

Rawal APR Control Valve Selection Sheet

Please complete Rawal APR Control Selection Form for sizing confirmation and quote (One form per unit):

Job Name/ Reference: _____

Unit Brand & Model #: _____ Unit Tonnage: _____

Packaged Unit

Split System

Unit #: _____

Number of Compressors: _____ Refrigerant Type: _____

Manifolded

or

Separate Circuit Lead Compressor

Tonnage Comp 1: _____ Single Stage 2 Stage (if applicable)

Tonnage Comp 2: _____ Single Stage 2 Stage (if applicable)

Suction Line Size OD: _____ Liquid Line Size OD: _____

Length of Suction Line: _____ (required for Split Systems)

Location of the CU compared to the AHU (circle one): ABOVE BELOW SAME LEVEL

Note any system/application information that may impact APR Control Valve Selection to include:

Constant Volume Air Flow/ VAV/ VVT/ Make Up Air or DOAS unit?

Rawal Devices takes pride in sizing the APR Control conservatively for your system, to always ensure proper oil entrainment for your equipment.

Staging - Compressors that are manifold must be treated as a single, large compressor. APR Control is installed at the dual (or tripled) lines – where piping becomes a single circuit. The APR Control will act as a capacity modulator when one or more compressors start, changing capacities as each stage comes on-line, responding to changing load requirements.

Example, R-410A, 20-ton condensing unit, two compressors manifold together to a single circuit: APR Control must be selected based on smallest stage system (reduce capacity to 10 tons in this case). An installed APR-410-6 (6.5-ton capacity control) will act to modulate capacity from 20 tons down to 13.5 tons. When the second stage compressor turns off, the APR-410-6 will act to modulate capacity from 10 tons down to 3.5 tons. Because the volume of suction gas will not fall below 3.5 tons, this unit can operate with a suction riser of 1-3/8" OD. Oil entrainment will be satisfactory, maintaining compressor lubrication.

Similar consideration must be given to systems with 2 independent circuits – treat first on/last off circuit as a single circuited system.

BELOW FOR DISTRIBUTOR USE ONLY

Salesperson _____

Isolation (ball) valves are strongly recommended on all APR Control connections.