



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

FROM: CME Clearing

SUBJECT: Performance Bond Requirements 22-415

DATE: Thursday, October 27, 2022

***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. Please email any questions to [Clearing.RiskManagement@cmegroup.com](mailto:Clearing.RiskManagement@cmegroup.com).

The rates will be effective after the close of business on

**Friday, October 28, 2022.**

Current rates as of:

**Thursday, October 27, 2022.**

In this current advisory there are changes to the Short Option Minimum and/or the Volatility Scan Range. Below are descriptions of what each change affects:

The Short Option Minimum (SOM) is a charge that is applied only to portfolios concentrated in short options that do not generate a minimum margin requirement level when margins are calculated using the normal 16 SPAN scenarios. The SOM charge per short calls or short puts is a percentage of the outright margin on one underlying futures contract.

The volatility scan range is the change in implied volatility that is used in each of SPAN's 16 scenarios.

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
----	-----------	-------------	--------	-----	-----------------	---------------------	-------------	-----------------

### Outright Rates

#### CRUDE OIL - Outright Rates

##### DUBAI CRUDE OIL CALENDAR FUT (DC)

DC	Non-HRP	Mnth1	Decrease	USD	8,200	8,200	7,700	7,700
DC	HRP	Mnth1	Decrease	USD	9,020	8,200	8,470	7,700
DC	Non-HRP	Mnth 2	Decrease	USD	7,900	7,900	7,200	7,200
DC	HRP	Mnth 2	Decrease	USD	8,690	7,900	7,920	7,200
DC	Non-HRP	Mnth 3-8	Decrease	USD	7,400	7,400	6,900	6,900
DC	HRP	Mnth 3-8	Decrease	USD	8,140	7,400	7,590	6,900
DC	Non-HRP	Mnth9+	Decrease	USD	6,400	6,400	5,700	5,700
DC	HRP	Mnth9+	Decrease	USD	7,040	6,400	6,270	5,700

##### MINI DUBAI CRUDE OIL (PLATTS) FUT (DBL)

DBL	Non-HRP	Mnth1	Decrease	USD	820	820	770	770
DBL	HRP	Mnth1	Decrease	USD	902	820	847	770
DBL	Non-HRP	Mnth 2	Decrease	USD	790	790	720	720
DBL	HRP	Mnth 2	Decrease	USD	869	790	792	720
DBL	Non-HRP	Mnth 3-8	Decrease	USD	740	740	690	690
DBL	HRP	Mnth 3-8	Decrease	USD	814	740	759	690
DBL	Non-HRP	Mnth9+	Decrease	USD	640	640	570	570
DBL	HRP	Mnth9+	Decrease	USD	704	640	627	570

#### CRUDE OIL SPREADS - Outright Rates

##### GUERNSEY LIGHT SWEET (NE2) MNTH IND (GSW)

GSW	Non-HRP	Mnths 1-2	Increase	USD	1,200	1,200	1,400	1,400
GSW	HRP	Mnths 1-2	Increase	USD	1,320	1,200	1,540	1,400

##### ICE BRENT DUBAI FUT (DB)

DB	Non-HRP	Mnth 1	Decrease	USD	1,100	1,100	950	950
DB	HRP	Mnth 1	Decrease	USD	1,210	1,100	1,045	950
DB	Non-HRP	Mnth 2	Decrease	USD	900	900	800	800
DB	HRP	Mnth 2	Decrease	USD	990	900	880	800

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
----	-----------	-------------	--------	-----	-----------------	---------------------	-------------	-----------------

### Outright Rates

#### DME Products - Outright Rates

#### BRENT CRUDE VS DUBAI CRUDE (DBI)

DBI	Non-HRP	Mnth 1	Decrease	USD	1,100	1,100	950	950
DBI	HRP	Mnth 1	Decrease	USD	1,210	1,100	1,045	950
DBI	Non-HRP	Mnth 2	Decrease	USD	900	900	800	800
DBI	HRP	Mnth 2	Decrease	USD	990	900	880	800

#### DME OMAN CRUDE CAL FUT (ODO)

ODO	Non-HRP	Mnth 1	Decrease	USD	8,000	8,000	7,600	7,600
ODO	HRP	Mnth 1	Decrease	USD	8,800	8,000	8,360	7,600
ODO	Non-HRP	Mnths 2-3	Decrease	USD	7,950	7,950	7,550	7,550
ODO	HRP	Mnths 2-3	Decrease	USD	8,745	7,950	8,305	7,550
ODO	Non-HRP	Mnths 4-8	Decrease	USD	7,700	7,700	7,300	7,300
ODO	HRP	Mnths 4-8	Decrease	USD	8,470	7,700	8,030	7,300

#### DME OMAN CRUDE OIL (OQ)

OQ	Non-HRP	Mnth1	Decrease	USD	9,500	9,500	8,900	8,900
OQ	HRP	Mnth1	Decrease	USD	10,450	9,500	9,790	8,900
OQ	Non-HRP	Mnth 2-3	Decrease	USD	9,400	9,400	8,800	8,800
OQ	HRP	Mnth 2-3	Decrease	USD	10,340	9,400	9,680	8,800
OQ	Non-HRP	Mnth 4-8	Decrease	USD	9,250	9,250	8,600	8,600
OQ	HRP	Mnth 4-8	Decrease	USD	10,175	9,250	9,460	8,600
OQ	Non-HRP	Mnth 9+	Decrease	USD	8,500	8,500	7,800	7,800
OQ	HRP	Mnth 9+	Decrease	USD	9,350	8,500	8,580	7,800

#### DUBAI CRUDE OIL (PLATTS) (DCD)

DCD	Non-HRP	Mnth 1	Decrease	USD	8,200	8,200	7,700	7,700
DCD	HRP	Mnth 1	Decrease	USD	9,020	8,200	8,470	7,700
DCD	Non-HRP	Mnths 2	Decrease	USD	7,900	7,900	7,200	7,200
DCD	HRP	Mnths 2	Decrease	USD	8,690	7,900	7,920	7,200
DCD	Non-HRP	Mnths 3-8	Decrease	USD	7,400	7,400	6,900	6,900
DCD	HRP	Mnths 3-8	Decrease	USD	8,140	7,400	7,590	6,900
DCD	Non-HRP	Mnths 9+	Decrease	USD	6,400	6,400	5,700	5,700
DCD	HRP	Mnths 9+	Decrease	USD	7,040	6,400	6,270	5,700

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Outright Rates</b>								
<b>DUBAI CRUDE OIL(S&amp;PPLATTS) FUT TAPS (DCT)</b>								
DCT	Non-HRP	Mnth 1	Decrease	USD	8,200	8,200	7,700	7,700
DCT	HRP	Mnth 1	Decrease	USD	9,020	8,200	8,470	7,700
DCT	Non-HRP	Mnths 2	Decrease	USD	7,900	7,900	7,200	7,200
DCT	HRP	Mnths 2	Decrease	USD	8,690	7,900	7,920	7,200
DCT	Non-HRP	Mnths 3-8	Decrease	USD	7,400	7,400	6,900	6,900
DCT	HRP	Mnths 3-8	Decrease	USD	8,140	7,400	7,590	6,900
DCT	Non-HRP	Mnths 9+	Decrease	USD	6,400	6,400	5,700	5,700
DCT	HRP	Mnths 9+	Decrease	USD	7,040	6,400	6,270	5,700
<b>DUBAI CRUDE OIL S&amp;PPLATTS MTH MARKER (DM1)</b>								
DM1	Non-HRP	Mnth 1	Decrease	USD	8,200	8,200	7,700	7,700
DM1	HRP	Mnth 1	Decrease	USD	9,020	8,200	8,470	7,700
DM1	Non-HRP	Mnths 2	Decrease	USD	7,900	7,900	7,200	7,200
DM1	HRP	Mnths 2	Decrease	USD	8,690	7,900	7,920	7,200
DM1	Non-HRP	Mnths 3-8	Decrease	USD	7,400	7,400	6,900	6,900
DM1	HRP	Mnths 3-8	Decrease	USD	8,140	7,400	7,590	6,900
DM1	Non-HRP	Mnths 9+	Decrease	USD	6,400	6,400	5,700	5,700
DM1	HRP	Mnths 9+	Decrease	USD	7,040	6,400	6,270	5,700
<b>OMAN CRUDE FINANCIAL (ZG)</b>								
ZG	Non-HRP	Mnth1	Decrease	USD	9,500	9,500	8,900	8,900
ZG	HRP	Mnth1	Decrease	USD	10,450	9,500	9,790	8,900
ZG	Non-HRP	Mnth 2-3	Decrease	USD	9,400	9,400	8,800	8,800
ZG	HRP	Mnth 2-3	Decrease	USD	10,340	9,400	9,680	8,800
ZG	Non-HRP	Mnth 4-8	Decrease	USD	9,250	9,250	8,600	8,600
ZG	HRP	Mnth 4-8	Decrease	USD	10,175	9,250	9,460	8,600
ZG	Non-HRP	Mnth 9+	Decrease	USD	8,500	8,500	7,800	7,800
ZG	HRP	Mnth 9+	Decrease	USD	9,350	8,500	8,580	7,800
<b>OMAN CRUDE OIL TAM FUT (OQB)</b>								
OQB	Non-HRP	Mnth1	Decrease	USD	9,500	9,500	8,900	8,900
OQB	HRP	Mnth1	Decrease	USD	10,450	9,500	9,790	8,900
OQB	Non-HRP	Mnth 2-3	Decrease	USD	9,400	9,400	8,800	8,800
OQB	HRP	Mnth 2-3	Decrease	USD	10,340	9,400	9,680	8,800
OQB	Non-HRP	Mnth 4-8	Decrease	USD	9,250	9,250	8,600	8,600
OQB	HRP	Mnth 4-8	Decrease	USD	10,175	9,250	9,460	8,600
OQB	Non-HRP	Mnth 9+	Decrease	USD	8,500	8,500	7,800	7,800
OQB	HRP	Mnth 9+	Decrease	USD	9,350	8,500	8,580	7,800

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
----	-----------	-------------	--------	-----	-----------------	---------------------	-------------	-----------------

**Outright Rates**

**OMAN CRUDE OIL TAM MARKER SYN (OQ1)**

OQ1	Non-HRP	Mnth1	Decrease	USD	9,500	9,500	8,900	8,900
OQ1	HRP	Mnth1	Decrease	USD	10,450	9,500	9,790	8,900
OQ1	Non-HRP	Mnth 2-3	Decrease	USD	9,400	9,400	8,800	8,800
OQ1	HRP	Mnth 2-3	Decrease	USD	10,340	9,400	9,680	8,800
OQ1	Non-HRP	Mnth 4-8	Decrease	USD	9,250	9,250	8,600	8,600
OQ1	HRP	Mnth 4-8	Decrease	USD	10,175	9,250	9,460	8,600
OQ1	Non-HRP	Mnth 9+	Decrease	USD	8,500	8,500	7,800	7,800
OQ1	HRP	Mnth 9+	Decrease	USD	9,350	8,500	8,580	7,800

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Outright Rates</b>								
<b>ELECTRICITY - Outright Rates</b>								
<b>PJM AD HUB 5MW REAL TIME O PK (V3)</b>								
V3	Non-HRP	Mnth 1	Decrease	USD	85	85	70	70
V3	HRP	Mnth 1	Decrease	USD	94	85	77	70
V3	Non-HRP	Mnth 2	Decrease	USD	80	80	65	65
V3	HRP	Mnth 2	Decrease	USD	88	80	72	65
V3	Non-HRP	Mnths 3-4	Decrease	USD	75	75	60	60
V3	HRP	Mnths 3-4	Decrease	USD	83	75	66	60
V3	Non-HRP	Mnths 5-11	Decrease	USD	55	55	45	45
V3	HRP	Mnths 5-11	Decrease	USD	61	55	50	45
V3	Non-HRP	Mnths 12+	Increase	USD	14	14	15	15
V3	HRP	Mnths 12+	Increase	USD	15	14	17	15
<b>PJM AD HUB 5MW REAL TIME PK (Z9)</b>								
Z9	Non-HRP	Mnth 1	Decrease	USD	2,350	2,350	1,800	1,800
Z9	HRP	Mnth 1	Decrease	USD	2,585	2,350	1,980	1,800
Z9	Non-HRP	Mnth 2	Decrease	USD	2,300	2,300	1,600	1,600
Z9	HRP	Mnth 2	Decrease	USD	2,530	2,300	1,760	1,600
Z9	Non-HRP	Mnths 3-4	Decrease	USD	1,800	1,800	1,300	1,300
Z9	HRP	Mnths 3-4	Decrease	USD	1,980	1,800	1,430	1,300
<b>PJM DAYTON DA OFF-PEAK (R7)</b>								
R7	Non-HRP	Mnth 1	Decrease	USD	86	86	71	71
R7	HRP	Mnth 1	Decrease	USD	95	86	78	71
R7	Non-HRP	Mnth 2	Decrease	USD	81	81	66	66
R7	HRP	Mnth 2	Decrease	USD	89	81	73	66
R7	Non-HRP	Mnths 3-4	Decrease	USD	76	76	61	61
R7	HRP	Mnths 3-4	Decrease	USD	84	76	67	61
R7	Non-HRP	Mnths 12+	Increase	USD	15	15	16	16
R7	HRP	Mnths 12+	Increase	USD	17	15	18	16
R7	Non-HRP	Mnth 5-11	Decrease	USD	56	56	46	46
R7	HRP	Mnth 5-11	Decrease	USD	62	56	51	46
<b>PJM DAYTON DA PEAK (D7)</b>								
D7	Non-HRP	Mnth 1	Decrease	USD	2,385	2,385	1,835	1,835
D7	HRP	Mnth 1	Decrease	USD	2,624	2,385	2,019	1,835
D7	Non-HRP	Mnth 2	Decrease	USD	2,315	2,315	1,615	1,615
D7	HRP	Mnth 2	Decrease	USD	2,547	2,315	1,777	1,615
D7	Non-HRP	Mnths 3-4	Decrease	USD	1,810	1,810	1,310	1,310
D7	HRP	Mnths 3-4	Decrease	USD	1,991	1,810	1,441	1,310

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Outright Rates</b>								
<b>PJM WES HUB PEAK CAL MON REAL TIME (L1)</b>								
L1	Non-HRP	Mth 1	Decrease	USD	2,100	2,100	1,700	1,700
L1	HRP	Mth 1	Decrease	USD	2,310	2,100	1,870	1,700
L1	Non-HRP	Mnth 2	Decrease	USD	2,050	2,050	1,650	1,650
L1	HRP	Mnth 2	Decrease	USD	2,255	2,050	1,815	1,650
L1	Non-HRP	Mnths 3-5	Decrease	USD	2,000	2,000	1,600	1,600
L1	HRP	Mnths 3-5	Decrease	USD	2,200	2,000	1,760	1,600
L1	Non-HRP	Mnths 6-11	Decrease	USD	1,500	1,500	1,100	1,100
L1	HRP	Mnths 6-11	Decrease	USD	1,650	1,500	1,210	1,100
L1	Non-HRP	Mnths 12	Decrease	USD	600	600	500	500
L1	HRP	Mnths 12	Decrease	USD	660	600	550	500
<b>PJM WES HUB PEAK LMP 50 MW (4S)</b>								
4S	Non-HRP	Mth 1	Decrease	USD	21,000	21,000	17,000	17,000
4S	HRP	Mth 1	Decrease	USD	23,100	21,000	18,700	17,000
4S	Non-HRP	Mnth 2	Decrease	USD	20,500	20,500	16,500	16,500
4S	HRP	Mnth 2	Decrease	USD	22,550	20,500	18,150	16,500
4S	Non-HRP	Mnths 3-5	Decrease	USD	20,000	20,000	16,000	16,000
4S	HRP	Mnths 3-5	Decrease	USD	22,000	20,000	17,600	16,000
4S	Non-HRP	Mnths 6-11	Decrease	USD	15,000	15,000	11,000	11,000
4S	HRP	Mnths 6-11	Decrease	USD	16,500	15,000	12,100	11,000
4S	Non-HRP	Mnths 12	Decrease	USD	6,000	6,000	5,000	5,000
4S	HRP	Mnths 12	Decrease	USD	6,600	6,000	5,500	5,000
<b>PJM WESTH DA OFF-PEAK (E4)</b>								
E4	Non-HRP	Mnth 1	Decrease	USD	101	101	81	81
E4	HRP	Mnth 1	Decrease	USD	111	101	89	81
E4	Non-HRP	Mnth 2	Decrease	USD	81	81	66	66
E4	HRP	Mnth 2	Decrease	USD	89	81	73	66
E4	Non-HRP	Mnths 3-4	Decrease	USD	76	76	61	61
E4	HRP	Mnths 3-4	Decrease	USD	84	76	67	61
E4	Non-HRP	Mnths 5-11	Decrease	USD	61	61	51	51
E4	HRP	Mnths 5-11	Decrease	USD	67	61	56	51
E4	Non-HRP	Mnths12+	New	USD			16	16
E4	HRP	Mnths12+	New	USD			18	16

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
----	-----------	-------------	--------	-----	-----------------	---------------------	-------------	-----------------

### Outright Rates

#### PJM WESTH RT OFF-PEAK (N9)

N9	Non-HRP	Mnth 1	Decrease	USD	100	100	80	80
N9	HRP	Mnth 1	Decrease	USD	110	100	88	80
N9	Non-HRP	Mnth 2	Decrease	USD	80	80	65	65
N9	HRP	Mnth 2	Decrease	USD	88	80	72	65
N9	Non-HRP	Mnths 3-4	Decrease	USD	75	75	60	60
N9	HRP	Mnths 3-4	Decrease	USD	83	75	66	60
N9	Non-HRP	Mnths 5-11	Decrease	USD	60	60	50	50
N9	HRP	Mnths 5-11	Decrease	USD	66	60	55	50

#### PJM WESTHDA PEAK (J4)

J4	Non-HRP	Mnth 1	Decrease	USD	2,130	2,130	1,730	1,730
J4	HRP	Mnth 1	Decrease	USD	2,343	2,130	1,903	1,730
J4	Non-HRP	Mnth 2	Decrease	USD	2,065	2,065	1,665	1,665
J4	HRP	Mnth 2	Decrease	USD	2,272	2,065	1,832	1,665
J4	Non-HRP	Mnths 3-5	Decrease	USD	2,010	2,010	1,610	1,610
J4	HRP	Mnths 3-5	Decrease	USD	2,211	2,010	1,771	1,610
J4	Non-HRP	Mnths 6-11	Decrease	USD	1,510	1,510	1,110	1,110
J4	HRP	Mnths 6-11	Decrease	USD	1,661	1,510	1,221	1,110
J4	Non-HRP	Mnths 12+	Decrease	USD	610	610	510	510
J4	HRP	Mnths 12+	Decrease	USD	671	610	561	510

### ENVIRONMENTAL - Outright Rates

#### CBL GLOBAL EMISSIONS OFFSET FUTURES (GEO)

GEO	Non-HRP	Mth 1	Decrease	USD	1,000	1,000	850	850
GEO	HRP	Mth 1	Decrease	USD	1,100	1,000	935	850
GEO	Non-HRP	Mth 2	Decrease	USD	1,000	1,000	850	850
GEO	HRP	Mth 2	Decrease	USD	1,100	1,000	935	850
GEO	Non-HRP	Mths 3-6	Decrease	USD	1,000	1,000	850	850
GEO	HRP	Mths 3-6	Decrease	USD	1,100	1,000	935	850
GEO	Non-HRP	Mths 7+	Decrease	USD	1,000	1,000	850	850
GEO	HRP	Mths 7+	Decrease	USD	1,100	1,000	935	850

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Outright Rates</b>								
<b>FX - Outright Rates</b>								
<b>HUNGARIAN FORINT (USD) FUTURES (FR)</b>								
FR	Non-HRP		Decrease	USD	4,000	4,000	3,600	3,600
FR	HRP		Decrease	USD	4,400	4,000	3,960	3,600
<b>MICRO USD/CAD FUT (M6C)</b>								
M6C	Non-HRP	Months 1-4	Increase	CAD	200	200	240	240
M6C	HRP	Months 1-4	Increase	CAD	220	200	264	240
M6C	Non-HRP	Months 5+	Increase	CAD	200	200	240	240
M6C	HRP	Months 5+	Increase	CAD	220	200	264	240
<b>MICRO USD/CNH FUTURES (MNH)</b>								
MNH	Non-HRP	Months 1-12	Increase	CNH	1,100	1,100	1,300	1,300
MNH	HRP	Months 1-12	Increase	CNH	1,210	1,100	1,430	1,300
MNH	Non-HRP	Months 13+	Increase	CNH	1,250	1,250	1,480	1,480
MNH	HRP	Months 13+	Increase	CNH	1,375	1,250	1,628	1,480
<b>TURKISH LIRA/US DOLLAR (TRY/USD) (TRL)</b>								
TRL	Non-HRP		Decrease	USD	13,000	13,000	11,500	11,500
TRL	HRP		Decrease	USD	14,300	13,000	12,650	11,500
<b>U.S. DOLLAR\RENMINBI FUTURES (RMB)</b>								
RMB	Non-HRP	Mnth 1	Increase	USD	2,300	2,300	2,800	2,800
RMB	HRP	Mnth 1	Increase	USD	2,530	2,300	3,080	2,800
RMB	Non-HRP	Mnth 2+	Increase	USD	2,300	2,300	2,800	2,800
RMB	HRP	Mnth 2+	Increase	USD	2,530	2,300	3,080	2,800
<b>US DOLLARS/CHILEAN PESO FUTURES (CHL)</b>								
CHL	Non-HRP		Increase	USD	3,900	3,900	4,800	4,800
CHL	HRP		Increase	USD	4,290	3,900	5,280	4,800
CHL	Non-HRP		Increase	USD	3,900	3,900	4,800	4,800
CHL	HRP		Increase	USD	4,290	3,900	5,280	4,800
CHL	Non-HRP		Increase	USD	3,900	3,900	4,800	4,800
CHL	HRP		Increase	USD	4,290	3,900	5,280	4,800
CHL	Non-HRP		Increase	USD	3,900	3,900	4,800	4,800
CHL	HRP		Increase	USD	4,290	3,900	5,280	4,800
<b>USD/CNH FUTURES (CNH)</b>								
CNH	Non-HRP	Months 1-12	Increase	CNH	11,000	11,000	13,000	13,000
CNH	HRP	Months 1-12	Increase	CNH	12,100	11,000	14,300	13,000
CNH	Non-HRP	Months 13+	Increase	CNH	12,500	12,500	14,800	14,800
CNH	HRP	Months 13+	Increase	CNH	13,750	12,500	16,280	14,800

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
----	-----------	-------------	--------	-----	-----------------	---------------------	-------------	-----------------

**Outright Rates**

**INTEREST RATES - Outright Rates**

**ESTR FUTURES (ESR)**

ESR	Non-HRP	Month 1	New	EUR			1,050	1,050
ESR	HRP	Month 1	New	EUR			1,155	1,050
ESR	Non-HRP	Month 2	New	EUR			1,050	1,050
ESR	HRP	Month 2	New	EUR			1,155	1,050
ESR	Non-HRP	Month 3	New	EUR			1,050	1,050
ESR	HRP	Month 3	New	EUR			1,155	1,050
ESR	Non-HRP	Month 4	New	EUR			1,050	1,050
ESR	HRP	Month 4	New	EUR			1,155	1,050
ESR	Non-HRP	Month 5	New	EUR			1,050	1,050
ESR	HRP	Month 5	New	EUR			1,155	1,050
ESR	Non-HRP	Month 6	New	EUR			1,050	1,050
ESR	HRP	Month 6	New	EUR			1,155	1,050
ESR	Non-HRP	Month 7	New	EUR			1,050	1,050
ESR	HRP	Month 7	New	EUR			1,155	1,050
ESR	Non-HRP	Month 8	New	EUR			1,050	1,050
ESR	HRP	Month 8	New	EUR			1,155	1,050
ESR	Non-HRP	Month 9	New	EUR			1,050	1,050
ESR	HRP	Month 9	New	EUR			1,155	1,050
ESR	Non-HRP	Month 10	New	EUR			1,050	1,050
ESR	HRP	Month 10	New	EUR			1,155	1,050
ESR	Non-HRP	Month 11	New	EUR			1,050	1,050
ESR	HRP	Month 11	New	EUR			1,155	1,050
ESR	Non-HRP	Month 12	New	EUR			1,050	1,050
ESR	HRP	Month 12	New	EUR			1,155	1,050
ESR	Non-HRP	Month 13+	New	EUR			1,050	1,050
ESR	HRP	Month 13+	New	EUR			1,155	1,050

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
----	-----------	-------------	--------	-----	-----------------	---------------------	-------------	-----------------

**Outright Rates**

**ESTR THREE MO BASIS SPREAD FUTURES (EUS)**

EUS	Non-HRP	Month 1	New	EUR			400	400
EUS	HRP	Month 1	New	EUR			440	400
EUS	Non-HRP	Month 2	New	EUR			400	400
EUS	HRP	Month 2	New	EUR			440	400
EUS	Non-HRP	Month 3	New	EUR			400	400
EUS	HRP	Month 3	New	EUR			440	400
EUS	Non-HRP	Month 4	New	EUR			400	400
EUS	HRP	Month 4	New	EUR			440	400
EUS	Non-HRP	Month 5	New	EUR			400	400
EUS	HRP	Month 5	New	EUR			440	400
EUS	Non-HRP	Month 6	New	EUR			400	400
EUS	HRP	Month 6	New	EUR			440	400
EUS	Non-HRP	Month 7	New	EUR			400	400
EUS	HRP	Month 7	New	EUR			440	400
EUS	Non-HRP	Month 8	New	EUR			400	400
EUS	HRP	Month 8	New	EUR			440	400
EUS	Non-HRP	Month 9	New	EUR			400	400
EUS	HRP	Month 9	New	EUR			440	400
EUS	Non-HRP	Month 10	New	EUR			400	400
EUS	HRP	Month 10	New	EUR			440	400
EUS	Non-HRP	Month 11	New	EUR			400	400
EUS	HRP	Month 11	New	EUR			440	400

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
----	-----------	-------------	--------	-----	-----------------	---------------------	-------------	-----------------

### Outright Rates

#### PETROLEUM CRACKS AND SPREADS - Outright Rates

##### JET AVIA FUEL(PLTT) FOB V. ICE (1V)

1V	Non-HRP	Mnth 1	Increase	USD	20,500	20,500	26,000	26,000
1V	HRP	Mnth 1	Increase	USD	22,550	20,500	28,600	26,000
1V	Non-HRP	Mnth 2-4	Increase	USD	16,500	16,500	18,500	18,500
1V	HRP	Mnth 2-4	Increase	USD	18,150	16,500	20,350	18,500

##### MIN ULSD 10PPM CRGS CIF NWE VS GSL (MGN)

MGN	Non-HRP	Mnth 1	Increase	USD	845	845	950	950
MGN	HRP	Mnth 1	Increase	USD	930	845	1,045	950
MGN	Non-HRP	Mnth 2	Increase	USD	840	840	925	925
MGN	HRP	Mnth 2	Increase	USD	924	840	1,018	925
MGN	Non-HRP	Mnths 3-4	Increase	USD	590	590	650	650
MGN	HRP	Mnths 3-4	Increase	USD	649	590	715	650
MGN	Non-HRP	Mnths 5+	Increase	USD	510	510	625	625
MGN	HRP	Mnths 5+	Increase	USD	561	510	688	625

##### NY ULSD VS. NY HRBR ULSD FUT (7Y)

7Y	Non-HRP	Mnth 2	Increase	USD	4,000	4,000	4,500	4,500
7Y	HRP	Mnth 2	Increase	USD	4,400	4,000	4,950	4,500

##### SINGAPORE FUEL OIL SPREAD FUT (SD)

SD	Non-HRP	Mnths 7+	Increase	USD	3,900	3,900	4,300	4,300
SD	HRP	Mnths 7+	Increase	USD	4,290	3,900	4,730	4,300

##### ULSD 10PPM V. ICE FUT (TP)

TP	Non-HRP	Mnth 1	Increase	USD	8,450	8,450	9,500	9,500
TP	HRP	Mnth 1	Increase	USD	9,295	8,450	10,450	9,500
TP	Non-HRP	Mnth 2	Increase	USD	8,400	8,400	9,250	9,250
TP	HRP	Mnth 2	Increase	USD	9,240	8,400	10,175	9,250
TP	Non-HRP	Mnths 3-4	Increase	USD	5,900	5,900	6,500	6,500
TP	HRP	Mnths 3-4	Increase	USD	6,490	5,900	7,150	6,500
TP	Non-HRP	Mnths 5+	Increase	USD	5,100	5,100	6,250	6,250
TP	HRP	Mnths 5+	Increase	USD	5,610	5,100	6,875	6,250

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Outright Rates</b>								
<b>REFINED PRODUCTS - Outright Rates</b>								
<b>118 SYNTHET MOGAS92 UNLEADED (P (118))</b>								
118	Non-HRP	Mnth 2	Decrease	USD	940	940	850	850
118	HRP	Mnth 2	Decrease	USD	1,034	940	935	850
118	Non-HRP	Mnth 1	Decrease	USD	950	950	830	830
118	HRP	Mnth 1	Decrease	USD	1,045	950	913	830
118	Non-HRP	Mnths 3+	Decrease	USD	890	890	770	770
118	HRP	Mnths 3+	Decrease	USD	979	890	847	770
<b>121 SYNT JAPAN C&amp;F NAPHTHA FUT (121)</b>								
121	Non-HRP	Mnth 1	Decrease	USD	6,100	6,100	5,100	5,100
121	HRP	Mnth 1	Decrease	USD	6,710	6,100	5,610	5,100
121	Non-HRP	Mnths 2-6	Decrease	USD	5,900	5,900	5,000	5,000
121	HRP	Mnths 2-6	Decrease	USD	6,490	5,900	5,500	5,000
121	Non-HRP	Mnths 7+	Decrease	USD	4,600	4,600	4,100	4,100
121	HRP	Mnths 7+	Decrease	USD	5,060	4,600	4,510	4,100
<b>EUROPE 3.5% FUEL OIL RDAM CALFUT (UV)</b>								
UV	Non-HRP	Mths 1	Decrease	USD	56,000	56,000	41,000	41,000
UV	HRP	Mths 1	Decrease	USD	61,600	56,000	45,100	41,000
UV	Non-HRP	Mnths 2	Decrease	USD	51,000	51,000	40,000	40,000
UV	HRP	Mnths 2	Decrease	USD	56,100	51,000	44,000	40,000
UV	Non-HRP	Mnths 3-10	Decrease	USD	47,000	47,000	38,000	38,000
UV	HRP	Mnths 3-10	Decrease	USD	51,700	47,000	41,800	38,000
UV	Non-HRP	Mnths 11+	Decrease	USD	39,000	39,000	31,000	31,000
UV	HRP	Mnths 11+	Decrease	USD	42,900	39,000	34,100	31,000
<b>EUROPE NAPHTHA CALFUT (UN)</b>								
UN	Non-HRP	Mths 1	Decrease	USD	56,000	56,000	50,000	50,000
UN	HRP	Mths 1	Decrease	USD	61,600	56,000	55,000	50,000
UN	Non-HRP	Mths 2-6	Decrease	USD	54,000	54,000	48,000	48,000
UN	HRP	Mths 2-6	Decrease	USD	59,400	54,000	52,800	48,000
<b>EUROPEAN FOB RDAM MARINE FUEL 0.5% (R5F)</b>								
R5F	Non-HRP	Month 1	Decrease	USD	54,000	54,000	47,000	47,000
R5F	HRP	Month 1	Decrease	USD	59,400	54,000	51,700	47,000
R5F	Non-HRP	Month 2	Decrease	USD	52,000	52,000	46,000	46,000
R5F	HRP	Month 2	Decrease	USD	57,200	52,000	50,600	46,000
R5F	Non-HRP	Month 3+	Decrease	USD	51,000	51,000	45,000	45,000
R5F	HRP	Month 3+	Decrease	USD	56,100	51,000	49,500	45,000

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Outright Rates</b>								
<b>GAS EURO-BOB OXY (ARG) NEW BRG (7H)</b>								
7H	Non-HRP	Mnth 1	Decrease	USD	77,000	77,000	72,000	72,000
7H	HRP	Mnth 1	Decrease	USD	84,700	77,000	79,200	72,000
7H	Non-HRP	Mnths 2-6	Decrease	USD	76,000	76,000	67,000	67,000
7H	HRP	Mnths 2-6	Decrease	USD	83,600	76,000	73,700	67,000
7H	Non-HRP	Mnths 7-12	Decrease	USD	60,000	60,000	52,000	52,000
7H	HRP	Mnths 7-12	Decrease	USD	66,000	60,000	57,200	52,000
<b>JAPAN C&amp;F NAPHTHA FUT (JA)</b>								
JA	Non-HRP	Mnth 1	Decrease	USD	61,000	61,000	51,000	51,000
JA	HRP	Mnth 1	Decrease	USD	67,100	61,000	56,100	51,000
JA	Non-HRP	Mnths 2-6	Decrease	USD	59,000	59,000	50,000	50,000
JA	HRP	Mnths 2-6	Decrease	USD	64,900	59,000	55,000	50,000
JA	Non-HRP	Mnths 7+	Decrease	USD	46,000	46,000	41,000	41,000
JA	HRP	Mnths 7+	Decrease	USD	50,600	46,000	45,100	41,000
<b>LA CARB DIESEL (OPIS) (LX)</b>								
LX	Non-HRP	Mnth 1	Increase	USD	10,250	10,250	11,500	11,500
LX	HRP	Mnth 1	Increase	USD	11,275	10,250	12,650	11,500
<b>MICRO EURO MARINE 0.5% FO BARGES (R50)</b>								
R50	Non-HRP	Month 1	Decrease	USD	540	540	470	470
R50	HRP	Month 1	Decrease	USD	594	540	517	470
R50	Non-HRP	Month 2	Decrease	USD	520	520	460	460
R50	HRP	Month 2	Decrease	USD	572	520	506	460
R50	Non-HRP	Month 3+	Decrease	USD	510	510	450	450
R50	HRP	Month 3+	Decrease	USD	561	510	495	450
<b>MICRO EUROPEAN 3.5% FUEL OIL BARGES (MEF)</b>								
MEF	Non-HRP	Mths 1	Decrease	USD	560	560	410	410
MEF	HRP	Mths 1	Decrease	USD	616	560	451	410
MEF	Non-HRP	Mnths 2	Decrease	USD	510	510	400	400
MEF	HRP	Mnths 2	Decrease	USD	561	510	440	400
MEF	Non-HRP	Mnths 3-10	Decrease	USD	470	470	380	380
MEF	HRP	Mnths 3-10	Decrease	USD	517	470	418	380
MEF	Non-HRP	Mnths 11+	Decrease	USD	390	390	310	310
MEF	HRP	Mnths 11+	Decrease	USD	429	390	341	310

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Outright Rates</b>								
<b>MICRO SINGAPORE FUEL OIL 380CST (PL (MAF))</b>								
MAF	Non-HRP	Mnth 1	Decrease	USD	530	530	420	420
MAF	HRP	Mnth 1	Decrease	USD	583	530	462	420
MAF	Non-HRP	Mnths 2	Decrease	USD	490	490	400	400
MAF	HRP	Mnths 2	Decrease	USD	539	490	440	400
MAF	Non-HRP	Mnths 3-13	Decrease	USD	470	470	390	390
MAF	HRP	Mnths 3-13	Decrease	USD	517	470	429	390
MAF	Non-HRP	Mnths 14+	Decrease	USD	450	450	380	380
MAF	HRP	Mnths 14+	Decrease	USD	495	450	418	380
<b>MIN EURO NPHTHA CIF NWE FUT (MNC)</b>								
MNC	Non-HRP	Mths 1	Decrease	USD	5,600	5,600	5,000	5,000
MNC	HRP	Mths 1	Decrease	USD	6,160	5,600	5,500	5,000
MNC	Non-HRP	Mths 2-6	Decrease	USD	5,400	5,400	4,800	4,800
MNC	HRP	Mths 2-6	Decrease	USD	5,940	5,400	5,280	4,800
<b>MIN JAPAN C&amp;F NAPHTHA PLATTS FUT (MJN)</b>								
MJN	Non-HRP	Mnth 1	Decrease	USD	6,100	6,100	5,100	5,100
MJN	HRP	Mnth 1	Decrease	USD	6,710	6,100	5,610	5,100
MJN	Non-HRP	Mnths 2-6	Decrease	USD	5,900	5,900	5,000	5,000
MJN	HRP	Mnths 2-6	Decrease	USD	6,490	5,900	5,500	5,000
MJN	Non-HRP	Mnths 7+	Decrease	USD	4,600	4,600	4,100	4,100
MJN	HRP	Mnths 7+	Decrease	USD	5,060	4,600	4,510	4,100
<b>MINI EURO 3.5% FUEL OIL FOB RDM FUT (0D)</b>								
0D	Non-HRP	Mths 1	Decrease	USD	5,600	5,600	4,100	4,100
0D	HRP	Mths 1	Decrease	USD	6,160	5,600	4,510	4,100
0D	Non-HRP	Mnths 2	Decrease	USD	5,100	5,100	4,000	4,000
0D	HRP	Mnths 2	Decrease	USD	5,610	5,100	4,400	4,000
0D	Non-HRP	Mnths 3-10	Decrease	USD	4,700	4,700	3,800	3,800
0D	HRP	Mnths 3-10	Decrease	USD	5,170	4,700	4,180	3,800
0D	Non-HRP	Mnths 11+	Decrease	USD	3,900	3,900	3,100	3,100
0D	HRP	Mnths 11+	Decrease	USD	4,290	3,900	3,410	3,100
<b>MINI EUROPEAN FOB RDAM MARINE FUEL (R5M)</b>								
R5M	Non-HRP	Month 1	Decrease	USD	5,400	5,400	4,700	4,700
R5M	HRP	Month 1	Decrease	USD	5,940	5,400	5,170	4,700
R5M	Non-HRP	Month 2	Decrease	USD	5,200	5,200	4,600	4,600
R5M	HRP	Month 2	Decrease	USD	5,720	5,200	5,060	4,600
R5M	Non-HRP	Month 3+	Decrease	USD	5,100	5,100	4,500	4,500
R5M	HRP	Month 3+	Decrease	USD	5,610	5,100	4,950	4,500

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Outright Rates</b>								
<b>MINI GAS EUROBOB OXY BARGES FUT (MEO)</b>								
MEO	Non-HRP	Mnth 1	Decrease	USD	77,000	77,000	72,000	72,000
MEO	HRP	Mnth 1	Decrease	USD	84,700	77,000	79,200	72,000
MEO	Non-HRP	Mnths 2-6	Decrease	USD	76,000	76,000	67,000	67,000
MEO	HRP	Mnths 2-6	Decrease	USD	83,600	76,000	73,700	67,000
MEO	Non-HRP	Mnths 7-12	Decrease	USD	60,000	60,000	52,000	52,000
MEO	HRP	Mnths 7-12	Decrease	USD	66,000	60,000	57,200	52,000
<b>MINI SINGAPORE 380CST FUEL OIL FUT (MTS)</b>								
MTS	Non-HRP	Mnth 1	Decrease	USD	5,300	5,300	4,200	4,200
MTS	HRP	Mnth 1	Decrease	USD	5,830	5,300	4,620	4,200
MTS	Non-HRP	Mnths 2	Decrease	USD	4,900	4,900	4,000	4,000
MTS	HRP	Mnths 2	Decrease	USD	5,390	4,900	4,400	4,000
MTS	Non-HRP	Mnths 3-13	Decrease	USD	4,700	4,700	3,900	3,900
MTS	HRP	Mnths 3-13	Decrease	USD	5,170	4,700	4,290	3,900
MTS	Non-HRP	Mnths 14+	Decrease	USD	4,500	4,500	3,800	3,800
MTS	HRP	Mnths 14+	Decrease	USD	4,950	4,500	4,180	3,800
<b>MOGAS92 UNLEADED (PLATTS) FUT (1N)</b>								
1N	Non-HRP	Mnth 2	Decrease	USD	9,400	9,400	8,500	8,500
1N	HRP	Mnth 2	Decrease	USD	10,340	9,400	9,350	8,500
1N	Non-HRP	Mnth 1	Decrease	USD	9,500	9,500	8,300	8,300
1N	HRP	Mnth 1	Decrease	USD	10,450	9,500	9,130	8,300
1N	Non-HRP	Mnths 3+	Decrease	USD	8,900	8,900	7,700	7,700
1N	HRP	Mnths 3+	Decrease	USD	9,790	8,900	8,470	7,700
<b>SINGAPORE 380CST FUEL OIL FUT (SE)</b>								
SE	Non-HRP	Mnth 1	Decrease	USD	53,000	53,000	42,000	42,000
SE	HRP	Mnth 1	Decrease	USD	58,300	53,000	46,200	42,000
SE	Non-HRP	Mnths 2	Decrease	USD	49,000	49,000	40,000	40,000
SE	HRP	Mnths 2	Decrease	USD	53,900	49,000	44,000	40,000
SE	Non-HRP	Mnths 3-13	Decrease	USD	47,000	47,000	39,000	39,000
SE	HRP	Mnths 3-13	Decrease	USD	51,700	47,000	42,900	39,000
SE	Non-HRP	Mnths 14+	Decrease	USD	45,000	45,000	38,000	38,000
SE	HRP	Mnths 14+	Decrease	USD	49,500	45,000	41,800	38,000

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Outright Rates</b>								
<b>SYNT JAPAN C&amp;F NAPHTHA FUT (SJA)</b>								
SJA	Non-HRP	Mnth 1	Decrease	USD	61,000	61,000	51,000	51,000
SJA	HRP	Mnth 1	Decrease	USD	67,100	61,000	56,100	51,000
SJA	Non-HRP	Mnths 2-6	Decrease	USD	59,000	59,000	50,000	50,000
SJA	HRP	Mnths 2-6	Decrease	USD	64,900	59,000	55,000	50,000
SJA	Non-HRP	Mnths 7+	Decrease	USD	46,000	46,000	41,000	41,000
SJA	HRP	Mnths 7+	Decrease	USD	50,600	46,000	45,100	41,000
<b>SYNTH 116 GAS EURO-BOB OXY (ARG) (116)</b>								
116	Non-HRP	Mnth 1	Decrease	USD	7,700	7,700	7,200	7,200
116	HRP	Mnth 1	Decrease	USD	8,470	7,700	7,920	7,200
116	Non-HRP	Mnths 2-6	Decrease	USD	7,600	7,600	6,700	6,700
116	HRP	Mnths 2-6	Decrease	USD	8,360	7,600	7,370	6,700
116	Non-HRP	Mnths 7-12	Decrease	USD	6,000	6,000	5,200	5,200
116	HRP	Mnths 7-12	Decrease	USD	6,600	6,000	5,720	5,200

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Intra Spreads</b>								

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Intra Spreads</b>								
<b>CRUDE OIL - Intra Spreads</b>								
<b>Month 2 vs 3-8 (DUBAI CRUDE OIL CALENDAR FUT)</b>								
DC	Non-HRP		Decrease	USD	2,500	2,500	1,900	1,900
DC	HRP		Decrease	USD	2,750	2,500	2,090	1,900
<b>Month 2 vs 3-8 (MINI DUBAI CRUDE OIL (PLATTS) FUT)</b>								
DBL	Non-HRP		Decrease	USD	250	250	190	190
DBL	HRP		Decrease	USD	275	250	209	190
<b>Month 2 vs 9+ (DUBAI CRUDE OIL CALENDAR FUT)</b>								
DC	Non-HRP		Decrease	USD	2,000	2,000	1,500	1,500
DC	HRP		Decrease	USD	2,200	2,000	1,650	1,500
<b>Month 2 vs 9+ (MINI DUBAI CRUDE OIL (PLATTS) FUT)</b>								
DBL	Non-HRP		Decrease	USD	200	200	150	150
DBL	HRP		Decrease	USD	220	200	165	150
<b>Months 1 vs 9+ (DUBAI CRUDE OIL CALENDAR FUT)</b>								
DC	Non-HRP		Decrease	USD	2,250	2,250	2,000	2,000
DC	HRP		Decrease	USD	2,475	2,250	2,200	2,000
<b>Months 1 vs 9+ (MINI DUBAI CRUDE OIL (PLATTS) FUT)</b>								
DBL	Non-HRP		Decrease	USD	225	225	200	200
DBL	HRP		Decrease	USD	248	225	220	200
<b>Months 3-8 vs 3-8 (DUBAI CRUDE OIL CALENDAR FUT)</b>								
DC	Non-HRP		Decrease	USD	2,800	2,800	1,900	1,900
DC	HRP		Decrease	USD	3,080	2,800	2,090	1,900
<b>Months 3-8 vs 3-8 (MINI DUBAI CRUDE OIL (PLATTS) FUT)</b>								
DBL	Non-HRP		Decrease	USD	280	280	190	190
DBL	HRP		Decrease	USD	308	280	209	190
<b>Months 3-8 vs 9+ (DUBAI CRUDE OIL CALENDAR FUT)</b>								
DC	Non-HRP		Decrease	USD	2,450	2,450	1,300	1,300
DC	HRP		Decrease	USD	2,695	2,450	1,430	1,300
<b>Months 3-8 vs 9+ (MINI DUBAI CRUDE OIL (PLATTS) FUT)</b>								
DBL	Non-HRP		Decrease	USD	245	245	130	130
DBL	HRP		Decrease	USD	270	245	143	130
<b>Relperiod - consecutives (DUBAI CRUDE OIL CALENDAR FUT)</b>								
DC	Non-HRP		Decrease	USD	925	925	700	700
DC	HRP		Decrease	USD	1,018	925	770	700

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Intra Spreads</b>								
<b>Relperiod - consecutives (MINI DUBAI CRUDE OIL (PLATTS) FUT)</b>								
DBL	Non-HRP		Decrease	USD	93	93	70	70
DBL	HRP		Decrease	USD	102	93	77	70
<b>CRUDE OIL SPREADS - Intra Spreads</b>								
<b>1-3 vs 1-3 (WTS (ARGUS) V WTI TRD MTH FUT)</b>								
FH	Non-HRP		Increase	USD	375	375	480	480
FH	HRP		Increase	USD	413	375	528	480
<b>Dated-to-Frontline Brent Swap - Mth 1 vs Mths 2+ (DATED TO FRONTLINE BRENT CLNDR FUT)</b>								
FY	Non-HRP		Decrease	USD	1,000	1,000	800	800
FY	HRP		Decrease	USD	1,100	1,000	880	800
<b>Guernsey Light Sweet Crude Oil Index (Net Energy) Futures - All Months (GUERNSEY LIGHT SWEET (NE2) MNTH IND)</b>								
GSW	Non-HRP		Decrease	USD	3,200	3,200	2,500	2,500
GSW	HRP		Decrease	USD	3,520	3,200	2,750	2,500

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Intra Spreads</b>								
<b>DME Products - Intra Spreads</b>								
<b>Consecutive Rate (Mnth 2+) (DME OMAN CRUDE OIL)</b>								
OQ	Non-HRP		Decrease	USD	1,250	1,250	1,000	1,000
OQ	HRP		Decrease	USD	1,375	1,250	1,100	1,000
<b>Consecutive Rate (Mnth 2+) (OMAN CRUDE FINANCIAL)</b>								
ZG	Non-HRP		Decrease	USD	1,250	1,250	1,000	1,000
ZG	HRP		Decrease	USD	1,375	1,250	1,100	1,000
<b>Consecutive Rate (Mnth 2+) (OMAN CRUDE OIL TAM FUT)</b>								
OQB	Non-HRP		Decrease	USD	1,250	1,250	1,000	1,000
OQB	HRP		Decrease	USD	1,375	1,250	1,100	1,000
<b>Consecutive Rate (Mnth 2+) (OMAN CRUDE OIL TAM MARKER SYN)</b>								
OQ1	Non-HRP		Decrease	USD	1,250	1,250	1,000	1,000
OQ1	HRP		Decrease	USD	1,375	1,250	1,100	1,000
<b>DME Oman Crude Oil Calendar Futures - Tier 1 vs Tier 2 (DME OMAN CRUDE CAL FUT)</b>								
ODO	Non-HRP		Increase	USD	2,800	2,800	3,950	3,950
ODO	HRP		Increase	USD	3,080	2,800	4,345	3,950
<b>DME Oman Crude Oil Calendar Futures - Tier 2 vs Tier 2 (DME OMAN CRUDE CAL FUT)</b>								
ODO	Non-HRP		Increase	USD	475	475	550	550
ODO	HRP		Increase	USD	523	475	605	550
<b>DME Oman Crude Oil Calendar Futures - Tier 2 vs Tier 3 (DME OMAN CRUDE CAL FUT)</b>								
ODO	Non-HRP		Increase	USD	500	500	750	750
ODO	HRP		Increase	USD	550	500	825	750
<b>Month 1 vs 4-8 (DME OMAN CRUDE OIL)</b>								
OQ	Non-HRP		Decrease	USD	7,200	7,200	4,300	4,300
OQ	HRP		Decrease	USD	7,920	7,200	4,730	4,300
<b>Month 1 vs 4-8 (OMAN CRUDE FINANCIAL)</b>								
ZG	Non-HRP		Decrease	USD	7,200	7,200	4,300	4,300
ZG	HRP		Decrease	USD	7,920	7,200	4,730	4,300
<b>Month 1 vs 4-8 (OMAN CRUDE OIL TAM FUT)</b>								
OQB	Non-HRP		Decrease	USD	7,200	7,200	4,300	4,300
OQB	HRP		Decrease	USD	7,920	7,200	4,730	4,300
<b>Month 1 vs 4-8 (OMAN CRUDE OIL TAM MARKER SYN)</b>								
OQ1	Non-HRP		Decrease	USD	7,200	7,200	4,300	4,300
OQ1	HRP		Decrease	USD	7,920	7,200	4,730	4,300

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Intra Spreads</b>								
<b>Month 1 vs 9+ (DME OMAN CRUDE OIL)</b>								
OQ	Non-HRP		Decrease	USD	5,200	5,200	3,100	3,100
OQ	HRP		Decrease	USD	5,720	5,200	3,410	3,100
<b>Month 1 vs 9+ (OMAN CRUDE FINANCIAL)</b>								
ZG	Non-HRP		Decrease	USD	5,200	5,200	3,100	3,100
ZG	HRP		Decrease	USD	5,720	5,200	3,410	3,100
<b>Month 1 vs 9+ (OMAN CRUDE OIL TAM FUT)</b>								
OQB	Non-HRP		Decrease	USD	5,200	5,200	3,100	3,100
OQB	HRP		Decrease	USD	5,720	5,200	3,410	3,100
<b>Month 1 vs 9+ (OMAN CRUDE OIL TAM MARKER SYN)</b>								
OQ1	Non-HRP		Decrease	USD	5,200	5,200	3,100	3,100
OQ1	HRP		Decrease	USD	5,720	5,200	3,410	3,100
<b>Months 2-3 vs 4-8 (DME OMAN CRUDE OIL)</b>								
OQ	Non-HRP		Decrease	USD	5,500	5,500	2,800	2,800
OQ	HRP		Decrease	USD	6,050	5,500	3,080	2,800
<b>Months 2-3 vs 4-8 (OMAN CRUDE FINANCIAL)</b>								
ZG	Non-HRP		Decrease	USD	5,500	5,500	2,800	2,800
ZG	HRP		Decrease	USD	6,050	5,500	3,080	2,800
<b>Months 2-3 vs 4-8 (OMAN CRUDE OIL TAM FUT)</b>								
OQB	Non-HRP		Decrease	USD	5,500	5,500	2,800	2,800
OQB	HRP		Decrease	USD	6,050	5,500	3,080	2,800
<b>Months 2-3 vs 4-8 (OMAN CRUDE OIL TAM MARKER SYN)</b>								
OQ1	Non-HRP		Decrease	USD	5,500	5,500	2,800	2,800
OQ1	HRP		Decrease	USD	6,050	5,500	3,080	2,800
<b>Months 2-3 vs 9+ (DME OMAN CRUDE OIL)</b>								
OQ	Non-HRP		Decrease	USD	2,700	2,700	1,500	1,500
OQ	HRP		Decrease	USD	2,970	2,700	1,650	1,500
<b>Months 2-3 vs 9+ (OMAN CRUDE FINANCIAL)</b>								
ZG	Non-HRP		Decrease	USD	2,700	2,700	1,500	1,500
ZG	HRP		Decrease	USD	2,970	2,700	1,650	1,500
<b>Months 2-3 vs 9+ (OMAN CRUDE OIL TAM FUT)</b>								
OQB	Non-HRP		Decrease	USD	2,700	2,700	1,500	1,500
OQB	HRP		Decrease	USD	2,970	2,700	1,650	1,500

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Intra Spreads</b>								
<b>Months 2-3 vs 9+ (OMAN CRUDE OIL TAM MARKER SYN)</b>								
OQ1	Non-HRP		Decrease	USD	2,700	2,700	1,500	1,500
OQ1	HRP		Decrease	USD	2,970	2,700	1,650	1,500
<b>Months 4-8 vs 4-8 (DME OMAN CRUDE OIL)</b>								
OQ	Non-HRP		Decrease	USD	2,600	2,600	1,700	1,700
OQ	HRP		Decrease	USD	2,860	2,600	1,870	1,700
<b>Months 4-8 vs 4-8 (OMAN CRUDE FINANCIAL)</b>								
ZG	Non-HRP		Decrease	USD	2,600	2,600	1,700	1,700
ZG	HRP		Decrease	USD	2,860	2,600	1,870	1,700
<b>Months 4-8 vs 4-8 (OMAN CRUDE OIL TAM FUT)</b>								
OQB	Non-HRP		Decrease	USD	2,600	2,600	1,700	1,700
OQB	HRP		Decrease	USD	2,860	2,600	1,870	1,700
<b>Months 4-8 vs 4-8 (OMAN CRUDE OIL TAM MARKER SYN)</b>								
OQ1	Non-HRP		Decrease	USD	2,600	2,600	1,700	1,700
OQ1	HRP		Decrease	USD	2,860	2,600	1,870	1,700
<b>Months 4-8 vs 9+ (DME OMAN CRUDE OIL)</b>								
OQ	Non-HRP		Decrease	USD	1,100	1,100	700	700
OQ	HRP		Decrease	USD	1,210	1,100	770	700
<b>Months 4-8 vs 9+ (OMAN CRUDE FINANCIAL)</b>								
ZG	Non-HRP		Decrease	USD	1,100	1,100	700	700
ZG	HRP		Decrease	USD	1,210	1,100	770	700
<b>Months 4-8 vs 9+ (OMAN CRUDE OIL TAM FUT)</b>								
OQB	Non-HRP		Decrease	USD	1,100	1,100	700	700
OQB	HRP		Decrease	USD	1,210	1,100	770	700
<b>Months 4-8 vs 9+ (OMAN CRUDE OIL TAM MARKER SYN)</b>								
OQ1	Non-HRP		Decrease	USD	1,100	1,100	700	700
OQ1	HRP		Decrease	USD	1,210	1,100	770	700
<b>INTEREST RATES - Intra Spreads</b>								
<b>ESR - EURO SHORT TERM RATE FUTURE (ESTR FUTURES)</b>								
ESR	Non-HRP		New	EUR			375	375
ESR	HRP		New	EUR			413	375
<b>EUS INTRA SPREAD (ESTR THREE MO BASIS SPREAD FUTURES)</b>								
EUS	Non-HRP		New	EUR			125	125
EUS	HRP		New	EUR			138	125

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Intra Spreads</b>								
<b>PETROLEUM CRACKS AND SPREADS - Intra Spreads</b>								
<b>JET AVIA FUEL (PLATTS) CARGOES FOB V. ICE - All Months (JET AVIA FUEL(PLTT) FOB V. ICE)</b>								
1V	Non-HRP		Increase	USD	5,000	5,000	6,000	6,000
1V	HRP		Increase	USD	5,500	5,000	6,600	6,000
<b>Singapore Fuel Oil Spread Swap - Consecutives 2/3+ (SINGAPORE FUEL OIL SPREAD FUT)</b>								
SD	Non-HRP		Increase	USD	2,100	2,100	2,500	2,500
SD	HRP		Increase	USD	2,310	2,100	2,750	2,500
<b>SINGAPORE JET KERO GASOIL SWAP - Consecutives (SINGAPORE JET KERO GASOIL FUT)</b>								
RK	Non-HRP		Increase	USD	550	550	600	600
RK	HRP		Increase	USD	605	550	660	600

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Intra Spreads</b>								
<b>REFINED PRODUCTS - Intra Spreads</b>								
<b>(SYNT JAPAN C&amp;F NAPHTHA FUT)</b>								
SJA	Non-HRP		Decrease	USD	12,000	12,000	9,000	9,000
SJA	Non-HRP		Decrease	USD	30,000	30,000	23,000	23,000
SJA	HRP		Decrease	USD	13,200	12,000	9,900	9,000
SJA	HRP		Decrease	USD	33,000	30,000	25,300	23,000
<b>European Naphtha Calendar Swap - consecutives (EUROPE NAPHTHA CALFUT)</b>								
UN	Non-HRP		Decrease	USD	12,250	12,250	9,000	9,000
UN	HRP		Decrease	USD	13,475	12,250	9,900	9,000
<b>European Naphtha Calendar Swap - consecutives (MIN EURO NPHTHA CIF NWE FUT)</b>								
MNC	Non-HRP		Decrease	USD	1,225	1,225	900	900
MNC	HRP		Decrease	USD	1,348	1,225	990	900
<b>European Naphtha Calendar Swap - Mnth 1 vs Mnths 2-6 (EUROPE NAPHTHA CALFUT)</b>								
UN	Non-HRP		Decrease	USD	22,000	22,000	14,000	14,000
UN	HRP		Decrease	USD	24,200	22,000	15,400	14,000
<b>European Naphtha Calendar Swap - Mnth 1 vs Mnths 2-6 (MIN EURO NPHTHA CIF NWE FUT)</b>								
MNC	Non-HRP		Decrease	USD	2,200	2,200	1,400	1,400
MNC	HRP		Decrease	USD	2,420	2,200	1,540	1,400
<b>European Naphtha Calendar Swap - Mnths 2-6 vs 2-6 (EUROPE NAPHTHA CALFUT)</b>								
UN	Non-HRP		Decrease	USD	29,000	29,000	20,000	20,000
UN	HRP		Decrease	USD	31,900	29,000	22,000	20,000
<b>European Naphtha Calendar Swap - Mnths 2-6 vs 2-6 (MIN EURO NPHTHA CIF NWE FUT)</b>								
MNC	Non-HRP		Decrease	USD	2,900	2,900	2,000	2,000
MNC	HRP		Decrease	USD	3,190	2,900	2,200	2,000
<b>Gasoline Euro-bob Oxy (Argus) NWE Barges Swap - Mnth 1 vs Mnth 2 (GAS EURO-BOB OXY (ARG) NEW BRG)</b>								
7H	Non-HRP		Decrease	USD	15,000	15,000	11,000	11,000
7H	HRP		Decrease	USD	16,500	15,000	12,100	11,000
<b>Gasoline Euro-bob Oxy (Argus) NWE Barges Swap - Mnth 1 vs Mnth 2 (MINI GAS EUROBOB OXY BARGES FUT)</b>								
MEO	Non-HRP		Decrease	USD	15,000	15,000	11,000	11,000
MEO	HRP		Decrease	USD	16,500	15,000	12,100	11,000
<b>Gasoline Euro-bob Oxy (Argus) NWE Barges Swap - Mnth 1 vs Mnth 2 (SYNTH 116 GAS EURO-BOB OXY (ARG))</b>								
116	Non-HRP		Decrease	USD	1,500	1,500	1,100	1,100
116	HRP		Decrease	USD	1,650	1,500	1,210	1,100

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Intra Spreads</b>								
<b>Gasoline Euro-bob Oxy (Argus) NWE Barges Swap - Month 1 vs Months 3+ (GAS EURO-BOB OXY (ARG) NEW BRG)</b>								
7H	Non-HRP		Decrease	USD	30,000	30,000	26,000	26,000
7H	HRP		Decrease	USD	33,000	30,000	28,600	26,000
<b>Gasoline Euro-bob Oxy (Argus) NWE Barges Swap - Month 1 vs Months 3+ (MINI GAS EUROBOB OXY BARGES FUT)</b>								
MEO	Non-HRP		Decrease	USD	30,000	30,000	26,000	26,000
MEO	HRP		Decrease	USD	33,000	30,000	28,600	26,000
<b>Gasoline Euro-bob Oxy (Argus) NWE Barges Swap - Month 1 vs Months 3+ (SYNTH 116 GAS EURO-BOB OXY (ARG))</b>								
116	Non-HRP		Decrease	USD	3,000	3,000	2,600	2,600
116	HRP		Decrease	USD	3,300	3,000	2,860	2,600
<b>Gasoline Euro-bob Oxy (Argus) NWE Barges Swap - Month 2 vs Months 3+ (GAS EURO-BOB OXY (ARG) NEW BRG)</b>								
7H	Non-HRP		Decrease	USD	31,000	31,000	25,000	25,000
7H	HRP		Decrease	USD	34,100	31,000	27,500	25,000
<b>Gasoline Euro-bob Oxy (Argus) NWE Barges Swap - Month 2 vs Months 3+ (MINI GAS EUROBOB OXY BARGES FUT)</b>								
MEO	Non-HRP		Decrease	USD	31,000	31,000	25,000	25,000
MEO	HRP		Decrease	USD	34,100	31,000	27,500	25,000
<b>Gasoline Euro-bob Oxy (Argus) NWE Barges Swap - Month 2 vs Months 3+ (SYNTH 116 GAS EURO-BOB OXY (ARG))</b>								
116	Non-HRP		Decrease	USD	3,100	3,100	2,500	2,500
116	HRP		Decrease	USD	3,410	3,100	2,750	2,500
<b>Japan C&amp;F Naphtha (Platts) Swap - Consecutive (121 SYNT JAPAN C&amp;F NAPHTHA FUT)</b>								
121	Non-HRP		Decrease	USD	1,200	1,200	900	900
121	HRP		Decrease	USD	1,320	1,200	990	900
<b>Japan C&amp;F Naphtha (Platts) Swap - Consecutive (JAPAN C&amp;F NAPHTHA FUT)</b>								
JA	Non-HRP		Decrease	USD	12,000	12,000	9,000	9,000
JA	HRP		Decrease	USD	13,200	12,000	9,900	9,000
<b>Japan C&amp;F Naphtha (Platts) Swap - Consecutive (MIN JAPAN C&amp;F NAPHTHA PLATTS FUT)</b>								
MJN	Non-HRP		Decrease	USD	1,200	1,200	900	900
MJN	HRP		Decrease	USD	1,320	1,200	990	900
<b>Japan C&amp;F Naphtha (PLATTS) Swap - 2+ vs 2+ (121 SYNT JAPAN C&amp;F NAPHTHA FUT)</b>								
121	Non-HRP		Decrease	USD	3,000	3,000	2,300	2,300
121	HRP		Decrease	USD	3,300	3,000	2,530	2,300
<b>Japan C&amp;F Naphtha (PLATTS) Swap - 2+ vs 2+ (JAPAN C&amp;F NAPHTHA FUT)</b>								
JA	Non-HRP		Decrease	USD	30,000	30,000	23,000	23,000
JA	HRP		Decrease	USD	33,000	30,000	25,300	23,000

## SPAN MINIMUM PERFORMANCE BOND REQUIREMENTS

CC	Rate Type	Description	Change	ISO	Current Initial	Current Maintenance	New Initial	New Maintenance
<b>Intra Spreads</b>								
<b>Japan C&amp;F Naphtha (PLATTS) Swap - 2+ vs 2+ (MIN JAPAN C&amp;F NAPHTHA PLATTS FUT)</b>								
MJN	Non-HRP		Decrease	USD	3,000	3,000	2,300	2,300
MJN	HRP		Decrease	USD	3,300	3,000	2,530	2,300
<b>Month 1 vs 7+ (MICRO SINGAPORE FUEL OIL 380CST (PL))</b>								
MAF	Non-HRP		Decrease	USD	250	250	210	210
MAF	HRP		Decrease	USD	275	250	231	210
<b>Month 1 vs 7+ (MINI SINGAPORE 380CST FUEL OIL FUT)</b>								
MTS	Non-HRP		Decrease	USD	2,500	2,500	2,100	2,100
MTS	HRP		Decrease	USD	2,750	2,500	2,310	2,100
<b>Month 1 vs 7+ (SINGAPORE 380CST FUEL OIL FUT)</b>								
SE	Non-HRP		Decrease	USD	25,000	25,000	21,000	21,000
SE	HRP		Decrease	USD	27,500	25,000	23,100	21,000
<b>Singapore 380CST Fuel Oil - 2-6 vs 7+ (MICRO SINGAPORE FUEL OIL 380CST (PL))</b>								
MAF	Non-HRP		Decrease	USD	275	275	200	200
MAF	HRP		Decrease	USD	303	275	220	200
<b>Singapore 380CST Fuel Oil - 2-6 vs 7+ (MINI SINGAPORE 380CST FUEL OIL FUT)</b>								
MTS	Non-HRP		Decrease	USD	2,750	2,750	2,000	2,000
MTS	HRP		Decrease	USD	3,025	2,750	2,200	2,000
<b>Singapore 380CST Fuel Oil - 2-6 vs 7+ (SINGAPORE 380CST FUEL OIL FUT)</b>								
SE	Non-HRP		Decrease	USD	27,500	27,500	20,000	20,000
SE	HRP		Decrease	USD	30,250	27,500	22,000	20,000
<b>Singapore 380cst Fuel Oil Swap - Consecutives (MICRO SINGAPORE FUEL OIL 380CST (PL))</b>								
MAF	Non-HRP		Decrease	USD	59	59	45	45
MAF	HRP		Decrease	USD	65	59	50	45
<b>Singapore 380cst Fuel Oil Swap - Consecutives (MINI SINGAPORE 380CST FUEL OIL FUT)</b>								
MTS	Non-HRP		Decrease	USD	590	590	450	450
MTS	HRP		Decrease	USD	649	590	495	450
<b>Singapore 380cst Fuel Oil Swap - Consecutives (SINGAPORE 380CST FUEL OIL FUT)</b>								
SE	Non-HRP		Decrease	USD	5,900	5,900	4,500	4,500
SE	HRP		Decrease	USD	6,490	5,900	4,950	4,500

# 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**

**LIGHT SWEET CRUDE OIL FUTURES (NY-CL - CME) vs BRENT CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-BZ - CME) vs WTI HOUSTON (ARGUS) VS. WTI TRADE MONTH FUTURES (NY-HTT - CME)**

Spread Credit Rate	Increase	+1:-1:+1	92%	92%	94%	94%
--------------------	----------	----------	-----	-----	-----	-----

**CRUDE OIL SPREADS - Inter-commodity Spread Rates**

**LIGHT SWEET CRUDE OIL FUTURES (NY-CL - CME) vs BRENT CRUDE OIL LAST DAY FINANCIAL FUTURES (NY-BZ - CME) vs WTI HOUSTON (ARGUS) VS. WTI TRADE MONTH FUTURES (NY-HTT - CME)**

Spread Credit Rate	Increase	+1:-1:+1	92%	92%	94%	94%
--------------------	----------	----------	-----	-----	-----	-----