

MATH 598 / 782 - PROJECT 4

Please submit your project by 6.00 pm (EDT) on Friday 30th October by uploading a single pdf to myCourses.

Estimate by Monte Carlo (possibly using variance reduction techniques) the following integrals

(a)

$$I = \int_{-2}^2 \exp\{x(1-x)/2\} dx$$

5 MARKS

(b)

$$I = \int_0^1 \int_0^1 \frac{\sin(x)}{\log(1+x)} \exp\{-(x+y)\} dx dy$$

5 MARKS