

Bernardo Cesare
Curriculum Vitae

Date of birth: 12.08.1963 at Chirignago, Venice, Italian national

Education and Professional Career

2011 Professor of Petrography and Petrology, University of Padua, Italy (UniPD)

1993 Lecturer in Petrography, UniPD

1992 PhD in Earth Sciences, UniPD

1987 Degree cum laude in Geological Sciences, University of Padua (UniPD)

Research training Abroad

1997: 2 months at C.N.R.S., Clermont-Ferrand (France)

1993: 3 months at Dept. Geol. Geophys. Sci., Princeton, NJ (USA)

1990-1991: 7 months stay at ETH-Zurich (CH)

Scientific Activity

The research activity of Bernardo Cesare concentrates on:

- Low-Pressure – High-Temperature metamorphism and anatexis of metapelites
- "Nanogranites" in anatectic metapelites
- Fluid-rock interactions during partial melting of graphitic pelites
- Mineralogical studies of High-Temperature minerals in metapelites
- Alpine Pressure-Temperature evolution the rocks south of the Tauern Window
- Alpine Geology

Scientific papers

64 papers (>30 as first author), 54 of which in ISI-WoS, h-index: 18

3 volumes as (co)Editor

>90 presentations at congresses and workshops (>65 international)

Full list at: <http://www.eurispet.eu/bernardo/papers.html>

Invited Contributions

Seminars at: MHN Paris (2014), Boulder, CO (2014), Univ. Maryland (2011), Princeton, NJ (2011), Potenza (1998), Berlin (2002, 2010), Milan (2010), Parma (2003), Turin (2005), Granada (2001, 2006, 2011), ETH-Zurich (2002, 2007, 2012), Curtin, Perth, AU (2012), Paris UPMC (2013)

Talks at GSA (Philadelphia, USA, 2006); AGU (San Francisco, USA, 2006); GSA (Portland, 2009), IMA (Budapest, 2010), Goldschmidt (Montreal, CA, 2012), Granulites and Granulites (Hyderabad, IN, 2013), MinPet (Graz, Austria, 2013), DMGV (Tubingen, Germany, 2013), EGU (Vienna, A, 2014) Goldschmidt 2014 (Sacramento, USA, 2014). Talks at workshops ESF (Turku, FI, 1999); Euromargins (Bologna, 2006); IVSLA (Venice, 2009).

Lectures at advanced Schools: GNM (Ponza, 1997); GNP (Asiago, 1997; Pavia, 1998); SFMC-SIMP (Pavia, 2002); ISPET (Granada, E, 2004; Canberra, AU, 2005) EURISPET (Budapest, H, 2008); GAC-MAC (Quebec City, CA, 2008), Eurispet (Padova, 2010).

Expertise in Research Management

Coordinator of projects:

- Crustal Anatexis in Nature and Experiments, (1998-2000) funded by UniPD
- Subsolidus processes in rocks and materials (1999-2001) funded by C.N.R.

- Petrologic study of fluid-melt-rock interactions during the anatexis of graphitic metapelites (2005-2007) funded by MIUR
 - Crustal Anatexis: Natural evidence, Experiments and Modelling (2008-2010) funded by MIUR
 - Geodynamic and geochemical control on magma genesis and differentiation: implications for the evolution of the Europe-Africa convergence (2012-2015) funded by MIUR
- P.I. of the Project: Crustal Melting in the thinned margin of the Alboran basin” within the WESTMED Euromargins Eurocore (2004-2006) funded by C.N.R. through ESF

Scientific Prizes

- Prize "Oxilia", of SGI for the period 1989-1990
- Prize "Bianchi", of SIMP for the period 1994-1995
- Prize "Tartufari", of Accademia dei Lincei, 2012
- Fellow, GSA from 2013

Organization of Scientific Meetings

Co-Convenor of symposia and workshops:

-Quantification of Metamorphic Processes and the Thermo-Tectonic Evolution of Orogens. Goldschmidt 2013 (Florence, I)

-Applying Phase Equilibria Modelling to Rocks Goldschmidt 2013 (Florence, I).

-Deciphering metamorphic processes, EUG10 (Strasbourg, 1999)

-Melting and the rheology of the crust and upper mantle: what significance for geodynamics?, IGC, Florence, 2004

-Crustal Melting, IGC, Brisbane, 2012

-Volatiles in minerals and their petrologic implications”, Frontiers in Mineral Sciences (Cambridge, 2007)

Invited member at the ESF Workshop “Restite-melt and solid-vapour back reactions” (Turku, Finland, 1999)

Lecturer at "Working with Migmatites", GAC-MAC "Quebec2008", Canada

Member of the G.S.A. Annual Program Committee (2013-2016)

Editorial Activity

Member of the Editorial Review Board of Journal of Metamorphic Geology (2006-)

Associate Editor of European Journal of Mineralogy from 2013

Member of the Executive Committee, Elements (2012-2013)

Member of the Editorial Board of Periodico di Mineralogia (2004-08)

Guest Editor of the special Volume of Elements Magazine: “When the Continental Crust melts” (Vol. 7(4), 2011).

Referee for: African J. Earth Sci., Compt. Rend. Acad. Sci., EPSLEur. J. Mineral., Geochim.

Cosmochim. Acta, Geology, Geol. Mag., Geol. Mat. Res., Geophys. Res. Lett., Iranian J. Sci. Tech., J. Geol. Soc. London, J. Metam Geol., J. Petrology, Lithos, Phys. Chem. Earth.

Reviewing of Research Projects

Referee for: CIVR; European Science Foundation; MIUR-PRIN; National Research Foundation of South Africa; Università di Siena, progetti di Ateneo; RCSA, USA; BLANC, France;

Training of Research

Director of the PhD School in Earth Sciences at the UniPD (2004-2007)

Coordinator of the FP6 Marie Curie Series of Events "EURISPET" - European Intensive Seminars of Petrology (www.eurispet.eu)

Coordinator of the ISPET project (MIUR Interlink) for international teaching of metamorphic petrology at PhD level

Organiser of 11 international intensive Seminars in petrology in the period 2003-2009

Supervisor of 4 PhD and 5 postDocs

Selected papers 2009-2013

- Cesare B., Rubatto D., Gómez-Pugnaire M.T. (2009) Do extrusion ages reflect magma generation processes at depth? An example from SE Spain. *Contributions to Mineralogy and Petrology*, 157, 267-279.
- Perini G., Cesare B., Gómez-Pugnaire M.T., Ghezzi, S., Tommasini S. (2009) Armouring effect in decoupling Sr-Nd isotopes during disequilibrium crustal melting: the case study of frozen migmatites from El Hoyazo and Mazarrón, SE Spain. *European Journal of Mineralogy*, 21, 117-131.
- Tajčmanova L., Connolly JAD, Cesare B. (2009) A thermodynamic model for titanium and ferric iron solution in biotite. *Journal of Metamorphic Geology*, 27, 153-165
- Cesare B., Ferrero S., Salvioli-Mariani E., Pedron D. e Cavallo A. (2009) Nanogranite and glassy inclusions: the anatectic melt in migmatites and granulites. *Geology*, 37, 627-630.
- Acosta-Vigil A., Buick I., Hermann J., Cesare B., Rubatto D., London D., Morgan VI G.B. (2010) Mechanisms of Crustal Anatexis: a Geochemical Study of Partially Melted Metapelitic Enclaves and Host Dacite, SE Spain. *Journal of Petrology*, 51, 785-821.
- Ferrero S., Bodnar R.J., Cesare B., Viti C. (2011) Re-equilibration of primary fluid inclusions in peritectic garnet from metapelitic enclaves, El Hoyazo, Spain. *Lithos*, 124, 117-131.
- Satish-Kumar M., Yurimoto H., Itoh S., Cesare B. (2011) Carbon isotope anatomy of a single graphite crystal in a metapelitic migmatite revealed by high-resolution SIMS analysis. *Contributions to Mineralogy and Petrology*, , 162, 821-834.
- Holness, M.B., Cesare, B. & Sawyer, E.W. (2011) Melted rocks under the microscope: microstructures and their interpretation. *Elements*, 7, 245-250.
- Sawyer, E.W., Cesare, B. & Brown M. (2011) When the continental crust melts. *Elements*, 7, 227-232.
- Ferrero, S., Bartoli, O., Cesare, B., Salvioli-Mariani, E., Acosta-Vigil, A., Cavallo, A., Groppo, C. & Battiston, S. (2012) Microstructures of melt inclusions in anatectic metasedimentary rocks. *Journal of Metamorphic Geology*, 30, 303-322.
- Acosta-Vigil A., Buick I., Cesare B., London D., Morgan VI G.B. (2012) The extent of equilibration between melt and residuum during regional anatexis and its implications for differentiation of the continental crust: a study of partially melted metapelitic enclaves. *Journal of Petrology*, 53, 1319-1356.
- Bartoli, O., Cesare, B., Poli, S., Bodnar, R.J., Acosta-Vigil, A., Frezzotti, M.L. and Meli S. (2013) Recovering the composition of melt and the fluid regime at the onset of crustal anatexis and S-type granite formation. *Geology*, 41: 115-118.
- Ferri F., Gibert B., Violay M. and Cesare B. (2013) Electrical conductivity in a partially molten crust from measurements on metasedimentary enclaves. *Tectonophysics*, 586:84 – 94.
- Bartoli, O., Cesare, B., Poli, S., Acosta-Vigil, A., Esposito R., Turina A., Bodnar, R.J., Angel R.J., Hunter J. (2013) Nanogranite inclusions in migmatitic garnet: behavior during piston-cylinder remelting experiments. *Geofluids* 13, 405-420
- Bartoli, O., Tajčmanová L., Cesare, B., Acosta-Vigil, A. (2013) Phase equilibria constraints on melting of stromatic migmatites from Ronda (S Spain): insights on the formation of peritectic garnet. *Journal of Metamorphic Geology*, 31, 775-789.