

Press release  
July 26, 2017



## **Irvine Scientific Introduces Continuous Single Culture-NX Low-lactate Culture Media for IVF**

*Studies show an increase in blastocyst formation rates*

**SANTA ANA, California – July 26, 2017:** [Irvine Scientific](http://www.irvinesci.com), a world leader in cell culture media development and innovation and manufacture of Assisted Reproductive Technologies (ART), today announces the introduction of Continuous Single Culture® -NX, a next generation single-step culture medium for embryos.

The new formulation contains the lowest optimal concentration of lactate in culture media\* available commercially. Excess lactate in culture medium can be a contributing factor to stress in the embryo culture environment, affecting embryo development. Studies show that culture media with lower lactate concentrations maintain efficient metabolic rates in embryo culture for *in vitro* fertilization (IVF) applications. Continuous Single Culture® -NX was tested for efficacy in human clinical studies where it demonstrated an increase in blastocyst formation rates.

The energy metabolism of embryos involves the consumption of glucose, pyruvate and lactate operating in close equilibrium, however each molecule of glucose consumed results in two molecules of lactate being formed. Glucose consumption increases as embryos progress to the blastocyst stage resulting in excess lactate accumulating in the culture medium. Excess addition of lactate to the culture medium on top of pyruvate and glucose can create a burden on metabolic efficiency due to this natural production of lactate during energy production.

“As leading experts in mammalian cell culture media development, with a comprehensive product portfolio that supports applications ranging from biopharmaceutical production and cell therapy to ART, we have amassed over 45 years of experience in cell and developmental biology,” **said Dr. Jessie Ni, Chief Scientific Officer, Irvine Scientific.** “We appreciate the critical importance of considering cellular metabolism in our overall media development approach. Applying that approach with our experience enabled us to develop a medium that provides the optimal concentration of components for efficient embryo energy metabolism.”

Continuous Single Culture media are available in two forms; ready-to-use, pre-supplemented with HSA or without protein supplementation. Continuous Single Culture media are designed for fertilization and embryo culture through day 5/6 of embryo development.

For more information visit <http://www.irvinesci.com/assisted-reproductive-technology>

\*Patent pending

**ENDS**

## **Notes to Editors**



Photo: For a high resolution photo please contact [lorna.cuddon@zymecommunications.com](mailto:lorna.cuddon@zymecommunications.com)

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## **About Irvine Scientific**

Irvine Scientific, a member of JXTG Group, is a worldwide leader in the innovation and manufacture of cell culture media, reagents, and medical devices for researchers and clinicians. The company provides unrivalled service and quality to scientists working in cell therapy and regenerative medicine, assisted reproductive technology and cytogenetics, and industrial cell culture for the large-scale production of biotherapeutics and vaccines. Irvine Scientific adheres to both ISO and FDA regulations and operates dual cGMP manufacturing facilities in California, USA and Tokyo, Japan. The company's consultative philosophy combined with expertise in cell culture and compliance provides customers with unique capabilities and support. For over 45 years, Irvine Scientific has remained uniquely flexible and focused on media while becoming a strategic global leader in media products and services.