Homework 4

1. The following table lists some exchange rates and Big-Mac prices. Use the theory of purchasing-power parity to fill in the blanks with a number or "?" if the figure cannot be inferred from the information.

Country	Currency	Big-Mac price	Exchange rate (per US dollar)	
			Predicted (PPP)	Actual
USA	Dollar	5		
China	Yuan	20		7
Japan	Yen		75	100
UK	Pound	4	0.8	

2. Consider a small open economy characterized by the following equilibrium condition and specifications:

$$Y = C(Y - T) + I(r) + G + X(\varepsilon),$$
$$Y = 8000, G = 1000, T = 800,$$
$$C(Y - T) = 1000 + \frac{3}{4}(Y - T),$$
$$I(r) = 1200 - 100r,$$
$$X(\varepsilon) = 500 - 200\varepsilon,$$
$$r = r^* = 5.$$

(1) Calculate the national savings, excess savings, and net capital outflow.
(2) Calculate the equilibrium real exchange rate.
(3) Suppose that the government increases its expenditure by 200 and leave tax unchanged (in effect, the budget deficit increases by 200.). Calculate the private savings, the national savings, the excess savings, and the net capital outflow. And calculate the new equilibrium real exchange rate.