

Despite recent advances in our understanding of cancer biology and improvements in diagnostic and treatment, cancer related death is still one of the leading causes of death in Europe. Due to an age-dependent development of most cancers, this incidence will increase relative to the extended life expectancy. In the 2008 Summer School of the Alfried Krupp Postgraduate Programme in Tumour Biology researchers from different areas of the field will discuss topics related to target identification and target validation in tumour research. Cell biology, control of cell growth and differentiation, risk factors for metastasis, cytogenetics, and new therapeutic approaches will be subject of discussion. Furthermore, due to the large amount of data generated in modern molecular biology, data calculation and collection are of growing importance. Therefore, biomathematics and bioinformatics are included in this meeting.

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Martin-Luther-Straße 14
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Summer school chairs:

Prof. Dr. Georg Fuellen (Greifswald)
Prof. Dr. Christian A. Schmidt (Greifswald)

Summer school office

(Information and registration):

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Venue:

Alfried Krupp Wissenschaftskolleg Greifswald
Martin-Luther-Str. 14
D-17489 Greifswald

Summer school language:

The summer school language is English.

The summer school is open to applicants who are interested in the current state of research in the fields of tumour biology, cancer therapy, biomathematics, and bioinformatics.

No registration fee is levied. However, a registration (at the best by e-mail to tagungsbuero@wiko-greifswald.de) is required. Registration deadline is June 9, 2008.

The Alfried-Krupp-Graduiertenkolleg Tumorbiologie / Alfried Krupp Postgraduate Programme in Tumour Biology is financially supported by Alfried Krupp von Bohlen und Halbach-Stiftung, Essen.

Alfried Krupp Wissenschaftskolleg Greifswald

Das Alfried Krupp Wissenschaftskolleg Greifswald ist eine wissenschaftlich unabhängige Einrichtung in der Trägerschaft der Stiftung Alfried Krupp Kolleg Greifswald.

Die Initiative zur Errichtung des Alfried Krupp Wissenschaftskollegs Greifswald ging vom Vorsitzenden des Kuratoriums der Alfried Krupp von Bohlen und Halbach-Stiftung, Professor Dr. h. c. mult. Berthold Beitz, aus. Professor Beitz verband mit dieser Initiative die Idee, dass ein Wissenschaftskolleg in der Universitäts- und Hansestadt Greifswald dazu beitragen könne, die Region Greifswald wieder zu demjenigen „liberalen, weltoffenen Zentrum für Begegnungen im Ostseeraum“ werden zu lassen, das sie jahrhundertelang war.

Das wissenschaftliche Programm des Alfried Krupp Wissenschaftskollegs wird durch Fördermittel ermöglicht, die von der Alfried Krupp von Bohlen und Halbach-Stiftung zur Verfügung gestellt werden.

Alfried Krupp Wissenschaftskolleg Greifswald

The Alfried Krupp Wissenschaftskolleg is an academically independent institution sponsored by the Stiftung Alfried Krupp Kolleg Greifswald.

The initiative to establish the Alfried Krupp Wissenschaftskolleg came from the Chairman of the Board of Trustees of the Alfried Krupp von Bohlen und Halbach-Stiftung, Professor Dr. h. c. mult. Berthold Beitz. Professor Beitz associated this initiative with the idea that an institute for advanced study in the Hanseatic and university city of Greifswald could assist Greifswald to become once again the "liberal, cosmopolitan centre for encounters in the Baltic Sea region" that it used to be for centuries.

The academic programme of the Alfried Krupp Wissenschaftskolleg is made possible by financial support provided by the Alfried Krupp von Bohlen und Halbach-Stiftung.



Alfried Krupp Wissenschaftskolleg
Greifswald

Target
identification
and target
validation in
tumour research

Summer School
June 16 – 18, 2008

Monday, 16 June 2008

Panel I: Interdisciplinary Biodata Analysis – some tutorials and examples I

Chair: Prof. Dr. Christoph Bandt

9:00 Uhr

Welcome Address

Prof. Dr. Bärbel Friedrich (Alfried Krupp Wissenschaftskolleg)

9:15–10:00

Encyclopedia of Genes and Genomes: KEGG for human disease networks

Invited Speaker: Prof. Dr. Susumu Goto (Kyoto University)

10:00–10:15

Interdisciplinary Biodata Analysis – a small tutorial

Prof. Dr. Georg Fuellen

10:15–10:30

Interactive Visual Exploration of Aligned Biological Networks

Steffen Brasch

10:30–10:45

Dynamics of chewing

Sebastian Ruge

10:45–11:15

Coffee break

Panel II: Interdisciplinary Biodata Analysis – some tutorials and examples II

Chair: Prof. Dr. Susumu Goto

11:15–11:30

Expression time course analysis of the malaria parasite Plasmodium falciparum

Dr. Matthias Scholz

11:30–11:45

Operon prediction with support vector machines

Christin Weinberg

11:45–12:00

Single-trial evaluation of event-related potentials

Katharina Wittfeld

12:00–13:00

A Few First Principles of Biostatistics

PD Dr. Hermann Haase

13:00–14:15

Lunch break

Panel III: Tumour research

Chairs: Prof. Dr. Markus M. Lerch/Prof. Dr. Christian A. Schmidt/

Prof. Dr. Reinhard Walther

14:15–15:00

MicroRNAs in tumour metastasis – a novel animal model to test metastatic behaviour

Dr. Christoph Bagowski (University of Leiden)

15:00–15:20

Histone deacetylase inhibitors facilitate tumour cell killing by NK cells

Mareike Schmudde

15:20–15:40

The role of p120 catenin isoforms in pancreatic cancer

Olaf Giermann

15:40–16:00

The role of leukocytes in the tumorigenesis of pancreatic ductal adenocarcinomas

Matthias Senderl

16:00–16:20

Modulation of drug efflux transporters MRP4 and MRP5 affects sensitivity to nucleoside anticancer drugs in pancreatic cancer cell lines

Praveen Kumar

16:20–16:40

Clarification of chromosomal breakpoints in T-ALL

Kathleen Dittmann

16:40–17:20

Coffee break

17:20–17:40

Prevalence and frequency of circulating t(14;18)-positive cells in healthy individuals

Tobias Berg

17:40–18:00

Disease related protein profiles in prostate cancer and functional characterization of proteins of altered expression

Ramesh Ummanni

18:00–18:20

Non-antibiotic properties of tetracyclines

Daniela Dalm

18:20–18:40

Phenotypic analysis of Johanson–Blizzard syndrome patients

Narashima Kumar

18:40–19:00

Identification of proteins involved in radiation, chemotherapy and cytokine resistance by differential analysis of histone deacetylase inhibitor treated cancer cells

Chithra Devi Palani

19:00

Wine and cheese

Tuesday, 17 June 2008

Panel IV: Tumour biology I

Chairs: Prof. Dr. Markus M. Lerch/Prof. Dr. Julia Mayerle

8:30–9:15

CapRi: Lessons from translational research

Prof. Dr. Angela Märten (Ruprechts-Karls-Universität Heidelberg)

9:15–10:00

TGF-beta as a target in cancer therapy

Dr. hab. med. Dariusz Kowalczyk (University of Medical Sciences and Great Poland Cancer Center, Poznań)

10:00–10:30

Coffee break

Panel V: Tumour biology II

Chairs: Prof. Dr. Gottfried Dölken/Dr. hab. Grzegorz Przybylski

10:30–11:15

Modulation of larynx cancer incidence and progression by gene alterations

Prof. Dr. Krzysztof Szyfter (Polish Academy of Sciences, Poznań)

11:15–12:00

Inhibition of tenascin-C in brain tumors with RNA

Prof. Dr. Jan Barciszewski (Polish Academy of Sciences, Poznań)

12:00–12:30

Current strategies for identification of genes involved in leukemogenesis

Dr. hab. Grzegorz Przybylski (Polish Academy of Sciences, Poznań)

12:30–13:00

Identification and relevance of clonal aberrations in Fanconi anemia cells with disrupted FA/BRCA DNA repair pathway

Dr. habil. Holger Tönnies (Universitätsklinikum Schleswig-Holstein, Campus Kiel)

13:00–15:00

Lunch and guided tour: Pommersches Landesmuseum or Dom

Panel VI: Tumour biology III

Chairs: Prof. Dr. Christian A. Schmidt/Prof. Dr. Winfried Hinrichs

15:00–15:45

Target gene analysis of oncogenic homeodomain proteins in T-cell acute lymphoblastic leukemia (T-ALL)

Dr. Stefan Nagel (Deutsche Sammlung von Mikroorganismen und Zellkulturen, Braunschweig)

15:45–16:30

Cell cycle checkpoint control in malignant transformation

Randi G. Syjuåsen Ph.D. (Cancer Research Norwegian Radium Hospital, Oslo)

16:30–17:00

Coffee break

Panel VII: Tumour biology IV

Chairs: Prof. Dr. Reinhard Walther/Prof. Dr. James Beck

17:00–17:45

A proteomic approach to biomarker discovery in prostate cancer

Dr. Helena Lexander (Ludesi Company, Malmö)

17:45–18:30

Tissue microarrays in prostate cancer research: from genomics to clinics

Dr. Georgios Gakis (Eberhard-Karls-Universität Tübingen)

18:30–19:30

Snacks

19:30–20:30

Evening lecture

How a physician learns from his own illness

Prof. Dr. Pascal Hammel (Université Denis Diderot-Paris VII, Clichy)

Chair: Prof. Dr. Markus M. Lerch

Wednesday, 18 June 2008

Panel VIII: Interdisciplinary Biodata Analysis: Methods, Examples, Data I

Chair: Prof. Dr. Georg Fuellen

9:00–9:45

Genomes and function in heart disease: clinical and experimental studies of polymorphisms and peptides

Invited Speaker: Prof. Dr. Denis Shields (University College Dublin)

9:45–10:00

Study of Health in Pomerania (SHIP) – Background and Data

Dr. Dietrich Alte

10:00–10:15

From SHIP to Individualized Medicine. Concepts and Resources

Prof. Dr. Wolfgang Hoffmann

10:15–10:45

Coffee break

Panel IX: Interdisciplinary Biodata Analysis: Methods, Examples, Data II

Chair: Prof. Dr. Volkmar Liebscher

10:45–11:00

Acquisition of gel-based proteomics data

Dr. Jörg Bernhardt

11:00–11:15

A PCA-model to distinguish Mrp2-deficient rats on the basis of proton NMR spectra of urine

Dr. Alexander Krebs

11:15–11:30

Identification of factors for drug resistance

Prof. Dr. Christoph Ritter

11:30–11:45

A genome-wide association study to detect susceptibility loci for aggressive periodontitis using pooled DNA samples

Alexander Teumer

11:45–12:45

Lunch break

Panel X: Interdisciplinary Biodata Analysis: Methods, Examples, Data III

Chair: Prof. Dr. Denis Shields

12:45–13:00

Analysis of biological time series

Prof. Dr. Christoph Bandt

13:00–13:15

Some Insights Bioinformatics can Deliver

Prof. Dr. Georg Füllner

13:15–13:30

Algorithmic tools for biological problems

Prof. Dr. Stefan Funke

13:30–13:45

Biomathematics – An Overview

Prof. Dr. Volkmar Liebscher

13:45–14:15

Coffee break

Panel XI: Interdisciplinary Biodata Analysis: Methods, Examples, Data IV

Chair: Prof. Dr. Georg Fuellen

14:15–14:30

Modelling of Microarray-Data

Robert Bialowons

14:30–14:45

Finding translocations in leukemia

Kathleen Dittmann

14:45–15:00

Evolution of regulatory networks

Stephan Struckmann