# Who Pays the Bill?
# The Mechanics of Collateral Costs for OTC Derivatives Trades in the US

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This article looks at the need for corporations, insurance companies, hedge funds and other users of OTC derivatives to post collateral for their trades under Dodd-Frank. The article discusses the reality of Basel III's impact on bank balance sheets and that in the end, costs will rise for end-clients regardless of whether collateral is posted or not. The article concludes with recommendations for end-clients to assess their exposure now and to identify alternative financing options such as collateral conversion trades.

The arguments have been raging over who should put up collateral for OTC derivatives trades in the US. The CFTC has acknowledged the interest of Congress and proposes to exempt corporations from having to put up initial or variation margin for a bona fide commercial hedge for a non-cleared trade; financial end-clients and speculators will need to post collateral regardless. Meanwhile, the Federal Reserve, FDIC and other banking regulators have said that corporate end-users may be exempt from putting up collateral only if banks think that these firms pose an acceptable credit risk. These proposals are similar with some technical differences, and some categories of traders such as energy companies are difficult to classify. Either way, commercial end-clients believe that they may have escaped having to post collateral and take on increased costs, while financial end-clients are busy evaluating clearing agents for central credit counterparties (CCPs) (see Exhibit 1).

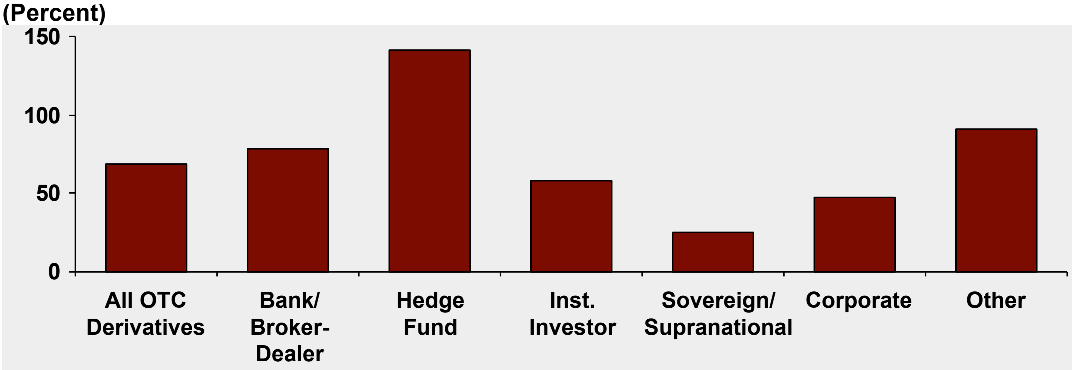
**Exhibit 1:**

| | **Non-financial end-client (corporation)** | **Financial end-client (insurance companies, hedge funds)** |
|---|---|---|
| **Cleared trade** | Collateral posted according to CCP rules | Collateral posted according to CCP rules |
| **Non-cleared trade** | No collateral required if credit risk deemed acceptable by bank | Collateral posted according to CSA rules |

Source: Finadium based on CFTC and FDIC hearings

Yet in the background of these conversations is the reality that costs will go up for OTC derivatives trading no matter what is decided by the CFTC, SEC or banking regulators. In 2009, corporations were 47% collateralized for their OTC derivatives trades; while full collateralization may be unlikely and would double their costs, some level of increase is certain (see Exhibit 2).

**Exhibit 2:**
**Collateralization levels by counterparty type, 2009**
**(Percent)**




Source: ISDA 2009 Derivatives Usage Survey

What has happened here is a feint; while corporations were looking at Dodd-Frank, Basel III snuck in an undercut. End-clients of OTC derivatives trades have two options for getting the needed exposure regardless of whether the trade is a commercial hedge or a speculative investment: the trade is either directly with the derivatives dealer, what is known as a bilateral trade, or the trade can be done on a CCP.[1] In a bilateral trade, a bank takes the risk of the position. In a non- or under-collateralized trade, this leaves the bank exposed to potential losses if the end-user counterparty goes bankrupt. Looking at the trade from a Basel III perspective, this produces a liability on the bank's balance sheet and that in turn produces a capital charge. Under earlier versions of Basel this may have been acceptable, but under Basel III these capital charges will be high and costs will be passed through to clients.

On the other hand, banks face a very low capital charge of 2% for trades facing a central credit counterparty. Compared to the capital charges for bilateral trades, this 2% is extremely attractive. It may become worthwhile for an end-user, financial or not, to conduct their OTC derivatives trading on the CCP simply to take advantage of the bank's lower capital charge for trading with that counterparty. Each end-client will make this determination based on whether they are a financial or non-financial entity, whether the trade is a commercial hedge or speculation, and what terms a bank offers.

As a result of Basel III rules, either bank fees will increase as a result of banks using their scarce capital to provide liquidity for non-cleared OTC derivatives trades, or collateral will be posted by

[1] Technically the trade is agreed to with a derivatives dealer and novated to the CCP.

end-users onto central credit counterparties. Non-financial end-users may also find that posting collateral for a bilateral trade may mitigate costs. An analysis of a firm's balance sheet will answer the question of which option is better given individual circumstances.

Although industry associations such as the US Chamber of Commerce have made a strong argument that posting collateral would be detrimental to the financial health of their members, we speculate that in fact posting non-cash collateral on a CCP would be less financially difficult than putting up cash either for a bilateral or CCP trade. The problem with this plan is that most companies, including insurance firms, airlines and energy concerns, do not hold large amounts of the kinds of non-cash collateral that CCPs want. End-clients will need to either raise cash, buy treasury bonds or other permitted collateral, or conduct a collateral conversion trade, also called a collateral upgrade trade. The last option is the least cash-intensive though may entail its own (controllable) costs and new operational requirements.

In a collateral conversion trade, a corporation, hedge fund or other OTC derivatives investor owns assets that have value in the market but that are not acceptable as collateral by a CCP. These assets include equities, corporate bonds, warrants and other tradable products. The investor turns to a bank that can lend out the owned assets in the securities lending or repo market and receive back treasury securities that can be pledged to the CCP. At some point in the future perhaps other collateral will also be acceptable although this is generally not the case today. With the good collateral in hand, the investor makes their trade.

Already the business of collateral conversions has begun in earnest with banks offering the service for their clearing clients. OTC derivatives clearing firms can conduct this trade through their securities lending or repo departments; this option makes the best sense if an end-client conducts just a few trades a year. However, for insurance companies, energy traders or other entities with large and ongoing OTC derivatives positions, a competitively bid collateral conversion trade presents an opportunity to solve an ongoing financing problem, albeit at a cost that depends on the value of the portfolio lent. Of course, a trade with any counterparty requires the right credit, products and terms, but the conditions are right today for long-term OTC derivatives investors to enter into discussions with dealers. Along the way, the adage that new regulations will create new market winners will hold true: banks with securities lending and repo desks that facilitate collateral conversion trades for end-clients on CCPs will profit well from this service.

Whether it is obvious or not, and in spite of the lobbying in Congress and the many regulators involved, the cost to end-clients trading OTC derivatives will rise regardless of whether collateral is posted or not, and may one day be less when collateral is posted on a CCP as opposed to traded bilaterally. In the end, CCPs may be the least expensive, credit-neutral way for many OTC derivative and clients to meet their hedging or investing needs. For both financial and non-financial end-clients to minimize the impact of these new rules to their balance sheets, now is the right time to evaluate cash and non-cash collateral needs. Changes will be coming to your OTC derivatives agreements before you realize it.

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