Evaporation has always been the bottleneck of drying.

IICRC teaches us the four principles of drying are: Extraction, Evaporation, Dehumidification and Temperature Control; all still true! It's also understood by most water-damage restorers that up to 97% of the water can be removed from the structure, carpet, and pad with good extraction (usually within two hours of arrival on the job).

It's evaporation of the remaining 3% of the water that's taking too long! Even with good temperature control, air movement and dehumidification, most restoration companies are reporting 3 to 5 days for total drying.

New understanding of science

The Reets Evaporation Method teaches us that "temperature control/increase" in the water is what will really accelerate evaporation. The more energy/heat that can be transferred directly to the water, the more vapor pressure will build in the water. As the vapor pressure in the heated water builds, it rockets past the vapor pressure of the ambient air; the greater the separation of vapor pressures in water and air, the faster the water will turn into a vapor-gas (humidity).

Application of new technology

The key to transferring heat into water is to contain the heat where the water is (carpet, pad, substrates, and walls).

This can be accomplished by directing the heat either under the carpet or by tenting the floor with plastic. The plastic and/or carpet containment energizes the wet surfaces and materials with heat, which builds vapor pressure in the water. The higher the vapor pressure in the water - the more rapid the evaporation is.

The containment area is purposely exhausted along the walls (rapidly drying them as well) to the rooms upper air levels.

The final procedure to prevent the upper air levels of the room from becoming too hot or too wet with humidity, is to set up thermostatically controlled evacuation fans to the outside. This can be complemented with dehumidifiers. There is seldom any reason to let the room exceed 95°F.

TES thermal energy system

This is the new patent-pending equipment necessary to apply the Reets Evaporation Method to drying.

The system incorporates a 199,999 thousand BTU boiler that super heats a unique freeze-proof liquid. The heated liquid is pumped through insulated hoses to the TEX (thermal exchanger) units, strategically placed in the water damaged area, effectively transferring the heat in the remaining water.

TES can be permanently mounted in/on a trailer, or installed with a wheel kit for portability. Made of stainless steel, it can operate in outside temperatures upwards of 130 degrees, or as low as 30 degrees below zero; without damage or corrosion.

For more information

For more information visit www.tesdryingsystem.com or call Bridgepoint Systems at 800-794-7425.

To find your nearest TES Distributor call Interlink Supply at 800-660-5803. www.interlinksupply.com