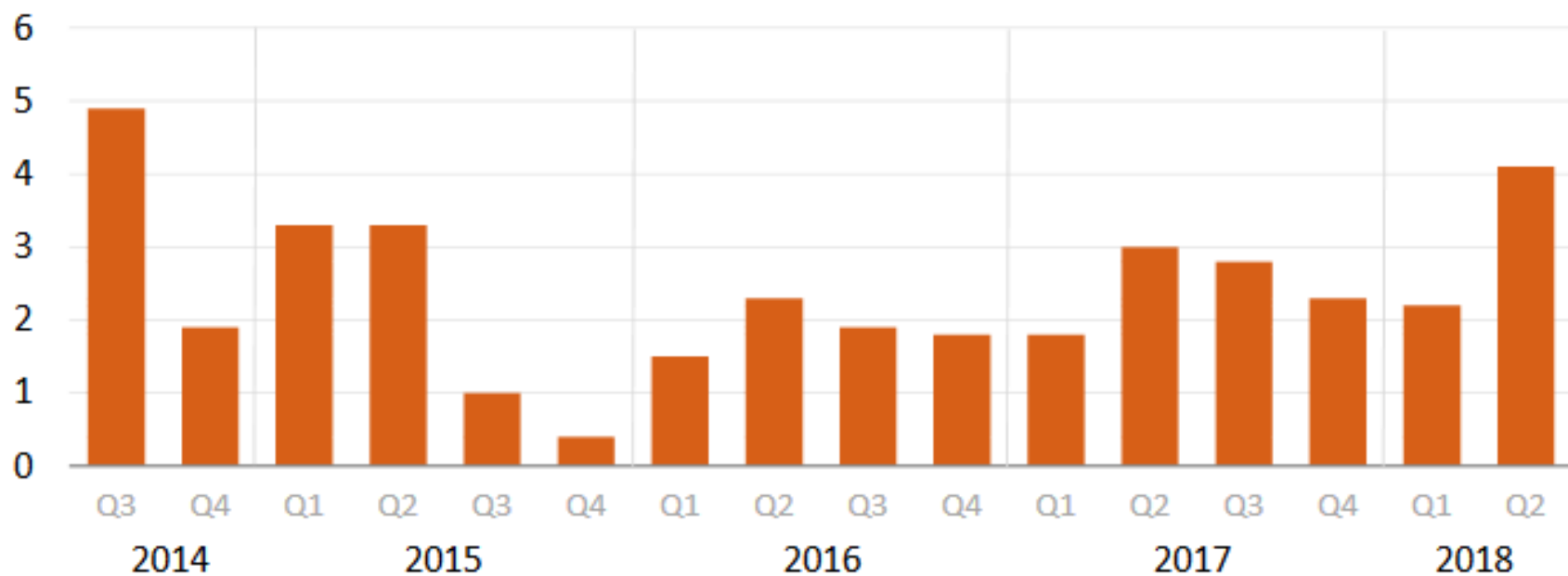


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2Q 2018 GDP

4.1%

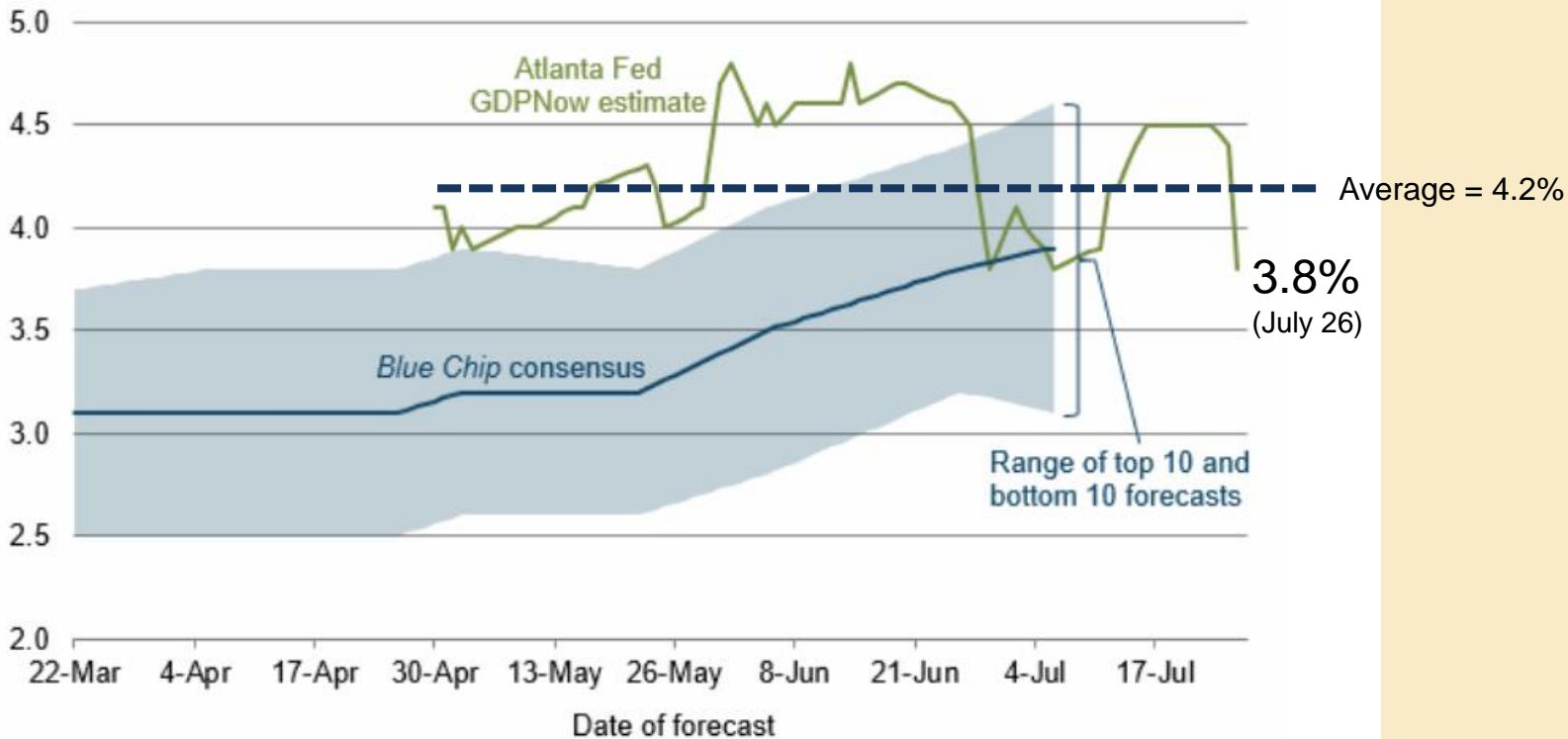
Real GDP: Percent change from preceding quarter

U.S. Bureau of Economic Analysis

Seasonally adjusted at annual rates

**Evolution of Atlanta Fed GDPNow real
GDP estimate for 2018: Q2**
Quarterly percent change (SAAR)

GDPNow™



Sources: *Blue Chip Economic Indicators* and *Blue Chip Financial Forecasts*

Note: The top (bottom) 10 forecast is an average of the highest (lowest) 10 forecasts in the *Blue Chip* survey.

Contribution to GDP by Component: 2018 (Q2 vs Q1)

	Contribution to 4.1% 2Q 2018 Adv. Estimate	Contribution to 2.2% 1Q 2018 Growth.
Consumer	2.69	0.36
Investment	-0.06	1.61
Government	0.37	0.27
Export - Import	1.06	-0.02

Core PCE Year-over-Year Change (7/31/2008 to 6/30/2018)

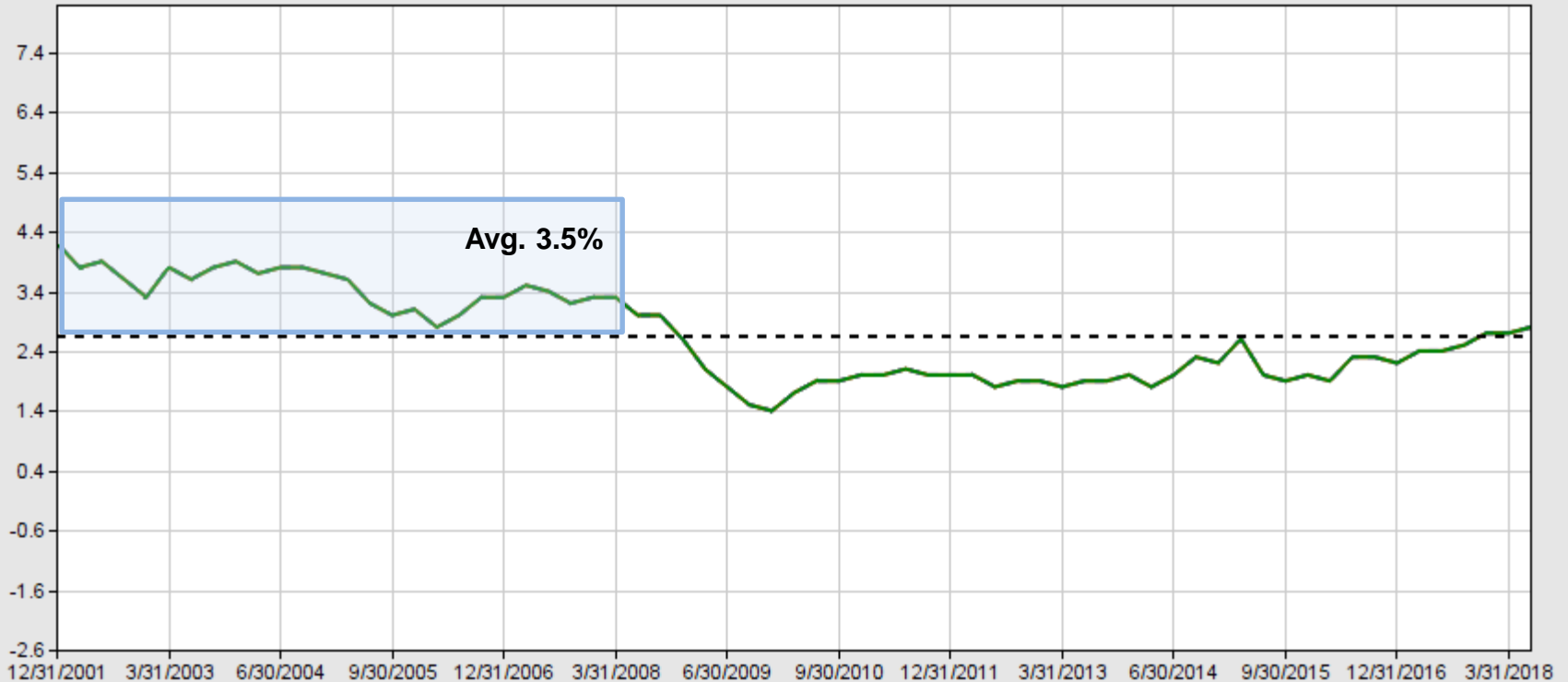
Current: 1.9 High on 7/31/2008: 2.31 Average: 1.54 Low on 12/31/2010: .95



Source: Bureau of Economic Analysis

Employment Cost Index - 12 month Change (12/31/2001 to 6/30/2018)

Current: 2.8 High on 12/31/2001: 4.20 Average: 2.66 Low on 12/31/2009: 1.40



Source: Bureau of Labor Statistics

United States		Instrument		Futures: Fed Funds - Midpoint					Fed Effective Rate 1.91		
1) Overview		2) Future Implied Probability									
Current Implied Probabilities										3) Add/Remove Rates	
Dates	<input checked="" type="radio"/> Meeting	<input type="radio"/> Calculation	Calculated 07/31/2018					Based on rate 1.75-2.00			
Meeting	Hike Prob	Cut Prob	1.75-2	2-2.25	2.25-2.5	2.5-2.75	2.75-3	3-3.25	3.25-3.5	Fwd Rate	
08/01/2018	17.6%	0.0%	82.4%	17.6%	0.0%	0.0%	0.0%	0.0%	0.0%	1.92	
09/26/2018	92.1%	0.0%	7.9%	76.2%	15.9%	0.0%	0.0%	0.0%	0.0%	2.15	
11/08/2018	92.5%	0.0%	7.5%	72.5%	19.2%	0.9%	0.0%	0.0%	0.0%	2.16	
12/19/2018	97.8%	0.0%	2.2%	26.6%	56.8%	13.8%	0.6%	0.0%	0.0%	2.33	
01/30/2019	98.0%	0.0%	2.0%	24.7%	54.4%	17.2%	1.7%	0.0%	0.0%	2.35	
03/20/2019	99.1%	0.0%	0.9%	12.0%	37.7%	38.0%	10.4%	1.0%	0.0%	2.50	
05/01/2019	99.2%	0.0%	0.8%	10.4%	34.0%	38.0%	14.4%	2.3%	0.2%	2.53	
06/19/2019	99.5%	0.0%	0.5%	6.8%	25.1%	36.5%	23.2%	6.8%	1.0%	2.63	
07/31/2019	99.6%	0.0%	0.4%	6.3%	23.7%	35.6%	24.3%	8.2%	1.4%	2.65	

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