

**EADS** Snapshot on **EIA's Energy Outlook** 

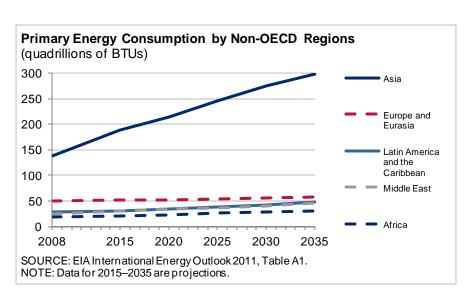
### **Overview**

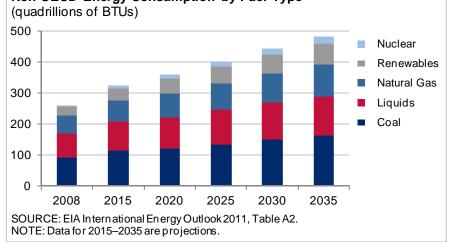
No. 46

This EADS Snapshot highlights findings by the U.S. Energy Information Administration's (EIA) "Short-Term Energy Outlook: March 2012" and the "International Energy Outlook 2011." The EIA provides a wide range of international data covering energy production, stocks, demand, imports, exports, and prices. This snapshot focuses on EIA data related to countries outside of the Organization for Economic Cooperation and Development (non-OECD) with a particular focus on countries receiving at least \$2 million in USAID assistance in FY2010.

# Global Energy Markets Long-Term Outlook

According to the EIA reference case projections, world energy consumption will increase by 53 percent from 2008 to 2035 driven mainly by economic growth in non-OECD economies, particularly in Asia. Petroleum based fossil fuels are expected to continue to supply a large portion of energy consumed. However, renewable energy is the world's fastest growing form of energy and is expected increase from to 10 percent of total energy use in 2008 to 14 percent in 2035. More than 82 percent of the increase in renewable energy is in hydroelectric and wind power. Natural gas consumption is projected to increase as an attractive option to reduce greenhouse gas emissions. On the other hand, if no binding agreements are put in place to reduce greenhouse gas emissions, it is also expected that coal consumption will continue to increase, particularly in China and India which have large domestic coal reserves and rapidly growing energy demands. Nuclear power





Non-OECD Energy Consumption by Fuel Type

Prepared by USAID Economic Analysis and Data Services (EADS) under M/CIO/KM contract RAN-M-00-07-00004-00.

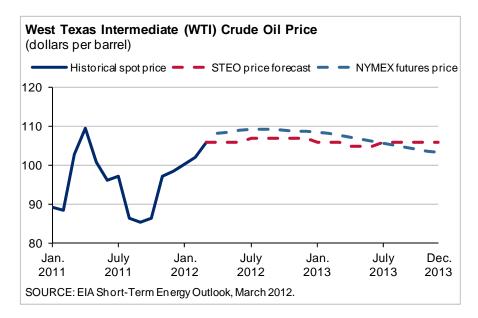
EADS: Leading the way in international data and analysis. http://eads.usaidallnet.gov/

Subscribe to receive future snapshots at http://www.devtechsys.com/enotify/eads/ is expected to grow modestly, held back by public concern regarding plant safety, radioactive waste disposal, and the proliferation of nuclear materials.

### **Global Energy Markets Short-Term Outlook**

EIA expects the price of West Texas Intermediate (WTI) crude oil to average about \$106 per barrel in 2012, almost \$11 per barrel higher than the average price last year, and to continue to rise in 2013. Consumption of liquid fuel is expected to accelerate over the next two years, with consumption reaching 89.3 million barrels per (bbl/d) in 2012 and day 90.3 million bbl/d in 2013.

On the supply side, EIA expects non-OPEC crude oil and liquid fuels production to rise in 2012 and 2013, particularly in Brazil,

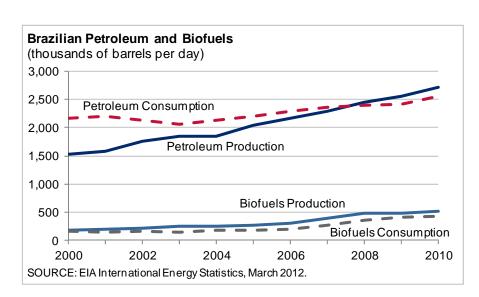


Kazakhstan, Colombia, and China. Meanwhile, production declines are projected in Russia and Mexico. In addition, several disruptions to oil production in Africa and the Middle East have intensified in the first months of 2012. An unresolved dispute between Sudan and the newly independent South Sudan over transit fees and other issues caused the latter to shut all of its production at the end of January. EIA now projects that total production from Sudan and South Sudan, which averaged about 430,000 bb/d in 2011, will average 200,000 bbl/d in 2012 and recover to 370,000 bbl/d in 2013. Civil conflict in Yemen and Syria are compromising a large portion of their oil output. Yemen's Marib pipeline is down and strikes at the country's largest oil field are diminishing output. In Syria, there has been damage to a major pipeline that feeds the country's two refineries.

# **EIA Country Analysis Highlights**

#### Brazil

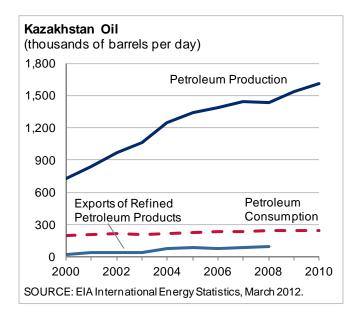
Brazil is the ninth largest energy consumer in the world and the second largest producer of ethanol after the United States. Total Brazilian primary energy consumption has increased by one-third over the last decade and production of oil and ethanol has rapidly increased. Recent discoveries of large offshore pre-salt oil deposits off the south-east coast also provide the potential for Brazil to

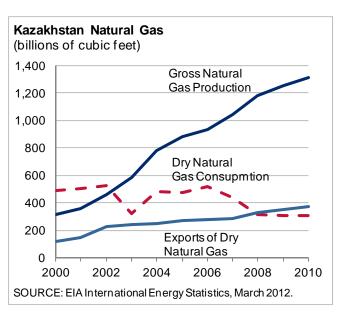


become one of the largest oil producers in the world. Brazil was the largest producer of liquid fuel in 2011 in South America and was a net exporter of liquid fuels in 2010 and 2011. In 2010, 85 percent of Brazil's electricity generation came from hydropower with smaller amounts coming from conventional thermal, nuclear, and other renewable sources. Many of Brazil's hydropower generating facilities are located far away from centers of demand leading to high transmission and distribution losses.

#### Kazakhstan

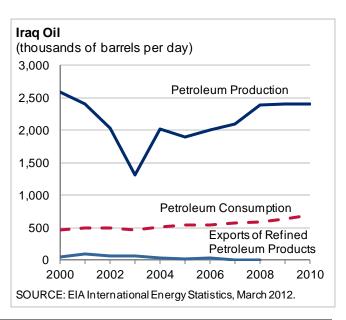
Full development of its major oilfields could make Kazakhstan one of the world's top five oil producers within the next decade. Kazakhstan's sector of the Caspian Sea is believed to hold several other major oil and natural gas deposits as yet unexploited. Kazakhstan is also increasing natural gas production which has lagged behind oil due to lack of domestic and export gas pipeline infrastructure linking reserves in the west to the eastern industrial region. In 2009, Kazakhstan became a net natural gas exporter. Kazakhstan is also an important exporter of light, sweet crude oil.





#### Iraq

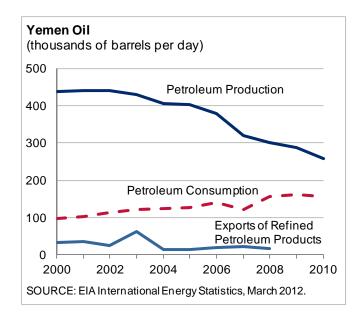
Iraq has the world's fourth largest proven petroleum reserves; however, only a fraction of Iraq's known fields are currently in development and much of the reserves have not been exploited. The Iraqi economy depends heavily on oil—94 percent of its energy needs are met with petroleum and crude oil export revenues accounted for over two-thirds of GDP in 2009. Most Iraqi oil resources are located in the Shiite areas of the south and the ethnically Kurdish northern regions, leaving few resources in the control of the Sunni minority. Despite uncertainties with the legal framework, the Iraqi Ministry of Oil has signed 12 long-term contracts with international oil



companies from 2008 to 2010. Iraq also lacks refining and export infrastructure to be able to process more crude oil. Iraq exported 1.8 million bbl/d of crude oil in 2009 mainly to refineries in Asia. Iraq also has large reserves of natural gas that the government would like to develop further.

### Yemen

Yemen is a relatively small oil and natural gas producer; however, its location at the tip of the Arabian Peninsula on the Bab el-Mandab shipping lane has great strategic importance to global oil trade. Over recent years rising piracy in the region and security concerns in Yemen have deterred needed investment in Yemeni energy infrastructure. Yemen's economy depends heavily on hydrocarbons which contributed to 30 percent of GDP, nearly 75 percent of government revenues, and over 90 percent of foreign exchange earnings in 2010. In 2011, anti-government attacks on pipelines and general instability led to a decline of oil production to below 200,000 bbl/d. In March 2011, the main crude oil export pipeline was blown-up. In January 2012, Yemen began to rely on imports of crude oil and refined products as its main refinery shut down in November 2011. Yemen began export-



ing liquefied natural gas (LNG) in November 2009, partially offsetting losses in oil export revenues. Yemen exported a total of 194 billion cubic feet (bcf) of LNG in 2010, mainly to South Korea, the United States, and China.

Sources for EIA Country Analysis Highlights:

- Brazil Country Analysis Brief, last updated February 2012. http://www.eia.gov/countries/cab.cfm?fips=BR.
- Kazakhstan Country Analysis Brief, last updated November 2010. http://www.eia.gov/countries/cab.cfm?fips=KZ.
- Iraq Country Analysis Brief, last updated September 2010. http://www.eia.gov/countries/country-data.cfm?fips=IZ&trk=p1.
- Yemen Country Analysis Brief, last updated February 2012. http://www.eia.gov/countries/country-data.cfm?fips=YM&trk=p1.

#### Additional Information

For more information on Global Energy Markets visit the U.S. Energy Information Administration (EIA) website at: http://www.eia.gov/. Also visit the USAID Economic and Social Database (ESDB) (http://esdb.eads.usaidallnet.gov/) which carries data from the EIA as well as other sources such as the United Nations Comtrade database and the World Bank World Development Indicators.