Seasonality and the survival of glacial ice

The formation and survival of glacial ice depend on two things: abundant snowfall (to supply the material) and cool summers (to allow that material to survive without melting). The second of these means that, for a given annual average temperature (the solid line below), the critical issue is the deviation from the annual average in the summer. That deviation is seasonality: the extent to which seasons deviate from the mean. As the three FQS pages on Milankovitch cycles show, variations in Earth's orbit can lead to variation in seasonality and thus to varying extents of glaciation.

Seasonality: the magnitude of variation between summer and winter