Environment Canada Imaging Cover Page

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DIURNAL VARIATION OF DRY AND WET BULB TEMPERATURES AT SELECTED STATIONS
(Revised)

During the course of preparation of the Hourly Data Summaries it was decided that it would be desirable to include hourly averages of dry and wet bulb temperatures thus permitting a study of the diurnal curve of these elements. This was first implemented in HDS #22 for Regina Airport and will be included in those subsequent issues for which the data permit. However tables became available for a number of stations too late to include them in the appropriate HDS. These are presented here.

In each case the averages are based on a full ten years of record from January 1957 to December 1966. Values are in degrees F. Stations are arranged in alphabetical order, regardless of province. Stations included and the page on which they appear are as follows:

At Churchill in the winter months the temperatures frequently fall below $-35^{\circ}F$, so that observations of the wet bulb temperature cannot be made. In January there were 490 occurrences of temperatures below $-35^{\circ}F$ in the 10 year period and if the missing wet bulb temperatures are considered to be equal to the dry bulb it can be calculated that the wet bulb means are approximately $1.5^{\circ}F$ too high. In February, where there were 97 such occurrences, the wet bulb means average about .3 too high. There was only one occurrence of temperature below $-35^{\circ}F$ in December so that its effect can be neglected.

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