Visit to LBNL – July/2010

Carlos Eduardo Pereira

Institutions

- UFRGS/School of Engineering/GCAR
- INCT Namitec - link

Speaker

- Professor UFRGS – Brazil – Electrical Engineering
- Vice-Dean School of Engineering
- PhD Industrial Automation EE – Univ Stuttgart Germany – 1995
- Sabbatical – United Technologies Research Center – Hartford/CT/USA (Carrier, Otis, Sikorsky, Pratt-Whitney, Hamilton Sundstrand) – Group Leader – Embedded Information Devices – 2000/2001
- Technical Director CETA SENAI/RS Brazil 2002/2009
- TC Chair IFAC TC5.1 Manufacturing Plant automation
- President - Brazilian Automation Society
- Associate Editor – Control Engineering Practice Journal - Elsevier

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Universidade Federal do Rio Grande do Sul

Escola de Engenharia

General Information

- **UFRGS:**
    - ~30000 students /18000 undergrad
    - teaching staff: ~2300
    - 65 undergrad courses
      64 MSc./PhD programs
- **School of Engineering**
    - created in **1896**
    - 13 undergrad courses (Civil, Elec., Mec., Chem., Mines, Metal.,Mat.,Prod.,Comp., Env., Aut., Energy, Phys.), 7 grad Msc./Phd programs
    - teaching staff: 220
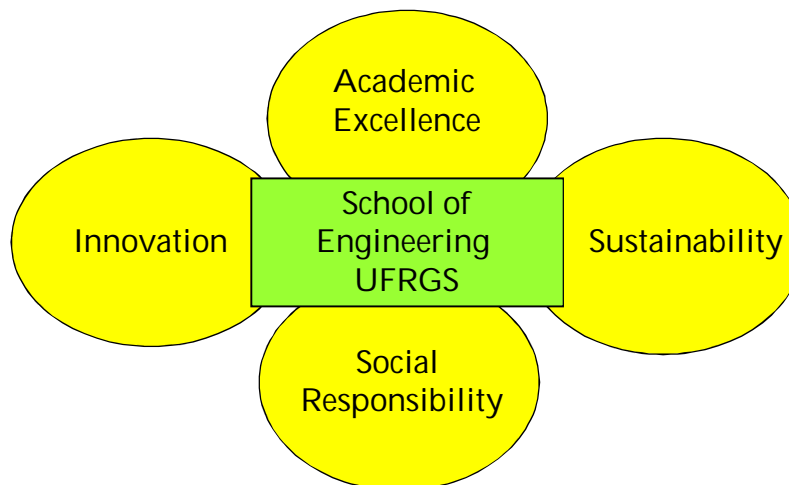   - students: ~6000 students/4500 undergrad

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UFRGS

- **Created in 1895**
- **~70 undergrad programs**
- **Faculty: 2400 (85% full time)**
- **Students: ~34 000 (~20 500 undergrad)**
- **4 Campus in Porto Alegre/RS**
- **One of the top 5 universities in Brazil**

GCAR-UFRGS

- Control, Automation and Robotics Group
- 10 Faculty members + ~25 PhD students + ~30 MSc students
- Automation:
  - industrial + building automation applications
  - Real-time distributed embedded computing

Undergrad Eng.Courses

- **Civil**
- **Chemical**
- **Control and Automation** (new)
- **Computer**
- **Enviromental** (new)
- **Electrical**
- **Production**
- **Mechanical**
- **Metalurgical**
- **Mines**
- **Materials**
- **Energy, Biomedical** (planned)

UFRGS
UNIVERSIDADE FEDERAL
DO RIO GRANDE DO SUL

Graduated Programs

MSc. and PhD. levels:

- **Civil**
- **Chemical**
- **Electrical**
- **Production**
- **Mechanical**
- **Metalurgical, Mines & Materials**
- **Design**

UFRGS
UNIVERSIDADE FEDERAL
DO RIO GRANDE DO SUL

Academic Excellence

Innovation

School of Engineering UFRGS

Sustainability

Social Responsibility

UFRGS
UNIVERSIDADE FEDERAL
DO RIO GRANDE DO SUL

Academic Excellence

School of Engineering UFRGS

UFRGS – one of the top 3 universities in Brazil
- top 500 world class universities
EE – "5 stars" undergrad courses
- graduated courses with excellent evaluation
- scientifical publications
- international collaboration
- active participation on technical committees of scientifical societies (IEEE, IFAC, ...)

Innovation

School of Engineering UFRGS

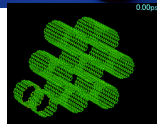School of Engineering UFRGS
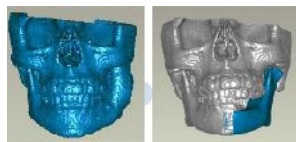
Sustainability

Clean technologies
Renewable energy

Green buildings

School of Engineering UFRGS

Social Responsibility

Research Labs

- More information:
  http://www.ufrgs.br/eng