## Economics 1102-25 Homework 3 Part 2

Due Date: March 28, 2005 Total Points = 70 (will count as points in hw3)

All answers need to be typed except calculations and graphs.

Show all your work for full credit.

Graphs need to be correctly labeled for full credit.

No late Assignments are accepted

## Question 1: Multiplier with Imports (70 points) ROUND YOUR ANSWERS UP TO THREE DIGITS AFTER DECIMAL POINT

Suppose there are only two countries: the US and Mexico. Consider the following data:

 $MPC_{MX} = 0.9$  (MPC in Mexico)

 $MPI_{MX} = 0.02$  (so 2% of an additional \$1 of income in Mexico is spent on the American goods)

 $MPC_{US} = 0.6$  (MPC in the US)

 $MPI_{US} = 0.15$  (so 15% of an additional \$1 of income in the US is spent on the Mexican goods)

- a) (20 points) Suppose Mexican government *decreases* government spending by \$1 billion. By how much does Mexican GDP decline? Show your calculations.
- b) (20 points) Calculate the decrease in the American GDP induced by the decrease in Mexican GDP.
- c) (30 points) After the decrease in the US GDP, what do you think is going to happen with the Mexican GDP? Calculate the amount by which Mexican GDP changes as a result of the decrease in the US GDP.