# Credit default swaps and central clearing

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**Abstract / Resumo:**
We propose a network model for OTC derivatives markets, that we calibrate to recent public data on the gross and net protection sold on the top reference entities as well as to the degree of concentration of the market on the top dealers. We introduce the concept of critical receivables, i.e. receivables that if not actually transferred would impede a bank to meet its payment obligations. We link the illiquidity transmission within the network to the percolation of the skeleton of such critical receivables, by introducing a measure of resilience to illiquidity contagion under a stress test scenario. We investigate the influence of central clearing on network stability. We find that, central clearing of CDS, in presence of a clearing facility of interest rate derivatives, reduces the probability of a systemic illiquidity spiral.