

**Title (Units):** **COMP7760 Special Topics in Business Analytics (3,3,0)**

**Course Aims:** To learn state-of-the-art topics in Business Analytics.

**Prerequisite:** The pre-requisite depends on the specific topics covered. The pre-requisite and the chosen topics will be announced before the semester starts.

**Course Intended Learning Outcomes (CILOs):**

Upon successful completion of this course, students should be able to:

No.	Course Intended Learning Outcomes (CILOs)
	<b>Knowledge</b>
1	Explain the importance of the selected topics in business analytics
2	Describe the problems involved in the selected topics and explain the solutions to these problems.
	<b>Skill</b>
3	Master problem solving and/or practical skills relevant to the selected topics.

**Calendar Description:** Students will learn state-of-the-art topics in business analytics. Emphasis will be placed on the current issues, methodologies and/or practice. After completing this course, students will understand some current topics in and methodologies of business analytics.

**Teaching and Learning Activities (TLAs):**

CILOs	Type of TLA
1-3	The teaching and learning activities depend on the specific topics covered. These activities may include: (i) Students will learn the key concepts and principles of the subject via lectures; (ii) Tutorials will be conducted to clarify concepts and to have a deeper understanding of the teaching materials, where real-world cases will be studied and problems will be given to students for in-depth discussion; (iii) Students will learn the practical aspects of the topics covered via laboratory sessions; (iv) Students will work on assignments/term paper/project to consolidate and apply what they have learnt.

**Assessment:**

No.	Assessment Methods	Weighting	CILOs to be addressed	Description of Assessment Tasks
1	Continuous Assessment	40%	1-3	Continuous assessments are designed such that students apply what they have learned to solve the problems involved in the selected topics in business analytics.
2	Examination	60%	1-3	Final examination questions are designed to assess students' understanding in the concepts and their ability in applying these concepts to solve problems.

**Assessment Rubrics:**

	Excellent (A)	Good (B)	Satisfactory (C)	Fail (F)
Analytic models and/or business analytics	Can describe and explain the state-of-the-art methods of business analytics and/or models	Can describe and explain the state-of-the-art methods of business analytics and/or models with a high level of effectiveness	Can describe the state-of-the-art methods of business analytics and/or models with a moderate level of effectiveness	Cannot describe the state-of-the-art methods of business analytics and/or models

	<b>Excellent (A)</b>	<b>Good (B)</b>	<b>Satisfactory (C)</b>	<b>Fail (F)</b>
Problem solving skills	Can effectively and correctly apply methods covered to solve a given problem	Can correctly apply methods covered to solve a given problem	Can apply methods covered to solve a given problem with some degree of effectiveness	Cannot apply methods covered to solve a given problem
Software tools	Able to use software tool(s) to solve a problem with a high degree of effectiveness	Able to use software tool(s) to solve a problem with a considerable degree of effectiveness	Able to use software tool(s) to solve a problem with some degree of effectiveness	Unable to use software tool(s) to solve a problem

#### **Course Content and CILOs Mapping:**

<b>Content</b>		<b>CILO No.</b>
I	One or more state-of-the-art topics in business analytics	1-3

#### **References:**

Selected articles from journals, magazines, conference proceedings, research monographs, etc.

#### **Course Content:**

##### **Topic**

- I. One or more state-of-the-art topics in business analytics
  - Advanced Analytic Models for IT Management
  - Current Topics in Business Intelligence
  - Advanced Decision Support: Models and Systems
  - Advanced Data Mining Techniques for Business Problems
  - Advanced Knowledge Discovery Techniques
  - AI for Business Analytics
  - Advanced Specific Analytics: Financial Analytics, CRM Analytics, SCM Analytics, Behavioral Analytics, Risk Analytics
  - Other contemporary topics in business analytics
  - Case Studies and Tools