

## Curriculum Vitae

Paola Batistoni

## PERSONAL INFORMATION

Name BATISTONI, Paola E-mail paola.batistoni@enea.it

Nationality Italian

**EDUCATION AND TRAINING** 

23.11.1982 Laurea in Fisica - Florence University (110/110 cum laude).

Thesis title: "Resistive instabilities in astrophysical plasmas".

**WORK EXPERIENCE** 

1.7.2018 – present

Name of employer Agenzia Nazionale per le Nuove Tecnologie, l'Energia e lo Sviluppo economico sostenibile,

ENEA - Department of Fusion and Technology for Nuclear Safety and Security

Occupation or position held Head of Fusion Development Unit

Development and promotion of ENEA fusion research activities in the framework of

European and international projects. Participation in the preparation of the European fusion

programme carried out by Eurofusion.

1.1.2014 – present

Occupation or position held

Name of employer ENEA - Department of Fusion and Technology for Nuclear Safety and Security

Project Leader of JET Deuterium-Tritium Technologies – Work package JET3 of

**EUROfusion Consortium** 

Main activities and responsibilities

Scientific leadership and resource management of the EUROfusion Consortium Work Package on the exploitation of JET Deuterium – Tritium operations. The objective is the development of fusion technologies in the fields of neutronics and activation, test blanket modules, radiation induced damage in materials, development of rad hard detectors, nuclear

safety, tritium retention in plasma facing materials.

21.07.2008 - 26.09.2012

Name and of employer

Occupation or position held Main activities and

responsibilities

**ENEA - Fusion Unit** 

Italian Industry Liaison Officer for ITER

Promotion of the Italian Industry participation in the construction of ITER fusion reactor. Wide range of initiatives at national level to provide technical support to industries and to raise awareness regarding business opportunities and ways to get involved in the ITER project.

3.3.2003 - 14.09.2012

Name of employer

**ENEA Fusion Division** 

Occupation or position held

Main activities and responsibilities

**Head of Technology Transfer Unit** 

Identification of new funding opportunities for the research activity. Promotion of technology transfer from fusion research activities, outreach and diffusion of innovation, and exploitation of facilities. Promotion of collaboration with industry on technology projects. ITER Industry

Liaison Officer for Italy.

14 .4.1994 – 21.12.2002

Name of employer

**ENEA Fusion Sector** 

Occupation or position held

Main activities and

responsibilities

Head of Fusion Neutronics Division

Management and scientific exploitation of the Frascati 14-MeV Neutron Generator (FNG) and of neutron diagnostics on the Frascati Tokamak Upgrade (FTU). Development of neutronics computational tools and neutronics analyses. Design of fusion systems. Principal Investigator of numerous EFDA, F4E and ITER tasks. Co-ordination of several projects and

international collaborations.

9.7. 1984 - 14.4.1994

Name of employer

**ENEA Fusion Division** 

Occupation or position held

Researcher

Main activities and responsibilities

Measurements and analyses of neutron emission in the Frascati Tokamak (FT), in the Frascati Tokamak Upgrade (FTU) and in JET. Development of innovative neutron detectors. Development of simulation codes to study the confinement of charged fusion products in

tokamaks.

## **OTHER APPOINTMENTS**

| Since September 2020    | Member of the Board of Editors of Nuclear Fusion - IAEA   |
|-------------------------|---|
| March 2018              | Member of the International Committee for the Evaluation of the Energy Programme of the Karlsruhe Institute of Technology - Helmholtz Association (Germany)   |
| Since 13.11.2013        | Italian Expert in the Italian Programme Committee for Horizon 2020 – Euratom - Appointed by Italian Minister for University and Scientific Research   |
| 6.10.2014 to 31.12 2018 | Member of the Programme Advisory Committee of the UKAEA Culham Centre for Fusion Energy (CCFE), Culham Oxfordshire, UK  |
| 22.10.2007 – 12.7.2013  | Member of the Technical Advisory Panel (TAP) of Fusion for Energy (F4E), Barcelona, Spain   |
| 14.7.2007 - 2017        | Professor of Physics of Nuclear Energy, Faculty of Engineering, University of Rome Tor Vergata  |
| Since 2005              | Editor of Fusion Engineering and Design international scientific journal, Elsevier, Radarweg 29, Amsterdam 1043 NX, The Netherlands   |
| 2013 - 2017             | EUROfusion representative in the Working Group on Innovation Management and Knowledge/Technology Transfer di EIROForum (partnership CERN, EUROfusion, EMBL, ESA, ESO, ESRF, XFEL, ILL)  |
| 22.6.2009 – 31.12.2013  | Task Force Leader of JET Fusion Technology<br>European Fusion Development Agreement (EFDA) - JET, Culham, Abingdon, UK  |
| Nov. 2002 – Nov. 2013   | Leader of the Sub-Task Neutronics under the IEA Implementing Agreement on a Co-operative Programme on the Nuclear Technology of Fusion Reactors OECD International Energy Agency (IEA), Paris (France)  |
| 2009 – 2012             | Head of Nuclear Data Consortium of European Institutes (ENEA, Karlsruhe Institute of Technology, Nuclear Institute of Husinec-Řež, University of Science and Technology of Vracovia, Jozef Stefan Institute of Ljubljana) for the development and experimental validation of nuclear data for Fusion. |
| 2008 - 2012             | Principal Investigator of F4E Grants F4E-2008-GRT-014 e F4E-2010-GRT-056: Nuclear Data Studies/Experiments in Support of Test Blanket Modules and IFMIF Activities, Fusion for Energy, Barcelona, Spain   |
| 1994 – 2009             | Principal Investigator of many ITER tasks for the experimental validation of ITER nuclear design  |
| 30.6.2011 – 30.6.2013   | Member of the OECD NEA Expert Group of Radiation Transport and Shielding of Working Party on Scientific Issues of Reactor Systems (WPRS) - Nuclear Science Committee OECD Nuclear Energy Agency (NEA), Paris (France)   |
| 1994 – 2013             | Member of the OECD NEA Working Party on International Nuclear data Evaluation Cooperation - Nuclear Science Committee OECD Nuclear Energy Agency (NEA), Paris (France)  |
| 1997 – 2011             | Member of advisory groups of the International Atomic Energy Agency (IAEA) for the development and the validation of FENDL (Fusion Evaluated Nuclear Data Library)-International Atomic Energy Agency (IAEA) Wien (Austria)   |
| 2008 – 2010             | Chief Scientific Investigator del Research Project "Validation of FENDL-3 Library" International Atomic Energy Agency (IAEA) Wien (Austria)   |
| 2009                    | Member of Working Group on DEMO Fusion for Energy (F4E) — Euratom – Fusion Committee (CCE-FU)   |
| 11.11.2005 – 2006       | ENEA Industry Liaison Officer nel Comitato Fusione Industria (CFI) – Euratom  |
| 10.11.2004 – 2005       | ENEA Liaison Officer for the organization of the Fusion Road Show at the European Parliament  |

| 2002 – 2003                   | Collaboration contract for the realization of the International Radiation Shielding Experiments Database (SINBAD), OECD Nuclear Energy Agency (NEA), Paris (France)  |
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| 4.1.1996 – 31.12.1999         | Co-ordinator of the Working Area "Neutronics" of ITER Project for the realisation of the international experimental activity aiming at the development of a validated nuclear database for ITER design. – ITER Home Team, Garching (Germany) |
| 25.11.1994 – 31.12.1999       | Principal Investigator of ENEA - JET (Task Agreement TA3) on "Neutron Production Related Physics and Associated Diagnostics"   |
| 1988 (3 months)               | Visiting scientist at the Princeton Plasma Physics Laboratory , Princeton NJ, US Study of the confinement of 1-MeV tritons produced in fusion reactions in TFTR plasmas- Analysis of triton burn up measurements.                            |
| 1987-88 (6 months)            | Visiting Scientist at the Joint European Torus (JET), Culham, UK Measurements and analysis of the confinement of charghed particles produced in fusion reactions in JET plasmas (triton burn up).  |
| OTHER PROFESSIONAL ACTIVITIES | AND SERVICE  |
| 2019                          | Member of the commission for the appointment of the Director of the Institute of Plasma Physics and Technology of CNR - CNR competition n. 364.343   |
| 2016-2018                     | Chair of the Local Organizing Committee del 30th Symposium on Fusion Technology (SOFT2018) – Giardini Naxos (Messina), 16 – 21 September 2018  |
| 2018                          | Member of the International Scientific Committee del 13th Symposium on Neutron and Ion Dosimetry (NEUDOS13)  |
| 2017                          | Evaluator of scientific projects for the Helmholtz Association (Germania)  |
| 2017                          | Evaluator of scientific projects for the Slovenian Research Agency (ARRS)  |
| 2013                          | Member of the commission for the appointment of the Director of the Plasma Physics Institute - Piero Caldirola, CNR, Milano - CNR competition n.364.141  |
| 2010 - 2014                   | Lecturer in Masters - Universities of Roma La Sapienza and Tor Vergata   |
| From 2015                     | Member of the Scientific Committee of the International Conference on Advancements in Nuclear Instrumentation, Methods and their Application (ANIMMA)  |
| From 2000                     | Member of the International Program Committee of the International Symposium on Fusion Nuclear Technology (starting from ISFNT-6, 2002)  |
| 2006 – 2013 and from 2018     | Member of the Editorial Board of the ENEA journal Energia, Ambiente e Innovazione  |
| 1996 - 2003                   | Member and Vice-president (from 1998) of the ENEA Equal Opportunities Committee (CPO)  |
| 1997 - 1999                   | Chairperson of the 5th International Symposium of Fusion Technology (ISFNT-5) Organising Committee organized by ENEA in Roma, 19-24.9.1999   |
| 1996 - 2011                   | Member of selection committees for several ENEA open competitions.   |
| Dal 1989                      | Referee for Nuclear Fusion, Fusion Engineering and Design, Plasma Physics and Controlled Fusion, Fusion Technology   |
|                               | Guest Editor of the Proceedings of the 5th and of 7th International Symposium on Fusion Nuclear Technology (ISFNT), (2000)   |
| From 1995                     | Supervisor of research fellows at ENEA   |
| 2000                          | Expert in ENEA Projects Evaluation Committees  |
| 2005                          | Member of the Evaluation Committee of Spin-off Societies from ENEA (2005)  |
| PUBLICATIONS                  | Author of more tha 200 papers published in peer-reviewed international scientific journals   |