

# Reproductive health continues to advance

In the early 1970s, minimally invasive gynecologic surgery started in Delaware with the use of laparoscopy for elective sterilization. Within a few years, patients were being offered a laparoscopic surgical alternative for more complex medical conditions such as the removal of ovarian cysts, tubal pregnancy and fibroid tumors.

In 1992, I completed the first laparoscopic-assisted vaginal hysterectomy in Delaware at St. Francis Hospital. The procedure was observed and captured by Jane Harriman, medical writer for The News Journal at the time. There was great local and national interest in this new procedure as it was expected to change what had been the standard approach to hysterectomy for decades.

Harriman wrote an article covering the procedure and explaining the benefits of laparoscopy, including minimal blood loss, better visualization of the operative field, fewer complications, smaller incisions, shorter hospital stay, quicker recovery and, thus, a quicker return to work and other activities of daily living.

Now, years later, yet another innovative advance in women's health is taking place with the development of robot-assisted surgery. This type of surgery began with the U.S. Food and Drug Administration approval of the da Vinci robot developed by Intuitive Surgical.

Robot-assisted surgery is much like laparoscopic-assisted surgery and carries with it the same benefits, but with the added advantage of a three-dimensional

view of the operative field that allows surgeons to identify tissues and organs more accurately. The wristed operating instruments allow for greater surgical precision and control, minimizing blood loss even more. Like traditional laparoscopic procedures, robot-assisted surgery also uses small incisions, minimizing the pain and risk associated with larger incisions.

Among other things, the da Vinci robot allows gynecologic surgeons to remove a uterus equivalent in size to a 20-week pregnancy and gynecologic oncologists to perform radical procedures with less trauma to surrounding tissues and organs, thus resulting in shorter recovery. Treatment for pelvic organ prolapse can also now be done with this less invasive technique.

In late 2006, St. Francis Hospital again made Delaware medical history by performing the first robot-assisted gynecologic surgical procedure. Today, more than 500 robot-assisted gynecologic surgeries have been performed at the hospital. Nearly 65 percent of all hysterectomies since October 2006 have been performed via laparoscopic- or robot-assisted techniques.

Meanwhile, other new technologies are under way, including "single site" laparoscopic procedures in which all instruments are inserted through one incision. There is rising interest in this technique, not only for gynecology but also urology and general surgery.

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## Women's health

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