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Date and place of birth:	October 21, 1962 in Veldhoven, The Netherlands
Nationality:	Dutch
Family status:	Married

Education:

1975-1981
Passed VWO-Bèta exam Cum Laude.

1981-1986
Study in Physics at the Eindhoven University of Technology.

May 14, 1986
Passed Doctoral exam Cum Laude. Specialization: Theoretical Physics.

May 15, 1986 - October 20, 1989
Ph.D. in Theoretical Physics at the Eindhoven University of Technology. Promotors: prof.dr. B.J. Verhaar and prof.dr. W. Glöckle. Title of thesis: *Few-Body Collisions in a Weakly Interacting Bose Gas*.

Career/Employment:

October 21, 1989 - July 31, 1993
Assistent Professor (UD) at the Eindhoven University of Technology, Department of Theoretical Physics.

May 1, 1990 - May 31, 1991
Visiting Assistant Professor at the University of Illinois at Urbana-Champaign, Illinois, U.S.A. in the group of prof.dr. A.J. Leggett.

Juli 1, 1992 - September 30, 1992
Visiting Assistant Professor at Indiana University, Bloomington, Indiana, U.S.A. in the group of prof.dr. S.M. Girvin.

August 1, 1993 - June 30, 1997
Assistant Professor (UD) at Utrecht University, Institute for Theoretical Physics.

October 1, 1996 - December 31, 1996
Visiting Professor at the Rice University, Houston, Texas, U.S.A.

June 1, 1997 - June 30, 1997
Visiting Professor at the University of Innsbrück, Austria.

July 1, 1997 - September 30, 1999
Associate Professor (UHD) at Utrecht University, Institute for Theoretical Physics.

October 1, 1999 - present
Full Professor at Utrecht University, Institute for Theoretical Physics.

October 1, 1999 - December 31, 2004
Scientific Director of the Dutch Research School of Theoretical Physics (LOTN).

April 1, 2001 - May 31, 2001
Visiting Professor at the Massachusetts Institute of Technology, Cambridge, Massachusetts, U.S.A.

April 26, 2004 - May 28, 2004
Distinguished Simons Lecturer at the State University of New York, Stony Brook, New York, U.S.A.

January 1, 2008 - August 31, 2011
Scientific Director of the Institute for Theoretical Physics at Utrecht University.

September 1, 2011 - August 31, 2014
Vice-Dean Research of the Science Faculty of Utrecht University.

Januari 1, 2013 - March 31, 2016
Executive Board Member of the Delta Institute for Theoretical Physics (Δ-ITP).

April 1, 2014 - December 31, 2017
Programme Leader of the Focus Area Complex Systems Studies of Utrecht University.

Januari 1, 2015 - December 31, 2020
Scientific Director of the Dutch Research School of Theoretical Physics (LOTN).

Specialization:

i) main field

Atomic Physics, Many-Body Physics, Condensed Matter Physics.

ii) other fields

Few-Body Physics, Computational Physics.

iii) current interests

Collective quantum phenomena in Dirac and Weyl semimetals, (two-dimensional) electron-hole plasmas, Bose-Einstein condensation of light, and holographic superconductors.

Co-promotor of:

i) E. Tiesinga

Ultracold Atoms in Traps and Fountains, Eindhoven University of Technology, January 12, 1993.

ii) A.C. Maan

Spin-polarized Atomic Hydrogen: Devices and Phenomena, Eindhoven University of Technology, June 15, 1993.

Promotor of:

i) M. Bijlsma

Quantum Degeneracy in a Bose gas, Utrecht University, January 13, 1997.

ii) M. Houbiers

Bose Condensation and Cooper Pairing in Spin-Polarized Alkali Gases, Utrecht University, November 23, 1998.

iii) M.J. Bijlsma

Trapped Bose-Einstein Condensed Gases out of Equilibrium, Utrecht University, November 13, 2000.

iv) R.A. Duine

Atom-Molecule Coherence in Bose Gases, Utrecht University, October 27, 2003. Judicium: Cum Laude.

v) D. van Oosten

Quantum Gases in Optical Lattices: The Atomic Mott Insulator, Utrecht University, September 13, 2004. Judicium: Cum Laude.

vi) G.M. Falco
Resonantly Interacting Ultracold Atomic Fermi Gases, Utrecht University, October 3, 2005.

vii) D.B.M. Dickerscheid
Quantum Phases in Optical Lattices, Utrecht University, February 6, 2006.

viii) M. Snoek
Vortex Matter and Ultracold Superstrings in Optical Lattices, Utrecht University, June 23, 2006.

ix) M.W.J. Romans
Dressed Molecules in Atomic Quantum Gases, Utrecht University, February 7, 2007.

x) A.O. Koetsier
Strongly Interacting Fermions in Optical Lattices, Utrecht University, July 6, 2009.

xi) K.B. Gubbels
Exotic Superfluidity in Imbalanced Fermi Mixtures, Utrecht University, January 13, 2010. Judicium: Cum Laude.

xii) J.M. Diederix
Nonperturbative Phenomena in Resonantly Interacting Quantum Gases, Utrecht University, September 28, 2011.

xiii) A.C. Swaving
Spin Transport and Dynamics in Antiferromagnetic Metals and Magnetic Insulators, Utrecht University, March 2, 2012. Co-promotor: dr. R.A. Duine.

xiv) M.E. Lucassen
Coupling between Current and Dynamic Magnetization from Domain Walls to Spin Waves, Utrecht University, May 16, 2012. Co-promotor: dr. R.A. Duine.

xv) M.P. Mink
Pseudospin Pairing and Transport in Atomic Fermi Gases and Bilayer Systems, Utrecht University, September 12, 2012. Co-promotor: dr. R.A. Duine.

xvi) J.H. van Driel
Spin Transport in Bose Gases, Utrecht University, December 12, 2012. Co-promotor: dr. R.A. Duine.

xvii) J.J.R.M. van Heugten
Unitary Quantum Gases: From Cold Atoms to Quark-Gluon Plasmas, Utrecht University, June 14, 2013.

xviii) J.E. Baarsma
Supersolid Phases in Mass Imbalanced Fermi Mixtures, Utrecht University, September 4, 2013.

xix) E. van der Bijl
Spin Currents and Magnetization Dynamics in Multilayer Systems, Utrecht University, January 28, 2014. Co-promotor: dr. R.A. Duine.

xx) J. Armaitis
Hydrodynamics of Bose Gases with Internal Degrees of Freedom, Utrecht University, June 3, 2015. Co-promotor: dr. R.A. Duine.

xxi) V.P.J. Jacobs
Dirac and Weyl Semimetals with Holographic Interactions, Utrecht University, August 24, 2015. Second promotor: prof.dr. S.J.G. Vandoren.

xxii) A.-W. de Leeuw
Many-Body Phenomena in a Bose-Einstein Condensate of Light, Utrecht University, June 22, 2016. Second promotor: prof.dr. R.A. Duine.

xxiii) B. Flebus
Collective Spin and Heat Transport through Magnetic Systems, Utrecht University, April 10, 2017. First promotor: prof.dr. R.A. Duine.

Books:

i) Ultracold Quantum Fields
Written by H.T.C. Stoof, K.B. Gubbels, and D.B.M. Dickerscheid. Published in 2009 by Springer Science+Buisness Media B.V. in association with Canopus Publishing Limited.

Honors and awards:

2002
Honorary promotor of prof.dr. R.G. Hulet (Rice University).

2003
Recipient of the NWO VICI (Innovative Research Incentive Scheme) Award.

2004
Distinguished Simons Lecturer at the State University of New York.

2006
Fellow of the American Physical Society.

2012
Outstanding Referee of the American Physical Society.

2012
Recipient of the NWO Gravitation Premium.

2014
Elected Member of the Alumni Society *Mens Agitat Molem* of the Eindhoven University of Technology.

2018
Honorary promotor of prof.dr. A.L. Barabási (Northeastern University).

List of publications:

[1] L.P.H. de Goey, T.H.M. van de Berg, N. Mulders, H.T.C. Stoof, B.J. Verhaar, and W. Glöckle
Three-Body Recombination in Spin-Polarized Atomic Hydrogen
Phys. Rev. B **34**, 6183-6191 (1986)

[2] B.J. Verhaar, J.M.V.A. Koelman, H.T.C. Stoof, O.J. Luiten, and S.B. Crampton
Hyperfine Contribution to Spin-Exchange Frequency Shifts in the Hydrogen Maser
Phys. Rev. A **35**, 3825-3831 (1987)

[3] J.M.V.A. Koelman, H.T.C. Stoof, B.J. Verhaar, and J.T.M. Walraven
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Phys. Rev. Lett. **59**, 676-679 (1987)

[4] L.P.H. de Goey, H.T.C. Stoof, B.J. Verhaar, and W. Glöckle
Exact Determination of the bbb Incoming State for Recombination in $H{\downarrow}{\downarrow}$
Jap. J. Appl. Phys. Suppl. **26** (LT18), 247-248 (1987)

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Spin-Polarized Deuterium: Stabilization in Magnetic Traps
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[6] H.T.C. Stoof, L.P.H. de Goey, B.J. Verhaar, and W. Glöckle
The Role of Final-State Correlations in Recombination of Atomic Hydrogen
Jap. J. Appl. Phys. Suppl. **26** (LT18), 251-252 (1987)

[7] B.J. Verhaar, J.M.V.A. Koelman, H.T.C. Stoof, O.J. Luiten, and S.B. Crampton
Hyperfine Contributions to Spin-Exchange Frequency Shifts in the Hydrogen Maser
Jap. J. Appl. Phys. Suppl. **26** (LT18), 253-254 (1987)

[8] B.J. Verhaar, J.M.V.A. Koelman, H.T.C. Stoof, O.J. Luiten, and S.B. Crampton
Hyperfine Contributions to Spin-Exchange Frequency Shifts in the Hydrogen Maser
Proceedings of the 41st Annual Frequency Control Symposium, Philadelphia 1987

[9] H.T.C. Stoof, L.P.H. de Goey, W.M.H.M. Rovers, P.J.M. Kop Jansen, and B.J. Verhaar
Non-Singular Integral Equation for Two-Body Scattering and Applications in Two and Three Dimensions
Phys. Rev. A **38**, 1248-1257 (1988)

[10] J.M.V.A. Koelman, S.B. Crampton, H.T.C. Stoof, O.J. Luiten, and B.J. Verhaar
Spin-Exchange Frequency Shifts in Cryogenic and Room Temperature Hydrogen Masers
Phys. Rev. A **38**, 3535-3547 (1988)

[11] L.P.H. de Goey, H.T.C. Stoof, B.J. Verhaar, and W. Glöckle
Role of Three-Body Correlations in Recombination of Spin-Polarized Atomic Hydrogen
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[12] H.T.C. Stoof, J.M.V.A. Koelman, and B.J. Verhaar
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Surface Three-Body Recombination in Spin-Polarized Atomic Hydrogen
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[24] E. Tiesinga, H.T.C. Stoof, and B.J. Verhaar
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Kosterlitz-Thouless Transition in a Dilute Bose Gas
Phys. Rev. E **47**, 939-947 (1993)

[42] H.T.C. Stoof
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Phys. Rev. B **49**, 422-428 (1994)

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Hexatically Ordered Superfluids
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[45] H.T.C. Stoof and M. Bijlsma
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[55] M. Bijlsma and H.T.C. Stoof
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Phys. Rev. A **56**, 4864-4878 (1997)

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J. Low Temp. Phys. **114**, 11-108 (1999)

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Phys. Rev. A **59**, 1556-1561 (1999)

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Quantum Kinetic Theory of Trapped Atomic Gases
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Phys. Rev. A **63**, 053601 (2001)

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