



Oil market volatility and the producer-consumer dialogue:

Trends and questions

Aldo Flores-Quiroga
Secretary General, IEF

The IEF membership: neutrality means inclusion

73 countries

6 continents

90% of global oil & gas markets

An **Industry Advisory Committee** of global oil and gas companies participates in the IEF



Flow

1. Trends

2. Questions

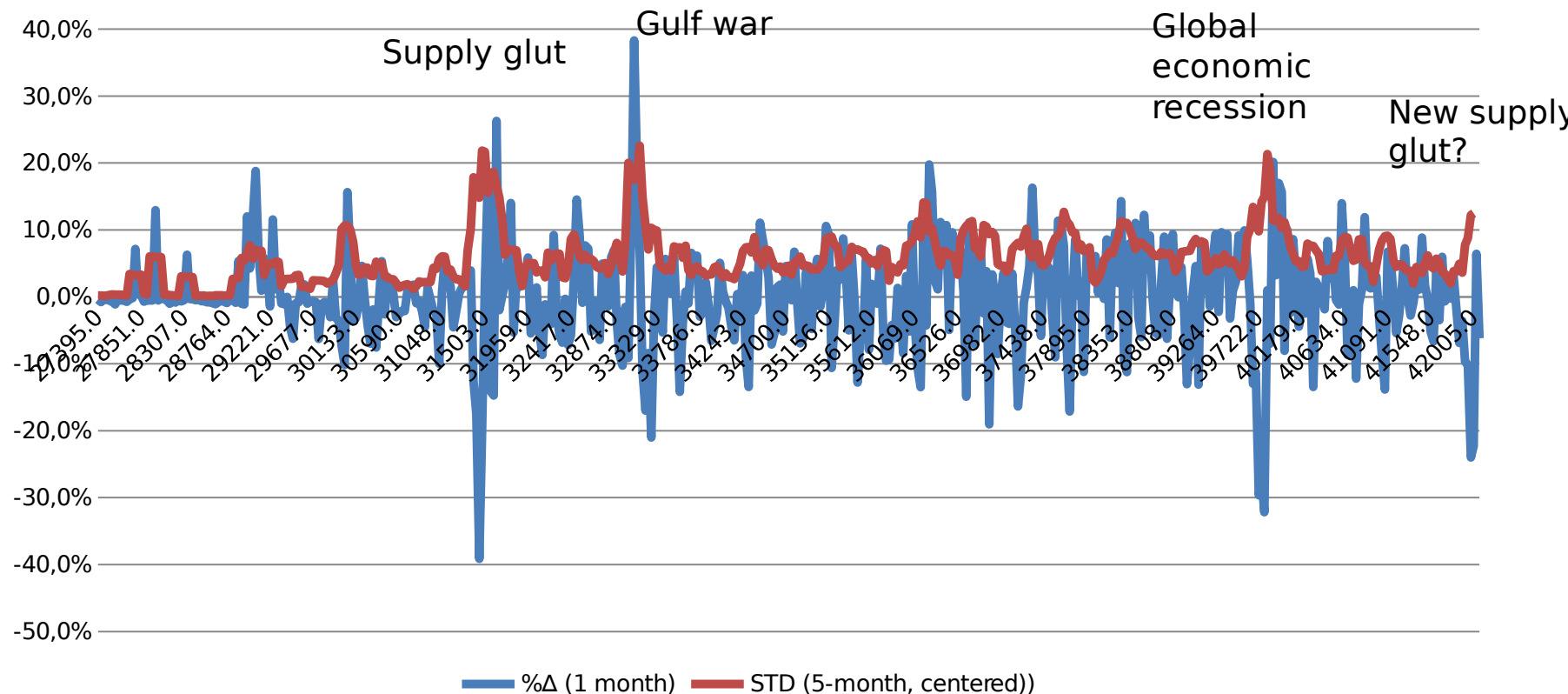
Flow

1. Trends

2. Questions

Three episodes of high volatility in 35 years: 1986, 1990, 2008.....and maybe a fourth one: 2014-2015

Monthly oil price change and volatility, 1975-2015



Source: US prices are WTI from EIA (1986-2014) and WSJ (1975-1985); own calculation.

Flow

1. Trends

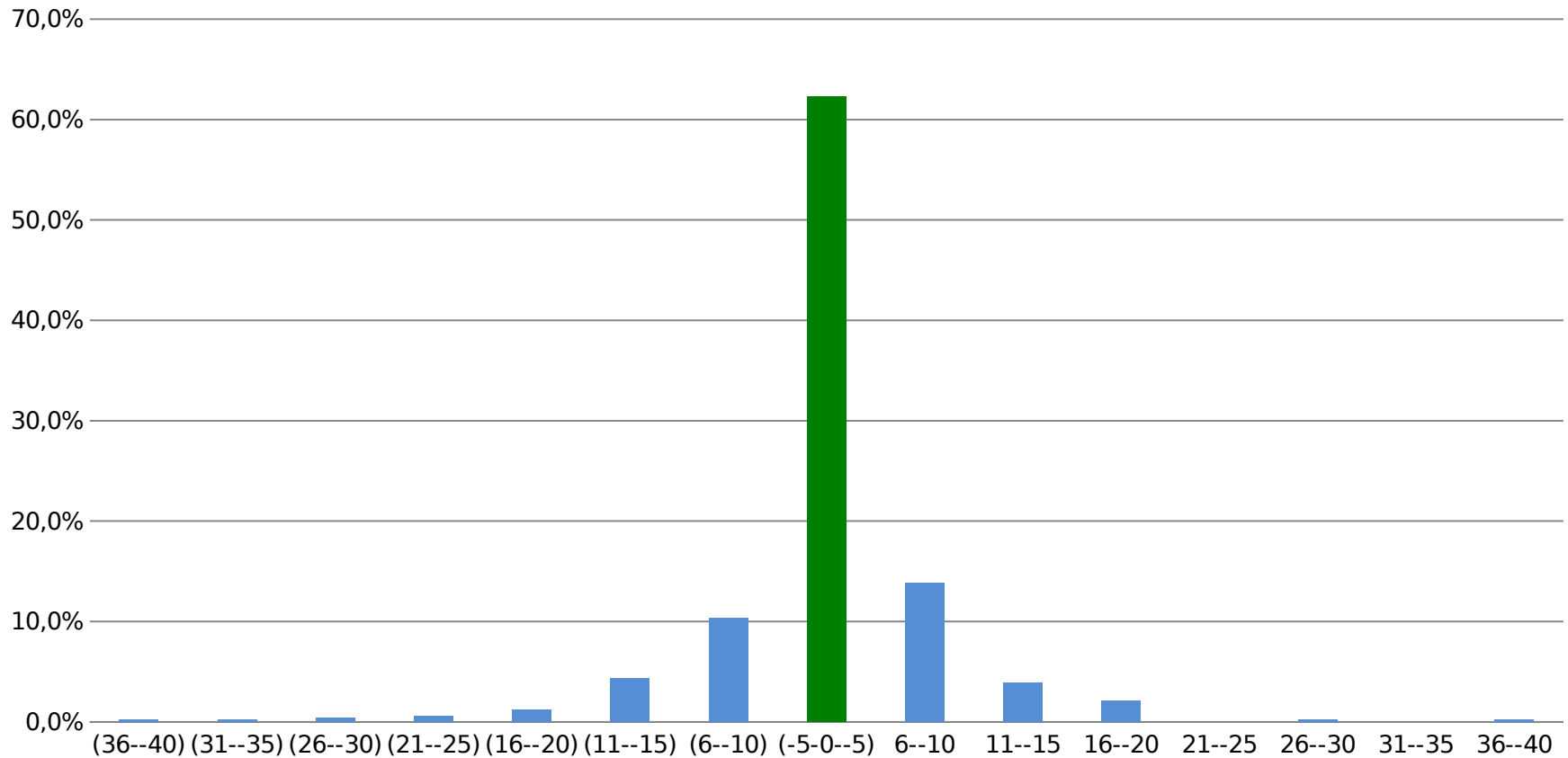
2. Questions

Question 1

Volatility: how much is too much?

Over 60% of monthly price variations since 1975 have taken place within a small range: **-5% to 5%**

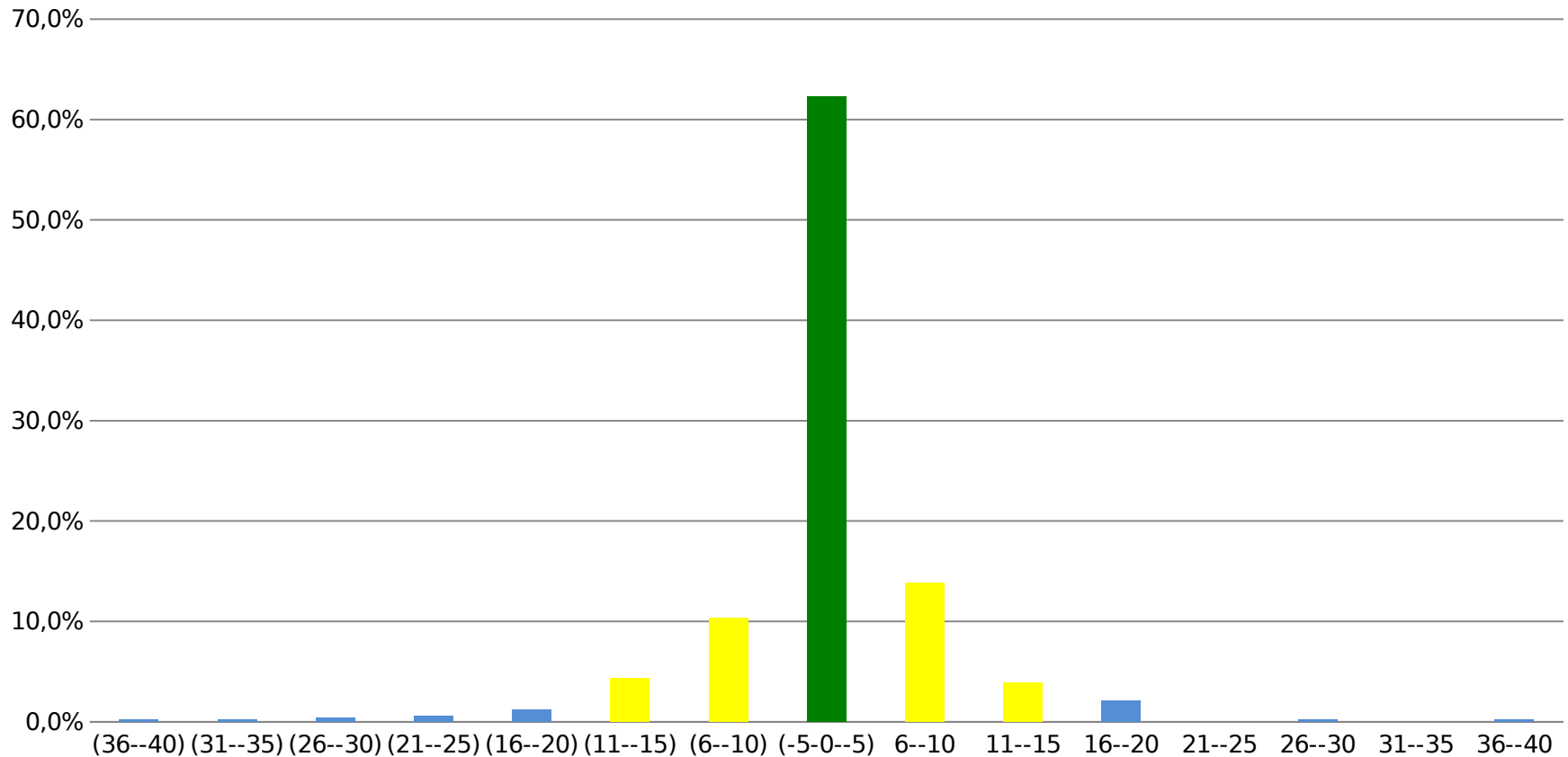
Oil price. Relative distribution of monthly variations, 1975-2015



Source: US prices are WTI from EIA (1986-2014) and WSJ (1975-1985); own calculation.

A wider range of variation has appeared tolerable -to a point: -15% to 15%

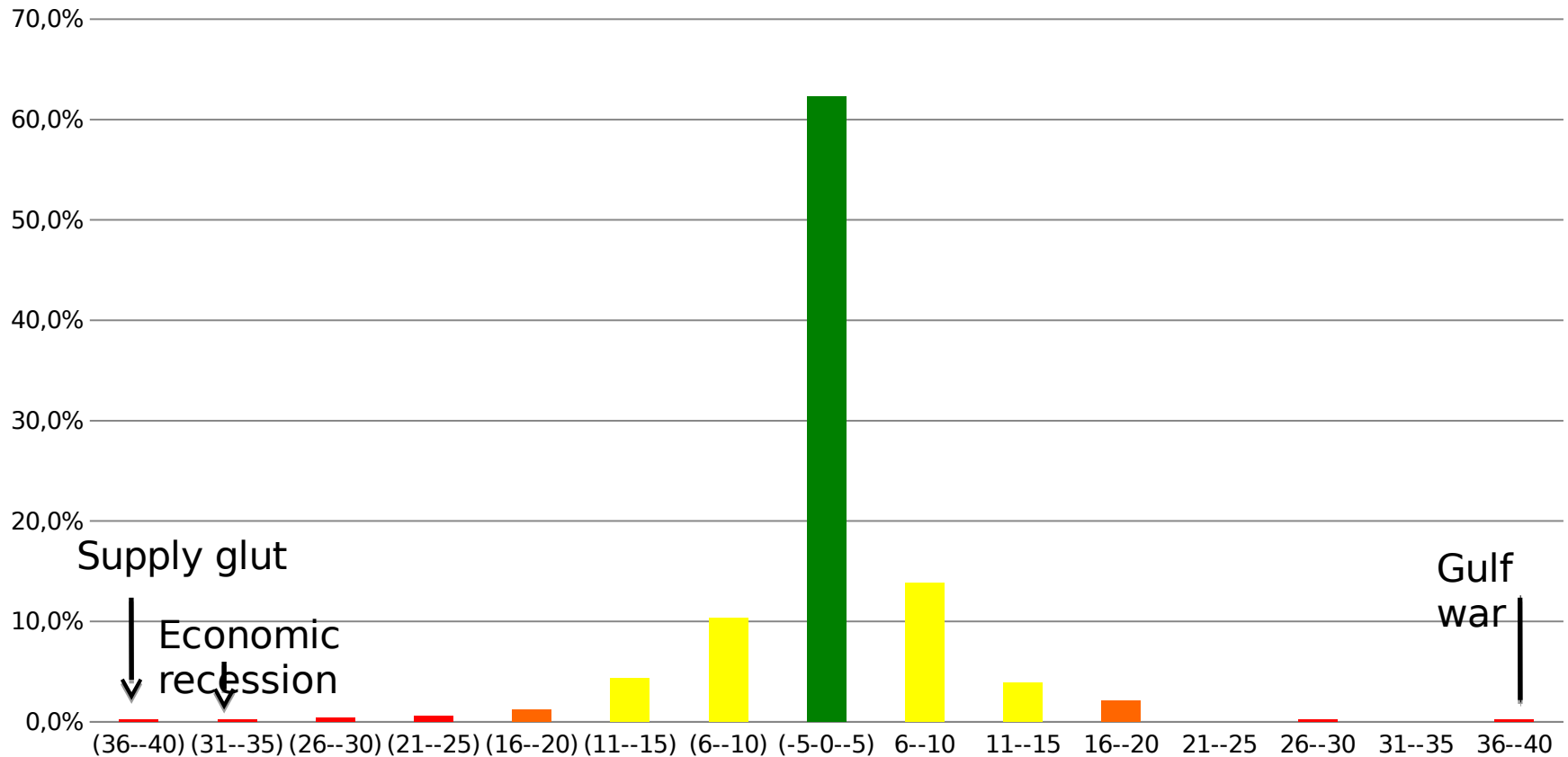
Oil price. Relative distribution of monthly variations, 1975-2015



Source: US prices are WTI from EIA (1986-2014) and WSJ (1975-1985); own calculation.

But higher ones have generated much discomfort:

Oil price. Relative distribution of monthly variations, 1975-2015



Source: US prices are WTI from EIA (1986-2014) and WSJ (1975-1985); own calculation.

It is difficult to reach a common **view of an acceptable level of volatility** due to the broad range of stakeholder interests in the oil market

Different stakeholders have different perspectives on volatility

Governments

- Distributive effects
- Macroeconomic effects

Companies operating in physical markets

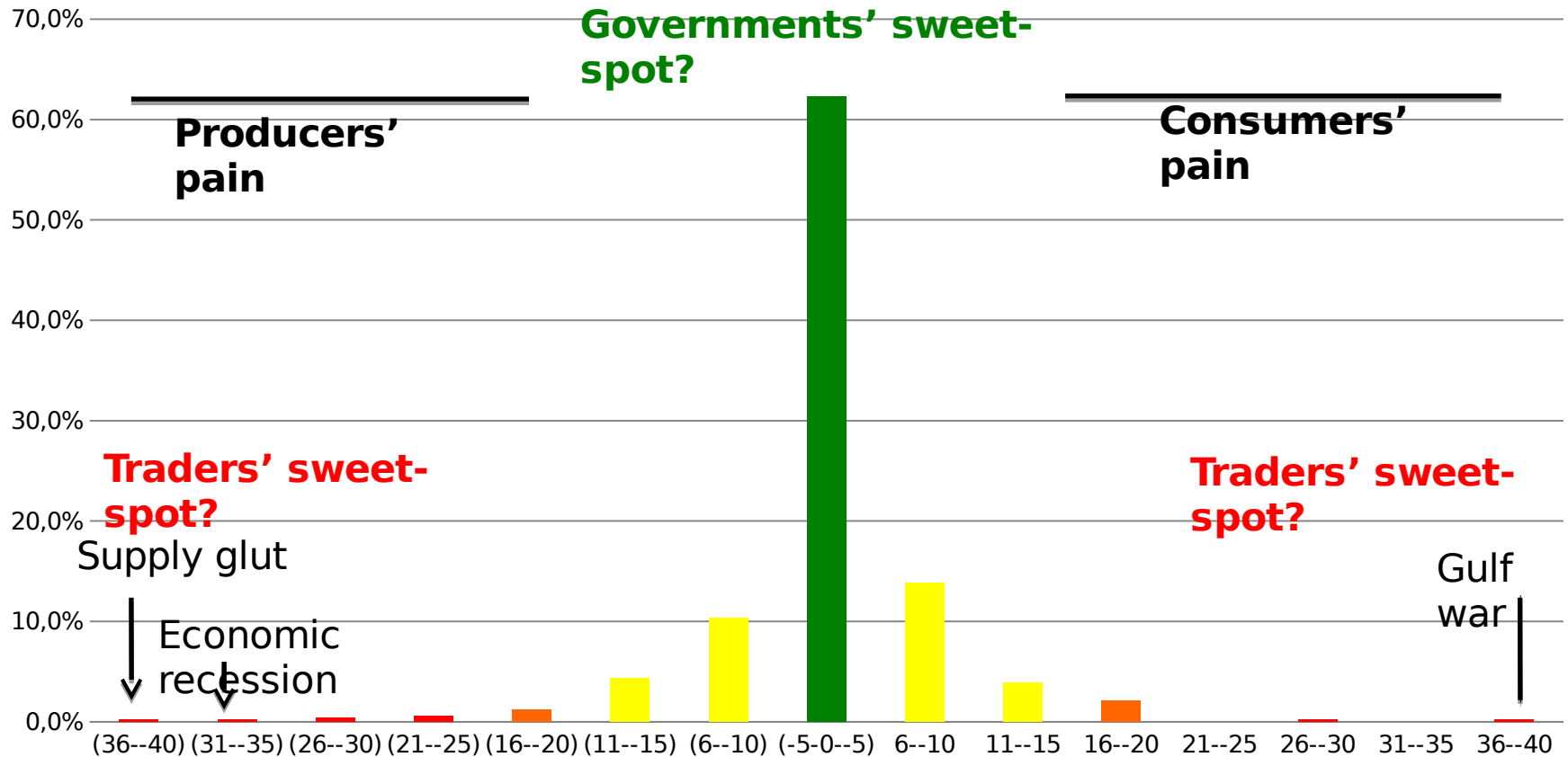
- Long-term investment
- Affordable supplies

Investors, creditors, and debtors in financial markets

- Hedging and risk allocation
- Credit and risk valuation

Stakeholders have different tolerance thresholds for volatility

Oil price. Relative distribution of monthly variations, 1975-2015



Source: US prices are WTI from EIA (1986-2014) and WSJ (1975-1985); own calculation.

Question 2

International energy cooperation: when and how?

It depends on:

- **Objectives**
- **Instruments**
- **Information**

What is the target?

- An oil price **level**?
- A range for the **percentage change** in the oil price?
- A **range of variation** around an average percentage change?
- A revenue **stream**?
- Supply/demand **certainty**?

What are the instruments?

Physical market	Supply	Production quotas Strategic reserves Spare capacity	Dialogue and Data
	Demand	Policy transparency?	
Financial market	Policy and regulation	Price reporting Position limits	

The IEF works to improve the quality of information available to decision-makers

Dialogue

- IEF Ministerial meetings
- Analysis of the interaction between **physical and financial energy markets** and its implications for policy (with IEA and OPEC)
- Comparative analysis of **energy outlooks** (with IEA and OPEC)

Data

- Promotion of market **transparency** through the Joint Organisations Data Initiative, or **JODI** (with APEC, Eurostat, IEA, GECF, OLADE, OPEC, and UNSD)

Focus of the conversation on the interaction between physical and financial markets (IEA-IEF-OPEC Symposia)

Fundamentals and expectations about fundamentals

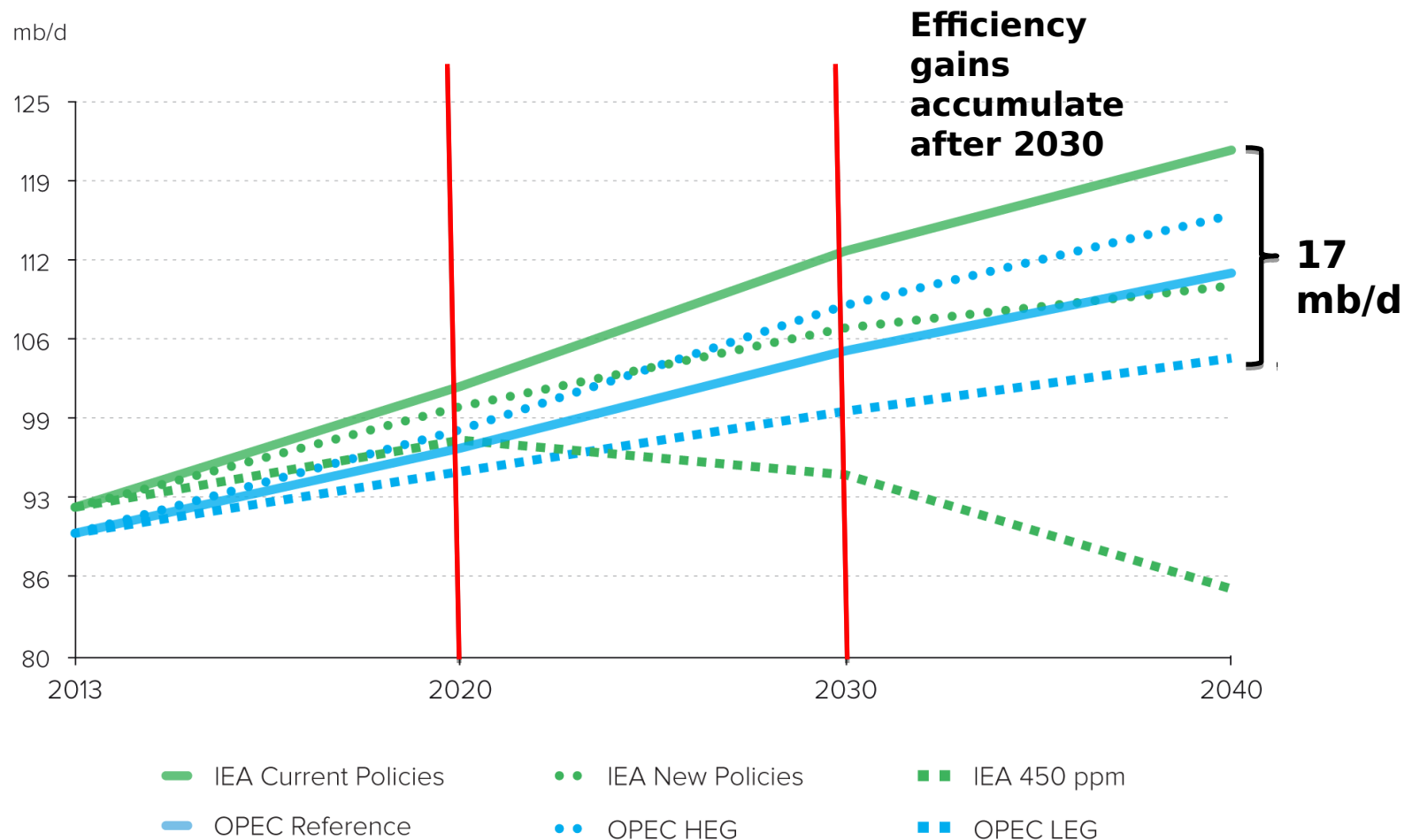
- Supply
- Demand

Role of regulation in promoting transparency and efficient price formation

- Price reporting
- Hedging
- Harmonization of standards
- Regulatory arbitrage

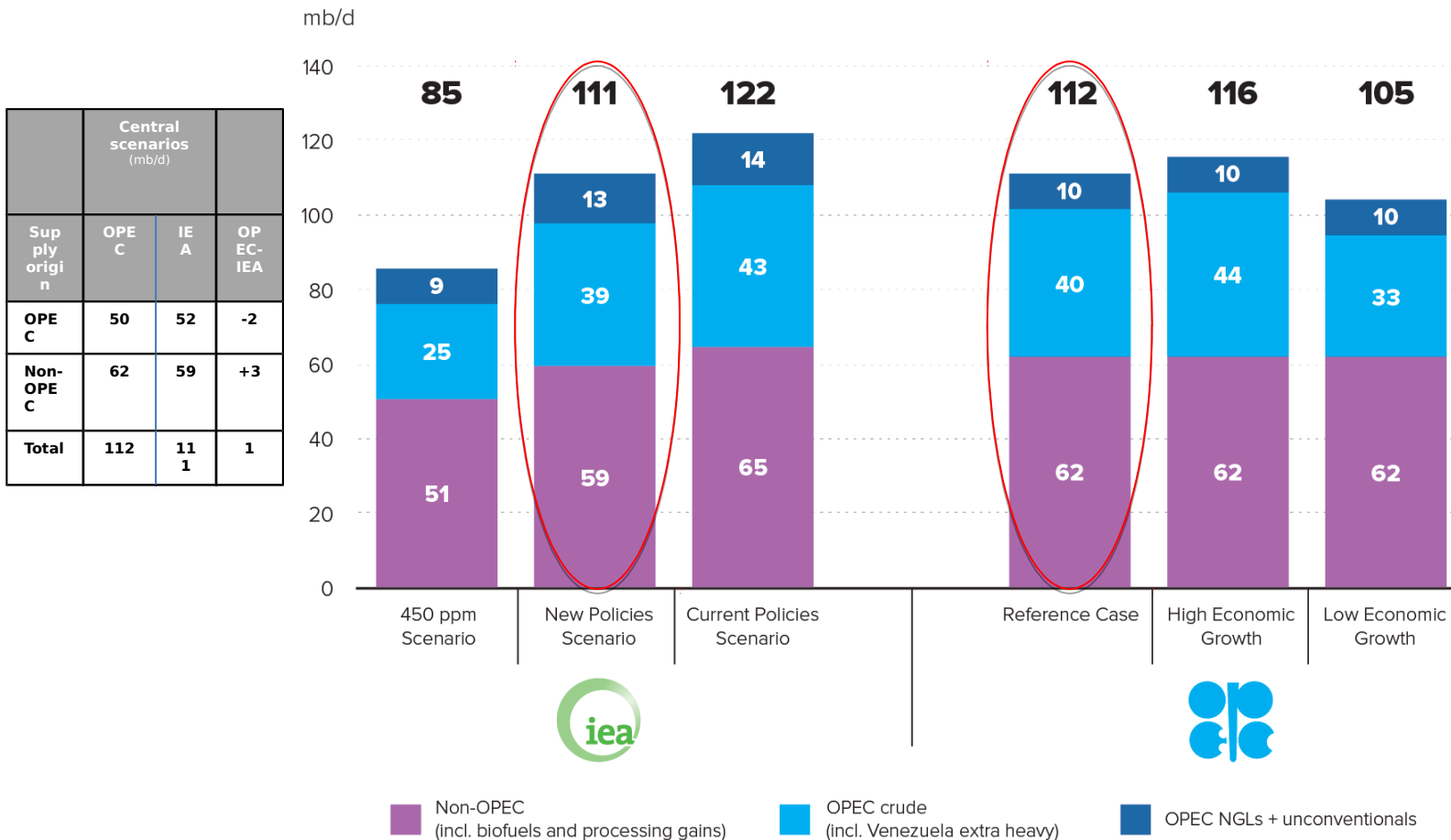
Oil consumption will depend to a large extent on economic and population growth... and on technological progress and the long-term investment framework

Figure 16. World Liquids Demand Projections in Various Scenarios



OPEC sees its crude making up for the demand not covered by Non-OPEC; the IEA sees more variation in both supply sources

Figure 20. Shares of Liquids Supply by Types in 2013 and Outlook for 2040



**National statistics offices collect information
From oil and gas companies**



**National statistics offices fill the JODI questionnaires
and pass this information to the JODI partner organization**



**JODI partner reviews the data, checks for outliers,
compares with secondary sources, and sends data to IEF**



**IEF rechecks, integrates, and publishes the information
it receives from partner organisations**

Problem

You can have **fast data or accurate data, but not both** at the same time

Paradox

Everyone wants more and better data, but not everyone is willing to provide it



www.ief.org



www.jodidata.org

More food for thought...

Factors behind the oil price fall

Microeconomic

Supply

Greater output from the USA, Canada, Brazil, Libya (temporarily), and Iraq

OPEC decision not to cut production

Demand

Weak consumption with unexpectedly large downward revisions through the second half of 2014

Macroeconomic

Exchange rate

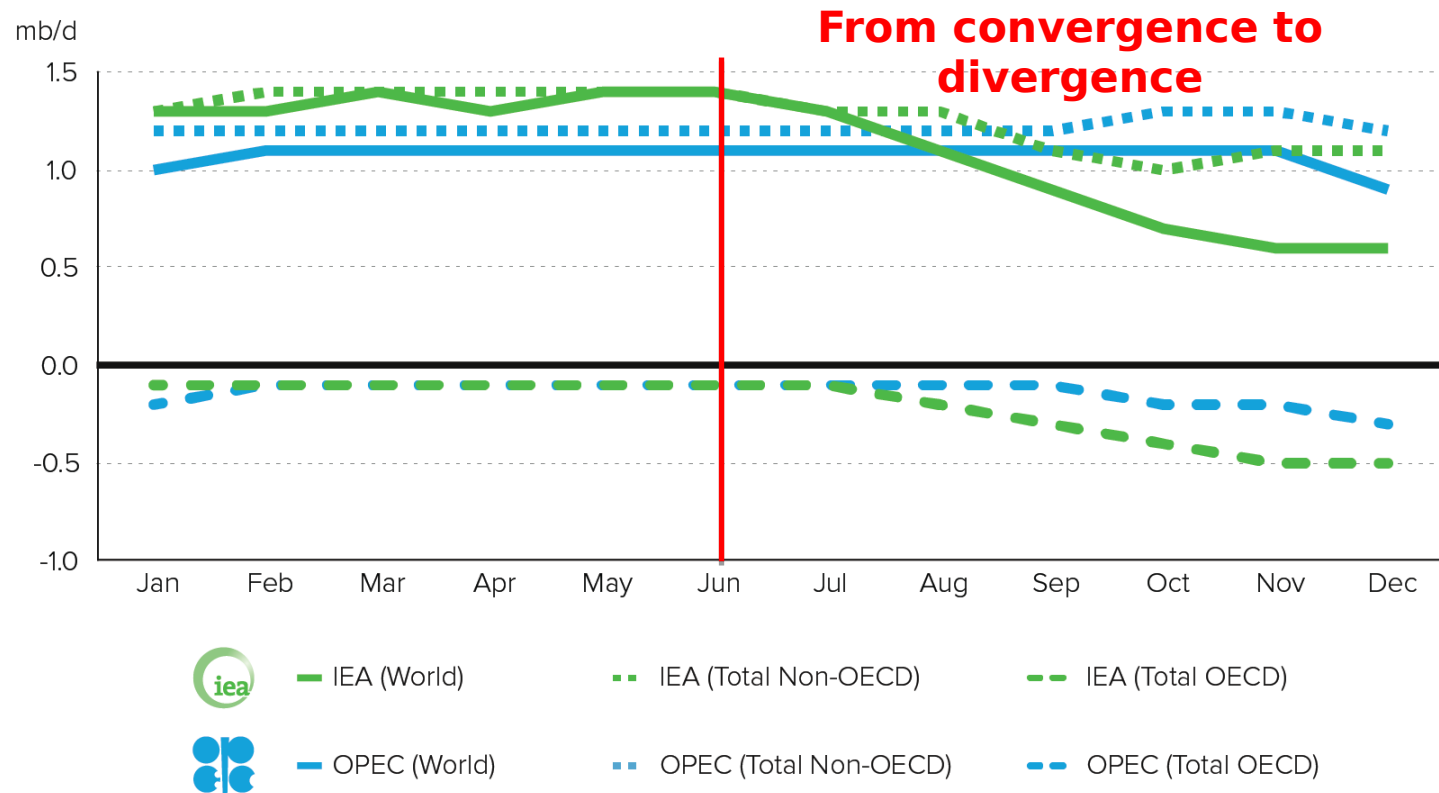
US dollar appreciation

Interest rate

US interest rate expectations

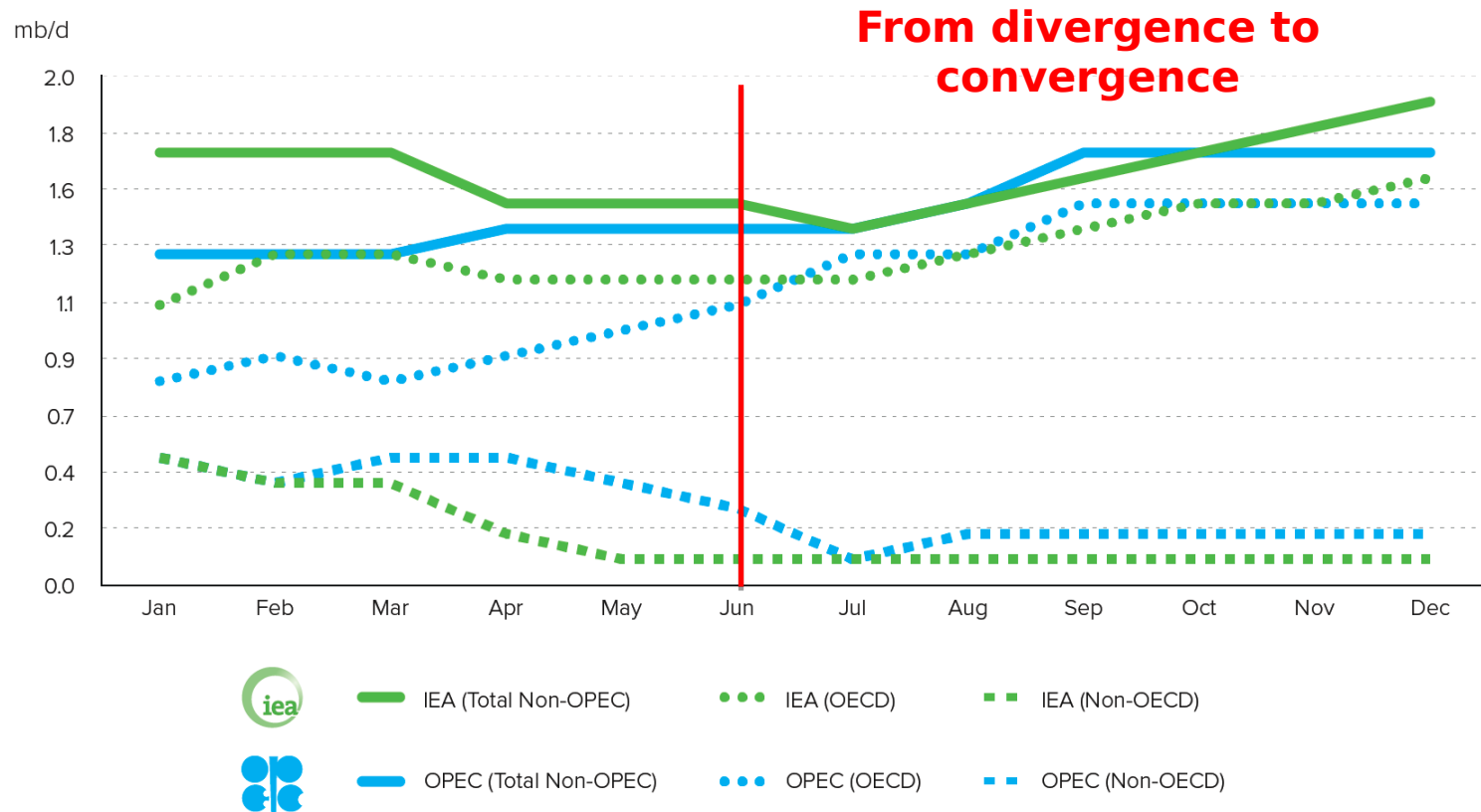
Demand estimates for both the IEA and OPEC were stable until June 2014, when expectations began to change

Figure 11. Revisions of 2014 World Liquid Demand Growth Estimates

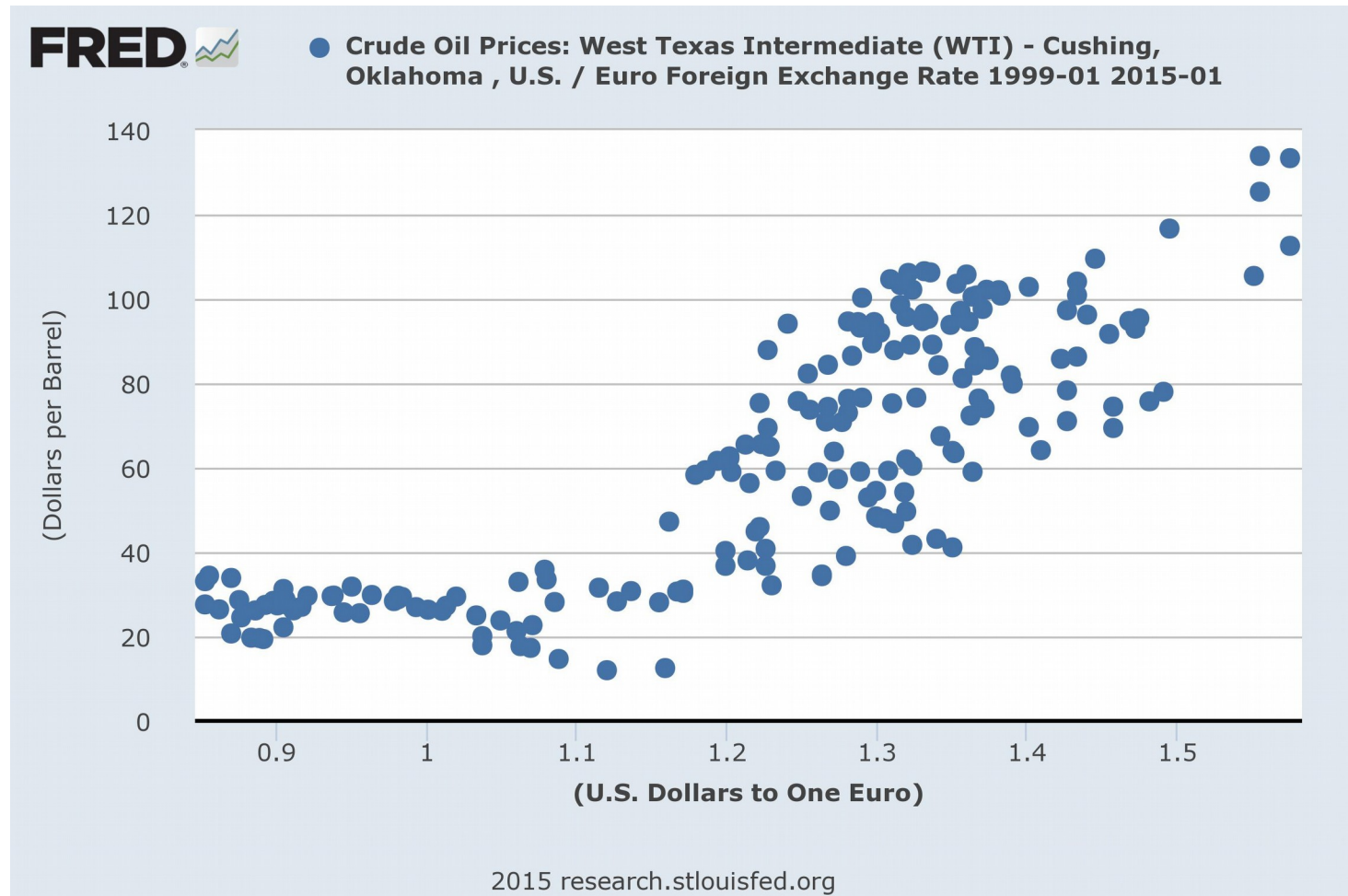


Supply growth estimates converged by the second half of the year

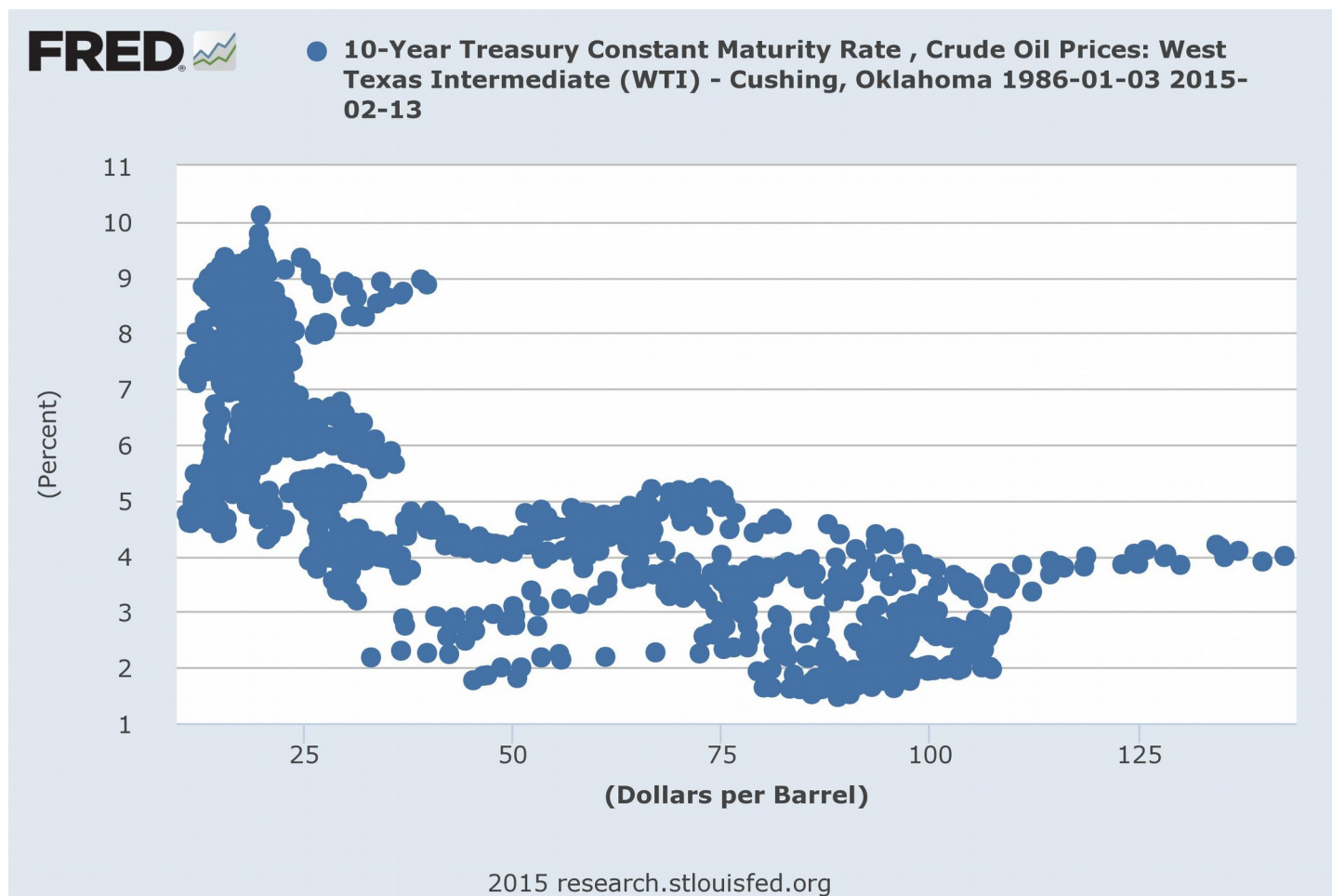
Figure 4. Forecast Revisions of 2014 Non-OPEC Liquids Supply Growth



Oil prices are low when the dollar is strong



Oil prices are low when interest rates are high





www.ief.org



www.jodidata.org