

# **Europass Curriculum Vitae**

### Personal information

First name / Surname **Fabrizio Santi** 

Work experience

February 2014 - ON **Dates** 

Research Fellow Occupation or position held

Main activities and responsibilities Study on techniques for active and passive multi-dimensional radar imaging

Name and address of employer DIET Dept. University of Rome 'La Sapienza'

> January 2014 **Dates**

Early stage researcher Occupation or position held

Main activities and responsibilities Processing of passive GNSS-based SAR images Name and address of employer DIET Dept. University of Rome 'La Sapienza'

> March 2013 **Dates**

Early stage researcher Occupation or position held

Main activities and responsibilities Processing of multi-channel ISAR data

DIET Dept. University of Rome 'La Sapienza' Name and address of employer

> November 2010 → October 2012 Dates

Early stage researcher Occupation or position held

Main activities and responsibilities Study on Distributed ISAR techniques (research project funded by Selex Galileo)

Name and address of employer DIET Dept. University of Rome 'La Sapienza'

**Education and training** 

November 2010 → June 2014 **Dates** 

Title of qualification awarded Ph.D degree in Remote Sensing

Principal subjects/occupational skills

Active and passive Multi-sensor radar imaging techniques exploiting spatial diversity

Name and type of organisation Università degli studi di Roma, 'La Sapienza' providing education and training

> April 2013 → September 2013 **Dates**

Title of qualification awarded Visiting research student

Principal subjects/occupational skills

covered

Passive bi/multi-static SAR based on GNSS transmitters

Name and type of organisation University of Birmingham (UK), School of Electronic Electrical and Computer Engineering providing education and training

Dates January 2008 → September 2010

Title of qualification awarded Telecommunications engineering, Master Degree

Principal subjects/occupational skills Radar theory and technology, Radar images processing, Space radar systems, Digital transmission,

covered Multimedia Communications

Name and type of organisation providing education and training Università degli studi di Roma, 'La Sapienza'

Final Grade 110 cum laude /110

Dates September 2004 → December 2007

Title of qualification awarded Telecommunications engineering, Bachelor Degree

Name and type of organisation providing education and training

Università degli studi di Roma, 'La Sapienza'

Final Grade 108/110

Mother tongue Italian

Other language English

Self-assessment Understanding **Speaking** Writing European level (\*) Listening Reading Spoken interaction Spoken production B2 B2 B2 intermediate intermediate B2 intermediate intermediate intermediate

(\*) Common European Framework of Reference for Languages

Social and organisational skills and

competences

-Extremely organised person

-Good abilities for synthetic and global views over concrete situations

-End-oriented work capacity
-Problem-solving attitude

-Team-working attitude

Technical and computer skills and

competences

-Windows o.s.

-Microsoft Office tools

-good knowledge of MATLAB

-basic knowledge of C++ and Java programming

-basic knowledge of SAR dataset processing software (PolSARpro, Next ESA SAR Toolbox)

Driving licence Category B

## **Additional information**

Prize for the best 2010 Italian thesis on remote sensing by the IEEE Geoscience and Remote Sensing South Italy Chapter (title: "Rivelazione oil spill con radar VTS in banda X", supervisor: Prof. Pierfrancesco Lombardo)

Attendance to the 3rd International Summer School on Radar/SAR, Bonn, Germany, 8-15 July 2011.

Fabrizio Santi is frequently reviewer for the following international technical journals:

- IEEE Journal of Selected Topics in Applied Earth Observations and Remote Sensing
- IEEE Transaction on Aerospace and Electronic Systems
- IET Radar, Sonar and Navigation
- Acta Astronautica

**Annex** Publications

### **PUBLICATIONS**

#### International Journals

- J2. F. Santi, M. Antoniou, D. Pastina, "Point Spread Function Analysis for GNSS-based Multistatic SAR", IEEE Geoscience and Remote Sensing Letters, vol. 12, no. 2, Feb. 2015, pp. 304-308
- J1. D. Pastina, F. Santi, M. Bucciarelli, "MIMO Distributed imaging of rotating targets for improve 2D resolution", IEEE Geoscience and Remote Sensing Letters, vol. 12, no.1, Jan. 2015, pp. 190-194.

## Conference proceedings

- C11. F. Santi, M. Bucciarelli, D. Pastina, M. Antoniou, "CLEAN technique for passive bistatic and multistatic SAR with GNSS transmitters", 2015 IEEE International Radar Conference, Arlington, VA, USA, 11-15 May 2015.
- C10. F. Santi, M. Bucciarelli, D. Pastina, "Multi-sensor ISAR technique for feature-based motion estimation of ship targets", RADAR'14, International Radar Conference 2014, Lille, France, 13-17 Oct. 2014
- C9. F. Santi, M. Antoniou, D. Pastina, D. Tzagkas, M. Bucciarelli, M. Cherniakov, "Passive multi-static SAR with GNSS transmitters: preliminary experimental study", EuRAD 2014, Rome, Italy, 8-10 Oct. 2014
- C8. F. Santi, M. Antoniou, D. Pastina, D. Tzagkas, M. Bucciarelli, M. Cherniakov, "Passive multi-static SAR with GNSS transmitters: first theoretical and experimental results with point targets", EUSAR 2014, Berlin, Germany, 2-5 June 2014
- C7. F. Santi, D. Pastina, P. Lombardo, "ISAR while-scan mode for coastal surveillance", IEEE 2014 Radar Conference, May 2014.
- C6. F. Santi, D. Pastina, M. Bucciarelli, "Multi-sensor ISAR techniques for motion estimation of pitching, rolling and vawing targets". IEEE 2013 Radar Conference, May 2013.
- C5. F. Santi, M. Bucciarelli, D. Pastina, "2D-MIMO distributed ISAR imaging of rotating targets with improved range and cross-range resolution", IEEE 2012 GOLD Remote Sensing Conference, June 2012
- C4. F. Santi, M. Bucciarelli, D. Pastina, "Target rotation motion estimation from distributed ISAR data", IEEE 2012 Radar Conference, May 2012
- C3. D. Pastina, F. Santi, M. Bucciarelli, P. Lombardo, "2D-MIMO SAR/ISAR imaging of moving targets with reconfigurable formation of platforms", EUSAR 2012, April 2012
- C2. D. Pastina, F. Santi, M. Bucciarelli, "Multi-angle distributed ISAR with stepped-frequency waveforms for surveillance and recognition", CIE International Conference on Radar, October 2011
- C1. F. Santi, P. Lombardo, D. Pastina, "Oil spill detection using a coastal high-resolution radar", IEEE 2011 Radar Conference, May 2011