

**Prof. Dr. Johannes Orphal**  
**Head of Division 4 "Natural and Built Environment"**  
**Karlsruhe Institute of Technology (KIT)**  
**Karlsruhe, Germany**



**born 11.07.1966 in Magdeburg, Germany**  
**married, 4 children**  
**German citizen**

### **Professional career**

2020- Head of Division 4 "Natural and Built Environment", KIT, Karlsruhe  
2009- Full Professor of Physics, KIT, Karlsruhe  
2009-2020 Director, Institute for Meteorology and Climate Research (IMK), KIT, Karlsruhe  
2006-2009 Professeur des Universités (Physique), Université de Paris-Est, Créteil, France  
2005-2008 Visiting Scientist (3 months per year), University College Cork (UCC), Ireland  
2002 Habilitation à Diriger les Recherches, Université de Paris-Sud, Orsay, France  
1999-2005 Chargé de Recherche, CNRS, Laboratoire de Photophysique Moléculaire, Orsay, and Laboratoire Interuniversitaire des Systèmes Atmosphériques, Créteil, France  
1995-1999 Research Associate (PostDoc), Institute of Environmental Physics (IUP) and Institute of Remote Sensing (IFE), University of Bremen, Germany  
1995 Docteur en Sciences ("Lasers et Matière"), Université de Paris-Sud, Orsay, France  
1991-1995 Doctoral Student, Laboratoire de Physique Moléculaire et Applications, CNRS and Université de Paris-Sud, Orsay, France  
1991 Diploma in Physics, Division of Molecular Physics, Humboldt University of Berlin  
1986-1991 Physics Student, Humboldt University Berlin  
1984-1986 Computer Operator (IBM 360), professional training and certificate, VEB DVZ, Berlin  
1984 Abitur, Max-Planck-Gymnasium (1st EOS), Berlin

### **Awards**

2019 Corresponding Member, Académie de l'Air et de l'Espace, Toulouse, France  
2018 Prix "Gay-Lussac – Humboldt" of the Académie des Sciences (Paris), France  
2017 "Gentner – Kastler" Prize (jointly awarded by the German DPG and the French SFP)  
2014 Prix "La Recherche" (France), category Environnement (Co-Lauréat), France  
2012 Faculty Award for the best Experimental Physics Lecture, KIT, Karlsruhe, Germany  
2010 Milestone Paper Award (3 papers) – 50 Years of the Journal of Quantitative Spectroscopy & Radiative Transfer  
2005-2008 EU Senior Research Fellow, Transfer of Knowledge (ToK) Network, University College Cork (UCC), Ireland  
2004 Prix de la Valorisation de la Recherche (Prix du Conseil Général de l'Essonne), Université Paris-11 (Paris-Sud), Orsay, France  
2003 The Journal of Molecular Spectroscopy Special Review Lecture, Award received at the 58th International Symposium on Molecular Spectroscopy, Ohio State University, Columbus, USA  
1998-1999 "Emmy Noether" Fellow of the German Research Foundation DFG, individual fellowship  
1992-1994 "Marie Curie" Fellow of the European Commission CEC DG-XII, individual fellowship  
1991-1992 MICECO Fellow of the French Government (initiative of President François Mitterrand)

### **Scientific publications and direction**

>250 publications, >190 peer-reviewed papers (ISI), >20000 citations, h-index 52 (Google Scholar)  
Direction of >30 PhD students, active teaching (University level) since 1997

### **Research management and leadership of large scientific projects (selected)**

Management Board of the Research Field "Earth and Environment", Helmholtz Association (HGF), 2020-  
Board of Trustees for the German research aircraft HALO ("High-Altitude Long-Range Aircraft"), 2020-  
Board of Trustees for the High-Altitude Research Station "Schneefernerhaus" (Mt Zugspitze), 2020-  
Chairman of the Board of CEDIM ("Center for Disaster Management and Risk Reduction"), 2020-  
Scientific Spokesperson for the "Atmosphere and Climate" programme, funded by the German  
government (BMBF) via the Helmholtz Association (HGF), 2011-2019

Member of the Scientific Steering Committee for the German research aircraft HALO ("High-Altitude  
Long-Range Aircraft"), 2010-2020

Member of the Mission Advisory Group for the "Meteosat Third Generation" (MTG) Infrared Sounder  
(IRS), EUMETSAT, 2017-2020

Vice-President of EUCOR ("Association of European Universities on the Upper Rhine"), 2014-2015

Scientific Spokesperson of the KIT Center Climate and Environment, 2011-2015

Member of the Mission Advisory Group for PREMIER (Earth Explorer 7 candidate), ESA, 2009-2013

Steering Committee of the "Programme National Chimie Atmosphérique" (PNCA), France, 2005-2009

### **Committees (selected)**

Member of the International Selection Committee, Institut Universitaire de France (IUF), 2024-

Chair of the Research and Transfer Committee of the European University Alliance EPICUR, 2023-

Chair of the Environmental Physics Division, European Physical Society (EPS), 2020-

Member (appointed by the Ministry MESRI) of the Conseil Scientifique of the CNRS (France), 2018-2024

Scientific expert for the Belgian Federal Science Police Office (BELSPO), Bruxelles, 2015-

Scientific expert for the Alexander von Humboldt Foundation, Bonn, 2010-

Scientific expert for the research agencies ANR (including EQUIPEX) and AERES/HCERES, 2005-

Chair of the International Prize Committee of the German Physical Society, 2019-2023

Scientific Committee of the "High-Resolution Molecular Spectroscopy" (HRMS) Conferences, 2005-2023

Member of the KIT Senate, 2011-2020

Scientific expert and jury member for the Robert Bosch Foundation, Stuttgart, 2017-2020

Member of the Scientific Advisory Council, European Centre for Medium-Range Weather Forecasts  
(ECMWF), 2011-2018

Member of the International Radiation Commission (IRC), IUGG-IAMAS, 2009-2016

Scientific Advisory Board of the Leibniz Institute for Atmospheric Physics, Kühlungsborn, 2013-2016

Scientific Advisory Board of the Leibniz Institute for Tropospheric Research, Leipzig, 2009-2016

President of the AEQES (Belgium) Committee for Physics, Chemistry, Geosciences, 2014-2015

Vice-Chair of the Committee on Space Research (COSPAR) Commission A1 ("Atmosphere, Meteorology,  
and Climate"), 2004-2012

Member of the Conseil National Universitaire (CNU), Section 30 "Physique Atomique et Moléculaire,  
Optique, Spectroscopie", 2006-2009

Member of the Bureau National of the Société Française de Physique (SFP), 2005-2009

Member of the Conseil d'Administration of the Société Française de Physique (SFP), 2003-2005