



Cell and Gene Therapy Catapult

Annual Review 2016

About us

The Cell and Gene Therapy Catapult's purpose is to grow a UK cell and gene therapy industry, delivering health and wealth.

Our vision is for the UK to be a global leader in the development, delivery and commercialisation of cell and gene therapy. Where businesses can start, grow and confidently develop advanced therapies, delivering them to patients rapidly, efficiently and effectively.

The potential

Cell and gene therapies offer the promise of treating and altering the course of diseases which cannot be addressed adequately by existing medicines.

The UK has 16% of the world's active companies in this space, a platform from which the industry can grow rapidly. Scientific innovation also continues apace, creating new opportunities for UK companies and greater need for the resources provided by the Cell and Gene Therapy Catapult.

We work with
Innovate UK

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Our progress in 2015/16

+120

More than **120 professionals** covering the full spectrum of cell and gene therapy capabilities from regulatory to health economics.

7,200m²

Opening in 2017, our **large-scale Good Manufacturing Practice (GMP) manufacturing centre** broke ground and is rapidly developing.

13

Clinical trial sites across the UK.

22

New projects started.

Two

New company formations.

£21.3m

Invested into cell and gene therapy projects over the past three years.

£27.3m

Partnered, in the past three years, on **collaborative research and development grants** totalling £27.3m.

62

SMEs engaged with us.

36

Research partners engaged with us.

101

Business engagements.

+40

Attended or presented at over **40 international events.**



To find out more about us
please visit ct.catapult.org.uk

Chairman's statement



John Brown
Chairman



The teams at the Cell and Gene Therapy Catapult (CGT Catapult) are now fully established and in operation at our headquarters and laboratories in London and growing in our new manufacturing centre site in Stevenage. We are in good shape to meet the new challenges and timelines that the growth in our sector will bring.

And it's growth that's been pretty dramatic in the past year with investors of all types now showing a lot more interest in cell and gene therapy. We've seen therapies starting to gain approvals and expect to see more coming through the pipeline, particularly in oncology, in the next 12 months. It's no surprise big pharmaceutical companies have openly described the industry as the next area of growth and dramatic change to patient care and the source of future profitability.

One of the biggest booms has been in gene modified cell therapies. There was a world first in November when a child in London suffering from acute lymphoblastic leukaemia (ALL) was treated with engineered donor immune cells, based on pioneering work carried out at Great Ormond Street Hospital using gene editing techniques. Harnessing the power of the immune system by gene modification of a patient's own cells is at the forefront of the industry's growth but other areas are following behind.

CGT Catapult has been working hard to capitalise on this growth to achieve our vision for the UK to be a global leader in the development, delivery and commercialisation of cell and gene therapy. Working on gene modification has been part of what we do which is why we also changed our name this year to Cell and Gene Therapy Catapult. It's a name that now better reflects the wide range of the organisation.

As well as working with companies and researchers on advancing projects and removing barriers, some of which you can read about in this review, we've also been active in creating a favourable environment in the UK. That work will continue through our engagement with our diverse range of stakeholders through 2017 and beyond. We also continue to invest in infrastructure for the UK where we identify unmet needs, with our large-scale manufacturing centre set to complete and welcome its first collaborators. The next stage at the site in Stevenage will be to develop the cluster, critical mass and infrastructure that allow the building to function as a hub for the manufacturing and supply of cell and gene therapies.

So there's a lot of excitement and progress in the industry and in CGT Catapult. But as always, there is much more to do to ensure we continue to realise the opportunity for the UK. I am thankful to all the stakeholders we work with in order to make that happen.

Chief Executive's statement



Keith Thompson
Chief Executive Officer

It's been another year of progress, growth and outcomes with some real key milestones reached in our projects and strategic goals. I am proud of all the work that the team has put into our collaborations with academia and companies to help the industry continue its rapid development supported by Innovate UK.

Our project approach and the milestones we've achieved continue to fulfil our remit to lower or remove industry barriers for cell and gene therapies.

We continue to work with SMEs to help them commercialise their products and technologies with the goal of helping them grow. Asymptote, who we developed 'thaw in clinic' devices with and ReNeuron are examples of that work.

We've also supported two academic groups in creating companies for their exciting technology in the form of Islexa and Chimeric which you can read more about in the review. These special purpose vehicles have been created to facilitate commercialisation at an early stage, ensure IP is protected and that the technology is packaged and developed in the right way to ultimately attract investment.

Our third spin out, created last year with another group of academics to help commercialise an autologous cancer immunotherapy, has continued to break down industry barriers. As well as achieving positive interim results for the product following a review by the Data Safety Monitoring Board, the project has also addressed translational barriers including regulatory, process development and technology transfer.

Our platform projects, where we are leading in technological advances for the industry, also continue to progress and you can read

about an application of our cell plasticity platform to a cell therapy SME in this review.

Finally we continue pushing ahead with new infrastructure for cell and gene therapy companies in the form of our large-scale manufacturing centre in Stevenage. The building has had planning permission and is under construction at the moment and will provide a facility in the UK for large-scale, GMP manufacturing where there has previously been a gap in the technological infrastructure.

This next year will see us continuing to deliver on our portfolio of projects, assisting the industry, opening our manufacturing centre and looking for investment in some of our spin-out companies. Our success depends very much on the collaboration with our academic and industry partners and stakeholders so thanks goes to them once again for their support.

I would also like to take this opportunity to thank the talented and dedicated staff here at the Cell and Gene Therapy Catapult. Their commitment and hard work makes our progress possible. The past year saw us welcome 55 new colleagues and also say goodbye to several colleagues. Losing people can give us short-term headaches but ultimately we are happy to see people moving onwards and upwards into roles within the industry. A growing industry needs talent and we are delighted that industry is recruiting from CGT Catapult.

Industry growth

UK industry growth to the end of 2015



Investment 2015

Investment attracted by UK companies in 2015 vs. £35m in 2012¹

42

ATMP therapy developers

50% are rapidly growing



Growth

in the number of ATMP therapy companies since 2012

+1,000

Jobs created

up from 540 in 2012



Growth in UK clinical trials

since 2013

+50%

GMP footprint

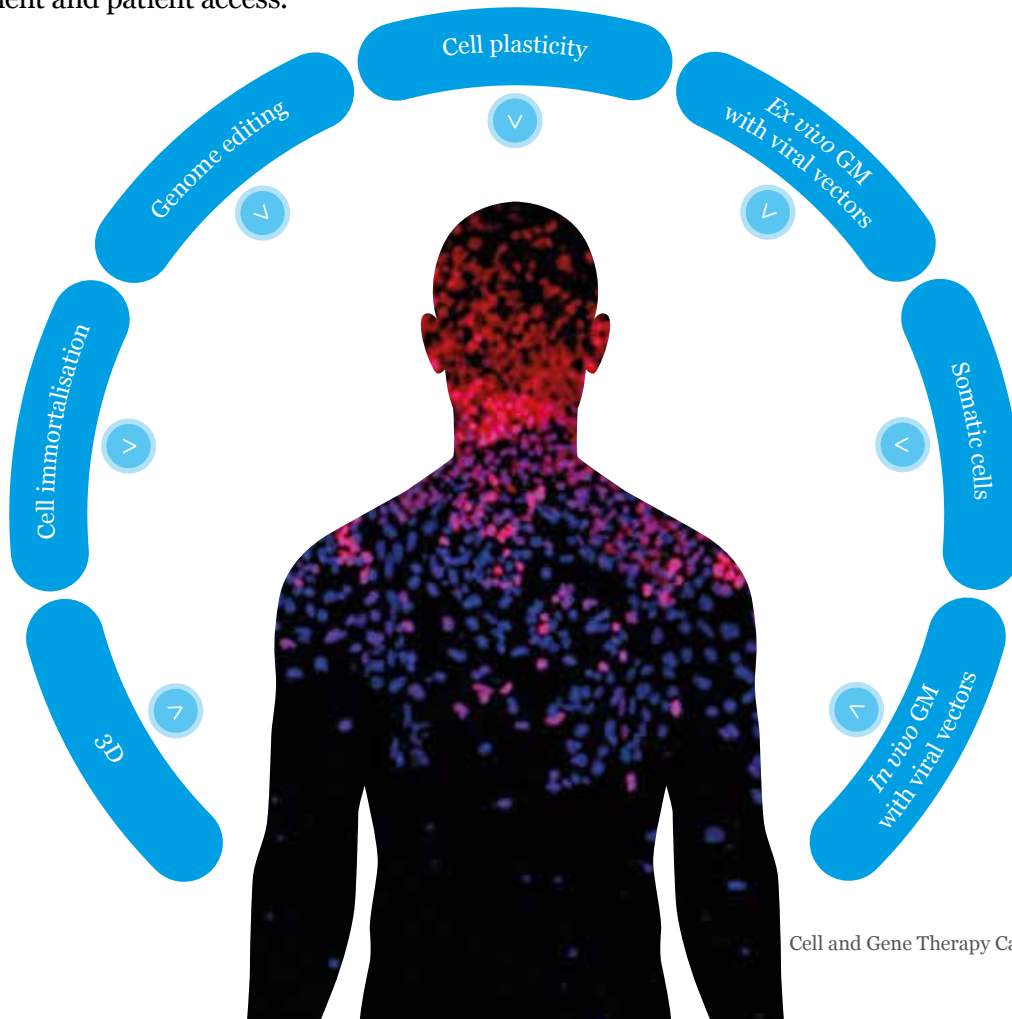
of 11,800m². A 50% increase vs. 2013



What are cell and gene therapies?

Cell therapies involve the transplantation of cells and cover a diverse range of cell types and therapeutic indications. They have been an active area of research for years but are now strongly emerging through translation and towards successful commercial development and patient access.

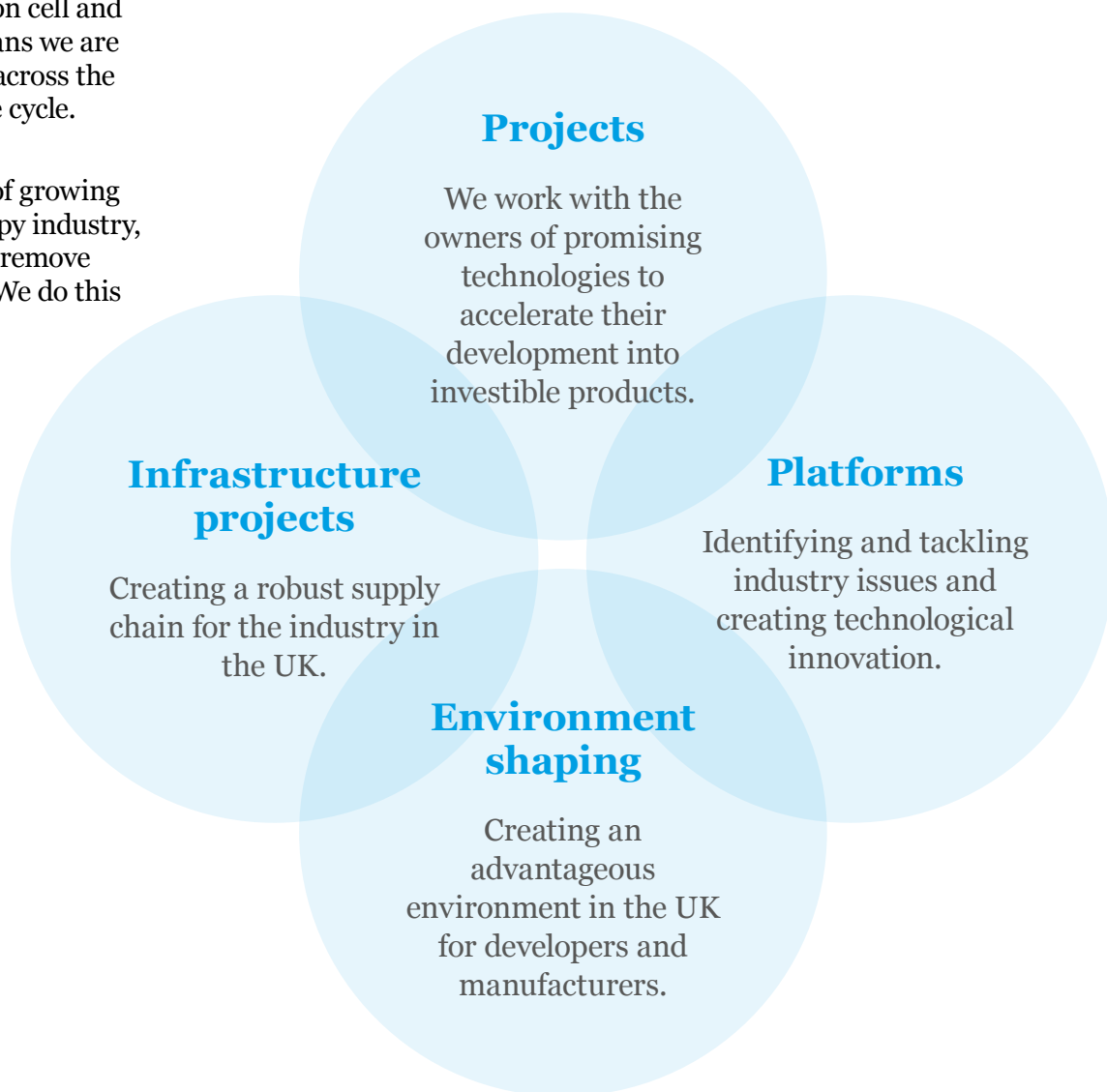
Gene therapy may be used to treat hereditary diseases in ways that have not been possible before and gene modification of cells can treat or prevent diseases such as cancer.



How we deliver

We are uniquely positioned as a translational centre of excellence that focuses exclusively on cell and gene therapies. That means we are set up for any challenge across the cell and gene therapy life cycle.

To achieve our purpose of growing a UK cell and gene therapy industry, we identify and lower or remove cross industry barriers. We do this in several ways:



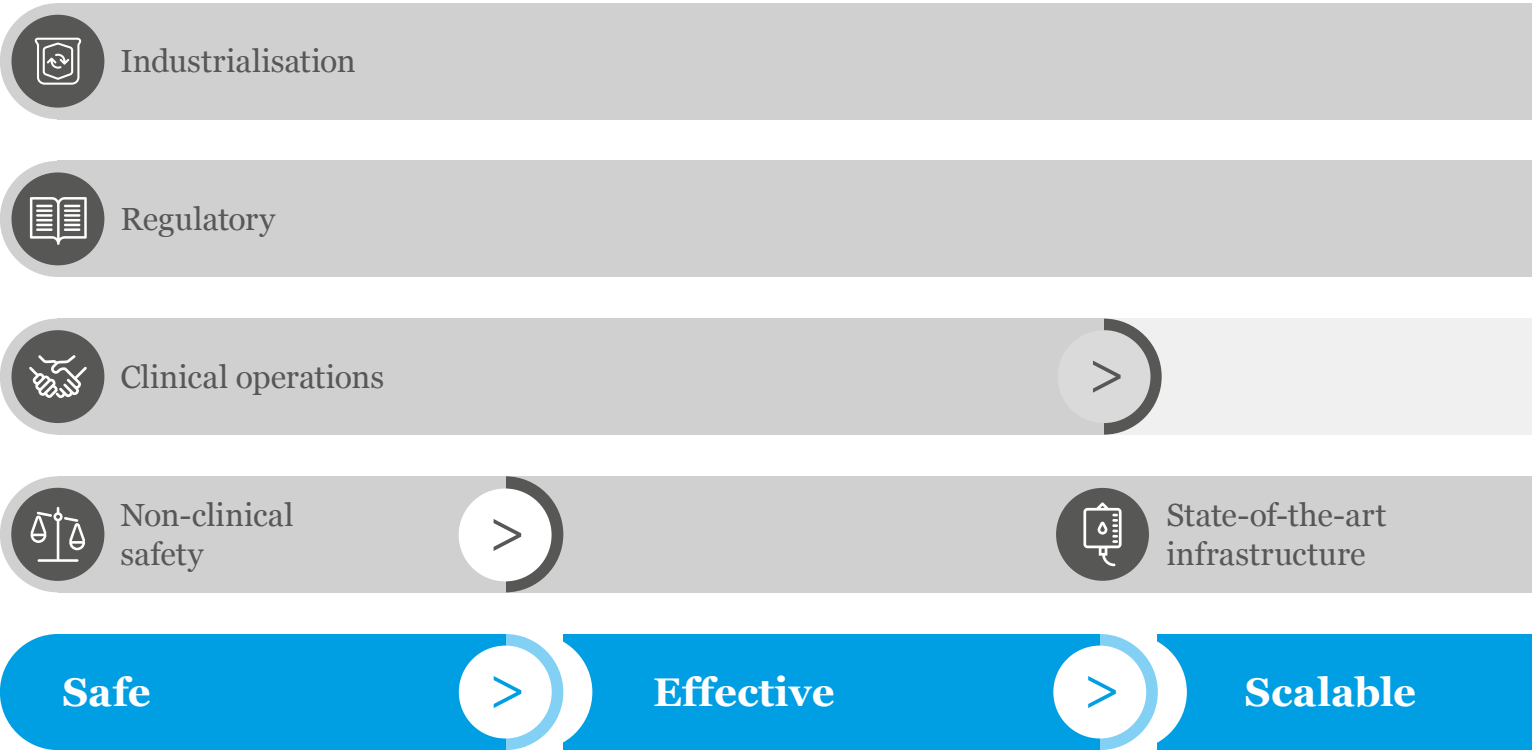


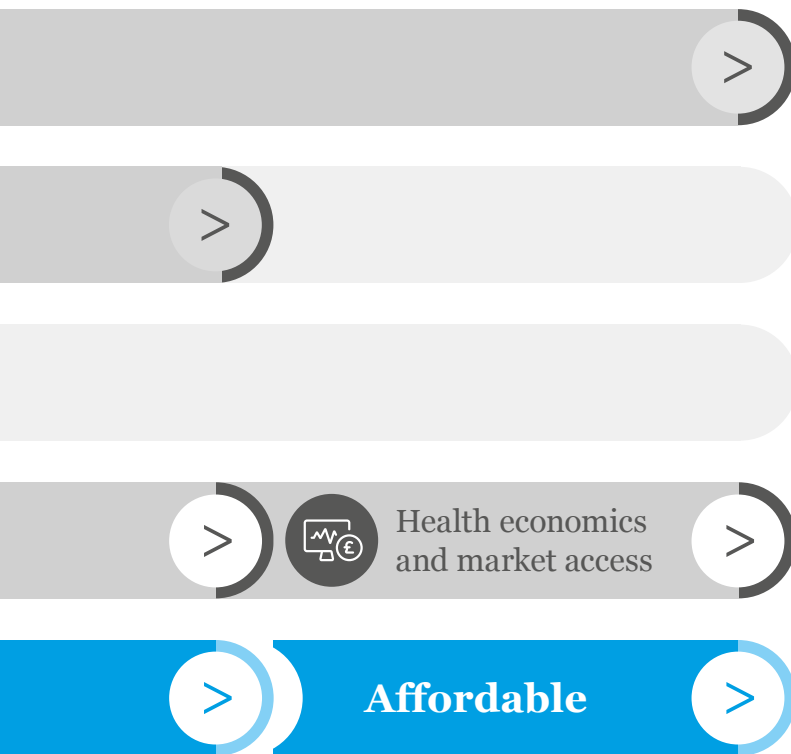
Jo Johnson MP, Minister of State for Universities and Science visiting the Cell and Gene Therapy Catapult with CEO Keith Thompson in May 2015.

Our capabilities

Through our projects and platforms, we have developed a set of in-house capabilities that combine together to address all the specific challenges of cell and gene therapies.

We use these capabilities to help cell and gene therapy researchers and companies translate their idea, technology or therapy into commercially viable and investible products that are safe, effective, scalable and affordable.





Industrialisation

One of our core capabilities that spans the whole cell and gene therapy development cycle. The team is made up of early pioneers of cell and gene therapies with a diverse range of skills. Technology agnostic and can provide innovative, integrated solutions for any cell and gene therapy development or quality challenge.



Regulatory

Our team has specialist knowledge in regulations across the entire value chain for cell and gene therapies, from procurement of blood, tissues and cells to specialist manufacture, clinical trial, release and supply.



Clinical operations

Combine scientific expertise with experience in clinical trial delivery specifically for cell and gene therapies.



Non-clinical safety

Experienced and expert in running pre-clinical programmes specifically for cell and gene therapies.



State-of-the-art infrastructure

Large-scale manufacturing centre under construction. Industrialisation laboratories in central London.



Health economics and market access

Developed a proprietary approach to the selection and adaptation of standard market access frameworks to develop bespoke health economic models for cell and gene therapies.

Case study: Manufacturing centre

After the approval of £55 million in funding from the UK Government for the large-scale Good Manufacturing Practice (GMP) manufacturing centre, building work commenced in November 2015.

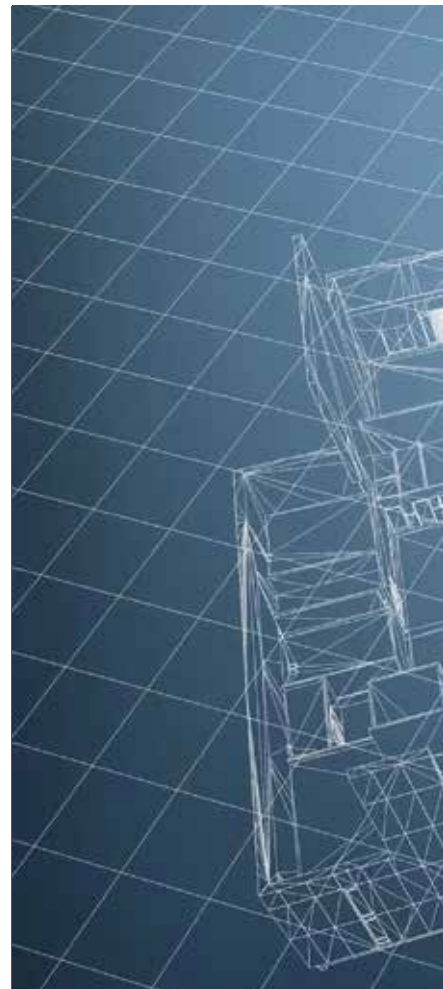


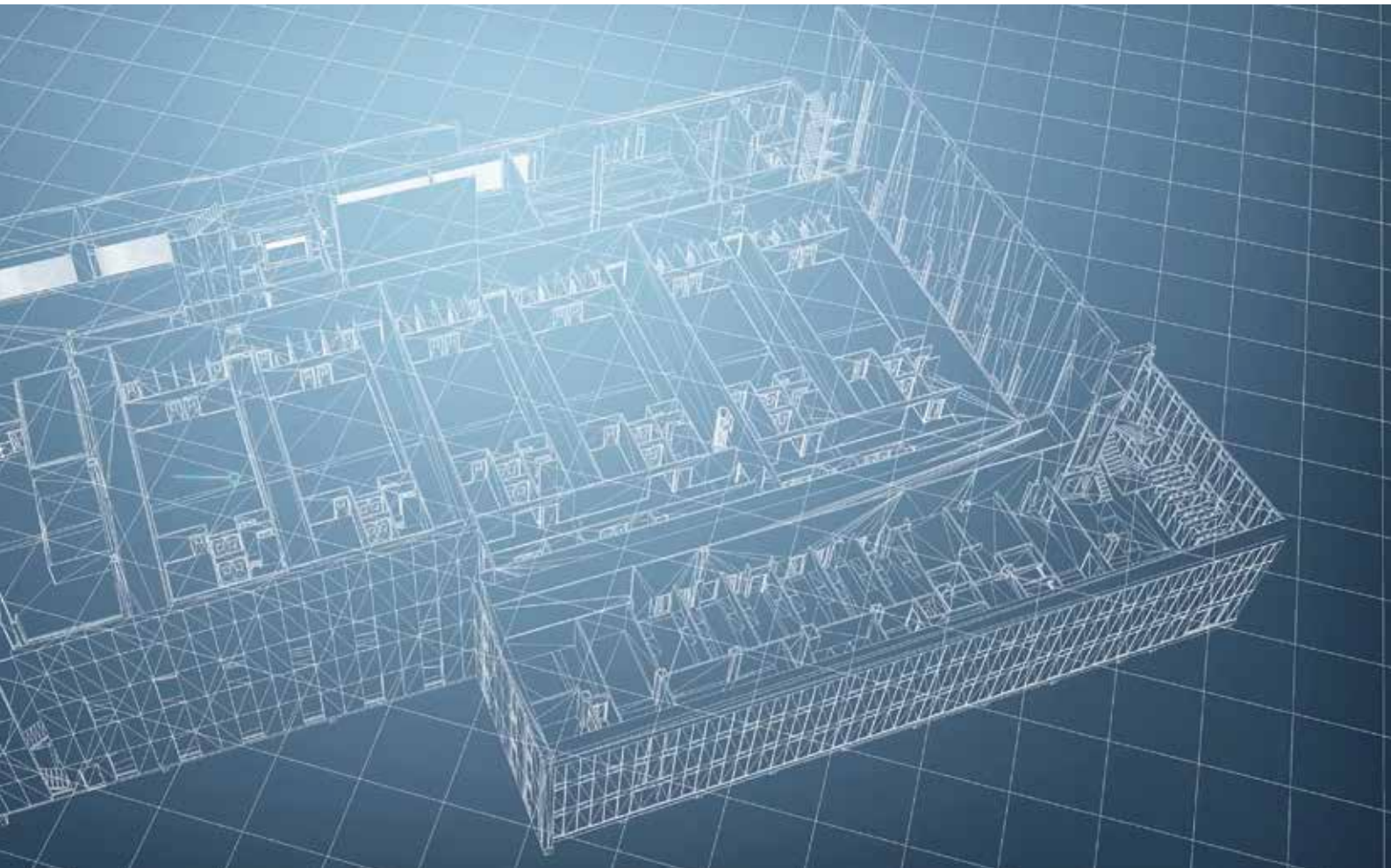
The construction is well under way on our four acre site at the Stevenage Bioscience Catalyst after planning permission was obtained and a lead contractor appointed. We are on track to take charge of the 7,200m² GMP facility in the second quarter of 2017.

The manufacturing centre will provide a space where companies can grow and meet demand for their products, lowering risks and reducing costs. With space for 12 segregated modules, each 100m², companies can take on and adapt the space to suit their process whether it's allogeneic, autologous or a viral vector.

There will be centralised GMP support and services for the facility, allowing companies to focus on their product and process.

The new facility will be located in Stevenage which is close to Oxford, Cambridge and London. This is the ideal location not only because of its close proximity to a strong academic base and a world-leading financial centre but it is also easy to access Heathrow Airport and other major transport links to deliver therapies globally.





The start of the build was celebrated with a turf cutting ceremony hosted by our Chairman and attended by a range of figures representing academic, healthcare, regulatory and industry interests across the advanced therapies sector.



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This collaboration will allow the consortium to rapidly develop this exciting technology. Having a hugely expanded supply of lab grown islets will enable us to significantly extend the established clinical treatment of islet transplant to more patients.

Professor Kevin Docherty
University of Aberdeen

“”

The formation of Islexa will accelerate the development of these laboratory grown islets whilst also creating a structure to protect the IP. This will hopefully lead to the creation of an investible, commercial product that will ultimately help treat thousands of patients.

Professor Johan Hyllner
Chief Scientific Officer, Cell and Gene Therapy Catapult

Case study: Islexa

The Cell and Gene Therapy Catapult (CGT Catapult) and the University of Aberdeen formed a new company called Islexa which aims to develop a novel technology to produce laboratory grown islets. Islets represent the functional unit of the pancreas, responsible for the production of insulin in response to increasing blood sugar levels. The Islexa technology works by reprogramming donated exocrine pancreatic tissue into fully functional islets.



The expansion and reprogramming technology has been developed at the University of Aberdeen as part of activities led by a consortium with the support of CGT Catapult. The consortium partners include University of Aberdeen, NHS Lothian, the Scottish Islet Transplant Programme, University of Edinburgh, and the Scottish National Blood Transfusion Service (SNBTS). The consortium partners bring unique expertise in clinical practice and manufacture, and will continue to work closely with Islexa during the development programme.

The Islexa team will initially focus on further pre-clinical development of the protocol for reprogramming the pancreas tissue into functional islets. This will be followed by clinical trials in the next few years.

Currently in the UK, only 30–50 type 1 diabetic patients with hypoglycaemic unawareness can receive an islet transplant each year due to the low availability of suitable donor organs. An islet transplant can give patients effective, long-term glucose control without the need of insulin administration.

Although there are other treatment options such as revision of insulin regime and overall diabetes management, insulin pumps and whole pancreas organ transplant, not all are suitable for patients and do not result in a reduction of insulin dependency. If successful, Islexa's technology could significantly increase the number of patients who can receive an islet transplant.

Case study: Catapult Therapy TCR Limited

Gene modification of immune cells is a sector that has now seen significant clinical validation and growth.

The WT1 TCR project, which is being developed with University College London and Imperial Innovations, is focussed on gene modifying patients' own T cells to recognise the WT1 antigen which is over-expressed in blood cancers and solid tumours. Since the last annual review, several important milestones have been reached in this major clinical stage programme.

As well as compelling progress to advance the treatment through clinical trials, we have also addressed translational barriers in several other areas with this programme and this experience is already being leveraged in other projects in our portfolio. These areas include regulatory (particularly gene modified organism registrations and comparability packages), process development and technology transfer.

In the phase I/II UK trial, we had positive interim results following a review by the Data Safety Monitoring Board. The data showed that in the first cohort of patients treated there was a good safety profile with no product related serious adverse events.

The therapy also met the protocol specified requirements for cell persistence, showing that the WT1 targeted T cells can survive and expand in patients.

The manufacturing process has been improved to reduce process risk – for example the number of manipulations in a batch has reduced from nearly 900 steps to around 200 which has helped to improve manufacturability and lower the cost of goods and we achieved regulatory approval for the new process with strong data readouts.

Finally, the manufacture of the product for trial was successfully transferred to a UK CMO, Cellular Therapeutics in Manchester, who are now making the product. This was a great piece of teamwork and a real win for the Cell and Gene Therapy Catapult in terms of our mission to grow a UK industry.

The next stage is to continue the trials, continue to push forward analytical and manufacturing process advances and to secure external investment for future development and discussions have already started.

Chimeric Therapeutics Ltd (CLEC14A CAR)

In January of this year we announced the formation of a new company called Chimeric Therapeutics Ltd with the University of Birmingham and Cancer Research Technology. The company will hold all future IP rights that result from the collaboration that is developing a new cellular therapy based on gene modifying T cells to target solid tumours. The project is based on a new generation chimeric antigen receptor T cell (CAR-T) immuno-oncology therapy for solid tumours. This involves directing the CAR-T cell towards a new, highly specific marker of abnormal tumour vasculature, CLEC14A. This therapy will act as a vasculature disruptive agent compromising oxygen supply to the tumours and inhibiting tumour growth. The technology is currently undergoing the final stages of pre-clinical development, and is planned to enter into clinical trials soon after.

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We are delighted with the progress of this clinical trial in acute myeloid leukaemia. This is an important area of unmet medical need and we are progressing with the next stages of recruitment now ongoing in the second cohort of the AML trial.

Professor Emma C Morris

UCL Institute of Immunity and Transplantation, Chief Investigator and co-inventor as well as Director of the Infection, Immunity and Inflammation Programme at the National Institute for Health Research University College London Hospitals Biomedical Research Centre

“”

The progress of the WT1 TCR clinical trials supported by the positive review, is really encouraging and we look forward to expanding these trials across the UK and Europe. This project is at the cutting edge of the new gene modified immune cell sector in the UK and has already successfully addressed barriers in regulatory approvals, process development and technology transfer.

Dr Natalie Mount

Chief Clinical Officer, Cell and Gene Therapy Catapult

Case study: Cell plasticity platform project

Pluripotent stem cells have the capacity to become any type of cell in the human body.

The cell plasticity project aims to develop a scalable biotechnological platform for the consistent and affordable manufacture of human pluripotent stem cells and their derivatives. Current manufacturing processes that use static culture systems are not able to scale-up and use reagents which may not be amenable from a regulatory perspective.

This project utilises areas of expertise from across the organisation but particularly focuses on our bioprocess engineering and analytical development capabilities, as well as Good Manufacturing Practice (GMP) knowledge. The development team is designing a scalable dynamic bioprocess including an analytical framework to monitor and control the quality of the cells throughout the manufacturing process.

The final outcome of the project is to create a predictable, controlled and cost-effective bioreactor process.

Leveraging our platform – Asterias

US based Asterias have developed a novel allogeneic dendritic cell vaccine (AST-VAC2) derived from human embryonic stem cells for the treatment of cancer.

Use of an allogeneic dendritic cell vaccine rather than an autologous (patient specific) vaccine developed from a patient's own cells, has the potential to improve the feasibility of cancer vaccines. Asterias are currently working with Cancer Research UK to take the vaccine into phase I/II clinical trials in non-small cell lung cancer patients.

Although there is already a manufacturing process for AST-VAC2, the current process is not able to provide the quantities of cells required for later stage clinical studies and commercialisation of the vaccine.

The investment in the Cell and Gene Therapy Catapult plasticity platform has provided a head start in the scalable production of pluripotent stem cells. We are using this knowledge to establish a scalable manufacturing process for production of human embryonic stem cells for Asterias.

The creation of a scalable manufacturing process will enable conduct of advanced clinical trials of AST-VAC2 in non-small cell lung cancer and other cancers and to provide a clear manufacturing pathway for eventual commercialisation.



Embryoid bodies formed in suspension.

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The Cell and Gene Therapy Catapult's cell plasticity platform is enabling us to tap into new technologies in scalable cell production. It's helping us accelerate the creation of a scalable industrial manufacturing process for our product.

Katy Spink, Chief Operating Officer
Asterias Biotherapeutics

“”

Platform projects are forward facing activities that provide step changes in industrialisation, often absorbing risk for the industry. Our investment in this type of project allows us to tackle industry-wide problems head on to provide cost-effective solutions. The Asterias collaboration is a great example of applying the learnings from our platform project in automated scale-up and control.

Dr Stephen Ward
Chief Operating Officer, Cell and Gene Therapy Catapult

Case study: Asymptote

Benchtop thawing systems for cell and gene therapies.

Cell-based therapies are produced and cryopreserved under strict Good Manufacturing Practice (GMP) conditions. The final delivery, thaw and administration of these often fragile therapies is a crucial step which has to be controlled to ensure maximum therapeutic effect for the patient.

In 2014, the Cell and Gene Therapy Catapult (CGT Catapult) team spoke to a number of clients and collaborators in the industry to understand the need and the required capabilities for a thawing system compliant with GMP requirements and certified as a medical device. From these conversations, it was identified that a small benchtop thawing system which could accept different packaging options (vials and bags) and meet GMP requirements, with a robust reporting architecture, would be fundamental to controlling and monitoring the final stages of release and use of cryopreserved therapies.

Once the need was confirmed, a challenge call was released to identify the best partner and UK-based company Asymptote were successful in their bid and began working in collaboration with the CGT Catapult team to develop the device.

Two different prototypes (vial and bag) have been successfully created and in early 2016, CGT Catapult and Asymptote signed an exclusive, worldwide, royalty bearing licence agreement by which CGT Catapult grants the rights of all the foreground IP generated by this collaboration to Asymptote, enabling them to commercialise the system.





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Working with the Catapult has given us a great opportunity to apply our expertise in cryobiology to the challenges of cell thawing. We've been able to eliminate the contamination risks and process variability inherent in water bath thawing while also providing therapy manufacturers with an immediate record of the entire process. For the industry it means much greater confidence that the dose administered to the patient is exactly what the manufacturer intended.

John Morris
Asymptote CEO

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Important support for the financing was provided by the validation of the Cell and Gene Therapy Catapult collaboration.

Michael Hunt
CFO, ReNeuron

“ ”

ReNeuron was our first corporate partner in 2013 and through this collaboration, we have together created novel processing technologies which will help propel the industry forward. This has contributed to ReNeuron attracting over £100m in investment to further develop their company.

Matthew Durdy
Chief Business Officer, Cell and Gene Therapy Catapult

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Case study: ReNeuron

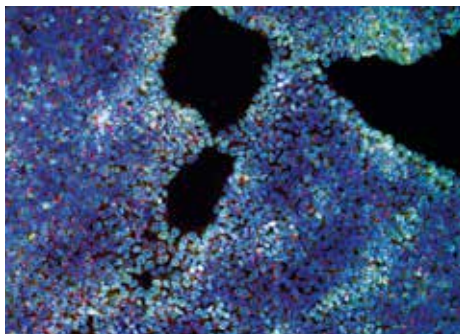
ReNeuron, a leading UK-based cell therapy company, and the Cell and Gene Therapy Catapult (CGT Catapult) first started their business relationship early in 2013 by focussing on ReNeuron's lead CTX neuronal stem cell line. The CTX cell line is used in ReNeuron's therapeutic candidates for stroke and critical limb ischaemia.

Our initial collaboration with ReNeuron focused on the development of an automated robust manufacturing process and associated analytical tests for the proposed clinical and early commercial supply of this particular cell therapy cell line.

Our team worked to ensure that the manufacturing processes for the CTX stem cell line were commercially ready by bringing in our analytical, process development and manufacturing expertise. Activities included technology transfer, developing an alternative identity assay based on biomarker expression, and re-engineering and automating the manufacturing process for the cryopreserved CTX product.

The partnership between ReNeuron, CGT Catapult and Loughborough University resulted in novel processing technologies from the biologics industry being applied to create a one-step stem cell therapy manufacturing process.

Following the start of their collaboration with us to further develop their next generation manufacturing process, ReNeuron has successfully secured an initial £33m in financing and more recently was awarded a further £68m in financial backing from institutional investors.



Our global engagement

International interactions



■ Canada
■ USA



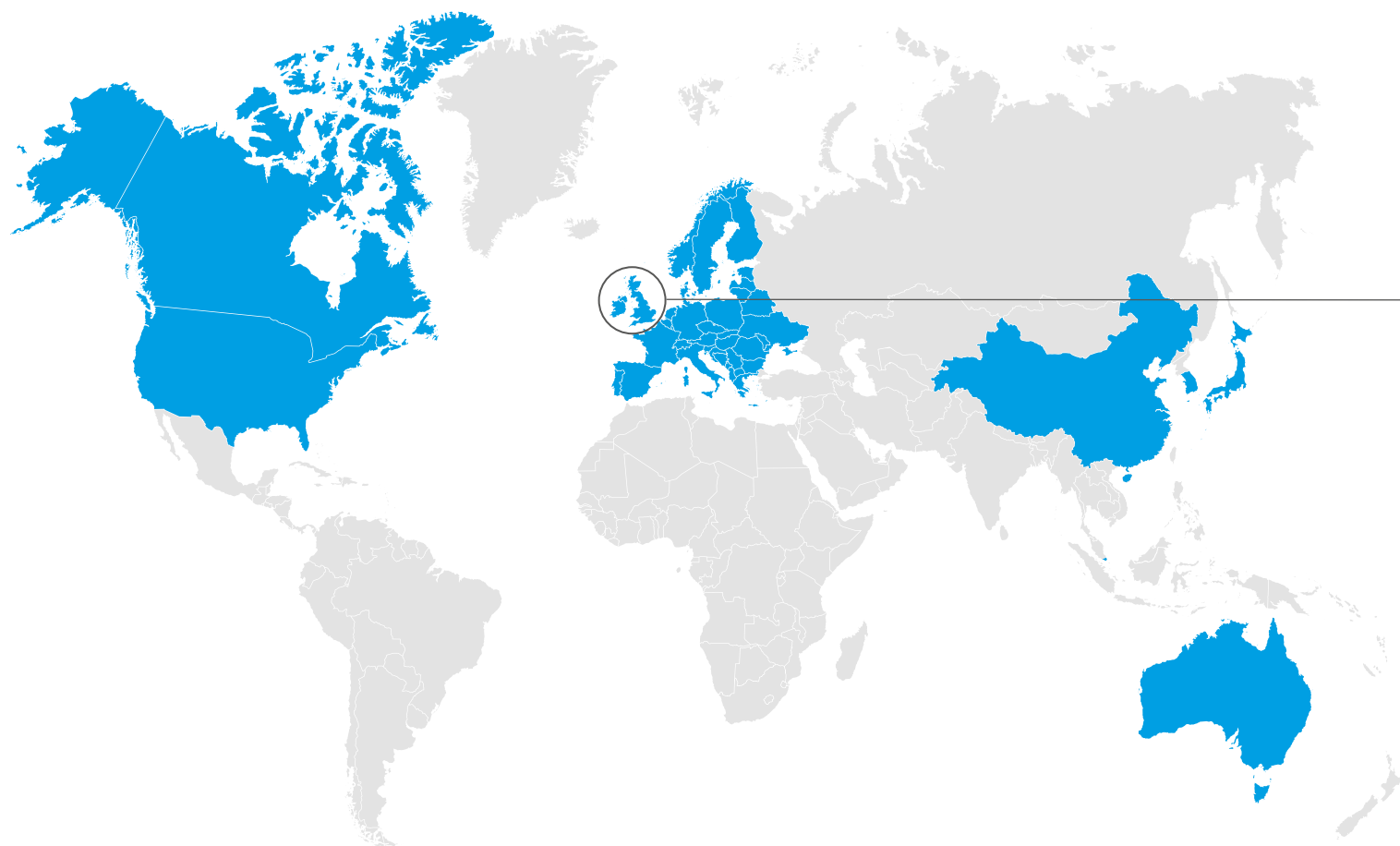
■ Europe



■ China
■ Japan
■ Singapore
■ South Korea



■ Australia



To find out more about us
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UK and Republic of Ireland collaborative engagement

We work with companies and institutions across the UK and Republic of Ireland.



● **Horizon 2020 grant**

Develop and validate a 'donor-to-patient' automated system for the manufacture of therapeutic stem cells with the **National University of Ireland** and partners.

● **Horizon 2020 grant**

Establish a clinical trial of a tissue-engineered trachea within Europe with **Videregen** and partners.

● **Innovate UK grant**

Development of a replacement trachea with **Videregen** and partners.

● **Innovate UK grant**

Working with **Athersys** on a phase one study for acute respiratory distress syndrome.

● **Medical Research Council grant**

Progress a macrophage therapy for liver cirrhosis with **University of Edinburgh** and partners.

● **Innovate UK grant**

Enhance vector bioprocessing technologies for cell and gene therapies with **Synpromics**.

○ **Innovate UK grant**

Develop tools and protocols for the GMP manufacture of a stem cell-derived exosome product using new bioreactor technologies with **ReNeuron** and partners.

● **Advanced Manufacturing Supply Chain Initiative (AMSCI) grant**

Assess the appropriate reimbursement strategies for genetic therapies in the major European markets with **Oxford BioMedica** and partners.

● **Innovate UK grant**

Expansion of CD133+ cells for use in hematopoietic stem cell therapy with **Plasticell** and partners.

● **Innovate UK grant**

Development of a rapid sterility test to allow real time product release along with high sensitivity approaches to quantify microbial contaminants for in-processing testing with **GSK** and partners.

● **Innovate UK grant**

Develop and evaluate a new small-scale stirred tank bioreactor for regenerative medicine applications with **Sartorius Stedim Biotech Group**.

● **Innovate UK grant**

Allogeneic therapy market assessment with **Azellon** and partners.

● **UK Stem Cell Foundation grant**

Development of a tissue-engineered oesophagus with **University College London** and partners.

○ **Innovate UK grant**

Automation of cell therapy cryostorage processes and future manufacturing facilities with **Cryogatt** and partners.

● **Innovate UK grant**

Development of a microfluidic system for flexible automated cell transduction and selection with **Sphere Fluidics** and partners.

● **Medical Research Council grant**

In vitro and *in vivo* pre-clinical testing of pericyte-engineered grafts with **University of Bristol** and partners.



Jo Johnson MP visits CGT Catapult,
May 2015



Royal Society event, October 2015



Manufacturing centre turf cutting,
November 2015

Shaping the sector

In order to influence and help grow the sector we engage with the wider cell and gene therapy community through events, conferences and by welcoming UK and international delegations to our facilities.



Apr–May 2015

8 April 2015

US Congress and Embassy delegation
*Cell and Gene Therapy Catapult,
London, England*

23 April 2015

Anglo-Nordic Life Science Conference
London, England

20–22 May 2015

World Stem Cells and Regenerative
Medicine Congress
London, England

26 May 2015

Jo Johnson MP, Minister of State
for Universities and Science
*Cell and Gene Therapy Catapult,
London, England*

27–30 May 2015

International Society for Cellular Therapy
Las Vegas, USA



Jun–Aug 2015

3 June 2015

Mr Mahrer, Austrian State
Secretary and delegation
*Cell and Gene Therapy Catapult,
London, England*

24–26 June 2015

International Society for Stem
Cell Research
Stockholm, Sweden

1 July 2015

Sir Martin Donnelly, Permanent
Secretary for the Department of
Business, Innovation and Skills
*Cell and Gene Therapy Catapult,
London, England*

20 July 2015

Participation in the All Party
Parliamentary Group for Life Sciences



Sept–Oct 2015

24–26 September 2015

International Society for Cellular Therapy
Seville, Spain

29–30 September 2015

Phacilitate–Cell and Gene Therapy
Barcelona, Spain

5–6 October 2015

Cells: from Robert Hooke to Cell
Therapy—a 350-year journey
Royal Society, London, England

7–9 October 2015

Stem Cell Meeting on the Mesa
California, USA

14–16 October 2015

BioJapan
Yokohama, Japan



Nov–Dec 2015

12 November 2015

ARM Investor Day
London, England

17 November 2015

Cell and Gene Therapy Catapult
manufacturing centre turf cutting ceremony
Stevenage, England

17 November 2015

The Cell and Gene Therapy Catapult
annual advisory panel meeting
Stevenage, England

19 November 2015

Kanagawa Prefecture
Governor and delegation
*Cell and Gene Therapy Catapult,
London, England*

25–26 November 2015

BioProcess UK
Cambridge, England



Jan–Mar 2016

2–3 February 2016

BioTech and Money
London, England

3–4 February 2016

Cell Therapy Manufacturing
and Gene Therapy Congress
Brussels, Belgium

22 March 2016

Advanced Therapy Ministerial
Taskforce, first meeting with
George Freeman MP

23 March 2016

ELRIG Research and
Innovation Conference
Nottingham, England

29 March 2016

CGT Catapult contributed to the NICE
framework for promising therapies

Looking forward to 2016/17

The fast-paced nature of the cell and gene therapy environment means we are already looking towards the next challenges and opportunities the industry will be facing. We already have some exciting projects in the pipeline over the course of the next 18 months.

- We will officially open our large-scale GMP manufacturing facility, in Stevenage, in 2017. The new centre will feature 12 x 100m² grade B to C clean rooms with associated office space and support services as required by our clients.
- We plan to continue producing support materials for the industry including white papers and presentations by our in-house experts. We will also continue to update our analysis of the UK's capability and capacity in cell and gene therapy GMP manufacturing, our clinical trials and pre-clinical databases and the funding database. The feedback we have from the industry is that these documents continue to be useful.
- In September 2016, together with the UK Regenerative Medicine Platform (UKRMP), we will launch the Inaugural Regenerative Medicine Conference. Building on the success of the 2012 Strategy for Regenerative Medicine and significant investment in the field from the UK Government, the conference will draw together leading players in the field and highlight outstanding research and advances in regenerative medicine from both the UK and internationally.
- We are delighted that the International Society for Cellular Therapy (ISCT) Annual Meeting will be coming to London, England in 2017 with the Cell and Gene Therapy Catapult (CGT Catapult) as co-sponsor. We are already working with ISCT to shape the agenda of the event to ensure it is relevant and has a big impact on the industry. The conference will feature an outstanding line-up of speakers and topics and we hope to see many of you there.
- We also expect to see more outcomes from some of the projects in our portfolio that kicked off right at the start of the CGT Catapult formation. That could include divestment of therapies that we have moved into a position where they are now interesting to investors, SMEs starting to commercialise technology we have developed together or products getting closer to clinic or approval.





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As a global society of clinicians, researchers, regulators, technologists and industry partners, it is critical for us to have regional partners that share our vision to translate cellular therapy innovations into safe and effective therapies to improve patients’ lives worldwide. These partners need to be active in, and able to communicate and work with, all three of our main ISCT member groups – academia, industry and regulatory. Working with the Cell and Gene Therapy Catapult in the UK is critical for a number of initiatives, not least of all, the ISCT 2017 Annual Meeting to be held in London celebrating ISCT’s 25th silver jubilee year in 2017.

Queenie Jang
ISCT Executive Director

Financial highlights

The Cell Therapy Catapult Ltd is an independent private company limited by guarantee incorporated as a not-for-profit research organisation. The financial information in this review is extracted from the consolidated statutory accounts for the Cell Therapy Catapult Ltd for the year ended 31 March 2016.

Turnover

For the year ended 31 March 2016	2016 £'000's	2015 £'000's
Innovate UK core revenue grant funding	14,079	12,221
Innovate UK core capital grant funding	9,428	2,050
Collaborative research and development and other grant income	1,103	861
Commercial income	1,276	315
	25,886	15,447

Company information

Directors

KJ Thompson
Dr JR Brown CBE FRSE (Chairman)
NA Higgins
Professor ML Turner
Professor MJ Whitaker
Dr S Chatfield (appointed 1 January 2016)
Dr SE Foden (appointed 1 January 2016)

Company Secretary

S Crossley

Balance sheet

As at 31 March 2016	2016 £'000's	2015 £'000's
Fixed assets	16,448	9,592
Net current assets	7,937	6,642
Creditors amounts falling due greater than one year	(6,829)	(6,652)
Provisions for liabilities – deferred tax	(3,197)	(1,889)
Net assets	14,359	7,693
Capital and reserves	14,359	7,693

Directors

Professor FM Watt (appointed 1 January 2016)
Professor SJ Hyllner (appointed 1 January 2016)
MB Durdy (appointed 1 January 2016)
Dr NM Mount (appointed 1 January 2016)
Dr S Ward (appointed 1 January 2016)
S Henderson (appointed 1 June 2016)
TPW Edwards (resigned 14 October 2015)
Dr Z Latif (resigned 9 December 2015)

Cell and Gene Therapy Catapult is a trading name of Cell Therapy Catapult, limited by guarantee, registered in England and Wales under company number 07964711 with registered office at 12th Floor Tower Wing, Guy's Hospital, Great Maze Pond, London SE1 9RT.

And last, but certainly not least, we'd like to say thank you to some of the people we have worked with during year, including:

Adaptimmune

Asterias

Asymptote

Athersys

Autostem

Azellon

Cell Medica

Cellular Therapeutics

Centre for Commercialisation of
Regenerative Medicine

Core Facility for Korea HLA-Typed iPSC
Banking (KHIB)

Cranfield University

Cryogatt Systems Limited

CTMCRC

DCPrime

Euram

GE

Great Ormond Street Hospital

GSK

Guy's and St Thomas' NHS
Foundation Trust

Imperial Innovations

Innovate UK

Instytut Gruzlicy I Chorob Pluc

Intercytex

JRI Orthopedics

Kanagawa Prefecture, Japan

King's College London

Klinikum Rechts der Isar der
Technischen Universität München

Loughborough University

Medical University of Vienna

National Health Service

National Health Service
Blood and Transplant

National University of Ireland

New York Stem Cell Foundation

OxfordBioMedica

Plasticell

Queen's University Belfast

ReNeuron

Rexgenero

Roslin Cells

Sartorius Stedum Biotech

Scottish National Blood Transfusion
Service

Sphere Fluidics

Synpromics

Thermo Fisher

TMC Pharma

Tokyo Electron

TrakCel

TxCell

University College London

Università degli studi di Brescia

University Hospital of South Manchester
NHS Foundation Trust

University of Aberdeen

University of Birmingham

University of Bristol

University of Edinburgh

University of Galway

University of Glasgow

University of Liverpool

University of Manchester

University of Utrecht

Videregen



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