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A Science Service Feature

? WHY THE WEATHER ?

Dr. Charles F. Brooks,
Secretary, American Meteorological Society,
says:

DRY AIR IS THIRSTY AIR

Dry air is always thirsty. It eagerly absorbs into itself the free moisture of any surface with which it comes into contact. The warmer the evaporating surface the more readily will the water fly off into the air. The more humid the air the less rapidly will it permit water to evaporate.

In meteorology the amount of water present relative to the maximum possible for the temperature is known as relative humidity. For example, if air includes half as much as is possible at a given temperature, its relative humidity is 50 per cent. On a muggy day it may be 60 to 80 per cent. On a "good drying day", as the housewife calls it, when washing hung out on the line dries quickly, the relative humidity is usually low, sometimes down to 30 per cent in the warmest hours of the day. When it is high clothes dry but slowly except in warm weather. Evaporation is usually more rapid in warm than in cool weather, because more water can exist per cubic foot, say, or any other given volume, in a vapor state at a high temperature than at a low one. Moist surfaces are always tending to discharge moisture into the air, while cooling processes are always tending to dry the air by precipitating moisture out of it.

(Tomorrow: The Asphalt Mirage)

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