

Curriculum Vitae

Roberto Crocetti

Name and contact information

Name: Roberto Crocetti

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Native information

Date of birth: July 18, 1968

Place of birth: San Benedetto del Tronto (AP) - Italy

Nationality: Italian and Swedish

Languages: Italian (mother's tongue), Swedish (fluent), English (fluent)

Employments

- Oct. 2015- 20%: Structural Engineer at the company Limträteknik AB, Malmö.
80%: Professor in Structural Engineering, Department of Building and Environmental Technology, Division of Structural Engineering, Lund University, Lund, Sweden.
- Sept. 2013- 50%: Structural Engineer at the company Limträteknik AB, Malmö.
50%: Professor in Structural Engineering, Department of Building and Environmental Technology, Division of Structural Engineering, Lund University, Lund, Sweden.
- April 2010- Professor in Structural Engineering, Department of Building and Environmental Technology, Division of Structural Engineering, Lund University, Lund, Sweden.
- 2008-2010 R&D Manager with coordination of research activities at the Department of "Building and Housing"(about 20 people) at SP Technical Research Institute of Sweden. Also supervising research projects in the field of timber engineering, timber bridges, timber connections, strengthening of timber structures and timber-concrete composite structures.
- 2007- 2010 Adjunct Professor in Timber Bridges, Department of Civil and Environmental Engineering, Structural Engineering, Steel and Timber Structures, Chalmers University of Technology, SE 412 96 Göteborg, Sweden
- 2004 - 2008 Designer of timber structures, especially timber bridges and R&D Manager at Moelven Töreboda AB, SE-545 21 Töreboda, Sweden
- 2002 - 2004 Consultant engineer in the field of timber structures and external lecturer in Structural Engineering at different universities in Italy

- 2001 - 2002 Guest researcher at the department of Mechanical and Structural Engineering, University of Trento, Trento, Italy.
- 1996 -2001 Research assistant at the department of Structural Engineering, Steel and Timber structures, Göteborg, Sweden

Academic Educations and Qualifications

- June 2001:* *PhD (Doctor of Philosophy)* in Steel and Timber Structures Chalmers University of Technology. Title of the PhD thesis : “On some Fatigue Problems related to Steel Bridges”. Supervisor: Prof. Bo Edlund, Chalmers University of Technology. Opponent: Prof. Ulrike Kuhlmann, Stuttgart University, Germany.
- 1996 –2001:* Postgraduate studies (forskarutbildning) in steel and timber structures, Chalmers University of Technology, Göteborg, Sweden.
- 1997-1998:* 5 months at the ATLSS Research Center, Lehigh University, Pa, USA (Supervisor: Prof. John W. Fisher).
- October 1998:* *Licentiate of Engineering* in Steel and Timber Structures, Chalmers. (Title of the thesis: “Modular Bridge Expansion Joints: Loads, Dynamic Behaviour and Fatigue Performance”. Supervisor: Prof. Bo Edlund).
- October 1995:* *M.Sc. in Civil Engineering* from the University of Bologna, Italy. (Title of the Master’s thesis: “2D and 3D modelling of concrete up to collapse; supervisor: Prof. Angelo Di Tommaso).

TEACHING

I have worked as teaching assistant and teacher for graduate students since 1997. I am currently (since 2010) teaching the following two graduate courses at Lund University:

- Steel and timber structures VBKN01, 7,5 hp
- Bridge Engineering VBK041, 7,5 hp

DESIGN, MANUFACTURE AND ERECTION OF STRUCTURES

I have worked as a structural engineer since 2002 and have designed a large number of timber structures, including large-span arches, curved beams, trusses, etc. both in Sweden and in Italy. I have also designed a few concrete structures and steel structures. I have designed about 20 timber bridges, both pedestrian and road bridges, with lengths up to 130 m and spans up to 60 m. The typologies of bridges designed were: simple girder bridges, stress-laminated bridges, stress-laminated box-beam and T-beam bridges, arch bridges and cable-stayed bridges. I have also participated during production and erection of the main structures that I have designed.

REPRESENTATION IN INTERNATIONAL/NATIONAL WORKING GROUPS

- Expert in ECCS-TC6 “European Convention for Constructional Steelwork” – Technical Committee 6 – Fatigue, 1998-2001
- Member of the Technical Committee of The Swedish Glulam Association, since 2005
- Expert in CEN/TC 124 WG3, “Glued-Laminated Timber”, since 2007
- Member of EC5 “Timber Structures”, since 2009

- Working group leader, COST Action FP1004 “Enhance mechanical properties of timber, engineered wood products and timber structures”, 2010-2015.

Research and Expertise Fields

RESEARCH AREAS

The research topics that I have been working with have been:

- Fracture mechanics of concrete structures
- Dynamic behaviour and fatigue performance of modular bridge expansion joints
- Fatigue performance of riveted railway girders
- Fatigue performance of slender beams (web-breathing)
- Strengthening of timber structures by means of self-tapping screws
- Strengthening of timber structures by means of steel plates and carbon fibre laminates
- Innovative composite bridges glulam-LVL
- Load bearing capacity of LVL plates subjected to concentrated load
- Static and dynamic behaviour of stress-laminate timber decks
- Multi-storey post and beam timber buildings with special emphasis on bracing systems
- Stability and Bracing requirements for steel bridges
- Stability and bracing requirements for large-span timber structures

My present research interests are in the field of timber engineering and steel structures, especially: timber connections, large-span structures, composite structures stability and bracing of slender structures. My expertise field is structural engineering in general.