Peter Kristensen
Professor
Department of Chemistry and Bioscience
The Faculty of Engineering and Science
Section of Medical Biotechnology
Molecular Engineering
Neuroboost
Type of address: Visiting address.
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Research profile

The research of Peter Kristensen is centered on the technical development and application of methods that allow Darwinian evolution of proteins using directed evolution technologies.
The main scientific contributions have more specifically been in the area of recombinant antibodies and methods of isolating such antibodies from large libraries. In addition Peter Kristensen was the first to develop technologies which allow isolation of proteins with improved stabilities from large libraries of mutants. The interest to make technological developments based on recombinant antibodies and for manipulating protein stability and activity, were initiated while Peter Kristensen performed his post doc at the MRC-LMB in Cambridge in the group of Nobel Laureate Sir Greg Winter. However to justify technological development, the technology developed should be able to provide new insight or solve important problems and here we have especially focused attention at finding novel biomarkers which can be used in characterization of important human conditions, such as age related diseases and rare circulating cells in the blood, just to mention the most relevant example. Most recently, the research has involved the use of non-natural amino acids for immobilization and conjugation of recombinant antibodies and proteins of industrial interest and novel biosensors building on recombinant antibody technology.

Qualifications

Chemistry and Biotechnology, PhD, Aarhus University
1992 → 2 Oct 1995
Award Date: 2 Oct 1995

Chemistry and Biotechnology, MSc, Aarhus University
1 Sept 1986 → 30 Jun 1992
Award Date: 1 Jun 1992

Employment

Professor
Professor
Department of Chemistry and Bioscience
The Faculty of Engineering and Science
Aalborg, Denmark
1 Dec 2017 → 31 Dec 4712

Professor
Professor
The Faculty of Engineering and Science
Aalborg Øst, Denmark
1 Dec 2017 → 31 Dec 4712

Professor
Professor
Section of Medical Biotechnology
The Faculty of Engineering and Science
1 Dec 2017 → 31 Dec 4712

Molecular Engineering
The Faculty of Engineering and Science
1 Jan 2025 → present

Neuroboost
The Faculty of Social Sciences and Humanities
Aalborg, Denmark
1 Jan 2023 → present

Associate Professor (MSK)
Aarhus University
Aarhus, Denmark
1 Jan 2010 → 1 Jan 2017

Associate Professor (MSK)
Aarhus University
Aarhus, Denmark
1 Jan 2003 → 1 Jan 2010

Senior Scientist
Aarhus Universityhospital, Denmark
1 Jan 2001 → 1 Jan 2002

Research Associate Professor
Aarhus University
Aarhus, Denmark
1 Jan 2000 → 1 Jan 2001

Research Assistant Professor
Aarhus University
Aarhus, Denmark
1 Jan 1998 → 1 Jan 2000

Research Scientist
Medical Research Council Centre, Laboratory for Molecular Biology (MRC-LMB)
Cambridge, United Kingdom
1 Jan 1997 → 1 Jan 1998

Post-doctoral Fellow
Medical Research Council Centre, Laboratory for Molecular Biology (MRC-LMB)
Cambridge, United Kingdom
1 Jan 1995 → 1 Jan 1997

Research outputs

YKL-40 antibody and uses thereof
Kristensen, P. (Inventor), Schumacher, U. (Inventor) & Minor, P. (Inventor), 4 May 2023, IPC No. A61K38/00, A61K39/395, A61P35/00, C07K16/28, C07K16/40, G01N33/574, Patent No. WO2023072405 A1, 29 Oct 2021

Fra polyklonale til biosimilære antistoffer
Kristensen, P., Aug 2016, In: BestPractice. Reumatologi.

Open Sandwich ELISA Libraries
Kristensen, P. (Inventor), Ueda, H. (Inventor), Koijma, M. (Inventor), Ihara, M. (Inventor) & Kawakami, M. (Inventor), 2008, Patent No. JP2008-032941

Detection of foetal cells from maternal blood
Kristensen, P. (Inventor), Dræby Sørensen, M. (Inventor), Kølvraa, S. (Inventor), Christensen, B. (Inventor) & Schelde, P. (Inventor), 2007, Patent No. WO/2007/065438

POLYPEPTIDE
Kristensen, P. (Inventor), 9 Feb 2006, IPC No. C07K 14/ 47 A I, Patent No. WO2006013468, Priority date 26 Jul 2004, Priority No. GB20040016651

Polypeptide
Peter, K. (Inventor), 9 Feb 2006, IPC No. C07K 14/ 47 A I, Patent No. AU2005268501, Priority date 26 Jul 2005, Priority No. WO2005IB02530

Applying phage display technology in aging research
Kristensen, P., Ravn, P., Jensen, K. B. & Jensen, K., 1 Dec 2000, In: Biogerontology. 1, 1, p. 67-78 12 p.

Purification and characterisation of a tissue specific elongation factor 1 alpha (EF-1α2) from rabbit muscle
Kristensen, P., Lund, A., Clark, B. F. C., Cavallius, J. & Merrick, W. C., 28 Apr 1998, In: Biochemical and Biophysical Research Communications. 245, 3, p. 810-814 5 p.

Proteolytic selection for protein folding using filamentous bacteriophages
Kristensen, P. & Winter, G., 1 Jan 1998, In: Folding and Design. 3, 5, p. 321-328 8 p.

Proteolytic selection for folding using filamentous bacteriophages
Kristensen, P. & Winter, G., 1998, In: Structure. 3, p. 321-328 8 p.