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? WHY THE WEATHER ?

By Dr. Charles F. Brooks  
of Clark University.

"FALLING" FROST

Frost and snow are so closely allied that it is at times almost impossible to tell whether there has been a heavy frost or a light snow during the night. A puff of air, however, is likely to blow such snow away and thus to reveal its nature. Or if the deposit is on a leaf or piece of wood that can be turned over, snow will fall off and frost will stick. The only difference between the frost and the snow is that the frost is formed by condensation on some object connected with the ground, while the snow comes from condensation in the air.

We usually think of snow as falling from the clouds, and do not realize that it may sometimes actually form in the lower few feet of the atmosphere. In the coldest weather we may sometimes see "diamond dust" in the air, small crystals condensed in the lower atmosphere during the night by the chilling after a clear day. Such snow forms most commonly over a snow surface or over open water. Polar explorers describe how the chilling effect of the snow surface may make it snow from three feet down, while it is clear overhead. Near open leads in the polar regions or even near open rivers in middle latitudes, there may be much frost fog, which deposits snow nearby. A man living near the Snake River, in Idaho, claimed that every night in clear quiet cold weather there was a fall of "frost". Investigation proved that this "frost" was the snow of the frost fog rising from the open river and falling on the nearby shore. Indians of the Plateau region called such frost fogs "Pogonip", and claimed that it produced a serious inflammation of their air passages.

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(Tomorrow: Barometer Up, Thermometer Down)

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