**Surname**: Gannon

**First names:** Bernard Francis Xavier (Frank)

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Born: Sligo, Ireland

<u>Languages</u>: English (mother tongue)

French (excellent) German (fair) Irish (good)

**Education** 

Secondary:

1960 – 1966 Summerhill College, Sligo, Ireland

**Leaving Certificate** 

University:

1966 – 1970 University College, Galway, Ireland

B.Sc. (Hons):

Subject: Biochemistry

1973 University of Leicester, England

Ph.D. Degree:

Title: L-serine dehydratase from Arthrobacter globiformis

Director: Sir Hans L. Kornberg Supervisor: Dr. K.M. Jones

1973 – 1975 Department of Biochemistry

University of Wisconsin, Madison, Wisconsin, U.S.A.

Postdoctoral Fellow with Prof. Jack Gorski Topic: The Estrogen Receptor Protein

1975 – 1981 Faculté de Medicine, and INSERM unit, University of Strasbourg

France

Postdoctoral Fellow with Prof. Pierre Chambon

Topic: Use of Recombinant DNA techniques to study the structure and

control of expression of Estrogen responsive Genes

# **Current Appointment**

2011 – present Director and CEO, QIMR Berghofer Medical Research Institute,

Brisbane, Australia

## **Professional Appointments**

1977 – 1981	Chargé de Recherche of the Institut National de la Santé et de la Recherche Medicale (INSERM), Director: Professor Pierre Chambon
1981 – 1994	Department of Microbiology, University College, Galway, Ireland
1981 – 1990	Statutory Lecturer
1990 – 1994	Associate Professor Special responsibility for Biotechnology at UCG Director of Research Group Research Topics: - The control of expression of Eukaryotic Genes - DNA Probes for the identification of Micro-organisms
1987 – 1994	Founding Director, The National Diagnostics Centre, University College Galway This was established by the Irish Government in 1987 to accelerate the transfer of Biotechnology to Industry. In 1994, the earnings of the Centre had reached £1,000.000, growing at a rate of 25% per annum.
1989 – present	Founder and Member of the Board of Bimini (Ireland)
1994 – 2007	Executive Director of the European Molecular Biology Organisation (EMBO) Senior Scientist at EMBL Associate Editor of The EMBO Journal
1994 – 1999	Scientific Coordinator EMBL
1995 – 1997	Coordinator Structural Biology and Bio-computing programme at EMBL
1999 – 2002	Adjunct Professor, National University of Ireland, Galway (Honorary)
1999 – 2006	Member of the Board of Eurogentec (Belgium)

2000 – 2009	Founding Senior Editor, EMBO Reports
2001 – 2007	Secretary General, European Molecular Biology Conference, (EMBC)
2002 – 2007	Member of the Board of Phenex (Germany)
2002 – 2004 & 2007 – 2010	Member of the Board of Science Foundation Ireland
2007 – 2010	Director General, Science Foundation Ireland
2005 – 2008	Associate Editor of Molecular Systems Biology
2006 – present	Founder and Scientific Board member of Elara Pharmaceuticals
2007 – 2010	Member of Forfás Board
2009 – 2010	Member of the Innovation Taskforce established by the Irish Government
2011 – present	Director and CEO, QIMR Berghofer Medical Research Institute, Brisbane, Australia
2011 – present	Adjunct Professor, Institute for Molecular Bioscience and the UQ Centre for Clinical Research, The University of Queensland
2011 – present	Member, Herston Imaging Research Facility (HIRF) Executive Committee
2013 – present	Board Member, Association of Australian Medical Research Institutes (AAMRI)
2013 – present	Member, Herston Health Precinct Redevelopment Taskforce
2013 – present	Board Member, Queensland Head and Neck Cancer Centre (QHNCC)
2014 – present	Board Member, Brisbane Diamantina Health Partners (BDHP)
2014 – present	Chair, Q-Pharm Pty Limited

# **Research Grants**

- The European Community; Multiple awards in each of FP4, FP5, FP6 and FP7, Programmes
- Diverse Irish agency awards (NBST, EOLAS, FORBAIRT, TEAGASC, Health Research Board, The Irish Cancer Society)
- Industries including; Abbott Laboratories, Schering-Plough, Wyeth, Merck Sharpe and Dohme

# Memberships in Scientific Committees

1980 – 2008	Ph.D. Thesis examiner in France, Belgium, Ireland, and England
1980 – present	Reviewer of grant proposals and for research journals
1981 – 1994	Member of EC experts committees for: The Human Genome Project, Human Capital and Mobility and Biotechnology
1992 – 1994	Member of the Scientific Committee of the Health Research Board Ireland
1993	Invited Reviewer of the EC activities in Biotechnology in China
1994	Member of the Science, Technology and Innovation Advisory Council established by the Irish Government and co-author of the resulting Policy Report "Making Knowledge Work for Us" from that Council.
1996 – 1999	Member of the Scientific Advisory Committee of the SARS International Center, Bergen
1997 – 1998	Member of the European Science and Technology Assembly (ESTA)
1997 - 2003	Advisor to the Asia Pacific Rim International Molecular Biology Network (AIMBN)
1998 - 2003	Member of the Scientific Council of the Stazione Zoologica, 'Anton Dohrn', Naples
1998 - 2006	Member of the International Advisory Board of the International Institute for Molecular and Cell Biology, Warsaw
1998 - 2006	Member of the International Advisory Board for the Institute of Infectious Disease and Molecular Medicine at UCT, Capetown
1998 – present	Member of the International Advisory Board for the Institute for Molecular Bioscience, Brisbane, Australia
1999 – 2007	Member of the External Advisory Group of the Marie Curie Programme
1999 – 2003	Member of the Scientific Advisory Board of BioReliance (USA)
2002 – 2007	Member of the External Advisory Group for the EC Mobility and Training Programme
2004 – 2005	Chair of the Biomedical Selection Panel for the European Young Investigator Award (EURYI)

2004 – present	Member of the Advisory Board of the Molecules and Cells, the Official Publication of the Korean Society for Molecular and Cellular Biology
2004 – 2007	Member of the NCBES Advisory Board, The National Centre for Biomedical Engineering Science, Galway, Ireland
2004 – 2006	Member of the Scientific Advisory Board of Evotec-OAI
2005 – 2007	Member of the International Advisory Board for Biotechnology for the King of Jordan
2008 – present	Member of Scientific Advisory Committee of the International Union of Biochemistry and Molecular Biology (IUBMB)
2008 –2011	Member of the European Research Area Advisory Board (ERAB), established to advise the EU Commissioner for Research
2008 – 2011	Member of the EUROHORCS (Heads of Europea Research Councils) and member of the Steering Committee of that Organization

# **Extramural Activities**

1983 – 1986	Consultant to Sanofi-Elf BioReserche
1984	Advisor to the F.A.O. Karnal India
1992	Jury Member Prix Franqui, Brussels
1995	Jury Member Prix Joseph Maisin, Brussels
1998 – 2000	Coordinator of EU funded EBNIC (European Biotechnology Node for Interaction with China)

# <u>Awards</u>

1972	Medal of the Irish Biology Society
1989	Elected member of EMBO
1993	Society of Industrial Microbiology Pan Labs Award
1999	Doctor Honoris Causa was awarded by the Josef Attila University, Szeged, Hungary
2005	Elected member of Academia Europea
2006	NUI Galway Alumni Award for Natural Sciences

2007	Elected member of the Royal Irish Academy
2007	Awarded Diplome d'Honneur from the Federation of European Biochemical Societies (FEBS)
2008	Doctor Honoris Causa, Queens University, Belfast, Northern Ireland
2008	Doctor Honoris Causa, University of Queensland, Brisbane, Australia
2008	Elected Member of the Mexican Academy of Medicine
2009	The Sam Haughton Medal from the Royal Academy of Medicine in Ireland
2009	Elected member of the European Academy of Cancer Sciences
2012	Fellow of the Queensland Academy of Arts and Science
2014	Elected Fellow of the Australian Academy of Health and Medical Sciences

#### **Other Activities**

Invited Speaker on numerous occasions to meetings in Australia, Belgium, Canada, China, Czech Republic, Croatia, Denmark, England, France, Germany, Holland, India, Ireland, Italy, Japan, Korea, Poland, Portugal, Scotland, South Africa, Spain, Switzerland, USA

#### <u>Lectures/Presentations 2011 – present</u>

- Welcome address to Year 11/12 Senior Science Students from the National Youth Science Forum, QIMR, 24 February, 2011
- The Redfern Lecture "Switched on by the Estrogen Receptor", invited lecturer, University of Leicester Department of Biochemistry 50<sup>th</sup> Anniversary Celebration, Leicester, United Kingdom, 21 June, 2011
- "How the Estrogen Receptor Switches on Genes", invited speaker, UQCCR Seminar Series, Brisbane, 7 July, 2011
- "How the oestrogen receptor works and why this is important", invited speaker, The 20<sup>th</sup> Annual RBWH Health Care Symposium, Brisbane, 11 October, 2011
- "Switched on by Estrogens", invited lecturer, The John Curtin School of Medical Research, Canberra, 14 October, 2011
- Guest speaker at the QUT Vice-Chancellor's Forum, Queensland University of Technology (QUT), 9 February, 2012
- "Understanding how the oestrogen receptor works: Does it matter to clinicians?", invited presenter RBWH Medical Grand Rounds, 10 September, 2012
- "Developing broader collaborations to accelerate medical research, building new directions", invited speaker, QTHA Conference, Brisbane, 18 September, 2012

- "Controlling gene expression", invited speaker, 15<sup>th</sup> A-IMBN Annual Conference Shanghai, China, 22-24 October, 2012
- "How the Estrogen Receptor works and how to stop it", invited lecturer, Eskitis Institute for Cell and Molecular Therapies, Griffith University, 15 November, 2012
- "A European Perspective", invited speaker, NHMRC Peer Review Symposium Evolutions in peer review: Decision making strategies for the best return on
   investment of public funds. Canberra, 21 February, 2013
- "Is Research Useful?", invited speaker, The Australian Medical Student's Association (AMSA), Gold Coast, 11 July, 2013
- Guest Speaker ,The University of Queensland graduation ceremony for students of the Faculty of Science, UQ, 18 July, 2013
- "How the estrogen receptor switches on a gene", Invited speaker, TRI Lecture Series, TRI, 6 August, 2013
- "Innovative Models for Drug Discovery & Vaccine Development through Partnerships", Chair and Invited speaker, India Bio 2014 Conference, Bangalore, India, 11 February, 2014
- "Making a difference by working together", Invited speaker, 10<sup>th</sup> Indo-Australian Conference on Biotechnology – Epithelial Development, Function and Disease: New Frontiers and Therapies, Manipal University, India, 13 April, 2014
- "Controlling gene expression by the estrogen receptor", invited lecturer, National Centre for Biological Sciences, Bangalore, India, 14 April, 2014
- Tests Tissues Trials Meeting, invited Co-Chair Session 2: Molecular Diagnostics at the PAH-TRI, Translational Research Institute (TRI), Brisbane, 22 May, 2014
- "Satisfaction in Life: Choices in research topics and career pathways", invited Keynote Speaker, ASMR Queensland Postgraduate Student Conference, TRI, 28 May, 2014
- Chair: Human Health and Medical Research Session, Queensland-Shanghai Science and Technology Innovation Forum 2014, QUT, 2 June, 2014
- Invited speaker, Queensland Vaccine Development Opportunities, LSQ Breakfast, Bio International Convention, San Diego, California, USA, 23 June, 2014
- "I came to Galway to study Bio, and you would never believe what happened", Invited speaker, NUI Galway Biochemistry 50 Year Anniversary Symposium, Galway, Ireland, 10 July, 2014
- "Is Translational just a buzz word?", invited speaker, The Future of Medical Research Conference, Sydney, 26 September, 2014
- "The estrogen receptor and me", invited speaker, 2014 Leaders in Science and Medicine seminar series, Garvan Institute, Sydney, 29 September, 2014
- "New insights better cure?", invited speaker, How to efficiently translate discoveries into therapies, Personalized Medicine Session, Discussion Leader, EMBO Conference – Stem Cells and Epigenetics in Cancer, Hong Kong, 17 October, 2014
- Invited speaker and moderator, Session 2 Models of Translation Discovery Translation Models, TRX14: Translational Research Excellence, Brisbane, 24 October, 2014

- "The connection between Medical Research and Business", invited orator, Millis Oration, AusBiotech National Conference, Gold Coast, 30 October, 2014
- "Molecular understanding of obesity related carcinogenesis endometrial cancer as a disease model", invited speaker, Brisbane Gynaecological Cancer Research Symposium, TRI, Brisbane, 31 October, 2014
- "Placing Brisbane at the forefront of cancer translational research", invited Plenary Lecturer, Brisbane Cancer Conference, Brisbane, 19 December, 2014
- Invited guest speaker, South Brisbane Rotary Club, 15 April, 2015
- "Gene Regulation", invited plenary speaker, Science on the Swan, Perth, 22 April, 2015
- "Responding to change", Faculty seminar speaker, QIMR Berghofer, 30 April, 2015
- "Expression in different contexts", invited speaker, QUT School of Biomedical Sciences seminar series, QUT Gardens Point Campus, 15 May, 2015
- "A city built on knowledge", Asia Pacific Cities Summit and Mayor's Forum, BCEC, Brisbane, 6 July, 2015

#### Publications in Peer Reviewed Journals (h-index 45)

- 1. Gannon, F. and Gorski, J. (1976) Nuclear binding of the estrogen receptor in whole uteri. **Steroids** 28, 669-697.
- 2. Gannon, F., Bridgeland, E.S. and Jones, K.M. (1977) L-serine dehydratase from *Arthrobacter globiformis*. **Biochemical Journal** 161, 345-355.
- 3. Gannon, F. and Jones, K.M. (1977) An activity strain for L-serine dehydratase in polyacrylamide gels. **Analytical Biochemistry** 79, 594-596.
- 4. Bellard, M., Gannon, F. and Chambon, P. (1978) Nucleosome structure III: The structure and transcriptional activity of the chromatin containing the ovalbumin and globin genes in chick oviduct nuclei. **Cold Spring Harbor Symp. On Chromatin** XLII, 779-791.
- 5. Mandel, J.L., Breathnach, R., Gerlinger, P., Le Meur, M., Gannon, F. and Chambon, P. (1978) Organization of coding and intervening sequences in the chicken ovalbumin split gene. **Cell** 14, 641-653.
- 6. Breathnach, R., Benoist, C., O'Hare, K., Gannon, F. and Chambon, P. (1978) Ovalbumin gene: evidence for a leader sequence in mRNA and DNA sequences at the exon-intron boundaries. **Proc. Natl. Acad. Sci. USA**, 75, 4853-4857.
- 7. Mercereau-Puijalon, O., Royal, A., Cami, B., Garapin, A., Krust, A., Gannon, F. and Kourilsky, P. (1978) Synthesis of an ovalbumin-like protein by *Escherichia coli* K12 harbouring a recombinant plasmid. **Nature** 275, 505-510.
- 8. Gannon, F., O'Hare, K., Perrin, F., Lepennec, J.P., Benoist, C., Cochet, M., Breathnach, R., Royal, A., Garapin, A., Cami, B. and Chambon, P. (1979)

- Organization and sequences at the 5' end of a cloned complete ovalbumin gene. **Nature** 278, 428-434.
- 9. Royal, A., Garapin, A., Cami, B., Perrin, F., Mandel, J.L., LeMeur, M., Bregegere, F., Gannon, F., Lepennec, J.P., Chambon, P. and Kourilsky, P. (1979) The ovalbumin gene region: common features in the organisation of three genes expressed in chicken oviduct under hormonal control. **Nature** 279, 125-132.
- 10. Cochet, M., Perrin, F., Gannon, F., Krust, A., Chambon, P., McKnight, G.S., Lee, D.C., Mayo, K.E. and Palmiter, R. (1979) Cloning of an almost full-length chicken conalbumin double-stranded cDNA. **Nucleic Acids Research** 6, 2435-2452.
- 11. Cochet, M., Gannon, F., Hen, R., Maroteaux, L., Perrin, F. and Chambon, P. (1979) Organisation and sequence studies of the 17-piece chicken conalbumin gene. **Nature** 282, 567-574.
- 12. Heilig, R., Perrin, F., Gannon, F., Mandel, J.L. and Chambon, P. (1980) The ovalbumin gene family: Structure of the X gene and evolution of duplicated split genes. **Cell** 20, 625-637.
- 13. Gannon, F., Jeltsch, J.M. and Perrin, F. (1980) A detailed comparison of the 5' end of the ovalbumin gene cloned from chicken oviduct and erythrocyte DNA. **Nucleic Acids Research** 8, 4405-4421.
- 14. Durnam, D.M., Perrin, F., Gannon, F. and Palmiter, R. (1980) Isolation and characterization of the mouse metallothionein-I gene. **Proc. Natl. Acad. Sci. USA**, 77, 6511-6515.
- Christophe, D., Brocas, H., Gannon, F., De Martynoff, G., Pays, E. and Vassart, G. (1980) Molecular cloning of bovine thyroglobulin complementary DNA: Characterization of 2500 base-pair and 1900 base-pair fragments. European Journal of Biochemistry 111, 419-423.
- 16. Pays, E., Delronche, M., Lheureux, M., Vervoort, T., Bloch, J., Gannon, F. and Steinert, M. (1980) Cloning and characterization of DNA sequences complementary to messenger ribonucleic acids coding for the synthesis of two surface antigens of Trypanosoma brucei. **Nucleic Acids Research** 8, 5965-5981.
- 17. Reynaud, C.-A., Ben Tahar, S., Krust, A., Amaral de Lima Franco, M.-P., Goldenberg, S., Gannon, F. and Scherrer, K. (1980) Restriction mapping of cDNA recombinants including the adult chick and duck globin messenger sequences: a comparative study. **Gene** 11, 259-269.
- 18. May, E., Jeltsch, J.M. and Gannon, F. (1981) Characterization of a gene encoding a 115 K super T antigen expressed by a SV40-transformed rat cell line. **Nucleic Acids Research** 9, 4111-4128.
- 19. Masiakowski, P., Breathnach, R., Bloch, J., Gannon, F. and Chambon, P. (1982) Cloning of cDNA sequences of hormone-regulated genes from the MCF-7 human breast cancer cell line. **Nucleic Acids Research** 10, 7895-7903.

- 20. Gerlinger, P., Krust, A., LeMeur, M., Perrin, F., Cochet, M., Gannon, F., Dupret, D. and Chambon, P. (1982) Multiple initiation and polyadenylation sites for the chicken ovomucoid transcription unit. **J. Mol. Biol.**, 162, 345-364.
- 21. Donnelly, W.J., O'Callaghan, D.M., Carroll, D.P., McConnell, D.J. and Gannon, F. (1984) Multiple forms of calf prochymosin and chymosin. **Biochemical Society Transactions** 12, 440–441.
- 22. McConnell, D.J., Hughes, D., Chen, Y-F., Carroll, D.P., Donnelly, W.J., Ollington, S.F., Quinn, D., Barry, T. and Gannon, F. (1984) Towards the cloning of the calf prochymosin gene. **Biochemical Society Transactions** 12, 487–488.
- 23. Powell, R., Neilan, J. and Gannon, F. (1986) Plaque dot assay. **Nucleic Acids Research** 14, 1541.
- 24. Henry, L. and Gannon, F. (1987) A hybridization and enzyme blocking method to enrich minor cDNA sequences. **Bioscience Reports** 7, 509-515.
- 25. McEvoy, T.G., Stack, M., Barry, T., Keane, B., Gannon, F. and Sreenan, J.M. (1987) Direct gene transfer by microinjection. **Theriogenology** 27, 258.
- 26. McEvoy, T., Stack, M., Keane, B., Barry, T., Sreenan, J. and Gannon, F. (1988) The expression of a foreign gene in salmon embryos. **Aquaculture** 68, 27-37.
- 27. Walls, D. and Gannon, F. (1988) The expression of novel antigens from the Epstein-Barr Virus large internal repeat. **The EMBO Journal** 7, 1191-1196.
- 28. Walls, D., Perricaudet, M. and Gannon, F. (1988) The analysis of EBV proteins which are antigenic in vivo. **Nucleic Acids Research** 16, 2859-2872.
- 29. Gannon, F. (1988) Training Biotechnologists for the future. **Education** 3, 9-11.
- 30. Nestor, P., Neilan, J. and Gannon, F. (1988) The isolation of chicken and African green monkey genomic clones for the oestrogen receptor. **Biochemical Society Transactions** 16: 388.
- 31. Keaveney, M., Neilan, J. and Gannon, F. (1989) An analysis by restriction enzymes of the genomic structure of the 3' untranslated region of the human estrogen receptor gene. **Biochem Biophys Acta** 1007, 289-294.
- 32. Hennigan, M., Vaughan, L.M., Foster, T.J., Smith, P. and Gannon, F. (1989) Characterization of *Aeromonas salmonicida* strains using DNA probe technology. **Canadian Journal of Fisheries and Aquatic Science** 46, 877-879.
- 33. Barry, T., Stack, M., Morgan, A. and Gannon, F. (1989) The identification of cDNA clones that include the 3' end of mRNA. **Gene Analysis Techniques** 6, 21-23.
- 34. Heery, D.M., Powell. R., Gannon, F., and Dunican, L.K. (1989) Curing of a plasmid from E.coli using high-voltage electroporation. **Nucleic Acids Research** 17, 10131.

- 35. Wolff, J. and Gannon, F. (1989) cDNA and deduced Amino Acid Sequence of Salmo salar (Atlantic salmon) adult hemoglobin Alpha Chain. **Nucleic Acids Research** 17 4369.
- 36. Barry, T., Powell, R. and Gannon F. (1990) A general method for the generation of DNA probes for microorganisms. **Biotechnology** 8, 233-236.
- 37. Heery, M., and Gannon, F. (1990) A simple method for subcloning DNA fragments from gel slices. **Trends in Genetics** 6, 173.
- 38. Powell, R. Heery, D., Dawson, M.T., Dunican, L.K. and Gannon, F. (1990) Skimmed milk as an alternative to X-gal for visual discrimination of background in λgt 11 libraries. **Nucleic Acids Research** 18, 2190.
- 39. Powell, R., Heery, D.M., Gannon, F. and Dunican, L.K. (1990) Electrotransfection of Escherichia coli with λgt 10 DNA. **FEMS Microbiology Letters** 72, 225-228.
- 40. Byrnes, L. and Gannon, F. (1990) Atlantic Salmon (*Salmo salar*) Serum Albumin: cDNA Sequence, Evolution, and Tissue Expression. **DNA and Cell Biology**, 9, 647-655.
- 41. Powell, R., Byrnes, L., Barry, T. and Gannon, F. (1990) A rapid procedure to isolate major abundance mRNA transcripts and study the transcription profile of a tissue. **Gene Analysis Techniques** 2, 213-215.
- 42. Fotsis, T., Murphy, C. and Gannon, F. (1990) Nucleotide sequence of the bovine insulin-like growth factor 1 (IGF-1) and its IGF-1A precursor, **Nucleic Acids Research**, 18, 676.
- 43. Powell, R., Byrnes, L. and Gannon, F. (1990) Liver gene expression: cloning of abundant mRNA transcripts from the liver of Atlantic salmon (*Salmo salar*) Identification of salmon apolipoprotein A-1 gene. **Proceedings European Congress on Biotechnology** 5 (1) 453-456.
- 44. Keaveney, M., Klug, J., Dawson, M.T., Nestor, P.V., Forde, R. and Gannon F. (1991) Evidence for a previously unidentified upstream exon in the human estrogen receptor gene. **Journal of Molecular Endocrinology** 6, 111-115.
- 45. Powell, R., Higgins, D., Wolff, J., Byrnes, L., Stack, M., Sharp, P. and Gannon, F. (1991) The salmon gene encoding apolipoprotein A-1: cDNA sequence, tissue expression and evolution. **Gene** 104,155 -161.
- 46. Horan, R., Powell, R., McQuaid, S., Gannon, F. and Houghton, J.A. (1991) Association of foreign DNA with porcine spermatozoa. **Archives of Andrology** 26, 83-92.
- 47. Powell, R., Byrnes, L. and Gannon, F. (1991) Sequence of a cDNA clone encoding an Atlantic salmon ribosomal protein. **Gene** 101, 303-304.

- 48. Barry, T., Colleran, G., Glennon, M., Dunican, L.K. and Gannon, F. (1991) The 16s/23s Ribosomal Spacer Region as a Target for DNA Probes to Identify Eubacteria. **Genome Research** 1, 51-56.
- 49. Barry, T. and Gannon, F. (1991) Direct genomic DNA amplification from autoclaved infectious microorganisms using PCR technology. **PCR Methods and Applications** 1, 75.
- 50. Horan, R., Powell, R., Bird J.M., Gannon, F. and Houghton, J.A. (1991) The effects of electropermeabilization on the association of foreign DNA with pig sperm. **Archives of Andrology** 28, 105-114.
- 51. Moriarty, M., Maher, M., Morton, G., Flavin, A., Mooney, E., Neilan, J., Nestor, P., Horgan, P.G., Kerin, M., Waldron, D., Gannon, F., et al. (1991) Irish association for cancer research. **Irish Journal of Medical Science** 160(4), 116-126.
- 52. Byrnes, L., and Gannon, F. (1992) Sequence analysis of a second cDNA encoding Atlantic salmon (*Salmo salar*) serum albumin. **Gene** 120, 319-320.
- 53. Murphy, T.M., Rodger, H.D., Drinan, E.M., Gannon, F., Kruse, P. and Korting, W. (1992) The sequential pathology of pancreas disease in Atlantic salmon farms in Ireland. **Journal of Fish Diseases.**15, 401-408.
- 54. Keaveney, M., Klug, J., and Gannon, F. (1992) Sequence analysis of the 5' flanking region of human Estrogen Receptor gene. **DNA Sequence** 2, 347-358.
- 55. Bird, J. Powell, R. Horan, R. Gannon, F. and Houghton, J.A. (1992) The binding of Exogenous DNA fragments to Bovine Spermatozoa. **Animal Biotechnology** 3, 181-200.
- 56. Hiney, M. Dawson, M.T., Heery D.M., Smith P.R., Gannon, F. and Powell, R. (1992) DNA Probe for Aeromonas salmonicida. **Applied and Environmental Microbiology** 58, 1039-1042.
- 57. Cormican, M.G., Barry, T. Gannon, F. and Flynn, J. (1992) Use of polymerase chain reaction for early identification of *Mycobacterium tuberculosis* in positive cultures. **Journal of Clinical Pathology** 45, 601-604.
- 58. Horan, R., Powell, R., Gannon, F. and Houghton, J.A. (1992) The fate of foreign DNA associated with pig sperm following the *in vitro* fertilization of zona free hamster ova and zona-intact pig ova. **Archives of Andrology: Journal of Reproductive Systems** 29,199-206.
- 59. Barry, T., Geary, S., Hannify, S., MacGearailt, C., Shalloo, M., Heery, D., Gannon, F. and Powell, R. (1992) Rapid mini-preparations of total RNA from bacteria.

  Nucleic Acids Research 20, 4940.
- 60. McCusker, J., Dawson, M.T., Noone, D., Gannon, F. and Smith, T. (1992) Improved method for the direct PCR amplification from whole blood. **Nucleic Acids Research** 20, 6747.

- 61. Bearzotti, M., Perrot, E., Michard-Vanhee, C., Jolivet, G., Attal, J., Theron, M.-C., Puissant, C., Dreano, M., Kopchick, J.J., Powell, R., Gannon, F., Houdebine, L.-M. and Chourrout, D. (1992) Gene expression following transfection of fish cells. **Journal of Biotechnology** 26, 315-325.
- 62. Keaveney, M., Parker, M.G. and Gannon, F (1993) Identification of a functional role for the 3' region of the human estrogen receptor gene. **Journal of Molecular Endocrinology** 10, 143-152.
- 63. Barry, T., Glennon M, Smith, T. and Gannon, F. (1993) Detection of *Mycobacterium bovis* in bovine blood by combined PCR and DNA probe methods. **Veterinary Record** 132, 66-67.
- 64. Hardiman, G., Wolff, J., Peden, J. and Gannon, F. (1994) Isolation of Atlantic salmon (*Salmo salar* L.) cytochrome c oxidase subunit II gene (*cox II*). **Journal of Applied Ichthyologie** 10, 64-68.
- 65. Noone, D., Glennon, M., Gannon, F. and Smith, T. (1994) Important variables for direct PCR amplification from blood. **The Genetic Engineer and Biotechnologist** 14, 149-154.
- 66. Hardiman, G., Byrnes, L., Peden, J., Wolff, J. and Gannon, F. (1994) Cloning and sequencing of the Atlantic salmon (*Salmo salar*) cytochrome c oxidase subunit III gene (*coxIII*) and analysis of *coxIII* expression during parr-smolt transformation.

  Molecular Marine Biology and Biotechnology 3, 210-216.
- 67. Morrison, C. and Gannon, F. The impact of the PCR plateau phase on quantitative PCR. (1994) **Biochimica et Biophysica Acta** 1219, 493-498.
- 68. Nestor, P.V., Forde, R.C., Webb, P., and Gannon, F. (1994) The Genomic Organisation, Sequence and Functional Analysis of the 5' Flanking Region of the Chicken Estrogen Receptor Gene. **The Journal of Steroid Biochemistry and Molecular Biology** 50, 121-130.
- 69. Wagner, A., Deryckere, F., McMorrow, T. and Gannon, F. (1994) Tail-to-tail orientation of the Atlantic salmon alpha- and beta-globin genes. **J. Mol. Evolution**. 38, 28-35.
- 70. Gannon, F. (1994) DNA probes for the identification of microorganisms. **J. of Industrial Microbiology**, 13, 71-76.
- 71. Hardiman, G., Byrnes, L. and Gannon, F. (1994) An analysis of highly expressed salmon liver genes during smoltification in the Atlantic salmon (*Salmo salar*) **Mol. Mar. Biol. Biotech**. 3, 51-56.
- 72. Power, S.C., Cereghini, S., Rollier, A. and Gannon, F. (1994) Isolation and functional analysis of the promoter of the bovine serum albumin gene. **Biochem. & Biophys. Res. Comm**. 203, 1447-1456.
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#### **Patents**

Method for the Separation of Nucleic Acids from Protein Material Based on Cation Exchangers. T. Fotsis, F. Gannon, C.E. Murphy. Patent Application 3226/88

Generation of probes for unknown target nucleotide sequences and the use thereof in diagnostic assays. F. Gannon, T.G. Barry, BioResearch Ireland, R. Powell, U.C.G. Patent application 1287/89. (Granted)

Short Open Reading Frames in the 5' end of Transcripts and Their Application to Diagnostic Assays. M.T. Dawson, R.C. Forde, B.F.X. Gannon, M. Keaveney, and P.V. Nestor. Bio Research and U.C.G.

Patent application: 2666/90

Probe for *Aeromonas salmonicida* and the use thereof in methods of detecting or determining the organism. Forfás (trading as BioResearch Ireland), F. Gannon, Richard Powell and University College Galway.

Patent Application No. 4205/91.

Probe for *Aeromonas salmonicida* and the use thereof in methods of detecting or determining the organism". Forfás (trading as BioResearch Ireland), UCG, F. Gannon, R. Powell.

European Patent Application No. 92924848.2-(EP-A 0 618 982)

Strong Homologous Promoter Obtained from Hamsters Inventors: Barbara Enenkel, Frank Gannon, Klaus Bergemann; Wolfgang Noe, U.S. Patent No. 6,063,598 (2000)

Date of Patent: May 16, 2000

Antagonists of topoisomerase activity and their use in inhibiting pathological conditions. Inventors: George Reid and Frank Gannon. European patent filled on 23/09/05, application number 05020794.3 and US patent filled on 30/09/05, application number 60/722,551

Novel tubulin polymerization inhibitors. Inventors: George Reid and Frank Gannon European patent filled on 21/03/06 Patent number PCT/EP2006/002604

Inhibitors of Cell Proliferation and uses thereof Inventors: George Reid, Maria Polycarpou-Schwartz and Frank Gannon Patent applied for Feb 2008

### **Editorials**

- 1. A new journal in more than one way. EMBO Reports vol. 1 / no. 1 / 2000
- 2. Genocentric promises. EMBO Reports vol. 1 / no. 2 / 2000
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