Georgios Liperis Deputy Scientific Director & Clinical Senior Lecturer

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Summary

I am an ESHRE certified Senior Clinical Embryologist with a background in assisted reproduction, pre-implantation genetic testing, teaching and research in human reproduction. Currently serving as Senior Lecturer at the University of Sydney and Deputy Scientific Director of Westmead Fertility Centre, the largest independent fertility provider in Australia, managing a team of 7 Embryologists and involvement in over >20000 treatment cycles over the years.

Education

| 2014 | Doctor of Philosophy Faculty of Medicine and Health, University of Leeds |
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| 2009 | Degree of Master of Medical Science in Assisted Reproductive Techniques Faculty of Medicine and Health, University of Nottingham |
| 2008 | Degree of Master of Science in Reproductive Sciences by Research Centre for Reproductive Health, University of Edinburgh |
| 2007 | Bachelor of Science in Biology with direction towards Biomolecular Sciences and Biotechnology School of Biological Sciences, University of Crete |

University Affiliations

2020 - Present

Clinical Senior Lecturer

University of Sydney, Faculty of Medicine and Health (ID: 1168462)

Professional body certifications

2021 Certified Senior Clinical Embryologist by ESHRE (European society of Human Reproduction and Embryology)

Employment history

2019 - Present

Deputy Scientific Director Westmead Fertility Centre, University of Sydney

2017 - Present

Consultant Embryologist providing consultation to fertility providers for improvement of clinical outcomes, accreditation services and establishment of genetic services in the region of Southeast Asia.

2017 - 2020

Laboratory manager and Coordinator of WFC operations VIAFET genomics centre, Sydney

2015 - 2019

Senior Clinical & Research Embryologist Westmead Fertility Centre, University of Sydney

2013 - 2015

Clinical & Research Embryologist Westmead Fertility Centre, University of Sydney

Continuous Professional Development (CPD credits)

2016 - 2022 ESHRE Continuing Professional Development Certificate for Clinical Embryology demonstrating sufficient educational / scientific / professional activity in the years 2016-2022

Book Chapters

| 2022 | Quality Control in the IVF Laboratory. George Liperis & Cecilia Sjöblom. Principles of IVF Laboratory Practice; Optimising Performance and Outcomes, 2 nd Edition Montag & Morbeck (editors), Cambridge University Press (in press). |
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| 2019 | Control of Variables in the IVF Laboratory. Cecilia Sjoblom and George Liperis , In Vitro Fertilization; A Textbook of Current and Emerging Methods and Devices, 2 nd Edition, Nagy, Varghese & Agarwal (editors), Springer Publishing. |
| 2017 | Quality Control in the IVF Laboratory. George Liperis & Cecilia Sjöblom, Principles of IVF Laboratory Practice; Optimising Performance and Outcomes Montag & Morbeck (editors). |

Publications (ORCiD: 0000-0001-9588-3392)

| 2022 | #ESHREjc report: non-invasive aneuploidy testing as an example of interdisciplinary innovation in ART. Ammar FA, Massarotti C, Liperis G Uraji J. Hum Reprod, PMID: 35460411 |
|------|---|
| 2022 | #ESHREjc report: on the road to preconception and personalized counselling with machine learning models. Fraire-Zamora J, Ali ZE, Liperis G Mincheva M. Hum Reprod, PMID: 35595227 |
| 2022 | #ESHREjc report: Catch 22-is PGT a number game? Efficacy of PGT and the importance of counselling. Fraire-Zamira J, Serdarogullari M, Liperis G . Hum Reprod, PMD: 34999822 |
| 2021 | #ESHREjc report: Trick or treatment – evidence based use of add-ons in ART and patient perspectives. Liperis G , Friare-Zamora J Serdarogullari M. PMID: 34865048 |
| 2021 | #ESHREjc live edition report: 'the forgotten Y'-advanced paternal age from a global health perspective. Massarotti C, Uraji J Liperis G Mincheva M. Hum Reprod, PMID: 34751767 |
| 2021 | #ESHREjc report: Ovarian stimulation practice after the OPTIMIST trial and evidence-based practice. Makieva S, Massarotti C Liperis G Ammar O. Hum Reprod, PMID: 34293144 |
| 2021 | #ESHREjc report: Is OTO-IVM the future fertility preservation alternative for urgent cancer patients? Massarotti C, Kohlhepp F, Liperis G Fraire-Zamora Hum Reprod, HUMREP-21-0636. |
| 2020 | Clinical application, safety and efficacy of Day 4 biopsy for preimplantation genetic testing (PGT). A retrospective cohort analysis. Liperis G , Swearman H, Sjoblom C. Hum Reprod, Vol 35, Supp 1, P177 [peer-reviewed, ISI-listed meeting presentation]. |
| 2019 | Orchidopexy results in the recovery of sperm in the ejaculate of a non-obstructive azoospermic adult with bilateral cryoptorchidism. A case report. Duong HQ, Tang VKH, Liperis G , Khoa LD. Fertility & Reproduction, <i>FANDR</i> , D-19-00015. |
| 2018 | pH: the silent variable significantly impacting meiotic spindle assembly in mouse oocytes. Swearman H, Koustas G, Knight E, Liperis G , Grupen C, Sjoblom C. <i>RBM online</i> , Volume 37, Issue 3, Pages 279-290. |
| 2018 | Fertilization by ICSI results in significantly higher aneuploidy rates compared to IVF, in embryos analysed for PGT-A by Next Generation Sequencing or Comparative Genome Hybridization (CGH) array. Swearman H, Liperis G , Crittenden J, Sjoblom C. <i>Fertility and Sterility</i> Vol 110 Suppl 4S, P593 [peerreviewed, ISI-listed meeting presentation]. |
| 2017 | Clinical application of Day 4 biopsy for preimplantation genetic screening and diagnosis (PGS and PGD). A retrospective analysis of our current practice. Liperis G , Crittenden J, Thymi M, Hellani A and Sjoblom C <i>Hum Reprod</i> , Vol 32, Suppl 1, P204 [peer-reviewed, ISI-listed meeting presentation]. |

Service

2022 - Present

Early Career Associate Editor of Reproduction & Fertility (RAF), the official journal of the Society for Reproduction and Fertility (SRF), an open-access, peer reviewed journal.

2021 - Present

Member of ESHRE journal club Editorial team involved in selection, preparation and delivery of the monthly ESHRE journal club.

2021 - Present

Member of the Editorial committee for the official magazine of ESHRE Focus on Reproduction, involved in the review of articles for publication

2017 - Present

Advanced Education and training of professionals in the field of assisted reproduction by involvement in international teaching and workshop execution as well as an invited expert to hospitals.

2017 - Present

Provision of support to Hospitals and Fertility Centres in the Asia Pacific region for implementation of accreditation based on the international code of practice (standard that fertility centres are audited outside the jurisdiction of the regulatory laws of Australia and New Zealand).

2013 - 2015

Actively involved in the amendment of the bill for assisted reproductive techniques in the Republic of Cyprus. Achieved it by liaising with members of Parliament.

Invited Lecturer

2022 Indian Society of Assisted Reproduction (ISAR) annual meeting

Invited as Faculty to deliver the lecture: The value of Semen Analysis in Fertility treatment

Fertility Society of AU & NZ (FSANZ) and Scientists in Reproductive Medicine (SIRT) annual Meeting

Invited as Faculty to debate with Prof. David Gardner on: Human Blastocyst ranking: standard grading or AI? During the SIRT meeting session: All hands on deck

2021 International Human Embryology Research Academy (iHERA) second annual virtual conference: embART 2021

Invited as Faculty to deliver the lecture titled: Routine semen analysis. Should the WHO criteria for normal sperm be the driving force for selecting the fertilization method?

2021 Scientists in Reproductive Technology (SIRT)

Invited to deliver the keynote lecture during the live meeting in Sydney for World's Embryologist day titled: The decision – Why Embryologists should have the final say in selection of fertilization method

2021 Sydney University Master's program in Reproductive Endocrinology and Infertility

Invited as a member of the expert panel to deliver an interactive discussion webinar on Fertility

2021 International Human Embryology Research Academy (iHERA)

Invited as Faculty to deliver a lecture titled: Mosaicism: The unexpected culprit

2020 Fertility Society of Australia (FSA) and Scientists in Reproductive Technology (SIRT)

Invited to deliver a lecture at the Webinar titled: 'How to validate and calibrate temperature and pH measurements in an IVF laboratory delivering the lecture titled: Non-invasive pH monitoring technology as well as being a member of the panel discussions and Q&A

2020 Asia Pacific Initiative on Reproduction (ASPIRE)

Invited as Faculty to speak at the Webinar titled 'Add-ons in the ART lab: Part 1' delivering the lecture titled: Sperm Selection Techniques as well as being member of the panel for case discussions and Q&A.

2020 International Human Embryology Research Academy (iHERA) first annual virtual conference: embART 2020

Invited as Faculty to deliver the lecture titled: Use of day 4 biopsy as an alternative method of biopsy for PGT.

2020 Emcure Pharmaceuticals with International Human Embryology Research Academy (iHERA)

Invited as Faculty to deliver the Webinar titled: Fertilization markers for embryo selection.

2020 Ferring Pharmaceuticals

Invited as a member of the expert panel to deliver the Webinar titled: Changing trends: Embryology practices in the COVID era.

2020 Mediknit in association with LifeInvitro academy

Invited as a member of the expert panel from around the world to deliver the Webinar titled: Finding a needle in a haystack – trouble shooting in the IVF laboratory". Also recorded a Q & A session on the same subject.

2020 Association of Clinical Embryologists (ACE) 8th International Congress, Chennai, India

Invited as faculty to provide hands on workshop teaching on oocyte vitrification, embryo biopsy and loading of cells additional to delivering a series of lectures including a keynote lecture during the main scientific programme and panel discussions addressed to Clinical Embryologists and Fertility providers from India.

Keynote Lecture:

How overuse of ICSI can be avoided with having a good IVF program

Lectures:

Quality control and control of variables in the IVF laboratory

Physiological response of oocyte to vitrification and warming process;

Tips and Tricks for an optimal outcome

Clinical application, safety and efficacy of day 4 embryo biopsy

Member of the panel discussion:

Current practises for optimal Pre-implantation genetic testing

Member of the panel to judge:

Clinical oral presentations & Embryology oral presentations

2017 Asia Pacific Initiative on Reproduction (ASPIRE) 3rd Masterclass: Preimplantation genetic testing. Screening and Diagnosis, Beijing, China

Invited as faculty to provide hands on workshop teaching on embryo biopsy techniques additional to lectures and case discussions addressed to ICSI practitioners from the Asia-Pacific region.

Lectures:

When to Biopsy: Experience of Morula Biopsy

Reagents and Consumables

Introduction to difficult Problems for Discussion

Different biopsy techniques

Also member of the panel discussions:

Difficult cases: Non-diagnostic cases and discordant results

Difficult cases: Dealing with Mosaicism

2017 4th NSW Reproduction Forum

Invited to deliver the lecture: Clinical application of Day 4 biopsy for preimplantation genetic screening and diagnosis

Teaching

2017 - Present

Coordinator for preparation of content and delivering a series of lectures and assessments for the Sexual Health and Reproduction Master's program, module SEXH5420, University of Sydney.

2020 - 2021

Faculty for online certification course in 'Clinical Embryology and IVF laboratory process for clinicians' organised by Life in Vitro and Mediknit. Involvement in the creation of the syllabus and delivering a series of lectures.

2017 - 2020

Auxiliary supervisor for PhD Student Harriet Swearman, University of Sydney, staff ID: 1168462

2012 - 2013

Tutoring for the module of Nutrition and Energy, School of Medicine, Faculty of Medicine and Health, University of Leeds

2011 - 2013

Demonstrator for Biochemistry modules, Faculty of Biological Sciences, University of Leeds

Peer reviews (ORCiD: 0000-0001-9588-3392)

| 13 | Journal of Assisted Reproduction and Genetics (JARG) |
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| 4 | Reproductive BioMedicine Online (RBMO) |
| 1 | Fertility & Reproduction (FANDR) |
| 1 | Human Reproduction Open (HROPEN) |
| 2 | Reproduction and Fertility (RAF) |
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Awards

2010 Best poster presentation award for Leeds Institute of Genetics and Health Therapeutics (LIGHT) annual postgraduate symposium.

Validation of GDF9 knockdown in ovine oocytes, following microinjection with siRNA. Liperis G, ... and Picton HM.

2009 Best poster presentation for the Fertility joint conference of the UK fertility societies awarded by the Society for Reproduction and Fertility.

The effect of doxorubicin on cultured mouse ovarian follicles. **Liperis G**, Murray AA and Spears N.

Conferences

| 2022 | European Society of Human Reproduction and Embryology (ESHRE) virtual annual meeting Organizing and delivering the live ESHRE journal club, poster presentation |
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| 2022 | Asian Pacific Initiative on Reproduction (ASPIRE) annual meeting Oral presentation |
| 2022 | Fertility Society of AU & NZ (FSANZ) and Scientists in Reproductive Medicine (SIRT) annual Meeting Invited as faculty |
| 2021 | embART 2.0 online Symposium for the best practices in Clinical Embryology Invited as faculty |
| 2021 | European Society of Human Reproduction and Embryology (ESHRE) virtual annual meeting Organizing and delivering the live ESHRE journal club |
| 2020 | European Society of Human Reproduction and Embryology (ESHRE) virtual annual meeting Poster presentation |

| 2020 | embART first international online conference for the best practices in Clinical Embryology Invited as faculty |
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| 2019 | 6 th New South Wales (NSW) Reproduction Forum Attendee |
| | Association of Clinical Embryologists (ACE) India 8^{th} International Congress Invited as faculty |
| 2018 | 5 th New South Wales (NSW) Reproduction Forum Attendee |
| | American Society of Reproductive Medicine (ASRM) annual meeting Poster presentation |
| 2017 | 4 th New South Wales (NSW) Reproduction Forum Invited speaker |
| | Asia Pacific Initiative on Reproduction (ASPIRE) 3 rd Masterclass on pre- implantation genetic testing – Screening and Diagnosis Invited as faculty |
| | European Society of Human Reproduction and Embryology (ESHRE) annual meeting Poster presentation |
| 2016 | Fertility Society Australia (FSA) annual meeting Attendee |
| 2013 | Society of Reproduction and Fertility (SRF) annual meeting Oral presentation |
| 2012 | Society of Reproduction and Fertility (SRF) annual meeting 2012 Poster presentation |
| 2011 | Joint Fertility meeting of the UK fertility societies Attendee |
| 2010 | Society of Reproduction and Fertility (SRF) annual meeting Attendee |
| 2009 | Joint Fertility meeting of the UK fertility societies Poster presentation |
| 2008 | Society of Reproduction and Fertility (SRF) annual meeting Poster presentation |
| 2006 | Mediterranean Society for Reproductive Medicine (MSRM) annual meeting Attendee |

Memberships

2021 - Present

Member of the Fertility Society of AU and NZ (FSANZ)

2021 - Present

Member of the Scientists in Reproductive Technologies (SIRT)

2017 - Present

Member of the European Society of Human Reproduction and Embryology (ESHRE)

2008 - 2013

Member of Reproduction and Fertility (SRF)

References

Provided upon request