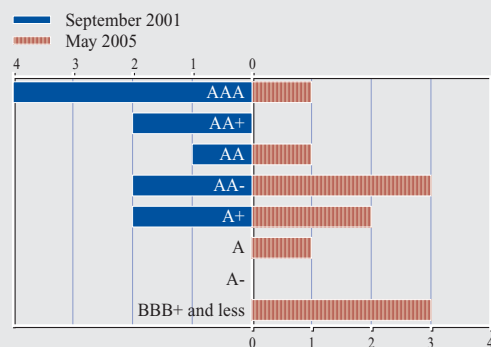


Box 15

THE REINSURANCE MARKET AND CATASTROPHE BONDS

The balance sheets and creditworthiness of reinsurance companies are highly sensitive to catastrophic events such as natural disasters or terrorist attacks. In particular, the events of 11 September 2001 in the US were followed by substantial credit rating downgrades of all euro area reinsurance companies and, by May 2005, these assessments had not yet been fully reversed (see Chart B15.1) These reactions suggest that reinsurance might not be the most efficient way to handle losses from extremely large and infrequent events. After a major catastrophic event, capacity constraints in the reinsurance market tend to exert upward

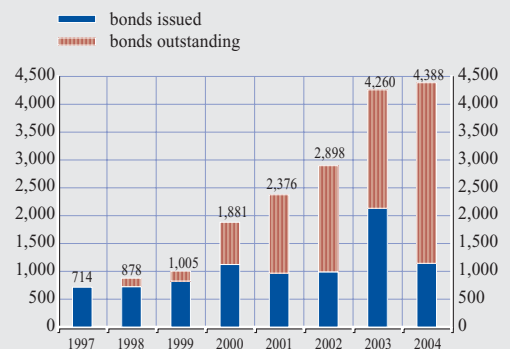
Chart B15.1 S&P ratings of major euro area reinsurers



Source: Standard and Poor's.

Chart B15.2 Cat-bonds issued and outstanding

(USD million)

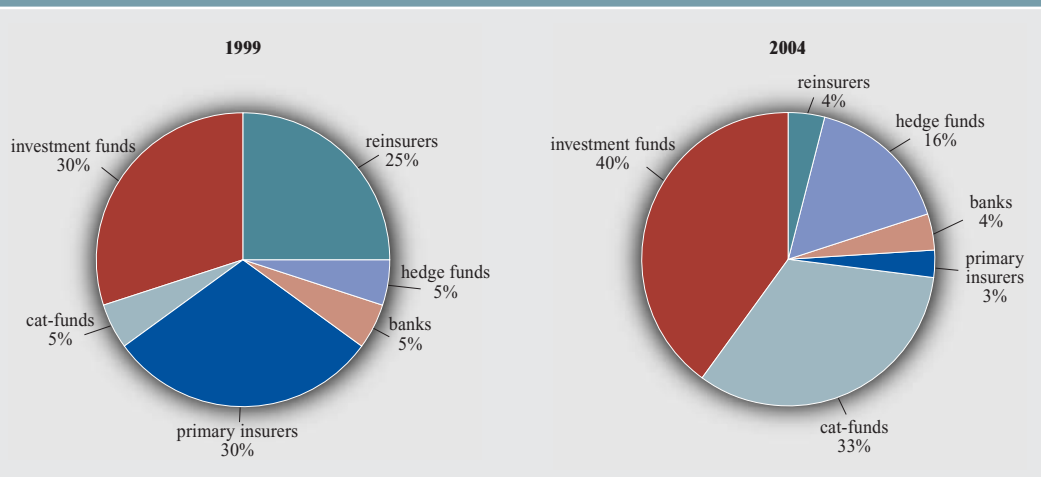


Source: Swiss Re.

pressure on reinsurance premia. The capacity of the international reinsurance market is currently estimated to fall within a range of USD 125-150 billion. As most of this capital is set aside to back insurers' liabilities arising from more frequent events that are covered by the vast majority of insurance contracts, the capacity looks rather limited compared to the large losses that are often incurred as a result of catastrophic events – nearly USD 50 billion in insured losses was incurred in 2004 alone. This Box analyses features of the market for so-called catastrophe bonds (henceforth “cat-bonds”), a financial innovation of the mid-1990s designed to transfer part of the risk associated with catastrophes from the reinsurance sector to the capital markets.

In a typical cat-bond contract, the primary insurer enters a reinsurance agreement with a special purpose vehicle (SPV) that is specially created for the transaction. The SPV, which is a legal entity created to hold the capital raised from investors, issues cat-bonds to capital market investors up to a specified limit. The proceeds from the sales of the bonds, which are used to compensate the primary insurer should a loss event occur, are deposited in a trust company and invested in securities carrying a high credit rating. Hence, as cat-bonds are fully collateralised, the associated credit risk is close to zero. This characteristic may prove especially attractive for primary insurers, as they do not incur the risk that their reinsurer could face financial distress in the event of a large loss, thereby creating the risk of non-payment on a claim. By contrast to traditional reinsurance contracts, cat-bonds use mechanistic and transparent triggers for paying claims, and the typical term of coverage spans between three and five years, compared with the usual one year of reinsurance contracts. If no triggering event occurs during this period, investors receive their principal back at maturity and benefit from a higher coupon than what is offered by similarly rated corporate bonds. Should a loss event occur, the funds are used to make payments to the primary insurers, leading to partial or complete loss for the investors. To date, none of the approximately 45 cat-bonds known to have been issued has been triggered.

Chart B15.3 Buyers of cat-bonds



Source: Swiss Re.

Some ten years since the inception of the cat-bond market, more than USD 8 billion in bonds has been issued by a relatively limited number of issuers (see Chart B15.2). Among the factors limiting the issuance of cat-bonds is that such instruments may appear expensive, despite the absence of credit risk, as well as the observed fall in prices since the first transactions. In addition, compared to traditional re-insurance contracts, they are also more time-consuming to issue. However, cat-bonds are attractive for investors as they offer returns that show very low correlation with other financial securities. They are therefore very well suited for the diversification of portfolio risk. The increasing participation of hedge funds in recent years appears to be one manifestation of this (see Chart B15.3).

However, the increasing interest shown by hedge funds in the reinsurance business raises more general questions from a financial stability viewpoint. Due to the large size/low frequency nature of catastrophic events, reinsurance companies must typically take a very long-term view in order to smooth losses over long periods of time. In the absence of significant barriers to entry, the emergence of new players in the market who aim at exploiting the positive phases of the cycle (typically soon after large events have occurred) and often exit when a negative phase sets in, could change the nature of the market. Increasing competition would put downward pressure on premia, potentially forcing incumbent firms to adopt more short-term strategies as well, and possibly undermining the industry's capacity to provide sufficient coverage in the event of large losses. To avoid such adverse contingencies, a further deepening of the cat-bond market could be a welcome development. Spreading the peak risks to investors would ease the potential strains on the capital position of reinsurers that arise in the wake of major catastrophes. This appears all the more important as the reinsurance business is very concentrated and typically dominated by a few large institutions. Given the role of reinsurers as the insurers of last resort, their financial health is crucial to safeguard the stability of the entire industry.