Linear Regression: Amazon Prime Memberships

The following data show the number of U.S. Amazon Prime Memberships (in millions) in June of each year since 2014.
Source: http://files.constantcontact.com/150f9af2201/0b59b234-e108-4c8e-9766-3c96a5a9cbce.pdf

Year	2014	2015	2016	2017	2018
Memberships	18	44	63	85	95

1. Calculate the rate of change in Amazon Prime Memberships per year to make a case for why the population growth *might* be linear.

2. Let t be the number of years since 2014. Use linear regression to find a linear model for $P(t)$, the number of prime memberships (in millions).

3. Based on the regression model, estimate the number of U.S. Prime memberships in 2025.

4. Based on the regression model, and if this growth continues, estimate when the number of prime memberships might reach 326 million (roughly the current population of the United States).

5. If the average Prime member spends $1500 a year, and the a Prime Membership cost $119/year in 2018, how much money did Amazon.com bring in just from Prime members?

6. Which data point might be worrisome about making extrapolations from this data?