

King Fahd University of Petroleum and Minerals

Department of Mathematics and Statistics

Math 202-02

Quiz #6 (optional)

Name:.....ID:.....

Exercise:

(a) Find a series solution y_1 about $x = 1$ for the differential equation

$$(1 - x)y'' + y = 0$$

(b) Give the form of a second solution y_2 linearly independent from y_1 .