## Lionello Marrelli

## **EMPLOYMENT**

Lionello Marrelli is currently employed by CNR (ISTP: Istituto per la Scienza e Tecnologia dei Plasmi), since 1/04/1999, as a researcher and is working in Consorzio RFX, Padova, Italy.

## **EDUCATION**

Laurea degree in physics 110/110 cum laude Padua University (11/1991) "Diplome d'Etude Approfondie en Physique des gaz et plasmas" Université Paris XI, 06/1990 PhD in Energetics (1997)

## **SUMMARY OF EXPERTISE**

Most of L. Marrelli research activity has been performed in the framework of the RFX experiment, but he has also been involved in several collaborations with other fusion experiments (Extrap-T2R, MST, ASDEX and DIII-D). L. Marrelli activities focused on:

- i) participation to the design, realization and data analysis of tomographic bolometric and SXR diagnostics;
- ii) magnetic fluctuation analysis (characterization of helical states in RFP plasmas);
- iii) numerical (with particle transport approach) and experimental characterization of transport in RFPs and tokamaks;
- iv) partecipation to the design and to data analysis of real-time MHD feedback control experiments in RFP and tokamak
- v) simulation of error fields due to passive structures in RFX-mod2 by means of electromagnetic simulations

He is co-author of 151 papers (45 among principal authors, 9 as corresponding author; H-index 30) in peer-reviewed journals. (ISI Web of Knowledge ResearcherID: G-4451-2013 ORCID; https://orcid.org/0000-0001-5370-080X)