University of Antwerp

Curriculum Vitae - Prof. dr. Erik Neyts

(° June 1st, 1977, Belgium)

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Academic Career

2021 – now	Full professor, University of Antwerp
2017 – 2020	Associate professor, University of Antwerp
2011 – 2016	Assistant professor, University of Antwerp
2015	Visiting professor, University of Orléans, France
2007 – 2011	FWO postdoctoral researcher, University of Antwerp; 6 months visiting postdoctoral researcher University of Tokyo, Japan
2006 – 2007	Postdoctoral researcher, University of Antwerp
2002 – 2006	PhD student University of Antwerp

Fields of scientific expertise

Subjects	physical chemistry, catalysis, plasma catalysis and plasma-surface interactions; carbon nanotube growth; nanoclusters
Techniques	molecular dynamics; Monte Carlo; meta- and hyperdynamics; density functional theory

PhD Supervision record

Promotor of 13 defended PhDs
Promotor of 5 running PhDs
Promotor of 1 running joint PhD

Teaching activities

General Chemistry, 1st Bachelor Chemistry, Biochemistry and Bio-engineering
General Chemistry, 2nd Bachelor Business Engineering
Chemical Thermodynamics, 2nd Bachelor Chemistry
Dynamic Processes at Surfaces, 1st Master Chemistry
Plasma Modeling, 1st Master Chemistry

University of Antwerp

Organization (University level)

Vice-president of Educational Board Chemistry, University of Antwerp
Departmental representative Honours Programme Organizing Committee, Faculty of Science
Member of the Quality and Innovation Cell in Education in the Faculty of Science
Substitute representative Faculty of Science in Educational Council

Selected scientific events

1. Chair of "Workshop on Graphene and Carbon Nanotubes"
   joint UA/IMEC workshop (with S. De Gendt), IMEC, Leuven, Belgium, September 23, 2011
2. Chair of "School on Atomistic Simulation Techniques"
   FWO-WOG workshop, UA, Antwerp, Belgium, September 23-24, 2013
3. Chair of "Workshop in Plasma-Surface Interaction Modeling"
   EU ITN "RAPID" workshop, Tyndall Institute, Cork, Ireland, March 4-6, 2015
4. Chair of "iPlasmaNano-VIII" conference
   University of Antwerp, Antwerp, Belgium, July 2 – 6, 2017

Awards and distinctions

>160 peer reviewed papers
>60 invited seminars and lectures at international conferences
H-index 35

3 "best teaching" awards
B. Eliasson Award on plasma catalysis, 2016
Member of FWO, national funding agency expert panel, physics division
Guest editor of 3 special issues (J. Phys. D: Appl. Phys., Catal. Today, Front. Chem. Sci. Eng.)
Member of Editorial Board of Frontiers of Chemical Science and Engineering
Member of Editorial Board of Nanomaterials

Selected papers

1. E. C. Neyts, K. Ostrikov, M. Sunkara, A. Bogaerts. Plasma Catalysis: Synergistic Effects at the Nanoscale, **Chem. Rev.** 115 (2015) 13408
2. K. Ostrikov, E. C. Neyts, M. Meyyappan. Plasma Nanoscience: from Nano-Solids in Plasmas to Nano-Plasmas in Solids, **Adv. Phys.** 62 (2013) 113
3. E. C. Neyts, A. Bogaerts. Understanding plasma-catalysis through modelling and simulation – a review, **J. Phys. D: Appl. Phys.** 47 (2014) 224010
4. K. M. Bal, E. C. Neyts, A. Bogaerts, Ensemble-Based Molecular Simulation of Chemical Reactions under Vibrational Nonequilibrium, **J. Phys. Chem. Lett.** 11 (2020) 401
5. A. Bogaerts, E. C. Neyts. Plasma Technology: An Emerging Technology for Energy Storage, **ACS Energy Letters.** 3 (2018) 1013