Australian fertility specialists achieve new birth success from ovarian tissue graft and subsequent IVF

Melbourne fertility specialists today announced their second success in world leading treatment to achieve a pregnancy and birth from ovarian tissue grafted into the abdominal and pelvic walls of a woman who had been left infertile after cancer treatment.

The woman, from Traralgon in country Victoria, gave birth to a healthy girl at Waverley Private Hospital after seeking ovarian tissue grafting to help her regain fertility following treatment for lymphoma cancer.

Melbourne IVF and the Royal Women’s Hospital achieved the world’s first births from abdominal wall grafting – twin girls – in 2013 from this technology when a Melbourne woman became pregnant seven years after her ovaries were removed during cancer treatment and fragments of ovarian tissue were stimulated to produce eggs that were fertilised through IVF.

Two embryos were created and inserted into the woman’s pelvis resulting in the world first pregnancy and the babies’ arrival in November 2013.

Associate Professor Kate Stern, Head of Fertility Preservation at Melbourne IVF and the Royal Women’s Hospital, today announced the birth of the third baby from this innovative technology.

Speaking at the annual scientific meeting of the Fertility Society of Australia in Canberra, Assoc. Prof. Stern said: “We have been thrilled with the outcome of beautiful twins from our first successful grafting procedure, and delighted to now have a gorgeous new baby born from this procedure,” she said.

Dr Haider Najjar, Melbourne IVF fertility specialist and managing obstetrician, delivered the baby at Waverley Private Hospital. “While this baby’s conception was a complex journey, the ante natal care was normal and the delivery encounters were obstetrically routine,” he said. “It was a privilege to care for this family and it is incredibly reassuring for other women facing oncology treatment that today’s science can give them fertility options for a family of their own.”

Assoc. Prof. Stern added: “This success confirms that ovarian tissue grafting provides a realistic opportunity for women to have a baby after being treated for cancer that leaves them infertile because of the surgical removal of reproductive organs or the toxic effects of some therapy.
She said the latest case was further evidence to support ovarian tissue grafting. Once an egg is produced and fertilised through IVF, the embryo can be transferred into the pelvis for pregnancy to proceed.

“While adult women may sometimes have the opportunity to freeze eggs prior to cancer treatment for fertility preservation, ovarian tissue is the only option for pre-pubertal girls,” she explained.

Jodie and Aden, the couple from Traralgon, said today: “We are so fortunate to have been referred for fertility preservation prior to cancer treatment. What we thought was impossible was made a reality and our baby girl, Evie, has made our lives complete. Words can't express just how grateful we are for our special little miracle.”

Assoc. Prof. Stern said improvements in cancer therapy had resulted in long-term survival from many malignancies, but a significant proportion of patients are left infertile because of the treatment.

“Our scientific team, led by Dr Debra Gook, is working on strategies to further improve the ovarian tissue grafting technique.

“Meanwhile, the increasing success with the grafting procedure provides real optimism for cancer patients to achieve their dreams of parenthood.”

Interview:
Associate Professor Kate Stern is available for interview by calling Trevor Gill, FSA Media Relations on 0418 821948
For an interview with Jodie & Aden please call Julie Pizzino Melbourne IVF 0400 233 419

Research Team:
The team responsible for this ground-breaking development includes:

- Associate Professor Kate Stern, Head of the Fertility Preservation Service at Melbourne IVF (MIVF) and the Royal Women’ (RWH), Head of Clinical Research at MIVF and Head of the Endocrine and Metabolic Unit, RWH;
- Dr Genia Rozen, Fellow, Reproductive Services RWH and MIVF;
- Dr Lyndon Hale, Head of Reproductive Surgery at RWH and Clinical Director at MIVF;
- Associate Professor John McBain, Head of Reproductive Services, RWH and Senior Clinician at MIVF;
- Dr Debra Gook, lead scientist of the oocyte and ovarian tissue cryopreservation program at RWH and MIVF;
- Dr Franca Agresta, Clinical Research Manager, RWH and MIVF; and
- Dr Petra Wale, Ms Stacey Gwillim and Ms Nicole Merry, senior scientists and laboratory managers, MIVF.
- Special acknowledgement to Professor Claus Yding Andersen, Head of the Laboratory of Reproductive Biology, University Riks Hospital, Copenhagen, and Professor Dror Meirow, Professor of Obstetrics and Gynaecology.