



Work experience

- June – July 2015 Participated at the ERASMUS+ Programme, Key Action 1 – Student Mobility for Traineeship A.A. 2014/2015, UNIPHARMA-GRADUATES PROJECT conducted at the Department of Biología Vegetal Y Ecología, University of Seville.
- 13 – 24 April 2015 Participated at the Global Forest Survey project (GFS), program entity: GCP/GLO/553/GER (BMU), aimed to provide technical training on the use of Collect Earth software for assessing Southern Africa dryland areas at Food and Agriculture Organization of the United Nations (FAO).
- July – October 2014 Co-work in research activities on the effects of different irrigation systems on *Corylus avellana* net carbon exchange rate in the laboratory of Plant Ecology directed by Full Professor Loretta Gratani at the Department of Environmental Biology, Sapienza University of Rome.
- January – June 2014 Fellowship at the University of L'Aquila, Department of Life Earth and Environmental Science to carry out researches on "Study and monitoring of populations, eco physiological characterization of Community interest, endangered, rare and endemic plant species aimed at the reinforcement of natural native populations. Study area: Abruzzo with particular reference at Mount Genzana reserve, Majella National Park and Sirente Velino game reserve."
- October – December 2013 Co-work in research activities on the adaptive strategy of some mountain plant species, in particular *Sesleria nitida* Ten., *S. juncifolia* Suffren. and *Adonis distorta* Ten., in the laboratory of Plant Ecology directed by Full Professor Loretta Gratani at the Department of Environmental Biology, Sapienza University of Rome.

Formation

- November 2014 – Today PhD student in the laboratory of Plant Ecology directed by the Full Professor Loretta Gratani at the Department of Environmental Biology, Sapienza University of Rome.
- May – June 2014 University Specialist Course on "Methods in Plant Ecophysiology" organized by the Research Group on Plant Biology under Mediterranean Conditions, Department of Biology, Balearic Islands University, Palma de Mallorca, Balearic Islands, Spain.

Education

- October 2013 Master degree in Environmental Biology, score: 110 /110 cum laude.
- October 2011 Bachelor's degree in Biological Sciences, score: 107/110.

Principal subjects of research

PHOTOSYNTHETIC EFFICIENCY AND PHENOTIPIC PLASTICITY: relationships among morphological, anatomical and physiological plant leaf traits; species phenotypic plasticity; water and carbon use efficiency; plant adaptive strategies in response to stress factors; gas exchange; chlorophyll fluorescence, chlorophyll and carotenoid content; plant and leaf key traits.

PLANT ECOLOGY AND LANDSCAPE ANALYSIS: plant biomass and productivity; the use of Leaf Area Index (LAI).

URBAN POLLUTION: carbon dioxide concentration in urban areas; plant contribution to urban air amelioration; plant carbon sequestration capability; the role of parks and hedges in urban areas; bio-accumulators, and bio-indicators of pollution.

- Mother tongue Italian
- Other language English

Informatic skills | Good knowledge and usage of the package "Microsoft Office".
Basic knowledge and usage of the software R (R Development Core Team) with special reference to linear modelling.

Annexes

LIST OF PUBLICATIONS IN INTERNATIONAL JOURNALS

1. GRATANI L., CRESCENTE M.F., D'AMATO V., C. RICOTTA, A.R. FRATTAROLI and PUGLIELLI G., 2014. Leaf traits variation in *Sesleria nitida* growing at different altitudes in the Central Apennines. *Photosynthetica* 52: 386–396.
2. PUGLIELLI G., CRESCENTE M.F., FRATTAROLI A.R. and GRATANI L., 2015. Morphological, anatomical and physiological leaf trait plasticity of *Sesleria nitida* in open vs shaded conditions. *Polish journal of Ecology* 63: 1-10.
3. PUGLIELLI G., CRESCENTE M.F., FRATTAROLI A.R. and GRATANI L., 2015. Leaf mass per area (LMA) as a possible predictor of adaptive strategies in two species of *Sesleria* (Poaceae): analysis of morphological, anatomical and physiological leaf traits. *Annales Botanici Fennici* 52: 135–143.
4. PAOLESSI P., NICOLETTI M., CATONI R., PUGLIELLI G., TONIOLO C. and GRATANI L., 2015. *Cistus creticus* subsp. *eriocephalus*, as a model for studying plant physiological and metabolic responses to environmental changes. *Chemistry & Biodiversity* 12: 1862-1870.
5. PUGLIELLI G., SPOLETINI A., FABRINI G. and GRATANI L., 2016. Temperature responsiveness of seedlings maximum relative growth rate in three Mediterranean *Cistus* species. *Journal of Plant Ecology*. DOI:10.1093/jpe/rtw028.
6. DI CECCO, V., CATONI, R., PUGLIELLI, G., DI MARTINO, L., FRATTAROLI, A.R., GRATANI, L., 2016. Ecophysiology of *Adonis distorta*, a high-mountain species endemic of the Central Apennines. *Lazarus*. 37, 125-134.
7. PUGLIELLI G., VARONE L., GRATANI L. and CATONI R., 2017. Specific leaf area (SLA) variations drive acclimation of *Cistus salvifolius* in different light environments. *Photosynthetica*. 55: 31-40.
8. VASHEKA O., PUGLIELLI G., CRESCENTE M.F., VARONE L. and GRATANI L., 2017. Anatomical and morphological leaf traits of three evergreen ferns (*Polystichum setiferum*, *Polypodium interjectum* and *Asplenium scolopendrium*). *American Journal of Ferns*. (in press).

ATTENDANCE TO NATIONAL AND INTERNATIONAL CONGRESS AND WORKSHOP

1. GRATANI L., CRESCENTE M.F., DI PIETRO R., D'AMATO V., PUGLIELLI G., 2015. Variation in leaf traits of an Apennine grass *Sesleria nitida* along a narrow altitudinal gradient at Mount Terminillo (Italy), Atti del Workshop Mountains Under Watch 2013 – Observing climate change effects in the Alps. Forte di Bard – Valle d'Aosta, 20-21 February 2013, pag. 55.
2. GRATANI L., FRATTAROLI A.R., DI CECCO V., PUGLIELLI G., VARONE L., CATONI R., - 2014 - Quantitative estimation of phenotypic plasticity of *Adonis distorta* growing on Mount Majella in the Central Apennines. "Plant Biology Europe FESPB/EPSO Congress", Dublin, 22-26 June 2014.
3. GRATANI L., GRANATA M.U., SARTORI, F., BRACCO F., PUGLIELLI G., CATONI R., 2015. Canopy carbon assimilation rate and related nut yield in *Corylus avellana* orchards under different irrigation systems. Atti del 110° Congresso della Società Botanica Italiana, "II international plant science conference (IPSC)". Pavia, 14-17 September 2015.
4. VASHEKA O., CRESCENTE M.F., PUGLIELLI G., VARONE L., CATONI R., GRATANI L., 2015. Morphological and anatomical differences of two ferns species growing under common light environments. Atti del 110° Congresso della Società Botanica Italiana, "II international plant science conference (IPSC)". Pavia, 14-17 September 2015.
5. PUGLIELLI G., CRESCENTE M.F., FRATTAROLI A.R., GRATANI L., 2016. Anatomical basis of LMA variations drive to different photosynthetic and water storage strategies in two *Sesleria* species from mountain dry grasslands. European Geoscience Union (EGU) general assembly 2016. Vienna, 17-22 April 2016.
6. PUGLIELLI G., REDONDO-GÓMEZ S., GRATANI L., MATEOS-NARANJO E., 2016. Assessment of the role of paraheliotropism in two Mediterranean *Cistus* species differing in leaf mass area (LMA) under drought stress and recovery. "Plant Biology Europe EPSO/FESPB Congress", Prague, 26-30 June 2016.
7. BARCIA-PIEDRAS J.M., CAMACHO M., MATEOS-NARANJO E., PUGLIELLI G., PÉREZ-ROMERO J.A., PARRA R., RODRÍGUEZ-LLORENTE I., REDONDO-GÓMEZ S., 2016. Indoleacetic acid producing rhizobacteria improve both, growth and physiology, of the halophytic *Arthrocnemum macrostachyum*. "Anais da XXVII Reunião Latinoamericana de Rizobiologia", Londrina, 6-9 June 2016.

Project coordination

Date: 2015

Project: Adaptive strategies of some *Cistus* species to Mediterranean stress factors.

Financing: Sapienza University of Rome (Projects for early career scientists)

Protocol number: C26N15F3P4

Project attendance

Date: 2015

Project: Carbon dioxide sequestration and air temperature reduction provided by green areas in Rome: the role of urban parks.

Financing: Sapienza University of Rome (Scientific research)

Rome, 20/02/2017

Giacomo Puglielli

