# SK Energy Daily

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SK증권

## 1. News Summary (3 page)

2018년 12월 12일

| News | |
|---|---|
| *WTI comment* | 하루만에 상승반전…WTI 1.3%↑ |
| *Headline* | 한국전력 수익성·전력수급 '경고등' |
| *News 1.* | - |
| *News 2.* | - |
| *News 3.* | - |
| *News 4.* | - |

| Conclusion |
|---|
| |
| 한국전력 이익의 핵심인 전기세 인상 여부가 중요함 |
| - |
| - |
| - |
| - |

## 2. Prices Summary (4~7 page)

| Daily | Unit | Price | 1D | 1W | 1M | 3M | 12M |
|---|---|---|---|---|---|---|---|
| *Refinery* | | | % | % | % | % | % |
| WTI | $/bbl | 51.7 | 1.3 | (3.0) | (13.8) | (25.4) | (9.6) |
| Dubai | $/bbl | 58.4 | (3.1) | (5.2) | (17.3) | (23.4) | (6.6) |
| Gasoline | $/bbl | 60.5 | (3.6) | (3.7) | (16.4) | (31.4) | (21.8) |
| Diesel | $/bbl | 70.3 | (2.9) | (4.9) | (20.0) | (23.3) | (8.2) |
| Complex margin | $/bbl | 4.5 | (0.3) | (0.5) | (2.1) | (2.8) | (3.8) |
| 1M lagging | $/bbl | (8.6) | (3.0) | (1.8) | (2.8) | (18.9) | (17.9) |
| *Petrochemical* | | | % | % | % | % | % |
| Naphtha | $/t | 486 | (3.7) | (5.2) | (11.2) | (28.3) | (18.4) |
| Butadiene | $/t | 1,090 | 0.0 | 1.4 | 3.8 | (31.9) | 0.0 |
| HDPE | $/t | 1,070 | 0.0 | 4.9 | (10.1) | (15.7) | (17.1) |
| MEG | $/t | 675 | (3.2) | (7.5) | (6.6) | (26.2) | (26.1) |
| PX | $/t | 1,038 | (1.7) | 2.9 | (6.8) | (19.7) | 17.6 |
| SM | $/t | 955 | (2.7) | (4.8) | (11.7) | (31.1) | (26.7) |
| *Commodity* | | | % | % | % | % | % |
| Natural Gas | $/mmbtu | 4.41 | (3.0) | (1.1) | 6.3 | 46.9 | 46.4 |
| Natural rubber | $/t | 1,210 | (0.8) | (2.4) | (0.8) | (6.9) | (13.6) |
| Cotton | C/lbs | 80.0 | 0.2 | 1.6 | 5.5 | (3.6) | 9.8 |

*참고: 정제마진의 변동률은 %가 아닌 $/bbl임

| Weekly | Update | Unit | Price | 1W | 1M | 3M | 12M |
|---|---|---|---|---|---|---|---|
| *Petrochemical* | | | | % | % | % | % |
| Ethylene | 12/10 | $/t | 780 | (8.8) | (8.2) | (31.4) | (35.7) |
| Propylene | 12/10 | $/t | 840 | 8.4 | (13.4) | (18.4) | (1.2) |
| Benzene | 12/10 | $/t | 620 | (2.7) | (10.1) | (28.7) | (31.5) |
| Toluene | 12/10 | $/t | 640 | (2.3) | (20.0) | (22.9) | (11.1) |
| Xylene | 12/10 | $/t | 720 | (2.0) | (17.7) | (17.2) | 3.6 |
| PP | 12/10 | $/t | 1,058 | (6.2) | (14.2) | (14.5) | (8.6) |
| PVC | 12/10 | $/t | 860 | 0.0 | 1.2 | (9.5) | 0.6 |
| ABS | 12/10 | $/t | 1,465 | 0.3 | (8.4) | (22.1) | (27.8) |
| SBR | 12/10 | $/t | 1,395 | (0.4) | (8.2) | (25.6) | (15.5) |
| SM | 12/10 | $/t | 1,023 | 3.0 | (7.0) | (29.4) | (24.4) |
| BPA | 12/10 | $/t | 1,463 | (2.5) | (14.8) | (25.4) | (17.1) |
| Caustic | 12/10 | $/t | 300 | (7.4) | (7.4) | (31.8) | (57.1) |
| 2-EH | 12/10 | $/t | 1,050 | (2.8) | (9.1) | (7.1) | 2.9 |
| Caprolactam | 12/10 | $/t | 1,650 | (11.8) | (20.7) | (22.5) | (19.5) |
| *Solar* | | | | % | % | % | % |
| Polysilicon | 12/05 | $/kg | 9.53 | 0.0 | (2.3) | (14.6) | (43.8) |
| Module | 12/05 | $/W | 0.22 | 0.5 | (2.7) | (12.1) | (30.6) |

## 3. Global Peers Summary (8~9 page)

| | Unit | Price | 1D | 1W | 1M | 3M | 12M |
|---|---|---|---|---|---|---|---|
| *E&P* | | | % | % | % | % | % |
| ExxonMobil | USD | 76.7 | 0.2 | (3.5) | (5.2) | (7.5) | (7.6) |
| Shell | EUR | 2,339 | 0.9 | (3.2) | (3.3) | (4.9) | (2.0) |
| Petrochina | CNY | 7.58 | (0.5) | (1.9) | (6.3) | (8.0) | (6.3) |
| Gazprom | RUB | 158.6 | (1.5) | (3.4) | 3.5 | 4.1 | 17.8 |
| Petrobras | BRL | 23.3 | (0.6) | (8.1) | (8.5) | 25.9 | 51.4 |
| *Refinery* | | | | | | | |
| Phillips66 | USD | 88.4 | (0.5) | (3.3) | (11.3) | (21.4) | (11.3) |
| Valero | USD | 73.3 | (0.1) | (7.8) | (16.3) | (36.3) | (16.0) |
| JX | JPY | 602.7 | (6.7) | (11.8) | (18.7) | (18.3) | (10.9) |
| Neste Oil | EUR | 68.4 | 0.9 | (3.0) | (3.7) | (6.1) | 31.8 |

| | Unit | Price | 1D | 1W | 1M | 3M | 12M |
|---|---|---|---|---|---|---|---|
| *Petrochemical* | | | % | % | % | % | % |
| BASF | EUR | 59.1 | 0.2 | (6.2) | (14.0) | (22.6) | (37.1) |
| DowDuPont | USD | 53.3 | (1.0) | (5.7) | (9.2) | (24.0) | (24.8) |
| SABIC | SAR | 118.4 | (1.2) | (2.3) | (4.2) | (1.2) | 17.1 |
| Formosa Pla. | TWD | 98.5 | (1.0) | (3.0) | (2.5) | (11.3) | 6.0 |
| Shin-Etsu | JPY | 9,216 | (1.1) | (6.9) | (9.2) | (5.6) | (23.6) |
| *Renewable* | | | | | | | |
| Wacker | EUR | 75.2 | 5.4 | (10.3) | (16.2) | (36.3) | (50.2) |
| First Solar | USD | 42.45 | (1.8) | (4.6) | 0.5 | (12.4) | (39.4) |
| GCL-Poly | HKD | 0.50 | (2.9) | (11.6) | (11.6) | (6.6) | (60.4) |
| Tesla Motors | USD | 366.8 | 0.4 | 2.0 | 4.6 | 31.2 | 11.5 |

## 4. Coverage Summary

| | 12/11 | 1D | 1W | 1M | 3M | 6M | 12M | 투자의견 | TP | % | P/E | P/B |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| KOSPI | 2,053 | (0.0) | (2.9) | (1.6) | (10.1) | (16.9) | (16.7) | | | | * 추정치는 12M fwd 기준임 | |
| KOSPI화학 | 4,812 | 0.0 | (3.6) | 2.2 | (12.2) | (21.1) | (19.6) | | | | * 모든 coverage 업체의 실적은 연결기준임 | |
| LG화학 | 349,500 | 1.3 | (2.5) | 6.7 | 1.7 | (7.3) | (12.3) | 매수 | 400,000 | 14.4 | 15.34 | 1.59 |
| 롯데케미칼 | 265,500 | (0.2) | (7.0) | (5.7) | (7.8) | (30.3) | (25.6) | 매수 | 360,000 | 35.6 | 8.64 | 11.60 |
| 한화케미칼 | 19,850 | 3.7 | 4.2 | 12.1 | 5.6 | (23.4) | (33.6) | 매수 | 27,000 | 36.0 | 9.65 | 0.48 |
| 금호석유화학 | 83,800 | 0.8 | (10.2) | (4.1) | (18.2) | (17.0) | (2.8) | 매수 | 140,000 | 67.1 | 9.59 | 1.10 |
| KCC | 283,000 | (0.2) | (1.0) | 6.0 | (18.9) | (20.4) | (25.9) | 매수 | 400,000 | 41.3 | 15.91 | 0.47 |
| OCI | 105,500 | 1.4 | 0.0 | 9.0 | (10.6) | (10.6) | (12.4) | 매수 | 140,000 | 32.7 | 12.43 | 0.73 |
| SKC | 34,500 | (1.8) | (4.7) | (1.4) | (26.1) | (15.4) | (14.9) | 매수 | 50,000 | 44.9 | 9.55 | 0.81 |
| SK이노베이션 | 181,500 | (1.4) | (8.8) | (9.3) | (9.9) | (15.4) | (10.6) | 매수 | 240,000 | 32.2 | 12.96 | 0.96 |
| S-Oil | 105,500 | (0.9) | (7.0) | (8.3) | (15.9) | (5.8) | (11.3) | 매수 | 150,000 | 42.2 | 13.23 | 1.74 |
| GS | 51,700 | 1.0 | (1.1) | 1.6 | (2.6) | (13.3) | (14.1) | 매수 | 80,000 | 54.7 | 4.91 | 0.59 |
| SK가스 | 73,400 | (0.9) | (3.2) | (2.8) | (17.9) | (22.7) | (23.1) | 매수 | 120,000 | 63.5 | 6.02 | 0.49 |
| 포스코대우 | 18,200 | (1.9) | (5.0) | (5.0) | (4.7) | (24.9) | 3.4 | 매수 | 25,000 | 37.4 | 10.44 | 0.67 |
| LG상사 | 16,150 | 0.6 | (4.7) | (2.4) | (24.0) | (42.0) | (40.2) | 매수 | 30,000 | 85.8 | 5.83 | 0.47 |
| 한국전력 | 32,600 | 1.6 | 6.5 | 15.8 | 7.6 | (7.1) | (14.2) | 매수 | 40,000 | 22.7 | 8.51 | 0.26 |
| 한국가스공사 | 52,000 | (1.9) | (0.2) | (3.0) | (9.1) | (19.1) | 24.3 | 매수 | 75,000 | 44.2 | 9.36 | 0.68 |

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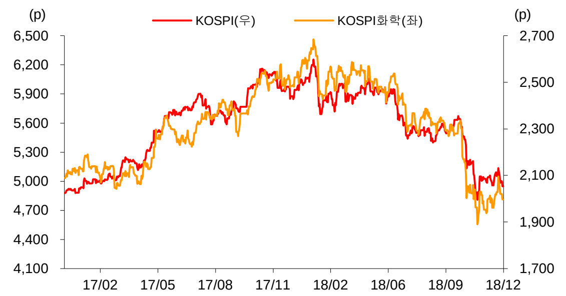
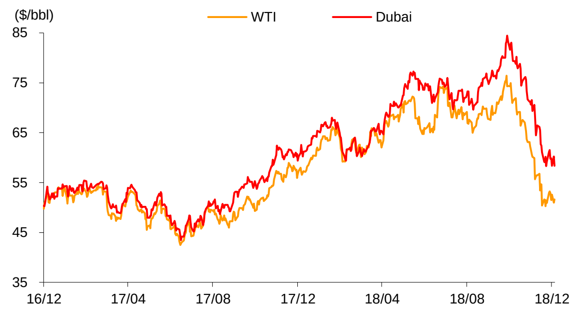
## Key Chart

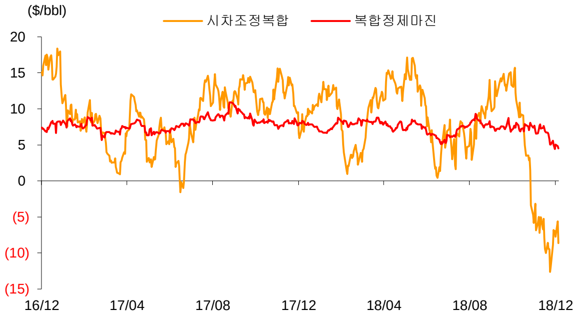
### KOSPI/KOSPI화학



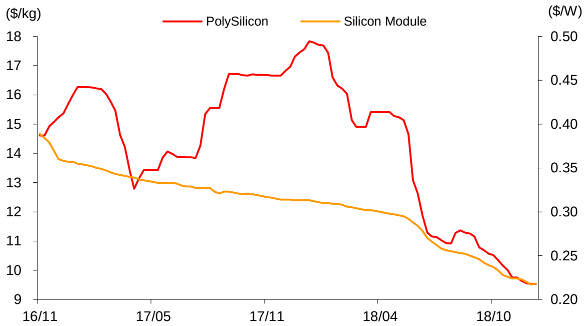

### WTI/Dubai



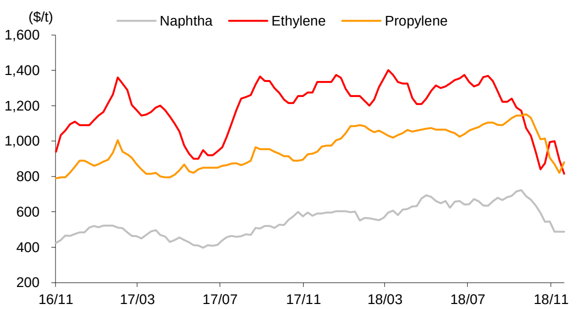

### Complex & 1M lagging margin



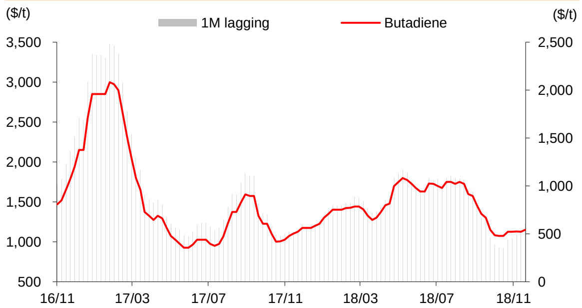

### Polysilicon & Module prices



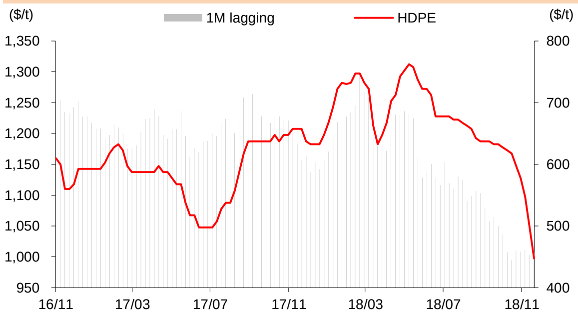

### Naphtha/Ethylene/Propylene prices



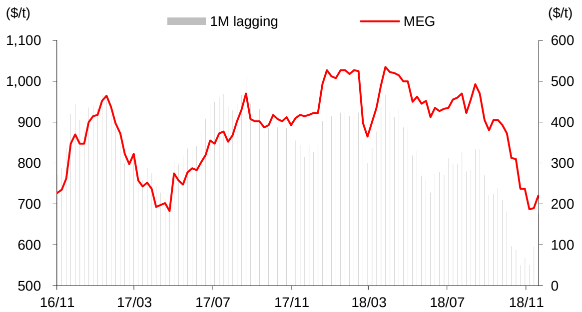

### Butadiene price & 1M lagging naphtha spread



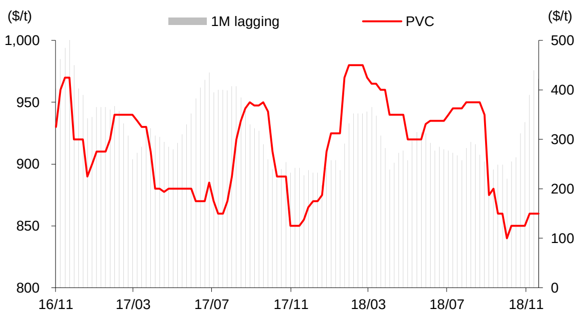

### HDPE price & 1M lagging naphtha spread



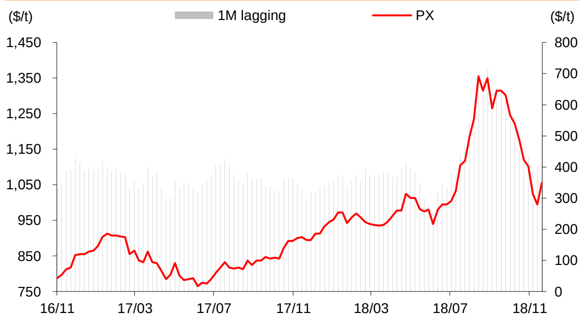

### MEG price & 1M lagging naphtha spread




### PVC price & 1M lagging naphtha spread




### PX price & 1M lagging naphtha spread




자료: Bloomberg, Cischem, Petronet, Platts, Pvinsights, SK증권
참고: 상기 데이터는 일괄적으로 과거 2년치 적용

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## News Comment

| Headline | (출처: 뉴스토마토) |
|---|---|
| **제목** | 한국전력 수익성·전력수급 '경고등' |
| **결론** | 한국전력 이익의 핵심인 전기세 인상 여부가 중요함 |
| **세부** | |
| | 1) 정부가 11일 전기요금 누진제 완화에 대한 본격적인 논의를 시작 |
| | 2) 한국전력의 수익성과 전력수급 문제에 대한 대책이 필요하다는 지적 |
| | 3) 3분기 들어 여름 전력 판매 증가로 겨우 흑자로 돌아선 한국전력 |
| | 4) 관계자, "원전 가동 중단하면서 발전용 가격이 비싼 LNG 구매량이 늚" |
| | 5) 한국전력 이익의 핵심인 전기세 인상 여부가 중요함 |

| WTI Comment | (출처: 연합뉴스) |
|---|---|
| 제목 | 하루만에 상승반전…WTI 1.3%↑ |
| 상승 요인 | 달러 약세, 리비아에서의 원유 공급 차단 소식 |
| 하락 요인 | |

| Issue 1 | |
|---|---|
| 제목 | |
| 결론 | |
| 세부 | |
| | 1) |
| | 2) |
| | 3) |
| | 4) |
| | 5) |

| Issue 2 | |
|---|---|
| 제목 | |
| 결론 | |
| 세부 | |
| | 1) |
| | 2) |
| | 3) |
| | 4) |
| | 5) |

| Issue 3 | |
|---|---|
| 제목 | |
| 결론 | |
| 세부 | |
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| | 2) |
| | 3) |
| | 4) |
| | 5) |

| Issue 4 | |
|---|---|
| 제목 | |
| 결론 | |
| 세부 | |
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| | 2) |
| | 3) |
| | 4) |
| | 5) |

| Issue 5 | |
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| 제목 | |
| 결론 | |
| 세부 | |
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| Issue 6 | |
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| 제목 | |
| 결론 | |
| 세부 | |
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| | 2) |
| | 3) |
| | 4) |
| | 5) |

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## Commodity Price Data

| Daily Price | | Today | 1D | 1W | 1M | 3M | 6M | 12M | YTD | 2016avg. | 2017avg. | 2018acc. |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| F/X | **USD/EUR** | 0.884 | 0.881 | 0.882 | 0.882 | 0.862 | 0.849 | 0.850 | 0.833 | 0.904 | 0.887 | 0.846 |
| | *Change, %* | | *0.3* | *0.2* | *0.2* | *2.6* | *4.1* | *4.0* | *6.1* | *(2.2)* | *(0.3)* | *4.4* |
| | **USD/JPY** | 113.4 | 113.3 | 112.8 | 113.8 | 111.6 | 110.0 | 113.6 | 112.6 | 108.8 | 112.1 | 110.4 |
| | *Change, %* | | *0.0* | *0.5* | *(0.4)* | *1.6* | *3.0* | *(0.2)* | *0.7* | *4.3* | *1.1* | *2.7* |
| | **USD/KRW** | 1,129.9 | 1,126.7 | 1,105.5 | 1,128.1 | 1,125.3 | 1,075.1 | 1,092.1 | 1,066.7 | 1,160.5 | 1,130.9 | 1,099.0 |
| | *Change, %* | | *0.3* | *2.2* | *0.2* | *0.4* | *5.1* | *3.5* | *5.9* | *(2.6)* | *(0.1)* | *2.8* |
| Agriculture | **Corn** | 375.0 | 374.3 | 374.3 | 369.8 | 355.3 | 367.3 | 336.5 | 350.8 | 358.5 | 359.4 | 367.7 |
| | *Change, %* | | *0.2* | *0.2* | *1.4* | *5.6* | *2.1* | *11.4* | *6.9* | *4.6* | *4.4* | *2.0* |
| | **Soybean** | 915.0 | 909.8 | 911.8 | 875.3 | 820.3 | 953.8 | 982.5 | 951.8 | 987.5 | 975.9 | 934.2 |
| | *Change, %* | | *0.6* | *0.4* | *4.5* | *11.6* | *(4.1)* | *(6.9)* | *(3.9)* | *(7.3)* | *(6.2)* | *(2.1)* |
| | **Wheat** | 509.8 | 514.8 | 519.3 | 502.0 | 493.8 | 514.5 | 387.8 | 427.0 | 436.4 | 436.0 | 494.0 |
| | *Change, %* | | *(1.0)* | *(1.8)* | *1.5* | *3.2* | *(0.9)* | *31.5* | *19.4* | *16.8* | *16.9* | *3.2* |
| | **Rice** | 10.6 | 10.7 | 11.0 | 10.6 | 10.6 | 11.6 | 12.2 | 11.7 | 10.3 | 11.1 | 11.6 |
| | *Change, %* | | *(0.2)* | *(3.0)* | *0.5* | *0.0* | *(8.5)* | *(12.9)* | *(8.9)* | *2.9* | *(3.8)* | *(8.3)* |
| | **Oats** | 285.5 | 282.5 | 283.5 | 285.0 | 233.8 | 242.5 | 227.5 | 241.0 | 196.3 | 252.3 | 255.0 |
| | *Change, %* | | *1.1* | *0.7* | *0.2* | *22.1* | *17.7* | *25.5* | *18.5* | *45.5* | *13.2* | *12.0* |
| MYR/mt | **Palm Oil** | 1,805.0 | 1,835.0 | 1,800.0 | 1,880.0 | 2,213.0 | 2,359.0 | 2,350.0 | 2,444.0 | 2,653.8 | 2,787.3 | 2,264.3 |
| | *Change, %* | | *(1.6)* | *0.3* | *(4.0)* | *(18.4)* | *(23.5)* | *(23.2)* | *(26.1)* | *(32.0)* | *(35.2)* | *(20.3)* |
| | **Cocoa** | 2,066.0 | 2,156.0 | 2,105.0 | 2,250.0 | 2,283.0 | 2,372.0 | 1,917.0 | 1,892.0 | 2,854.0 | 2,005.2 | 2,308.2 |
| | *Change, %* | | *(4.2)* | *(1.9)* | *(8.2)* | *(9.5)* | *(12.9)* | *7.8* | *9.2* | *(27.6)* | *3.0* | *(10.5)* |
| | **Cotton** | 80.0 | 79.9 | 78.8 | 78.1 | 83.0 | 94.8 | 73.0 | 78.6 | 65.6 | 73.5 | 82.5 |
| | *Change, %* | | *0.2* | *1.6* | *2.5* | *(3.6)* | *(15.5)* | *9.6* | *1.8* | *22.0* | *8.8* | *(3.0)* |
| | **Sugar** | 12.8 | 12.7 | 12.8 | 12.7 | 11.2 | 12.4 | 14.0 | 15.2 | 18.2 | 15.8 | 12.2 |
| | *Change, %* | | *0.9* | *0.6* | *0.8* | *14.8* | *3.9* | *(8.0)* | *(15.4)* | *(29.3)* | *(18.9)* | *4.7* |
| | **Coffee** | 97.7 | 100.5 | 101.9 | 113.9 | 96.2 | 117.1 | 119.0 | 126.2 | 136.1 | 133.0 | 113.4 |
| | *Change, %* | | *(2.8)* | *(4.2)* | *(14.2)* | *1.5* | *(16.6)* | *(17.9)* | *(22.6)* | *(28.2)* | *(26.6)* | *(13.9)* |
| Energy | **WTI** | 51.7 | 51.0 | 53.3 | 60.2 | 69.3 | 66.1 | 58.0 | 60.4 | 43.4 | 51.0 | 65.8 |
| | *Change, %* | | *1.3* | *(3.0)* | *(14.2)* | *(25.4)* | *(21.9)* | *(10.9)* | *(14.5)* | *19.1* | *1.3* | *(21.5)* |
| | **Brent** | 60.2 | 60.0 | 62.1 | 70.2 | 79.1 | 76.5 | 64.7 | 66.9 | 45.1 | 54.9 | 72.5 |
| | *Change, %* | | *0.4* | *(3.0)* | *(14.2)* | *(23.9)* | *(21.3)* | *(6.9)* | *(10.0)* | *33.5* | *9.8* | *(16.9)* |
| | **Natural Gas** | 4.4 | 4.5 | 4.5 | 3.7 | 2.8 | 2.9 | 2.8 | 3.0 | 2.6 | 3.0 | 3.0 |
| | *Change, %* | | *(3.0)* | *(1.1)* | *18.5* | *55.8* | *49.4* | *55.8* | *49.2* | *72.7* | *45.8* | *44.9* |
| | **Ethanol** | 1.2 | 1.2 | 1.2 | 1.3 | 1.3 | 1.4 | 1.3 | 1.3 | 1.5 | 1.5 | 1.4 |
| | *Change, %* | | *1.1* | *(0.1)* | *(1.7)* | *(4.6)* | *(13.5)* | *(6.2)* | *(6.5)* | *(18.5)* | *(17.6)* | *(10.6)* |
| | **RBOB Gasoline** | 144.0 | 141.9 | 144.3 | 162.1 | 201.4 | 210.5 | 172.7 | 179.9 | 140.0 | 162.9 | 194.8 |
| | *Change, %* | | *1.5* | *(0.2)* | *(11.2)* | *(28.5)* | *(31.6)* | *(16.6)* | *(20.0)* | *2.9* | *(11.6)* | *(26.1)* |
| | **Coal** | 102.2 | 102.7 | 102.9 | 105.9 | 115.7 | 114.4 | 98.1 | 100.8 | 65.5 | 88.2 | 107.4 |
| | *Change, %* | | *(0.5)* | *(0.7)* | *(3.5)* | *(11.7)* | *(10.7)* | *4.2* | *1.3* | *56.0* | *15.8* | *(4.9)* |
| Metal | **Gold** | 1,243.2 | 1,244.5 | 1,238.5 | 1,209.9 | 1,198.6 | 1,300.5 | 1,241.9 | 1,302.6 | 1,248.5 | 1,258.6 | 1,269.8 |
| | *Change, %* | | *(0.1)* | *0.4* | *2.8* | *3.7* | *(4.4)* | *0.1* | *(4.6)* | *(0.4)* | *(1.2)* | *(2.1)* |
| | **Silver** | 14.6 | 14.5 | 14.5 | 14.2 | 14.1 | 16.9 | 15.7 | 16.9 | 17.1 | 17.1 | 15.8 |
| | *Change, %* | | *0.2* | *0.2* | *2.9* | *3.0* | *(14.0)* | *(7.3)* | *(14.1)* | *(14.9)* | *(14.7)* | *(7.6)* |
| | **Copper** | 6,168.0 | 6,089.0 | 6,209.0 | 6,056.0 | 5,859.0 | 7,255.0 | 6,670.0 | 7,247.0 | 4,872.0 | 6,199.4 | 6,572.5 |
| | *Change, %* | | *1.3* | *(0.7)* | *1.8* | *5.3* | *(15.0)* | *(7.5)* | *(14.9)* | *26.6* | *(0.5)* | *(6.2)* |
| | **Nickel** | 777.1 | 782.4 | 786.0 | 829.5 | 887.4 | 1,028.6 | 721.3 | 809.1 | 646.4 | 680.2 | 905.1 |
| | *Change, %* | | *(0.7)* | *(1.1)* | *(6.3)* | *(12.4)* | *(24.5)* | *7.7* | *(4.0)* | *20.2* | *14.2* | *(14.1)* |
| | **Zinc** | 2,590.0 | 2,575.0 | 2,589.0 | 2,523.0 | 2,311.0 | 3,201.0 | 3,125.0 | 3,319.0 | 2,097.5 | 2,888.5 | 2,914.5 |
| | *Change, %* | | *0.6* | *0.0* | *2.7* | *12.1* | *(19.1)* | *(17.1)* | *(22.0)* | *23.5* | *(10.3)* | *(11.1)* |
| | **Lead** | 1,969.5 | 1,943.0 | 1,998.5 | 1,962.0 | 1,946.0 | 2,460.0 | 2,495.5 | 2,482.8 | 1,868.3 | 2,315.7 | 2,258.8 |
| | *Change, %* | | *1.4* | *(1.5)* | *0.4* | *1.2* | *(19.9)* | *(21.1)* | *(20.7)* | *5.4* | *(14.9)* | *(12.8)* |
| | **Aluminum** | 13,585.0 | 13,570.0 | 13,725.0 | 13,870.0 | 14,655.0 | 14,740.0 | 14,085.0 | 15,020.0 | 12,373.5 | 14,556.6 | 14,288.3 |
| | *Change, %* | | *0.1* | *(1.0)* | *(2.1)* | *(7.3)* | *(7.8)* | *(3.5)* | *(9.6)* | *9.8* | *(6.7)* | *(4.9)* |
| | **Cobalt** | 55,000.0 | 55,000.0 | 55,000.0 | 51,000.0 | 61,556.0 | 82,250.0 | 74,750.0 | 75,205.0 | 25,480.1 | 55,906.9 | 73,850.6 |
| | *Change, %* | | *0.0* | *0.0* | *7.8* | *(10.7)* | *(33.1)* | *(26.4)* | *(26.9)* | *115.9* | *(1.6)* | *(25.5)* |
| | **HR Coil** | 760.0 | 760.0 | 771.0 | 812.0 | 863.0 | 910.0 | 641.0 | 662.0 | 519.3 | 620.1 | 833.5 |
| | *Change, %* | | *0.0* | *(1.4)* | *(6.4)* | *(11.9)* | *(16.5)* | *18.6* | *14.8* | *46.3* | *22.6* | *(8.8)* |
| | **Scrap** | 390.0 | 401.0 | 399.0 | 403.0 | 377.0 | 393.0 | 348.0 | 367.0 | 275.7 | 344.7 | 390.7 |
| | *Change, %* | | *(2.7)* | *(2.3)* | *(3.2)* | *3.4* | *(0.8)* | *12.1* | *6.3* | *41.5* | *13.1* | *(0.2)* |

자료: Bloomberg

참고) NYMEX, ICE, LME 중 대표지수를 사용

# SK Energy Daily

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## Refining Price Data

| Daily Price | | 12/11 | 1D | 1W | 1M | 3M | 6M | 12M | YTD | 2015avg. | 2016avg. | 2017acc. |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Crude Oil | **WTI** | 51.7 | 51.0 | 53.3 | 59.9 | 69.3 | 66.4 | 57.1 | 53.7 | 43.4 | 50.9 | 65.8 |
| | *Change, %* | | *1.3* | *(3.0)* | *(13.8)* | *(25.4)* | *(22.2)* | *(9.6)* | *(3.9)* | *19.1* | *1.5* | *(21.6)* |
| | **Dubai** | 58.4 | 60.2 | 61.5 | 70.6 | 76.2 | 74.8 | 62.5 | 53.8 | 41.3 | 53.1 | 70.3 |
| | *Change, %* | | *(3.1)* | *(5.2)* | *(17.3)* | *(23.4)* | *(21.9)* | *(6.6)* | *8.4* | *41.3* | *9.9* | *(17.0)* |
| Crude Oil | **Gasoline(휘발유)** | 60.5 | 62.8 | 62.9 | 72.4 | 88.3 | 85.3 | 77.4 | 69.8 | 56.3 | 68.0 | 81.3 |
| Product | *Change, %* | | *(3.6)* | *(3.7)* | *(16.4)* | *(31.4)* | *(29.0)* | *(21.8)* | *(13.3)* | *7.6* | *(11.0)* | *(25.5)* |
| | **Kerosene(등유)** | 72.6 | 73.9 | 75.3 | 88.8 | 90.6 | 88.5 | 76.7 | 66.4 | 52.9 | 65.2 | 85.7 |
| | *Change, %* | | *(1.8)* | *(3.6)* | *(18.2)* | *(19.9)* | *(17.9)* | *(5.3)* | *9.3* | *37.3* | *11.3* | *(15.3)* |
| | **Diesel(경유)** | 70.3 | 72.4 | 73.9 | 87.9 | 91.7 | 88.5 | 76.6 | 65.5 | 52.1 | 65.6 | 85.2 |
| | *Change, %* | | *(2.9)* | *(4.9)* | *(20.0)* | *(23.3)* | *(20.5)* | *(8.2)* | *7.3* | *34.9* | *7.2* | *(17.4)* |
| | **Bunker-C** | 58.0 | 60.2 | 63.7 | 72.4 | 69.7 | 69.8 | 57.1 | 52.1 | 35.5 | 49.7 | 66.0 |
| | *Change, %* | | *(3.7)* | *(9.0)* | *(19.9)* | *(16.8)* | *(17.0)* | *1.5* | *11.3* | *63.1* | *16.7* | *(12.2)* |
| | **Naphtha** | 51.7 | 54.0 | 55.2 | 58.5 | 73.7 | 71.5 | 66.3 | 53.5 | 42.6 | 53.7 | 68.1 |
| | *Change, %* | | *(4.1)* | *(6.3)* | *(11.6)* | *(29.9)* | *(27.6)* | *(22.0)* | *(3.2)* | *21.4* | *(3.8)* | *(24.0)* |
| Dubai | **Gasoline(휘발유)** | 2.2 | 2.6 | 1.3 | 1.8 | 12.0 | 10.5 | 14.9 | 16.0 | 14.9 | 14.9 | 11.0 |
| Spread | *Change* | | *(0.4)* | *0.8* | *0.3* | *(9.9)* | *(8.3)* | *(12.7)* | *(13.9)* | *(12.8)* | *(12.8)* | *(8.8)* |
| | **Kerosene(등유)** | 14.2 | 13.7 | 13.8 | 18.2 | 14.4 | 13.7 | 14.2 | 12.6 | 11.6 | 12.1 | 15.4 |
| | *Change* | | *0.5* | *0.5* | *(4.0)* | *(0.2)* | *0.5* | *0.0* | *1.6* | *2.7* | *2.1* | *(1.2)* |
| | **Diesel(경유)** | 12.0 | 12.2 | 12.4 | 17.3 | 15.5 | 13.7 | 14.1 | 11.7 | 10.8 | 12.5 | 14.8 |
| | *Change* | | *(0.3)* | *(0.4)* | *(5.3)* | *(3.6)* | *(1.8)* | *(2.1)* | *0.3* | *1.1* | *(0.6)* | *(2.9)* |
| | **Bunker-C** | (0.4) | (0.0) | 2.2 | 1.8 | (6.5) | (5.0) | (5.5) | (1.8) | (5.8) | (3.4) | (4.3) |
| | *Change* | | *(0.4)* | *(2.6)* | *(2.2)* | *6.1* | *4.5* | *5.0* | *1.4* | *5.4* | *3.0* | *3.9* |
| | **Naphtha** | (6.7) | (6.3) | (6.4) | (12.1) | (2.5) | (3.3) | 3.8 | (0.4) | 1.3 | 0.6 | (2.2) |
| | *Change* | | *(0.4)* | *(0.3)* | *5.5* | *(4.2)* | *(3.4)* | *(10.5)* | *(6.3)* | *(7.9)* | *(7.3)* | *(4.4)* |
| Refining | **Simple(단순)** | 2.6 | 2.8 | 3.7 | 4.7 | 1.6 | 1.6 | 2.7 | 3.8 | 1.9 | 3.2 | 2.6 |
| Margin | *Change* | | *(0.2)* | *(1.1)* | *(2.1)* | *1.0* | *1.0* | *(0.1)* | *(1.2)* | *0.7* | *(0.6)* | *(0.0)* |
| | **Complex(복합)** | 4.5 | 4.8 | 5.0 | 6.6 | 7.3 | 6.5 | 8.3 | 8.3 | 7.0 | 8.0 | 7.4 |
| | *Change* | | *(0.3)* | *(0.5)* | *(2.1)* | *(2.8)* | *(1.9)* | *(3.8)* | *(3.7)* | *(2.4)* | *(3.5)* | *(2.8)* |
| | **Complex(lagging)** | (8.6) | (5.6) | (6.8) | (5.9) | 10.2 | 6.5 | 9.2 | 18.0 | 8.5 | 8.9 | 7.5 |
| | *Change* | | *(3.0)* | *(1.8)* | *(2.8)* | *(18.9)* | *(15.1)* | *(17.9)* | *(26.6)* | *(17.1)* | *(17.6)* | *(16.1)* |

자료 : Petronet, SK증권
참고 1) Crude Oil 가격은 현물(spot) 기준으로 선물(future) 가격과 다를 수 있음
참고 2) Gasoline은 95RON, 경유는 L/P 0.5%, Bunker-C는 380cst/4.0% 기준임

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## Petrochemical Price Data

| Daily Price | | | 12/11 | 12/10 | 12/07 | 12/06 | 12/05 | 12/04 | 12/03 | 11/30 | 11/29 | 11/28 |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Spot Price | **Naphtha** | CFR Japan | 486.3 | 505.0 | 492.0 | 490.5 | 491.5 | 512.8 | 511.3 | 489.8 | 472.3 | 487.8 |
| | **Ethylene** | CFR SE Asia | 760.0 | 760.0 | 760.0 | 770.0 | 790.0 | 830.0 | 850.0 | 860.0 | 910.0 | 920.0 |
| | **Propylene** | FOB Korea | 875.0 | 875.0 | 875.0 | 855.0 | 855.0 | 855.0 | 845.0 | 835.0 | 835.0 | 835.0 |
| | **Butadiene** | FOB Korea | 1,090.0 | 1,090.0 | 1,090.0 | 1,090.0 | 1,090.0 | 1,075.0 | 1,075.0 | 1,075.0 | 1,070.0 | 1,070.0 |
| | **HDPE** | CFR FE Asia | 1,070.0 | 1,070.0 | 1,070.0 | 1,070.0 | 1,070.0 | 1,020.0 | 1,030.0 | 1,030.0 | 1,035.0 | 1,040.0 |
| | **LDPE** | CFR FE Asia | 1,030.0 | 1,020.0 | 1,020.0 | 1,020.0 | 1,020.0 | 980.0 | 990.0 | 990.0 | 990.0 | 990.0 |
| | **LLDPE** | CFR FE Asia | 1,020.0 | 1,010.0 | 1,010.0 | 1,000.0 | 990.0 | 980.0 | 980.0 | 980.0 | 980.0 | 980.0 |
| | **MEG** | CFR China | 675.0 | 697.0 | 710.0 | 730.0 | 738.0 | 730.0 | 705.0 | 680.0 | 684.0 | 684.0 |
| | **PP** | CFR FE Asia | 1,050.0 | 1,050.0 | 1,045.0 | 1,045.0 | 1,045.0 | 1,010.0 | 1,020.0 | 1,030.0 | 1,030.0 | 1,040.0 |
| | **PX** | CFR China | 1,037.7 | 1,056.0 | 1,048.0 | 1,033.0 | 1,030.3 | 1,008.0 | 984.3 | 983.0 | 979.3 | 988.0 |
| | **PTA** | CFR China | 848.0 | 848.0 | 850.0 | 845.0 | 840.0 | 840.0 | 839.0 | 839.0 | 840.0 | 840.0 |
| | **Benzene** | FOB Korea | 595.7 | 616.0 | 616.0 | 636.3 | 642.7 | 644.0 | 641.0 | 634.0 | 641.3 | 661.3 |
| | **Toluene** | FOB Korea | 588.0 | 593.0 | 594.0 | 596.0 | 597.0 | 595.0 | 580.0 | 596.0 | 596.0 | 597.0 |
| | **Xylene** | FOB Korea | 669.0 | 685.0 | 684.0 | 688.0 | 699.0 | 698.0 | 696.0 | 680.0 | 686.0 | 693.0 |
| | **SM** | FOB Korea | 955.0 | 982.0 | 980.0 | 988.0 | 1,002.0 | 1,003.0 | 962.0 | 938.5 | 956.5 | 970.5 |

| Weekly Price | | | Last Week | 1W | 1M | 3M | 6M | 12M | YTD | 2016avg. | 2017avg. | 2018acc. |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Spot Price | **Naphtha** | CFR Japan | 488.5 | 487.0 | 543.0 | 667.0 | 635.5 | 590.5 | 484.5 | 399.5 | 493.5 | 621.7 |
| | *Change, %* | | | *0.3* | *(10.0)* | *(26.8)* | *(23.1)* | *(17.3)* | *0.8* | *22.3* | *(1.0)* | *(21.4)* |
| | **Ethylene** | CFR SE Asia | 780.0 | 855.0 | 850.0 | 1,137.5 | 1,275.0 | 1,212.5 | 990.0 | 1,040.9 | 1,090.9 | 1,163.5 |
| | *Change, %* | | | *(8.8)* | *(8.2)* | *(31.4)* | *(38.8)* | *(35.7)* | *(21.2)* | *(25.1)* | *(28.5)* | *(33.0)* |
| | **Propylene** | CFR SE Asia | 840.0 | 775.0 | 970.0 | 1,030.0 | 1,037.5 | 850.0 | 815.0 | 705.7 | 823.6 | 1,052.9 |
| | *Change, %* | | | *8.4* | *(13.4)* | *(18.4)* | *(19.0)* | *(1.2)* | *3.1* | *19.0* | *2.0* | *(20.2)* |
| | **Butadiene** | CFR SE Asia | 1,100.0 | 1,075.0 | 1,075.0 | 1,550.0 | 1,700.0 | 1,075.0 | 2,100.0 | 1,116.8 | 1,481.1 | 1,401.9 |
| | *Change, %* | | | *2.3* | *2.3* | *(29.0)* | *(35.3)* | *2.3* | *(47.6)* | *(1.5)* | *(25.7)* | *(21.5)* |
| | **Benzene** | CFR SE Asia | 620.0 | 637.5 | 690.0 | 870.0 | 877.5 | 905.0 | 822.5 | 646.7 | 838.8 | 839.0 |
| | *Change, %* | | | *(2.7)* | *(10.1)* | *(28.7)* | *(29.3)* | *(31.5)* | *(24.6)* | *(4.1)* | *(26.1)* | *(26.1)* |
| | **Toluene** | CFR SE Asia | 640.0 | 655.0 | 800.0 | 830.0 | 830.0 | 720.0 | 690.0 | 630.5 | 689.5 | 782.0 |
| | *Change, %* | | | *(2.3)* | *(20.0)* | *(22.9)* | *(22.9)* | *(11.1)* | *(7.2)* | *1.5* | *(7.2)* | *(18.2)* |
| | **Xylene** | CFR SE Asia | 720.0 | 735.0 | 875.0 | 870.0 | 840.0 | 695.0 | 675.0 | 627.7 | 668.8 | 810.2 |
| | *Change, %* | | | *(2.0)* | *(17.7)* | *(17.2)* | *(14.3)* | *3.6* | *6.7* | *14.7* | *7.7* | *(11.1)* |
| Spread | **Ethylene** | -Naphtha | 291.5 | 368.0 | 307.0 | 470.5 | 639.5 | 622.0 | 505.5 | 641.4 | 597.4 | 541.8 |
| | *Change, %* | | | *(20.8)* | *(5.0)* | *(38.0)* | *(54.4)* | *(53.1)* | *(42.3)* | *(54.6)* | *(51.2)* | *(46.2)* |
| | **Propylene** | -Naphtha | 351.5 | 288.0 | 427.0 | 363.0 | 402.0 | 259.5 | 330.5 | 306.2 | 330.1 | 431.2 |
| | *Change, %* | | | *22.0* | *(17.7)* | *(3.2)* | *(12.6)* | *35.5* | *6.4* | *14.8* | *6.5* | *(18.5)* |
| | **Butadiene** | -Naphtha | 611.5 | 588.0 | 532.0 | 883.0 | 1,064.5 | 484.5 | 1,615.5 | 717.3 | 987.6 | 780.2 |
| | *Change, %* | | | *4.0* | *14.9* | *(30.7)* | *(42.6)* | *26.2* | *(62.1)* | *(14.8)* | *(38.1)* | *(21.6)* |
| | **Benzene** | -Naphtha | 131.5 | 150.5 | 147.0 | 203.0 | 242.0 | 314.5 | 338.0 | 247.2 | 345.3 | 217.3 |
| | *Change, %* | | | *(12.6)* | *(10.5)* | *(35.2)* | *(45.7)* | *(58.2)* | *(61.1)* | *(46.8)* | *(61.9)* | *(39.5)* |
| | **Toluene** | -Naphtha | 151.5 | 168.0 | 257.0 | 163.0 | 194.5 | 129.5 | 205.5 | 231.0 | 196.0 | 160.3 |
| | *Change, %* | | | *(9.8)* | *(41.1)* | *(7.1)* | *(22.1)* | *17.0* | *(26.3)* | *(34.4)* | *(22.7)* | *(5.5)* |
| | **Xylene** | -Naphtha | 231.5 | 248.0 | 332.0 | 203.0 | 204.5 | 104.5 | 190.5 | 228.2 | 175.3 | 188.4 |
| | *Change, %* | | | *(6.7)* | *(30.3)* | *14.0* | *13.2* | *121.5* | *21.5* | *1.4* | *32.0* | *22.8* |

자료 : Cischem, Platts, Bloomberg, SK증권
참고 : Spread는 Polymer와 Naphtha의 가격차이임

# SK Energy Daily

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| Weekly Price | | | Last Week | 1W | 1M | 3M | 6M | 12M | YTD | 2016avg. | 2017avg. | 2018acc. |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Spot Price | **HDPE** | CFR SE Asia | 997.5 | 1,047.5 | 1,147.5 | 1,192.5 | 1,222.5 | 1,207.5 | 1,142.5 | 1,134.6 | 1,142.5 | 1,220.2 |
| | *Change, %* | | | (4.8) | (13.1) | (16.4) | (18.4) | (17.4) | (12.7) | (12.1) | (12.7) | (18.3) |
| | **MEG** | CFR SE Asia | 720.0 | 690.0 | 737.5 | 970.0 | 970.0 | 915.0 | 847.5 | 660.8 | 850.6 | 930.2 |
| | *Change, %* | | | 4.3 | (2.4) | (25.8) | (25.8) | (21.3) | (15.0) | 9.0 | (15.4) | (22.6) |
| | **PVC** | CFR SE Asia | 860.0 | 860.0 | 850.0 | 950.0 | 945.0 | 855.0 | 920.0 | 823.4 | 899.9 | 922.3 |
| | *Change, %* | | | 0.0 | 1.2 | (9.5) | (9.0) | 0.6 | (6.5) | 4.4 | (4.4) | (6.8) |
| | **PP** | CFR SE Asia | 1,057.5 | 1,127.5 | 1,232.5 | 1,237.5 | 1,232.5 | 1,157.5 | 1,032.5 | 978.4 | 1,099.6 | 1,244.6 |
| | *Change, %* | | | (6.2) | (14.2) | (14.5) | (14.2) | (8.6) | 2.4 | 8.1 | (3.8) | (15.0) |
| | **2-EH** | CFR Korea | 1,050.0 | 1,080.0 | 1,155.0 | 1,130.0 | 1,120.0 | 1,020.0 | 865.0 | 772.4 | 970.0 | 1,121.8 |
| | *Change, %* | | | (2.8) | (9.1) | (7.1) | (6.3) | 2.9 | 21.4 | 35.9 | 8.2 | (6.4) |
| | **ABS** | CFR SE Asia | 1,465.0 | 1,460.0 | 1,600.0 | 1,880.0 | 1,960.0 | 2,030.0 | 1,635.0 | 1,347.1 | 1,844.7 | 1,920.1 |
| | *Change, %* | | | 0.3 | (8.4) | (22.1) | (25.3) | (27.8) | (10.4) | 8.8 | (20.6) | (23.7) |
| | **SBR** | CFR SE Asia | 1,395.0 | 1,400.0 | 1,520.0 | 1,875.0 | 1,830.0 | 1,650.0 | 2,000.0 | 1,483.0 | 1,980.5 | 1,712.9 |
| | *Change, %* | | | (0.4) | (8.2) | (25.6) | (23.8) | (15.5) | (30.3) | (5.9) | (29.6) | (18.6) |
| | **SM** | CFR SE Asia | 1,022.5 | 992.5 | 1,100.0 | 1,447.5 | 1,475.0 | 1,352.5 | 1,205.0 | 1,064.6 | 1,253.8 | 1,360.6 |
| | *Change, %* | | | 3.0 | (7.0) | (29.4) | (30.7) | (24.4) | (15.1) | (4.0) | (18.4) | (24.8) |
| | **Caustic** | FOB NEA | 300.0 | 324.0 | 324.0 | 440.0 | 369.0 | 699.5 | 422.5 | 316.6 | 491.2 | 490.5 |
| | *Change, %* | | | (7.4) | (7.4) | (31.8) | (18.7) | (57.1) | (29.0) | (5.2) | (38.9) | (38.8) |
| | **PX** | CFR SE Asia | 1,055.0 | 995.0 | 1,120.0 | 1,315.0 | 1,117.5 | 895.0 | 855.0 | 790.4 | 844.4 | 1,059.1 |
| | *Change, %* | | | 6.0 | (5.8) | (19.8) | (5.6) | 17.9 | 23.4 | 33.5 | 24.9 | (0.4) |
| | **PO** | CFR China | 1,462.5 | 1,500.0 | 1,717.5 | 1,960.0 | 1,815.0 | 1,765.0 | 1,562.5 | 1,396.8 | 1,601.2 | 1,842.1 |
| | *Change, %* | | | (2.5) | (14.8) | (25.4) | (19.4) | (17.1) | (6.4) | 4.7 | (8.7) | (20.6) |
| | **Caprolactam** | CFR SE Asia | 1,650.0 | 1,870.0 | 2,080.0 | 2,130.0 | 2,155.0 | 2,050.0 | 1,850.0 | 1,344.9 | 1,936.4 | 2,113.6 |
| | *Change, %* | | | (11.8) | (20.7) | (22.5) | (23.4) | (19.5) | (10.8) | 22.7 | (14.8) | (21.9) |
| | **PTA** | CFR SE Asia | 860.0 | 845.0 | 930.0 | 1,080.0 | 920.0 | 725.0 | 642.5 | 613.7 | 667.8 | 871.7 |
| | *Change, %* | | | 1.8 | (7.5) | (20.4) | (6.5) | 18.6 | 33.9 | 40.1 | 28.8 | (1.3) |
| Spread | **HDPE** | | 509.0 | 560.5 | 604.5 | 525.5 | 587.0 | 617.0 | 658.0 | 735.1 | 649.0 | 598.5 |
| | *Change, %* | | | (9.2) | (15.8) | (3.1) | (13.3) | (17.5) | (22.6) | (30.8) | (21.6) | (15.0) |
| | **MEG** | | 231.5 | 203.0 | 194.5 | 303.0 | 334.5 | 324.5 | 363.0 | 261.3 | 357.1 | 308.4 |
| | *Change, %* | | | 14.0 | 19.0 | (23.6) | (30.8) | (28.7) | (36.2) | (11.4) | (35.2) | (24.9) |
| | **PVC** | | 371.5 | 373.0 | 307.0 | 283.0 | 309.5 | 264.5 | 435.5 | 423.9 | 406.4 | 300.6 |
| | *Change, %* | | | (0.4) | 21.0 | 31.3 | 20.0 | 40.5 | (14.7) | (12.4) | (8.6) | 23.6 |
| | **PP** | | 569.0 | 640.5 | 689.5 | 570.5 | 597.0 | 567.0 | 548.0 | 578.9 | 606.1 | 622.9 |
| | *Change, %* | | | (11.2) | (17.5) | (0.3) | (4.7) | 0.4 | 3.8 | (1.7) | (6.1) | (8.7) |
| | **2-EH** | | 561.5 | 593.0 | 612.0 | 463.0 | 484.5 | 429.5 | 380.5 | 372.9 | 476.5 | 500.1 |
| | *Change, %* | | | (5.3) | (8.3) | 21.3 | 15.9 | 30.7 | 47.6 | 50.6 | 17.8 | 12.3 |
| | **ABS** | | 976.5 | 973.0 | 1,057.0 | 1,213.0 | 1,324.5 | 1,439.5 | 1,150.5 | 947.6 | 1,351.2 | 1,298.4 |
| | *Change, %* | | | 0.4 | (7.6) | (19.5) | (26.3) | (32.2) | (15.1) | 3.0 | (27.7) | (24.8) |
| | **SBR** | BD spread | 295.0 | 325.0 | 445.0 | 325.0 | 130.0 | 575.0 | (100.0) | 366.2 | 499.4 | 310.9 |
| | *Change, %* | | | (9.2) | (33.7) | (9.2) | 126.9 | (48.7) | (395.0) | (19.4) | (40.9) | (5.1) |
| | **SM** | | 534.0 | 505.5 | 557.0 | 780.5 | 839.5 | 762.0 | 720.5 | 665.1 | 760.3 | 738.9 |
| | *Change, %* | | | 5.6 | (4.1) | (31.6) | (36.4) | (29.9) | (25.9) | (19.7) | (29.8) | (27.7) |
| | **Caustic** | | | | | | | | | | | |
| | *Change, %* | | | | | | | | | | | |
| | **PX** | | 566.5 | 508.0 | 577.0 | 648.0 | 482.0 | 304.5 | 370.5 | 390.9 | 351.0 | 437.4 |
| | *Change, %* | | | 11.5 | (1.8) | (12.6) | 17.5 | 86.0 | 52.9 | 44.9 | 61.4 | 29.5 |
| | **PO** | propylene sprea | 622.5 | 725.0 | 747.5 | 930.0 | 777.5 | 915.0 | 747.5 | 691.1 | 777.6 | 789.3 |
| | *Change, %* | | | (14.1) | (16.7) | (33.1) | (19.9) | (32.0) | (16.7) | (9.9) | (19.9) | (21.1) |
| | **Caprolactam** | benzene spread | 1,030.0 | 1,232.5 | 1,390.0 | 1,260.0 | 1,277.5 | 1,145.0 | 1,027.5 | 698.2 | 1,097.6 | 1,274.6 |
| | *Change, %* | | | (16.4) | (25.9) | (18.3) | (19.4) | (10.0) | 0.2 | 47.5 | (6.2) | (19.2) |
| | **PTA** | px spread | 121.5 | 148.5 | 146.0 | 159.5 | 137.8 | 98.5 | 44.0 | 60.4 | 76.7 | 130.3 |
| | *Change, %* | | | (18.2) | (16.8) | (23.8) | (11.8) | 23.4 | 176.1 | 101.1 | 58.4 | (6.8) |

자료 : Cischem, Platts, SK증권

참고 : Spread는 Naphtha spread로 일괄적용

에너지/Commodity/정유화학. 손지우 | 3773-8827, jwshon@sk.com
R.A. 유승우 | 3773-9180, yswbest@sk.com


## Global peers

| | Currency | 12/11 | 1D | 1W | 1M | 3M | 6M | 12M | YTD | MKT CAP (mil USD) | PER 18E | PER 19E | PBR 18E | PBR 19E | EV/EBITDA 18E | EV/EBITDA 19E |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| ***Petrochemical*** | | | | | | | | | | | | | | | | |
| DowDuPont | USD | 53.3 | (1.0) | (5.7) | (9.2) | (24.0) | (23.4) | (24.8) | (25.2) | 168,245 | 17.7 | 14.9 | 1.8 | 1.7 | 10.2 | 9.2 |
| Eastman | USD | 72.6 | (0.2) | (6.6) | (12.4) | (24.3) | (33.7) | (21.8) | (21.7) | 13,550 | 11.6 | 10.7 | 2.5 | 2.2 | 8.7 | 8.1 |
| BASF | EUR | 59.1 | 0.2 | (6.2) | (14.0) | (22.6) | (32.7) | (37.1) | (35.6) | 101,214 | 14.6 | 13.6 | 2.4 | 2.2 | 7.8 | 7.4 |
| Akzo Nobel | EUR | 70.7 | 0.4 | (4.5) | (5.1) | (12.4) | (7.8) | (5.2) | (3.2) | 22,073 | 17.0 | 15.8 | 3.0 | 2.8 | 9.3 | 8.8 |
| Arkema | EUR | 77.4 | 1.4 | (6.9) | (18.4) | (25.7) | (24.6) | (24.0) | (23.7) | 9,270 | 13.2 | 12.2 | 1.7 | 1.6 | 6.3 | 6.0 |
| Lanxess | EUR | 42.1 | (2.1) | (14.6) | (24.9) | (36.1) | (40.7) | (33.7) | (36.5) | 7,282 | 15.5 | 13.1 | 2.1 | 1.9 | 9.3 | 8.2 |
| Sumitomo Chemical | JPY | 560 | (3.4) | (10.0) | (8.5) | (7.6) | (14.4) | (29.1) | (30.9) | 11,911 | 10.1 | 10.5 | 1.3 | 1.2 | 7.4 | 8.0 |
| Mitsubishi Chemical | JPY | 834 | (2.3) | (9.4) | (11.2) | (12.5) | (16.7) | (33.5) | (32.6) | 16,544 | 9.2 | 8.7 | 1.3 | 1.2 | 6.3 | 6.1 |
| Shin-Etsu Chemical | JPY | 9,216 | (1.1) | (6.9) | (9.2) | (5.6) | (17.0) | (23.6) | (19.5) | 43,948 | 18.5 | 16.6 | 1.9 | 1.8 | 8.1 | 7.4 |
| Asahi Kasei | JPY | 1,122 | (2.1) | (7.7) | (9.0) | (28.7) | (26.0) | (21.6) | (22.8) | 18,109 | 14.4 | 13.6 | 1.5 | 1.4 | 7.4 | 7.0 |
| JSR | JPY | 1,685 | (1.6) | (6.7) | (5.3) | (15.5) | (17.1) | (27.2) | (24.0) | 4,455 | 14.5 | 13.4 | 1.2 | 1.1 | 7.7 | 7.2 |
| Nitto Denko | JPY | 5,618 | (1.2) | (7.1) | (8.7) | (30.0) | (35.9) | (45.6) | (43.9) | 15,450 | 15.7 | 14.6 | 2.1 | 1.9 | 7.3 | 7.0 |
| SABIC | SAR | 118.4 | (1.2) | (2.3) | (4.2) | (1.2) | (6.2) | 17.1 | 16.7 | 80,773 | 14.2 | 13.7 | 1.7 | 1.7 | 7.3 | 7.1 |
| Yansab | SAR | 67.0 | 0.4 | (3.6) | (0.7) | (6.3) | (8.0) | 16.4 | 13.6 | 8,861 | 13.7 | 13.9 | 2.2 | 1.9 | 9.0 | 8.9 |
| Formosa Plastics | TWD | 98.5 | (1.0) | (3.0) | (2.5) | (11.3) | (9.6) | 6.0 | (0.2) | 21,114 | 14.4 | 13.9 | 1.8 | 1.8 | 18.9 | 19.2 |
| Formosa Fiber | TWD | 104.5 | (0.5) | (2.3) | (2.8) | (11.8) | (9.9) | 11.4 | 1.5 | 20,511 | 13.7 | 13.4 | 1.7 | 1.7 | 11.6 | 11.5 |
| Nan Ya Plastics | TWD | 72.5 | (0.1) | (2.3) | (5.4) | (13.7) | (14.7) | (2.3) | (6.9) | 20,648 | 14.8 | 15.3 | 1.7 | 1.7 | 16.2 | 16.4 |
| Sinopec Shanghai | CNY | 5.04 | 0.2 | (1.0) | (2.9) | (9.2) | (11.7) | (21.4) | (20.4) | 9,462 | 12.0 | 12.6 | 2.2 | 2.0 | 6.8 | 7.3 |
| Sinopec Yizheng(Fibe | CNY | 1.91 | 0.0 | (1.5) | (2.1) | (3.0) | (5.9) | (32.3) | (28.5) | 5,394 | 50.4 | 66.3 | 5.3 | 5.0 | 13.9 | 10.3 |
| Reliance | INR | 1,098 | 0.7 | (4.8) | 0.4 | (11.3) | 11.7 | 19.8 | 20.6 | 93,404 | 14.4 | 12.9 | 1.7 | 1.5 | 9.4 | 8.7 |
| Industries Qatar | QAR | 136.0 | (0.7) | (2.2) | (3.1) | 7.2 | 23.1 | 52.0 | 40.2 | 16,144 | 14.5 | 13.9 | 1.6 | 1.5 | 46.4 | 27.2 |
| PTT Chemical | THB | 78.5 | (0.9) | (3.1) | (0.6) | 1.9 | (10.5) | (4.6) | (7.6) | 11,766 | 10.7 | 10.4 | 1.4 | 1.3 | 5.5 | 5.4 |
| Petronas | MYR | 9.2 | (0.1) | 0.3 | (4.3) | (2.7) | 9.5 | 23.9 | 19.2 | 15,624 | 16.1 | 15.5 | 2.0 | 1.9 | 9.2 | 8.9 |
| LG화학 | KRW | 349,500 | 1.3 | (2.5) | 6.7 | 2.5 | (7.3) | (12.6) | (13.7) | 27,313 | 13.8 | 12.8 | 1.8 | 1.6 | 6.5 | 6.1 |
| 롯데케미칼 | KRW | 265,500 | (0.2) | (7.0) | (5.7) | (7.7) | (30.3) | (27.2) | (27.9) | 11,632 | 5.5 | 5.2 | 0.9 | 0.8 | 3.6 | 3.3 |
| 한화케미칼 | KRW | 19,850 | 3.7 | 4.2 | 12.1 | 5.6 | (23.4) | (36.6) | (37.2) | 5,050 | 5.7 | 5.5 | 0.8 | 0.7 | 6.7 | 6.5 |
| 금호석유 | KRW | 83,800 | 0.8 | (10.2) | (4.1) | (17.4) | (17.0) | (7.1) | (15.8) | 2,969 | 14.1 | 11.9 | 1.6 | 1.5 | 9.3 | 8.4 |
| SKC | KRW | 34,500 | (1.8) | (4.7) | (1.4) | (26.8) | (15.4) | (19.0) | (26.6) | 1,643 | 9.9 | 8.7 | 1.1 | 1.0 | 8.8 | 7.9 |
| 국도화학 | KRW | 46,150 | 2.7 | (1.4) | (2.6) | (15.8) | (31.8) | (32.5) | (26.9) | 359 | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A |
| 효성 | KRW | 4,405 | (3.5) | (11.6) | (9.2) | (33.6) | (41.9) | (43.7) | (41.9) | 4,595 | 8.2 | 7.3 | 1.1 | 1.0 | 7.2 | 6.8 |
| **Average** | | | **(0.4)** | **(5.0)** | **(5.6)** | **(13.3)** | **(16.3)** | **(14.0)** | **(15.4)** | | | | | | | |
| ***Refinery*** | | | | | | | | | | | | | | | | |
| Valero | USD | 73.3 | (0.1) | (7.8) | (16.3) | (36.3) | (39.2) | (16.0) | (20.3) | 40,608 | 14.1 | 13.4 | 2.0 | 2.0 | 6.9 | 6.9 |
| Conoco Phillips | USD | 65.4 | 0.4 | (2.2) | (1.9) | (8.4) | (7.2) | 26.6 | 19.2 | 66,136 | 34.0 | 25.9 | 2.2 | 2.2 | 7.2 | 6.7 |
| Formosa Petrochemic | TWD | 112.0 | (0.9) | (0.4) | (4.3) | (10.8) | (9.3) | 2.8 | (3.0) | 37,040 | 18.2 | 18.7 | 3.2 | 3.2 | 11.7 | 12.1 |
| Andeavor | USD | 153.5 | 0.0 | 0.0 | 0.0 | (0.9) | 7.4 | 38.3 | 34.2 | 17,904 | 12.9 | 11.4 | 1.8 | 1.7 | 7.3 | 7.1 |
| Marathon Petroleum | USD | 61.3 | 0.6 | (3.2) | (8.7) | (26.6) | (21.1) | (4.8) | (7.0) | 32,812 | 15.0 | 12.8 | 2.6 | 2.7 | 7.7 | 7.5 |
| Devon Energy | USD | 26.8 | 1.8 | (5.0) | (19.0) | (35.5) | (36.7) | (30.5) | (35.4) | 22,192 | 17.5 | 14.0 | 2.7 | 2.3 | 8.4 | 7.4 |
| Hollyfrontier | USD | 55.1 | 0.3 | (5.2) | (14.8) | (23.2) | (27.8) | 18.2 | 7.6 | 9,094 | 16.8 | 15.2 | 1.8 | 1.8 | 8.0 | 8.0 |
| Phillips 66 | USD | 88.4 | (0.5) | (3.3) | (11.3) | (21.4) | (24.4) | (11.3) | (12.6) | 51,561 | 15.6 | 14.5 | 2.3 | 2.2 | 9.0 | 8.8 |
| Murphy Oil | USD | 28.1 | (2.1) | (9.4) | (9.5) | (9.2) | (18.6) | (2.7) | (9.6) | 5,548 | 162.4 | 113.2 | 1.2 | 1.1 | 4.9 | 4.5 |
| JX Holdings | JPY | 602.7 | (6.7) | (11.8) | (18.7) | (18.3) | (17.1) | (10.9) | (17.1) | 22,130 | 8.8 | 8.0 | 0.9 | 0.9 | 7.0 | 6.6 |
| Idemitsu | JPY | 3,580.0 | (8.3) | (12.0) | (26.7) | (36.5) | (4.8) | (12.1) | (20.9) | 8,360 | 7.9 | 7.5 | 1.0 | 0.9 | 6.8 | 6.8 |
| Nesteoil | EUR | 68.4 | 0.9 | (3.0) | (3.7) | (6.1) | (3.1) | 31.8 | 28.2 | 16,473 | 16.7 | 16.7 | 2.9 | 2.7 | 10.2 | 10.3 |
| Ashland | USD | 75.3 | 0.0 | (7.1) | (10.0) | (10.7) | (5.4) | 6.5 | 5.8 | 4,550 | 21.6 | 18.7 | 1.3 | 1.3 | 10.2 | 9.6 |
| Fuchs Petrolub | EUR | 35.7 | 2.7 | (1.5) | (12.5) | (26.6) | (22.4) | (18.7) | (19.3) | 7,127 | 22.1 | 20.9 | 4.1 | 3.7 | 13.0 | 12.3 |
| SK이노베이션 | KRW | 181,500 | (1.4) | (8.8) | (9.3) | (10.4) | (15.4) | (10.1) | (11.2) | 17,975 | 7.9 | 7.7 | 0.9 | 0.9 | 4.9 | 4.8 |
| S-Oil | KRW | 105,500 | (0.9) | (7.0) | (8.3) | (16.3) | (5.8) | (11.3) | (9.8) | 12,400 | 9.3 | 8.1 | 1.8 | 1.6 | 7.6 | 6.6 |
| GS | KRW | 51,700 | 1.0 | (1.1) | 1.6 | (2.5) | (13.3) | (13.1) | (16.9) | 5,467 | 6.0 | 5.5 | 0.7 | 0.6 | 6.9 | 6.3 |
| **Average** | | | **(0.8)** | **(5.2)** | **(10.2)** | **(17.6)** | **(15.5)** | **(1.0)** | **(5.2)** | | | | | | | |

* Bloomberg 기준 / valuation multiple 또한 Bloomberg consensus 기준임
* 국내업체의 multiple은 Dataguidepro 기준임

에너지/Commodity/정유화학. 손지우 | 3773-8827, jwshon@sk.com
R.A. 유승우 | 3773-9180, yswbest@sk.com


## Global peers

| | Currency | 12/11 | 1D | 1W | 1M | 3M | 6M | 12M | YTD | MKT CAP (mil USD) | PER 18E | PER 19E | PBR 18E | PBR 19E | EV/EBITDA 18E | EV/EBITDA 19E |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| ***E&P/Shale*** | | | | | | | | | | | | | | | | |
| Exxon Mobil | USD | 77 | 0.2 | (3.5) | (5.2) | (7.5) | (7.7) | (7.6) | (8.3) | 324,648 | 16.3 | 14.0 | 1.7 | 1.6 | 7.3 | 6.3 |
| BP | GBP | 517 | 1.5 | (3.8) | (1.4) | (5.0) | (11.9) | 3.6 | (1.1) | 129,728 | 10.8 | 10.4 | 1.3 | 1.2 | 4.5 | 4.2 |
| Shell | EUR | 2,339 | 0.9 | (3.2) | (3.3) | (4.9) | (11.1) | (2.0) | (5.7) | 241,668 | 10.8 | 9.2 | 1.2 | 1.2 | 5.2 | 4.8 |
| Chevron | USD | 115 | 0.5 | (1.5) | (3.4) | 0.4 | (9.5) | (4.1) | (7.8) | 220,637 | 13.8 | 12.5 | 1.4 | 1.4 | 5.7 | 5.2 |
| Total | EUR | 48 | 0.9 | (3.5) | (5.4) | (9.8) | (9.5) | 1.4 | 3.7 | 145,175 | 9.9 | 8.8 | 1.1 | 1.1 | 5.0 | 4.6 |
| Sinopec | CNY | 6 | (1.2) | (2.8) | (4.7) | (13.7) | (7.7) | (3.0) | (4.6) | 101,715 | 9.1 | 9.0 | 0.9 | 0.9 | 3.4 | 3.4 |
| Petrochina | CNY | 8 | (0.5) | (1.9) | (6.3) | (8.0) | (2.4) | (6.3) | (6.3) | 192,171 | 21.7 | 19.0 | 1.1 | 1.1 | 5.0 | 4.8 |
| CNOOC | CNY | 9 | (1.1) | (2.2) | (5.5) | (14.7) | (9.6) | (10.9) | (11.1) | 72,767 | 8.7 | 7.8 | 1.2 | 1.1 | 3.5 | 3.3 |
| Gazprom | RUB | 159 | (1.5) | (3.4) | 3.5 | 4.1 | 11.5 | 17.8 | 21.5 | 56,518 | 2.8 | 2.9 | 0.3 | 0.3 | 2.5 | 2.5 |
| Rosneft | RUB | 426 | (0.7) | (3.1) | (9.2) | (5.2) | 10.7 | 43.0 | 46.0 | 67,890 | 6.5 | 5.4 | 1.1 | 1.0 | 4.0 | 3.8 |
| Anadarko | USD | 52 | 1.1 | (2.5) | (11.3) | (17.5) | (28.0) | 6.9 | (3.7) | 26,041 | 19.1 | 13.9 | 2.2 | 2.0 | 5.6 | 4.9 |
| Petrobras | BRL | 23 | (0.6) | (8.1) | (8.5) | 25.9 | 51.1 | 51.4 | 44.7 | 83,401 | 7.7 | 6.3 | 1.1 | 0.9 | 4.8 | 4.2 |
| Lukoil | USD | 5,267 | 1.8 | 1.1 | 3.4 | 11.9 | 26.6 | 53.4 | 58.0 | 58,470 | 5.8 | 5.8 | 0.9 | 0.8 | N/A | N/A |
| Kinder | USD | 16 | 0.5 | (3.4) | (8.0) | (10.5) | (6.0) | (10.2) | (10.8) | 47,497 | 19.9 | 15.7 | 1.0 | 1.1 | 9.7 | 9.6 |
| Equinor ASA | NOK | 197 | 0.1 | (3.8) | (5.5) | (8.3) | (9.9) | 16.7 | 12.4 | 76,629 | 11.0 | 9.7 | 1.8 | 1.6 | 3.0 | 2.7 |
| BHP | AUD | 32 | 1.4 | 0.3 | (5.1) | 1.7 | (6.9) | 16.6 | 7.3 | 114,651 | 12.5 | 13.5 | 2.3 | 2.2 | 5.8 | 6.1 |
| PTT E&P | THB | 132 | (2.2) | (5.7) | (4.3) | (4.3) | (2.6) | 41.2 | 32.0 | 15,958 | 12.5 | 10.8 | 1.3 | 1.2 | 3.8 | 3.5 |
| Petronas gas | MYR | 19 | (0.1) | (1.1) | 1.7 | 2.8 | 7.6 | 19.0 | 9.2 | 9,022 | 19.6 | 19.6 | 2.9 | 2.8 | 10.7 | 10.7 |
| Chesapeake | USD | 3 | (3.0) | (11.1) | (29.2) | (36.7) | (47.8) | (32.9) | (35.1) | 2,348 | 3.1 | 3.3 | #N/A N/A | 2.0 | 5.9 | 5.1 |
| Noble Energy | USD | 22 | (1.5) | (7.6) | (15.2) | (23.4) | (34.5) | (16.4) | (22.9) | 10,786 | 21.8 | 18.7 | 1.0 | 1.0 | 5.8 | 5.2 |
| **Average** | | **0** | **(0.2)** | **(3.5)** | **(6.1)** | **(6.1)** | **(4.9)** | **8.9** | **5.9** | | | | | | | |
| ***PV*** | | | | | | | | | | | | | | | | |
| WACKER | EUR | 75.2 | 5.4 | (10.3) | (16.2) | (36.3) | (36.9) | (50.2) | (53.7) | 4,437 | 11.5 | 12.5 | 1.2 | 1.1 | 4.3 | 4.5 |
| GCL-Poly | HKD | 0.5 | (2.9) | (11.6) | (11.6) | (6.6) | (38.9) | (60.4) | (64.6) | 1,161 | 11.2 | 7.0 | 0.3 | 0.3 | 7.3 | 6.5 |
| SunPower | USD | 6.3 | (4.8) | (5.4) | 0.8 | (8.4) | (15.7) | (31.7) | (25.3) | 889 | #N/A N/A | #N/A N/A | 28.6 | 17.4 | 20.1 | 11.4 |
| Canadian Solar | USD | 16.1 | (2.1) | (2.5) | 12.7 | 9.2 | 31.8 | (9.6) | (4.6) | 942 | 6.4 | 8.7 | 0.9 | 0.8 | 6.6 | 7.6 |
| JA Solar | USD | 7.5 | 0.0 | 0.0 | 0.0 | 0.0 | 6.1 | 0.4 | 0.4 | 356 | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A |
| Yingli | USD | 0.2 | (1.0) | 9.3 | 3.4 | (26.7) | (87.7) | (89.4) | (88.3) | 4 | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A |
| First Solar | USD | 42.5 | (1.8) | (4.6) | 0.5 | (12.4) | (18.1) | (39.4) | (37.1) | 4,449 | 27.7 | 15.3 | 0.9 | 0.8 | 7.0 | 3.3 |
| 한화큐셀 | USD | 9.7 | (0.1) | 0.0 | (0.2) | 14.9 | 45.3 | 30.8 | 37.9 | 806 | 17.3 | 35.9 | #N/A N/A | #N/A N/A | 9.4 | 9.7 |
| OCI | KRW | 105,500 | 1.4 | 0.0 | 9.0 | (6.2) | (10.6) | (15.6) | (22.4) | 2,227 | 0.0 | 16.2 | 0.0 | 0.7 | 0.0 | 5.7 |
| 웅진에너지 | KRW | 1,575 | (1.3) | (6.0) | (12.0) | (42.7) | (70.3) | (83.4) | (80.8) | 41 | N/A | 0.0 | 0.7 | 0.0 | 5.7 | 0.0 |
| 신성솔라에너지 | KRW | 998 | (0.7) | (6.7) | (12.5) | (28.5) | (40.6) | (52.2) | (47.9) | 153 | N/A | 0.7 | 0.0 | 5.7 | 0.0 | 0.4 |
| **Average** | | | **(0.7)** | **(3.4)** | **(2.4)** | **(13.1)** | **(21.4)** | **(36.4)** | **(35.1)** | | | | | | | |
| ***Gas Company*** | | | | | | | | | | | | | | | | |
| Towngas China | HKD | 5.9 | 0.3 | (5.1) | 5.4 | (16.5) | (21.1) | (3.4) | (6.1) | 2,121 | 11.5 | 10.2 | 1.0 | 0.9 | 11.1 | 10.1 |
| Kulun | HKD | 9.2 | 0.1 | (4.9) | (7.7) | 10.1 | 28.1 | 27.7 | 12.7 | 9,470 | 11.3 | 10.1 | 1.5 | 1.3 | 5.9 | 5.4 |
| Beijing Enterprise | HKD | 44.3 | (0.8) | (5.9) | (1.8) | 11.0 | 3.8 | 0.3 | (4.6) | 7,144 | 7.5 | 6.8 | 0.8 | 0.7 | 15.0 | 12.7 |
| ENN Energy | HKD | 70.8 | 2.6 | (6.4) | 2.9 | (4.0) | (10.3) | 26.0 | 26.9 | 10,173 | 16.2 | 13.8 | 3.4 | 2.9 | 10.1 | 8.7 |
| China Resources Gas | HKD | 30.9 | 0.3 | (2.8) | 2.0 | (16.4) | 4.0 | 5.5 | 9.0 | 8,791 | 15.2 | 13.5 | 2.7 | 2.4 | 8.4 | 7.6 |
| China Gas Holdings | HKD | 27.3 | 2.6 | (3.9) | 5.4 | 16.9 | (21.1) | 14.2 | 26.4 | 17,712 | 17.6 | 15.1 | 4.0 | 3.4 | 13.8 | 11.9 |
| Shenzen Gas | HKD | 15.0 | (0.7) | (5.9) | 0.4 | 8.0 | (11.6) | 8.4 | 1.1 | 4,067 | 8.9 | 8.2 | 1.2 | 1.1 | 5.5 | 5.5 |
| Shann Xi | CNY | 7.9 | 1.4 | 1.3 | 4.9 | 7.9 | 7.9 | (4.3) | (6.6) | 1,270 | 18.9 | 16.7 | 1.5 | 1.5 | #N/A N/A | #N/A N/A |
| Suntien | HKD | 2.1 | (1.4) | (8.4) | (3.7) | 2.0 | (23.0) | 11.8 | 0.5 | 989 | 5.4 | 4.8 | 0.7 | 0.6 | 8.2 | 7.2 |
| China Oil & Gas | HKD | 0.5 | (2.0) | (5.7) | (9.1) | (16.7) | (21.9) | (13.8) | (41.2) | 373 | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A |
| **Average** | | | **0.3** | **(4.8)** | **(0.1)** | **0.2** | **(6.5)** | **7.2** | **1.8** | | | | | | | |
| ***EV*** | | | | | | | | | | | | | | | | |
| LG화학 | KRW | 349,500 | 1.3 | (2.5) | 6.7 | 2.5 | (7.3) | (12.6) | (13.7) | 21,832 | 15.4 | 13.9 | 1.5 | 1.4 | 6.8 | 6.1 |
| 삼성SDI | KRW | 203,500 | (0.2) | (6.9) | (6.0) | (18.4) | (9.2) | (3.1) | (0.5) | 12,383 | 18.6 | 12.3 | 1.2 | 1.1 | 10.7 | 7.9 |
| Panasonic | JPY | 1050.5 | (3.3) | (9.4) | (10.9) | (17.5) | (33.3) | (34.6) | (36.3) | 22,742 | 9.8 | 9.0 | 1.3 | 1.2 | 4.0 | 3.8 |
| GS Yuasa | JPY | 2468.0 | (2.5) | (5.7) | (4.2) | (6.9) | (4.5) | (12.0) | (12.0) | 1,802 | 14.7 | 13.3 | 1.1 | 1.0 | 6.8 | 6.3 |
| NEC | JPY | 3550.0 | (0.4) | 3.2 | 3.8 | 17.5 | 16.8 | 16.8 | 16.8 | 8,161 | 25.7 | 14.4 | 1.0 | 1.0 | 9.3 | 6.7 |
| BYD Auto | CNY | 56.2 | 1.4 | (0.3) | 12.3 | 35.3 | 13.6 | (10.3) | (13.7) | 21,150 | 46.8 | 33.3 | 2.7 | 2.5 | 14.4 | 11.9 |
| Tesla Motors | USD | 366.8 | 0.4 | 2.0 | 4.6 | 31.2 | 10.4 | 11.5 | 17.8 | 62,985 | #N/A N/A | 53.3 | 10.8 | 10.3 | 34.2 | 17.9 |
| Kandi Technologies | USD | 4.2 | 1.0 | (7.1) | (11.3) | 10.0 | 2.0 | (41.1) | (38.5) | 215 | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A | #N/A N/A |
| **Average** | | | **(0.3)** | **(3.3)** | **(0.6)** | **6.7** | **(1.4)** | **(10.7)** | **(10.0)** | | | | | | | |

* Bloomberg 기준 / valuation multiple 또한 Bloomberg consensus 기준임