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Phase One of the Northern Ireland Biobank to be Established

A collaboration between Queen's University Belfast, the Belfast Health and Social Care Trust (BHSCT) and the University of Ulster will create a unique Biobank of clinical samples to support biomedical research within academia and industry across Northern Ireland.

Phase one of the NI Biobank, led by CCRCB researchers Dr Jacqueline James and Professor Peter Hamilton, will establish a collection of high quality tumour tissues and bloods from consented patients being treated for cancer in the Belfast Trust. This bank of tumour samples will complement both the Experimental Cancer Medicine Centre (ECMC) and the CR-UK Centre initiatives within CCRCB by promoting translational cancer research. Collectively over £1.9M has been secured to develop the infrastructure necessary for tumour banking to be successful. Tissue and bloods will be accrued from individuals with GI, Breast, Lung, Head and Neck, Gynaecological and Genitourinary malignancies; the bank will also support the storage of samples retained during trials undertaken in the NI Cancer Clinical Trials Centre and Network. A collection of readily accessible, high quality, well annotated tumour samples will be essential in the discovery of new biomarkers for cancer prognosis, prediction and indicators of clinical response and will support the approaches in stratified medicine being promoted across the School of Medicine, Dentistry and Biomedical Sciences.

The NI Biobank will be supported by a secure information management

system which will be accessible to data managers in the Northern Ireland Cancer Registry in order to link the tumour samples anonymously with robust clinical and pathological information.

Funding for phase one of the NI Biobank is a syndicate of three partners. Cancer Research-UK has provided funds as part of the Belfast CR-UK Cancer Centre initiative to enhance the research infrastructure within the BHSCT Tissue Pathology department facilitating sample accrual and molecular typing (£430,263). The Health and Social Care Research and Development Division of the Public Health Agency (HSC R&D Division) has awarded a five year grant for £1,495,414 which will support day to day running costs and a number of Biobank staff. The Friends of the Cancer Centre (FOCC) have awarded two grants, one for £58,163 to create an information management system and the other £12,913 for the purchase of a MacroPath Imaging System. The local digital pathology company i-Path Diagnostics have been awarded the tender by Queen's to create and support the IT system for the Biobank.

Mrs Priscilla Clark has been appointed the Administrator for the NI Biobank tumour collection. Priscilla will have responsibility for operational activities of the bank ensuring strategies, policies and development plans are implemented. A key role for the bank administrator will be to liaise with various stakeholders, the University, the BHSCT, HSC R&D Division, CR-UK and the FOCC.



L-R: Dr Tong Lioe (Clinical Lead for Tissue Pathology, BHSCT), Professor Dennis McCance (Director CCRCB), Dr Stephen McQuaid (Tissue Pathology, BHSCT), Dr Jacqueline James (Scientific Director NI Biobank), Professor Peter Hamilton (CCRCB and IT Lead for NI Biobank) and Mrs Priscilla Clark (Administrator NI Biobank)



L-R: Mr Colin Fox (Senior Data Manager NI Cancer Registry), Mr Stuart Harvey (CEO, i-Path Diagnostics Ltd), Mrs Cathy Rooney (Fund Raising Co-ordinator, Friends of the Cancer Centre), Miss Eileen Regan (i-Path Diagnostics Ltd), Professor Peter Hamilton (CCRCB and IT Lead for NI Biobank)



L-R: Professor Peter Hamilton (CCRCB and IT Lead for NI Biobank), Dr Jacqueline James (Scientific Director NI Biobank), Professor Bernadette Hannigan (Director of HSC R&D Division and Chief Scientific Advisor of DHSSPSNI), Professor Dennis McCance (Director CCRCB) and Dr Kate Williamson (CCRCB)

Mitchell Lecture 2010

The Mitchell Lecture was delivered on Thursday 18 November in CCRCB by Dr Frank McCormick. Dr McCormick is the Director of the University of California, San Francisco (UCSF) Helen Diller Family Comprehensive Cancer Center and Associate Dean of the UCSF School of Medicine. Dr McCormick's current research interests centre on the fundamental differences between normal cells and cancer cells that can allow the development of novel therapeutic strategies.

During his visit Dr McCormick met with a number of the Principal Investigators in CCRCB, including the Dean of the School of Medicine, Dentistry and Biomedical Sciences and had an opportunity to talk to the Post-doctoral Research Fellows and Postgraduate students about their ongoing research.



L-R: Professor Dennis McCance, Dr Frank McCormick and Professor Patrick Johnston

Schools Workshop

The second Schools Workshop for AS level students took place in CCRCB on Saturday 2 October. Twenty-three students attended from seven schools across Belfast. The students spent the day carrying out practical experiments in the CCRCB labs alongside ten researchers who kindly gave up their Saturday to instruct them. All experiments were tied in to the AS level Biology curriculum.

At the end of the event, all the students said they would now consider a career in research and more than ten of the students signed up to become volunteers/take part in future fundraising events for Cancer Research UK.

As a follow up to this, an event for Biology teachers across Northern Ireland is now being planned for June 2011. Two further Workshops for students will also be held in 2011 and places will be offered to schools outside Belfast.



CCRCB Director, Professor Dennis McCance, with students at the Schools Workshop

Researchers Attend Lunch for MLAs at Stormont

Cancer Research UK hosted a drop in lunch for MLAs and their staff in November to launch the charity's manifesto for Northern Ireland. Principal Investigators, Professor Ken Mills and Dr Jacqueline James and post-

docs Dr Karl Butterworth and Dr Kyle Matchett had the opportunity to attend and meet the MLAs to raise awareness of the Belfast Cancer Research UK Centre and their current research projects in CCRCB.

The manifesto "How can you help us beat cancer?" can be viewed on the public policy section of the website: www.cancerresearchuk.org.

Belfast Cancer Research UK Centre Update

The first Cancer Research UK Centre Managers' meeting took place on 6 October 2010 in London. Managers attended from the 15 CR-UK Centres throughout the UK. Topics discussed included networking across the Centres, funding guidelines, training and the CR-UK Centres' website. Representing the CR-UK Centres' team was Sally Burtles, Director of Centres and Mags Sara, Head of Centres. There was also a presentation on Local Engagement and Development (LEAD) from Jackie Lacey, Head of LEAD, who mentioned the excellent progress in Belfast with regard to LEAD activities.

In the afternoon, there were three breakout groups discussing improving communication and understanding between basic scientists and clinical researchers, sharing of equipment in the Centres and how to measure the success of the Centres initiative.

A questionnaire was circulated in July asking for views on networking and support for the Centres. Many thanks to everyone who completed it! As a result of the findings, the team are now looking at cross-centre collaborative working including thematic workshops and a skills exchange programme.

A capability tool which would include areas of expertise, a directory of contacts, equipment, facilities and resources for each Centre is also under development.

This was a very valuable meeting, providing an opportunity to network with the other CR-UK Centre Managers, and it is hoped to hold another in six months' time.

If you would like to discuss the Belfast Cancer Research UK Centre Update, please contact Sharon Dunwoody on ext 2189 or at s.dunwoody@qub.ac.uk.

CCN Workshop



CCN Workshop Delegates

The sixth International CCN Workshop was held at the Slieve Donard Hotel, Newcastle from 20–24 October 2010. The meeting was hosted by Dr Sandra Irvine and attracted sixty-six delegates from fifteen different countries including Japan, Australia, Canada and America.

The CCN family was named a decade ago using the initial letter of the first three family members: CYR 61 (cysteine rich protein), CTGF (connective tissue growth factor) and NOV (nephroblastoma overexpressed). There are now six CCN family members which play key roles in development, inflammation and cancer. This workshop allows scientists who normally work in different disciplines to come together and exchange ideas so that progress in one field can be rapidly translated into another. Dr Rick Kendall of Amgen gave the keynote address on Angiogenesis and described some exciting new agents under development by the company.

In addition to all the hard work, delegates were given a tour of Stormont Buildings with a gala dinner as guests of Margaret Richie, MLA and finished the conference with a dinner and traditional Irish music – a sure way to forge future collaborations!

Measures of Esteem

Congratulations to Elena Zaharieva who won the best poster prize at the European Radiation Research Society meeting held in Stockholm and to Colman Trainor who won the best poster prize at the Irish Radiation Research Society Meeting in Dublin.

Professor Kevin Prise has been appointed as an Associate Editor for the Journal, Radiation Research and has joined the committee of the Irish Radiation Research Society.

Dr Dean Fennell has been elected to the Board of Directors, International Mesothelioma Interest Group (IMIG) and has been invited to the Faculty and Planning Committee, ASCO NCI EORTC Molecular Markers Meeting 2010, Hollywood, Florida.

Congratulations to Professor Karl J. Hale who has been awarded a prestigious Japan Society for the Promotion of Science (JSPS) Invitation Research Fellowship for the year 2010-2011.

Launch of BRCALINK Northern Ireland Website

To celebrate the launch of a new website to support women across Northern Ireland who carry the BRCA gene, twenty-five women affected were invited to visit the labs in CCRCB. Women who carry this gene have a high risk of developing breast/ovarian cancer. The visit was organised by Dr Jenny Quinn, a CCRCB Scientific Fellow within the BRCA1 group who receives funding from Breast Cancer Campaign and Helen Barnes, the CR-UK Centre LEAD Manager.

BRCALINK is the brainchild of Hazel Carson. Hazel who is in her mid-thirties discovered that she was a carrier for the BRCA gene after her mother died from breast cancer and her aunt also developed the disease. Hazel had prophylactic surgery (double mastectomy and total abdominal hysterectomy) to reduce the risk of developing breast and ovarian cancer.

Before her surgery, Hazel had lots of questions and was keen to get in touch with other people who had had similar experiences. The website provides the opportunity for people to link up and get the information and support they require.

The group had a presentation about current research into the BRCA gene by Dr Jenny Quinn and also heard from surgical registrar, Dr Gareth Irwin and genetic counsellor, Lisa Jeffers. They then toured the



L-R: Dr Gareth Irwin, Dr Jenny Quinn, Hazel Carson, Lisa Jeffers and Helen Barnes

BRCA1 labs and chatted to BRCA1 group researchers about their work. To find out more, visit the website: www.brcani.webs.com.

Cancer TRG Annual Meeting

The Cancer TRG Annual Meeting was held in the Centre for Rehabilitation Research at the University of Ulster at Jordanstown on 15 October 2010. The event was attended by over 120 people from Queen's University and University of Ulster and included staff, students, scientists, nurses and allied health professionals.

The guest speakers were Professor Kinta Beaver from University of Central Lancashire, Dr Margaret Ashcroft from University College London and Dr Richard Kennedy from Almac. As well as the presentations from the external speakers, twenty-seven presentations were given in the breakout sessions and Cancer Care Group Programme.

Congratulations to two researchers from CCRCB for winning the following prizes - Adam Pickard for best poster in the Cell Biology Category entitled "The stromal function of the retinoblastoma protein in controlling differentiation and cancer cell invasion" and Joanna Majkut for the best poster in the Molecular Biology Category entitled "RXDL conserved binding motifs of DED domains in cFLIPs are critical for its functioning".

Roche Prize 2010

Congratulations to Marie Breen, CCRCB, who won the 2010 Roche Prize for her presentation entitled "EpoR over-expression in TEL-AML1 positive ALL: Critical Roles for DNA Methylation, GATA-2 or microRNAs?". Marie is a final year PhD student supervised by Professors Ken Mills and Terry Lappin.

The Roche Researcher of the Year Award is an event launched by Roche Diagnostics Ireland designed to highlight and support excellence in life science research within the academic centres of Ireland, both in the Republic and Northern Ireland.

Nominated scientists from every university in Ireland are represented at this meeting and each individual presents their scientific paper for independent adjudication by senior academic members from the Irish research community.

Marie was presented with a medal and a bursary of £400 by Julie McAlinden, Roche representative, on Friday 12 November at CCRCB. She was also selected to represent CCRCB at the Roche Research of the Year Award at The Westbury Hotel, Dublin on 25 November.

CCRCB Director, Professor Dennis McCance said: "This is an important prize as it showcases the work of many Centres within the island of Ireland and we wish Marie well in the final competition."



Marie Breen

Bladder Cancer Biomarker Study

Kate Williamson (CCRCB), Michael Stevenson (Centre for Public Health), Frank Emmert-Streib (CCRCB), Joe O'Sullivan (CCRCB) and Peter Hamilton (CCRCB) obtained £382,706 from Randox Laboratories, Crumlin to undertake a Bladder Cancer Biomarker Study.

Currently, there is no definitive test for the diagnosis of bladder cancer and this places a significant burden on healthcare resources. Costly investigations are required to rule out bladder cancer in all patients who present with unexplained blood in their urine. However, only one in twenty people who report blood in their urine will ultimately be diagnosed with bladder cancer. A team of scientists from CCRCB, led by Dr Kate Williamson, scientists from Randox Laboratories, Crumlin and urologists from throughout Northern Ireland have been working to address this healthcare issue. Their aim is to create a diagnostic algorithm based on the levels of biomarkers found in urine and blood, which will be able to identify the people with bladder cancer. The

algorithm will be translated onto a biochip format, which will allow the levels of multiple proteins to be measured quickly and accurately using technology developed by Randox. The team has already completed a pilot study (funded by Randox) and building on this success, have designed a trial, which will start in April 2011 and last for three years. Randox will also be funding the costs of the trial and will undertake all protein analyses. The trial will recruit one thousand patients who have reported blood in their urine; one third of whom will have bladder cancer. The remaining 667 patients will have proven negative results from all investigations for bladder cancer, and will act as controls in the study. The researchers will be working closely with the Northern Ireland Cancer Clinical Trials Centre, based at the Belfast City Hospital.

The Lead Investigator, Kate Williamson said: "I am very excited about the opportunities that this funding will provide. We will be able to create the diagnostic algorithms and at the same time to increase our understanding

of the protein pathways involved during the pathophysiology of bladder cancer. Both of these outcomes will be incredibly important for the management of patients with bladder cancer and future research hypotheses."

Mr Brian Duggan, Consultant Urologist at the Belfast City Hospital and Lead Clinician in the trial, commented: "Kate and I have been working on this project for several years. We now have the networks and the funding in place and this will allow us to construct diagnostic algorithms for subsequent testing in the clinics."

Dr Peter Fitzgerald, Managing Director at Randox Laboratories and trial sponsor, added: "Using our Biochip Array Technology together with the diagnostic classifier will enable clinicians to screen patients considered at risk of bladder cancer, resulting in a less invasive test, high throughput screening, earlier detection and significant savings to the NHS."

CCRCB Photo Gallery



The CCRCB turned pink on Friday 29 October 2010 with an array of pink goodies and coffee to raise funds for Breast Cancer Campaign. The event was a great success raising a total of £455, exceeding last year's figure of £430



Professor Ken Mills received a donation of £1,156.50 from Ann Moore, Miriam English and Rosie Baxter who took part in walking the Belfast City Marathon on 3 May 2010 in aid of the NI Leukaemia Research Fund



Ruari Hunter from Cushendall presents Dr Alex Thompson with a cheque for £2,948.49, which he raised by taking part in a Half Marathon and an organised run, for the NI Leukaemia Research Fund



CCRCB researchers from Karen McCloskey's group at the International Continence Society Meeting in Toronto, August 2010, pictured with EU FP7 and Japanese collaborators



CR-UK Researchers take part in a photo shoot to launch Breast Cancer Awareness Month

Recent Grants Awarded

Investigator(s): Jackie James, Peter Hamilton, Kate Williamson and Dennis McCance
Sponsor: HSC R&D Division
Title: The Northern Ireland Biobank
Amount: £1,495,414
Period: 01/07/10 - 30/06/15

Investigator(s): Jackie James and Peter Hamilton
Sponsor: Friends of the Cancer Centre
Title: Implementation of an IT Management System to the Northern Ireland Biobank
Amount: £58,163
Period: 01/09/10 - 31/08/13

Investigator(s): Dean Fennell, Kevin Prise, Shu-Dong Zhang and Jennifer Quinn
Sponsor: British Lung Foundation
Title: Synthetic Lethal Targeting of BRCA1 Deficient Non-Small Cell Lung Cancer for Effective Therapy
Amount: £119,953
Period: 01/01/11 - 31/12/12

Investigator(s): Dean Fennell
Sponsor: Pierre Fabre
Title: Vinorelbine Versus Best Supportive Care in Second Line Treatment of Mesothelioma: A Phase III Trial and Development of a Companion Diagnostic
Amount: £20,000
Period: 01/09/10 - 31/08/12

Investigator(s): Giuseppe Schettino
Sponsor: EPSRC
Title: Development of a Hard X-Ray Microfocus Apparatus for Radiobiological Studies
Amount: £125,000
Period: 01/03/11 - 28/02/13

Investigator(s): Giuseppe Schettino and Lorenzo Manti
Sponsor: Royal Society (International Travel Grant)
Title: Evaluation and Comparison of the DNA Damage and Resulting Biological Effects Therapeutically Relevant Ion Beams on Live Cells
Amount: £2,895
Period: 01/11/10 - 29/02/11

Investigator(s): Kate Williamson, Peter Hamilton, Joe O'Sullivan, Michael Stevenson and Frank Emmert-Streib
Sponsor: Randox
Title: Bladder Biomarker Trial
Amount: £382,706
Period: 01/04/11 - 31/03/14

Investigator(s): Tom Flannery and Chris Scott
Sponsor: The Royal College of Surgeons of Edinburgh
Title: Investigate the Effect of Cathepsin Inhibitors as an Anti-invasive Strategy in an Orthotopic Mouse Glioma Model
Amount: £7,000
Period: 01/11/10 - 31/10/11

Investigator(s): Marie Migaud, Chris Hardacre, Brendan Gilmore, Chris Scott, Kevin Prise and Clifford Taggart
Sponsor: EPSRC
Title: Cross-Disciplinary Feasibility Account - Enabling Phosphorus and Peptide Based Chemical Biology Using Ionic Liquids
Amount: £201,658
Period: 01/10/10 - 31/12/11

Investigator(s): Kevin Prise and Giuseppe Schettino
Sponsor: European Union FP7
Title: EPIRADBIO - Combining Epidemiology and Radiobiology to Assess Cancer Risks in the Breast, Lung, Thyroid and Digestive Tract After Exposure to Ionizing Radiation with Total Doses in the Order of 100 mSc or Below
Amount: £242,056
Period: 01/04/11 - 31/03/14

Investigator(s): Joe O'Sullivan, Kevin Prise and Alan Hounsell
Sponsor: Belfast CR-UK Centre
Title: Clinical Fellowship (Aidan Cole): Biological Implications of Physiological Movement in Modulated Beam Radiotherapy
Amount: £235,040
Period: 01/01/11 - 31/12/13

Dr Jack Kyle's Visit to CCRCB



L-R: Dr Jack Kyle with Professor Ken Mills

Rugby legend Dr Jack Kyle (formerly of Ulster, Ireland and the British and Irish Lions) visited CCRCB on 24 August 2010. Dr Kyle toured the laboratory facilities and met with a number of scientists working in the area of leukaemia research.

As part of his visit Dr Kyle signed a 2010-2011 season Ulster Rugby shirt, which was raffled in aid of the Northern Ireland Leukaemia Research Fund. The total amount raised was £377. We would like to thank Dr Kyle for his support to the NILRF.

Volunteer at Christmas

Researchers and staff from within CCRCB are being invited to volunteer for a half day in one of the local Cancer Research UK shops in the run up to Christmas. More than fifteen researchers volunteered in December last year and thoroughly enjoyed getting their hands dirty and carrying out the range of activities that go on behind the scenes in the shops, including sorting clothes and books and pricing items to go on display.

Principal Investigator, Dr Glenn Dickson, who volunteered in the Newtownards shop last year said: "I really enjoyed meeting the volunteers and working alongside them. It was a real insight to see how hard they all worked and how dedicated they were to raising as much money as possible to support local research."

If you would like to volunteer this year, please contact Helen Barnes at helen.barnes@cancer.org.uk.

Scottish LEAD Managers Visit Belfast CR-UK Centre

The Local Engagement and Development Managers from the Cancer Research UK Centres in Dundee, Glasgow and Edinburgh visited Belfast in October to meet local researchers and take part in a lab tour for local Rotary Clubs. All three managers will be leading programmes of local engagement in their own Centres and it was the perfect opportunity to share best practice.

It is hoped that going forward there will be good links established between the CR-UK Centres across the UK as there are overlaps in some of the areas of research and collaboration is key to the CR-UK Centres' strategy.



L-R: Kirsteen Campbell, Glasgow; Sarah Muir, Dundee; Helen Barnes and Dawn Ewing, Edinburgh



Dr Hilary Russell

MA in Research Ethics

Congratulations to Dr Hilary Russell who was awarded an MA in Research Ethics from the Centre for Professional Ethics, Faculty of Law at Keele University in July 2010. This two year course at Keele was supported by Queen's Staff Training and Development Unit and the Office for Research Ethics Committees for Northern Ireland (ORECNI).

The title of Dr Russell's dissertation was 'The moral dilemmas when the

physician is also the researcher'. The ethical issues underlying modern research are increasingly important for all in the University and particularly those engaged in biomedical research.

Dr Russell currently chairs the Northern Ireland Research Ethics Committee with the remit for Phase 1 Clinical Trials and is also a member of the NRES Phase 1 Advisory Committee and the University Research Ethics Committee.

Recent Publications

ALTAY, G. and EMMERT-STREIB, F. (2010) Local network-based measures to assess the inferability of different regulatory networks, *IET Systems Biology*, 2010 July, 4(4), p277-88.

ALTAY, G. and EMMERT-STREIB, F. (2010) Revealing differences in gene network inference algorithms on the network level by ensemble methods, *Bioinformatics*, 2010 July 15, 26(14), p1738-44.

ALTAY, G. and EMMERT-STREIB, F. (2010) Inferring the conservative causal core of gene regulatory networks, *BMC Systems Biology*, 2010 September, 28;4:132.

BUTTERWORTH, K.T., COULTER, J.A., JAIN, S., FORKER, J., MCMAHON, S.J., SCETTINO, G., PRISE, K.M., CURRELL, F.J. and HIRST, D.G. (2010) Evaluation of cytotoxicity and radiation enhancement using 1.9 nm gold particles: potential application for cancer therapy, *Nanotechnology*, 21(29):295101.

EMMERT-STREIB, F. (2010) Statistic complexity: combining kolmogorov complexity with an ensemble approach, *PLoS One*, 2010 August, 26;5(8):e12256.

JAIN, S., COULTER, J.A., HOUNSELL, A.R., BUTTERWORTH, K.T., MCMAHON, S.J., PRISE, K.M., CURRELL, F.J., O'SULLIVAN, J.M. and HIRST, D.G. Cell specific radiosensitization by gold nanoparticles at megavoltage radiation energies, *International Journal of Radiation Oncology Biology and Physics* (In press).

JOHNSTON, L., WOOLSEY, S., CUNNINGHAM, R.M., O'KANE, H., DUGGAN, B., KEANE, P. and MCCLOSKEY, K.D. (2010) Morphological expression of KIT positive interstitial cells of Cajal in human bladder, *J Uro*, July, 184(1) p370-7.

KAVANAGH, J.N., CURRELL, F.J., TIMSON, D.J., HOLZSCHEITER, M.H., BASSLER, N., HERRMAN, N.R., PRISE, K.M. and SCETTINO, G. (2010) Experimental set up and first measurement of DNA damage induced along and around an antiproton beam, *European Journal of Physics D*, 60(1), p209-214.

LAPPIN, T. (2010) Dual control: the HIF-2 regulator, *Blood*, 21 October 2010, Vol 116, Number 16.

MCKENNA, D.J., MCDADE, S., PATEL, D. and MCCANCE, D.J. (2010) MicroRNA 203 expression in keratinocytes is dependent on regulation of p53 levels by E6, *J Virol*, 84:10644-52.

PRISE, K.M. and SCETTINO, G. Microbeams in radiation biology: Review and critical comparison, *Radiation Protection Dosimetry* (In press).

RICHARD, D.J., SAVAGE, K., BOLDESON, E., CUBEDDU, L., SO, S., GHITA, M., CHEN, D., WHITE, M.F., PRISE, K.M., SCETTINO, G. and KHANNA, K.K. hSSB1 rapidly binds at the sites of DNA double strand breaks and is required for the efficient recruitment of the MRN complex, *Nucleic Acid Research* (In press).

SCETTINO, G., GHITA, M. and PRISE, K.M. (2010) Spatio-temporal analysis of DNA damage repair using the X-ray microbeam, *European Physical Journal D*, 60, p157-161.

SCETTINO, G., GHITA, M., RICHARD, D.J. and PRISE, K.M. Spatio-temporal investigations of DNA damage repair using microbeams, *Radiation Protection Dosimetry* (In press).

Events 2011

IACR 2011 Annual Meeting

2-4 March 2011

Rochestown Park Hotel, Cork, Ireland

2011 International Conference on Molecular Clinical Oncology

26-28 May 2011

Torino, Italy

The meeting will focus on Molecular Clinical Oncology, a novel discipline translating cancer genetics into medicine. For further information and registration please refer to:

www.cancercoop.org

or contact:

mol-clin-onc@cancercoop.org

CCRCB Events

Bioinformatics Review

Scientific Review of Cancer Bioinformatics

19-20 January 2011

Health Sciences Building, Queen's University Belfast

Annual Conference of EU FP7 Consortium 'INComb' "Combating incontinence: from basic science to clinical practice"

19-22 January 2011

Europa Hotel, Belfast

Bioinformatics Conference

Quantitative Biology and Bioinformatics in Modern Medicine (2nd International Conference)

7-8 February 2011

Conway Institute, University College Dublin, Ireland

For further information and registration please refer to:

<http://www.qub.ac.uk/QuantBio>

Scientific Advisory Board Visit

Third Review Visit of Scientific Advisory Board

23-24 March 2011

CCRCB Building, Queen's University Belfast

Third International CCRCB Symposium

"Challenges in Cancer"

7-8 September 2011

Waterfront Hall, Belfast

New Appointments

Welcome to the following new staff who have recently joined the Centre:

Research Staff:

Ms Samira Bouazzaoui
Dr Jonathan Coulter
Dr Ricardo De Matos Simoes
Dr Kishore Gaddale Devanna
Dr Sarah Dolan
Dr Philip Dunne
Dr Murugan Kalimutho
Dr Mary McMahan
Dr Keiara Redmond

Academic Staff:

Dr Shozeb Haider

Administrative Staff:

Mrs Priscilla Clark

Technical Staff:

Ms Paula Haddock

Clinical Research Fellows:

Dr Darren Brady
Dr Aidan Cole
Dr Sonali Dasgupta

New Research Students

Welcome to the following postgraduate students who have commenced their research studies at CCRCB this academic year:

Students:

Eliana Barros
Darren Brady
Laura Campbell
Robbie Carson
David Cochrane
Aidan Cole
Marta Crudden
Sonali Dagsputa
Owen Diamond
Emily Fee
Jodie Hay
Alexandra Henry
Lynsey Hinds
Claire Jones
Gemma Logan
Bronagh McDonnell
Jessica Neisen
Katy Orr
Joel Riley
Laura Taggart
Ben Wilson

Supervisors:

P. Harkin / P. Mullan
J. O'Sullivan / K. Prise
D. Waugh / D. Fennell
P. Johnston / S. Van Schaeysbroeck
P. Harkin / J. Quinn
J. O'Sullivan / K. Prise / A. Hounsell
D. Waugh / D. McCance
R. Wilson / S. Van Schaeysbroeck
G. Dickson / J. Orr
J. Murray / D. McCance
K. Mills / A. Thompson
D. McCance / P. Mullan
H. Russell / J. Price (BCH)
R. Wilson / T. Diamond / T. Lynch
K. Mills / M. Percy
K. McCloskey / K. Prise
D. Waugh / J. O'Sullivan
P. Mullan / D. Waugh
D. Longley / S. Van Schaeysbroeck
G. Schettino / F. Currell
D. Fennell / D. Longley