

Prestigious award from the Bayer Science & Education Foundation:

2016 Otto Bayer Award goes to Professor Dr. Dirk Trauner

Researcher at the Ludwig Maximilians University Munich, Germany, is honored for pioneering contributions in “photo pharmacology and optogenetics”

Leverkusen, April 25, 2016 – The award-winner of the 2016 Otto Bayer Award has been named: the Board of Trustees of the Bayer Science & Education Foundation and the Scientific Committee for this award have presented Professor Dr. Dirk Trauner with the EUR 75,000 prize, one of Germany’s most prestigious scientific accolades. The award is in recognition for his pioneering contributions in “Photopharmacology and Chemical Optogenetics”. Trauner developed novel switches that can sensitize a wide variety of cellular processes toward light. His work has potential to open new chemotherapeutical treatment opportunities, including chemical treatment strategies to cure blindness and cancer. The award will be officially presented by Werner Baumann, who will become the CEO of Bayer at May 1, 2016, at a ceremony in Berlin on June 6, 2016.

The Otto Bayer Award honors scientists who have conducted pioneering research in innovative areas of chemistry and biochemistry. It has been presented since 1984 in memory of its endower Professor Dr. Otto Bayer (not related to the company founder). The long-tenured Head of Research at Bayer AG invented polyurethane chemistry. He strengthened the contact of industry and academia and supported the training of young scientist throughout his long career.

Prof. Ernst-Ludwig Winnacker, Chairman of the Board of Trustees of the Bayer Science & Education Foundation, said: "Photopharmacology is the control of small molecules by light. The precision of their effects in biological systems can be increased so fundamental that this concept has become an indispensable tool of modern cell biology research and already provides important impetus for future applications in neuroscience and cancer. Dirk Trauner is a pioneer of this technology at the interface between biology and chemistry, and therefore seems to the jury an ideal candidate for the most prestigious Otto Bayer Award."

The Otto Bayer 2016 Award is being given in recognition of this innovative technology, but also on the broad objective of Trauner's research: to demonstrate the awesome power of chemical synthesis with challenging target molecules and to use it toward the establishment of synthetic biological pathways. This work is of high value for a life science company as Bayer, where a major part of the business is to invent and produce new molecules that interact with the biochemical processes in various living species.

"Our future will be shaped by advances in basic and applied research. We want to promote science and strengthen excellence," said Kemal Malik, member of the Bayer Board of Management for Innovation and Chairman of the foundation. "Research plays a central role for the inventor company Bayer. The knowledge, acceptance and application of future technologies in the life sciences are key framework conditions in our society, and Bayer AG wants to contribute to establishing them among other means through its foundations and by awarding this prize," Malik continued.

The prize is awarded by the Bayer Science & Education Foundation. The foundation acts as initiator, promoter and partner for progress at the interface between industry, academia and civil society. The primary objectives are the recognition of frontier research, the promotion of science talents and the support for innovative school science projects. In terms of content, the activities focus on life science, health and medicine. The foundation honors frontier research achievements every two years with the Otto Bayer Award and in alternate years with the Hansen Family Award, each of which carries prize money of EUR 75,000. In addition, the foundation presents two talent awards: The international Bayer

Early Excellence in Science Award in biology, chemistry and medical science, each with prize money of EUR 10,000, and the Bayer Thrombosis Research Award for basic and clinical thrombosis research with prize money of EUR 30,000.

The new Otto Bayer Award winner, Dirk Trauner was born and raised in Linz, Austria, studied biology and chemistry at the University of Vienna, and received his undergraduate degree in chemistry from the Free University, Berlin. He then pursued a PhD in chemistry under the direction of Prof. Johann Mulzer, with whom he moved to the University of Frankfurt and then back to Vienna. Following a mandatory stint in the Austrian Army, he became a postdoctoral fellow with Prof. Samuel J. Danishefsky at the Memorial Sloan-Kettering Cancer Center. After two great years in New York City, Trauner joined the Department of Chemistry at the University of California, Berkeley, where he rose through the ranks to become an Associate Professor of Chemistry (with tenure). He was also appointed as a member of the Lawrence Berkeley National Laboratory. In the summer of 2008, he moved to the University of Munich, where he currently resides as a Professor of Chemical Biology and Chemical Genetics. Despite his extensive forays into biology and physiology Trauner remains an organic chemist at heart, as evidenced by the synthesis of more than 80 natural products.

Dirk Trauner has been awarded the 2016 Emil Fischer Medal and is a Corresponding Member of the Austrian Academy of Sciences and a Fellow of the Royal Society of Chemistry. He is also the recipient of the Kitasato Medal, the Alfred P. Sloan Fellowship, an ERC Advanced Grant, and the Austrian Chemical Society Award for the best thesis in 1997. He sits on the editorial board of Natural Product Reports and the editorial advisory board of ACS Central Science, ACS Chemical Neuroscience, Cell Chemical Biology and Chem.

Note to editors:

A photo is available for download at <http://www.press.bayer.com>.

Contact:

Dr. Katharina Jansen, Tel.: +49 (0)214 30-33243

Email: katharina.jansen@bayer.com

For more information go to www.bayer.com

kj (2016-0xxxE)