The Year 2000 approaches!

It was a perfectly predictable problem, yet until recently it was nearly completely ignored. At the stroke of midnight, Dec. 31, 1999, as the world walks bravely toward the new millennium, it may not be accompanied by many of its computers.

Most computer systems designed before the 1990s did not anticipate the arrival of the year 2000, and to them it will look like 1900. The result: serious malfunctions or a complete system crash.

Dr. Tom Rosenal, head of informatics at the University of Calgary and a member of COACH, the Canadian Organization for Advancement of Computers in Healthcare, says this ticking time-bomb will have an impact on nearly all aspects of health care.

"I suspect that 90% of all software in most North American health care organizations will be affected," he said. "And it's not just computers. Anything with a microchip made before 1994 could be affected."

Computers and computer systems pervade modern health care, and this means both small clinics and gigantic hospitals are threatened. Financial records, patient scheduling, system timing: anything and everything that depends on a computer's clock could be affected.

A recently completed survey in the US found that almost 20% of health care institutions had done nothing to deal with the millennium bug. Fewer than 1 in 3 have a strategy in place, while only 5% have actually solved the problem.

"It's a huge problem with huge financial implications," said Richard Fogel, a partner with Gordon & Glickson, the Chicago-based law firm that conducted the survey. "[In the US] the cost is estimated in the many billions of dollars, and I'd be surprised if it's any different in Canada."

As part of its third annual Healthcare Technology Survey, Gordon & Glickson, which specializes in health care technology, sent questionnaires to 1700 institutions in the US; the response rate was 9%.

The survey revealed that, just as in many other sectors, hospitals and other institutions are waiting for computer suppliers to provide solutions. For those that have done nothing, it may be too late. "With all the demand for programmers," warns Fogel, "it is going to be very hard to complete system upgrades in time if you haven't already started the process."

The lack of action is symptomatic of the general use of computers in health care. Even though computers are now ubiquitous, institutions' information-technology policies are not keeping pace with the rate of change. "Hospitals are flocking to the Internet," said Fogel, "but many appear ill-equipped to handle some of the implications."

The survey revealed that 25% of respondents had no official information-technology policies in place, and most of the others did not plan to deal with issues such as the Internet, laptop computers, voice mail or cellular phones. With the shift toward electronic storage of patient records and telemedicine, Fogel thinks these missing policies could have serious implications.

As for the Year 2000 problem, Rosenal said Canadian estimates of the cost to fix it vary. However, because some programs have hundreds of thousands of lines of computer code the fix will require both time and money. Unfortunately, both are in short supply.

In the US, said Fogel, many hospitals are opting to replace their older software and hardware with new systems. Rosenal suggests that Canadian institutions may have to do the same. "First, they have to evaluate whether the software is worth while for the organization and, surprisingly, 'yes' is not the obvious answer. If it's not, then scrap or replace it with something that adds value. If it is useful, either fix it or replace it, whichever makes the best business case."

Whatever the choice, it must be made soon. Otherwise, said Rosenal, hospitals may record the arrival of the 21st century the same way they did the 20th — with pen and paper. — *Michael OReilly*

Cool Site

www.ochin.on.ca/riverside
Developed by the Human Resources/Public Relations Department at Ottawa's Riverside Hospital, this is an interesting site physicians may wish to tell patients about. It features a virtual tour that gives an educational overview of the services provided by the hospital and a political-action page makes readers aware of issues surrounding the provision of health care in Ontario. A link is also provided to the hospital's FreeNet site, where the public can access newsletters and press releases, as well as the "Here's to Your Health" menu, which provides self-care information about a variety of common ailments. — *Christina Abbott*