

# Forecasting U.S. Economic Growth

## U.S. Berkeley Economic Growth Lunch

February 11, 2004

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*CEA 2004 Economic Report of the President* forecast.

2004 productivity growth at 1.4% per year—less than half of consensus

2004 payroll employment growth at 3.8 million December-to-December (2.6 million 2004 average-2003 average)—double consensus, and apparently higher than every? forecaster in the *Wall Street Journal* survey of forecasters.

Reconciliation with consensus forecast:

Start at:

130.9 million average payroll employment for 2004 (consensus)  
131.6 million from keeping real GDP the same and stepping down to 1.4%  
per year productivity growth.

400,000 gap that I cannot explain...

132.0 from moving CEA employment boom start date from November to  
February  
132.7 CEA “forecast” number

CEA now saying “132.7” rather than “132.0” because White House Media Affairs does not want headlines: “CEA cuts its 2004 employment forecast by 700,000!”

Can’t account for 400,000 gap.

The interesting question for economists—what I’m going to talk about today—can one make a forecast that 2004 productivity growth will be 1.4%?

I’m going to argue, “no, you can’t.”

TABLE 3-1.— *Administration Forecast*<sup>1</sup>

Year	Nominal GDP	Real GDP (chain-type)	GDP price index (chain-type)	Consumer price index (CPI-U)	Unemployment rate (percent)	Interest rate, 91-day Treasury bills (percent)	Interest rate, 10-year Treasury notes (percent)	Nonfarm payroll employment (millions)
	Percent change, fourth quarter to fourth quarter				Level, calendar year			
2002 (actual) ....	4.3	2.9	1.3	2.2	5.8	1.6	4.6	130.4
2003 .....	5.8	4.2	1.5	2.0	6.0	1.0	4.0	130.1
2004 .....	5.2	4.0	1.2	1.4	5.6	1.3	4.6	132.7
2005 .....	4.9	3.4	1.4	1.6	5.4	2.4	5.0	136.3
2006 .....	5.0	3.3	1.6	1.9	5.2	3.3	5.4	138.6
2007 .....	5.2	3.3	1.8	2.2	5.1	4.0	5.6	140.6
2008 .....	5.2	3.1	2.0	2.5	5.1	4.3	5.8	142.5
2009 .....	5.2	3.1	2.0	2.5	5.1	4.4	5.8	144.4

<sup>1</sup>Based on data available as of December 2, 2003.

Sources: Council of Economic Advisers, Department of Commerce (Bureau of Economic Analysis), Department of Labor (Bureau of Labor Statistics), Department of the Treasury, and Office of Management and Budget.

TABLE 3-2.—*Accounting for Growth in Real GDP, 1960-2009*<sup>1</sup>  
 [Average annual percent change]

Item	1960 Q2 to 1973 Q4	1973 Q4 to 1990 Q3	1990 Q3 to 2003 Q3	2003 Q3 to 2009 Q4
1) Civilian noninstitutional population aged 16 or over .....	1.8	1.5	1.2	1.1
2) Plus: Civilian labor force participation rate .....	.2	.5	-1	-1
3) Equals: Civilian labor force <sup>2</sup> .....	2.0	2.0	1.1	1.0
4) Plus: Civilian employment rate <sup>2</sup> .....	.0	-1	.0	.2
5) Equals: Civilian employment <sup>2</sup> .....	2.0	1.9	1.1	1.2
6) Plus: Nonfarm business employment as a share of civilian employment <sup>2,3</sup> .....	.1	.1	-1	.6
7) Equals: Nonfarm business employment .....	2.1	2.0	1.0	1.8
8) Plus: Average weekly hours (nonfarm business) .....	-4	-4	-1	.0
9) Equals: Hourall persons (nonfarm business) .....	1.7	1.7	.9	1.8
10) Plus: Output per hour (prods of ictivity, nonfarm business) ...	2.8	1.4	2.5	2.1
11) Equals: Nonfarm business output .....	4.6	3.1	3.4	3.9
12) Plus: Ratio of real GDP to nonfarm business output <sup>4</sup> .....	-3	-2	-4	-5
13) Equals: Real GDP .....	4.2	2.9	3.0	3.4

<sup>1</sup> Based on data available as of December 2, 2003.

<sup>2</sup> Adjusted for 1994 revision of the Current Population Survey.

<sup>3</sup> Line 6 translates the civilian employment growth rate into the nonfarm business employment growth rate.

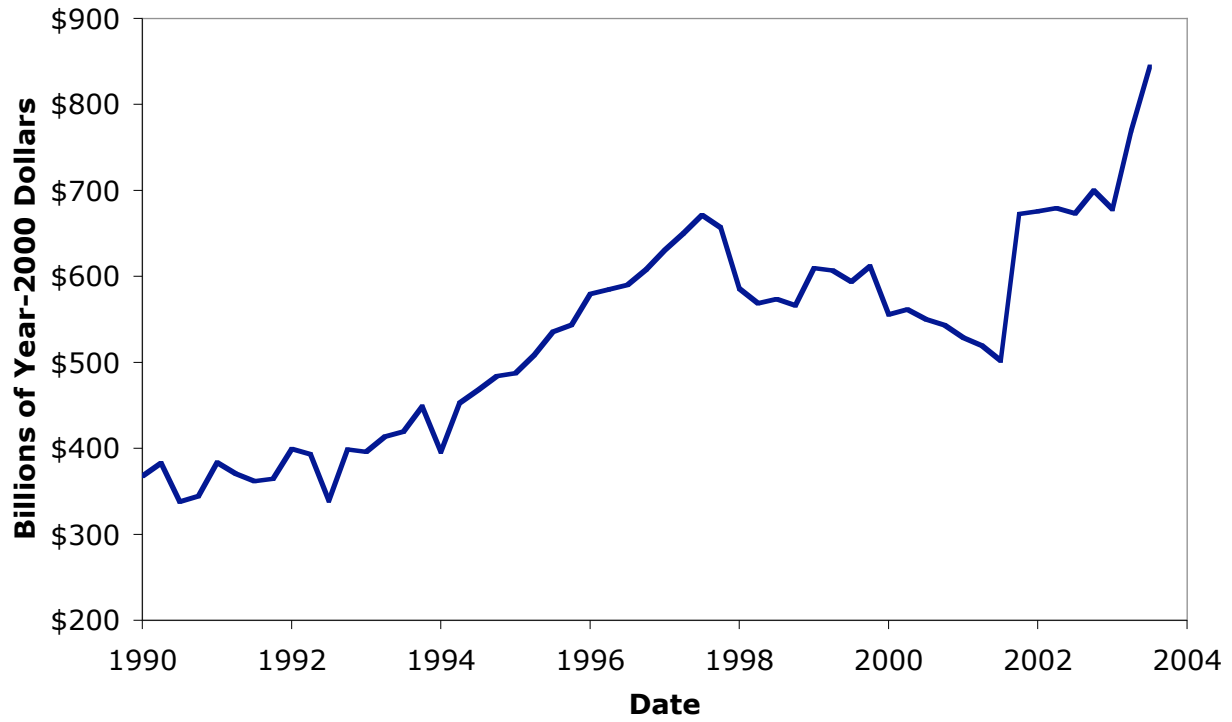
<sup>4</sup> Line 12 translates nonfarm business output back into output for all sectors (GDP), which includes the output of farms and general government.

Note.—The periods 1960 Q2, 1973 Q4, and 1990 Q3 are business cycle peaks.

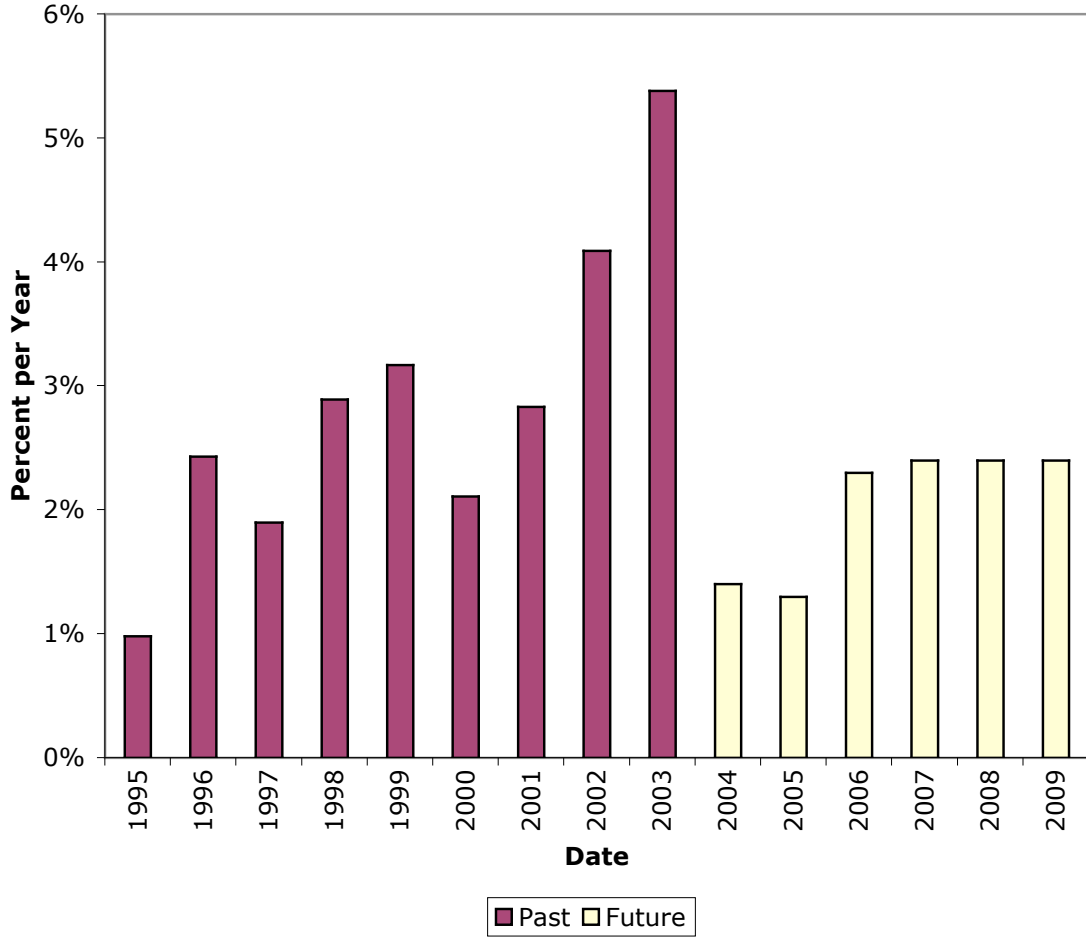
Detail may not add to totals because of rounding.

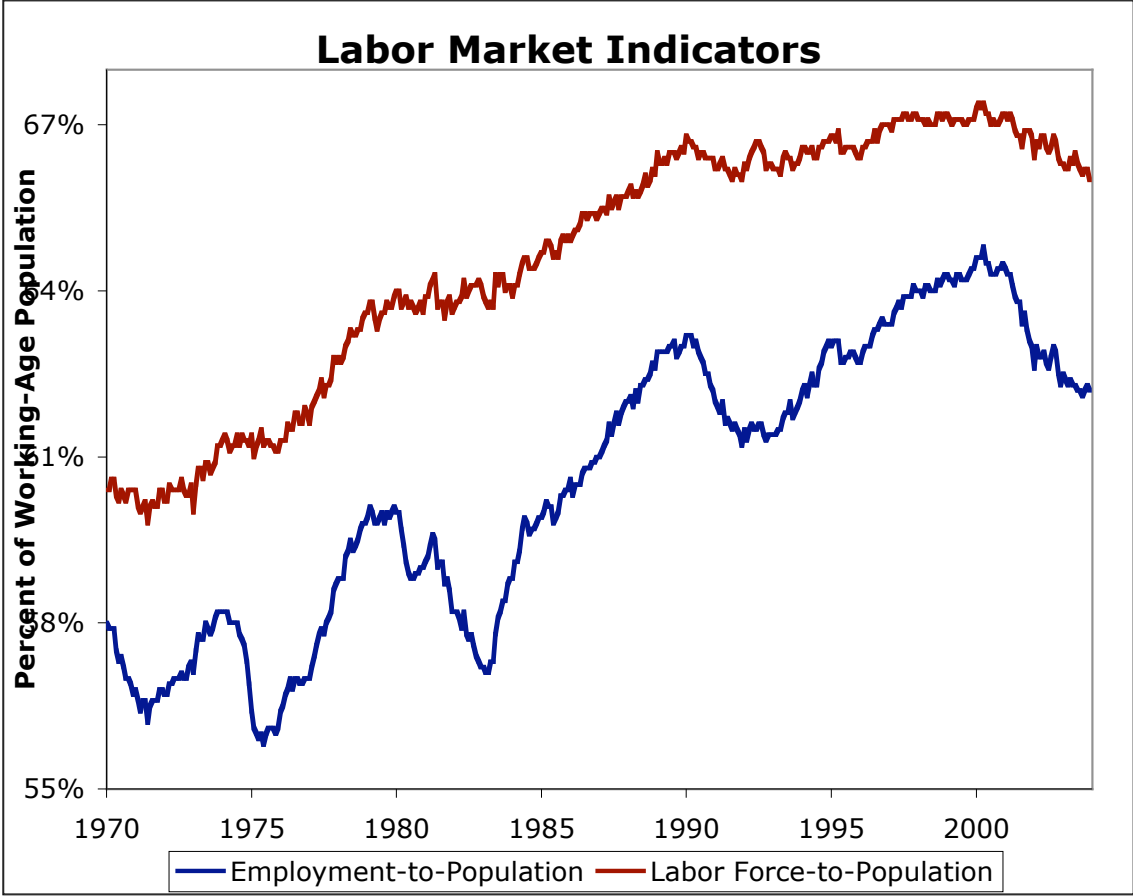
Sources: Council of Economic Advisers, Department of Commerce (Bureau of Economic Analysis), and Department of Labor (Bureau of Labor Statistics).

## Real After-Tax U.S. Corporate Profits

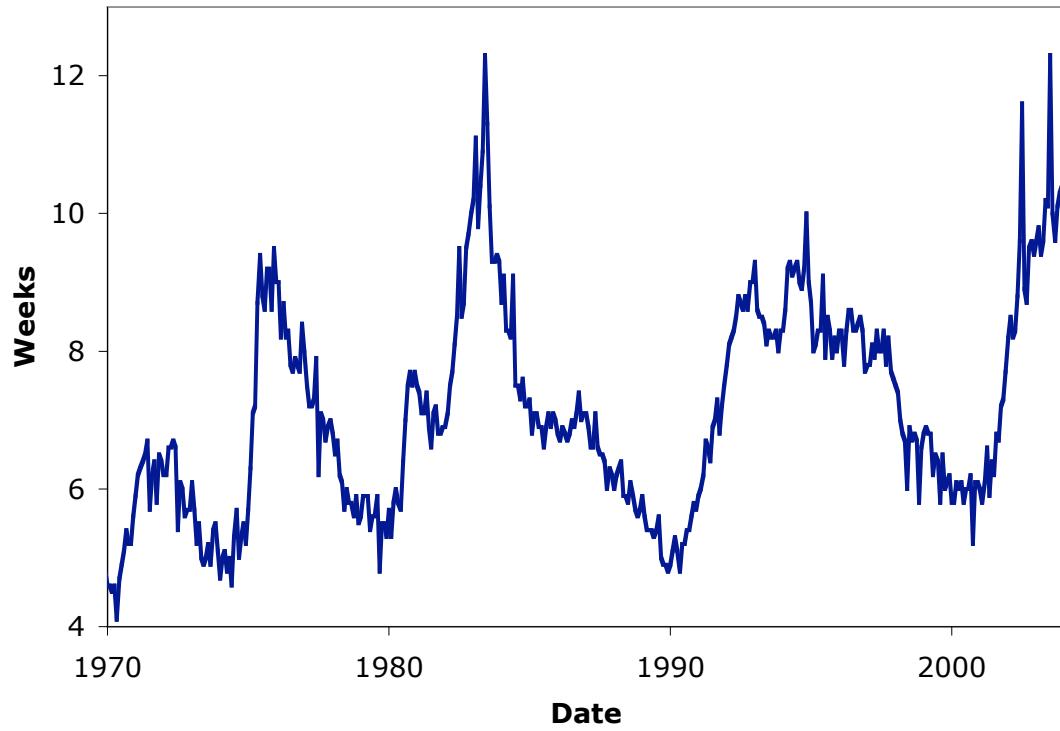


### Nonfarm Business Productivity Growth Since 1995, and Bush "Projection"

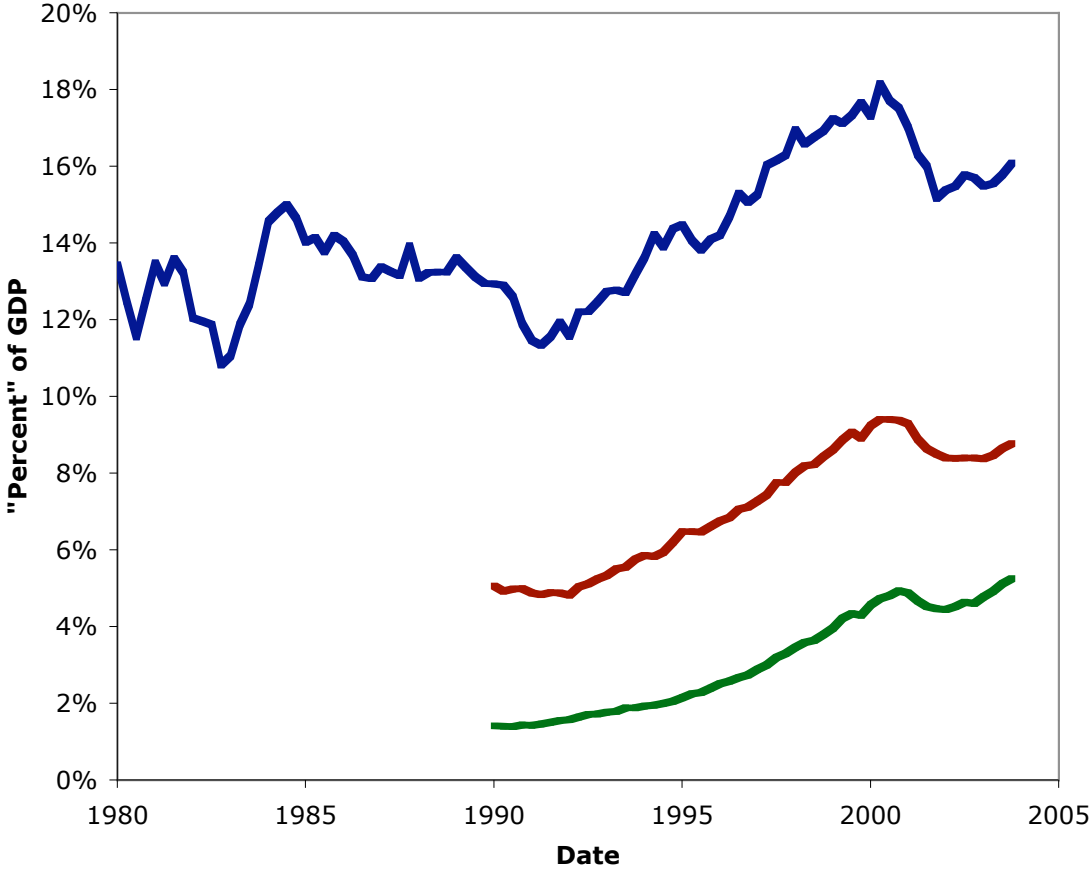




## Half of Those Unemployed Have Been Unemployed for More Than...

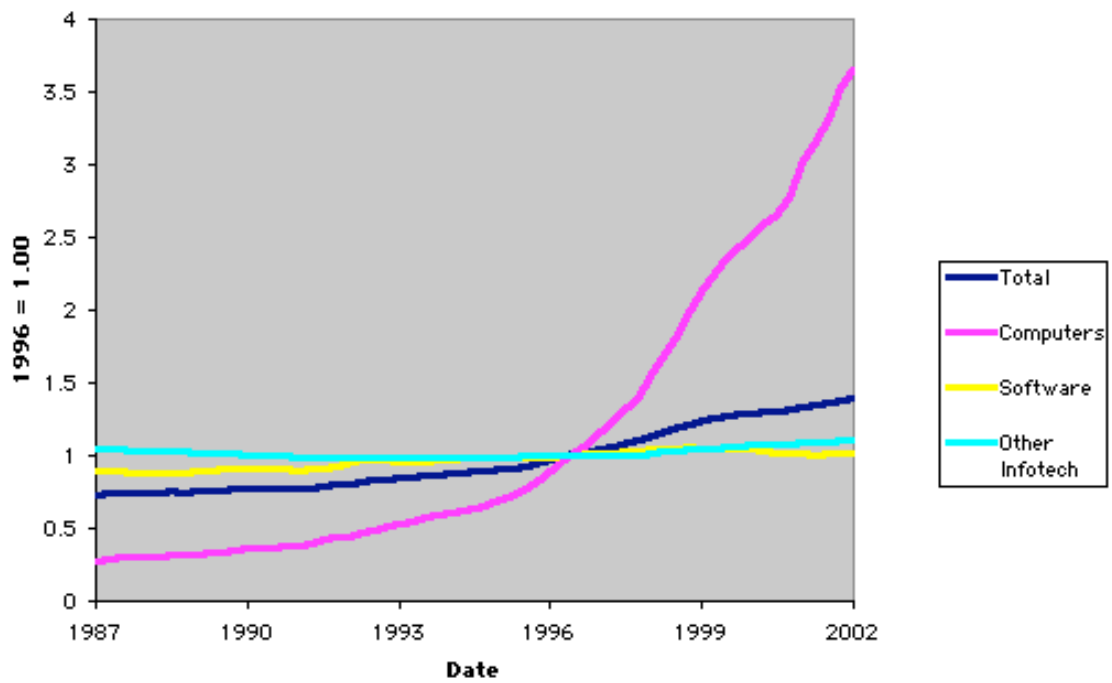


### Real Investment "Shares"



— I/Y — Equipment + Software I/Y — IT Equipment + Software I/Y

## Value Indices (How Much Real Investment You Get for a Dollar)



## Investment in Computers and Peripherals

