

## **Gates prescribe new, energy efficient drives for hospital's AC system**

The air conditioning V-belt drives at a 200-bed hospital were prematurely failing because of excessive sheave wear. After a Gates Design Flex analysis was performed, the drives were converted to non-slip synchronous belts. The new drives have reduced maintenance and parts' replacement costs, and produced energy savings of 8% annually.

For most people, an air-conditioned building is an amenity. For patients and doctors, air conditioning is a necessity that provides filtered air to reduce infections and humidity to limit patient dehydration.

The AC equipment at St. Clare's Hospital, Schenectady, N.Y., was providing adequate heating, cooling and ventilation, but the system was driving up costs for the 200-bed acute care facility.

As they were originally installed on the air conditioning system, the belt drives that turn the 6-ft. wide fans were being replaced three to four times a year. Cause of the problem was worn variable pitch sheaves that produced excessive vibration and wear on the belts.

Representatives from Gates Corp. performed a Design Flex analysis, and recommended a drive conversion from the single belts to Poly Chain GT2 belts and sprockets.

These toothed belt drive systems reduce lifetime drive system costs because they run clean, require no retensioning and are maintenance-free. They are an ideal replacement for single rubber belts and most No. 35 – No. 120 roller chains, size-for-size.

During the past eight years, St. Clare's patients and staff have enjoyed consistent airflow from their building's redesigned air conditioning system. In addition, the hospital has documented reduced maintenance costs and parts replacement savings, and an initial payback of only six months for the Poly Chain GT2 drives.

As an added benefit, because of the non-slip feature of the Poly Chain GT2 belt, the Gates drives continue to produce energy savings of 8% per year for the hospital.

To schedule a free plant survey that includes a cost savings analysis of your power transmission systems, go to <http://www.gates.com/StClare>.