Indian Institute of Management Indore

INTEGRATED PROGRAM IN MANAGEMENT TERM: II

TITLE OF THE COURSE: INTEGRAL CALCULUS

CREDITS: 6

COURSE DESCRIPTION

The course will be continuation of the course of differential calculus offered in Term I. It will focus on integral calculus, starting with a module of 6 sessions on notion of convergence for sequences and series of numbers. The next 19 sessions will span over the concepts of integration for functions of one variable. The rigorous definitions for an integral will be provided also discussing some important examples for integrable functions. Well-known techniques to calculate integrals will be taught, supported by several problem solving sessions. The course will finish with 5 sessions on improper integrals and beta and gamma functions.

COURSE OBJECTIVES:

Calculus finds its applications in management studies, for example, optimization, finance, economics, and probability. The theory of convergence is also very important for discrete probability. The objective of the course is to enable students to understand the concepts of integral calculus, and to enhance their ability to use these techniques in inter-disciplinary applications.
