

## Focus 本期焦点

### Element Six PDC Cutters Offered by SMT

由新力驰提供元素六的金刚石复合片

### Important Websites

重要网站连结

SMT Website 新力驰网站  
<https://synergymaterial.com/>

E6 Website 元素六  
<https://www.e6.com>

SMT @ 1688  
 新力驰@阿里巴巴  
<https://shop7588426n98059.1688.com/>

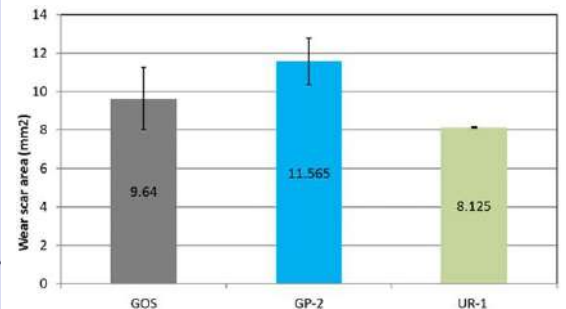
## Element Six PDC Cutters Offered by SMT

由新力驰提供元素六的金刚石复合片

SMT offers three families of PDC cutters from Element Six. These cutters deliver the highest level of performance for their price range in a broad variety of applications and drilling conditions.

Element Six achieves these performance levels by carefully balancing edge toughness and thermos-mechanical durability through a select diamond microstructure combined with optimized interface design and sintering conditions. The diamond feeds are carefully tailored by E6 to the requirements of each application based on extensive application analysis. Diamond table thickness is varied to match application requirements as well, with E6 providing the thickest diamond table in the industry for impact applications.

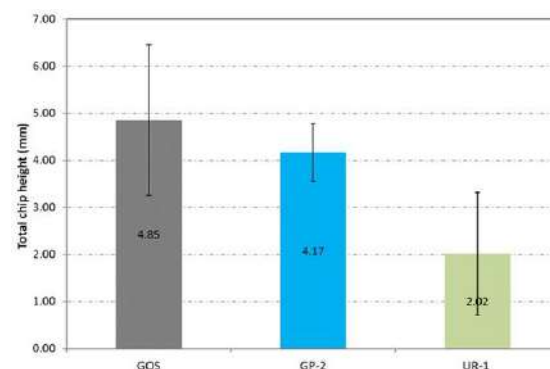
The newest cutter families are the GP-2 and UR-1. The GP-2 provides impact resistance equivalent to Element Six's leading impact cutter (IM-1) with greatly improved abrasion/thermal resistance. The UR-1 provides abrasion resistance better than E6's leading abrasion cutter (GUAH) with a significant increase in spall resistance using a multimodal diamond grain size distribution and ultra-high pressure sintering.



The above Abrasion lab test results indicate excellent abrasion resistance of the UR-1 cutter family.

SMT also continues to offer Element Six's older GOS cutter family for the mid-tier performance band.

Extensive laboratory application test and in-field performance analysis gives Element Six industry-leading understanding of the relationship between cutter performance, diamond microstructure, and table thickness/interface design. These laboratory tests include a range of abrasion tests to measure abrasion resistance and chipping tests to measure impact resistance. Some of the lab test results for the three cutter families are shown below.



The Impact lab test results indicate the excellent impact resistance of both the GP-2 cutter family and particularly the UR-1 cutter family. (Smaller chip height indicates better impact resistance.)

CNOOC Adopts Autonomous Platform - Intelligence Reduces Costs

中海油采无人平台 智能化降成本

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**中海油採無人平台 智能化降成本**  
油價彈重啟深水勘探 保持儲量穩增

中海油(00883)降本增效策略成果逐漸顯現，其深圳分公司總經理段成剛表示，集團透過無人平台及智能化生產降低成本，不僅可減少海上員工，甚至可於颱風下維持運作，增加作業時間，提高產量。

▲本報記者 陳穎妍珠海專電

過去數年油價低迷，油企不斷削減成本，中海油就大力推動勘探開發一體化，新老油田聯合開發等，縮短開發週期及降低成本。中海油勘探部勘探項目處處長高陽表示，近年重點在渤海深層及南海深水新區域探察，但基於油價低迷，2016至2017年暫停深水勘探活動，只作有價值的近海探察活動，惟今年已重新啟動，公司將加快自營採井工作，保障儲量持續增加。中海油每年勘探及開發支出佔資本開支的兩成。

**減海上員工 颶風下維持運作**

段成剛補充，集團除在作業上控制成本，同時研究無人平台建設及智能化生產，降低成本和大幅減少海上人員，特別是南海東部海域每年都會遇到不少颱風，過去颶風時都要撤退所有員工，暫停生產，但現在高欄端可以在颶風時啟動颶風模式，透過衛星平台去遙控平台運作，保證正常生產作業。

現時中海油深圳分公司主要負責南海東部海域的海上石油及天然氣的勘探、開發、生產作業及經營工作，涉及7大油氣區，共有32個油田及7個天然氣項目，當中包括自營及合作項目，預期今年自產油氣產量將達至約80%。

段成剛稱，未來不排除與其他油企合作，因可引進技術及管理經驗，也能與合作夥伴分擔投資風險，是一個很好的合作與交流機會。近年中海油與英國殼牌油企加大天然氣產量，中海油原油與天然氣銷售部副總經理戴彤預期，內地對進口天然氣的依賴愈來愈高，去年進口氣在天然氣市場的佔有率約54%，管道氣只佔46%，要達至中央2020年天然氣佔一次性能源消費量10%的目標，天然氣消費量須達4000億立方米。

中海油位於珠海高欄端主要處理荔灣3-1氣田及番禺34-1、35-1及35-2氣田的供氣，當上游氣田產氣後，便會在平台上經過脫水處理，再通過261公里的海底管道輸送到高欄終端。

**中海油深圳分公司業務簡介**

- 負責南海東部海域的海上油氣勘探開發、工作作業及經營
- 共有7油氣大區，分32個油田及7個氣田
- 年均採井工作量約33至37口
- 海上作業操作成本每桶約8.53美元
- 截至去年底，累計產油2.8億方，累計產氣262億方
- 在建工程包括荔灣16-2油田群開發項目、荔灣3-1一期後期項目等

ICBC International :

Economic Slowdown - Oil Prices Peaked

工銀國際：經濟放緩 油價已見頂

ICBC International : Economic Slowdown - Oil Prices Peaked

工銀國際：經濟放緩 油價已見頂

**工銀國際：經濟放緩 油價已見頂**  
受惠天然氣改革 相對看好中石油

全球經濟增勢放緩，原油需求勢將下降，該行第四季平均油價預測為72美元。

中石油是內地最大的天然氣生產商及進口商，明年天然氣改革推進下，氣價有望進一步提升，故相對看好中石油。

油氣上游資產要引入民企的難度大，除要投入巨大資本勘探及開發，還需具備專業知識。

▲工銀國際油氣、化工與汽車行業副總裁余曉穎表示，今年冬季內地未顯出颶風威脅。

**專訪**

原油價格技術上進入熊市，工銀國際認為，過去數月油價上升源於地緣政治風險升溫，令市場一度對油價攀升存在憧憬，但隨著環球經濟增勢放緩，油價已見頂，未來於約70美元水平徘徊。

▲本報記者 陳穎妍

工銀國際油氣、化工與汽車行業副總裁余曉穎接受專訪時表示，全球經濟增勢放緩，原油需求勢將下降，該行第四季平均油價預測為72美元，京滬油價會較第三季回穩，明年平均油價約75美元，預期油價未來會在70至80美元的高位震盪。

**氣價續有提升空間**

「三大油」中，相對看好中石油(00857)，中石油是內地最大的天然氣生產商及進口商，市場佔有率約60%，預期明年天然氣改革繼續推進下，氣價有望進一步提升。現時進口氣價的定價機制是與原油及液化石油氣(LPG)掛鈎，惟各地都未有嚴格執行，只要改革持續，氣價便有提升空間。

經過去年的颶風氣災後，中央要求三大油提高天然氣產量，余曉穎相信，三大油增產下，進口氣亦已簽訂長期合約，加上油改氣的規模少於去年，料可大幅舒緩冬季天然氣取用的緊張供應，故即使冬季氣荒仍有氣荒，也不會像去年般嚴重。

早前重慶市政府取消天然氣的初裝費，曾引起天然氣股震盪。余曉穎稱，重要的天然氣滲透率達70%以上，反映當地天然氣基礎完善，新增用戶不會太多，故取消初裝費也不會有大影響，但相信不會有全國一併取消初裝費的政策出現，預期全年天然氣需求增長約15%至16%，以此增產推算，要達到2020年天然氣佔一次性能源消費比重10%的目標問題不大。

余曉穎又稱，中石油早就已在油氣管帶引入民營資本，中石化亦向社會及民營資本出售銷售分銷公司約三成權益，但油氣上游資產要引入民企，難度相對較大，除因勘探及開採方面的資本投入巨大外，上游業務還需具備專業知識，入行門檻非常高，一般民企業進入並不容易。



Why Falling Oil Prices are Now a Net Drag on the U.S. Economy - Nov 2018

为什么油价下跌成为现今美国经济的净拖累 - 2018年11月

### President Trump - Nov 2018



Tweet



Donald J. Trump   
@realDonaldTrump

Oil prices getting lower. Great! Like a big Tax Cut for America and the World. Enjoy! \$54, was just \$82. Thank you to Saudi Arabia, but let's go lower!

21/11/2018, 20:49

### Why Falling Oil Prices are Now a Net Drag on the U.S. Economy - Nov 2018

为什么油价下跌成为现今美国经济的净拖累 - 2018年11月

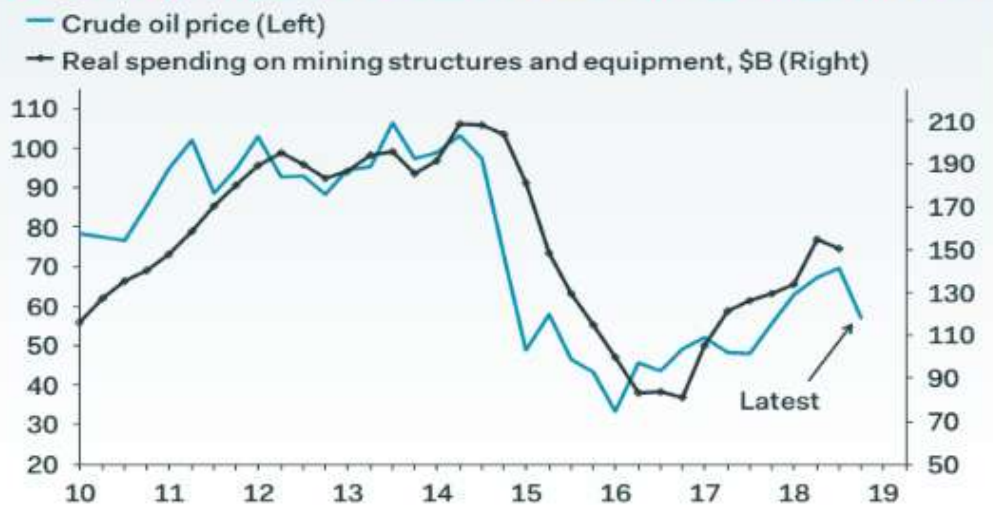
President Donald Trump on Wednesday touted falling oil prices as a “tax cut for America and the world,” but economists say the shale revolution, which has turned the U.S. back into a major oil producer, means that declining crude prices are now a small headwind for the economy.

“The key point to remember here is that the lower oil prices are now a net drag on the U.S. economy, because the [capital-expenditure] cutbacks triggered in the shale oil business outweigh the gains to consumers’ spending from cheaper gas prices,” said Ian Shepherdson, chief economist at Pantheon Macroeconomics, in a Monday note.

The drag isn’t large, but the phenomenon is a “huge break from the past,” Shepherdson noted, and it’s become visible only recently.

That’s unlikely to be repeated this time around, Shepherdson said, but he warned that investors should expect to see a clear drop in mining capital expenditures, or capex, which include oil, in the first quarter — a move likely to be signaled by a decline in the Baker-Hughes oil-rig count — before the end of this year. The rig count is viewed as a real-time proxy for capital spending (see chart below).

#### CAPEX IN THE OIL SECTOR IS SET TO FALL, UNLESS PRICES REVIVE



<https://www.marketwatch.com/story/heres-how-much-plunging-oil-prices-will-hurt-yes-hurt-the-us-economy-2018-11-20>

## Oil Price is Now Controlled by Just 3 Men - Nov 2018

现在油价仅由 3 名男子控制 - 2018 年 11 月

## Oil Price is Now Controlled by Just 3 Men - Nov 2018

现在油价仅由 3 名男子控制 - 2018 年 11 月

OPEC has lost what control of the oil market it ever had. The actions (or tweets) of three men — Presidents Donald Trump and Vladimir Putin and Crown Prince Mohammed Bin Salman — will determine the course of oil prices in 2019 and beyond. But, of course, they each want different things.

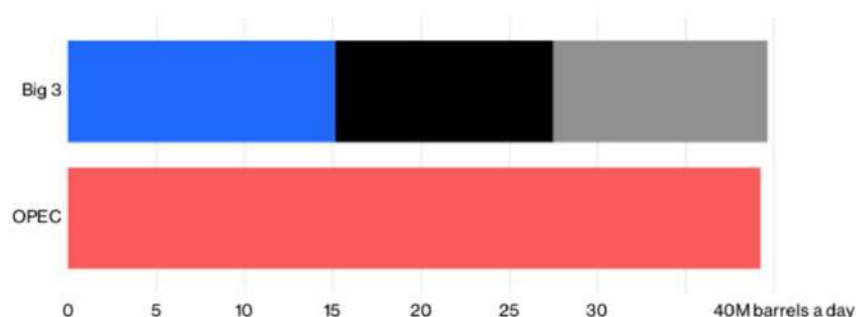
While OPEC struggles to find common purpose, the U.S., Russia and Saudi Arabia dominate global supply. Together they produce more oil than the 15 members of OPEC. All three are pumping at record rates and each could raise output again next year, although they may not all choose to do so.

It was Saudi Arabia and Russia that led the push in June for the OPEC+ group to relax output restraints that had been in place since the start of 2017. Both subsequently jacked up production to record, or near record, levels. U.S. output soared unexpectedly at the same time, as companies pumping from the Permian Basin in Texas overcame pipeline bottlenecks to move their oil to the Gulf coast.

### Big Beasts

Whether oil output from the Big 3 continues to outstrip OPEC will depend on the words and actions of Trump, Putin and Bin Salman

■ U.S. ■ Russia ■ Saudi Arabia



Note: includes crude, condensates and natural gas liquids  
Source: Bloomberg

BloombergOpinion

<https://economictimes.indiatimes.com/markets/commodities/views/view-oil-price-is-now-controlled-by-just-3-men/articleshow/66678879.cms>

## JP Morgan Gives its Prediction for Brent Crude in 2019 - Nov 2018

摩根大通预测布伦特原油 2019 年走势 - 2018 年 11 月

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摩根大通预测布伦特原油 2019 年走势 - 2018 年 11 月

JP Morgan has cut its outlook for oil, predicting that Brent crude prices will average \$73 a barrel in 2019 — down from the investment bank's previous forecast of \$83.50 a barrel.

Scott Darling, head of Asia-Pacific oil and gas at JP Morgan told CNBC demand growth will weigh, particularly after the Organization of the Petroleum Exporting Countries (OPEC) agreed to ramp up production earlier this year.

Slowing demand growth will weigh on prices in 2019 and 2020.

JP Morgan has cut its outlook for oil, predicting that Brent crude prices will average \$73 a barrel in 2019 — down from the investment bank's previous forecast of \$83.50 a barrel.

Scott Darling, head of Asia-Pacific oil and gas at JP Morgan told CNBC that the investment bank recently revised its outlook in part due to North American supply ramping up in the second half of next year. JP Morgan expects the price of Brent, the international benchmark for oil, to go toward \$64 in 2020.

The market is now focused on the group's next meeting on December 6 for guidance. Darling said OPEC needs to cut oil production by 1.2 million barrels a day for the whole of next year to balance the oil market.

<https://www.cnbc.com/2018/11/22/oil-pricesjp-morgan-gives-its-prediction-for-brent-crude-in-2019.html>

Is the Fracking Boom a Sign of America's Move Toward Oil Independence? – Nov 2018

水力压裂法采油迅速发展是否意味着美国正迈向石油独立? - 2018年11月

**Is the Fracking Boom a Sign of America's Move Toward Oil Independence? - Nov 2018**

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In 2012, Leonardo Maugeri, the former chief strategist of Italian oil and gas giant ENI, coined the phrase “Saudi America” and predicted that the fracking boom would make the United States as big an oil producer as Saudi Arabia.

That level of production is now within reach, somewhat earlier than the late Maugeri expected. U.S. crude-oil production hit a record milestone in August, when it exceeded 11 million barrels per day for the first time, according to the federal Energy Information Administration. Oil output from one geologic region alone, the Permian Basin in West Texas, has exceeded the output of eight of the 13 members of the Organization of the Petroleum Exporting Countries. And U.S. imports of crude oil have plummeted to the lowest level since 1967 (though they have not disappeared).

First the geology. Fracking combines recent advances in horizontal drilling with age-old hydraulic fracturing — which involves shooting water and sand and chemicals into a well to extract bits of oil and gas. The process pries loose oil and gas from shale rock that had not been valued before.

Second, the ability of oil and gas exploration companies to tap into the underground formations is a result not only of technology but, just as important, of cheap capital, McLean argues. And in the past decade, as the Federal Reserve kept interest rates low to revive the economy, that capital has been extremely cheap.

Other shale players might be less flamboyant, but the very structure of the shale business has some important fault lines. For all the hoopla about the surge in U.S. oil and gas production from fracking, most people overlook an important feature of the boom: The average shale well produces most of its oil or gas in the first two years. That means oil companies must keep drilling new wells to keep production steady. In short, they have to keep running — and quickly — just to stay in place. McLean shows this with numbers: “To maintain production of 1 million barrels per day, shale requires up to 2,500 wells, while production in Iraq can do it with fewer than 100.”

[https://www.washingtonpost.com/outlook/is-the-fracking-boom-a-sign-of-americas-move-toward-oil-independence/2018/11/16/c846847c-dd2d-11e8-b3f0-62607289efee\\_story.html?utm\\_term=.6caf64848593](https://www.washingtonpost.com/outlook/is-the-fracking-boom-a-sign-of-americas-move-toward-oil-independence/2018/11/16/c846847c-dd2d-11e8-b3f0-62607289efee_story.html?utm_term=.6caf64848593)

Qatar Says Will Leave OPEC - Dec 2018

卡塔尔表示将离开石油输出国家组织 - 2018年12月

**Qatar Says Will Leave OPEC - Dec 2018**

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The Gulf nation of Qatar's new energy minister said that his country will leave OPEC effective January of 2019. He said that he had informed OPEC of his decision ahead of his announcement.

"The withdrawal decision reflects Qatar's desire to focus its efforts on plans to develop and increase its natural gas production from 77 million tons per year to 110 million tons in the coming years," the minister was quoted as saying.

"Qatar is proud in its international standing at the forefront of natural gas producers, and as the biggest exporter of LNG - the cleanest fossil fuel, which has given Qatar a strong and resilient economy," Qatar Petroleum also quoted Kaabi as saying.

<https://www.dw.com/en/qatar-says-will-leave-opec/a-46545900>

**Is This The Most Crucial Factor For Oil In 2019? - Dec 2018**

这是 2019 年最重要的石油因素吗? - 2018 年 12 月

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这是 2019 年石油最重要的因素吗? - 2018 年 12 月

China is also facing slower growth. The trade war could flare up once again after the much-heralded Trump-Xi truce expires in three months. In fact, as the details on the most recent trade ceasefire faced more scrutiny, the deal started to look a little hollow. Trump took to twitter, perhaps after he realized that China's concession were not rock solid, and said that he was "a Tariff Man," warning them to follow through.

One of the key backdrops for the global economy in 2019 will be "an unprecedented level of global monetary policy divergence as the U.S. Federal Reserve continues to hike interest rates and other major central banks don't," Bank of America Merrill Lynch said in a report. The Fed has been steadily hiking interest rates while the European Central Bank has held off.

The implications for the oil market are profound. OPEC+ is trying to get a handle on a burgeoning supply glut, which has been made worse by downward revisions in demand. Still, global oil demand has been affected much less than might be implied by the bout of economic volatility that has unfolded recently. The IEA has twice revised its 2018 figures down, but only by around 200,000 bpd. In its November Oil Market Report, the agency noted that "a deteriorating outlook for the global economy is largely offset by the fall in Brent crude oil prices." In other words, oil prices fell because a worsening economy implied lower demand, but lower prices themselves helped keep demand aloft.

As a result, oil prices might not necessarily fall from current levels even though the economy could take a turn for the worse. "We forecast Brent and WTI crude oil prices to average \$70 and \$59 per barrel, respectively in 2019," BofAML concluded.

<https://oilprice.com/Energy/Crude-Oil/Is-This-The-Most-Crucial-Factor-For-Oil-In-2019.html>

**Oil Prices Surge 5% as OPEC Agrees Output Cut - Dec 2018**

石油输出国组织 (OPEC) 同意减产令油价飙升 5% - 2018 年 12 月

**Oil Prices Surge 5% as OPEC Agrees Output Cut - Dec 2018**

石油输出国组织 (OPEC) 同意减产令油价飙升 5% - 2018 年 12 月

A Russian Energy Ministry source said Moscow was ready to contribute a cut of around 200,000 bpd and sources said other non-OPEC producers could contribute a further 200,000 bpd of output cuts, bringing an overall cut to 1.2 million bpd.

"(A cut of) 1.2 million bpd, if implemented promptly and fully, should be enough to largely attenuate, but not eliminate, expected implied global inventory builds in the first half of next year," BNP Paribas strategist Harry Tchilinguirian told Reuters Global Oil Forum.

"Given how much expectations were downplayed yesterday, this comes as a welcome surprise for the market," he added.

Oil output from the world's biggest producers - OPEC, Russia and the United States - has increased by 3.3 million bpd since the end of 2017 to 56.38 million bpd, meeting almost 60 percent of global consumption.

The surge is mainly due to soaring US oil production, which has jumped by 2.5 million bpd since early 2016 to a record 11.7 million bpd, making the United States the world's biggest producer.

<https://www.livemint.com/Industry/2zPczu5UuF8wFsbEKIKd7K/Oil-prices-fall-as-OPEC-awaits-Russian-support-for-supply-cu.html>



**China Pushes Global Oil Trading To All-Time High In 2018 - Dec 2018**

在 2018 年中国推动全球石油交易至历史最高水平- 2018 年 12 月

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International Energy Exchange (INE), are still seen mainly as a Chinese market for Chinese traders who don't trade on market fundamentals. The futures contract struggles to become truly international for market participants, while inconsistent trading volumes are not helping international traders to use the Shanghai futures as a financial hedge.

Analysts have also flagged storage costs in China as one of the problems that traders could face in the delivery mechanism of the Chinese oil futures contract. Storage costs in China are much higher than elsewhere. The reason for the higher cost is limited storage capacity availability and the requirement that the cargo be stored at a specific storage facility rather than at any available.

Nevertheless, in its first year of launch, the Chinese crude oil futures contract has already taken a 6-percent market share from the most active contracts, WTI and Brent.

According to data from exchanges quoted by Reuters, the trading volumes of Brent and WTI dropped to 207.2 million lots of 1,000 barrels each this year through December 10, compared to 220.17 million lots traded last year. Trading volumes in WTI and Brent are set to decline in 2018 for the first time since 2013.

But the Shanghai crude oil futures volume trade of 13 million lots until December 10, added to the WTI and Brent trading volumes, will push the oil futures trading globally to a record high this year.

"If a new exchange achieves 6 percent market share vs the two incumbents within the first year of trading that's fairly impressive," John Driscoll, director of Singapore-based consultancy JTD Energy, told Reuters.

To compare, the year in which the Brent futures contract started trading in 1988, Brent took a 3.1-percent share from then-dominant WTI contract.

<https://oilprice.com/Energy/Crude-Oil/China-Pushes-Global-Oil-Trading-To-All-time-High-In-2018.html>

**U.S. Oil Drillers Cut Rigs for Second Week in a Row : Baker Hughes - Dec 2018**

美国石油钻探公司连续第二周削减钻井平台： Baker Hughes - 2018 年 12 月

**U.S. Oil Drillers Cut Rigs for Second Week in a Row : Baker Hughes – Dec 2018**

美国石油钻探公司连续第二周削减钻井平台： Baker Hughes - 2018 年 12 月

Drillers cut four oil rigs in the week to Dec. 14, bringing the total count down to 873, the lowest since mid October, General Electric Co's (GE.N) Baker Hughes energy services firm said in its closely followed report on Friday. RIG-OL-USA-BHI

More than half the total U.S. oil rigs are in the Permian Basin, the country's biggest shale oil formation. Active units there declined by three this week to 486, the lowest since early October.

The U.S. rig count, an early indicator of future output, is higher than a year ago when 747 rigs were active as energy companies have spent more to capture higher prices.

U.S. crude futures CLc1 were trading around \$51 a barrel on Friday, down more than 2 percent for the week, on data showing slower economic growth in China. [O/R]

That put the front-month up less than 1 percent so far in December after the contract crashed almost 11 percent in October and 22 percent in November.

The U.S. Energy Information Administration (EIA) this week projected average annual U.S. production will rise to a record 10.9 million barrels per day (bpd) in 2018 and 12.1 million bpd in 2019 from 9.4 million bpd in 2017. [EIA/M]

The current all-time U.S. annual output peak was in 1970 at 9.6 million bpd, according to federal energy data.

<https://www.reuters.com/article/us-usa-rigs-baker-hughes/u-s-oil-drillers-cut-rigs-for-second-week-in-a-row-baker-hughes-idUSKBN1OD2EQ>

## Oil Prices 油价

Brent Crude Oil Prices  
伦敦布伦特原油期货  
<https://hk.investing.com/commodities/brent-oil>

(WTI) 原油价格  
<https://markets.businessinsider.com/commodities/oil-price?type=wti>

U.S. Active Drilling Rigs  
美国活跃钻油井数目  
International Active Drilling Rigs  
国际活跃钻油井数目  
<http://phx.corporate-ir.net/phoenix.zhtml?c=79687&p=irol-rigcountsoverview>

USD 美金计	Brent Crude 布兰特期油	Oil (WTI) 纽约轻原油	Active Oil Rigs 活跃油井	
			US 美国	Int'l 国际
20 Dec, 2018	56.17	47.06	1,071	991
12 Dec, 2018	60.19	51.20	1,075	991
30 Nov, 2018	59.10	50.67	1,076	1,017
15 Nov, 2018	66.65	56.55	1,081	1,017
2 Nov, 2018	72.57	62.86	1,067	1,004

### Price Performance 价格表现

3M 三个月	-15.58%	-17.40%		
6M 六个月	-28.79%	-33.27%		
One Year 一年	-24.71%	-27.20%		
Since 自 2018	-15.20%	-21.41%	+141	+49

## Reminder 提示

Exhibitions 展览会

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### Exhibitions 展览会

### Place 地点

### 2019

SPE Hydraulic Fracturing Technology Conference & Exhibition	德州 Texas	5-7 Feb
International Conference on Gas, Oil & Petroleum Engineering (GOPE-2019)	三藩市 San Francisco	18-20 Feb
SPE/IADC Drilling Conference & Exhibition	海牙 The Hague	5-7 Mar
SPE Middle East Energy Summit	麦纳马 Manama	18 Mar
Middle East Oil & Gas Show & Conference	麦纳马 Manama	18-21 Mar
International Petroleum Technology Conference (IPTC)	北京 Beijing	26-28 Mar
International Petroleum & Petrochemical Technology Conference (IPPTC)	北京 Beijing	27-29 Mar
China International Petroleum & Petrochemical Technology & Equipment Exhibition	北京 Beijing	27-29 Mar
Offshore Technology Conference (OTC)	休斯顿 Houston	6-9 May
SPE Offshore Europe 2019 Oil & Gas Conference & Exhibition	阿伯丁 Aberdeen	3-6 Sept
Society of Petroleum Engineers (SPE) Annual Technical Conference & Exhibition	卡尔加里 Calgary	30 Sept - 2 Oct