By Allen Haybarger

THE COMFORT COMBINATION

From a human comfort perspective, the worst combination of humidity and dew point is a dew point above 18°C combined with a high RH of 70 per cent or more. The most comfortable combination is reported to be a dew point of around 15 and an RH of between 50 to 70 per cent.

DEW POINT

Dew point is the atmospheric temperature below which water droplets begin to condense. It varies according to pressure and humidity. The relative humidity is the amount of water vapour present in the air, expressed as a ratio compared to saturation at the same temperature.

FINDING THE RIGHT RH

For ideal health and comfort, ASHRAE recommends an indoor relative humidity range of 40 to 60 per cent. Outside that range (above or below), conditions can be adversely affected.

Leading literature on allergens recommends keeping RH to less than 51 per cent to deter dust mites, since they can thrive at temperatures between 59 to 95°F with an RH between 55 and 85 per cent.
In the Broadcast Booth with Jerry Howarth

Manifolds: Taming the Tangle

Technology: The Internet of Things

Dehumidification: Drying for Comfort

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