

Natural gas futures rise 2% with storage report in focus



Investing.com - U.S. natural gas futures rose for the first time in three days on Wednesday, as market participants looked ahead to fresh weekly information on U.S. gas inventories to gauge the strength of demand for the fuel.

Natural gas for delivery in December on the New York Mercantile Exchange tacked on 4.2 cents, or 1.84%, to trade at \$2.295 per million British thermal units during U.S. morning hours.

A day earlier, natural gas prices lost 0.3 cents, or 0.13%, as forecasts pointed to unseasonably warm readings for early November. Bearish speculators bet on the warm weather reducing early-winter demand for the heating fuel.

Natural gas prices have closely tracked weather forecasts in recent weeks, as traders try to gauge the impact of shifting outlooks on early-winter heating demand.

The heating season from November through March is the peak demand period for U.S. gas consumption.

Meanwhile, the U.S. Energy Information Administration's next storage report on Thursday is expected to show a build of approximately 60 billion cubic feet for the week ending October 30.

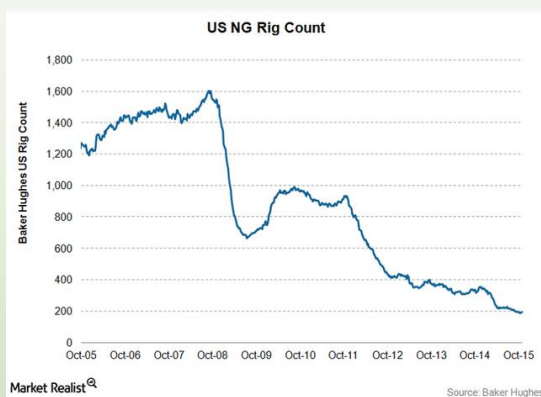
<http://www.investing.com/news/commodities-news/natural-gas-futures---weekly-outlook:-september-21---25-362481>

(Investing.com)

11/4/15

US Natural Gas Rig Count Was Flat in October

Baker Hughes (BHI) released its weekly natural gas rig count report on October 30, 2015. The US natural gas rig count rose by four to 197 for the week ending October 30, 2015. Likewise, the gas rig count rose by one to 193 for the week ending October 23, 2015. The natural gas rig count rose for the third consecutive week. However, the natural gas rig count was flat for October compared to the previous month.



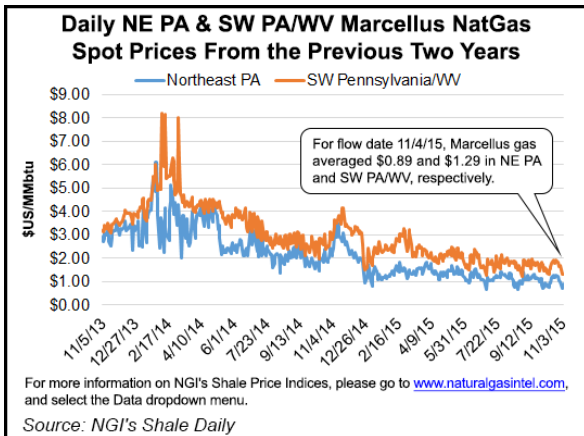
The falling natural gas rig count suggests that gas drillers are less optimistic about higher and stable natural gas prices. So, they're keeping the rigs idle due to lower natural gas prices. Natural gas prices fell almost 30% in the last year due to lower natural gas prices. The falling rigs will curb natural gas production over the long term. However, natural gas production rose due to improving productivity and lower drilling costs. The US natural gas drilling activity fell by 43% from 346 in 2014 to 197 in 2015.

The fall in the drilling activity also impacts oil equipment companies like Baker Hughes (BHI), Schlumberger (SLB), Noble (NE), and Halliburton (HAL). ETFs like the PowerShares DB Energy ETF (DBE) and the iShares US Oil Equipment & Services ETF (IEZ) are also affected by the uncertainty in the energy market. The current bearish momentum of natural gas prices and fluctuating weather suggest that natural gas drilling activity could slow down in the short term.

<http://marketrealist.com/2015/09/natural-gas-prices-fall-fourth-day-due-mild-weather/>

By Gordon Kristopher (Market Realist) 11/2/15

Marcellus Operators Continue Facing Squeeze of Low NatGas Prices



A sample of six Marcellus Shale operators taken by Fitch Ratings shows, not surprisingly, that weak realized natural gas prices related to an ongoing supply glut in the Northeast could further inhibit production growth in the play next year.

Fitch noted that several key Marcellus players appear to be lowering their 2016 growth expectations compared to historical rates. Last month, Cabot Oil & Gas Corp. said its preliminary 2016 budget would likely be \$615 million, down from the \$850 million it has forecasted to spend this year. EQT Corp. also said on its third quarter earnings call last month that next year's budget would likely be lower than this year's projected \$1.9 billion in capital expenditures.

The unhedged production-weighted natural gas price for a sample of six unspecified Marcellus operators was \$2.07/Mcf, or 67 cents below Henry Hub for the nine months ending Sept. 30, according to Fitch. The firm said recent quotes at the Leidy Hub of \$1.10/Mcf are \$1 below Henry Hub, "suggesting continued pricing weakness for Marcellus producers without adequate transportation capacity to higher priced markets."

Earlier this year, producers appeared willing to temporarily run below their breakeven in exchange for growth in production and proved reserves. Fitch said, however, that at current economics continued growth could "heighten financial risk and limit future value creation, and supports producers move to slow production growth in 2016."

Fitch added that larger Marcellus producers such as EQT, Southwestern Energy Co., Cabot, Range Resources Corp. and Antero Resources Corp. aren't likely to see significant near-term credit impacts because low operating costs; moderated growth expectations; adequate liquidity; large proved reserve positions, and the ability to scale capital expenditures to cash flows should largely insulate existing credit profiles from low prices.

Since the commodities downturn in June 2014, while production in nearly every major shale basin in the country has declined, Northeast supply has increased by about 3 Bcf/d. Financial analysts still expect Northeast production -- driven largely by the Marcellus -- to increase by about half that much next year.

<http://www.naturalgasintel.com/articles/104245-marcellus-operators-continue-facing-squeeze-of-low-natgas-prices>

[Jamison Cocklin](#) (NGI's Shale Daily) 11/4/15

Republic Expands Natural Gas-Powered Fleet Serving Raleigh

Republic Services announced today the addition of eight Compressed Natural Gas (CNG) solid waste collection trucks to its fleet serving customers throughout the greater Raleigh area. The CNG trucks replace older diesel-powered trucks, and bring the total number of natural gas vehicles operated by Republic throughout North Carolina to 25.

Nationwide, Republic Services operates a fleet of more than 2,200 CNG vehicles and 38 natural gas fueling stations. Republic's CNG fleet helps to save roughly 18 million gallons of diesel fuel annually. As the operator of the 8th largest vocational fleet in the country, Republic has a number of initiatives to reduce overall fuel usage, including its continued commitment to operating CNG powered trucks.

<http://news.sys-con.com/node/3535374>

(SYS*CON Media) (PR Newswire) 11/3/15

Efficient Drivetrains Introduces CNG-PHEV Class-4 Truck



Efficient Drivetrains announced the first-of-its-kind plug-in truck with 40 miles (64 km) of all-electric range and 300 miles (over 480 km) total. *It's the Chevy Volt of big rigs!*

Besides zero emissions capability, this retrofitted Class-4 JAC truck also runs on Compressed Natural Gas (CNG).

Official unveiling was held at the Voice of the Customer (VOC), hosted by CALSTART at the Southern California Gas Energy Resource Center on October 6. Whether the CNG-PHEV plug-in truck will attract fleet managers or not depends mainly on prices of such vehicles, which wasn't mentioned.

<http://insideevs.com/efficient-drivetrains-introduces-cng-phev-class-4-truck/>

By Mark Kane (Inside EVs) 11/1/15

Honda Opens Compressed Natural Gas Fueling Station on Troy, Ohio Campus

Honda's continuing effort to minimize the environmental impact of its operations took another step forward today as it opened a compressed natural gas (CNG) fueling station on its property in Troy, Ohio. The CNG station, which was designed, constructed and will be operated by Trillium CNG, is the second public CNG station located on a Honda property in North America, following one opened at Honda of America Mfg. in Marysville, Ohio in August.

As part of its overall vision to reduce total company CO₂ emissions by 50 percent by the year 2050, Honda is working to minimize the environmental impact of its parts distribution operations through its "green fleet" programs. The program is part of a strategy that has seen Honda reduce the CO₂ emissions intensity of its parts shipments by 37 percent since 2009 and reduce waste sent to landfills from parts distribution centers by 99.3 percent.

<http://hondanews.com/releases/honda-opens-compressed-natural-gas-fueling-station-on-troy-ohio-campus>

(Honda News) 10/28/15

NYC Beer Distributor Adds CNG Volvo Tractors

Manhattan Beer Distributors recently purchased 35 compressed natural gas (CNG)-powered Volvo VNM 200 model tractors for its New York City fleet. Manhattan Beer executives said they chose Volvo models due to the strong relationship with its dealer and because the VNM 200 – Volvo's regional haul daycab – offered the durability of a Class 8 model paired with the maneuverability necessary for urban deliveries. The Volvo VNM 200 models, powered by 9.0L Cummins Westport ISL-G CNG engines, emit about 20% less greenhouse gas emissions than comparable diesel-powered models.

<http://www.truckinginfo.com/news/story/2015/10/manhattan-beer-buys-35-cng-volvo-vnm-200-model-tractors.aspx>

(Trucking Info) 10/30/15

CNG/LNG Station in Kansas City

On Tuesday, Clean Energy Fuels Corp. held a ribbon-cutting ceremony for a natural gas fueling station in Kansas City, Kan. Located at 4650 Kansas Ave., the station offers both compressed and liquefied natural gas. It will support the fueling needs of Seaboard Foods, an integrated producer and distributor of pork products, as well as other public and private vehicles and fleets in the region. Clean Energy says Seaboard Foods is expected to fuel 15 CNG-powered tractors on average per month at the site.

“The opening of this station highlights our commitment to support our customer's growth,” says Clean Energy Fuels' Matt Feighner. “Seaboard Foods is a leader in natural gas transportation, and we're glad to be a partner with them, as well as with the numerous other clean energy fleets in the area that have begun using this station.”

<http://ngtnews.com/clean-energy-cuts-ribbon-on-cnglng-station-in-kansas-city/>

by NGT Staff (NGT News) 10/28/15

Ontario Carriers Should Get \$\$ Help for Nat Gas: Minister

MISSISSAUGA, ON -- Ontario's Liberal Minister of Environment and Climate Change Glen Murray announced his government's commitment to working with the trucking industry to create incentives which promote the use of green technologies in trucks, such as compressed natural gas.

Murray acknowledged that support would be needed for carriers looking to shift to green technologies such as natural gas, electric or hybrid trucks, citing the need to continue to reduce greenhouse gas (GHG) emissions in the battle against climate change, and creating an environment conducive to investment and continued economic growth in Ontario.

The Ontario Trucking Association (OTA) and its membership have said for years that tax or rebate incentives are required in order to encourage market penetration of green technology such as CNG engines.

<http://www.todaystrucking.com/ontario-carriers-should-get-help-for-nat-gas-minister>

(Today's Trucking) 10/28/15

Advanced Disposal Opens \$1.7m CNG Filling Station in Wisconsin



Ponte Vedra, Florida based waste and recycling firm, Advanced Disposal, has opened its eighth Compressed Natural Gas (CNG) fuelling station at its hauling facility, located in Hartland, Wisconsin. The company explained that 11 of its trucks servicing Waukesha Country will fill up at the station every night. The new vehicles will replace retiring diesel trucks once their useful life has expired.

“We are on track to meet our goal to increase our CNG fleet to 15% by the end of 2015,” said Advanced Disposal CEO Richard Burke. “Our commitment to CNG is a significant one we’ve made to keep our fleet running cleaner and to creating a more sustainable Earth for future generations.”

<http://waste-management-world.com/a/advanced-disposal-opens-1-7m-cng-filling-station-in-wisconsin>

(Waste Management World) 10/26/15

MARTA Going All-In with CNG Fleet

The Metropolitan Atlanta Rapid Transit Authority (MARTA) has plans to rid its bus fleet of diesel and fully convert it to compressed natural gas (CNG) no later than 2018. To reach that goal, the agency has issued a request for proposals (RFP) seeking to procure up to 270 new CNG units.

Joseph Erves, MARTA's senior director of operations, tells *NGT News* that the agency currently operates 145 diesel and 420 CNG buses. MARTA started exploring the CNG option back in the 1990s, and all of its CNG buses are New Flyer Xcelsior models. “The authority didn't make the commitment to go full CNG until recently,” Erves notes. As to why MARTA is putting all of its proverbial eggs in one basket and wants to use 100% CNG for its bus fleet, he explains, “CNG provides financial and environmental benefits, and MARTA believes we need to be good stewards of both.”

Under its RFP, MARTA is looking for 235 40-foot CNG buses, with the option to buy 35 more at a later date. According to Erves, the new vehicles will replace the current CNG and diesel buses that are at the end of their lifecycle.

<http://ngtnews.com/marta-plans-to-go-all-in-with-cng-bus-fleet/>

by Joseph Bebon (NGT News) 10/26/15



Pentagon Energy Nets First Customer for Planned ‘Mother’ CNG Station

Pentagon Energy LLC has entered into its first compressed natural gas (CNG) contract for its so-called “mother station” that the company is planning to build in the Marcellus shale region.

The undisclosed buyer has agreed to purchase up to 90 BCF of CNG for a period of five years for distribution in the U.S. Northeast region. Pentagon Energy says it is planning to develop its premier CNG mother station with the ability to compress up to 2.5 BCF per month.

“The buyer is one of the largest participants in the global gas markets and will be a strong foundation customer for our first CNG mother station in the U.S.,” says Alberto Chiesara, Principal. “Entering into this agreement is a significant milestone for our project, and we look forward to working closely with this very important client to make this project a success.”

Pentagon Energy says it is planning to use specially designed CNG trailer trucks to transport the gas from the mother station to different locations in the Northeast market. The development of this technology and the manufacturing was undertaken by its sister company, Composites Advanced Technologies, in Houston.

As currently contemplated, Pentagon Energy is planning to develop several mother stations in the U.S. to supply CNG to locations that experience gas shortages or lack the infrastructure to receive gas. The company acquired Morgan Stanley’s CNG export business back in April. “Our aim is to rapidly expand the CNG mother/daughter station concept into other local and international markets,” explains Ryan Comerford, principal of Pentagon Energy.

<http://ngtnews.com/pentagon-energy-nets-first-customer-for-planned-mother-cng-station/>

By NGT Staff (NGT News) 10/26/15

amp Trillium Opens CNG Station in Dalton, Ga.

amp Trillium LLC, the joint venture between ampCNG and Trillium CNG, has opened a public-access compressed natural gas (CNG) station in Dalton, Ga. Located at 107 Tilton Rd. SE, the station features Trillium CNG’s proprietary fast-fill hydraulic intensifier compressor (HY-C) and enables three Class-8 trucks to fuel simultaneously at 10 DGE/minute. To celebrate the new station, amp Trillium is offering an opening special price of \$1.99/GGE to all customers.

The station will service Dalton Utilities’ CNG vehicles, as well as public fleets. The facility marks amp Trillium’s second CNG station in Georgia, as the joint venture opened a station in Perry to service Frito-Lay’s fleet last year.

<http://ngtnews.com/amp-trillium-opens-cng-station-in-dalton-ga/>

By NGT Staff (NGT News) 10/26/15

New Company Lets Truckers Sample CNG

He and his partner James Ro, a former Bay Street investment banker, have started a company called Envoy Energy with the stated principle of providing a turn-key package for fleets wishing to convert. They even have two compressed-natural-gas (CNG) powered class-8 trucks that they want fleets to use to try the fuel.

Fleets can hire out a test truck—Envoy currently has a Freightliner and a Volvo—for a month at a time.

Those trucks come with mobile-fueling stations that will sit at your garage hooked up to the local natural gas line.

The fee: \$1,500 for the truck rental and 50 cents per liter, as sold from the mobile station. The customer has to pay insurance, RIN, and CVOR costs. If you like the results, Envoy will bring all the necessary players together to build a fueling station at your shop

<http://www.todaystrucking.com/new-company-lets-truckers-sample-cng>

(Today’s Trucking) 11/2/15

Ryder Sees Growing Diversity of Companies Deploying Natural Gas Vehicles

MIAMI--(BUSINESS WIRE)--Whether it’s retail, food distribution, e-commerce, or logistics, companies from every industry, large and small, are realizing the benefits of natural gas vehicles according to Ryder System, Inc. (NYSE: R), a leader in commercial fleet management, dedicated transportation, and supply chain solutions. As fueling infrastructure expands and natural gas vehicle technologies continue to evolve, a greater diversity of fleet applications can now be supported by this alternative fuel.

<http://www.businesswire.com/news/home/20151103005182/en/Ryder-Sees-Growing-Diversity-Companies-Deploying-Natural>

(Business Wire) 11/3/15



Gas drillers to wait and see on Utica shale's promise

Big results from recently drilled Utica shale wells have several Marcellus producers eyeing a possible push into the deeper rock, though not every driller is sold on its promise. “If the deep Utica works, it is likely to be larger than the Marcellus over time,” said EQT CEO David Porges, who discussed plans to drill 10 to 15 Utica wells next year in Southwestern Pennsylvania and West Virginia. Pennsylvania’s No. 5 shale gas producer is halting drilling outside its core Marcellus area while natural gas prices remain low.

“We’re highly encouraged by the success we have seen in the Utica to date and over the next two to three years expect the dry Utica to become the primary focus of our development plan,” said Tim Dugan, chief operating officer for gas at Consol, which announced good initial results from a well in Monroe County, Ohio. Consol is fracking and completing wells but has stopped all drilling until 2017.

Range Resources Corp., Pennsylvania’s fourth-largest shale driller, over the past year completed two Utica wells in Washington County that it says are among the top 10 producing wells in Appalachia. But it doesn’t make sense to commit to such expensive wells — Range’s third Utica well will cost \$15.9 million — when \$6 million wells in the more proven Marcellus are producing more gas than ever, company leaders said last week.

<https://marcellus.com/news/id/131155/gas-drillers-to-wait-and-see-on-utica-shales-promise/>

DAVID CONTI (Marcellus.com) (The Pittsburgh Tribune-Review) 11/2/15

PPL’s base electricity rate to decline 17 percent in December

Residential customers who purchase power directly from PPL Electric Utilities rather than shopping for a competitive supplier, will see a 17 percent decrease in the portion of their bill that reflects generation costs in December.

The generation rate for residential customers will be reset to 7.878 cents per kilowatt hour, down from the current rate of 9.493 cents. Small business customers will see their rate drop to 7.731 cents, down from the current 8.982 cents, a 14 percent savings.

By comparison, the lowest no-monthly-fee price being offered residential customers by a competitive supplier in PPL’s territory is 6.04 cents per kilowatt hour by Town Square Energy and Oasis Energy, according to the Pennsylvania Public Utility Commission’s PAPowerswitch electricity shopping page.

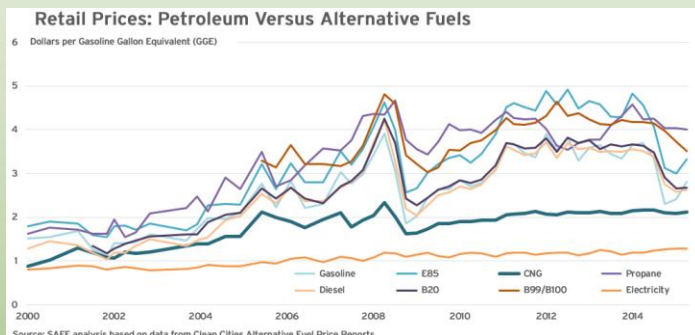
The price decline is a result of lower wholesale power prices driven by demand and the falling cost of fuels such as natural gas that are used to generate power, said spokesman Kurt Blumenau.

<https://marcellus.com/news/id/131217/ppls-base-electricity-rate-to-decline-17-percent-in-december/>

Scott Kraus (Marcellus.com) (The Morning Call) 11/3/15

Natural Gas Vehicles: Cost Competitive, and Poised for Prime Time

Interest in NGVs has picked up in recent years amid the surge in U.S. domestic production, which has risen 40 percent from 2006 to 2015, and ongoing weak prices. Even with the rapid fall in oil prices starting in mid-2014, natural gas provides a cheaper alternative to automobiles that run on gasoline and diesel. For instance, U.S. natural gas is now trading around \$2.25 per MMBtu, the equivalent of oil at \$13.50 per barrel. The graphic below illustrates how the spreads between different transportation fuels continuously benefit consumers of natural gas.



<http://energyfuse.org/natural-gas-vehicles-cost-competitive-and-poised-for-prime-time/>

by Matt Piotrowski (The Fuse) 11/2/15



A pro fracking group has welcomed a study from the US which says that electricity from fracking gas is cleaner than generating it from coal

The Onshore Energy Services Group said the report from scientists at the University of Berkeley shows problems of escaped methane from the fracking process may not be as bad as some environmentalists feared. The research suggests that leaks of methane from deep lying shale rock fractured by high pressure water and chemicals, would have to exceed an implausibly high 12 per cent before shale gas could be considered worse than coal for greenhouse gas problems.

Professor Robert Muller of the University of Berkeley California and Elizabeth Muller, co-founder and Executive Director of Berkeley Earth, a non-profit research organisation, say that because methane is broken down in the atmosphere much more quickly than carbon dioxide released into the environment by burning coal, it would be necessary for huge quantities of it to escape uncaptured for shale gas to be considered worse than coal.

<http://www.blackpoolgazette.co.uk/news/business/local-business/shale-gas-less-damaging-than-coal-new-report-says-1-7552009>
(The Gazette) 11/4/15

Too many Utica and Marcellus shale pipelines? Columbia Pipeline doesn't think so

A common complaint among Utica and Marcellus shale drillers is the lack of pipelines and other infrastructure to take away the oil and gas coming from the area. Companies are trying to fix that problem by constructing a bunch of pipelines – but will there be too much capacity when all is said and done?

"If anything, folks are looking for opportunities to get access to capacity as soon as they possibly can," President [Glen Kettering](#) said on the Houston company's third-quarter earnings call. Kettering doesn't think overbuilding is a risk. People who worry about it double-count some of the projects, he said, and some projects may not get built. Projected oil and gas production should match "reasonably well" with expected pipeline output by 2020, he said.

<http://www.bizjournals.com/columbus/blog/ohio-energy-inc/2015/11/too-many-utica-and-marcellus-shale-pipelines.html>
Tom Knox, reporter (Columbus Business First) 11/4/15

Putnam County becomes focus for gas drilling possibilities

Despite this year's slumping gas prices, potential profits that lay far beneath Putnam County's surface are piquing some companies' interests. The state Department of Environmental Protection approved a permit for Charleston-based Hard Rock Exploration to drill a vertical test well into the Rogersville Shale on Monday. Underlying parts of northeast Kentucky and southwestern counties in West Virginia, the deep-shale formation is still relatively uncharted.

"[Cabot] did a lot of shallow wells in that general area [and] are holding a lot of production because of previous wells," he said. But advancements in extraction technology, namely horizontal drilling and hydraulic fracturing, have created the possibility of a new wave of drilling in southwest West Virginia if the exploratory wells in the Rogersville Shale prove to be fruitful,

The Rogersville Shale differs from the Marcellus, a formation that has garnered attention nationwide and resulted in hundreds of fracked wells in Ohio, Pennsylvania and West Virginia in recent years. At about 5,000 feet underground, the Marcellus is more easily accessible than the Rogersville, which ranges anywhere from 9,000 to 14,000 feet underground. The depth of Hard Rock's proposed well, however, is 15,000 feet, according to DEP. Efforts to reach Hard Rock for comment Tuesday were unsuccessful.

Geologists with the Kentucky Geological Survey conducted recent research on the depth, thickness and composition of the Rogersville, and found that those factors vary depending on location. In eastern Kentucky, for example, the produced gas could also include natural gas liquids, such as butane, ethane and propane, which can be sold for additional profit.

In West Virginia, the shale is deeper underground with more thermal maturity, according to David Harris, who heads the Kentucky agency's Energy and Mineral Section. "[That] typically results in dry gas — pure methane — and lacks natural gas liquids," he said.

<http://www.wvgazette.com/article/20151103/GZ03/151109829/1101>
By Elaina Sauber, Putnam County Reporter (Charlston Gazette) 11/3/15



BP sees technology nearly doubling world energy resources by 2050

LONDON, Nov 2 (Reuters) – The world is no longer at risk of running out of oil or gas for decades ahead with existing technology capable of unlocking so much that global reserves would almost double by 2050 despite booming consumption, oil major BP said on Monday.

When taking into account all accessible forms of energy including nuclear, wind and solar, there are enough resources to meet 20 times what the world will need over that period, David Eyton, BP Group Head of Technology said. “Energy resources are plentiful. Concerns over running out of oil and gas have disappeared,” Eyton said at the launch of BP’s inaugural Technology Outlook.

Oil and gas companies have invested heavily in squeezing the maximum from existing reservoirs by using chemicals, super computers and robotics. The halving of oil prices since last June has further dampened their appetite to explore for new resources, with more than \$200 billion worth of mega projects scrapped in recent months.

By applying these technologies, the global proved fossil fuel resources could increase from 2.9 trillion barrels of oil equivalent (boe) to 4.8 trillion boe by 2050, nearly double the projected 2.5 trillion boe required to meet global demand until 2050, BP said.

<https://marcellus.com/news/id/131205/bp-sees-technology-nearly-doubling-world-energy-resources-by-2050-2/>

(Marcellus.com) (Reuters) 11/2/15

New Subscriptions

If you are not currently receiving this newsletter directly, and you would like to be added to the distribution, please send an email to mjc33@psu.edu and enter the words “subscribe SGICC” in the subject line.

About the SGICC

The Ben Franklin Shale Gas Innovation and Commercialization Center (www.sgicc.org) is designed to harness innovation and new technologies to maximize the economic return to Pennsylvania’s citizens from the Marcellus and Utica shale formations. The Center’s goal is to increase sustainable employment and wealth creation in Pennsylvania that has the potential to outlast the initial exploration, production and transportation of natural gas from the formations. The Center will also identify, support and commercialize technologies and early-stage businesses that enhance responsible stewardship of the environment while properly utilizing this transformative energy asset.

William J. Hall, CPG
Director
Shale Gas Innovation and Commercialization Center
Ben Franklin Technology PARTners
115 Technology Center Building, University Park, PA 16802
Office: 814 863 4881 Cell: 814 933 8203
billhall@rtto.psu.edu

Mike Chmela, Editor
Shale Gas Innovation and Commercialization Center
Ben Franklin Technology PARTners
115 Technology Center Building, University Park, PA 16802
Office: 814.865.6878
mjc33@psu.edu