



UCITS Risk Reporting Dashboard

31.12.2019

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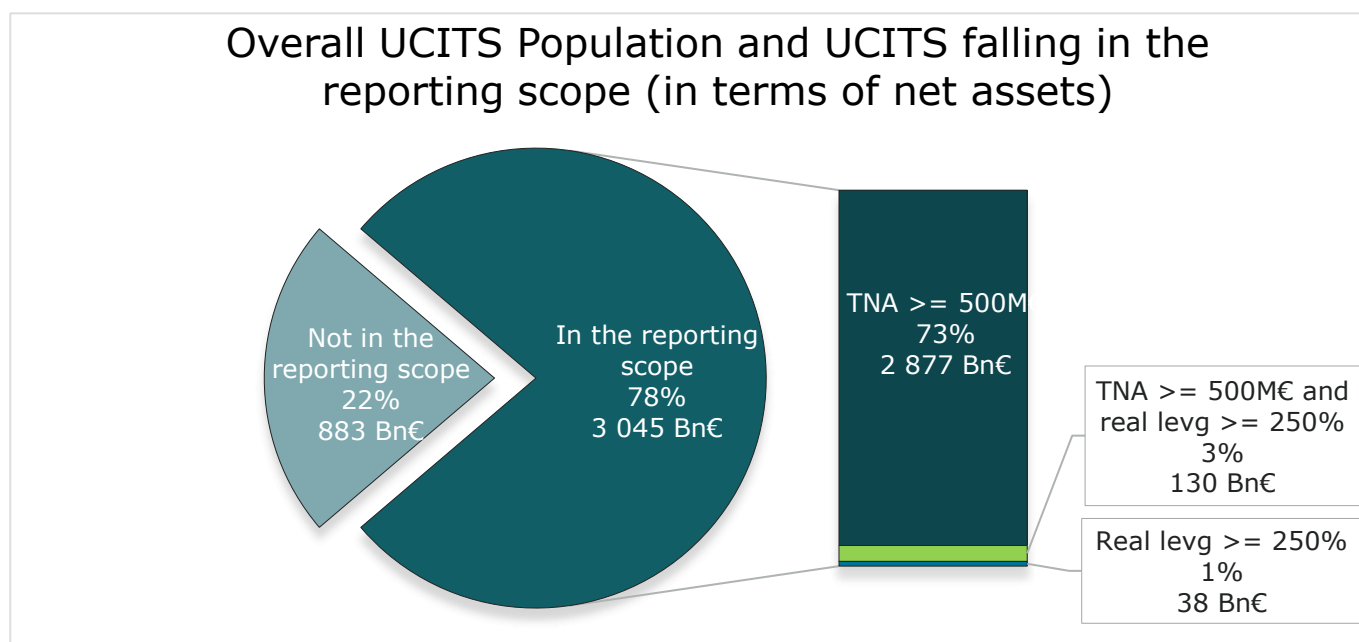
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UCITS Risk Reporting Dashboard

1. Introduction

1.1 Scope of the UCITS Risk Reporting



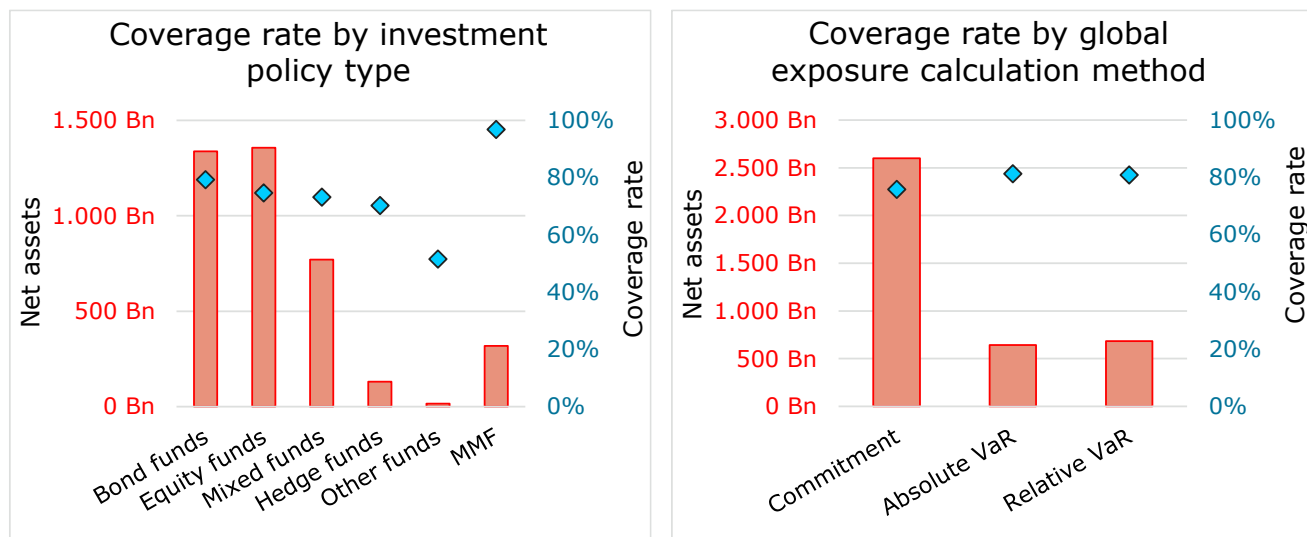
In the context of the UCITS Risk Reporting, all Luxembourg domiciled UCITS¹ authorised by the CSSF are required to provide some general information/basic functional data including the global exposure calculation method and the realised level of leverage, as well as, for UCITS under a VaR approach, the expected level of leverage. In addition, detailed information on risks is requested for UCITS falling in the "full reporting scope", i.e. UCITS fulfilling at least one of the following two criteria:

- net assets above EUR 500 million;
- use of VaR for the calculation of global exposure covered by Article 42(3) of the 2010 Law with an average gross leverage during the semester greater than 250%².

¹ In this report, the terms "UCITS" and "fund" will be used both for an entity in the case of a non-umbrella UCITS and for each sub-fund in the case of an umbrella UCITS.

² In accordance with the rules set out in the applicable regulation, the gross leverage is calculated as the notional sum of the derivatives used.

1.2 Coverage of the full reporting scope by investment policy type and global exposure calculation method



Note: Fund classifications are based on the BCL investment policy types. The category "Hedge funds" includes funds that implement alternative strategies while respecting the UCITS regulatory framework (often referred to as "liquid alternative funds").

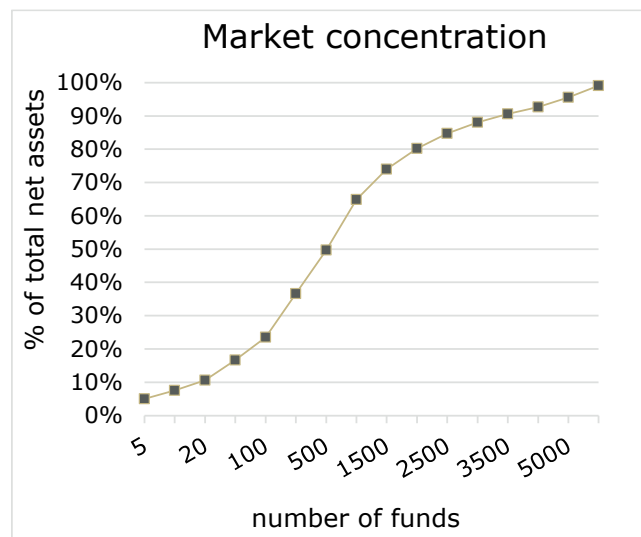
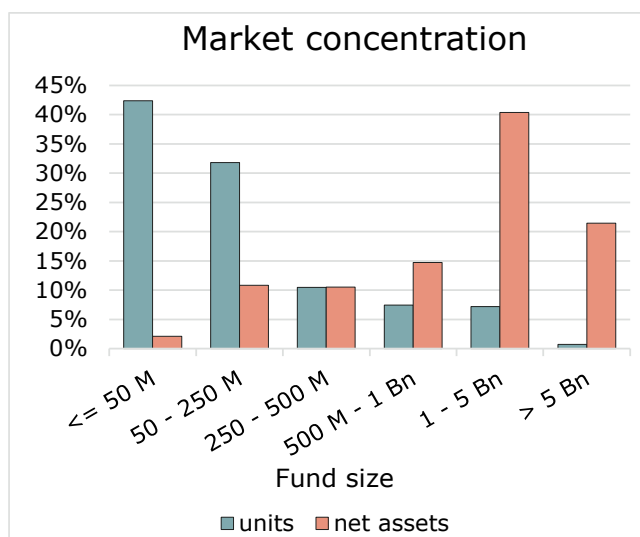
2. Executive summary

- The **overall UCITS population**, as at 31 December 2019, is made of **10 993 funds** (incl. dormant / unlaunched funds) totaling net assets of **EUR 3 928 Bn€**, mainly Equity and Bond funds (resp. 35% and 34% in terms of net assets), and funds under the Commitment approach (66% in terms of net assets).
- The **Full reporting scope** is made of **1 972 funds** totaling net assets of **EUR 3 045 Bn€**. It fairly covers the overall UCITS population. The predominant criterion for falling in the full reporting scope remains size (i.e. TNA above EUR 500 million).
- The **main change** compared to December 2018 is a **decrease in gross leverage** from 70% to 63%,
 - mainly due to bond funds and hedge funds / funds under the absolute VaR approach and
 - mainly explained by a lower use of short-term interest rate derivatives (<3M).
- As regards UCITS in the full reporting scope, there are **no other significant changes** in risk indicators
 - Usage of leverage remains generally low in comparison to the regulatory limit (funds under the commitment approach), respectively to the expected level of gross leverage disclosed in the prospectus (funds under the VaR approach). For the latter, average VaR levels are generally much lower than the regulatory limit.
 - While the number of funds engaging in Efficient Portfolio Management (EPM) techniques have increased from 622 to 696 (mainly in relation to securities lending), the volumes slightly decreased from 118 to 109 Bn€ at semester-end, of which 72 Bn€ from Securities Lending and 35 Bn€ from Reverse Repos. Reverse repo volumes mainly originate from 3 investment fund managers (IFM) in relation to money market funds, while securities lending volumes are less concentrated across IFM and the investment policies of the funds engaging in these transactions.
 - Liquidity under normal conditions, based on a self-assessment from the investment fund manager, is greater than 80% for all fund categories on a 1-week horizon (resp. greater than 60% under stressed conditions). In terms of sub-categories, High Yield Bond funds show the lowest liquidity levels on this horizon (resp. 73% under normal and 43% under stressed conditions).
 - Liquidity management tools are widely available (mainly temporary suspension of redemptions and gates/deferrals). With the exception of swing pricing, they have only been used on a few occasions or not at all.
 - Credit exposures are mainly on high quality assets, with 89% of the credit exposure being on assets with an internal credit rating of 1 to 5 (on a scale of 1 to 10).

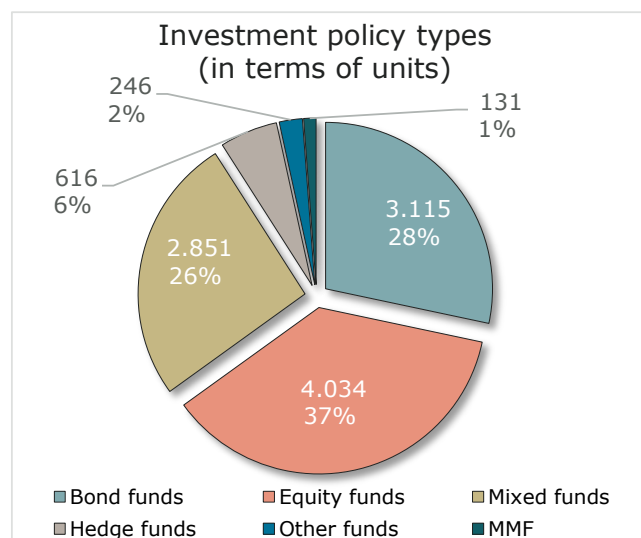
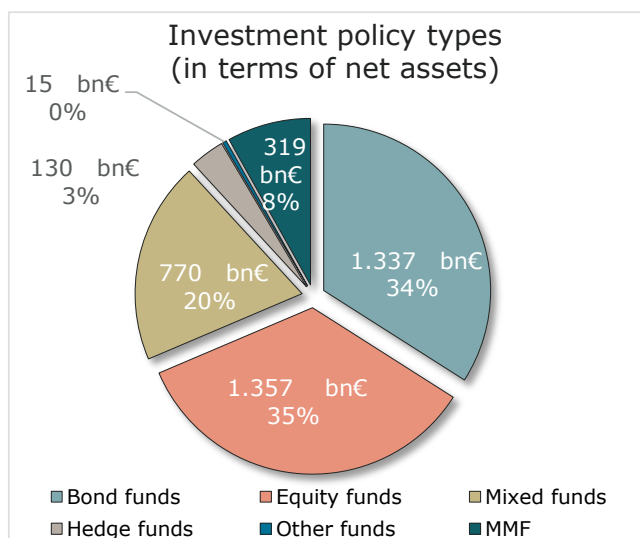
3. Overall UCITS population

3.1 Main characteristics

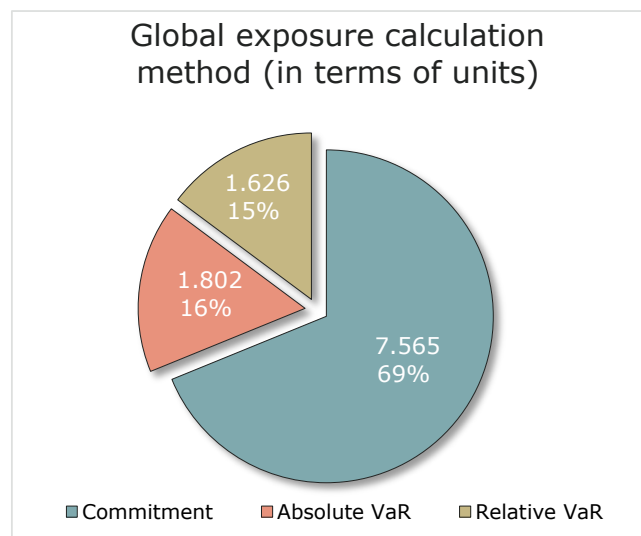
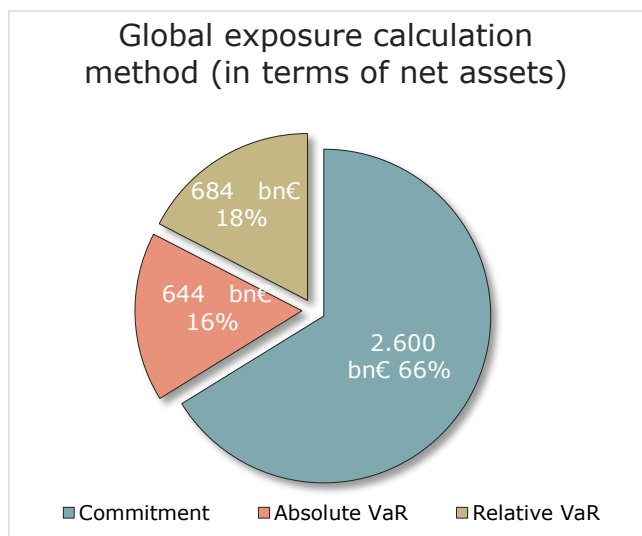
3.1.1 Net assets



3.1.2 Investment policy types

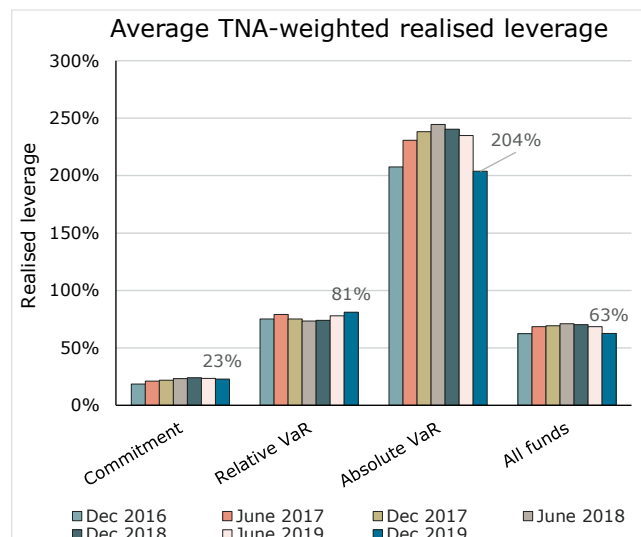
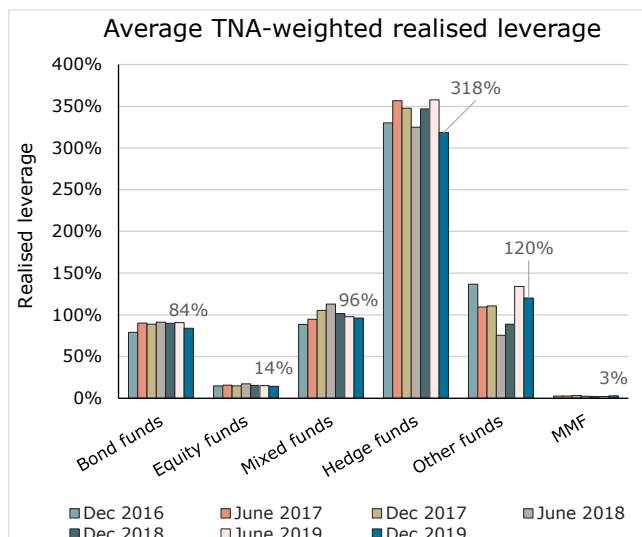


3.1.3 Global Exposure calculation methods



3.2 Realised leverage

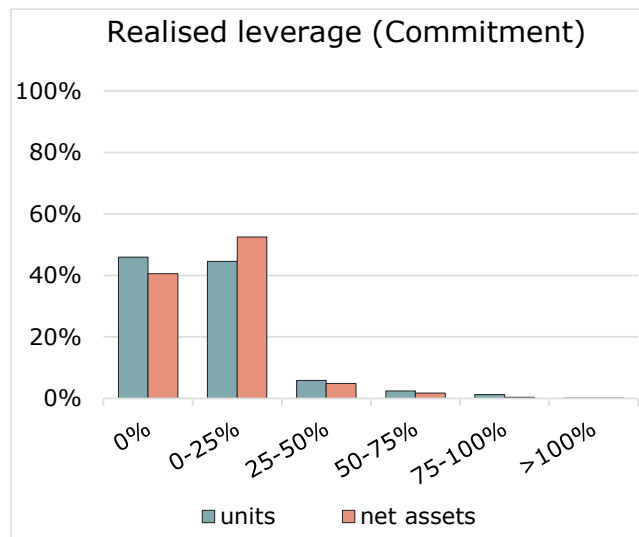
3.2.1 Realised leverage by investment policy type and by global exposure calculation method



Methodology note: For the purpose of the 2 graphs above, the realised leverage is

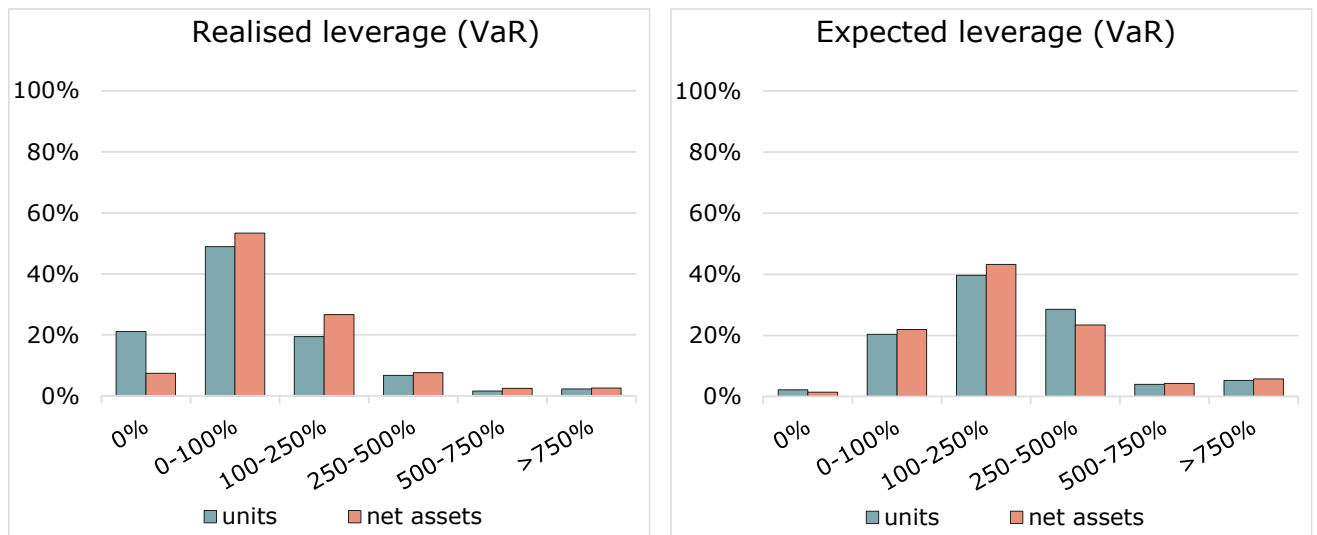
- for funds under a VaR approach, the semester-average value;
- for funds under the commitment approach and TNA above 500M EUR, the semester-end value; and
- for funds under the commitment approach and with TNA below 500M EUR, the TNA-weighted average of the semester-end leverage of all funds in the same category under the commitment approach and with TNA above 500M EUR.

3.2.1 Realised leverage for funds under the commitment approach



Methodology note: The realised leverage level is based on the commitment approach, as defined by CESR 10/788.

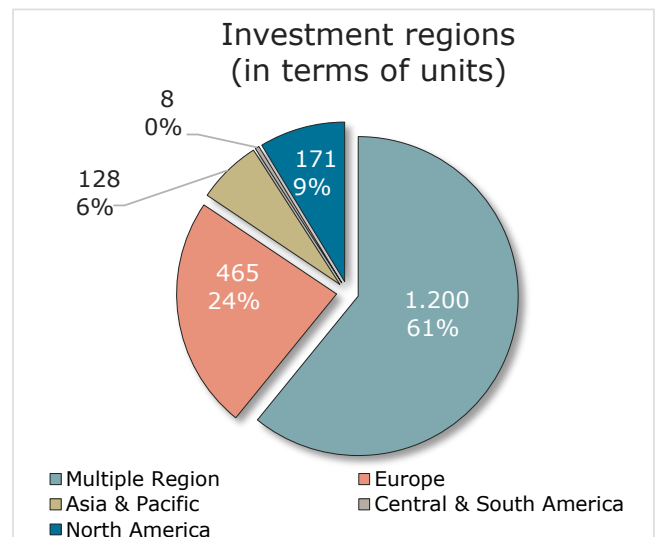
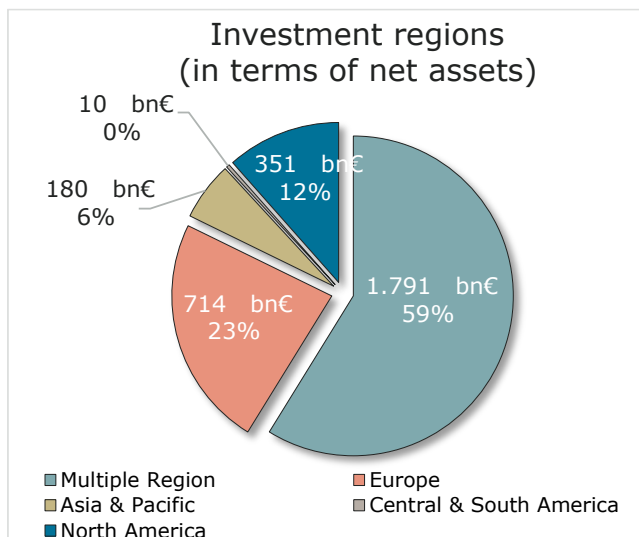
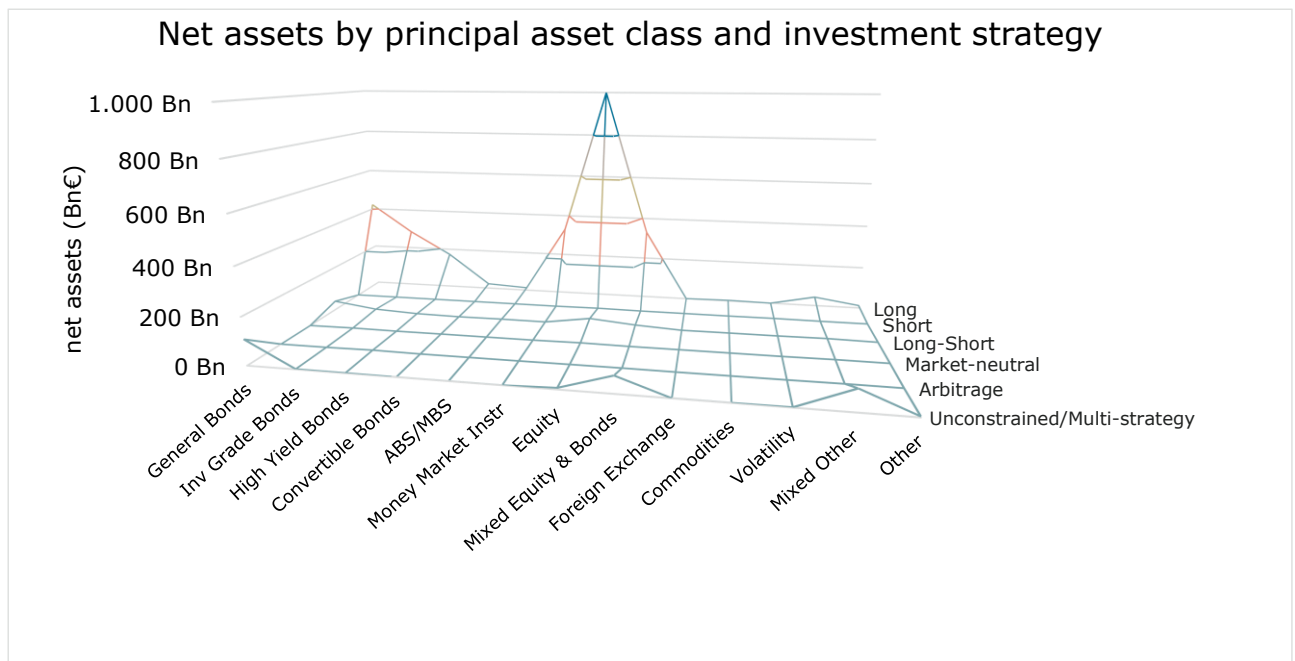
3.2.2 Realised and expected leverage for funds under the VaR approach



Methodology note: The realised leverage level is based on the sum of the notionals method as defined by CESR 10/788. Where several levels of leverage are disclosed in the prospectus (for example an expected and a maximum or a range with minimum and maximum), the expected leverage shown on the graph refers to the highest number.

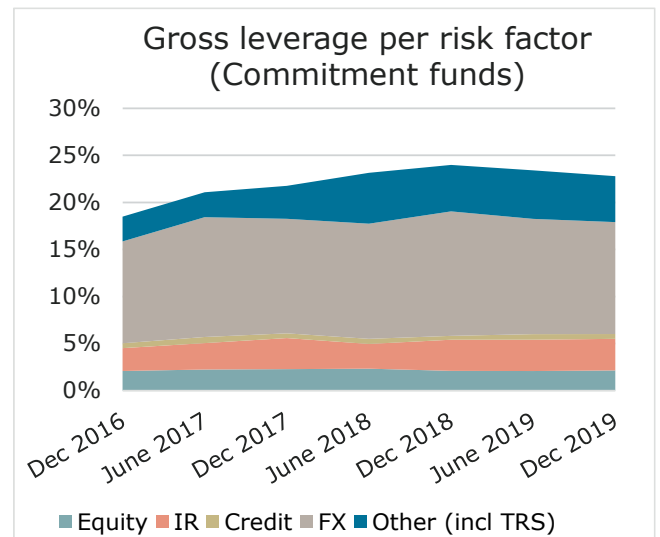
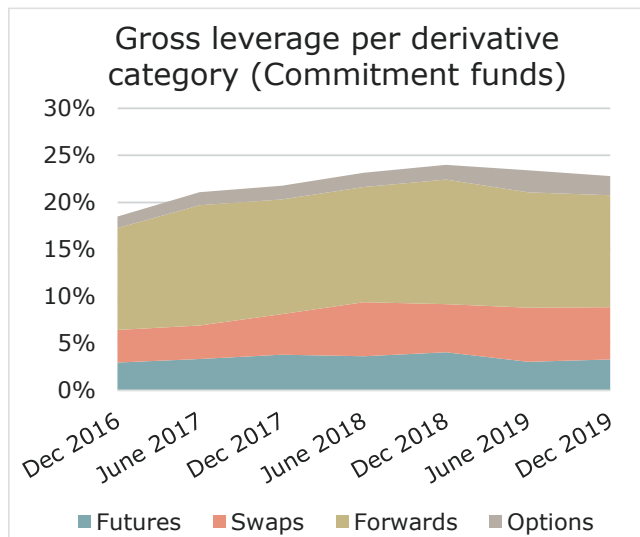
4. UCITS in the full reporting scope

4.1 Main characteristics

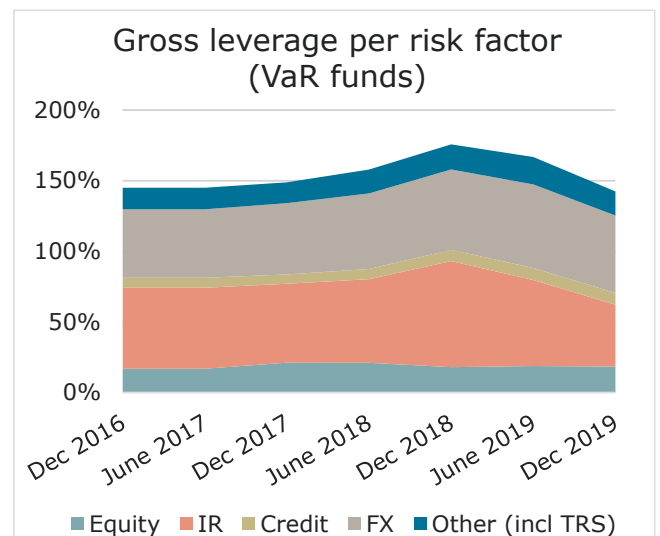
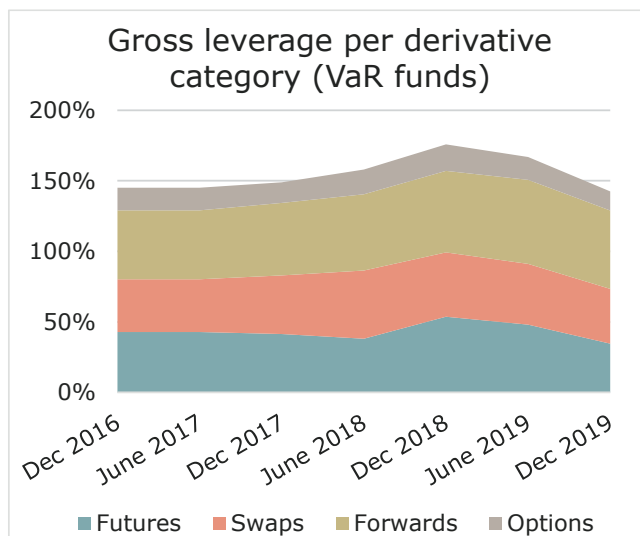


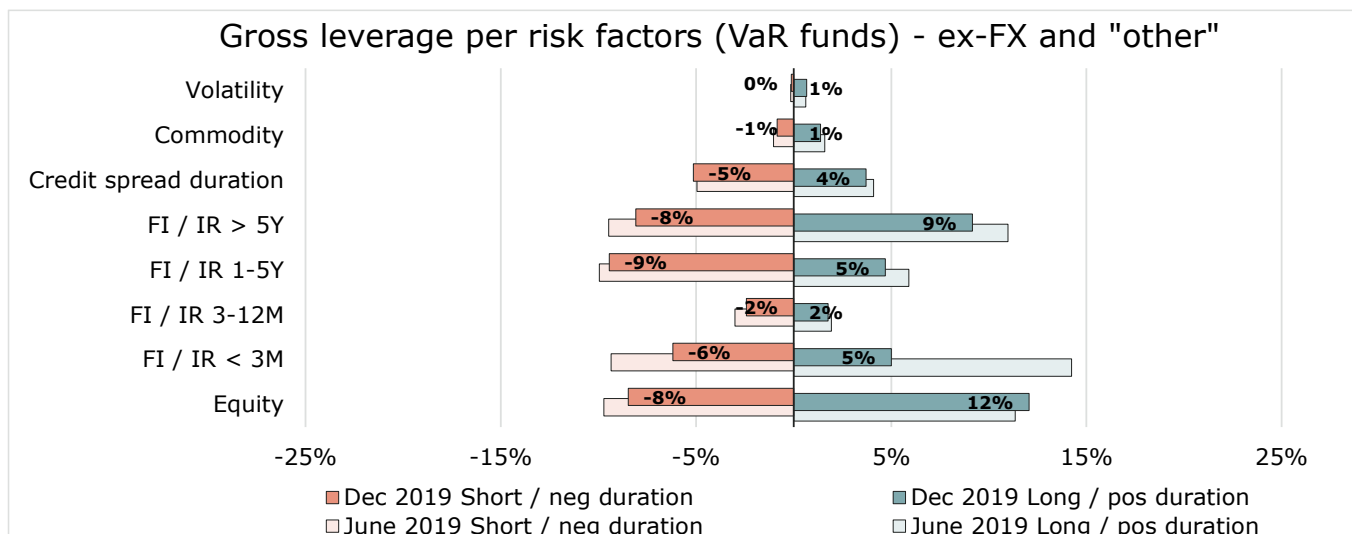
4.2 Global exposure and leverage

4.2.1 Funds under the Commitment approach



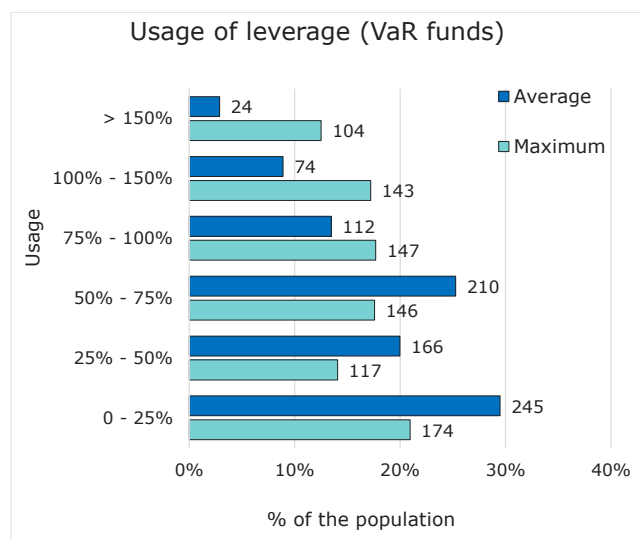
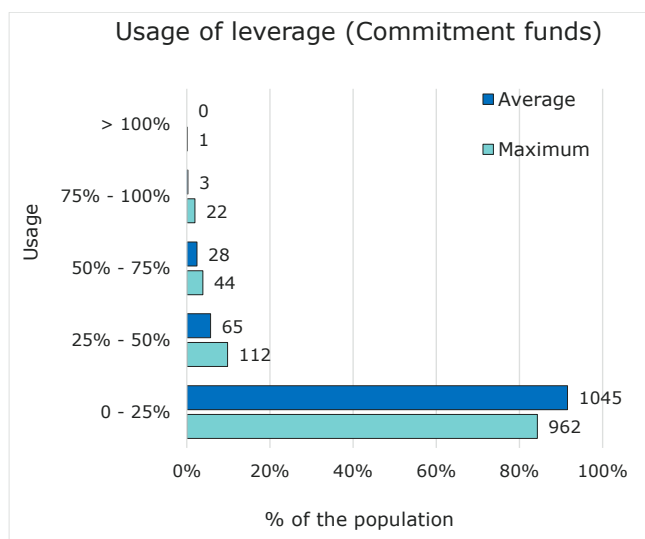
4.2.2 Funds under the VaR approach





Note: As set out in the guidelines, "positive" interest rate and credit spread duration correspond to long exposure on bonds, i.e. exposures such as fixed rate receiver of an IRS or protection seller of a CDS.

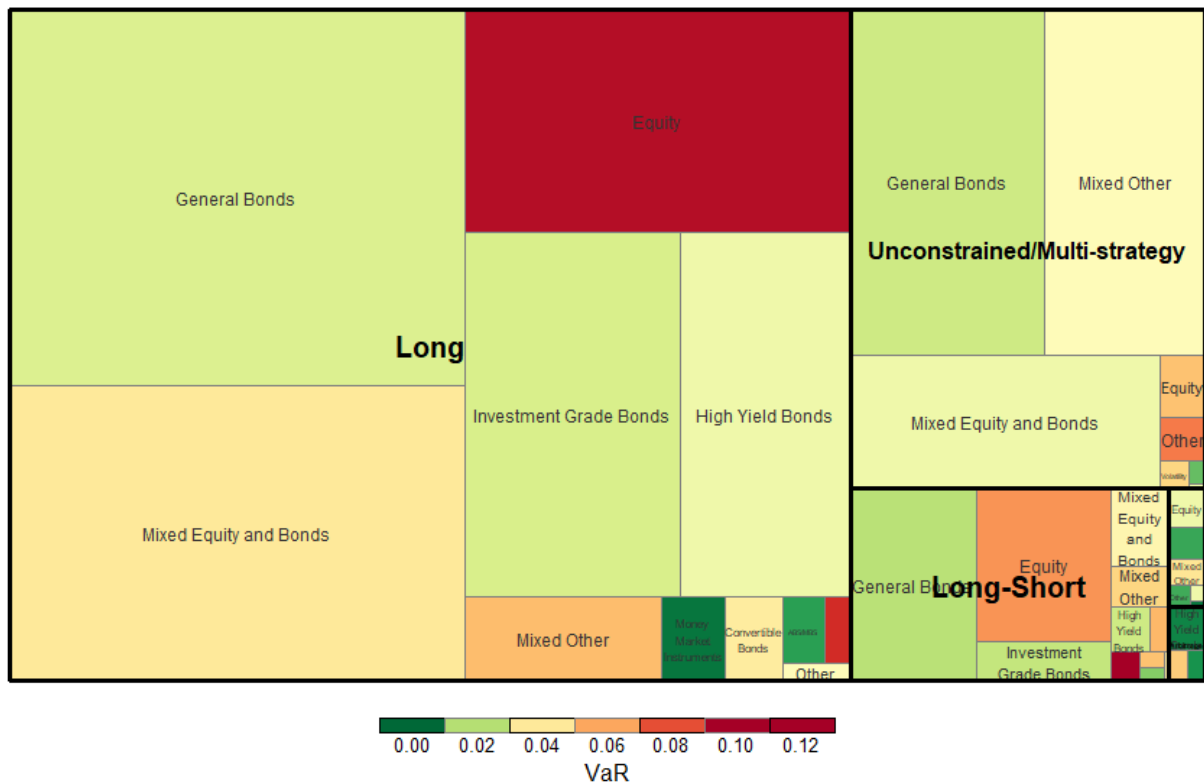
4.2.3 Usage of leverage



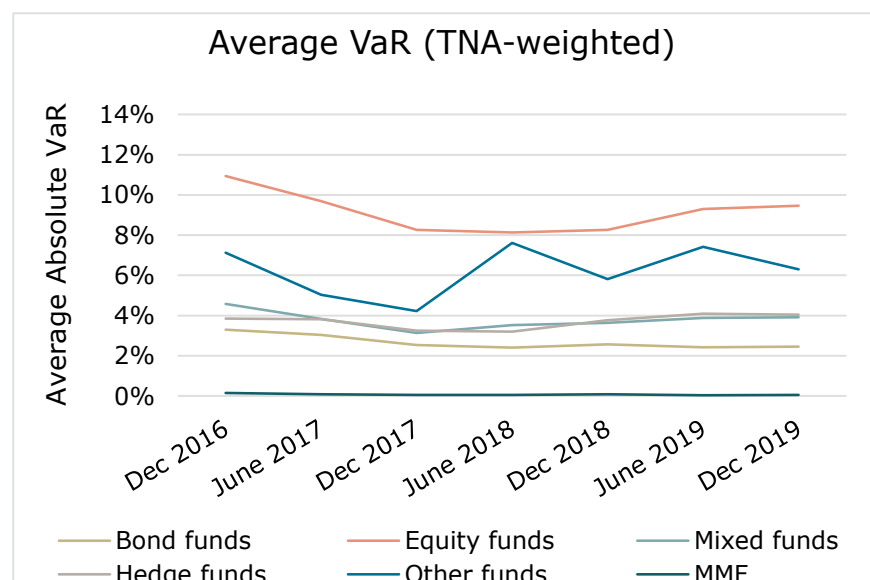
Note: For the purpose of this report, the usage of leverage is defined as the ratio of the realised to the regulatory limit for funds under the commitment approach, respectively the ratio of the realised to the expected level of gross leverage disclosed in the prospectus for funds under the VaR approach.

4.2.4 Value-at-Risk (VaR)

Net assets and average TNA-weighted VaR by principal asset class and principal investment strategy

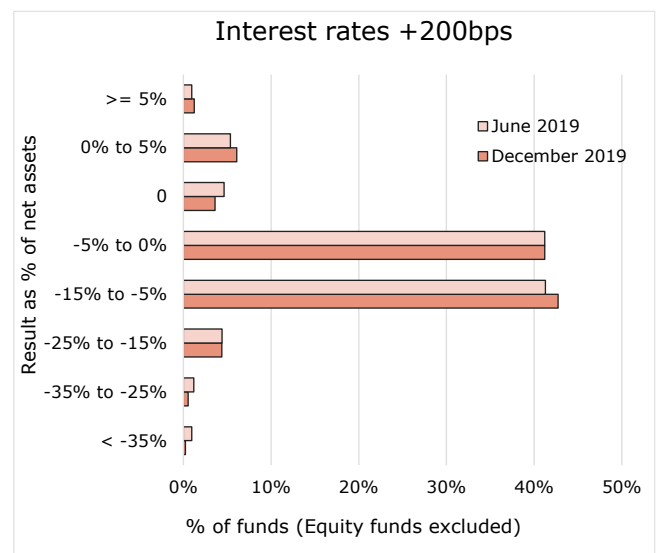
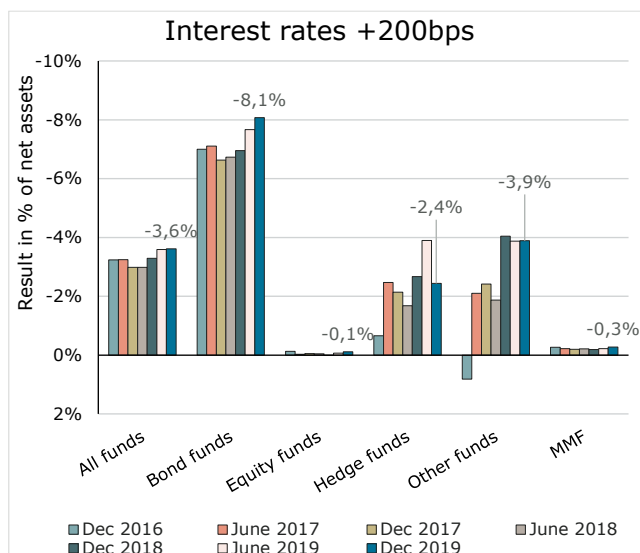
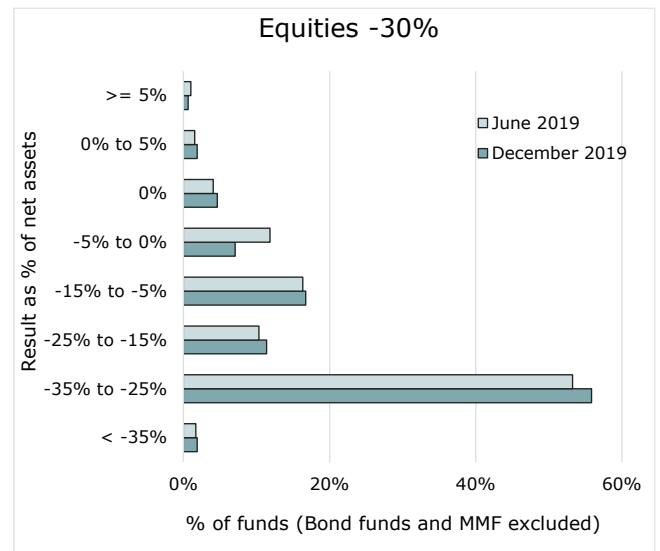
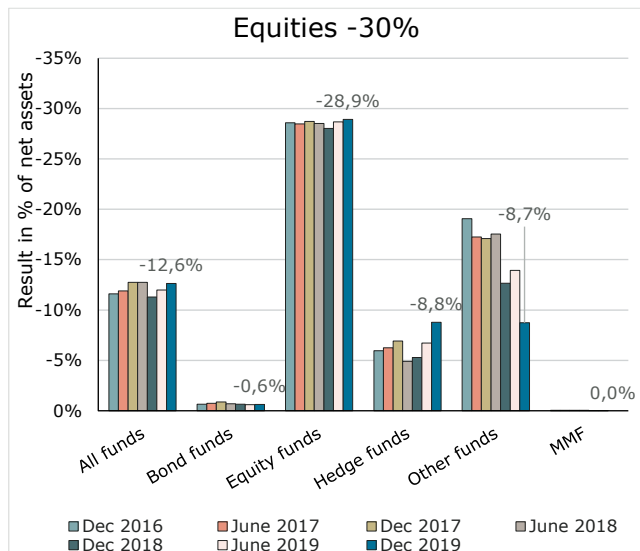


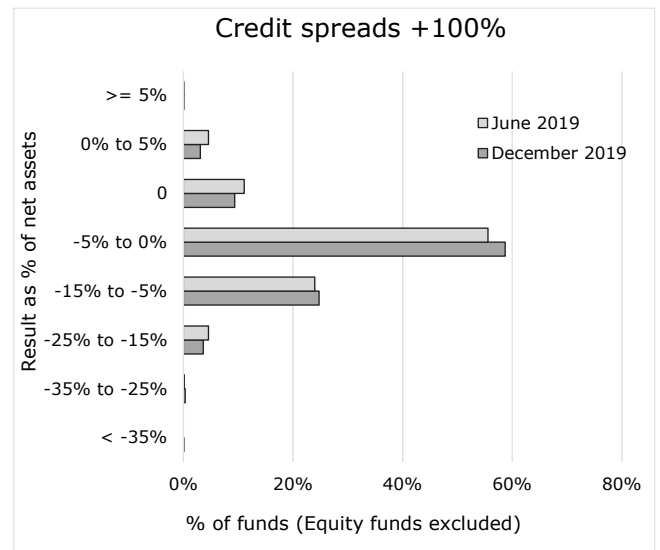
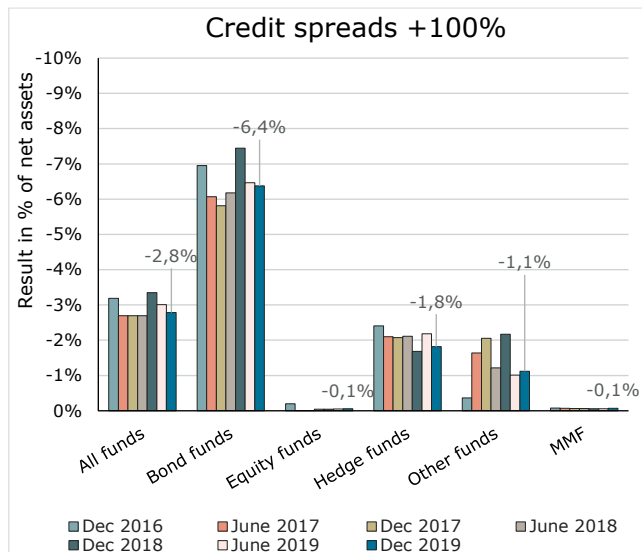
Note: The “heatmap” graph represents each fund category by a rectangle whose size is proportional to its net assets and whose colour reflects its average absolute VaR (confidence interval of 99% and holding period of 1 month). For the avoidance of doubt, the graph is based on the absolute VaR levels of both UCITS under an absolute and a relative VaR approach.



4.3 Stress testing and other risk indicators

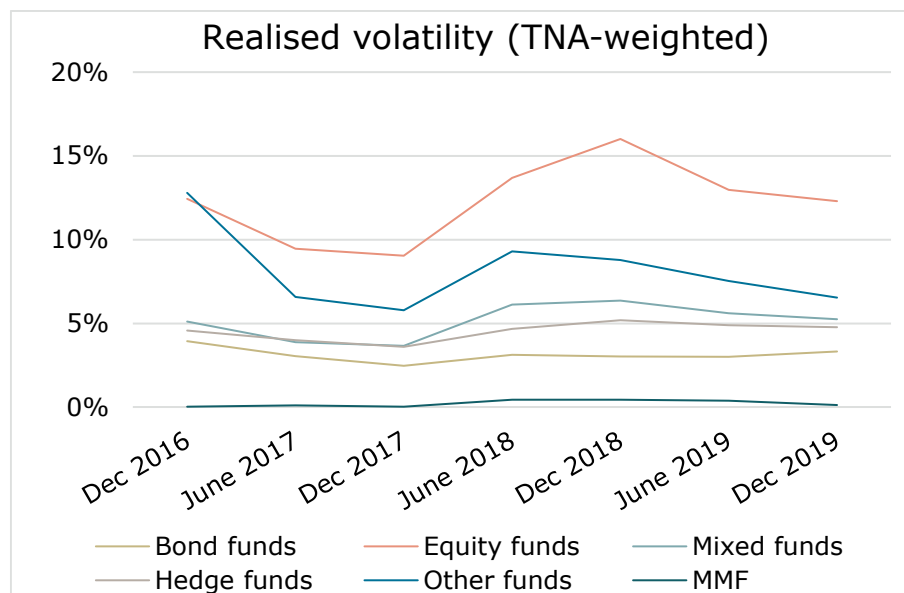
4.3.1 Univariate stress test results





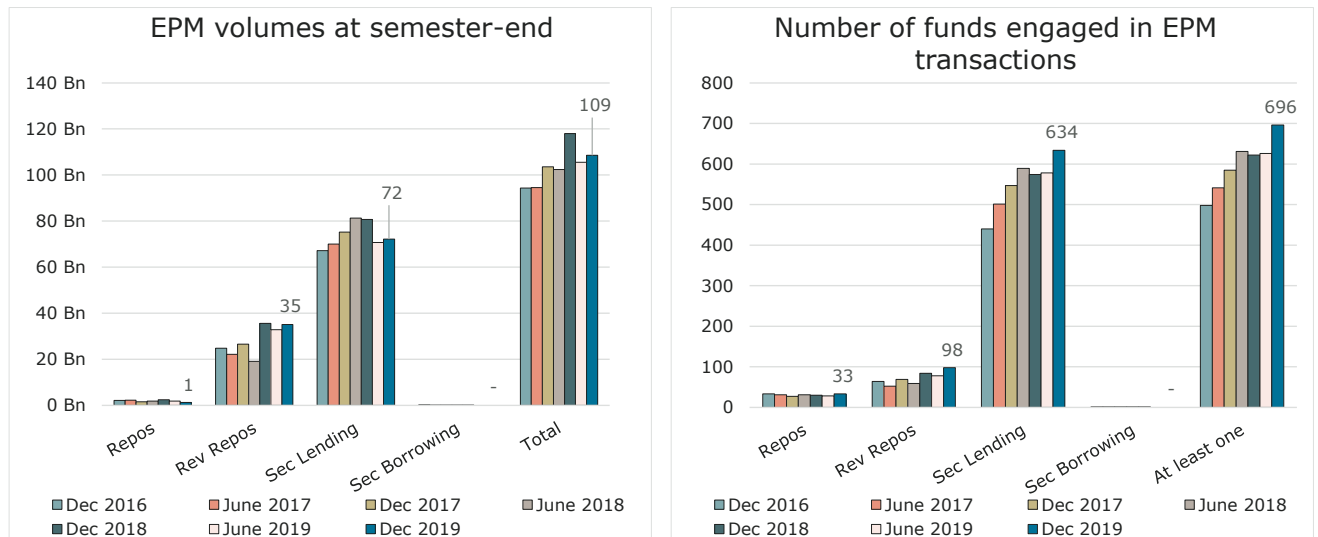
Note: As set out in the guidelines, the univariate stress test results should not take into account dependencies/correlations between risk factors. For the sake of readability, Bond funds and MMF (resp. Equity funds) are excluded from the graph illustrating the univariate stress test on equities (resp. on interest rates and on credit spreads).

4.3.2 Annualised realised volatility

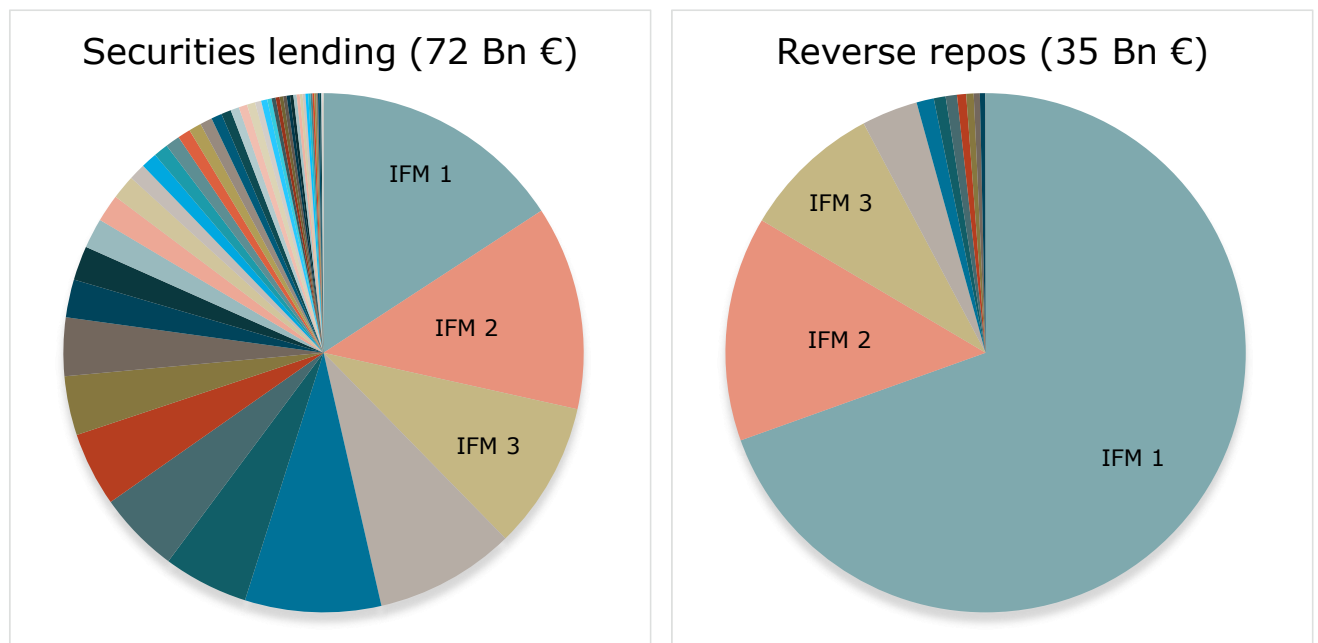


4.4 Efficient portfolio management (EPM) techniques

4.4.1 Evolution of volumes and number of active funds by EPM type

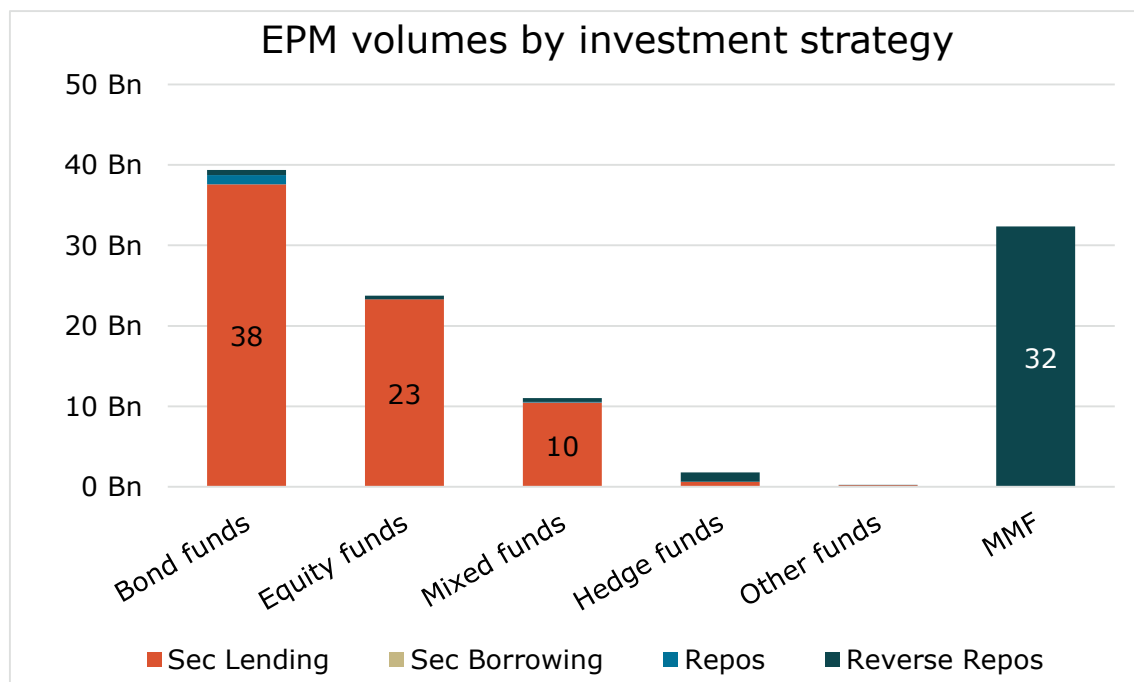


4.4.2 Main active Investment Fund Managers (IFMs) per EPM type

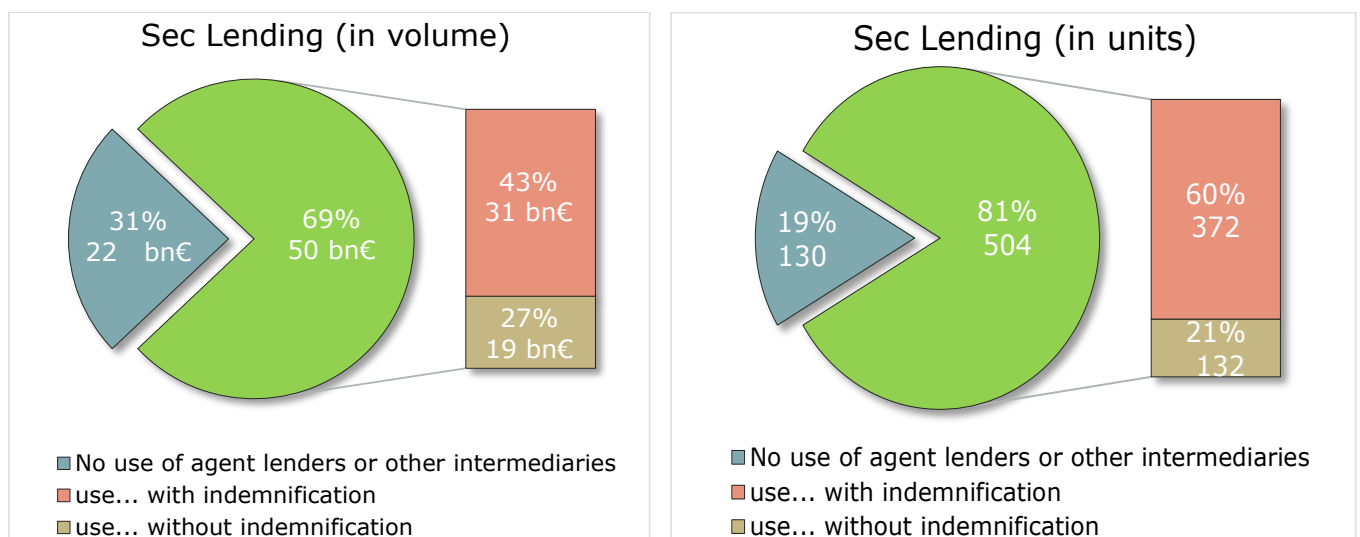


Note: Repos are not pictured above as their volumes are much lower (total 1.3Bn€). Similarly to Reverse repos, repos are dominated by a few actors (~80% of volumes from funds managed by 3 IFMs).

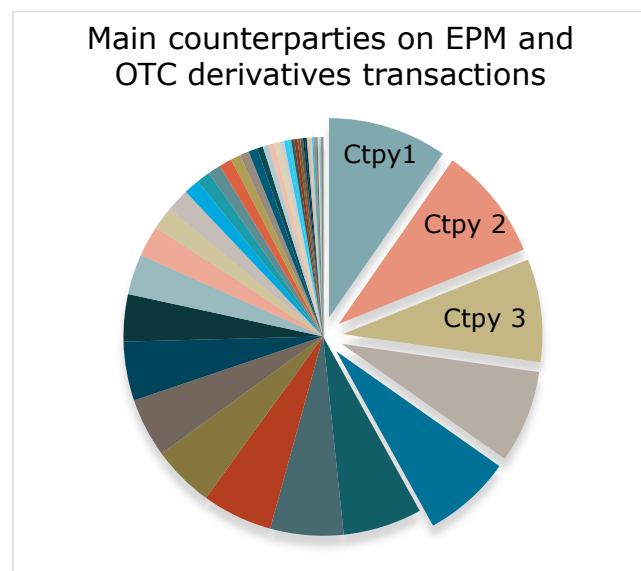
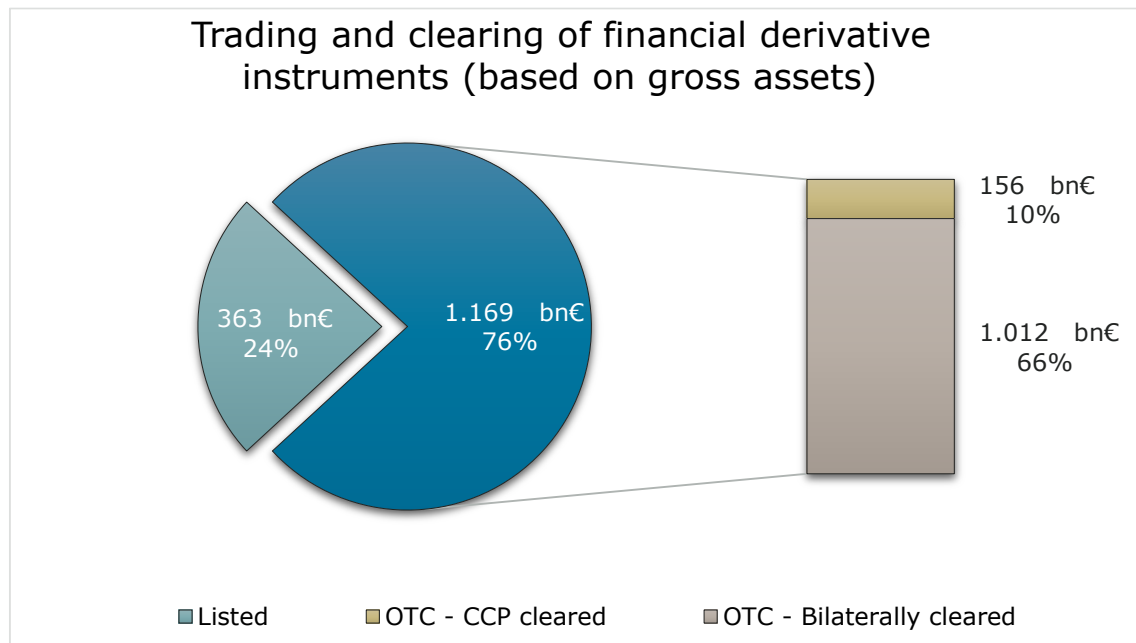
4.4.3 EPM volumes by investment strategy



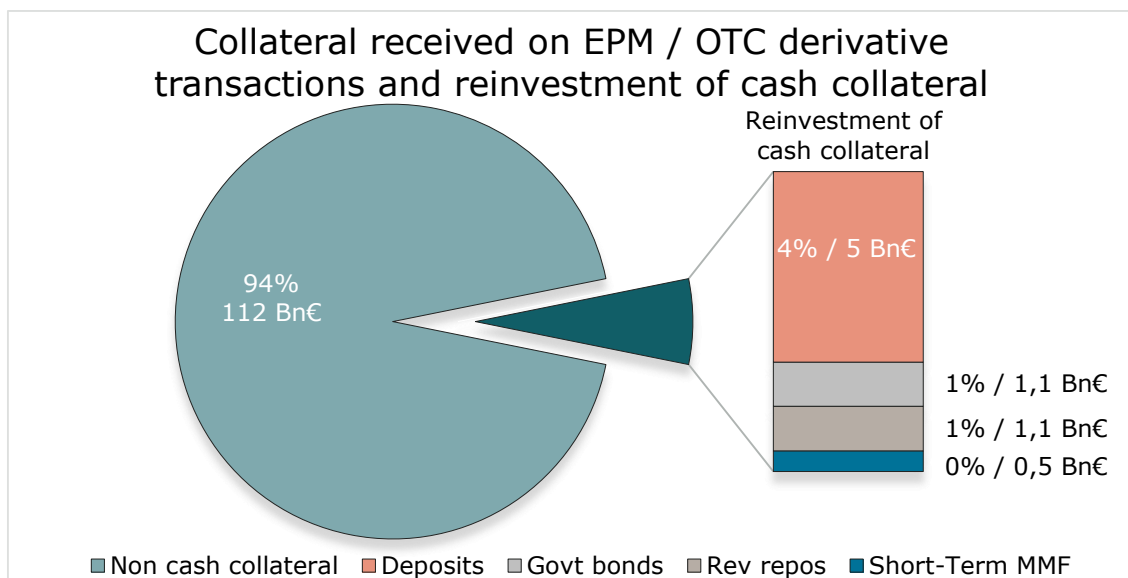
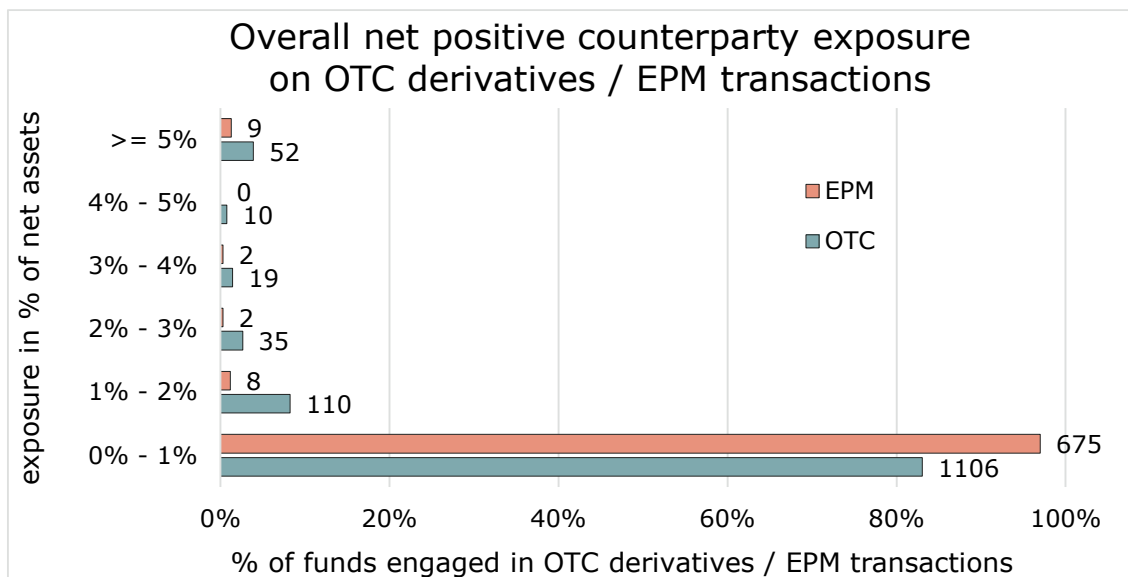
4.4.4 Securities Lending: Use of Agent lenders & indemnification against borrower default



4.5 Counterparty risk and collateral in relation to EPM techniques / OTC and traded derivatives

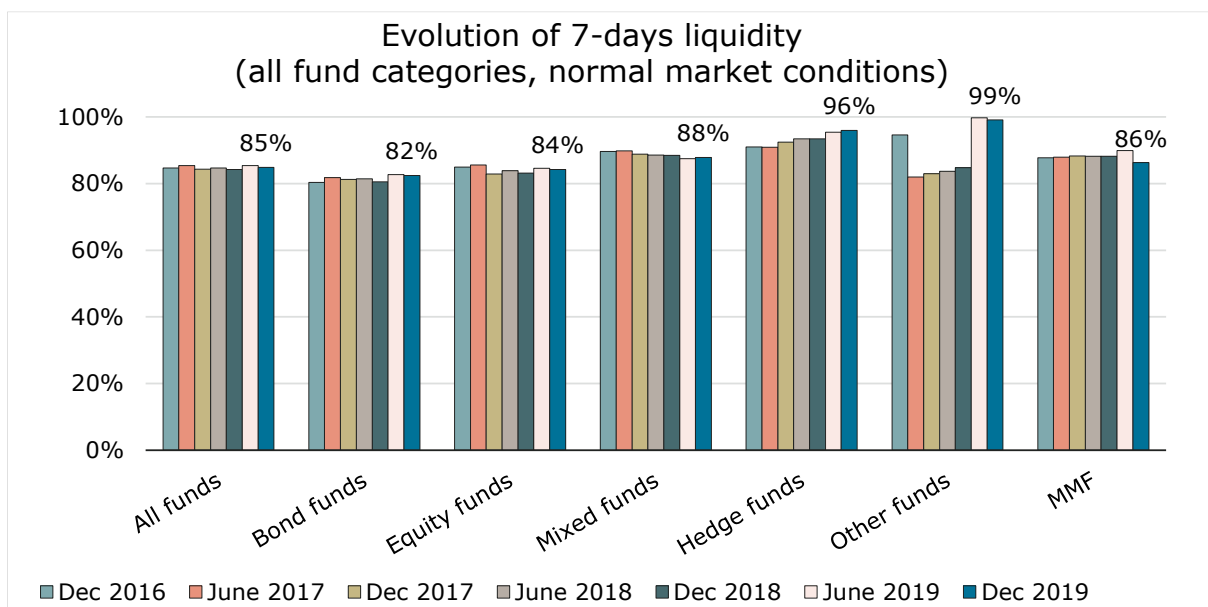
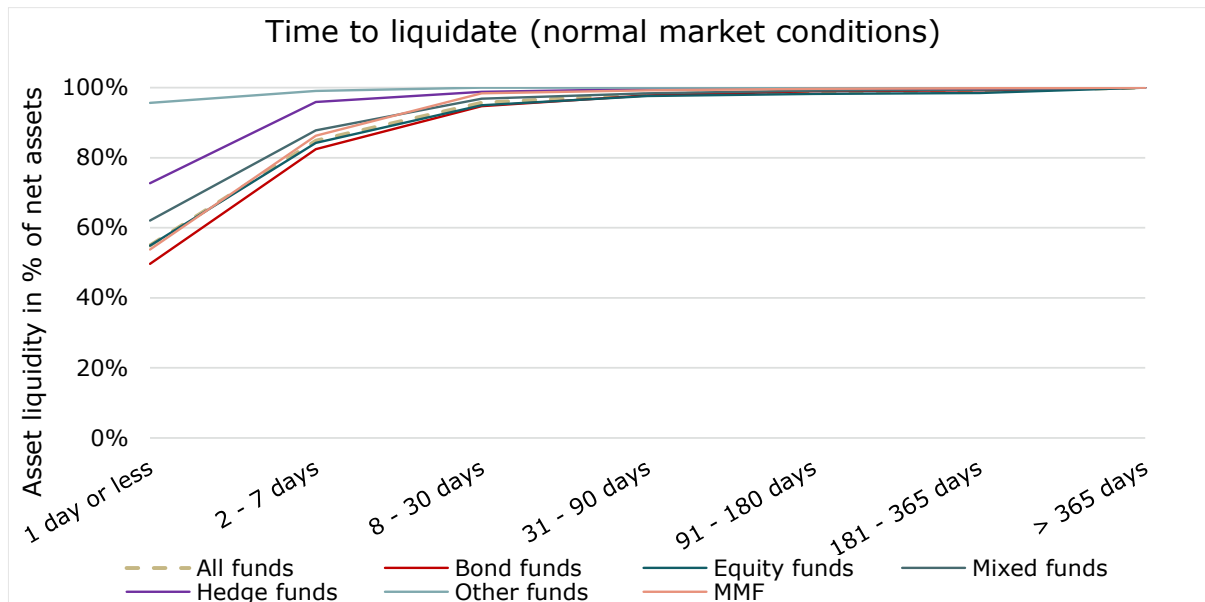


Methodology note: The graph represents the largest counterparties of UCITS in terms of (positive and negative) net counterparty exposure of UCITS in the full reporting scope. More specifically, the main counterparties are determined based on the sum of the absolute values of the net exposures of all UCITS in the full reporting scope to their three counterparties with the largest positive net exposure and their three counterparties with the largest negative net exposure at semester-end. It is determined at group rather than at legal entity level.



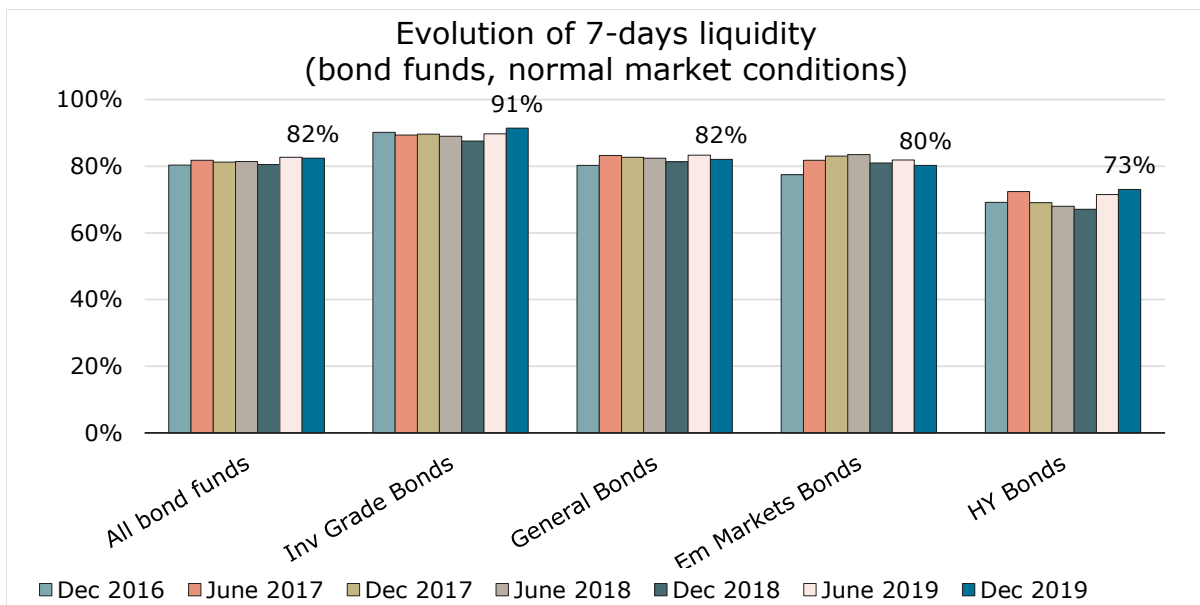
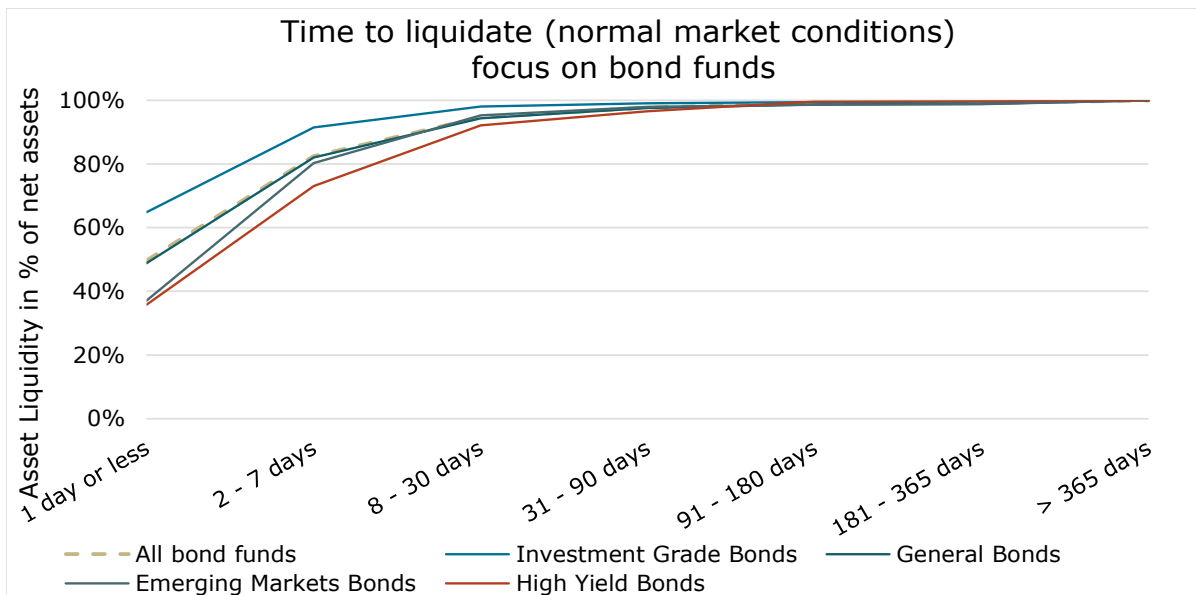
4.6 Liquidity³

4.6.1 Portfolio liquidity at semester-end in normal market conditions

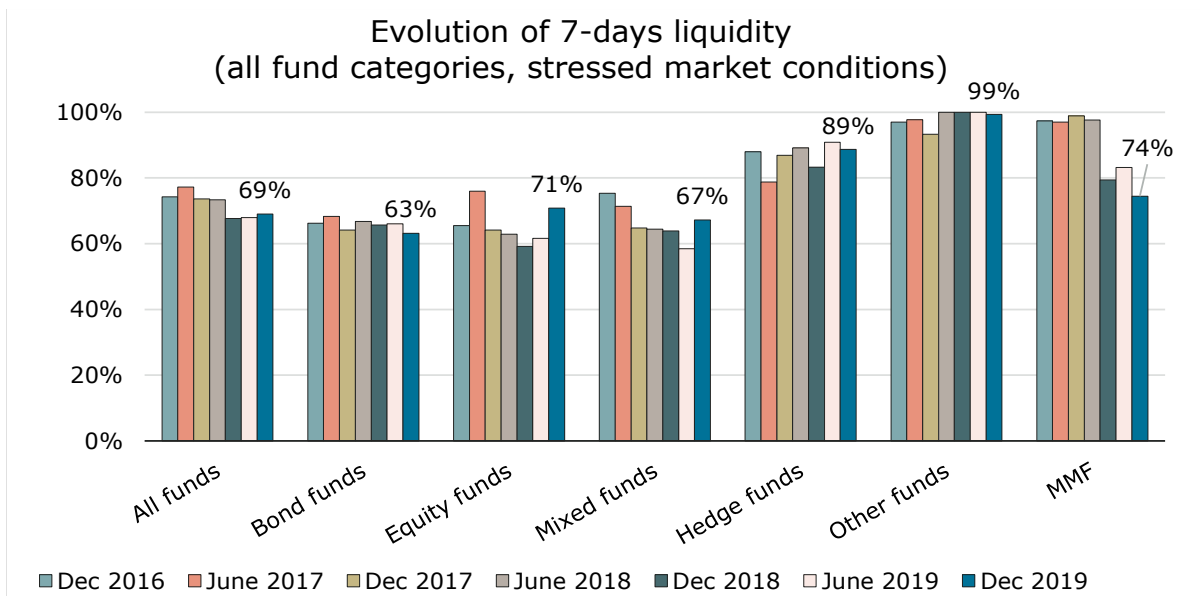
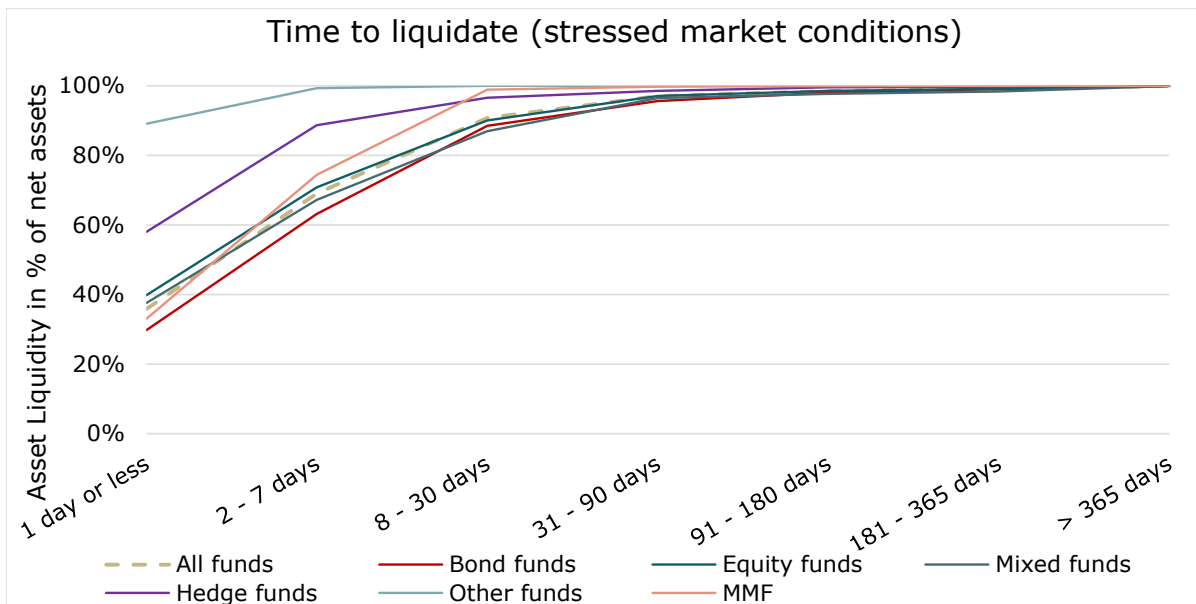


³ The figures are based on the self-assessment of the Investment Fund Managers on the time to liquidate of their funds and may appear relatively over-optimistic.

4.6.2 Portfolio liquidity at semester-end in normal market conditions (bond funds)

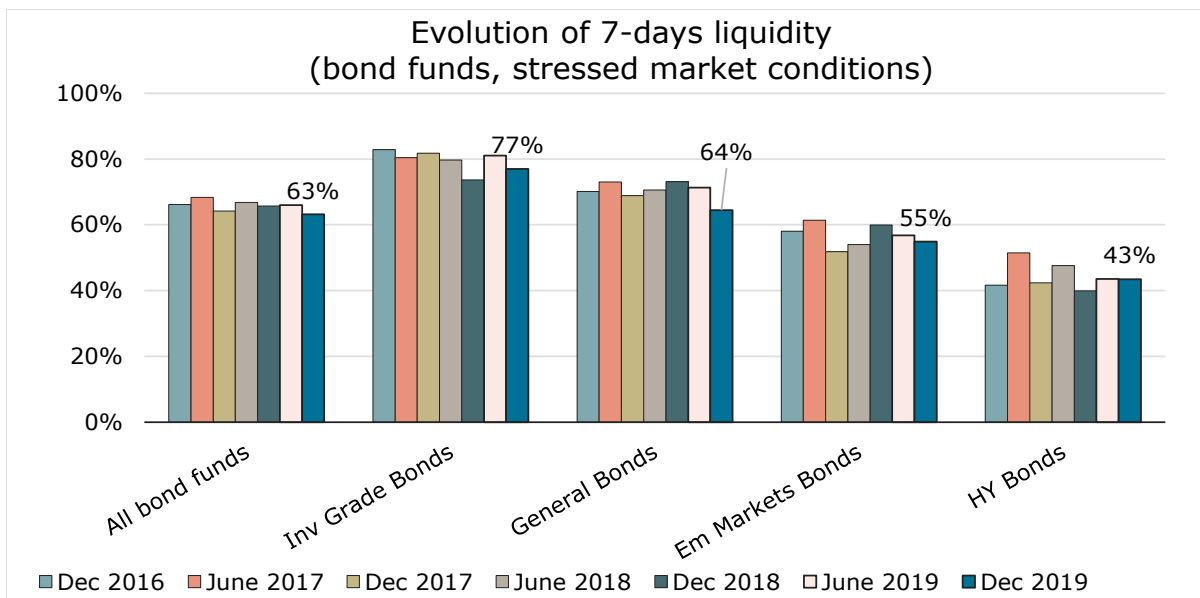
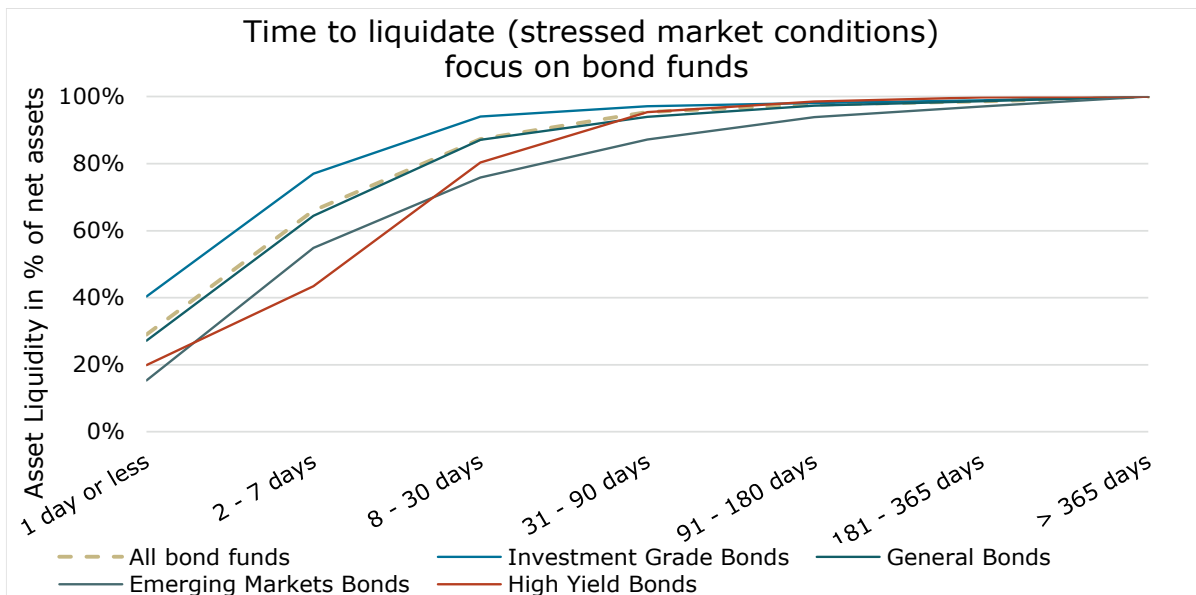


4.6.3 Portfolio liquidity at semester-end in stressed market conditions⁴

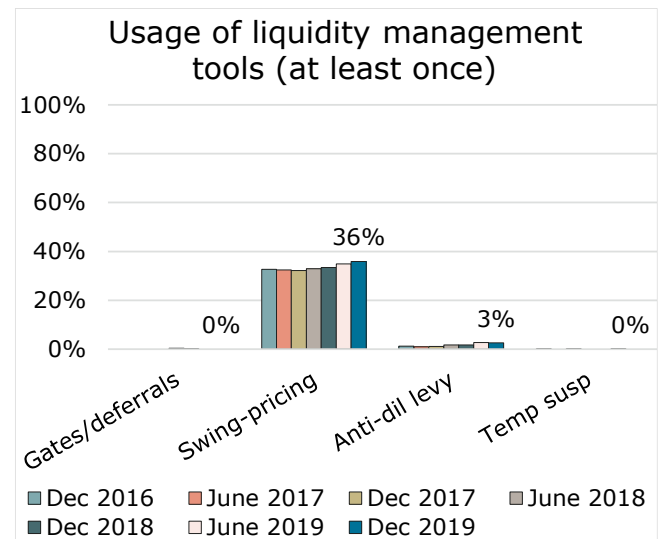
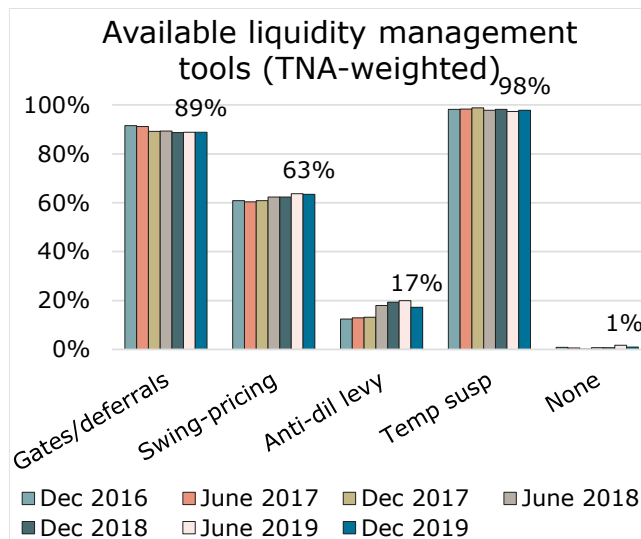


⁴ As set out in the guidelines, this sub-section is optional and was filled in by a minority of funds (~30% of the full reporting scope). It is critical to stress that the results are based on different methodologies and/or assumptions.

4.6.4 Portfolio liquidity at semester-end in stressed market conditions (bond funds)

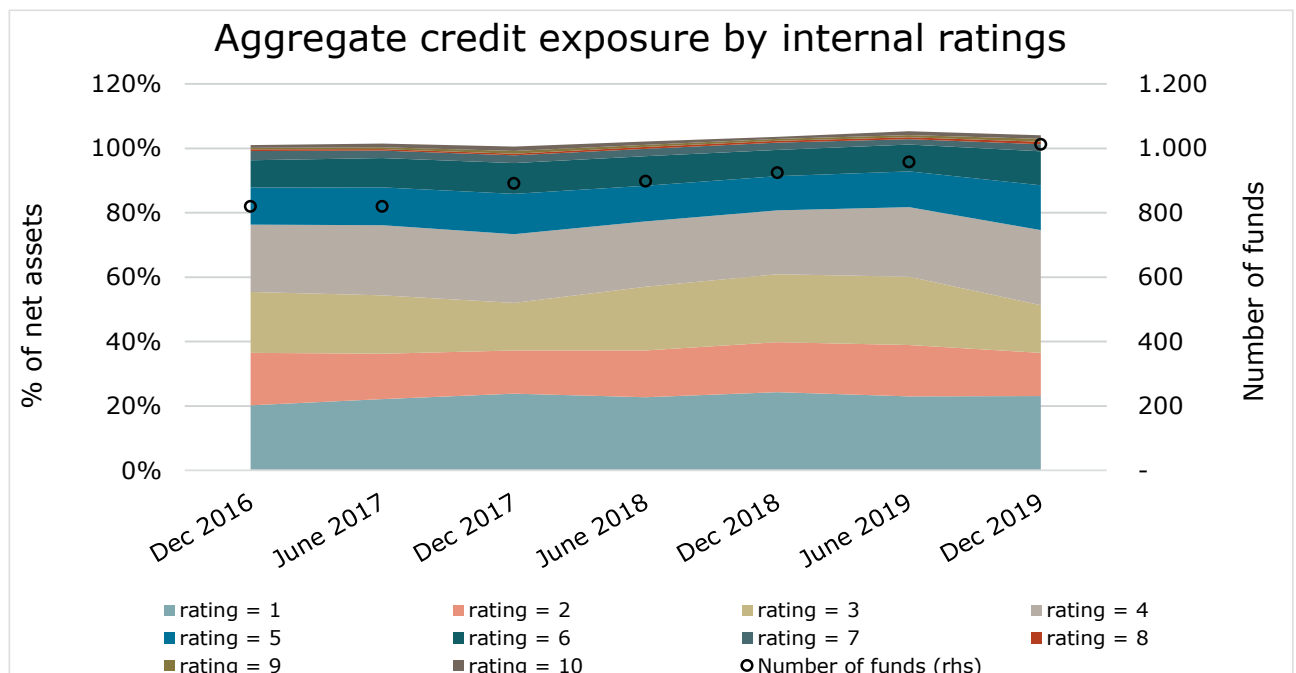


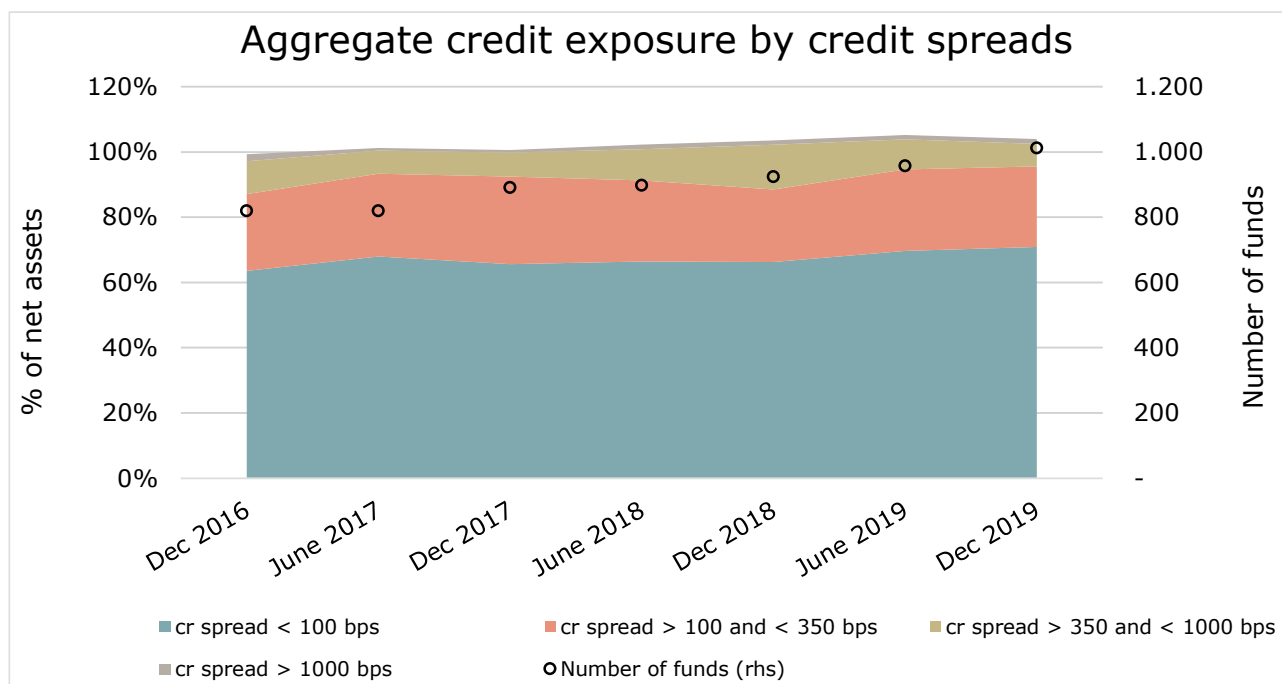
4.6.5 Liquidity Management Tools



4.7 Credit

4.7.1 Aggregate credit exposure by internal ratings and by credit spreads





Methodology note: As set out in the guidelines, this sub-section is only applicable, with a few exceptions (e.g. funds of funds), to UCITS within the full reporting scope which have a total debt portfolio exposure (direct or indirect) at semester-end greater than or equal to 50% of the UCITS total net assets. Exposures to debt securities should be broken down by credit rating from 1 to 10 with reference to an internal assessment of the credit quality of the said instruments, whereby rating 1 is deemed to be the upper credit rating (i.e. the highest quality) and 10 relates to defaulted securities.



Commission de Surveillance du Secteur Financier

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