

The logo for Novarum, consisting of the word "NOVARUM" in a white, uppercase, sans-serif font. The letters are set against a dark blue background that features a complex, abstract pattern of overlapping, wavy lines and dots, creating a sense of depth and movement. The logo is centered horizontally and has a subtle reflection effect below it.

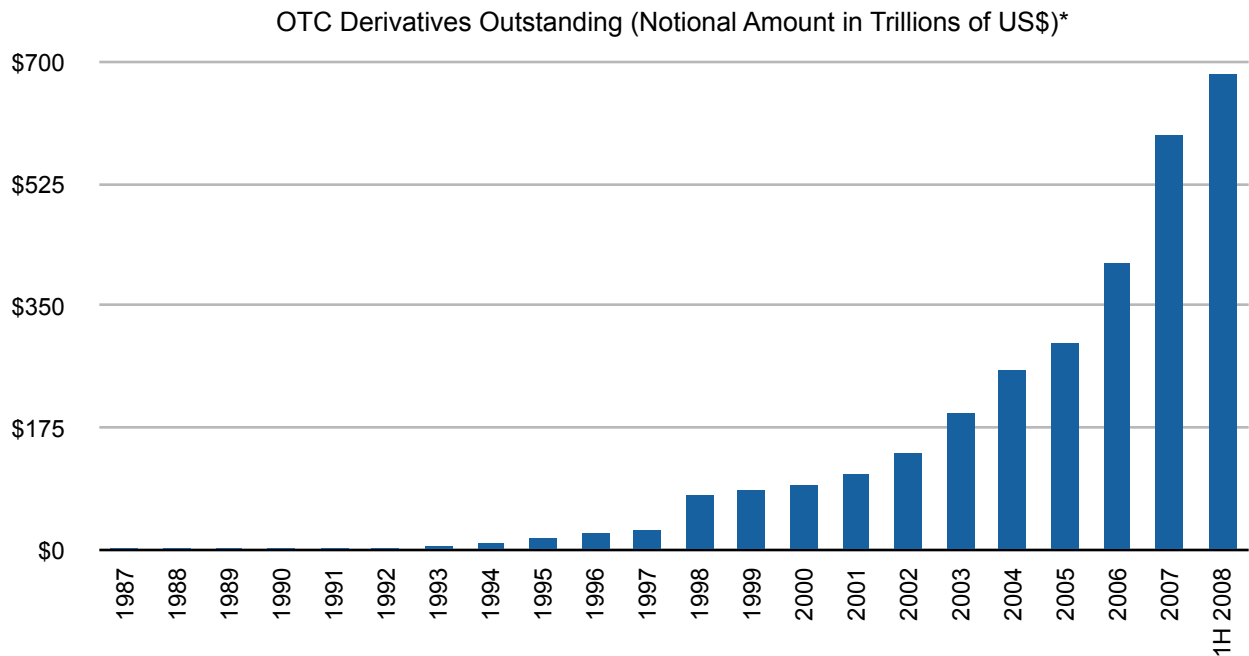
Hedging Unsecured Counterparty Credit Risk

December 2008

OTC DERIVATIVES

The dramatic growth of the OTC derivatives market represents one of the most significant developments in the financial markets over the last 25 years. According to the Bank for International Settlements, the total notional of outstanding OTC derivative contracts has grown from US \$1 trillion in 1987 to \$684 trillion by the end of June 2008.

Proponents of the OTC derivatives market maintain that by facilitating the disaggregation and reallocation of financial risk, the OTC derivatives market has made a significant positive contribution to the overall efficiency of financial markets. However, these benefits have come at a veiled cost. Risk transfer creates a lingering negative artifact: OTC derivative counterparty credit risk ("CCR").



*According to ISDA and Bank for International Settlements.

COUNTERPARTY CREDIT RISK

CCR is defined as the cost of replacing an OTC derivative contract prior to its stipulated maturity date following an event of default by the counterparty. Unfortunately, while the current replacement cost (“CRC”) is known today, the future replacement cost (“FRC”) is unknown, being dependent upon:

- i. Price level and/or volatility of the reference index used in the determination of contract payments;
- ii. Duration and liquidity of contracts; and
- iii. Creditworthiness of counterparties.

Unlike traditional debt instruments where the magnitude of credit risk is known at inception, actual CCR is only known ex post. Although the true magnitude of CCR is unknown, Risk Managers are required to approve, report, and manage this esoteric credit risk.

Risk Managers measure and report CCR in units of Expected Positive Exposure (“EPE”) and Risk Weighted Assets (“RWA”). EPE is defined as the weighted average of the mean of the distributions of potential replacement costs at future dates up until the stipulated maturity date of the transaction (or netting set). RWA is defined as the EPE over the first year multiplied by increments that reflect the creditworthiness of the counterparty and the effective duration of the transaction (or netting set) and the potential correlation between the price of reference indices and counterparty defaults (alpha).

While reliable industry EPE and RWA metrics are not publicly available, dealers do report the CRC of their outstanding OTC derivative contracts. Although CRC is only a component of EPE, it does provide an indication of the magnitude of CCR retained by market participants. At the end of June 2008, the Bank for International Settlements reported that gross CRC reported by dealers, defined as the gross value of contracts that have a positive replacement cost after taking into account legally enforceable bilateral netting agreements, stood at \$3,859 billion. Accordingly, it would not be unreasonable to assume that the current inventory of outstanding OTC derivative contracts has created in excess of \$10 trillion of CCR.

MARKET FAILURE

The unprecedented disruption in financial markets witnessed over the past 12 months has raised concern amongst market commentators and elected officials that the potential magnitude of CCR retained by the banking industry represents an unacceptable systemic risk to the stability of financial markets. Inevitably, elected officials have called for greater oversight and regulation of the OTC derivatives market. In response, dealers have proposed the establishment of one or more central counterparties (“CCP”) to:

- i. Settle OTC derivative contracts;
- ii. Enhance market transparency; and
- iii. Mitigate CCR through the use of daily margining.

While such proposals will alleviate a significant proportion of CCR that exists between financial institutions able and willing to post margin, they offer little to address CCR arising from OTC derivative contracts executed on an unsecured basis. Needless to say, faced with a rapidly deteriorating economic environment, counterparties are extremely reluctant or even contractually prohibited from renegotiating the terms of these contracts. Therefore, it is critical that any proposal to enhance the current market architecture includes mechanisms to facilitate and encourage the amelioration of unsecured CCR.

The Contingent Credit Default Swap (“CCDS”) was designed specifically to mitigate unsecured CCR. The pay-off profile of the CCDS replicates the unsecured CCR to a specified counterparty (reference credit), arising from a specified OTC derivative contract (reference transaction). Executed under standard ISDA documentation, the CCDS can be directly integrated into the calculation of EPE and RWA as a simple contra netting set. Furthermore, through the application of standard optimization techniques, a simple portfolio of plain vanilla CCDS can be executed to hedge the unsecured CCR arising from even the most complex OTC derivative netting sets.

While the simplicity and efficacy of the CCDS as an effective unsecured CCR mitigant is compelling, a market in CCDS has failed to evolve. This market failure is due to a chronic imbalance between the demand for and supply of CCDS protection. Traditional non-bank financial insurers are either unable or unwilling to underwrite this type of esoteric risk. An alternative solution that would alleviate this constraint would be the establishment of an industry sponsored Credit Derivative Products Company (“CDPC”) that provides CCDS protection to OTC derivative dealers on a fully collateralized basis - either directly, through an industry sponsored CCP, or through a regulated exchange.

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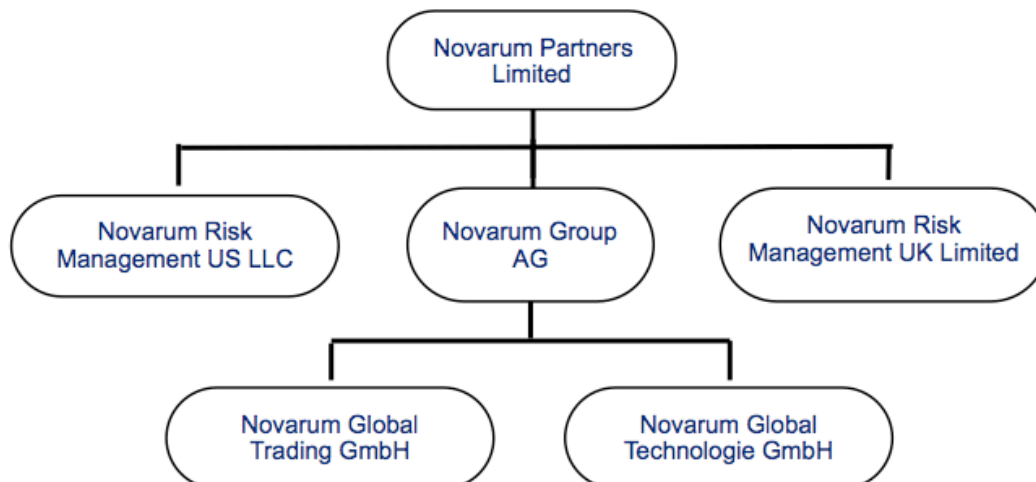
After 5 years of collaboration with market participants and industry regulators, Novarum Global Trading GmbH (hereinafter referred to as "NOVARUM") will begin operation in 2009 as a wholesale provider of CCDS to OTC derivative dealers to facilitate the hedging of unsecured CCR.

IN CONTRAST WITH TRADITIONAL NON-BANK FINANCIAL INSURERS THAT PASSIVELY UNDERWRITE AND RETAIN CREDIT RISK, THE RAISON D'ETRE OF NOVARUM IS TO ACTIVELY AND CONTINUOUSLY HEDGE ITS BOOK OF CCDS USING REPLICATING PORTFOLIOS OF PLAIN VANILLA OTC DERIVATIVE PRODUCTS.

ORGANIZATION AND OWNERSHIP

NOVARUM is a fully collateralized CDPC incorporated in the Swiss canton of Zug as a limited liability company [Gesellschaft mit beschränkter Haftung]. NOVARUM is a fully-owned operating subsidiary of Novarum Group AG. Novarum Group AG is a stock corporation [Aktiengesellschaft] incorporated in the Swiss canton of Zug. Novarum Group AG is a fully-owned subsidiary of Novarum Partners Limited. Novarum Partners Limited is a Business Company incorporated in the British Virgin Islands. Novarum Partners Limited is controlled and fully owned by the Founders and Senior Management Team of the Novarum group of companies.

THE NOVARUM GROUP OF COMPANIES



BUSINESS PURPOSE

NOVARUM's Operating Guidelines ("OG") authorize it to execute specified CCDs and associated *plain vanilla* OTC derivative hedges, (collectively referred to in the OG as "APPROVED TRADING INSTRUMENTS") with select counterparties (referred to in the OG as "APPROVED COUNTERPARTIES"), governed under standard ISDA documentation (referred to in the OG as "APPROVED DOCUMENTATION").

CREDITWORTHINESS

NOVARUM was specifically structured to eliminate, to the fullest extent possible, any credit risk between itself and its APPROVED COUNTERPARTIES. Based upon the credit risk mitigation summarized below, NOVARUM expects to receive a [] Counterparty Credit Rating from []].

- i. All APPROVED TRADING INSTRUMENTS executed by NOVARUM are governed under an ISDA Credit Support Annex ("CSA") requiring both NOVARUM and its APPROVED COUNTERPARTIES post daily cash collateral equal to the CRC of all outstanding contracts.
- ii. The potential FRC of APPROVED TRADING INSTRUMENTS, over and above their CRC, is determined by NOVARUM at the close of each business day using a proprietary VaR Model (referred to in the OG as the "CAPITAL ADEQUACY TEST"). NOVARUM is required under the OG to maintain an amount of AVAILABLE CAPITAL, over and above any collateral paid to APPROVED COUNTERPARTIES, sufficient to fully collateralize any potential FRC up to a confidence factor commensurate with its [] Counterparty Credit Rating.
- iii. Under the CSA, APPROVED COUNTERPARTIES are granted an exclusive first priority floating security interest over NOVARUM's AVAILABLE CAPITAL. AVAILABLE CAPITAL is comprised of all financial assets held in the form of ELIGIBLE INVESTMENTS. AVAILABLE CAPITAL is funded by members' capital contribution, a senior unsecured loan facility to be arranged through a consortium of banks, reserves withheld, collateral received from APPROVED COUNTERPARTIES, and retained earnings.
- iv. NOVARUM is required to fully comply with the terms of the OG. Failure to do so, will result in the automatic early termination of all outstanding APPROVED TRADING INSTRUMENTS at their CRC and the immediate dissolution of NOVARUM.

CCDS STANDARD VALUATION MODEL

For the purpose of determining the CRC of the CCDS, NOVARUM and its APPROVED COUNTERPARTIES contractually agree to use the CCDS Standard Valuation Model ("CCDS-SVM"). The CCDS-SVM is derived from the risk-neutral replication of the CCDS from a portfolio of *plain vanilla* OTC derivative products, where future prices are assumed to be independent. The CCDS-SVM will be supported by an independent market vendor to facilitate the timely resolution of disputes.

CENTRAL COUNTERPARTY

Where required by Supervisory Authorities or requested by APPROVED COUNTERPARTIES, NOVARUM will novate/settle APPROVED TRADING INSTRUMENTS through either an industry sponsored CCP or regulated exchange.

APPENDIX

ACRONYMS

CCDS	Contingent Credit Default Swap
CCDS-SVM	Contingent Credit Default Swap Standard Valuation Model
CCP	Central Counterparty
CCR	Counterparty Credit Risk
CDPC	Credit Derivative Products Company
CRC	Current Replacement Cost
CSA	Credit Support Annex
EPE	Expected Positive Exposure
FRC	Future Replacement Cost
ISDA	International Swaps and Derivatives Association
OG	Operating Guidelines
OTC	Over-the-Counter
RWA	Risk Weighted Assets