The Year 2000 (Y2K) Century Rollover

As the year 2000 is getting closer, the discussion on how the computer software and hardware will handle the century rollover is increasing. The reason of the interest is that in most cases the Real Time Clock (RTC) in computing devices (including also industrial systems such as the PLC and the MMI such as UniOP Operator Panels) use only two digits to store the information of the year (97, 98, …); the behaviour of these systems at the end of the century is important because it might cause unexpected problems if not properly handled.

What will Happen to UniOP Operator Panel Products at the Century Rollover

The information below applies to **all UniOP operator panel products** which **include the hardware real-time clock** option; the statement is **valid for all firmware versions**.

- The hardware real time clock uses only two digits to store the year information.
- At the transition between year 1999 and year 2000 the year will change from 99 to 00.
- Year 2000 will be considered a leap year.

UniOP Designer and the Y2K Issue

The UniOP Designer software package **does not perform any processing based on the time or the date**. Because of the non-effect of either the time or date on our software, Designer for Windows is compliant with Y2K.

Application Notes

The UniOP panels do not perform any calculation using the date information, but they make the date and time available to the controller to which they are connected. The controller in turn may make calculations using the date information. The controller must use the proper logic is used to ensure that dates are handled correctly
Example: if an application running on a PLC has to determine which of two events is the oldest, it may assume that one in year 2000 is the oldest since 00 is smaller than 99.

Year 2000 will be a leap year. Century years (like 1900 and 2000) are leap years only if they are evenly divisible by 400. Therefore 1900 was not a leap year but the year 2000 will be a leap year. The real time clock of the UniOP panels will correctly handle this and the month of February in year 2000 will have 29 days.