

<https://cifra-c2unesco.ro/people/>

Affiliations:

- International Centre for Advanced Training and Research in Physics (CIFRA), P.O. Box MG12, 077125-Bucharest-Magurele, Romania – senior researcher 1, Director (2016-present)
- Horia Hulubei National Institute of Physics and Nuclear Engineering (IFIN-HH): senior researcher 1 (1999-2022);
- Horia Hulubei Foundation: professor, UNESCO chair holder (2010-2018); vice-president (2018-present)
- University of Bucharest, Faculty of Physics, professor, Doctoral school, PhD adviser (10 students)

Education and training

Postdoc (1996 – 1997) Observatoire de la Cote d’Azur, Nice (scholarship obtained through competition from the French Ministry of Education)

PhD-1988, Central Institute of Physics – Bucharest (ICEFIZ), Thesis: Spectroscopic properties of medium heavy and heavy nuclei;

Graduate: Faculty of Physics, Univ. of Bucharest: (1972-1977)-majoring nuclear physics;

High school: Carol I National College Craiova (1968-1972) (special physics class)

Research stages (a short list): JINR-Dubna; Univ. of Tuebingen; Max Plank Institute for Nuclear Physics-Heidelberg; Laboratoire d’Accélérateur linéaire – Orsay; Centre de Recherches Nucléaires-Strasbourg; Tokyo Institute of Technology; Observatoire de la Cote d’Azur-Nice; Iowa University; Inst. of Nuclear Theory-Seattle; LLNL-Livermore, Central Michigan University, University of Sao Paulo, CERN-Geneva, etc.

Research and leadership positions:

- Head of the theoretical physics department of IFIN-HH (2001-2008); leader of the Double Beta Decay group (2000-present);
- Director of the Centre of excellence in Nuclear Physics (2001-2004) and leader of the nuclear structure group-2000-present;
- Romanian team leader in the LHCb-CERN collaboration (2004-2009);
- Chair holder of the UNESCO Chair “Sustainable Development through Research and Education in Modern Physics” 2010-present)
- Director of Int. Centre for Advanced Training and Research in Physics (a UNESCO Cat. 2 Centre) and leader of the research group (2016-present).
- Vice-president Horia Hulubei Foundation (2015-present)

Memberships:

- Member of the collaboration Board of the LHCb experiment at CERN (2004-2009) ;
- Member of the Board of Deep Underground Neutrino Experiment (DUNE), Fermilab-USA (2015- present)
- Member of the Scientific Board of the Int. Basic Science Program of UNESCO (2015-2021)
- Member associate of the SuperNEMO, a DBD international experiment at Modane (2013-present); - Member of the Directorate and Scientific Council of Horia Hulubei National Institute of Physics and Nuclear Engineering (2002 - 2007);

- Member of the Directorate and Scientific Council of the National Institute of Materials Physics (2016 – present)
- Vice-president of the Horia Hulubei Foundation (2010-present)
- Member of Advisory Boards of Universe journal ; Frontiers in Physics

Refereere for: Physical Review Letters, Physical Review C, Journal of Physics G, Nuclear Physics A, Adv. in High Energy Phys, Physica Scripta, Symmetry, Universe, Frontiers in Physics, etc.

Languages: Romanian-mother tongue, English-C1/C2, French C1/C2

Areas of interest: atomic, nuclear and high energy physics, astroparticle physics, neutrino physics, astrophysics

Scientific contributions include: i) nuclear physics (prediction of spectroscopic properties of nuclei; study of the double-beta decay) ii) high energy physics (properties of B,D and C mesons, LNV processes, check of CPT and Lorentz symmetries within LHCb experiment at CERN) iii) astroparticle physics (neutrino and axion emission processes in neutron stars) iv) atomic physics (estimation of off-shell photoionization cross sections of atoms of astrophysical interest), etc

Publications (web of science): 461 articles published in international journals with the highest ISI impact factors (examples: Nature (1), Nature physics (2), PRL(83), JHEP (119), PLB (73), PRD(57), etc.), a Hirsh factor 72; ~ 20,000 citations (without self-citations), including Nature(9). Nature physics(6), Phys. Rep. (20), Ann.Rev.Nucl.Part. (25), Rep.Prog.Phys.(9), PRD(1730), JHEP(760), PLB(360), PRL(205), EPJC(605), EPJA(68), etc <https://www.webofscience.com/wos/woscc/summary/b2ab3792-834e-477c-be7e-7139bdbb093c-6b123eea/relevance/1>

<https://scholar.google.com/citations?hl=en&user=sgVdTJsAAAAJ>

Quality of citations: many citations in Rev. Mod. Phys., Phys. Rep., Ann. Rev. Sci. Part. Phys., Prog. Part. Nucl. Phys., Rep. Prog. Phys., Phys. Rev. Lett., Phys. Rev. C and D, etc.

Invited talks, oral presentations, invited seminars (>60; a short selection) i) talks WEIN1995, Tokyo; TH2002, Paris; NRST2003, Dubna, Russia; “Microscopic Nuclear Structure Calculations”, INT-Seattle, 2004; Joint Meeting of Am. Phys. Society and Phys. Society of Japan, Hawaii(2009), MEDEX, Prague (editions:2013,2015,2017,2019,2012); Int. Symp. on Phys. of Unstable Nuclei (ISPUN2014), HoChiMinh-Vietnam; Int. Spring Conf. on Nucl. Phys., Ischia (2014); TAUP2015, Torino; TAUP2021, Valencia; ICNP2016, Adelaide; Neutrinos&DarkMatter(2018), Daejeon, ICHEP2018, Seoul; Workshop on Physics of fundamental Symmetries and Interactions, Villigen PSI Switzerland; Conference on Nuclear and Neutrino Physics February, 2020, Cape Town; Symposium on Symmetries in subatomic Physics, Vienna 2022.

ii) invited seminars: LEGNARO, Padova, Italy (1991); Inst. Phys. Nucl., Orsay (1992); Div. Theor. Phys.-CEA, Saclay (1992), ECT*-Trento (1992); CRN-Bordeaux(1993); MPI-Heidelberg (1993-2000); GSI-Darmstadt (1994); Nucl. Res. Center Nucl. Phys. Osaka(1995); Obs. de la Cote d`Azur, Nice (1996-2003); Univ. of Jyvaskyla (1996); Univ. of Sao Paulo(2000, 2004); Fed. Univ. of Rio de Janeiro(2000); Iowa Univ.(2001, 2003); Centre de Physique de Particules-Marseille (2003); Univ. of Texas A&M (2004), Lawrence Livermore National Laboratory (2006); LAL-Orsay-2012; CERN-LHCb (2013); Inst. of Phys, Hanoi (2014); OCA-Nice (2016); Univ. of Zurich (2016).

Projects: director of ~ 25 national and international research and education projects

International meetings that I organized.

I was part of the organizing committee, as chair, vice-chair, scientific secretary, of several international meetings, some of them are followed by proceedings published by renowned publishers.

- Nato-ASI school on nuclear physics, A. Sandulescu (IFIN-HH), W. Scheid (Gissen Univ.) and **S. Stoica** (IFIN-HH), August 1993, Predeal, Romania.
- Workshop on "Double-Beta Decay and Related Topics", Trento (Italy), April 24-May 5, 1995, Proc.: eds. H.V. Klapdor-Kleingrothaus and **S. Stoica**, World Scientific, 1996.
- Int. Summer School "Structure and Stability of Nucleon and Nuclear Systems", August 24 - September 5, Predeal, 1998, Proc.: eds. A.A. Raduta, **S. Stoica** and I.I. Ursu, World Scientific, 1999.
- Internat. Symposium "Advances in Nuclear Physics", Bucharest, December 9 - 10, 1999, Proc.: eds. D.N. Poenaru and **S. Stoica**, World Scientific, 2000.
- Predeal Int. Summer School "Structure and Stability of Nucleon and Nuclear Systems", August 24 - September 5, Predeal, 1998, Proc.: eds. A.A. Raduta, **S. Stoica** and I.I. Ursu, World Scientific, 1999.
- Carpathian Summer School " Exotic Nuclei and Nuclear/Particle Astrophysics", June 13-24, 2005, Mamaia, Romania, Proc.: ds. **S. Stoica**, L. Trache and R.E. Tribble, World Scientific, 2006.
- "Grid Activities within Large Scale International Collaboration", October 20-25, 2006, Sinaia, Romania, **S. Stoica**, M. Petrovici (with participation of representatives of the ATLAS, ALICE, LHC experiments, as well as of Grid networks from GSI-Darmstadt, JINR-Dubna, EGEE-Grece, VDG-Chicago, etc.).
- Workshop on "Low-x physics, Sinaia, October 2005, **S. Stoica** (IFIN-HH), I. Caprini (IFIN-HH) and E. Iancu (CEA-Saclay);
- Carpathian Summer School " Exotic Nuclei and Nuclear/Particle Astrophysics", August 20-30, 2007, Sinaia, Romania, Proc.: eds. L. Trache and **S. Stoica**, American Institute of Physics (AIP), 2008.
- Carpathian Summer School " Exotic Nuclei and Nuclear/Particle Astrophysics", 20 June – 3 July, 2010, Sinaia, Romania, Proc.: eds. L. Trache, **S. Stoica**, A.Yu. Smirnov, American Institute of Physics, 2010.
- Workshop on "To the Resolution of the Double-Beta Decay", Trento (Italy), April 24-May 5, 2012, **S. Stoica**(IFIN-HH), M. Horoi(CMU) and J. Suhonen (Jyvaskyla).
- Congress "Lights of the World" dedicated to the International Year of Light 2015 and celebration of 70th anniversary of UNESCO, October 31 – November 1, 2015, Bucharest, Romania, **S. Stoica**(IFIN-HH, main organizer) and R. Constantinescu (Univ. of Craiova).
- Pontecorvo Neutrino Physics School, 8th edition, Chairmen: V.A. Matveev (JINR), Scientific program: S.M. Bilenky (JINR), Vice-chairmen: A.G. Olshevskiy (JINR), **S. Stoica** (**CIFRA**, Bucharest), F. Šimkovic (Comenius Univ./JINR), I. Štekl (CTU Prague); Members: V.A. Bednyakov (JINR), V.B. Brudanin (JINR), C. Giunti (Univ. Torino), E. Kolganova (JINR), R. Leitner (Charles U. Prague),

Awards, Honours

- Award of the Romanian Academy for physics (1996)
- Prize for "Research domain", granted by minister of Research (2022)
- Nominated for the UNESCO-Russia Mendeleev prize (edition 2021).
- Universe (mdpi) journal dedicates a special volume "Recent Advances in Double Beta Decay Investigations" in my honor https://www.mdpi.com/journal/universe/special_issues/CF1U2P4PQ9
- Interview requested by the "Gandit in Romania" foundation (www.ganditinromania.ro)