

IETA BMPR Mission Korea
Theme 3 – ETS Infrastructure

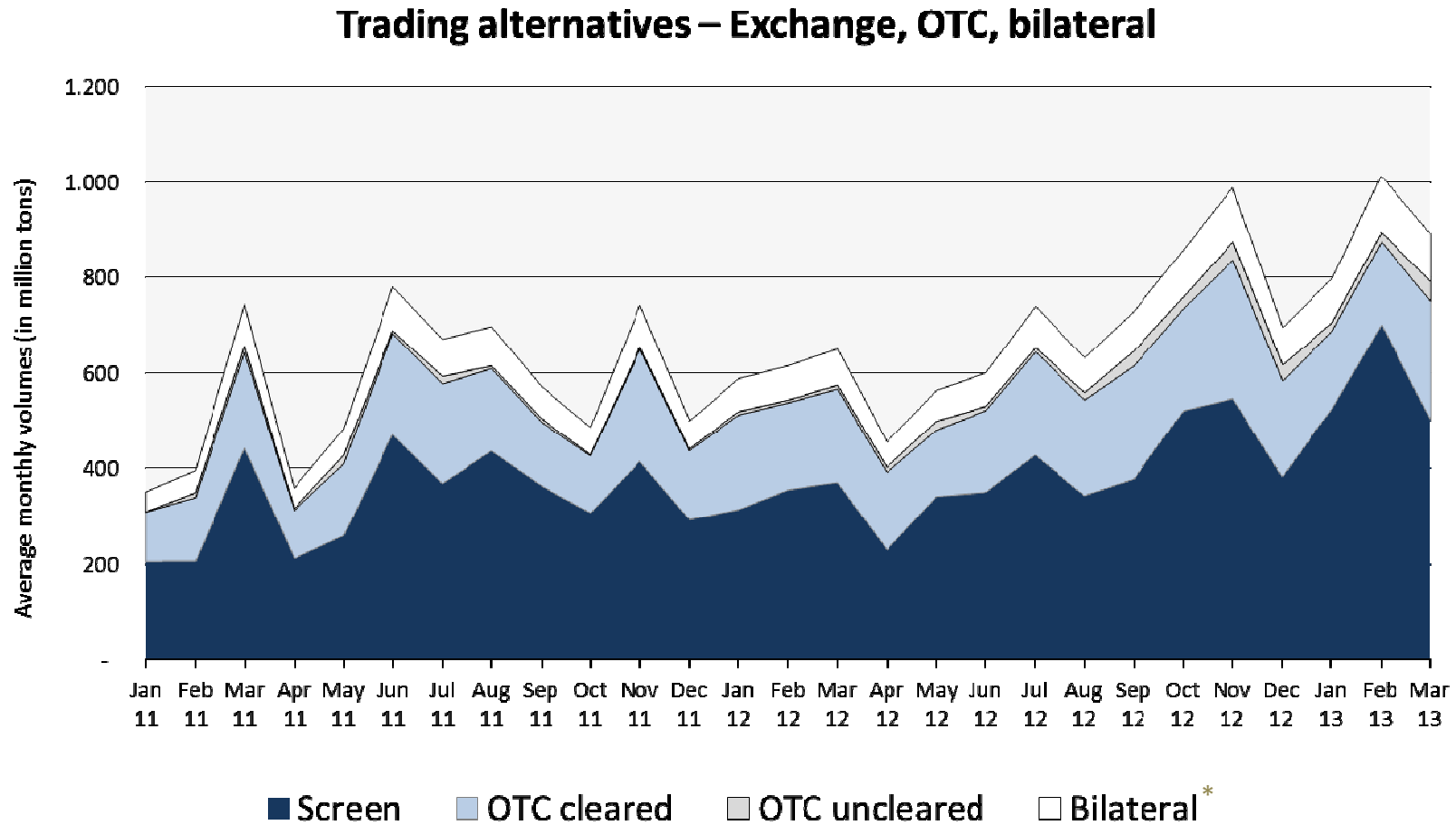
The Exchange: How carbon is traded on an Exchange and in the OTC Market

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European Energy Exchange
27 September 2013

Market places

- Three routes to market
 - Bilateral trades
 - „Over the counter“ (OTC) brokers
 - Exchanges
- Different characteristics with regard to:
 - Liquidity & number of participants
 - Transparency
 - Level of regulation
 - Management of credit risk

Share of market places in EU ETS



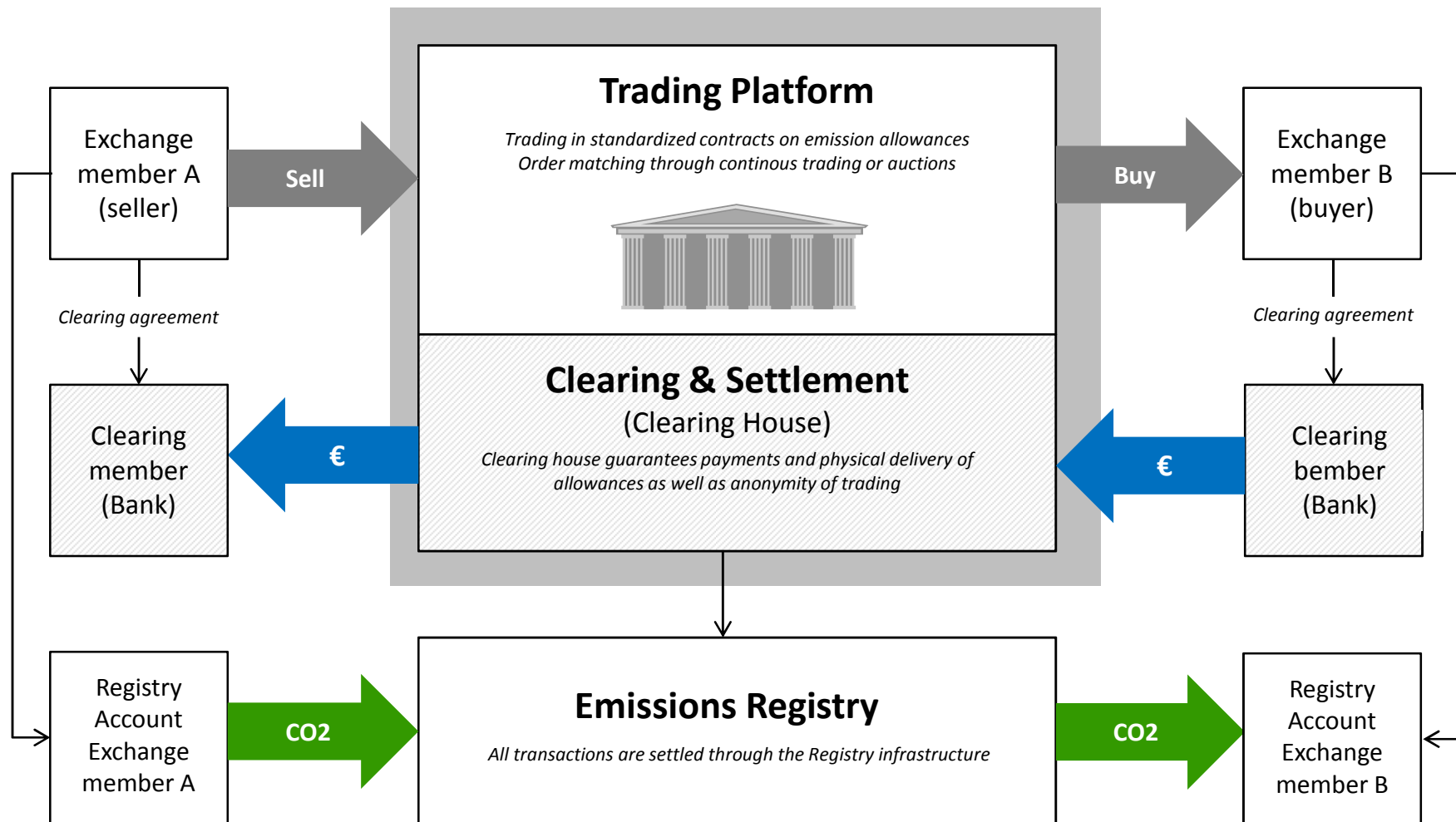
Source: Point Carbon, Reuters, LEBA

*World Bank estimate: Bilateral amounting to 15% of total volumes – shown for illustrative purpose

Trading sectors

- Primary auctions
 - Primary allocation of allowances
- Spot
 - Meets short term needs, deals are completed „on the spot“ and settled quickly (<2 days)
- Futures/Forwards, Options
 - Management of price risk or speculative bids; Transactions with delivery in the future (eg December 2013)

Emissions Trading on the Exchange



Emissions Trading on the Exchange

- Trading on an electronic platform at standardized terms and conditions
 - Exchange rules and clearing conditions
 - Trading hours (8-18h CET)
 - Contract Specifications (define eg quantity/quality, contract size, place of delivery, delivery period,...)
- Access to the exchange
 - Direct exchange membership
 - Via financial intermediaries

Emissions Trading on the Exchange

- Trading
 - Bid/ask orders can be entered/modified/cancelled in the order book directly through trading screens or „on behalf“ (via phone/mail/fax)
 - Order matching: Auctions vs. continuous trading
- Clearing & Settlement
 - Clearing house steps in-between buyer and seller, thus becomes direct counterparty of buyer/seller
 - Covers counterparty risk, guarantees all payments, depositing of collateral and deliveries as well as anonymity

Order book (Example)

SIMU: Market Overview - Own Trades (Emission) - Trading Date: 20.08.2013

Window Maintenance Sound Help TRD030, ABCEX 11:08:15

Continuous Export: My Orders: Kill All Hold All Release All

SIMU: Orderbook Details / Trade History EUA 2013-2020 - EU

BidAvg	BidAcc	OBQty	BQty	Bid	Ask	AOQty	OAQty	AskAcc	AskAvg
4,32	500	500	500	4,32	4,34	250	250	250	4,34
4,31	700	200	200	4,30	4,35	1000	1000	1250	4,35
4,30	1700	1000	1000	4,29	4,38	500	500	1750	4,36
4,30	1750	50	50	4,28					

SIMU: Own Orders (Emission)

Trader Id	B/S	Product	Contract	VTP	Qty	PeakQty	ShownQty	Prc	Curr	Act	Text	ExeRes	ValRes	ValDate	Status	Order No	Date/Time
TRD030	B	GREEN CER	GREEN CER	EU	500			0,55	EUR	P		GFSS	20.08.2013 18:00:00	20.08.2013 10:59:47	30131014	20.08.2013 10:59:47	
TRD030	S	GREEN CER	GREEN CER	EU	500			0,59	EUR	P		GFSS	20.08.2013 18:00:00	20.08.2013 11:04:31	30131012	20.08.2013 11:04:31	
TRD030	B	EUA	EUA 2013-2020	EU	1000			4,29	EUR	P		GFSS	20.08.2013 18:00:00	20.08.2013 10:57:47	30131011	20.08.2013 10:57:47	
TRD030	S	EUA	EUA 2013-2020	EU	500			4,38	EUR	P		GFSS	20.08.2013 18:00:00	20.08.2013 10:56:48	30131010	20.08.2013 10:56:48	
TRD030	B	EUA	EUA 2013-2020	EU	200			4,30	EUR	P		GFSS	20.08.2013 18:00:00	20.08.2013 10:44:52	30131005	20.08.2013 10:44:52	
TRD030	S	EUA	EUA 2013-2020	EU	1000			4,35	EUR	P		GFSS	20.08.2013 18:00:00	20.08.2013 10:44:27	30131004	20.08.2013 10:44:27	
TRD030	S	EUA	EUA 2013-2020	EU	250			4,34	EUR	P		GFSS	20.08.2013 18:00:00	20.08.2013 10:56:14	30131003	20.08.2013 10:56:14	
TRD030	B	EUA	EUA 2013-2020	EU	500			4,32	EUR	P		GFSS	20.08.2013 18:00:00	20.08.2013 10:55:43	30131002	20.08.2013 10:55:43	

successful completion

SIMU: Orderbook Overview (Emission)

Product	Contract	VTP	DP	OBQty	BQty	Bid	Ask	AOQty	OAQty	Last	LOQty	TOQty
GREEN CER	GREEN CER	EU		500	500	0,55	0,59	500	500	0,59	500	2.500
GREY CER	GREY CER	EU								0,50	500	500
EUA	EUA 2013-2020	EU										
EUA	EUA 2013-2020	EU		500	500	4,32	4,34	250	250	4,34	250	1.250
EUA				200	200	4,30	4,35	1000	1000			
EUA				1000	1000	4,29	4,38	500	500			

SIMU: Own Trades (Emission) - Trading Date: 20.08.2013

B/S	Product	Contract	VTP	Qty	Prc	Delivery Start	Delivery End	DNQty	Curr
B	GREEN CER	GREEN CER	EU	500	0,59	01.01.2012 00:00:00	31.12.2020 00:00:00	500	000 EUR
S	GREEN CER	GREEN CER	EU	500	0,59	01.01.2012 00:00:00	31.12.2020 00:00:00	500	000 EUR
B	GREY CER	GREY CER	EU	500	0,58	01.01.2012 00:00:00	31.12.2020 00:00:00	500	000 EUR
S	GREY CER	GREY CER	EU	500	0,58	01.01.2012 00:00:00	31.12.2020 00:00:00	500	000 EUR
S	GREEN CER	GREEN CER	EU	500	0,56	01.01.2012 00:00:00	31.12.2020 00:00:00	500	000 EUR
B	GREEN CER	GREEN CER	EU	500	0,56	01.01.2012 00:00:00	31.12.2020 00:00:00	500	000 EUR
S	GREEN CER	GREEN CER	EU	1000	0,56	01.01.2012 00:00:00	31.12.2020 00:00:00	1.000	000 EUR
B	GREEN CER	GREEN CER	EU	1000	0,56	01.01.2012 00:00:00	31.12.2020 00:00:00	1.000	000 EUR
S	GREEN CER	GREEN CER	EU	500	0,56	01.01.2012 00:00:00	31.12.2020 00:00:00	500	000 EUR
B	GREEN CER	GREEN CER	EU	500	0,56	01.01.2012 00:00:00	31.12.2020 00:00:00	500	000 EUR
B	EUA	EUA 2013-2020	EU	250	4,34	01.07.2012 00:00:00	01.05.2021 00:00:00	250	000 EUR
S	EUA	EUA 2013-2020	EU	250	4,34	01.07.2012 00:00:00	01.05.2021 00:00:00	250	000 EUR
S	EUA	EUA 2013-2020	EU	500	4,32	01.07.2012 00:00:00	01.05.2021 00:00:00	500	000 EUR
B	EUA	EUA 2013-2020	EU	500	4,32	01.07.2012 00:00:00	01.05.2021 00:00:00	500	000 EUR
S	EUA	EUA 2013-2020	EU	500	4,33	01.07.2012 00:00:00	01.05.2021 00:00:00	500	000 EUR
B	EUA	EUA 2013-2020	EU	500	4,33	01.07.2012 00:00:00	01.05.2021 00:00:00	500	000 EUR

Questions?