Sunrise, Sunset, & Twilight

he text beneath the map indicates the time and azimuth along the horizon for sunrise and sunset at the computer's location. Azimuth is measured clockwise from true north. In addition, times are given for civil, nautical, and astronomical twilight.

- Civil twilight is bright twilight, where the sun is within 6° of the horizon. Generally, daylight activities can be carried out during civil twilight, without artificial lighting.
- Nautical twilight is deep twilight where the sun is between 6° and 12° below the horizon.
- During Astronomical twilight (sun between 12° and 18° below the horizon) there is still enough light in the upper atmosphere to interfere with astronomical observations.

A "Sun-Bar" near the bottom of the screen graphs the hours of day, twilight, and dark.

The map is an active input area on the Sunrise screen. Click on the map to see sunrise, sunset, and twilight times at any worldwide location, including near the poles. When you are done experimenting, to reset to the original setting, click the Revert button. The "Sun-Bar" is useful in this mode, giving graphical information about the length of sunrise, twilight, and nighttime around the earth.

Note: When using the map for input, idealized time zones are assumed. The actual,

statutory time zones are not considered in the sunrise/sunset calculations when clicking on the map as an input device. To see the time at a specific location adjusted for daylight saving time, refer to its clock on the clocks screen.