News Release



IVF breakthrough expected to deliver more babies

SYDNEY, 28 OCTOBER 2017: More babies are expected to be born in Australia thanks to a breakthrough new IVF offering. Available exclusively to patients of Genea, the new technologies significantly reduce the need for disturbance during the vital stages of an embryo's development, leading to- on average- more embryos per IVF attempt.

The fertility group has launched a new version of their culture medium *Gems*, which when combined with Genea's *Geri* incubator, has seen an increase of 46.7% in the number of high grade embryos per cycle when compared to the traditional incubator and culture medium system.*

Genea's Medical Director, Associate Professor Mark Bowman said; "the results are testament to Genea's consistent commitment to improve fertility treatment and to maximise the chance couples have of fulfilling their dream of becoming parents in the least number of cycles possible." He added; "the results are further evidence that there is a difference between the technologies offered in IVF labs and subsequently, the chance a patient has of success. Genea is getting closer and closer to mimicking the undisturbed natural environment of a woman's body – where a human embryo would normally be - and I believe our success rates reflect this."

Culture medium, the vital solution that supports embryo development outside the body, has traditionally needed to be replaced at different stages. Firstly, to support fertilisation, then when there is division of cells in the early embryo. Finally, it is replaced again when used for the blastocyst, the ball of cells developed by day five when the embryo is ready for transfer into the uterus. Additionally, at each point of development scientists spend time reviewing the embryos out of the incubator, exposing them to unfavourable elements.

However, Genea has now developed a continuous culture *Geri* medium, a universal liquid that is suitable for every stage of embryo development, eliminating the need to change the solution and enable undisturbed embryo growth. It's the next iteration of the *Gems* sequential media and is specifically developed for their new *Geri* time lapse incubator. "Genea has been developing embryo culture media since the early 1990s. Solutions developed by Genea have been used in more than 600 clinics across 60 countries, even some of our competitors are using older version Genea-developed media," Genea Scientific Director Steve McArthur said. "Whilst we will sell the system globally, the new generation embryo culture media coupled with *Geri* will be exclusive in Australia to Genea patients at no extra cost."

Traditionally, IVF clinics have used incubators that have more than one patients' embryos in a single chamber with no time lapse camera, meaning the incubator had to be opened every time one patient's embryo needed checking and/or when the medium needed to be changed.

Geri, Genea's benchtop incubator with individually controlled incubation chambers per patient and time lapse camera, gives scientists' continuous monitoring of embryos which eliminates the need to open the incubator to check on embryo development. "Other time lapse incubators on the market, have multiple patients in the one space, meaning even if they

News Release



had a single step media, embryos would still need to be disturbed when scientists check other patients' embryos," Mr McArthur said.

Initial data from Genea's exclusive new lab culture system is showing encouraging results thanks to the significant drop in the need for embryo disturbance. "It's fair to say that if a patient has more viable embryos for transfer or freeze, it's likely we will make more babies per egg collection – and it's the egg collection, with the injections, day surgery procedure and cost - that is the greatest impost to the woman. In contrast, the subsequent use of frozen embryos is simple, often drug free and not so expensive," Associate Professor Mark Bowman said. He added, "Therefore, leading technology presents a significant cost and emotional benefit to patients and a saving for the government."

These figures have undergone a peer review process and were presented at the Fertility Society of Australia Conference in Adelaide in October 2017.

Patients seeking help with fertility are encouraged to speak with a <u>Genea Fertility Advisor</u>, confidentially and obligation free, about how *Geri* and *Geri Medium* can maximise their potential for having a baby.

*Study performed at Genea's flagship Kent Street, Sydney CBD laboratory

ENDS

Media Contact:

Alice Ross M: 0421 741 737 E: alice.ross@genea.com.au

About Genea

Genea is one of Australia's leading providers for infertility, IVF and other assisted conception treatment with 31 years of experience in the field. The company has long been a fertility pioneer, with research and technologies developed in-house virtually doubling IVF success rates in the mid-nineties and continuing to improve outcomes today. In September 2017, Genea was listed in the Australian Financial Review's Top 50 Most Innovative Companies List, ranking number 25.

Genea's sister company, Genea Biomedx creates and manufactures practical, accessible and precise fertility technologies that help standardise and automate fertility treatment. Its unique relationship with Genea Fertility means that Genea Biomedx is a manufacturer that truly understands the customers' perspective. As a result, Genea Biomedx has developed the world's first automated vitrification instrument and has created a world leading benchtop incubator with timelapse functionality.

About Gavi, Geri, Gems and Gidget

- Gavi the world's first automated vitrification instrument; Vitrification is a process used in IVF to preserve human egg cells (oocytes) or embryos by cooling them to deep sub-zero degrees. Approaching the process in an innovative way, Gavi uses an automated, standardized protocol aiming to provide consistent results in blastocyst vitrification.
- Geri a benchtop incubator with individually controlled incubation chambers per patient to minimize disruptive events to the early-stage embryo. It also incorporates a camera for continuous monitoring of embryos as they develop.
- Gems the latest generation of Genea's culture media for embryo cultivation.
- Gidget an innovative witnessing and tracking system that provides electronic witnessing, lab workflow management and support for traceability and audit reporting.

p (02) 9229 6420f (02) 9233 7519w genea.com.au