**TID7201: Engineering Innovation and Entrepreneurship**

**Short description**

This course will equip students with the knowledge and tools to understand both the role of technical innovation and entrepreneurship in the growth of industries.

**Course objectives:**

To give the students an introduction to different ways of understanding and conducting innovative work and how it contributes to revitalization of existing and/or establishment of new enterprises.

**Learning objectives:**

After taking the course the students should understand the role of innovation and knowledge transfer within organizations.

**Methods of course delivery:**

1. lectures and discussions
2. self study assignments
3. case studies and group discussions

**Method of assessment**

Assessment will be done through coursework which will include assignments, class room and take home tests, project work and presentations and a written examination. Course work will carry a total of 40% and written examination carries 60%. Coursework marks will be divided into; Assignments 5%, Tests 10% and Project Work 25%.

**Course content**

Investment in knowledge for the firm (4 hours), Innovation with a firm (4 hours), Technology diffusion and transfer from labs to market (8 hours). Innovation in global economy(4 hours). Marketing strategies of R&D Organizations (4 hours). Technology and business growth (4 hours). Culture and leadership in innovation and innovative organizations (8 hours). Innovation and entrepreneurship (4 hours). Non Disclosure Agreements, Trade Marks, Service Marks, Copyright.(8 hours). Business plan for a spin-off company.(12 hours) (Assignment and Seminar series)

**Basic reading list/references**

1. David O’Sullivan and Lawrence Doley. *Applying Innovation*. 2009. Sage Publishers.
2. Paul Trott. *Innovation Management and New product Development*. 2008 4th Edition. Prentice Hall.
3. Edward Lumsdaine and Martin Baules. *Entrepreneurship from creativity to innovation; effective thinking skills of a changing world.* 2006, , ISBN: 9781425104726, Trafford Publishing.
4. Micheal J.C. Martin. *Managing innovation and Entrepreneurship in Technology based focus*, John Wiley & sons 1994
5. Joetidd, John Bessand. *Innovation and entrepreneurship*. 2007, John Wiley & sons ISBN-13:9780470032695
6. Rowan Gibson and Peter Skarzynski, *Innovation to the core; a blueprint for transforming the way your company innovates*, ISBN 13: 978-1-4221-0251-0, Howard Business School Publishing.