



TO: Clearing Member Firms
Chief Financial Officers
Back Office Managers
Margin Managers

FROM: CME Clearing

SUBJECT: Performance Bond Requirements

DATE: Tuesday, August 16, 2016

To receive advanced notification of Performance Bond (margin) changes, through our free automated mailing list, go to

<http://www.cmegroup.com/newsletter/web2lead/web2sf-old.html>

and subscribe to the Performance Bond Rates Advisory Notice listserver.

As per the normal review of market volatility to ensure adequate collateral coverage, the Chicago Mercantile Exchange Inc., Clearing House Risk Management staff approved the performance bond requirements for the following products listed below.

The rates will be effective after the close of business on

Wednesday, August 17, 2016.

Current rates as of:

Tuesday, August 16, 2016.

SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

Rate Type	Change	Ratio	Current Initial	Current Maintenance	New Initial	New Maintenance
Inter-commodity Spread Rates						
CRUDE OIL - Inter-commodity Spread Rates						
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	60%	60%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs CONWAY NORMAL BUTANE (OPIS) SWAP FUTURES (NY-8M - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	45%	45%	57%	57%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	58%	58%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME)						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	59%	59%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	60%	60%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs CONWAY NORMAL BUTANE (OPIS) SWAP FUTURES (NY-8M - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs CONWAY PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8K - CME)						
Spread Credit Rate	Increase	+1:-2	30%	30%	60%	60%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	45%	45%	57%	57%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	58%	58%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME)						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	59%	59%

SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

Rate Type	Change	Ratio	Current Initial	Current Maintenance	New Initial	New Maintenance
Inter-commodity Spread Rates						
LIGHT SWEET CRUDE OIL (NY-CL) vs CONWAY NORMAL BUTANE SWAP (NY-8M)						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	60%	60%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	30%	30%	60%	60%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs CONWAY PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8K - CME)						
Spread Credit Rate	Increase	+1:-2	40%	40%	60%	60%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	25%	25%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	45%	45%	57%	57%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	58%	58%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME) vs CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	25%	25%
MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME) vs LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS)						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%
MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME)						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%
MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME).						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%

SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

Rate Type	Change	Ratio	Current Initial	Current Maintenance	New Initial	New Maintenance
Inter-commodity Spread Rates						
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME).						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	60%	60%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME).						
Spread Credit Rate	Increase	+1:-1	30%	30%	60%	60%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY NORMAL BUTANE (OPIS) SWAP FUTURES (NY-8M - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY NORMAL BUTANE (OPIS) SWAP FUTURES (NY-8M - CME).						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8K - CME)						
Spread Credit Rate	Increase	+1:-2	40%	40%	60%	60%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8K - CME).						
Spread Credit Rate	Increase	+1:-2	40%	40%	60%	60%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	25%	25%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME).						
Spread Credit Rate	Increase	+1:-1	0%	0%	25%	25%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	45%	45%	57%	57%

SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

Rate Type	Change	Ratio	Current Initial	Current Maintenance	New Initial	New Maintenance
Inter-commodity Spread Rates						
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME).						
Spread Credit Rate	Increase	+1:-1	45%	45%	57%	57%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	58%	58%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME).						
Spread Credit Rate	Increase	+1:-1	55%	55%	58%	58%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	59%	59%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME).						
Spread Credit Rate	Increase	+1:-1	50%	50%	59%	59%

SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

Rate Type	Change	Ratio	Current Initial	Current Maintenance	New Initial	New Maintenance
Inter-commodity Spread Rates						
NGL/PETROCHEMICALS - Inter-commodity Spread Rates						
CONWAY PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8K - CME) vs MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	30%	30%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	60%	60%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs CONWAY NORMAL BUTANE (OPIS) SWAP FUTURES (NY-8M - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	45%	45%	57%	57%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	58%	58%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME)						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%
CRUDE OIL FINANCIAL FUTURES (NY-WS - CME) vs PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	59%	59%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	60%	60%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs CONWAY NORMAL BUTANE (OPIS) SWAP FUTURES (NY-8M - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs CONWAY PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8K - CME)						
Spread Credit Rate	Increase	+1:-2	30%	30%	60%	60%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	45%	45%	57%	57%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	58%	58%
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME)						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%

SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

Rate Type	Change	Ratio	Current Initial	Current Maintenance	New Initial	New Maintenance
Inter-commodity Spread Rates						
CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME) vs PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	59%	59%
LIGHT SWEET CRUDE OIL (NY-CL) vs CONWAY NORMAL BUTANE SWAP (NY-8M)						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	60%	60%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	30%	30%	60%	60%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs CONWAY PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8K - CME)						
Spread Credit Rate	Increase	+1:-2	40%	40%	60%	60%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	25%	25%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	45%	45%	57%	57%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	58%	58%
LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS) vs PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME) vs ARGUS PROPANE FAR EAST INDEX SWAP FUTURES (NY-7E - CME)						
Spread Credit Rate	Increase	+12:-1	0%	0%	30%	30%
MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME) vs CONWAY NORMAL BUTANE (OPIS) SWAP FUTURES (NY-8M - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	30%	30%
MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME) vs CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	25%	25%
MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	30%	30%

SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

Rate Type	Change	Ratio	Current Initial	Current Maintenance	New Initial	New Maintenance
Inter-commodity Spread Rates						
MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME) vs MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	25%	25%
MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME) vs MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	30%	30%
MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	45%	45%	53%	53%
MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME) vs CONWAY PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8K - CME)						
Spread Credit Rate	Increase	+1:-1	75%	75%	80%	80%
Spread Credit Rate	Increase	+1:-1	60%	60%	70%	70%
MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME) vs MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME)						
Spread Credit Rate	Increase	+1:-1	25%	25%	40%	40%
MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%
MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME) vs MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	55%	55%
MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME) vs LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS)						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%
MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME) vs MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	25%	25%
MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME)						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%
MONT BELVIEU NATURAL GASOLINE 5 DECIMALS (OPIS) SWAP FUTURES (NY-7Q - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME).						
Spread Credit Rate	Increase	+1:-1	70%	70%	80%	80%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-26 - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs LIGHT SWEET CRUDE OIL FUTURES (NY-CL, CS, WS)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%

SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

Rate Type	Change	Ratio	Current Initial	Current Maintenance	New Initial	New Maintenance
Inter-commodity Spread Rates						
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME)						
Spread Credit Rate	Increase	+1:-1	65%	65%	80%	80%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-CS - CME).						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME) vs WTI CALENDAR SWAP FUTURES (NY-WS - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	59%	59%
PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	54%	54%
PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME) vs CONWAY NORMAL BUTANE (OPIS) SWAP FUTURES (NY-8M - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%
PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME) vs MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	30%	30%
PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	65%	65%	80%	80%
PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME) vs MONT BELVIEU NORMAL BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-D0 - CME)						
Spread Credit Rate	Increase	+1:-1	75%	75%	84%	84%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME)						
Spread Credit Rate	Increase	+1:-1	55%	55%	60%	60%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY NATURAL GASOLINE (OPIS) SWAP FUTURES (NY-8L - CME).						
Spread Credit Rate	Increase	+1:-1	30%	30%	60%	60%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY NORMAL BUTANE (OPIS) SWAP FUTURES (NY-8M - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY NORMAL BUTANE (OPIS) SWAP FUTURES (NY-8M - CME).						
Spread Credit Rate	Increase	+1:-1	50%	50%	60%	60%

SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

Rate Type	Change	Ratio	Current Initial	Current Maintenance	New Initial	New Maintenance
Inter-commodity Spread Rates						
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8K - CME)						
Spread Credit Rate	Increase	+1:-2	40%	40%	60%	60%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs CONWAY PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8K - CME).						
Spread Credit Rate	Increase	+1:-2	40%	40%	60%	60%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME)						
Spread Credit Rate	Increase	+1:-1	0%	0%	25%	25%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU ETHANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-C0 - CME).						
Spread Credit Rate	Increase	+1:-1	0%	0%	25%	25%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME)						
Spread Credit Rate	Increase	+1:-1	45%	45%	57%	57%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU ISO-BUTANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-8I - CME).						
Spread Credit Rate	Increase	+1:-1	45%	45%	57%	57%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP (NY-B0 - CME)						
Spread Credit Rate	Increase	+1:-1	40%	40%	58%	58%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs MONT BELVIEU LDH PROPANE 5 DECIMALS (OPIS) SWAP FUTURES (NY-B0 - CME).						
Spread Credit Rate	Increase	+1:-1	55%	55%	58%	58%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME)						
Spread Credit Rate	Increase	+1:-1	50%	50%	59%	59%
WTI CALENDAR SWAP FUTURES (NY-CS - CME) vs PROPANE NON-LDH MONT BELVIEU (OPIS) SWAP FUTURES (NY-1R - CME).						
Spread Credit Rate	Increase	+1:-1	50%	50%	59%	59%