MSc Computing- Enterprise Software Systems

Business Intelligence Module Overview

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Waterford Institute *of* Technology

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Introduction

Welcome

My contact details:

- Ruth Barry, Department of Computing and Mathematics.
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Objectives:

Introduction to the Module

Module Delivery

Module Topics

Module Structure

Module Schedule

Labs

Assessment

Module Delivery

Netlify page for module content:

https://bi-msc-19.netlify.com

Used for assignment delivery

Slack: communication on course

Quiz tool – included with lectures

https://b.socrative.com/login/student/

Module Structure

12 Weeks of Delivery

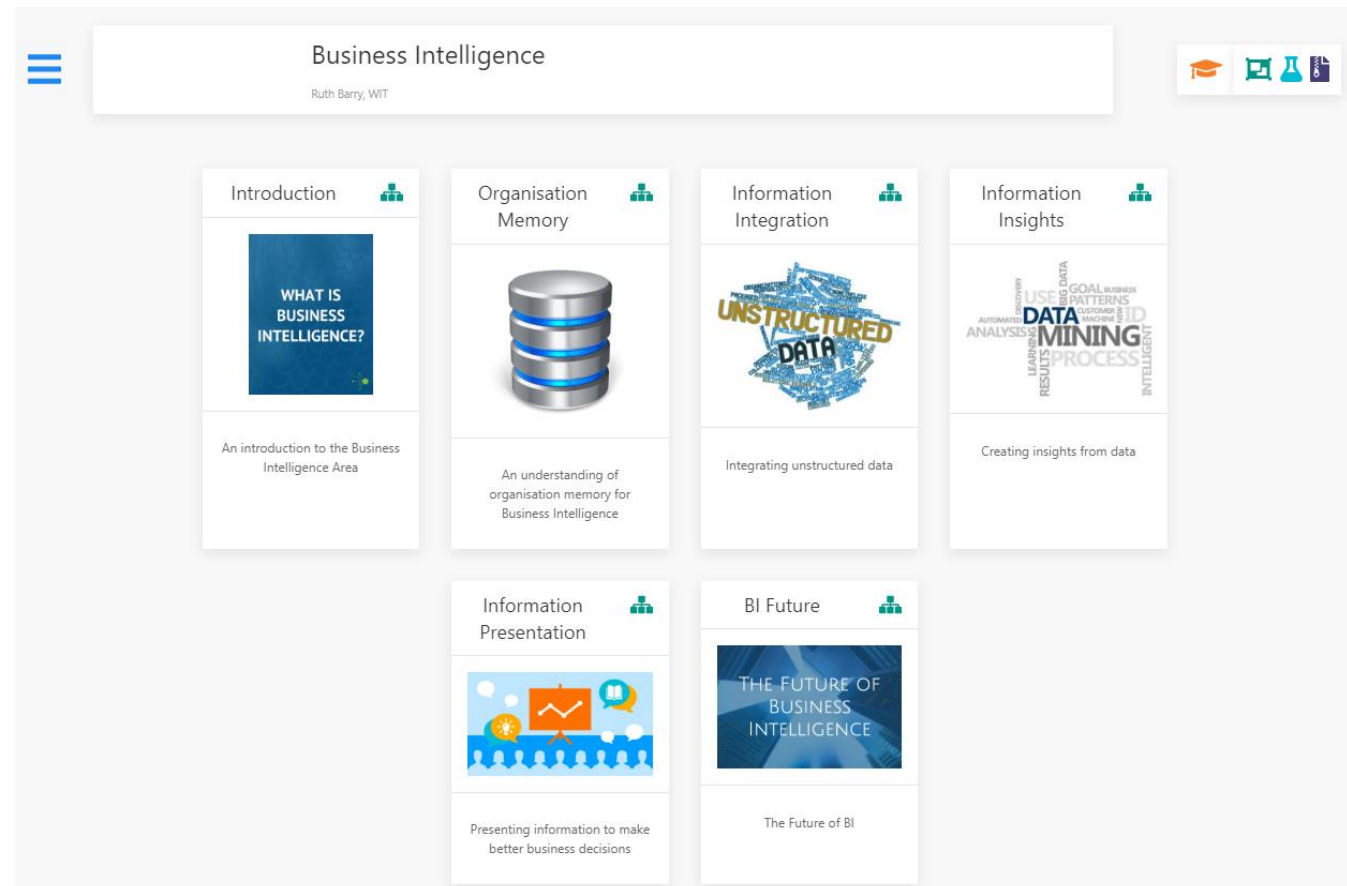| Lectures:	Thursday 3:15-5 p.m. GMT
Lab:	Tuesday 3:15-5 p.m. GMT

Module Syllabus Content:

- Examine business intelligence concepts, processes and technologies.

- Organisation memory – structured storage for data analysis, e.g. Data Warehouse.

- Integration with data in an unstructured format, e.g. web

- Create insights/knowledge from data – data mining concepts

- Demonstrate reporting and dashboard visualization tools to visualise data to present data for decision making.
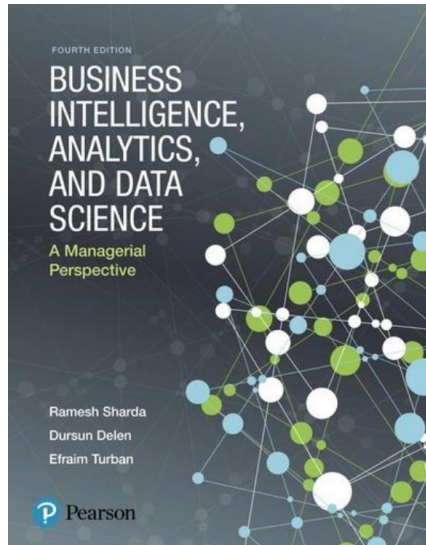
Module Topics

6 sections:
After introduction on week 1, there are 5 topics to cover the 4 capabilities of BI and future BI.
Each topic should take 2 weeks.
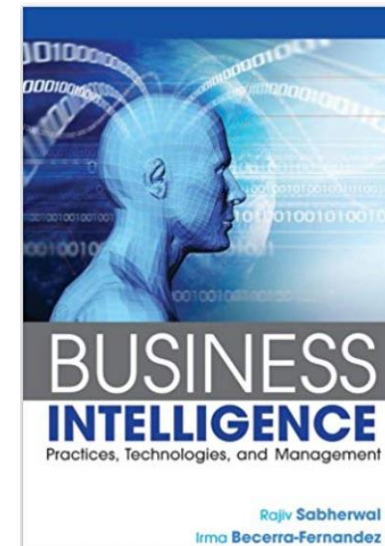
Schedule week starting 9th September, 2019…

Date	Week	Topic	Labs
9th September	1	Introduction	Introduction
16th September	2	Org Memory - DataWarehousing	Excel
23rd September	3	DataWarehousing	Excel
30th September	4	Information Integration	Excel
7th October	5	Information Integration	Excel
14th October	6	Info Insights -Datamining	Qlik
21st October	7	Data Mining	Qlik
28th October	STUDY WEEK		
4th November	8	Presentation	Qlik
11th November	9	Presentation	Qlik
18th November	10	Future trends	Qlik
25th November	11	Future trends	Qlik
2nd December	12	Revision	

Module Readings :

Business Intelligence, Analytics, and Data Science A Managerial Perspective
Fourth edition, 2017
Sharda, Delen & Turban.
Pearson
ISBN: 9780134633282

Business Intelligence.

Sabherwal.

2014

John Wiley & Sons

ISBN-13: 978-0470461709

BI Resources:

[Teradata University Network](#)

- ◦ A great and free academic resource for BI (the available resources include cases, articles, tools including Microstrategy, datasets, exercises, etc.
- ◦ After registration, you will need the student password: Analytics

[The Data Warehousing Institute](#)

[Barc Research](#)

[Business Intelligence Network](#)

[TechTarget](#)

Labs

Week 1-2- Introduction to Excel functions, pivot tables

Week 3 – Cleaning data

Week 4 – Charts and intro to descriptive statistics

Week 5 – Descriptive statistics,

Week 6 – Introduction to QlikView

Week 7 – Data model, sheets, filters and navigation

Week 8 – Types of charts

Week 9 – Table design, groups and containers

Week 10 – Advanced interface design

Week 11 – Revision

Week 12 – Project demo

Lab Software - QlikView

Qlikview - http://www.qlik.com Register and please ensure the Company field has Waterford Institute of Technology
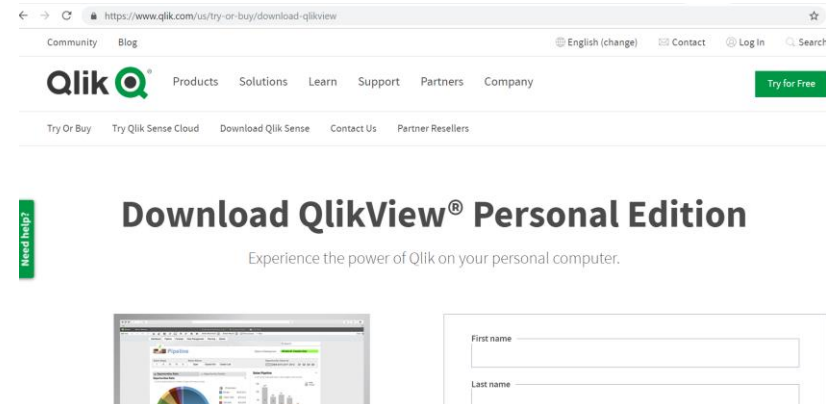
Job Title should have student entered

email - use your wit student gmail account.

Once installed open QlikView. Click on the Settings menu and choose User preferences, choose the license tab and enter your user name, organisation and the following license information:

License Key: 4405303059894437

Control Number: 44981

Labs - troubleshooting

Post the issue in Slack; think of it as asking a question in a traditional classroom. Include any screen shots which may help solve the problem

We encourage classmates to help each other, so if you know the answer to another student's issue, please do respond

All our responses will be via Slack so that all students see the resolution.

Note: for private issues, chat is also possible privately in Slack (or email)
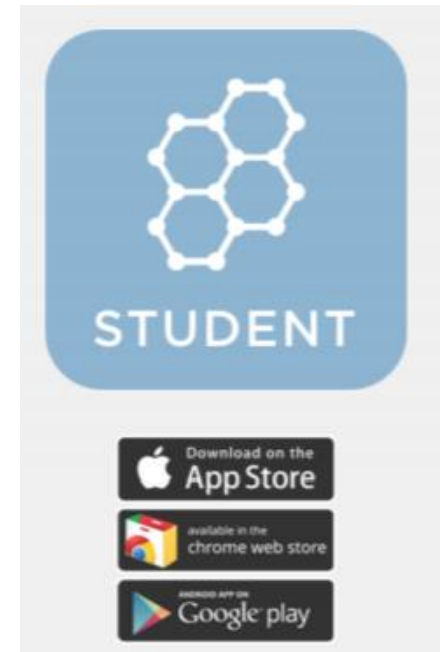
Socrative

Socrative will be used during live lectures for short quizzes

You can download the app from www.socrative.com/apps.html

Or open in a new browser tab to log in : www.bsocrative.com/login/student/

A room will be shared with you during the lecture

Assessment

Module is 50:50 breakdown between continuous assessment and exam

- Written Exam 50% - December 2019 (date tbc)
  - Examined on content in lectures.
  - Sample questions will be made available to you on our github page.

- Continuous Assessment 50% - Due 8th December 2019
  - Practical project
    - Individual assessment
    - Submit via Moodle assignment link

Assessment

Assignment: Project – 50%

You are required to:

1. Prepare and analyse data (data will be given to you) - 20%

2. Design a dashboard that presents the data relevant to appropriate KPI's for a user associated with the data - 30%

3. Write a summary report for the work completed in part 1 and 2 above.