

Cambridge Stem Cell Institute and Pint of Science present

Exchanges

An exhibition of shared creativity



19 June - 1 July 2017

Wellcome Trust - Medical Research Council
Cambridge Stem Cell Institute



Stem Cell
EXCHANGES



The Stem Cell Exchanges project

At the Cambridge Stem Cell Institute we are always looking for creative ways to prompt debate about stem cell research and gather perspectives from the wider community. In this exhibition, 11 of our researchers have been paired with local Cambridge artists to create works that both challenge and celebrate the potential of stem cells. We hope the art on show offers some new insights into the cutting edge research that our scientists undertake and provide a flavor of the complex cellular world that we are striving to understand and harness.

The Exchanges project was the brainchild of two graduate students at the Cambridge Stem Cell Institute, Katie Tremble and Mariana Alves and was delivered in partnership with Pint of Science. For more information on the project visit:

www.stemcells.cam.ac.uk/exchanges

All artworks in the show are for sale.

Please email stemcellexchanges@outlook.com for more information.

An evening of Stem Cell Culture

Thursday 29 June , 6.30 - 8.30pm

Join us to mark the finale of the exhibition with an evening of stem-cell inspired performance poetry. Take the opportunity to speak to the artists and scientists behind the artworks on display, in a relaxed gathering of the stem cell curious.

The organisers:

Cambridge Stem Cell Institute

The Wellcome Trust - MRC Cambridge Stem Cell Institute is a world-leading centre for stem cell research with a mission to transform human health through a deep understanding of stem cell biology. Bringing together biological, clinical and physical scientists the Institute explores and defines the properties of stem cells to establish their true medical potential. The Cambridge Stem Cell Institute also provides high level training for young researchers from around the world and serves as a hub for the wider stem cell community in Cambridge.

www.stemcells.cam.ac.uk

Pint of Science

Pint of Science was established four years ago by a group of UK based postgraduate and postdoctoral researchers who set out to make research science more accessible to the public by organising a scientific speaker series in the local pub. The Pint of Science Festival takes place over three nights in May, with events in over 150 cities around the world. Pint of Science is a volunteer run initiative with the annual festival coordinated by a small central Pint of Science team that works with organisers located in the various participating university cities.

www.pintofscience.co.uk

With special thanks to:



The exhibition is part of the MRC Festival of Medical Research





Dr Maria Alcolea

Maria's research looks at skin and epithelial cells and the way they divide and grow, both during development, and in response to injury. Epithelial cells line all the external surfaces of our bodies as well as the internal cavities in contact with the outside environment. Her team is interested in how this controlled growth and division differs from that which occurs in diseases like cancer.

 www.stemcells.cam.ac.uk/alcolea



Prof. Roger Barker

Roger's research focuses on neurodegenerative disorders of the brain such as Parkinson's disease and Huntingdon's disease. His team are looking at transforming stem cells into brain cells to replace the ones lost during disease. These studies are now entering clinical trials.

 RAB Group - John Van Geest Centre for Brain Repair

 www.thebarkerlab.co.uk
www.stemcells.cam.ac.uk/barker



Dr Kevin Chalut

Kevin's team consists of biologists and physicists, and is looking at how the physical environment of stem cells affects the way they behave biologically. One specific research focus is looking at stem cells in the embryo, where cells in different physical environments develop distinct properties.

 @KevinChalut

 www.stemcells.cam.ac.uk/chalut

Giles Currington

Independent Artist

Giles' graphic design education and background strongly influences his work, which includes printmaking, photography and painting. Typography, the visual vernacular, found objects and ephemera all contribute to his practice, as does an appreciation of bright colours and simple forms.



gilescurrington.com



[@gcurrington](https://twitter.com/gcurrington)



[@elvernaculovisual](https://twitter.com/elvernaculovisual)



Dr Rosalind Ridley

Cambridge Drawing Society

Dr Ridley started painting seriously when she retired from a career in science. She paints mainly in watercolour or pastel. Her interest in art is centred on 'what it is to see', that is to say, the nature of the visual images that we experience. Her paintings are usually about subjects from the outside world but they are mainly about what it feels like to see those images.



en.wikipedia.org/wiki/Rosalind_Ridley



www.flickr.com/photos/rosridley/



Andrea Malaskova

Urban Sketchers

Andrea Malaskova is a Cambridge based illustrator/ animator. Her graduation film Haircut was screened at various festivals in the UK and Europe; it was nominated for the Best Student 2008 Animation at Manchester Film Festival and won the second place at the Student Fest competition at Propeller TV. Andrea was also amongst the 25 finalists in OAM Marie Ellis 2012 Drawing for Prize Competition in Brisbane, Australia.



www.andreamalaskova.com



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Dr Ana Cvejic



All blood cells (red, white and platelets) are descended from one type of blood stem cell. Ana's research looks at how these blood stem cells are influenced into becoming different types of blood cell. The hope is that understanding these processes will help to target new therapies for blood cancers and other disorders.



www.stemcells.cam.ac.uk/cvejic

Dr Cédric Ghevaert



Cédric's research is investigating the potential for mass producing platelets and red blood cells from stem cells in the laboratory, with the potential of revolutionising blood transfusion services. His research is now entering clinical trials, where his team are assessing these mass produced cells in human volunteers.



www.stemcells.cam.ac.uk/ghevaert

Dr Ragnhildur Thóra Káradóttir



Thóra's team investigate brain stem cells and how they become neurons or myelin producing cells. Myelin is the insulating cover of neurons that allow signals to travel quickly around the body. In some diseases, such as Multiple Sclerosis, myelin is damaged or not repaired, Thóra wants to understand how stem cells could be used to repair damaged areas of the brain.



www.stemcells.cam.ac.uk/karadottir

Debbie Baxter

Cambridge Drawing Society

Debbie has painted all her life, always taking influence from the natural world around her. She is interested in looking at things from a different perspective as a way of developing her relationship to her art. Debbie's paintings have been exhibited in The Saffron Walden Gallery and the Mardelbury Gallery in Knebworth as well as Saatchi Gallery, London.



www.artdkbaxter.com



[artdkbaxter](https://www.instagram.com/artdkbaxter)



Jennifer Priaulx

Urban Sketchers

Jennifer is a self-taught painter and print-maker working mainly in an impressionist style. Working as a health researcher by day, she draws and paints landscapes and figures by night. Given these dual interests, Jennifer is enthusiastic about combining art and biological science for the purposes of education and understanding.



www.jenniferpriaulx.co.uk



Kate Grant

Independent Artist

Kate's art echoes a comfortable familiarity with the novelty of surprise. Her love of work and life are apparent, ranging from seascapes (represented by a Florida gallery since 2006) to newer pastoral scenes with extraordinary sheep. Her medical microscopy knowledge glows in a series of resin pieces, inspired by cells and organisms, with colour-popping excitement.



[@katewatercolours](https://www.instagram.com/katewatercolours)



[katewatercolours](https://www.facebook.com/katewatercolours)



www.katewatercolours.com



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CGTAACGGCG
AAGTTCATCG
TGCAGTCTTC
CTACGTCACAG
GAGGGCCACAC
GGCACACGGG
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AACACCCCAT
GCAAGAGCCCG



Dr Elisa Laurenti

Elisa's research investigates how blood stem cells differ from other blood cells and the impact that age and disease can have on their function. It is important these cells work correctly: if too many cells are produced you may get blood cancers, too few could result in deficiency disorders.



www.stemcells.cam.ac.uk/laurenti

Dr Jennifer Nichols



Jenny's research focuses on embryonic stem cells and learning more about the way in which they become different cells in the body. Embryonic stem cells are able to become any cell in the body and Jenny's team are interested in how cells are influenced into making decisions during this critical developmental phase.



www.stemcells.cam.ac.uk/nichols

Prof. David Rowitch



David's research looks at brain cells, particularly those which support neurons in transmitting signals. When these cells are injured, it can cause rare neurological disorders in infants. David and his team are working to understand how these disorders may be treated with implants of neural stem cells.



www.stemcells.cam.ac.uk/rowitch

Eva Humphrey-Lahti

Cambridge Drawing Society

Eva received an MA in Architecture and Design from the Royal College of Art in London after degree studies in Interior Architecture and Furniture Design at the University of Industrial Arts in Helsinki, Finland. Eva also studied sculpture at Hatfield University and has a studio and 'by appointment' art gallery Art in Context with her sculptor partner Marko Humphrey-Lahti in Royston.



humphrey_lahti



www.humphrey-lahti-art.com



Kathy Duckworth

Urban Sketchers

Kathy is a local artist who grew up painting in Cambridge. Later on she moved into tattoo design and is now focused on drawing, digital work and printmaking inspired by storytelling and personality. She will begin studying illustration in September.



kathyduck



Katherine Gravett

Cambridge Drawing Society

Katherine is an emerging artist living in South Cambridgeshire. She was awarded her Fine Art degree with honours from the Cambridge School of Art and has since exhibited her work in Cambridgeshire and Hertfordshire. She works in association with the Cambridge Drawing Society and Cambridge Open Studios. She works from her summerhouse studio in Papworth.



KatherineGravettArt



@KateGravett



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'CTMGGCAGCTGAGCCCTGAGTTCATCTGCCGCA
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Dr Sanjay Sinha



Sanjay's research involves using stem cells to grow smooth muscle cells, one of the main cell types that make up the blood vessel wall. The hope is to provide potential personalised smooth muscle cells for individual patients to repair damage after heart attacks, strokes and aneurysms. The stem cells from individual patients can also be used to study the disease of that particular person in the laboratory.



@SanjaySinhaUK



www.stemcells.cam.ac.uk/sinha

Prof. Ludovic Vallier



Ludovic and his team use stem cells to study embryonic development and to produce liver and pancreatic cells for study. These liver and pancreatic cells can be used to investigate potential new ideas for treatments of liver failure and diabetes.



@VallierLab



www.stemcells.cam.ac.uk/vallier

Podcasts

Want to hear more from the Cambridge Stem Cell Institute researchers who inspired the artworks here today? MSc student Mariana Alves interviewed each of them for a series of podcasts.

Get a personal insight into what motivates our world-leading researchers and how they plan to approach the next challenges in stem cell science. Understand how their discoveries are having an impact on our basic understanding of stem cells biology and leading to exciting new treatments in the clinic.

www.stemcells.cam.ac.uk/public/podcasts

Sonia Villiers

Cambridge Drawing Society

Sonia is an established local artist, known for her lively vibrant paintings of Cambridge architecture and cosmopolitan people. Sonia is a long-standing member and current committee member of Cambridge Drawing Society and Cambridge Open Studios. Her work can be seen in Primavera and 25 other shops, galleries, tourist centres and cafes in Cambridge and country-wide and was also featured in the June edition of Cambridge Magazine.

 soniavilliers.net



Jenny Walsh

Independent Artist

Jenny Walsh is a glass artist who not only explores the decorative qualities of glass, but also the significant role glass has played in scientific discoveries. Jenny has collaborated with scientists to find visual ways of communicating a scientific concept in a non-illustrative form. Jenny has recently finished a Masters at Central Saint Martins, London in Art and Science.

 www.jennywalsh.co.uk

 [@jennywalsh65](https://twitter.com/jennywalsh65)





www.stemcells.cam.ac.uk

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