

# New stroke strategy making a difference

*First case at St. Mary's proves effectiveness of system*

By Brett Browne

Pauline Komperdo is a living, breathing example of the value of Alberta's new Provincial Stroke Strategy.

The Camrose woman was the first patient to benefit from St. Mary's Hospital's recent designation as a primary stroke centre and to receive treatment through an innovative new treatment strategy.

Komperdo was at her home in Rosealta Lodge in Camrose on March 14 when she began to experience a variety of stroke-like symptoms.

"I felt dizzy so I thought I would lay down in bed. I went and lay down and got a headache and then I looked down at the floor and everything was sort of moving," she relates.

Komperdo pulled the emergency cord in her room and was transported by EMS to St. Mary's Hospital where Dr. Dennis Cook and Dr. Valerie Smith, with the assistance of St. Mary's Hospital stroke strategy leader Cheryl King quickly determined that she was having a stroke.

"The biggest thing was when she came in her arm was shaking and she couldn't control her left arm and her left leg. As well we picked up on the partial loss of vision in her left eye," explains Dr. Smith.

Komperdo was rushed off for a CT scan and a call was placed to neurologist Dr. Ken Butcher, at the Al Owen Stroke Prevention Clinic at the University of Alberta Hospital via the new Telestroke system installed as part of the Provincial Stroke Strategy. Within minutes Dr. Butcher was able to examine Komperdo via video link with the assistance of King, Drs. Cook and Smith, and ER RN Cindy Parker.

Dr. Butcher confirmed that Komperdo was in fact having a stroke and that she was a good candidate for tPA (Alterplase) a medication which can break down blood clots that cause stroke and which can provide the patient with improved chances of recovery if administered within three hours of the onset of the stroke.



After making a full recovery from a recent stroke, Pauline Komperdo (in front) takes a few steps under the watchful eyes of health care professionals at St. Mary's Hospital. Left to right are: Pat Crum-

ley, medical services coordinator for East Central Health, St. Mary's emergency room nurse Cindy Parker, Dr. Dennis Cook, Dr. Valerie Smith, and St. Mary's Hospital stroke strategy leader Cheryl King.

The drug was obviously effective as Komperdo had a complete resolution of her symptoms. Two weeks later, after going to Edmonton for some further testing, she is back home and feeling fine.

Smith says having the ability to administer tPA here in Camrose in a timely matter likely saved Komperdo from potential brain damage that could have been caused by the stroke.

"She is able to walk out of this hospital rather than being in long term care," explained Smith. "If we hadn't had that drug, potentially she could be in a wheelchair."

Smith explains that in the event of a stroke, time is of the essence. The quicker the patient is able to be assessed and treated the less chance they will suffer debilitating side effects.

"The longer it takes for you to get that drug, the more potential loss of brain function you have," she stated.

Prior to the installation

of the new CT Scanner at St. Mary's and the designation of the Hospital as Primary Stroke Centre, Smith says Komperdo would have been transported to the University of Alberta where depending upon a variety of factors, including the availability of a CT Scan, she might not have been treated within the small three-hour window which allows tPA to be effective.

"The biggest thing is for the community to know that because they raised all this money for the CT scanner here, this is one way we have been able to use it. We're really making a difference to people's lives," she said.

Pat Crumley, medical services coordinator for East Central Health, says there are a large number of patients in East Central Health (399 in 2004-2005) who present at hospital with stroke or stroke-like symptoms. About 3 to 5 per cent of stroke patients are candidates to receive tPA. However, since Komperdo's case, another patient was treated

at St. Mary's with the drug and again there was a complete resolution of the patient's symptoms.

Dr. Butcher, who was consulted on Komperdo's case, was in Camrose a few weeks previous to the incident to speak to doctors and nurses about how the Alberta Provincial Stroke Strategy and Capital Health's Regional Stroke Program could be a resource for remote and rural sites.

"We're an extended team helping physicians in outlying areas with Telestroke in place. The care for a patient is all around better when physicians have the support and confidence to count on additional resources. They're not alone, we're (neurologists) more accessible now," he commented.

Crumley says implementation of the Provincial Stroke Strategy has been accomplished through a great deal of cooperation between Capital Health, St. Mary's Hospital and East Central Health. He says the opening of Primary Stroke Centres first

here in Camrose and soon in Lloydminster is the first step of a larger initiative. Another critical component will be rolled out in May and June when a province-wide public awareness campaign will be launched to encourage people to recognize the warning signs of stroke and to come to hospital as soon as possible.

"That's critical, that they're aware of the problem and get here on time. That is going to be the pivotal part, early identification and early treatment for everyone," concluded Smith.

Studies have confirmed that patients who suffer strokes have significantly higher chances of successful recovery from strokes if they receive advanced treatment within six hours of the onset of stroke symptoms. As a result, the Alberta Provincial Stroke Strategy has been developed to ensure this advanced treatment is available at qualified hospitals throughout Alberta.