

CAMILLO NUTI

EDUCATION, ACADEMIC EXPERIENCES AND TEACHING ACTIVITIES

Born 15/7/53 Rome, Italy

Degree in Civil Engineering University of Rome la Sapienza March 1977

Full Prof. of Civil Eng. at Università degli Studi Roma Tre

Visiting Professor at University of Fuzhou (China)

From 2006 to 2013, has been appointed as one of the 11 experts Official Members of the Italian: “Consiglio Superiore dei Lavori Pubblici” (Council for Public Works) of Italian Ministry of Infrastructures.

He teaches Structural Design, Faculty of Architecture, and Seismic Design of Structures (from 2001 to 2013), Engineering .

Member of the Scientific Committee of The Master Course Advanced Design to Eurocodes (EuroProjects)

Coordinator of the Master Course of Innovation in Design, Rehabilitation and Control of Structures: www.mastermica.org.

Member of the Doctoral Course (PhD) in: “Architecture, Heritage and Innovation, for the structural aspects (www.architettura.uniroma3.it)”, formerly member of the doctoral school in “Engineering (www.ingegneria.uniroma3.it)”

SCIENTIFIC AND TECHNICAL MEMBERSHIP

Member of TG2 (of WG2 existing Structures) of CEN/TC250 European Commission (selection after international tender)

Member of Task Group 11 EAAE (European Association of Earthquake Engineering): Seismic Design, Assessment, and Retrofit of Bridges

Member WG2 of CEN TC250 Assessment and Retrofitting of Existing Structure.

Member of CEN/TC 250/SC 2/WG 2 Working group Design of fastenings for use in concrete

Member of Special Activity Group 7 Assessment and Retrofitting of Existing Structures della FIB.

Member of Seismic Design Commission of ICOLD (International Association of Large Dams)

Member of Structural Lab and of the Research Center (SIBERC) of Fuzhou University, Fuzhou, Fujian, China

Advisor of Technical Committee N12 of International Society of Soil Mechanics and Geotechnical Engineering: "Application and Improvement of Eurocode 8 part 1 and 2".

Member of Italian Commission UNI-CIS of connection between Eurocodes and Italian Code.

Scientific National High Level Expert of Chinese Government (2014-15)

ACADEMIC CAREER

Research fellow Univ. of Rome La Sapienza from 1977 to 1979

Research Associate at Univ. of Rome La Sapienza from 1980 to 1987

Associate Professor of Civil Eng. Univ. G. D'Annunzio, Chieti-Pescara, from 1988 to 1994

Full Prof. of Civil Eng. since 1994. Formerly at Univ. G. D'Annunzio, in Pescara, where he was the Director of Phd Courses on Structural Engineering and Director of PRICOS: Department of Structural Engineering and since 2001 at University of Roma Tre.

Visiting Professor University of Fuzhou 2013, 2014, 2015 Dept. of Civil Engineering.

SCIENTIFIC CURRICULUM AND FOUNDING

He promoted and coordinated many national and international scientific projects in the field of Structural and Seismic Engineering.

HOPE :Seismic Risk Assessment and Mitigation of Hospital Facility Network, EEC, DGXII, technical Officer for DGXII: Maria Yieroyanni; Contract EV5V-CT93-0297, Italian Ministry of

Health, 2003-2005: a study for the retrofitting of existing Hospital in Italy, with application to two existing Hospitals in Calabria.

TOSQA: on seismic assessment of cultural heritage, DGXII, Environment CEE EV5V – CT93, coordinator: Università di Cambridge, Robin Spence, technical Officer for DGXII: Maria Yieroyanni

CEE Ecoleader project for Laboratory tests at Saclay (France) with the Universities of Patras, Chieti and Roma Tre, On seismic behavior of infilled concrete frames (2006-2007)

He was a member of FIB (formerly CEB, now International Federation of Concrete (Beton)) commission on Seismic Design of Concrete Structures.

He has been one of the members for the drafting of Eurocode 8

EDITORIAL ACTIVITIES AND BIBLIOMETRIC INDEXES

Author of more than 200 papers in the field of Structural Engineering on National and International Scientific Journals and Proceedings of Conferences.

He is member of the scientific editorial board of the Scientific Journal “Earthquake & Structures”

He acts as reviewer for many international scientific journals.

Scopus (June 2015)

Citations: 276 total citations by 255 documents

h-index: 8

Co-authors: 25

Subject area: Engineering , Earth and Planetary Sciences

ISI Web of Knowledge (June 2015)

Sum of the Times Cited: 199

Citing Articles: 186

h-index: 7

TECHNICAL AND PROFESSIONAL CURRICULUM

As one of the member of the consultants of “Consiglio Superiore dei Lavori Pubblici” (Italian National Council for Public Works), as expert for structural design in Seismic Zones, he is and has been the member of many commissions: for drafting of the Italian standards for Structural Design, for drafting the guidelines for seismic assessment of existing dams, for the new code for dams, for the guidelines for base isolation and energy dissipation, and give the technical advice on all infrastructures having a value larger than 25.000.000 Euros.

He is a consultant and structural designer since 1977. He started his design career with Prof. Eng. Carlo Cestelli Guidi. He cooperated with Prof. Eng. Riccardo Morandi. These are two of the main structural designers of the second half of the 20th century in Italy.

Among his design and consultant work on hospitals:

- Technical responsible of European Community project HOPE :Seismic Risk Assessment and Mitigation of Hospital Facility Network, EEC, DGXII; Contract EV5V-CT93-0297,
- Technical responsible of an applied study for the seismic assessment of Hospitals of Regione Calabria (Pilot Study), for the Italian Department of Civil Protection. The work has been carried out by STIN – Rome of which C. Nuti is one of the partners (1998-2001)
- Responsible for the pilot study and consultancy for the New Frosinone Hospital (Italy). The new hospital (500 beds, 40 million Euros cost) should have to remain functional after a Major Earthquake. The study, has been done for Lazio Region under the sponsorship of Italian Ministry of Public Health. It was the first base Isolated Hospital design in Italy. (now under Construction) 1998-2000.
- Techniacal responsible for the Engineering Activities for the Regione Calabria Hospitals (2004-2006). The Work was commissioned by Italian Ministry for Public Health. The study

on of two case study Hospitals: Reggio Calabria Hospital (dated from 1919 to 1960) 500 beds and Lamezia Terme Hospital (dated from 1971 to 198) 500 beds, included the evaluation of structural and functional vulnerability, the execution of two seismic retrofitting design. The design consisted in the use of base Isolation (Lamezia Terme) and dissipative bracings (Lamezia Terme and Reggio Calabria for a total of about 15 million Euros.

- Seismic Assessment of the Hospital of Chieti 200.000 m³.for Abruzzo Region (2008)

Other Public Structures:

- Seismic Assessment and design of retrofitting of the school complex Corridonia (dated from 1950 to 1980) the design include traditional as well as innovative techniques. 100.000m³ (since 2005)
- Structural Design of the new Headquarters of the Italian Space Agency in Rome Tor Vergata (Including Base Isolation) (2006-2010) Construction Cost 60 Million Euros, Structural Cost 17 million Euros.
- Structural Retrofitting of the Rome Ciampino Airport Station(1990)
- Consultancy for seismic problems to the new underground B1 in Rome (2005). Cost 300 Million Euros.
- Head quarters of Finance Ministry in Rome Torrespaccata (1985)
- Various Churches as S. Ugo, S Maria della Speranza Rome, Italy (1992)

He has also been involved in the design and other structural consultancies of other building, bridges, dams, tunnels, using conventional and innovative techniques including base isolation dissipative bracings, new material like carbon and composite.

Selected papers:

1. Vanzi, I., Marano, G.C., Monti, G., Nuti, C.
A synthetic formulation for the Italian seismic hazard and code implications for the seismic risk
(2015) Soil Dynamics and Earthquake Engineering, 77, pp. 111-122.
2. Braga, F., Gigliotti, R., Monti, G., Morelli, F., Nuti, C., Salvatore, W., Vanzi, I.
Post-seismic assessment of existing constructions: Evaluation of the shakemaps for identifying exclusion zones in Emilia
(2015) Earthquake and Structures, 8 (1), pp. 37-56.

[Experimental tests and global modeling of masonry infilled frames](#)

By: Bergami, Alessandro Vittorio; Nuti, Camillo

EARTHQUAKES AND STRUCTURES Volume: 9 Issue: 2 Pages: 281-303 Published: AUG 2015

3. Bergami, A.V., Nuti, C.
A design procedure of dissipative braces for seismic upgrading structures
(2013) Earthquake and Structures, 4 (1), pp. 85-108.
4. Nuti, C., Rasulo, A., Vanzi, I.

- Seismic safety of network structures and infrastructures
(2010) *Structure and Infrastructure Engineering*, 6 (1-2), pp. 95-110.
5. Nuti, C., Rasulo, A., Vanzi, I.
Seismic safety evaluation of electric power supply at urban level
(2007) *Earthquake Engineering and Structural Dynamics*, 36 (2), pp. 245-263.
 6. [Closed form constitutive relationship for concrete filled FRP tubes under compression](#)
By: Albanesi, Tommaso; Nuti, Camillo; Vanzi, Ivo
CONSTRUCTION AND BUILDING MATERIALS Volume: 21 Issue: 2 Pages: 409-427
Published: FEB 2007
 7. [Performance of Lifelines During the 2002 Molise, Italy, Earthquake](#)
By: Rasulo, Alessandro; Goretti, Agostino; Nuti, Camillo
EARTHQUAKE SPECTRA Volume: 20 Supplement: 1 Pages: S301-S314 Published: JUL 2004
 8. [Damage, Vulnerability and Retrofitting Strategies for the Molise Hospital System Following the 2002 Molise, Italy, Earthquake](#)
By: Nuti, Camillo; Santini, Silvia; Vanzi, Ivo
EARTHQUAKE SPECTRA Volume: 20 Supplement: 1 Pages: S285-S299 Published: JUL 2004
 9. [Seismic safety evaluation of electric power supply at urban level](#)
By: Nuti, Camillo; Rasulo, Alessandro; Vanzi, Ivo
EARTHQUAKE ENGINEERING & STRUCTURAL DYNAMICS Volume: 36 Issue: 2 Pages: 245-263 Published: FEB 2007
 10. [NONLINEAR CYCLIC BEHAVIOR OF REINFORCING BARS INCLUDING BUCKLING](#)
By: MONTI, G; NUTI, C
JOURNAL OF STRUCTURAL ENGINEERING-ASCE Volume: 118 Issue: 12 Pages: 3268-3284
Published: DEC 1992
 11. [A procedure for assessing the functional reliability of hospital systems](#)
By: Monti, G; Nuti, C
STRUCTURAL SAFETY Volume: 18 Issue: 4 Pages: 277-292 Published: 1996
 12. [Assessment of post-earthquake availability of hospital system and upgrading strategies](#)
By: Nuti, C; Vanzi, I
EARTHQUAKE ENGINEERING & STRUCTURAL DYNAMICS Volume: 27 Issue: 12 Pages: 1403-1423 Published: DEC 1998
 13. [To retrofit or not to retrofit?](#)
By: Nuti, C; Vanzi, I
ENGINEERING STRUCTURES Volume: 25 Issue: 6 Pages: 701-711 Published: MAY 2003
 14. [Influence of earthquake spatial variability on differential soil displacements and SDF system response](#)
By: Nuti, C; Vanzi, I
EARTHQUAKE ENGINEERING & STRUCTURAL DYNAMICS Volume: 34 Issue: 11 Pages: 1353-1374 Published: SEP 2005
 15. Assessment of post-earthquake availability of hospital system and upgrading strategies
By: Nuti, C; Vanzi, I
EARTHQUAKE ENGINEERING & STRUCTURAL DYNAMICS Volume: 27 Issue: 12 Pages: 1403-1423 Published: DEC 1998
 16. A procedure for assessing the functional reliability of hospital systems
By: Monti, G; Nuti, C
STRUCTURAL SAFETY Volume: 18 Issue: 4 Pages: 277-292 Published: 1996

17. Nonlinear response of bridges under multisupport excitation
By: Monti, G; Nuti, C; Pinto, PE
JOURNAL OF STRUCTURAL ENGINEERING-ASCE Volume: 122 Issue: 10 Pages: 1147-1159
Published: OCT 1996
18. Mitigation of seismic risk for networks of hospitals
By: Nuti, C; Santini, S; Vanzi, I
Edited by: DerKiureghian, A; Madanat, S; Pestana, JM
19. Conference: 9th International Conference on Applications of Statistics and Probability in Civil Engineering
Location: SAN FRANCISCO, CA Date: JUL 06-09, 2003
Sponsor(s): CERRA
APPLICATIONS OF STATISTICS AND PROBABILITY IN CIVIL ENGINEERING, VOLS 1 AND 2
Pages: 821-828 Published: 2003
20. Is it convenient to retrofit structures for earthquake protection?
By: Nuti, C; Vanzi, I
Edited by: DerKiureghian, A; Madanat, S; Pestana, JM
Conference: 9th International Conference on Applications of Statistics and Probability in Civil Engineering
Location: SAN FRANCISCO, CA Date: JUL 06-09, 2003
Sponsor(s): CERRA
APPLICATIONS OF STATISTICS AND PROBABILITY IN CIVIL ENGINEERING, VOLS 1 AND 2
Pages: 1545-1550 Published: 2003
21. To retrofit or not to retrofit?
By: Nuti, C; Vanzi, I
ENGINEERING STRUCTURES Volume: 25 Issue: 6 Pages: 701-711 Published: MAY 2003