Klaus M. Fiebig, Ph.D.

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PROFILE

- Educated at Yale University (Post Doctorate), Oxford University (Post Doctorate), University of California at San Francisco (PhD), and the Technical University Munich (undergraduate)
- Broad scientific and technical knowledge in life sciences from basic (physics, chemistry, genomics, proteomics, and bioinformatics) to applied (discovery and development of drugs, biologics, and diagnostics); well versed in associated technologies, their translation and commercialization
- 14+ years management experience in academia, industry and not-for-profit (government) organizations
- Strong entrepreneurial drive, founded and managed fee-for-service and drug discovery biotech start-up
- Hands-on experience with intellectual property protection (inventor on 3 patents), licensing and contracting
- Excellent communication skills, both verbal and written, in English and German
- Seeking exciting leadership opportunity in the life science start-up and science administration space

PROFESSIONAL EXPERIENCE

KMFBio Inc., Toronto, Canada

2013-present

Consulting activities of KMFBio Inc. focus on high value disease groups, medical devices, and advanced life science technologies

CEO and Founder

- Provided strategic advice, commercialization support, and engaged in fundraising activities for biotech start-ups focused on biologics, bioinformatics and medical devices
- Judge for the 2013 and 2014 Sanofi BioGENEius Challenge Canada
- Co-led philanthropic effort to provide ultrasound diagnostics to remote regions (e.g., Nepal) to reduce maternal and infant health complications and death during pregnancy and delivery. The project earned first prize at the June 2012 Toronto Random Hacks of Kindness (RHoK) event. Additionally, two groups of University of Toronto informatics students were recruited in the fall of 2013 to continue work on the server and smartphone app to be used by radiologists and remote healthcare workers.

Ontario Genomics Institute (OGI), Toronto, Canada

2006-2013

OGI is a private, non-profit corporation dedicated to fostering genomics and proteomics research in Ontario by securing funding, managing large-scale projects, and supporting commercialization and outreach activities across the province of Ontario.

Vice President, Research Programs and Chief Scientific Officer

- Responsible for the OGI research project portfolio of CAD \$800 Million invested into 60+ large-scale research projects
- Oversight over two rounds of the OGI SPARK Technology Development competition (start-up, adjudication, roll-out of results, contracting, and close-out)
- Oversight over all project management activities
- Extensive interaction with Business Development group during the due diligence, investment and milestone approval phases of OGI's pre-commercial business development fund
- Direct supervision of the research program management team of 3-4 PhD scientists; led recruitment of 7 new PhDs into this team
- Together with CEO, developed and implemented research program and corporate strategy
- Identified and cultivated cutting edge research projects and national and international funding sources
- Supervised OGI support for one provincial and 9 federal funding competitions which resulted in \$125 Million federal and \$185 Million matching funding for Ontario scientists
- Member of several scientific advisory boards
- Process improvement: championed establishment of an online reporting system to track outcomes and leverageable resources of OGI's research portfolio, and to monitor impact during and after completion of projects

Affinium Pharmaceuticals, Inc., Toronto, Canada

2002-2006

Affinium is a biopharmaceutical company engaged during the above time interval in structure guided discovery and development of novel anti-infective medicines; currently Affinium has one anti-infective compound in clinical trials

Senior Director, Structural Biology and Computational Chemistry, 2003-2006 Senior Director, Structural Biology and Nuclear Magnetic Resonance (NMR), 2002-2003

- Affinium lead on the steering committee for its collaboration with Pfizer (US \$30 Million / 20 Affinium employees)
- Responsible for structural biology efforts on 50 Pfizer therapeutic targets and computational chemistry on 8 such targets
- Direct and indirect supervision of 11 structural biologists and computational chemists
- Recruited 9 scientists (4 PhDs. 5 associates)
- Authored and co-authored NIH grant applications for US \$3.3 Million
- Accountable for inventory and budgeting of CAD \$1 Million / year
- Responsible for drug discovery technology development at Affinium Pharmaceuticals (led virtual screening and active site characterization efforts and sponsored fragment screening by X-ray)
- Sponsored drug discovery efforts on antibacterial targets which resulted in a series of chemical compounds with *in vivo* activity

MRPharm GmbH, Frankfurt/Main, Germany

2001-2002

MRPharm was a biotechnology company spun out of Frankfurt University, with seed funding from Aventis; MRPharm specialized in NMR based drug discovery with a hybrid fee-for-service and internal drug discovery business model.

CEO and Co-Founder

- Founded company and managed staff of 8 PhDs
- Led internal drug target efforts, collaboration with Aventis, and collaborative efforts with Frankfurt University, the Max Plank Institute for Biophysical Chemistry, University of Basel, University of Barcelona, University of Florence, and Affinium Pharmaceuticals

- Co-authored EU RTD grant for US \$12 Million
- Wrote business plan and was accountable for inventory of US \$2.5 Million

Frankfurt University, Frankfurt/Main, Germany

1999-2001

Head of Aventis/Frankfurt University Collaboration Project "NMR Based Drug Discovery" valued at US \$5.5 Million

- Planned and built up collaborative efforts, including fully functional molecular biology and protein chemistry labs, and NMR facilities (with state of the art Bruker 800 MHz and 600 MHz instruments)
- Hired and managed staff of 8 PhDs
- Managed tight collaborative relationships with Aventis research groups in Frankfurt, Vitry (Paris, France), and Bridgewater (New Jersey)

Xencor Inc., Pasadena, California

1998-1999

Xencor remains a leading protein design company specializing in design of new and improved therapeutic proteins and biologics (therapeutic antibodies)

Lead Scientist, automatic computational protein design

- Responsible for improving computational protein design platform
- Invented novel protein library design methodology which resulted in key Xencor patent
- Involved in several protein design projects including the design of novel p53 tetramerization domains to combat cancer

Yale University, New Haven, Connecticut

1996-1998

Postdoctoral Fellow, Department of Molecular Biophysics and Biochemistry, Lab of Professor A.T. Brünger

- Structural NMR studies of SNARE proteins involved in the membrane vesicle fusion events associated with neurotransmitter release; results published in *Nature Structural Biology*
- Determination of the solution structure of the structured domain of Syntaxin 3

Oxford University, England

1994-1996

Postdoctoral Fellow, Oxford Centre for Molecular Science, Lab of Professor C.M. Dobson

- Conducted theoretical simulations and experimental NMR studies of unfolded lysozyme
- Discovered that unfolded proteins can be accurately modeled by using the short range residue specific phi-psi information found in the protein data bank

University of California at San Francisco, California

1993-1994

Postdoctoral Fellow, Department of Pharmaceutical Chemistry, Lab of Professor K.A. Dill

- Developed computational tools to study the effects of chain entropy on the folding pathways of a simplified lattice co-polymer protein model
- Established "hydrophobic zipper" protein folding model

HONOURS AND AWARDS

Howard Hughes Medical Institute, Postdoctoral Fellowship, 1997-1998 Burrows Wellcome Fund, Hitchins-Elion Fellowship, 1994-1997 National Institute of Health, Training Grant #GM07175, 1989-1993 Siemens Corporation "Studienkreis," Member, 1987-1989

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EDUCATION

Ph.D., Pharmaceutical Chemistry, 1993 University of California, San Francisco, CA, USA

Vordiplom Physics, 1986 Technical University, Munich, Germany

CITIZENSHIPS

Citizen of Germany and U.S.A. Permanent Resident of Canada

LANGUAGE SKILLS

Bilingual and fluent in German and English Spanish (intermediate level)

PATENTS:

- Edwards A, Dharamsi AI, <u>Fiebig KM</u>, Lam R; "Novel purified hydroxymethylglutaryl-CoA reductases and structures thereof" US 2006/0078974 A1
- 2 Fiebig KM; "Novel nucleic acids and proteins with p53 activity and altered tetramerization domains" WO 2000/068384, US 0013248
- 1 <u>Fiebig KM</u>, Hayes RJ, Dahiyat BI, Bentzien J; "Protein design automation for protein libraries" WO 2000/023564, US 9924229, US 6403312, US 2004/43430, US 2004/43429, US 2003/49654, US 2002/90648, US 7315786 B2

PUBLICATIONS:

24 publications in major academic journals, available upon request

REFERENCES:

Available upon request