

Economic Development

Alessandra Fogli

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Homework 2

From Economic Growth (by Weil):

1. Chapter 4, problem 4 (20 points)
2. Chapter 4, problem 7 (30 points)
3. Chapter 6, problem 5 (10 points)
4. In Chile GDP increased by almost a factor of five between 1965 and 2000. The relevant data are reported in the Table below:

	Employment	Education	Capital	GDP
1965	2,751.4	4.77	65,192.41	34,988.5
2000	6,019.1	7.89	258,200.21	150,896.0

Employment is number of workers in millions, education is the average years of schooling for people older than 25, and the capital stock and real GDP are measured in millions of 2000 dollars.

- 1) Compute the (average continuously compounded) growth rate of GDP and GDP per worker over the period 1965-2000. (10 points)
- 2) Assume a Cobb Douglas augmented production function with α equal to 1/3. Use our growth accounting methodology to allocate growth in output to growth in TFP, employment, capital, and education, respectively. What factors are most important? (10 points)
- 3) How would your answer change if no data on education were available? (10 points)
- 4) Assume you have no data on education. How do you decompose the growth of output per worker? (10 points)

Due October 22nd at beginning of class