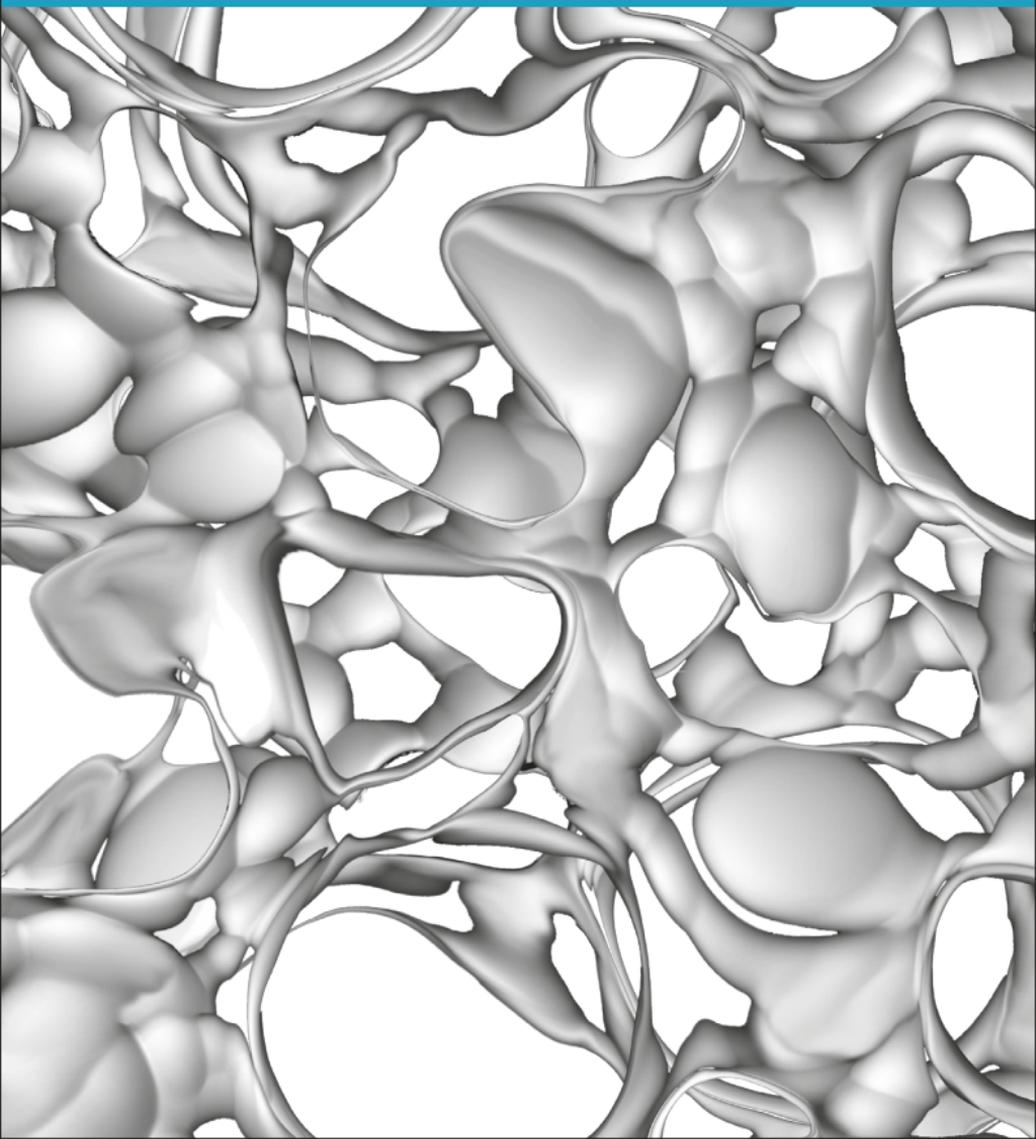


Ce-M-M-



## Introduction

It was only in 2007 that CeMM, the Research Center for Molecular Medicine of the Austrian Academy of Sciences, published its first research report. At that time CeMM consisted of six research groups, spread over Vienna, but unified through a common goal: to pioneer in science that nurtures precise and personalized medicine of the future, focusing on important diseases, such as immune disorders and infections, cancer and metabolic disorders.

In 2010, finally all scattered research groups came together under the roof of a tailor-made research building on the “medical campus”, in the 9th district of Vienna. The immediate vicinity to and partnership with the General Hospital and the Medical University of Vienna is a huge privilege and a boost for CeMM’s patient-oriented science.

By now some 180 scientists from more than 45 nations work at CeMM. In 2017, CeMM celebrated its 10th anniversary. We would like to express our sincere gratitude to the initiators, sponsors and administrators in the Austrian Academy of Sciences for the continuous support and genuinely advice.

We would like to thank the Austrian Federal Ministry of Education, Science and Research and the funding organizations for the mandate to pursue societally relevant research and to financially support our endeavors.

We are grateful to the City of Vienna and the Bundesimmobiliengesellschaft (BIG) who both were crucial for the creation and location of the CeMM building.

Importantly, we would like to express our thankfulness to the colleagues from the Medical University of Vienna and the General Hospital, and to all cooperation and scientific partners for an outstanding and highly successful collaboration in all these years.

Last but not least we would like to say thank you to all collaborators, supporters and friends of CeMM. Thank you all!

Giulio Superti-Furga, Scientific Director CeMM  
Anita Ender, Administrative Director CeMM

## 2007

Six CeMM research groups had started in rented labs spread over Vienna. CeMM's first research report was published.

*First Edition:  
See what we  
have done  
so far!*

Lab  
Journal

No.

2007

Name

CeMM  
Research Center for Molecular Medicine  
of the Austrian Academy of Sciences

### Principle Nr. 1

**Commitment to responsible research and ethical science.** We are proud of our role as a flagship institute in molecular medicine and are conscious of the responsibility of our researchers and staff on ethical, societal, cultural and ecological matters. CeMM signed the Responsible Research Memorandum of the Ministry of Education, Science and Research, holds regular responsible research lectures, co-founded the LIBRA platform (Unifying innovative efforts of European research centres to achieve gender equality in academia) and is an advocate of open access ambitions. CeMM is always eager to learn from the best and to constantly improve on ethical standards and societal and cultural awareness.

**2008**

The shell of the new CeMM building was completed at the privileged location in the very heart of the campus of the Vienna General Hospital (AKH) and Medical University of Vienna.

hier entsteht das neue  
**Ce-M-M-**  
Research Center for Molecular Medicine  
of the Austrian Academy of Sciences





## 2009

CeMM's international Scientific Advisory Board visited CeMM for the second time. The SAB members were delighted with the progress made and particularly praised the quality of the presentations by the junior members as well as the cooperative spirit.



## Principle Nr. 2

**Focus on medicine in any case.** A revolution in human biology is happening and CeMM is right at the center of it: our goal is a new understanding of molecular physiology and pathology of humans to invent new therapies and diagnostics. CeMM's research is based on strong cooperation and densely intertwined operations with the Medical University of Vienna. The vast majority of CeMM publications and projects address human pathologies, therapies and diagnostics. About half of the CeMM faculty members have a dual affiliation with the Medical University of Vienna. Almost all CeMM PhD students are enrolled within a Medical University Vienna program. We co-founded the Center for Rare and Undiagnosed Diseases (CERUD) as well as the Ludwig Boltzmann Institute for Rare and Undiagnosed Diseases (LBI-RUD) and started a lecture series on pioneers of molecular medicine, the annual CeMM Karl Landsteiner Lecture.

**2010**

Peter Kogler's Art Façade was inaugurated and finally all scattered CeMM research groups came together under one roof.



## 2011

The first CeMM PhD students graduated. Federal Minister Karlheinz Töchterle visited the institute to celebrate the first ever Nature article of CeMM in collaboration with the Medical University of Vienna on the identification of a novel, important pathogenic mechanism for age-related macular degeneration. CeMM held the inauguration of the new research building.



**2012**

The opening of the CeMM Brain Lounge, a special art room dedicated to thinking and new ideas took place. A survey conducted by The Scientist elected CeMM as best academic place to work in Europe. CeMM's first spin-off company Haplogen was founded.

### Principle Nr. 3

**Social engineering of a new culture of super-cooperation.** CeMM is developing and constantly improving new win-win models of modular combination of expertise and technology for maximum efficiency and fun. We cultivate a low hierarchy and open door policy, and our culture of cooperation and networking is maintained and enhanced by alumni long after they have left CeMM. For us, the fitness of the group is as important as the fitness of the individual, and the intense collaboration within faculty also leads to great economic efficiency.

### Principle Nr. 4

**Quality and excellence on all grounds.** Our ambition is to excel and strive for quality in every and all processes, as only quality inspires quality and only excellence breeds excellence. From the scientific question and execution, to the competency of the scientific and support personnel, to the standards of practice in all aspects – excellence and quality are the fundamental principles to follow in CeMM's activities and operations. This is reflected in numerous ways: our average impact factor of papers is extraordinarily high (>10), we have been awarded more than ten ERC grants, applied from CeMM by CeMMies. Some of the most highly cited original research papers from Austria originate from CeMM (Kampfl et al NEJM 2013). Our Scientific Director has been appointed member of the ERC scientific council in 2017. Last, but not least, CeMM was elected best place to work in academia by "The Scientist" in 2012.

# 2013

Discovery that mutations of calreticulin are responsible for about 15 % of myeloproliferative neoplasia cases (blood cancer), providing diagnostic and treatment options for affected patients worldwide. CeMM is founding member of EU-Life, an alliance for European excellence and competitiveness in life science. The Christian Doppler Laboratory for Chemical Epigenetics and Antiinfectives has been established at CeMM.





# EMBanniversary AUSTRIA

Vienna, 7 - 8 July 2014

## 2014

CeMM researchers elucidated a mechanism of viral infection and superinfection, how immune pathways involved in influenza-induce susceptibility to secondary bacterial pneumonia. Under the patronage of Margit Fischer and in cooperation with the Medical University of Vienna, CeMM has established Genom Austria, a citizen science and educational project on genome sequencing. CeMM organized the EMBanniversary Conference on the occasion of 50 years of EMBO and 40 years of EMBL.

#### Principle Nr. 5

##### **Investment in young scientists all the time.**

We provide the best possible science and medicine training for students and young scientists from more than 45 nations.

In our internationally competitive PhD Program, CeMMies are trained not only in basic research and medicine, but also for professional soft skills, networking, writing and giving seminars. CeMM alumni left for great positions at Stanford, EPFL, Max Planck, University of Oxford, in pharmaceutical industry, at start-up companies like Haplogen, MyeloPro, Aelian Biotechnology or Allcyte – to mention just a few.

#### Principle Nr. 6

##### **Active commercialization and impact creation.**

CeMM strategically fosters a translational impact of our research for society through technology applications, spin-off companies, out-licensing and strategic partnering with industry. Only by doing so proactively, CeMM can fulfil its societal mandate to assist in preparing the medicine of the future and maintain independence.



## 2015

The CeMM Time Capsule, a repository for anonymous ideas and an art room for finding new inspiration designed by Martin Walde and Giulio Superti-Furga was inaugurated by City Councilor for Cultural Affairs and Science, Andreas Mailath-Pokorny. CeMM was honored by the visit of Austria's President Heinz Fischer, and Italian's President Sergio Mattarella. Start of the CeMM co-founded and EU funded gender equality project LIBRA (Unifying innovative efforts of European research centres to achieve gender equality in academia).



## 2016

The Ludwig Boltzmann Institute for Rare and Undiagnosed Diseases (LBI-RUD) was founded by the Ludwig Boltzmann Gesellschaft GMBH in collaboration with CeMM, the Medical University of Vienna and the St. Anna Children's Cancer Research Institute. The annual EU-Life strategy meeting was hosted by CeMM. The 10th Karl Landsteiner Lecture was delivered by Emmanuelle Charpentier on the revolution of CRISPR-Cas genome-engineering.

### Principle Nr. 7

#### **Maximum innovation at all levels.**

The very heart and soul of CeMM is free-minded scientific creativity for the benefit of knowledge. In an environment specially designed to inspire and cooperate maximally, our Principal Investigators pursue curiosity- and excellence-driven research, with guaranteed independence and with an emphasis on collaboration. Inspired by the medical environment offered by the General Hospital AKH and the Medical University of Vienna, CeMM has been the birthplace of new research themes and directions such as haploid cell genetics, single cell genomics and epigenomics, natural antibodies, super-infections, resolution of inflammation, chemical biology of diabetes, drug transporters, nuclear metabolism and network medicine.

### Principle Nr. 8

#### **Development of new technologies for**

**a better future.** We imagine and pioneer in precision and personalized medicine through innovative tools and approaches. We developed PLACEBO, the first academic drug screening platform in Austria. We were at the forefront of chemical proteomics and single human cell genomics, sequenced the first full human genome, measured the first full human epigenome and performed the first ex vivo blood test with high content automated microscopy in Austria. We developed several technologies to reveal the mechanism of action of drugs, reflected in our patent portfolio.

# 2017

CeMM celebrated its 10th anniversary together with stakeholders and friends from politics and research. The 50th PhD student graduated. Almost 650 papers were published in the first decade.

# 10



#### Principle Nr. 9

**Engagement of society through participative projects.** CeMM is involved in various scientific, cultural and educational projects to prepare society for the genomic and participatory future of medical care.

We engage society to discuss the rights and duties towards research. Art projects and societal partnerships are important tools for us to continue our dialogue with citizens: the Genom Austria project, the SMART lecture series, the art façade of the CeMM building, the Brain Lounge discussion rounds and the Time Capsule are just a few examples of CeMM's efforts to foster the exchange between scientists, artists and the broader public.

#### Principle Nr. 10

**Elaboration of personalized solutions whenever possible.** In tight strategic partnership with the Medical University of Vienna, CeMM initiated a program for rare and undiagnosed diseases to develop utility of the genomic pipeline, and implemented a precision medicine platform for hematological malignancies. Our precision medicine paradigm is based on the manifold approaches and technologies elaborated at CeMM in the last ten years, such as the development of “pharmacoscopy”. In addition, CeMM has become a center of reference for medical genomics and epigenomics.



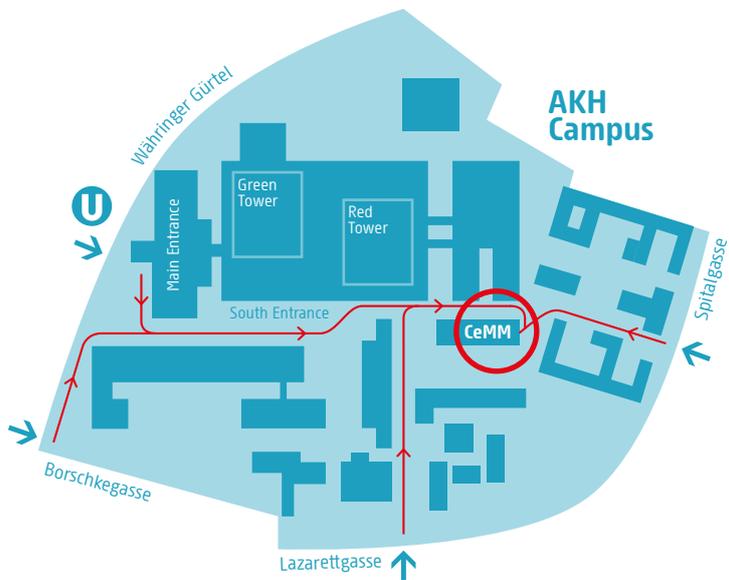
## 2018

CeMM faculty has been extended. Out of some 100 applications, five Adjunct Principal Investigators were selected, who - in the spirit of super-collaboration - bring in additional expertise and training.

## 2019

The CeMM Alumni Club, a network of former employees was founded. Despite of their most diverse career paths, the members stay closely connected with CeMM. CeMM Principal Investigator Kaan Boztug became Scientific Director of St. Anna Children's Cancer Research Institute.





**CeMM**  
**Research Center for Molecular Medicine**  
**of the Austrian Academy of Sciences**  
Lazarettgasse 14, AKH BT 25.3  
Main Entrance, 1st Floor  
1090 Vienna, Austria

For more information  
please visit our website:  
[www.cemm.at](http://www.cemm.at)  
or contact  
[office@cemm.at](mailto:office@cemm.at)

# Ce-M-M-

Research Center for Molecular Medicine  
of the Austrian Academy of Sciences

ÖAW

AUSTRIAN  
ACADEMY OF  
SCIENCES

