

*The Japan Research Foundation for Optically Active Compounds
announces the recipient of*

The Yamada-Koda Prize 2017

Jan-E. Bäckvall

The Yamada-Koda Prize, consisting of a medal, a plaque, 500,000 Japanese yen and travel expenses to Japan, is awarded every year to a scientist whose research has had a major impact in the fields of the synthesis of optically active compounds. The Prize was founded in 1995 to commemorate the great contributions to the science in this field by the late Professor Shun-ichi Yamada and the late Professor Kenji Koda. The Yamada-Koda Prize will be awarded to Professor Jan-E. Bäckvall on December 15, 2017, at the 27th Symposium on Optically Active Compounds held in Tokyo, Japan.



Jan-E. Bäckvall graduated from the Royal Institute of Technology, Stockholm in 1971. He received his Ph. D. from the same place in 1975. During 1975-1976 he spent one year as a postdoc with K. B. Sharpless at Massachusetts Institute of Technology. In 1976, he became Assistant Professor and in 1977 Associate Professor, both at the Royal Institute of Technology, Stockholm. In 1986, he moved to Uppsala University as a Full Professor. In 1997 he moved to his current position as Professor at Stockholm University. Prof. Bäckvall is a Member of the Royal Swedish Academy of Sciences, Finnish Academy of Science and Letters, and Academia Europaea. In 2008-2016 he was a member of the Nobel Committee for Chemistry. He is a member of a number of Editorial Boards for scientific journals and he is the Chairman of the Editorial Board Of *Chemistry — A European Journal*.

He is renowned for his contributions to organopalladium chemistry and catalytic oxidation reactions where he has done mechanistic work and developed new reactions. He has also pioneered the development of efficient systems for dynamic kinetic resolution of alcohols and amines based on combined metal and enzyme catalysis. More recently, the enantioselectivity of enzymes was improved by directed evolution. The Bäckvall group has also developed a variety of useful aerobic biomimetic oxidation reactions. In these reactions electron-transfer mediators are employed to facilitate low-energy electron transfer similar to that occurring in natural systems. Recent applications of the latter topic involve palladium-catalyzed oxidative carbocyclizations.

His awards include the Arrhenius medal (1986), the Celsius Medal in Gold (2002), The "August-Wilhelm-von-Hofmann Lectureship Award" (2003), the Björkén prize (2003), the Award for Excellent Research Environments from the Swedish Research Council (2003), the Ulla and Stig Holmquist's Prize in Organic Chemistry (2005). ERC-Advanced Grant (2010), the George A. Olah Lectureship Award in Chemistry, University Of Southern California, Los Angeles, USA, and the Prelog Medal in Gold and Prelog Lecture, ETH, Zürich, Switzerland. He has published more than 490 papers and given more than 165 plenary and main lectures at international conferences.

Recipients

1995 Professor D. Enders
1996 Professor A. I. Meyers
1997 Professor D. A. Evans
1998 Professor H. B. Kagan
1999 Professor K. C. Nicolaou
2000 Professor D. Seebach
2001 Professor B. M. Trost
2002 Professor L. E. Overman
2003 Professor A. B. Smith, III
2004 Professor H. Yamamoto
2005 Professor S. V. Ley
2006 Professor S. E. Denmark
2007 Professor E. Negishi
2008 Professor E. N. Jacobsen
2009 Professor M. T. Reetz
2010 Professor A. H. Hoveyda
2011 Professor A. Pfaltz
2012 Professor Y. Kishi
2013 Professor B. L. Feringa
2014 Professor E. M. Carreira
2015 Professor C. Fu
2016 Professor T. Hayashi

Selection Committee

- M. Shibasaki (Chairman)
- T. Shioiri
- S. Ikegami
- K. Tomioka
- S. Hashimoto

The Japan Research
Foundation for Optically Active
Compounds
c/o Microbial Chemistry
Research Foundation
Institute of Microbial
Chemistry, Tokyo, 3-14-23
Kamiosaki, Shinagawa-ku,
Tokyo, 141-0021, Japan