Selection guide

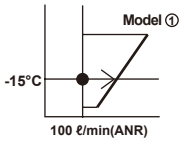
[Selection guide]
Each performance curve shows the relation of the outlet air flow and the outlet air atmospheric dew point of each model at an inlet pressure of 0.7 MPa and inlet air temperature of 25°C (saturate). Select the model according to the intersection of the required dew point and required flow rate shown on the right.

[Flow rate compensation method]
If the inlet pressure and inlet temperature differ from the rated values, the outlet air flow rate that can be supplied will change. Use each compensation curve and compensate in this case.

(Rated outlet air flow rate) x (correction value) = (conditional outlet air flow rate)

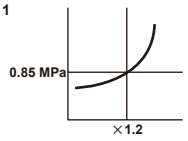
In addition, when the inlet air is the air which comes through the refrigeration air dryer, regardless of actual temperature, select the model with inlet air temperature of 10°C.

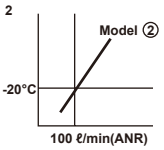
(Example) Required dew point of -15°C
When the required flow rate is 100 ℓ/min (ANR), the model (1) located on the right side of an intersection point can be selected.



(Example) Inlet pressure of 0.85 MPa
Required dew point of -20°C
When the required flow rate is 120 ℓ/min (ANR)

1. Obtain compensation (in this case 1.2) from the pressure flow rate compensation curve.
2. Model (2) has an outlet atmospheric dew point of -20°C and outlet air flow rate of 100 ℓ/min, allowing up to a 1.2-fold rate of 120 ℓ/min (ANR); therefore model (2) is selectable.

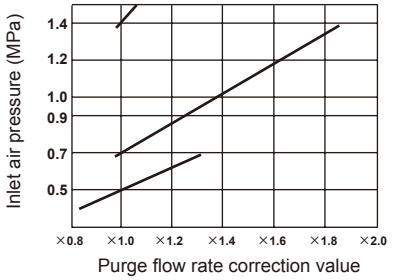




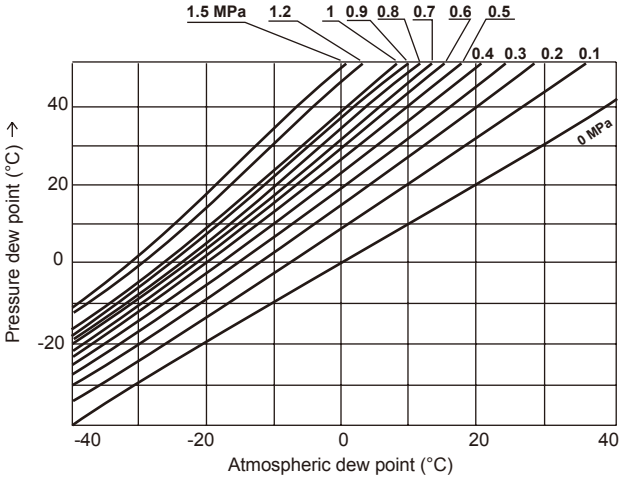
Purge flow rate

The purge flow rate is shown in the specifications.
Make sure that the flow rate including the purge flow rate as well as the outlet side operating air flow rate can be supplied from the inlet.
If the inlet air pressure differs from the rated valve, the purge flow rate will be obtained by multiplying the rated purge flow rate with the compensation value shown on the right.

Inlet pressure - purge flow rate correction curve

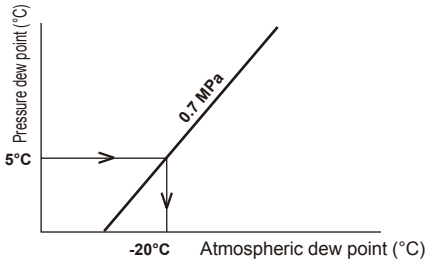


Pressure dew point - atmospheric dew point conversion table



Reading pressure dew point - atmospheric dew point conversion table

This table is used to convert the pressure dew point at each pressure into an atmospheric dew point, or vice versa.
Example: Obtain the atmospheric dew point when the pressure is 0.7 MPa and the pressure dew point is 5°C.



According to the above table, when the pressure is 0.7 MPa, the 5°C pressure dew point is converted into a -20°C atmospheric dew point.

Measuring the working air flow rate

If the working flow rate is not clear when selecting the super dryer model, measure the flow rate.
The pneumatic flow rate sensor "FLUEREX Flow Sensor Tester Kit" with functions such as cumulative display, peak display, peak value hold, and analog output is handy for measuring the flow rate.

● FLUEREX Flow Sensor Tester Kit
FLUEREX PFK SERIES