Liverpool John Moores University

Title:	MAINFRAME COMPUTING
Status:	Definitive
Code:	**6067COMP** (118478)
Version Start Date:	01-08-2019
Owning School/Faculty:	Computer Science
Teaching School/Faculty:	Computer Science

Team	Leader
Somasundaram Ravindran	Y

Academic Level:	FHEQ6	**Credit Value:**	12	**Total Delivered Hours:**	36
Total Learning Hours:	120	**Private Study:**	84		

Delivery Options
Course typically offered: Semester 2

Component	Contact Hours
Workshop	36

Grading Basis: 40 %

Assessment Details

Category	Short Description	Description	Weighting (%)	Exam Duration
Report	AS1	An individual task to design and execute a selection of mainframe jobs producing appropriate output.	100	

Aims

To allow students to gain an insight into the challenges and technology involved in mainframe computing.
To develop practical skills in using mainframe computing technologies.

Learning Outcomes

After completing the module the student should be able to:

1 Define the core components of mainframe computing and identify their role and function.
2 Differentiate between the various application execution mechanisms available to mainframe computers and evaluate the role of each.
3 Critically evaluate the role of the mainframe in a corporate environment.
4 Prepare and execute mainframe jobs and processes and produce appropriate output.

Learning Outcomes of Assessments

The assessment item list is assessed via the learning outcomes listed:

Mainframe Jobs	1	2	3	4

Outline Syllabus

-Introduction to the Mainframe
-Introduction to z/OS, ISPF and TSO
-Datasets
-Batch processing, JCL, JES
-Hardware Overview
-Introduction to virtualisation, z/VM and Linux
-Transaction Management and CICS
-Database Management and DB2 Part 1
-Database Management and DB2 Part 2
-Systems Programming

Learning Activities

This module is based on the IBM Professional Development course 'Introduction to the New Mainframe: z/OS Basics' and is delivered with support from IBM. The syllabus and learning materials are based on the official IBM curriculum and will prepare the student for the official IBM professional certification route upon completion of this course (undertaken at additional expense in their own time).

Notes

This unit prepares students for working in computing environments that are reliant on mainframe technology. Many large corporations run their entire operations on such technology and the skills required to work in these environments are very different from those applicable to modern desktop computing.