers adds in the normalization of the airflow signal. After air balancing has been completed, the gain adjustment in the Signal Processing Unit can compensate for any additional system affects.

Similar airflow concentration affects will occur with a set of dampers or louvers downstream and near the Airflow Station.

