Dear readers,

Due to the public holiday at the start of next week, we shall be taking a brief publication break. As such, **no** edition of our weekly publication will be released on 05 October. However, we shall look forward to welcoming you back on **Wednesday, 12 October**, when our Covered Bond & SSA View will be published again via the familiar channels.

Your Markets Strategy & Floor Research team

Covered Bond & SSA View

NORD/LB Markets Strategy & Floor Research

28 September 2022 ♦ 30/2022

NORD/LB

Agenda

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Market overview
Covered Bonds

Authors: Dr Frederik Kunze // Melanie Kiene, CIIA // Stefan Rahaus

Primary market: Arkea to the rescue during a turbulent start to the week

If we look at the EUR benchmarks placed in the covered bond segment over the past five trading days, it seems like an exceptionally quiet trading week. After all, just a single issuer approached investors with a deal, namely Arkea Home Loan SFH (Arkea) from France. However, in the context of a turbulent start to the current trading week, there is a risk of jumping too hastily to a sole conclusion in connection with current market events when looking at the number of "fresh" bonds. Due to the fact that it brought together major players in conference rooms and boardrooms, a key factor influencing primary market activity was the gathering of the covered bond community in the Austrian capital Vienna, jointly organised by Global Capital Euromoney Conferences and the European Covered Bond Council (ECBC). As part of the numerous presentations, panel discussions and meetings, we were once again left with the impression that during times of crisis the asset class of covered bonds boasts the requisite characteristics to overcome the turbulence and, at the same time, contributes to stable refinancing of the credit institutions due to the cyclical nature of the financial markets. However, there are also challenges to overcome and new paths to be explored. This applies, for example, to the responses required to combat climate change as well as changing regulatory framework conditions. Arkea also found the market environment to be challenging, although this did not put the issuer off. However, when placing its European Covered Bond (Premium) for EUR 500m (WNG) with a term of six years, it accordingly ended up opting for a somewhat safer structure. The guidance was initially in the area of ms +12bp before narrowing to ms +8bp during the marketing process, which, according to our calculations, generated a new issue premium of "just" +2bp. The secondary market performance also leaves no doubt that the deal for Arkea can be considered a success.

Issuer	Country	Timing	ISIN	Maturity	Size	Spread	Rating	ESG
Arkea Home Loans SFH SA	FR	26.09.	FR001400CZO3	6.0y	0.50bn	ms +8bp	AAA / Aaa / AAA	-

Source: Bloomberg, NORD/LB Markets Strategy & Floor Research, (Rating: Fitch / Moody's / S&P)

Secondary market: performance remains intact

The general market turbulence continues to have only a moderate impact on the covered bond segment at present. There is certainly evidence of a more selective approach on the investor side, meaning that some names and jurisdictions are not escaping completely unscathed. At the same time, however, covered products are in demand. The most recent deals (including the Arkea bond from Monday) performed accordingly well. Core jurisdictions and shorter maturities continue to be subject to greater demand, although the odd repeat buyer can be seen in the longer maturities segment (up to ten years) as well. With regard to our spread expectations up to the end of 2022, we stand by our assessment that the market technical will provide the crucial momentum in the medium to long term. However, this does not preclude short-term and pronounced sentiment-driven moves in the ASW spreads. Nevertheless, we continue to anticipate only modest widening on the horizon, although the rises in premiums versus swaps should at least be somewhat more pronounced, particularly for longer maturities.

EUR sub-benchmark segment: Equitable Bank from Canada approaches investors again

It will not have escaped the attention of our regular readers that we have a bit of a weakness for the EUR sub-benchmark segment. As such, we welcome both newcomers and the “repeat offenders” that breathe life into this sub-market, giving it a sense of breadth and depth in the process. After making its first appearance in this sub-segment back in 2021, Equitable Bank (Fitch: BBB-; DBRS: BBB) from Canada can now certainly be regarded as a part of the latter group. Yesterday, on Tuesday, the bank successfully placed its third EUR sub-benchmark overall and (on the back of a deal from May 2022) its second in the current year. As was the case with both the previous deals, Equitable selected a term to maturity of three years for this bond as well. In terms of issuance volume, the bank restricted itself to a more modest EUR 250m, having previously opted for deals worth EUR 300m (in May 2022) and EUR 350m (in September 2021). With a re-offer spread of ms +37bp (IPT: ms +37bp area) for this AA-rated covered bond (Fitch and DBRS), orders worth EUR 290m were recorded for this sub-benchmark deal (bid-to-cover ratio: 1.2x). While Equitable Bank has certainly offered investors a significant premium at this price, cross-market influences such as the high issuance volume from Canada and general market sentiment are to be taken into account alongside individual credit factors as well. In our experience, the mood on the financial markets in particular can occasionally have a stronger impact on “smaller” issuers.

The Netherlands: Moody’s sees covered bonds and banks as the winners of the 2023 budget

The risk experts at Moody’s have been delving deeper into the Dutch government’s 2023 budget. According to the authors of the recent Sector Comment, Dutch households stand to benefit from the measures included in the package that aim to support purchasing power. The Moody’s analysis focuses less on the package’s direct impact on covered bonds, instead looking at covered bonds, among other aspects, as beneficiaries of the attempts to support economic activity and the labour market in general in terms of their credit quality. Moody’s is of the view that the direct impact of the package is targeted more towards lower-income households, which in turn reduces the relevance for covered bonds. Nevertheless, the government measures contained in the new budget could also support the asset quality of Dutch banks to a significant extent.

Sweden: Standard & Poor’s discusses outlook for house prices in Sweden, among other things

As part of its “Swedish Covered Bond Market Insights 2022”, the risk analysts from Standard & Poor’s (S&P) have taken a detailed look at the Swedish covered bond market. The implications identified by the rating experts for the country’s property market should be highlighted in particular. It should come as little surprise to note that the authors are seeing the first signs of house prices coming under pressure from the combination of high energy prices and interest rate hikes. S&P also refuses to rule out an increase in LTV ratios, which at present are at very low levels. In relation to issuance behaviour, the analysts venture that primary market activities are likely to flatten off. In turn, this is based on the expectation of falling house prices, higher interest rates and sticky deposit savings. With regard to the latter point in particular, we see a significant uncertainty factor when applied to the global covered bond market. Ultimately, high levels of customer deposits could limit the covered bond funding requirement. On the other hand, inflation and higher payment services for real estate loans due to higher mortgage interest rates would lead to private household savings diminishing , which could potentially increase the need for funding.

Moody's comments on Oldenburgische Landesbank takeover of Degussa Bank

In the previous edition of our weekly publication, we briefly discussed the takeover of Degussa Bank by Oldenburgische Landesbank (OLB). In a recent Issuer Comment, the risk experts at Moody's presented their view of the merger of the two Pfandbrief issuers. The rating agency expects that OLB will take over all outstanding debt including the Pfandbriefe. According to Moody's, this would result in an improvement in credit quality for the holders of outstanding Pfandbriefe issued by Degussa Bank. In addition, the agency foresees a merger of the cover pools, which would lead to a higher level of granularity in the combined pool. Again, this would be "credit positive", according to Moody's. Multi-family houses make up a relatively large proportion of the Degussa Bank pool (20%), although with a small number of exposures. As a result, the collateral score of the Degussa cover pool is 11.5%, higher than that of the OLB pool (5.1%). OLB is already part of the group of active EUR sub-benchmark issuers, having made its debut in this sub-market in March 2021 with a deal for EUR 350m (10y). In April of this year, the institute approached investors with a 7y deal once more, again in the amount of EUR 350m. As a result of a possible merger of the pool, we see an increased probability of larger or more frequent OLB capital market appearances in the Pfandbrief segment. In our opinion, the OLB sub-benchmarks can be used as Level 2A assets in the context of LCR management. The Pfandbriefe issued by both institutes also benefit from a risk weighting of 10% according to the CRR, regardless of the issue size.

OLB and Degussa Bank: key cover pool data provided by Moody's

	Oldenburgische Landesbank	Degussa Bank
Cover pool amount	EUR 1,039,653,880	EUR 294,330,000
No. of residential mortgages	8,360	1,226
Covered bonds	EUR 881,000,000	EUR 157,200,000
OC ratio	29.2%	80.2%
Residential assets	98.3%	80.1%
Collateral score	5.1%	11.5%
Covered bond rating	Aa1	Aa3, review for upgrade

Source: Moody's, NORD/LB Markets Strategy & Floor Research

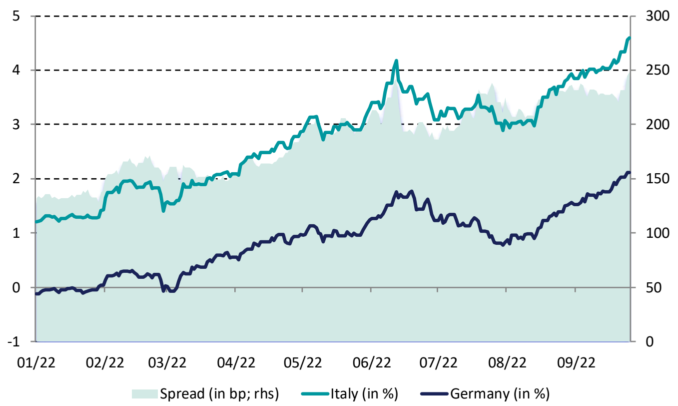
Market overview
SSA/Public Issuers

Authors: Dr Norman Rudschuck, CIIA // Jan-Phillipp Hensing

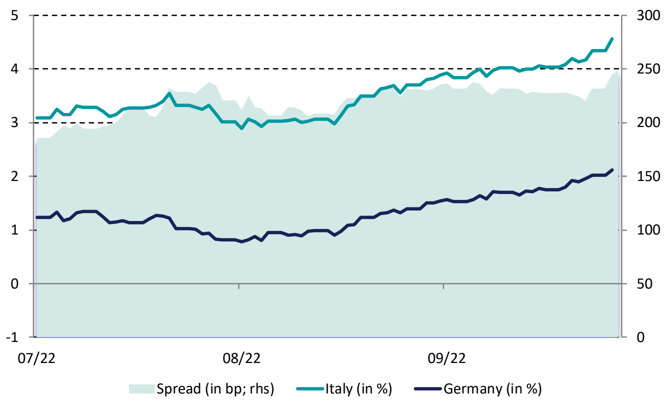
Italy has voted: right-wing alliance headed up by Giorgia Meloni wins

After Mario Draghi resigned in August following the break-up of the Italian government coalition, the Italian electorate went to the polls last Sunday to vote for their political representatives. The turnout was a historically low 64%, with the right-wing alliance emerging victorious. The coalition – formed of Meloni's "Brothers of Italy", Matteo Salvini's "League" party and Silvio Berlusconi's "Forza Italia" – took about 43% of the vote. The strongest force (Brothers of Italy), with over 25% as a single party, won almost as many votes as the entire centre-left alliance fronted by the Democrats (26%). The ramifications for the capital market are not insignificant given the much-discussed fragmentation of the market for government bonds. Since the beginning of the ECB's interest rate hike debates, the focus has been on the spread of Italian government bonds compared to those from Germany. The bigger the difference, the louder the calls to activate the ECB's new tool called the TPI (Transmission Protection Instrument). In the meantime, Italy's political uncertainty has fuelled a widening of spreads. Nevertheless, before activating the TPI, the ECB still has its "first line of defence" - reinvestments under the APP and especially the PEPP purchase programmes. In a previous issue we devoted a separate article to reinvestments; new data will not be available again until the beginning of October. It is already apparent that the ECB reinvests the maturing bonds mainly in peripheral states. We assume that the newly published data will confirm this trend. Since the beginning of the year (left chart), the premium against ten-year German government bonds has already risen significantly. While the difference was still around 130bp at the beginning of January, it is currently between 240bp and 250bp. Since the interest rate hike in mid-July (right chart), the spread has been between 200bp and 250bp - and rising - although the ECB's reinvestments should already be taken into account here. In reaction to the election result, the yield on ten-year Italian government bonds rose to over 4.5% on Monday.

Spread trend - Bunds vs. BTPs (yields, 10Y)



Spread trend – Bunds vs. BTPs (yields, 10Y)



Source: Bloomberg, NORD/LB Markets Strategy & Floor Research

Investitionsbank Berlin issues inaugural social bond

From the ranks of the regional development banks, we can welcome an ESG newcomer as of this week: Investitionsbank Berlin (ticker: IBB) issued an ESG bond (social bond) for the first time yesterday. With a volume of EUR 500m (WNG), the bond came in at ms -15bp (guidance: ms -13bp area). An order book of EUR 1.7bn produced a bid-to-cover ratio of 3.4x. IBB's Social Bond Framework is in line with ICMA's Social Bond Principles (SBP) from 2021. Use of the issuance proceeds can be assigned to the following SBP categories: "Affordable Housing", "Affordable Basic Infrastructure", "Access to Essential Services", "SME Financing & Employment Generation" and "Access to Public Goods and Services". All potentially suitable social loans are subject to a check for compliance with IBB's sustainability policy and guidelines. In addition to IBB's normal credit process, where checks are already made for compliance with applicable national and international environmental and social standards and regulations, IBB's exclusion criteria in regard to a significant share of turnover for new business from 2022 onwards are also included. This concerns, among other aspects, the arms and weapons industry, fossil energy production, but also alcohol, tobacco and gambling. In addition, ESG-critical exposures will be reviewed in future via a sustainability competence centre and assessed in greater detail with regard to ESG risks. A pool-to-bond approach is pursued to manage the proceeds. The proceeds will be used exclusively to finance suitable social loans and/or to refinance existing suitable social loans whose commitment was made no earlier than 36 months prior to the year of issue of the respective social bond. If a loan is no longer deemed suitable, IBB will "reallocate the proceeds to other social eligible loans on a best efforts basis and as soon as is reasonably practicable". In the unlikely event that this is not possible, the corresponding amount will be invested in accordance with IBB's internal regulations for liquidity management until it can be allocated to suitable social loans in the portfolio. The allocation report and the impact report are published annually and promptly if there are significant changes. According to the investor presentation, the total remaining capital of the portfolio of eligible social loans as at 30 June 2022 amounted to EUR 1.8bn, with the SBP categories "Affordable Housing" and "Access to Public Goods and Services" accounting for the largest share at EUR 819m and EUR 775m, respectively.

Joint German promotional bank bond placed on the market

In the previous issue, we already reported on the upcoming issue of the joint bond of the regional promotional institutions IFB Hamburg (ticker: IFBHH), ISB Rheinland-Pfalz (ticker: ISBRLP) and ILB Brandenburg (ticker: ILBB). Last Thursday, the issuers really got the ball moving and the "Emissionskonsortium der gemeinsamen Landesförderinstitute" (ticker: LFIESG) opened its books to investors. With a maturity of seven years and a volume of EUR 500m, the guidance for the social bond was set at ms -7bp area. Insights into the volume of the order book were not provided, and narrowing compared with the guidance was not possible in any case. This gives rise to speculation regarding investor interest. We are looking forward to seeing whether the issuance of joint bonds for regional promotional institutions will set a precedent or remain a one-off.

Primary market

We can look back on an eventful week on the primary market. We already talked about the deals of the Emissionskonsortium der gemeinsamen Landesförderinstitute (ticker: LFIESG) and Investitionsbank Berlin (ticker: IBB) on the previous page. Two French agencies set the ball rolling. Caisse Centrale du Crédit Immobilier de France (ticker: CCCI) issued a EUR 500m bond (5y) at OAT +48bp. The guidance was OAT +50bp area. An interpolation of FRTR 0% 02/25/27 and FRTR 0.75% 02/25/28 was used as a benchmark for this deal. The order book was reported at EUR 720m. At the longer end, however, Action Logement Services (ticker: ALSFR) provided reinforcements. The 15-year sustainability bond was marketed at OAT +53bp area and also priced at this spread. An interpolation of FRTR 1.25% 05/25/36 and FRTR 1.25% 05/25/38 was used as a benchmark here. At EUR 750m, the volume of the bond is just below the order book of EUR 770m. The ESG segment also included the Spanish Instituto de Crédito Oficial (ticker: ICO). With a 5y maturity and a volume of EUR 500m, the promotional bank's social bond came to the market at SPGB +14bp. The guidance was SPGB +16bp area, meaning that narrowing of two basis points was possible during the marketing phase. The order book amounted to EUR 1.1bn. Also of interest: the Autonomous Community of Madrid (ticker: MADRID) is currently holding investor talks to present its new Impact Report, which is in line with the EU taxonomy. The planned green funding strategy will be presented at the same time. Yesterday, the bond of the Dutch BNG – which is also this issuer’s ticker - came to the market as well, following a mandate that was announced on Monday. For a shorter term of five years, guidance of ms -12bp area was announced. During the marketing phase, the volume of the bond was set at EUR 1.5bn. Pricing was ultimately fixed at ms -15bp, with the corresponding order book amounting to EUR 6.2bn. We would also like to share with you the results of the latest EU auction: two bonds, namely EU 0.8% 07/04/25 and EU 1% 07/06/32, were directly topped up. The bond with the shorter maturity by EUR 1.5bn and the one with the longer maturity by EUR 2.398bn. The bid-to-cover ratios were 3.5x and 2.0x, respectively. Two mandates were also issued on Tuesday. The state of Bremen (Ticker: BREMEN) intends to issue a EUR 500m bond (WNG) with a ten-year maturity in the very near future. The same goes for Kreditanstalt für Wiederaufbau (Ticker: KFW), which has its sights set on a 7y benchmark.

Issuer	Country	Timing	ISIN	Maturity	Size	Spread	Rating	ESG
BNG	NL	26.09.	XS2540993685	5.0y	1.50bn	ms -15bp	AAA / Aaa / AAA	-
IBB	DE	26.09.	DE000A289KN1	5.0y	0.50bn	ms -15bp	AAA / - / -	X
LFIESG	DE	21.09.	DE000A30VPZ3	7.0y	0.50bn	ms -7bp	AAA / - / -	X
ICO	ES	21.09.	XS2538778478	5.3y	0.50bn	ms -6bp	A- / Baa1 / A	X
ALSFR	FR	20.09.	FR001400CWI2	15.0y	0.75bn	ms +51bp	AA / Aa2 / -	X
CCCI	FR	20.09.	XS2538764684	5.0y	0.50bn	ms -15bp	AA / Aa2 / -	-

Source: Bloomberg, NORD/LB Markets Strategy & Floor Research (Rating: Fitch / Moody’s / S&P)

Covered Bonds
Focus on covered bond jurisdictions: Singapore in the spotlight

Author: Dr Frederik Kunze

Covered bond market in Singapore

Based on the current composition of the iBoxx EUR Covered, overseas jurisdictions (i.e. Australia, Canada, Japan, New Zealand, Singapore and South Korea) account for a share of 14.4% (EUR 118bn) of the outstanding volume in the EUR benchmark segment relevant for us (EUR 817bn). As at the end of 2019, this share had been 11.1% (EUR 94bn), which suggests a considerable rate of growth. In the context of the European covered bond market harmonisation, there are also notable implications for those covered bond jurisdictions that do not fall under the category of "EEA relevance" in the Directive. In today's edition of our weekly publication, we will turn our attention to an established jurisdiction in the APAC region, Singapore, and then concentrate on its covered bond market.

Singapore: a glance at the ECBC statistics

The structure of covered bond issuers from Singapore can by all means be described as consistent, with three issuers active on the market since 2017 in the shape of DBS Bank (DBS), the Overseas-Chinese Banking Corporation (OCBC) and the United Overseas Bank (UOB). Based on the ECBC's annual statistics as at the reporting date of 31 December 2021, the euro clearly dominates as an issuing currency. Accordingly, 65.4% of the volume is attributable to the single European currency. The remaining 34.6% is in USD, GBP and AUD. Issuers placed only mortgage-backed covered bonds. The overall market of Singapore grew significantly in 2021 – by 25.8% year on year – and amounted to EUR 11.1bn as at year-end. All covered bonds were issued with a soft bullet structure and placed publicly. The share of benchmarks with volumes equal to EUR 1bn or more came in at 28.9%. In the following, we will present elements of the cover pools for three issuers active in Singapore.

Cover pools in Singapore

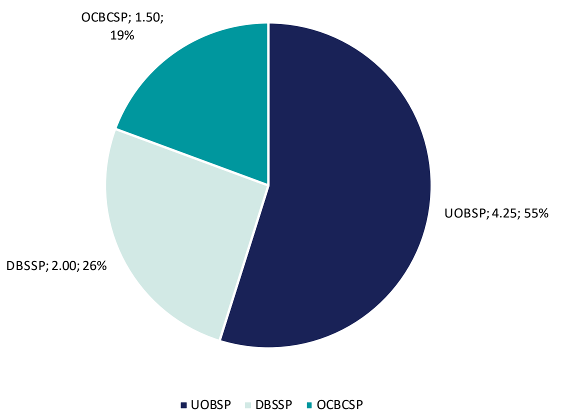
	DBS Bank	Oversea-Chinese Banking Corp	United Overseas Bank
Covered bonds outstanding	SGD 7,671m (EUR 5,458m)	SGD 3,162m (EUR 2,249m)	SGD 9,540m (EUR 6,787m)
Cover pool volume	SGD 17,396m (EUR 12,377m)	SGD 10,331m (EUR 3,162m)	SGD 17,086m (EUR 12,156m)
Current OC (nominal / legal)	126.8% / 3.0%	211.2% / 3.0%	79.1% / 3.0%
Type	98.5% Residential	100% Residential	99.2% Residential
Main country	100% Singapore	100% Singapore	100% Singapore
Main region	49% Outside Central Region	63.5% Outside Central Region	74.2% Outside Central Region
Number of mortgage loans	24,717	15,763	25,370
Share of 10 largest exposures	0.23%	0.73%	0.54%
NPLs	0.01%	0.06%	0.02%
Fixed interest (Cover Pool / CBs)	53.5% / 67.1%	30.7% / 85.1%	67.0% / 87.8%
WAL (Cover Pool / CBs)	19.9y / 3.0y	19.3y / 1.0y	21.0y / 1.3y
CB Rating (Fitch / Moody's / S&P)	AAA / Aaa / -	AAA / Aaa / -	- / Aaa / AAA
Cut-off date	09 September 2022	31 August 2022	31 August 2022

Source: Issuers, rating agencies, Bloomberg, NORD/LB Markets Strategy & Floor Research

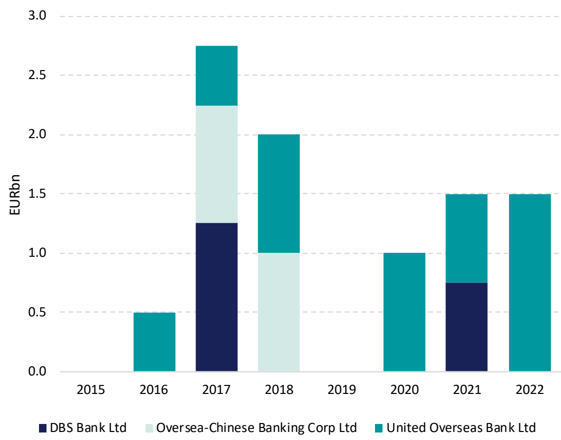
EUR 7.75bn outstanding EUR benchmarks in Singapore

The market for EUR benchmarks from Singapore is also shaped by the three above issuers and comprises a total of 11 outstanding bonds and a volume of EUR 7.75bn. UOB is the biggest issuer, in terms of both the number of outstanding EUR benchmarks and volume. The bank has five bonds with a total volume of EUR 4.25bn. DBS has three outstanding benchmarks, for which the cumulative volume is EUR 3bn. OCBC, meanwhile, has EUR 1.5bn from three deals. While no issuers approached investors in 2019, UOB was active on the market in 2020, 2021 and 2022. DBS last sought investors in 2021, while OCBC's last benchmark placement was back in 2018. In terms of maturity structure, a longer-term assessment reveals a preponderance of initial residual maturities of five or seven years. By contrast, the latest deal from UOB in March 2022 (UOBSP 0.387 03/17/25) was in line with the prevailing global market trend for an initial residual maturity of three years. In 2021, UOB again placed the longest benchmark so far (DBSSP 0.01 10/26/26) with a maturity of eight years. UOB's 3y deal with an issue volume of EUR 1.5bn was also the country's largest placement in the EUR benchmark segment thus far.

SG: outstanding volume by issuer (EUR BMK)



SG: issuances by year (EUR BMK)

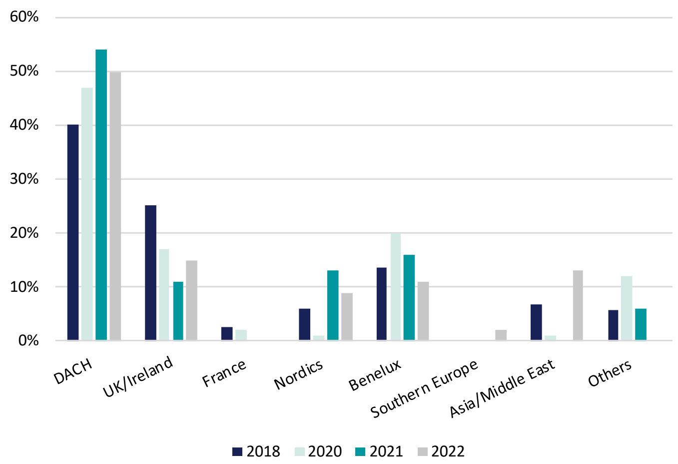


Source: Bloomberg, NORD/LB Markets Strategy & Floor Research

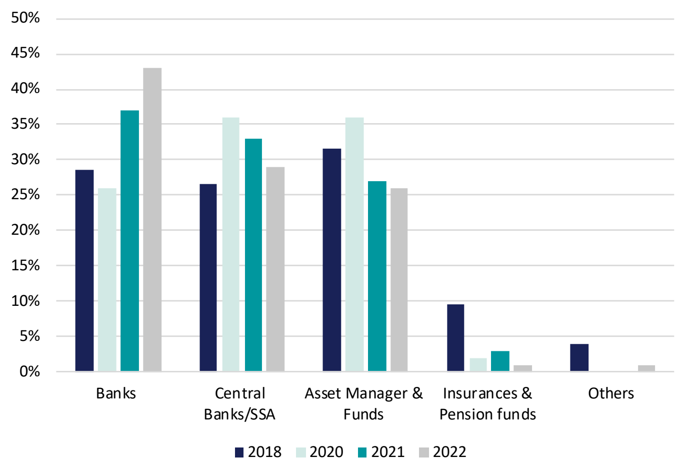
Investor distribution Singapore

A look at the investor distribution for EUR benchmarks from Singapore shows the most significant buyer group is investors from the German-speaking region. Accordingly, in the years 2021 (54%) and 2022 (50%), around half the allocated volume was to investors in this region. In 2022, the second most important investor group is buyers from the UK/Ireland (15%). Investors from the Benelux region (11%) have currently fallen behind buyers from Asia/Middle East (13%), although the data basis is limited since only one deal has been recorded to date. By investor type, an increase in the volume allocated to commercial banks is apparent. This investor group once again accounts for the largest share (2021: 37%, 2022: 43%). In contrast, the relative shares of the investor groups Central Banks/SSA and Asset Manager & Funds have been in decline.

Investor distribution by country



Investor distribution by type

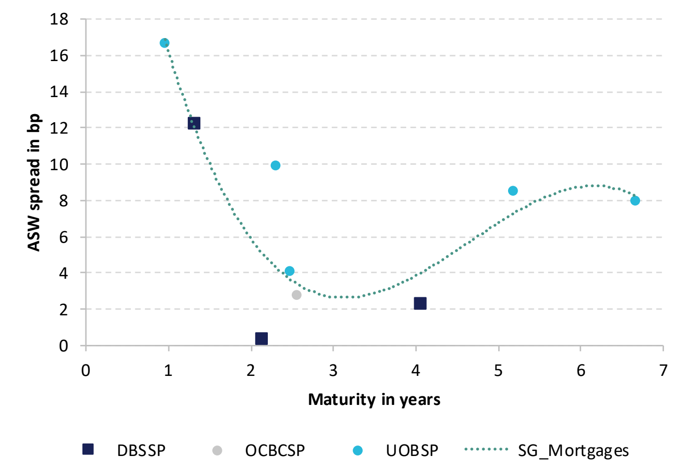


Source: Bloomberg, NORD/LB Markets Strategy & Floor Research

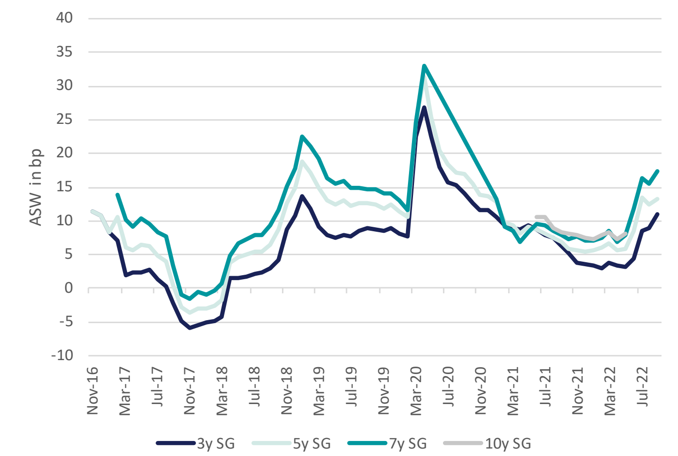
Homogeneous covered bond market also reflected in spread landscape

With regard to the spread landscape for outstanding EUR benchmarks, the homogeneity of the market is evident. Both the sound issuer ratings across the board and the aspects related to cover pool quality are reflected in low spread variance on the secondary market. In our view, the spread increases to be observed in the current year change nothing about this and occurred in line with the index for EUR benchmarks on the whole. Also worth noting is that secondary market and screen prices are of limited value at the short end in particular, given the comparatively low primary market supply and therefore a scarcity of new products. Nevertheless, we believe it is certainly prudent in this context to compare the relative development of issuances from Singapore with those from other overseas jurisdictions.

Spread overview – Singapore



Spread trend – Singapore

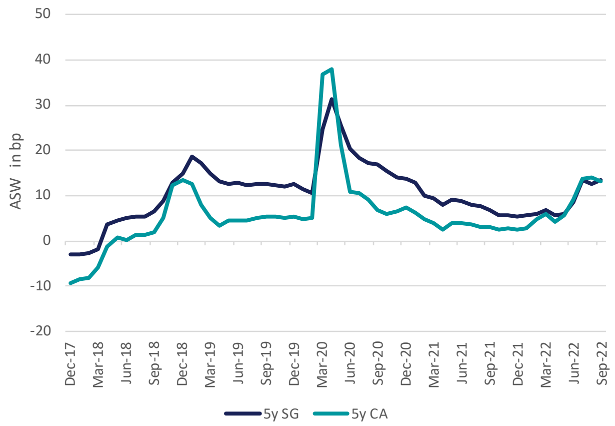


Source: Bloomberg, NORD/LB Markets Strategy & Floor Research

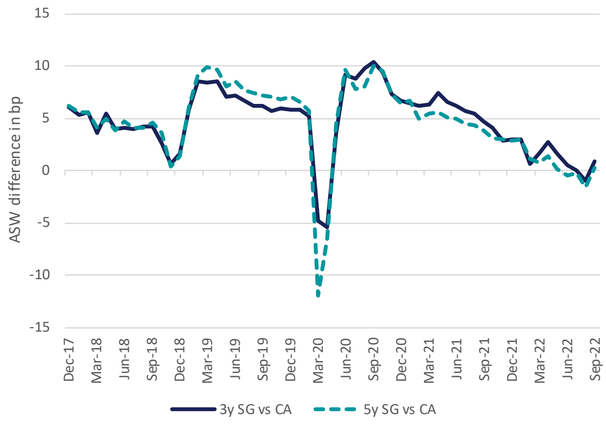
Spread trend: a generic comparison with the overseas jurisdiction of Canada

Without doubt, Canada is the top dog among the overseas jurisdictions in terms of outstanding volume. In a historical context, this not only applies to outstanding volumes, issuance behaviour and the number of issuers but also in terms of spread development. After all, covered bonds from Singapore definitely traded at a premium versus the Canadian EUR benchmarks for an extended period. The spread variance was stable overall, but was skewed – at least temporarily – by the market distortions following the outbreak of the Covid-19 crisis. In the more than two years since, we have seen longer term and largely undisrupted development. In the wake of this, a narrowing discrepancy between EUR benchmarks from Canada and Singapore was certainly becoming apparent. In fact, the generic spreads (cf. the two graphs below) temporarily indicated that EUR benchmarks from Singapore in the two observed maturity buckets (3y and 5y) had on average displaying lower spreads versus swaps than Canadian counterparts. This general trend can largely be explained with terms of market technique. Ultimately, the issue volume from Canada was unexpectedly high in 2022, while issuers from Singapore had previously tended to be rather restrained.

Spread trend – Singapore vs. Canada



Spread difference: Singapore vs. Canada



Source: Bloomberg, NORD/LB Markets Strategy & Floor Research

Singapore's legal framework and (future) regulatory considerations

With respect to covered bond legislation, a particular strength worth highlighting is that the cover assets are restricted to mortgage loans. Potential for improvement can be identified in the requirement to calculate cover at net present value alongside the nominal future-based calculation. Counter to the developments in the European legislation landscape, which were triggered by the Covered Bond Directive, Singapore's legislation has seen fewer changes in the recent past. However, the developments in Europe also affect Singapore, especially with regard to LCR eligibility and qualification as level 2A assets. According to our understanding, these features have until now both applied to EUR benchmarks from Singapore. We maintain this assessment for the future. We therefore assume that Singapore's issuers fulfil the requirements in Article 14 of the Covered Bond Directive as part of their reporting and will demonstrate an adequate rating. It can also be assumed that supervision in Singapore will be equivalent.

Singapore: overview of legislation

Designation	Singapore Covered Bonds
Special covered bond law	Yes
Cover assets (incl. substitute cover)	Mortgage loans
Owner of assets / Specialist bank principle	Issuer / No
Geographical scope	-
Loan to value - Mortgage loans	80%
Preferential claim by law	Yes
Cover register	Yes
Substitute assets / Limit of substitute assets	Yes / 15%
Minimum OC	3% nominal value
Asset encumbrance	10% issue limit
UCITS compliant / CRD compliant / ECB eligible	No / No / No

Source: National legislation, ECBC, NORD/LB Markets Strategy & Floor Research

Conclusion

Singapore is undoubtedly one of the established overseas jurisdictions in the global universe for covered bonds in a EUR benchmark format. According to our understanding, the homogeneous structure of the market in conjunction with the prevailing credit quality is distinctive. A degree of scarcity is also evident on the market on account of the low supply of issues in the recent past. In our view, this change is not without consequence for the spread trend. We also see the observed development of generic spreads in the secondary market as an indication of this. In our market forecast, we certainly expect to see more issuances from Singapore. The previously issued EUR 1.5bn should in our opinion be followed by a further EUR 1.5bn, which would result in a plus of EUR 1.5bn for 2022, given that bonds of EUR 1.5bn are set to mature this year (cf. updated supply forecast dated 7 September). On the spread side, this should not cause significant or long-term widening. We anticipate moderate widening towards the end of the year. In our estimation, a key factor for this expectation is the regulatory implications derived from the Covered Bond Directive. Accordingly, the level 2A status should not be regarded as being at risk long term in the context of LCR management for EUR benchmarks.

SSA/Public Issuers
German Laender: more ESG issues on the horizon?

Authors: Dr Norman Rudschuck, CIIA // Jan-Phillipp Hensing

Greenlight for ESG bonds from German Laender

ESG bonds are undoubtedly already a fixture on the international capital markets and the German Laender are not being left behind when it comes to the trend towards bonds with sustainability aspects. For example, North Rhine-Westphalia recognised the potential of this segment as early as 2015, when it issued an inaugural sustainability bond. Since then, it has been an annual issuer of sustainability bonds on the primary market. In 2021, two more Laender joined the ranks of ESG issuers. Baden-Württemberg issued its first green bond in March 2021, followed by Hesse in June. In the short to medium term, we expect more Laender to conduct refinancing activities on the capital market via ESG bonds. The reasons for this are manifold. On the one hand, refinancing costs via sustainability bonds are often several basis points cheaper (key word: greenium), and on the other hand, the concept of sustainability is part and parcel of state policy. Hesse, for example, explicitly included this as a goal in the Hessian constitution in 2018: "The Federal State, the municipalities and local communities consider the principle of sustainability in their actions to protect the interests of future generations" (Art. 26c. of the Hessian Constitution). Conversely, the higher costs for more extensive reporting could be a stumbling block for some Laender, from which the profitability of an ESG issue could suffer.

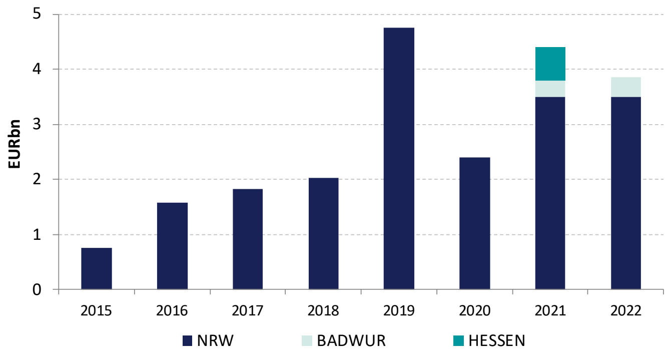
Green, social and sustainability - a classification

Three forms of sustainability bonds in particular have established themselves on the capital market: green bonds, social bonds and sustainability bonds. The respective designation already indicates which primary sustainability goal is to be pursued. In particular, green bonds pursue goals that serve environmental protection. This can be, for example, the promotion of renewable energy, or the financing of regional and long-distance public transport through more environmentally friendly drive options. Social bonds, on the other hand, are used (as expected) for social projects. These are expressed, for example, in the promotion of social housing, or in initiatives to reduce unemployment and finance support measures. Sustainability bonds, on the other hand, are all-rounders and the projects supported can be of both an ecological and social nature. The projects that can generally be financed through sustainability bonds are to be found in the corresponding frameworks of the issuers. These are usually closely linked to the respective guidelines of the International Capital Market Association (ICMA). The goals of the respective frameworks are based on the UN's Sustainable Development Goals (SDGs) and the respective category of the Green Bond Principles (GBP), Social Bond Principles (SBP) or Sustainability Bond Guidelines (SBG). In addition to the corresponding use of proceeds, the respective ICMA guidelines provide additional guidance on the process of project evaluation and selection, management of proceeds and reporting.

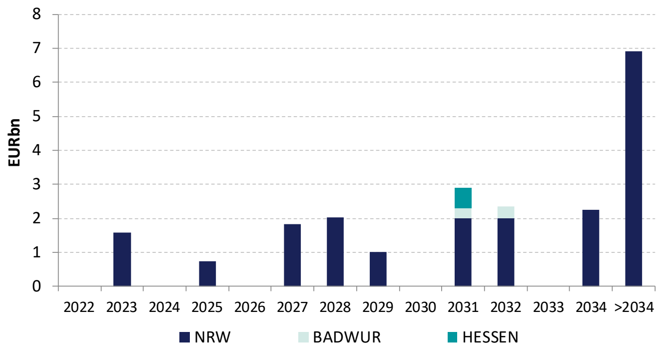
Issuance volume has room for improvement

Since the first sustainability bond was issued by North Rhine-Westphalia in 2015 this segment has enjoyed growing popularity: a further eleven sustainability bonds have followed from NRW. In 2021, the Laender of Hesse (EUR 600m) and Baden-Württemberg (EUR 300m) each issued a green bond. In May 2022, it was once again Baden-Württemberg that placed another green bond (EUR 350m) and offered the prospect of further green issues. The total volume of ESG bonds issued by German Laender currently stands at EUR 21.6bn, with the majority attributable to sustainability bonds from NRW. With efforts to invest more in environmental and social areas, we anticipate that more Laender will issue ESG bonds. We are expecting growing momentum in each of the ESG segments outlined above over the next few years. An upward trend in the volume of ESG bonds issued has already been observed in recent years. While the annual ESG volume issued in 2015 was just EUR 750m, a total of EUR 4.75bn was issued in 2019 and EUR 4.4bn in 2021, with North Rhine-Westphalia still accounting for the lion's share here.

ESG volume issued over time



Maturity profile of ESG bonds



Source: Bloomberg, NORD/LB Markets Strategy & Floor Research

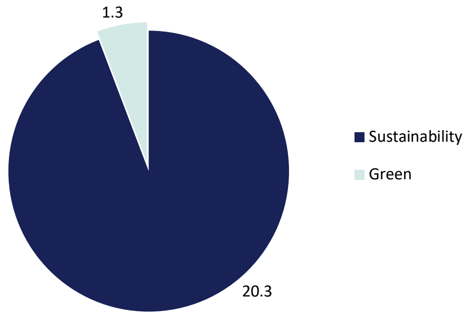
NRW going for long maturities

In terms of the maturity profile of the ESG bonds of German Laender, there is already quite a wide range of different maturities. Not surprisingly, NRW is setting the pace here, with the original maturities of the bonds issued ranging from seven years (issued in 2016; maturing in 2023) to 30 years (issued in 2022; maturing in 2052). However, the 10y maturity segment has dominated activities in this segment up to now, with Baden-Württemberg and Hesse also opting for this maturity segment.

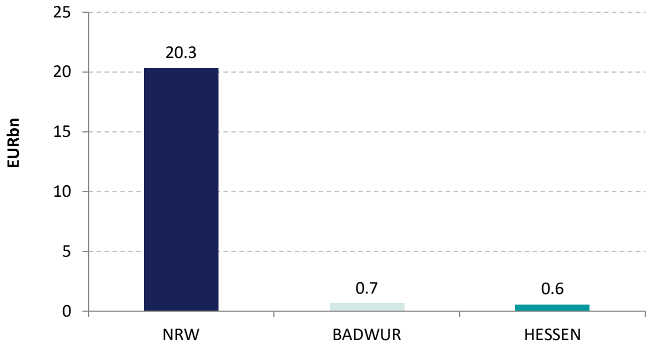
Data situation: as expected, sustainability ahead of green

Due to the early participation of North Rhine-Westphalia in the ESG market in the form of sustainability bonds, it is not surprising that this form of ESG bond boasts by far the largest volume to date (EUR 20.3bn). However, the three green bonds issued since 2021 (social bonds have not yet been issued) are probably just the beginning of the story here. The volume of EUR 1.3bn issued here so far represents only around 5.8% of the total volume. The lack of social bond issuance is perhaps misleading. Since NRW issues sustainability bonds, social aspects are also included in their use of proceeds.

Volume by ESG category (EUR bn)



ESG volume by Bundesland



Source: Bloomberg, NORD/LB Markets Strategy & Floor Research

Frameworks – differences and similarities

The issuers' frameworks are all in line with ICMA Principles. As already mentioned, the Laender BADWUR and HESSEN (to use their tickers) have issued green bonds and published corresponding green bond frameworks and had them assessed by a second party opinion. NRW did the same with a Sustainable Bond Framework. The content is therefore structured according to the four ICMA pillars, namely use of proceeds, project evaluation process, management of proceeds and annual reporting. While HESSEN and BADWUR have a corresponding focus on green finance, NRW can act more flexibly between social and environmental aspects with regard to the use of proceeds. This is also reflected in the project selection to date. Broken down into the categories of ICMA's Green Bond Principles, for example, the lion's share of Hesse's green bond proceeds went towards "clean transportation" (46%), followed by "environmentally sustainable management of living natural resources and land use" (29%). A similar distribution of the use of proceeds can also be seen in Baden-Württemberg, with the highest proportion (21.9%) attributable to the category "energy efficiency", followed by 17.5% to "environmentally sustainable management of living natural resources and land use". North Rhine-Westphalia, on the other hand, follows six categories of the Social Bond Principles and eight categories of the Green Bond Principles with its framework. Whereas pre-Covid mainly green aspects played a part in the use of proceeds, NRW has increasingly concentrated on social projects in its pandemic response. For example, 62% of the (most recent) sustainability bond No. 9 was used to finance the category "access to essential services". The total share of green categories in the last issue was nearly 17%.

Comment

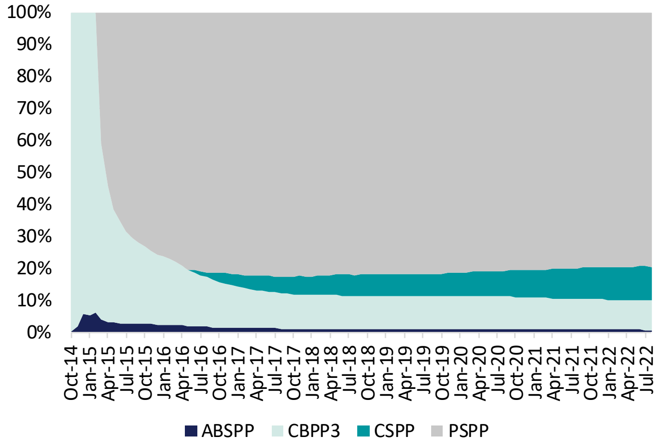
Despite the increasing volume in recent years, we see further significant growth potential in the ESG segments. This could turn from a niche product into an established market with many players. Critical to this is the ever-increasing need for financing, among other aspects due to amendments to the energy transition and climate protection laws of the individual Laender. ICMA provides solid guidelines containing core recommendations, while external audits also safeguard the use of proceeds. The fact that only three of the 16 German Laender have a framework alone underlines the inherent catch-up potential for the vast majority of the Laender.

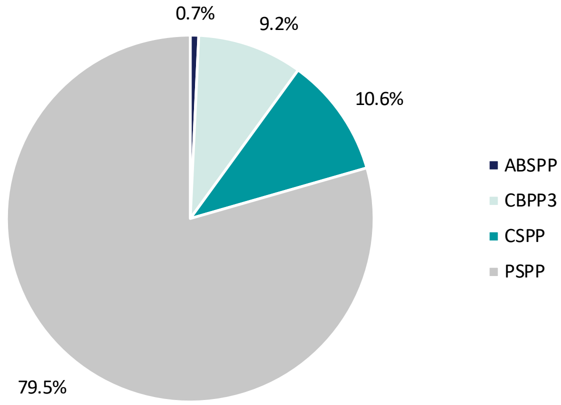
ECB tracker

Asset Purchase Programme (APP)

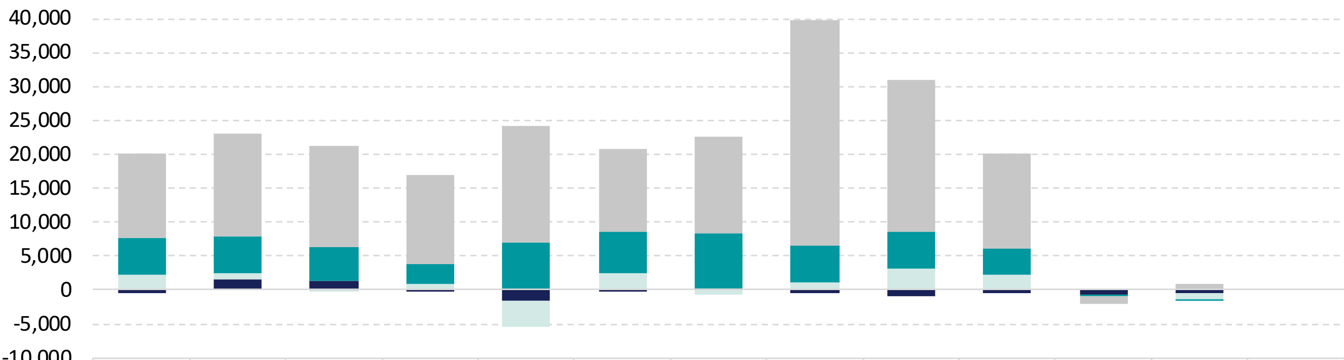
	ABSPP	CBPP3	CSPP	PSPP	APP
Jul-22	24,616	302,427	344,811	2,591,531	3,263,385
Aug-22	24,132	301,640	344,558	2,592,400	3,262,730
Δ	-484	-787	-253	+869	-655

Portfolio structure





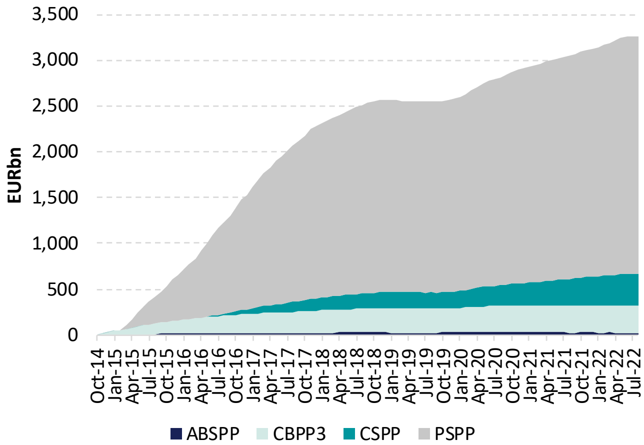
Monthly net purchases (in EURm)



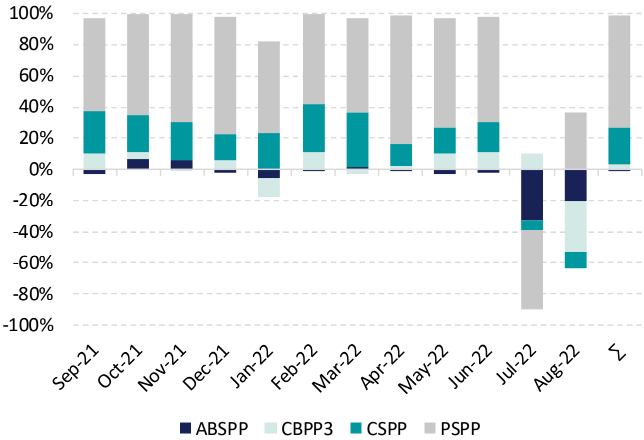
	Sep-21	Oct-21	Nov-21	Dec-21	Jan-22	Feb-22	Mar-22	Apr-22	May-22	Jun-22	Jul-22	Aug-22	∑
APP	19,659	23,017	21,200	16,596	18,838	20,698	21,929	39,397	30,232	19,722	-1,759	-655	228,874
PSPP	12,423	15,038	14,815	12,989	17,292	12,095	14,172	33,238	22,443	13,924	-1,114	869	168,184
CSPP	5,590	5,481	5,142	3,007	6,970	6,272	8,042	5,461	5,366	3,858	-141	-253	54,795
CBPP3	2,184	1,008	-12	942	-3,761	2,376	-606	1,074	3,247	2,339	217	-787	8,221
ABSPP	-538	1,490	1,255	-342	-1,663	-45	321	-376	-824	-399	-721	-484	-2,326

Source: ECB, NORD/LB Markets Strategy & Floor Research

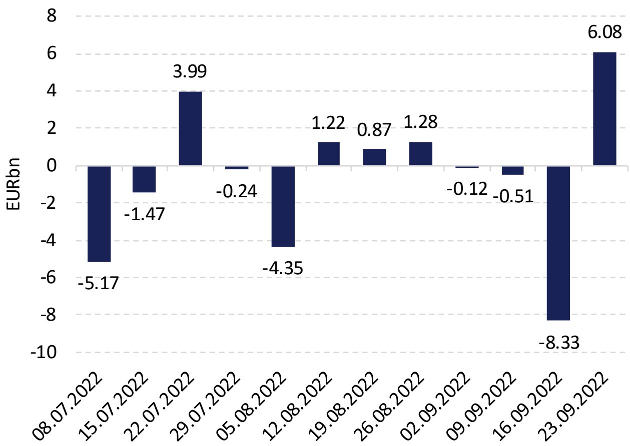
Portfolio development



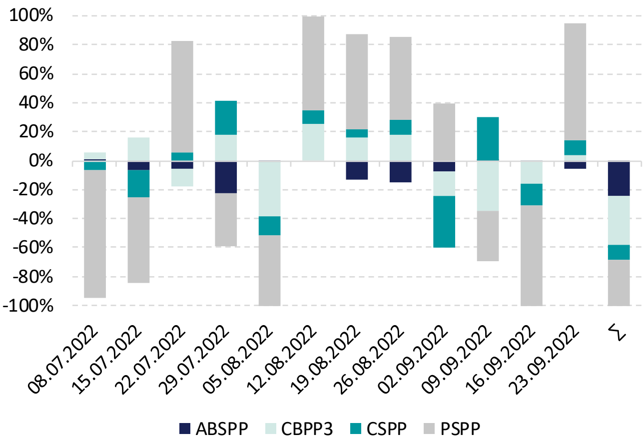
Distribution of monthly purchases



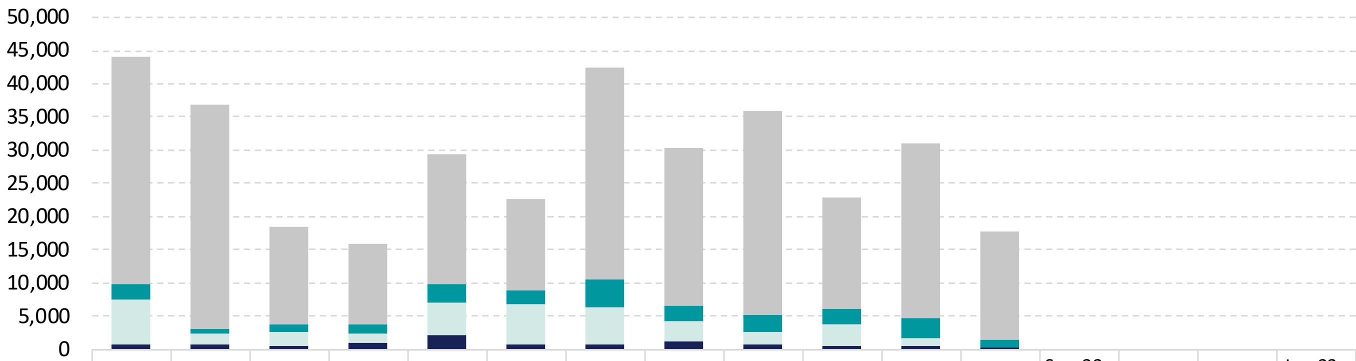
Weekly purchases



Distribution of weekly purchases



Expected monthly redemptions (in EURm)

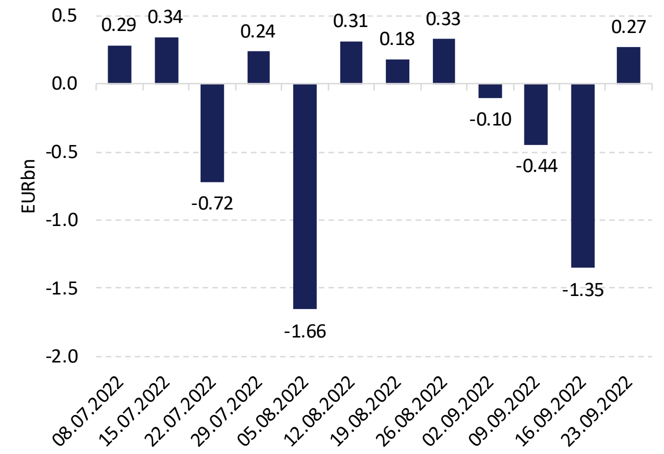


	Sep-22	Oct-22	Nov-22	Dec-22	Jan-23	Feb-23	Mar-23	Apr-23	May-23	Jun-23	Jul-23	Aug-23	Sep-22 - Aug-23	2021	2022	Jan-23 - Aug-23
APP	44,114	36,965	18,361	15,844	29,368	22,586	42,567	30,235	35,827	22,809	31,094	17,816	347,586	247,069	298,879	232,302
PSPP	34,354	33,927	14,669	12,016	19,469	13,657	32,033	23,663	30,552	16,619	26,378	16,445	273,782	188,494	228,585	178,816
CSPP	2,221	674	1,031	1,416	2,947	2,182	4,219	2,388	2,579	2,521	3,023	979	26,180	17,134	17,428	20,838
CBPP3	6,873	1,651	2,167	1,487	4,786	6,013	5,631	2,937	1,874	3,108	1,170	0	37,697	30,143	41,244	25,519
ABSPP	666	713	494	925	2,166	734	684	1,247	822	561	523	392	9,927	11,298	11,622	7,129

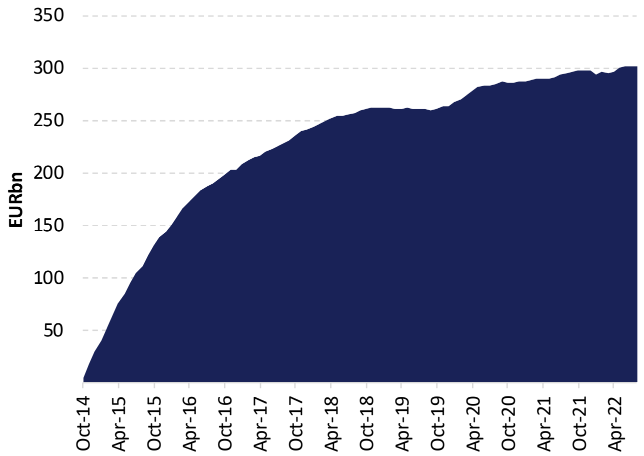
Source: ECB, Bloomberg, NORD/LB Markets Strategy & Floor Research

Covered Bond Purchase Programme 3 (CBPP3)

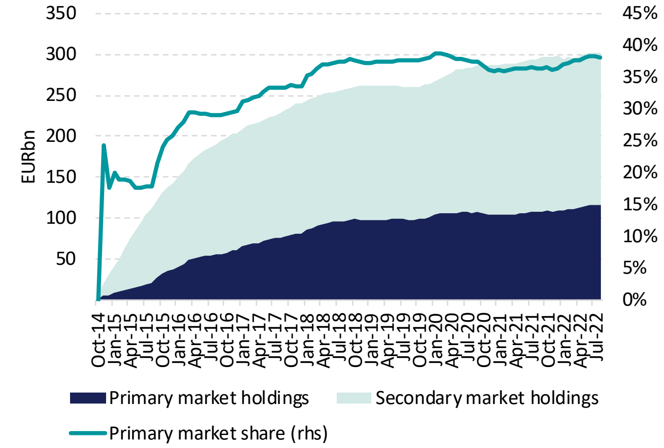
Weekly purchases



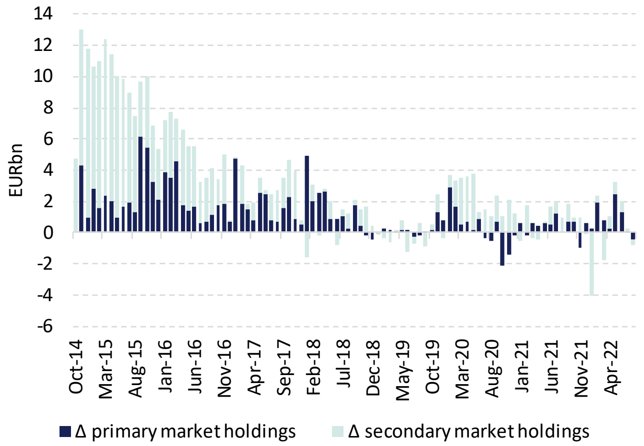
Development of CBPP3 volume



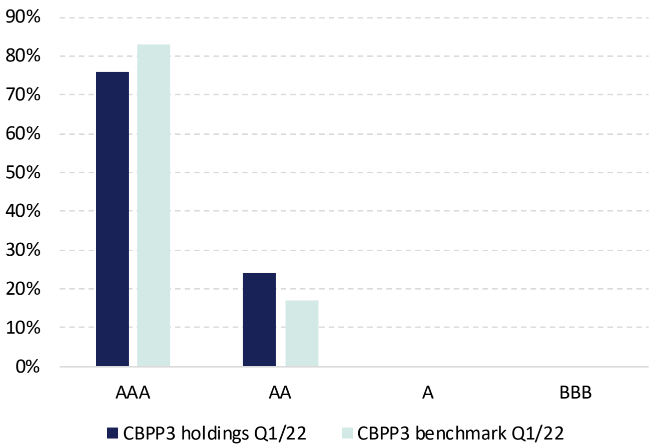
Primary and secondary market holdings



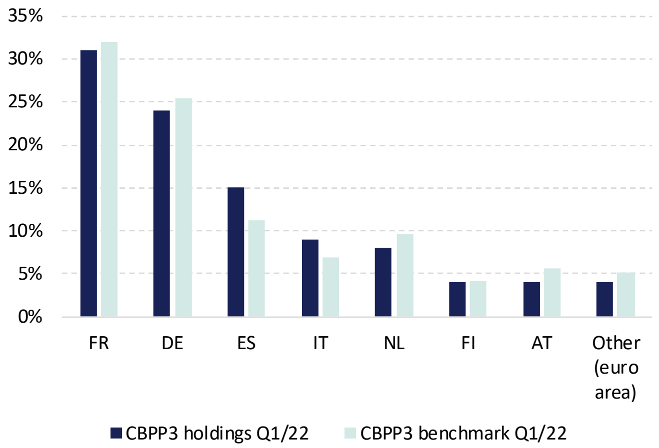
Change of primary and secondary market holdings



Distribution of CBPP3 by credit rating



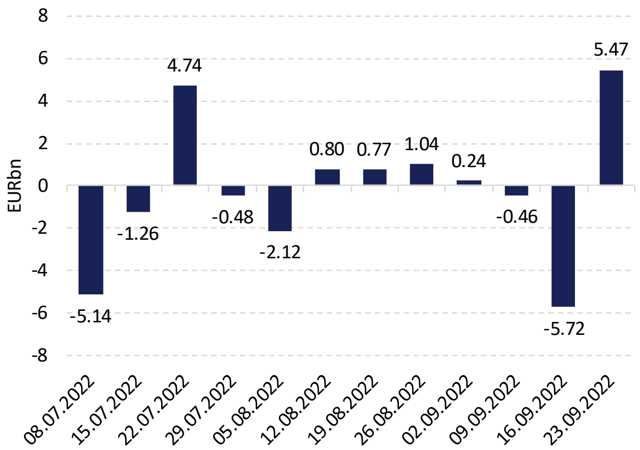
Distribution of CBPP3 by country of risk



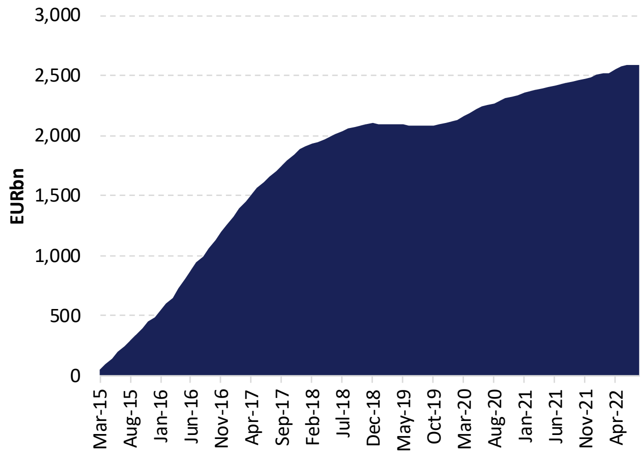
Source: ECB, Bloomberg, NORD/LB Markets Strategy & Floor Research

Public Sector Purchase Programme (PSPP)

Weekly purchases



Development of PSPP volume



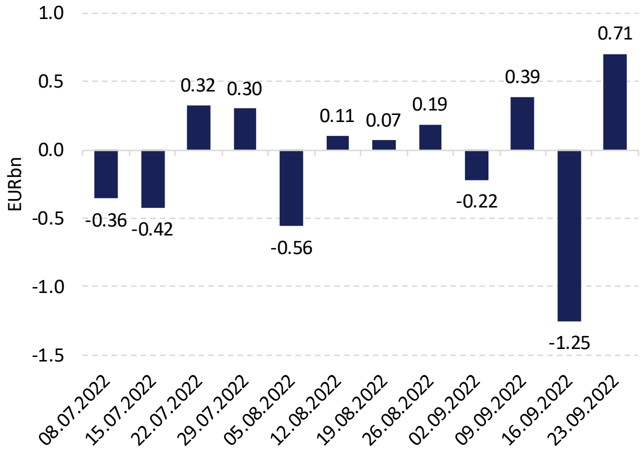
Overall distribution of PSPP buying at month-end

Jurisdiction	Adjusted distribution key[1]	Holdings (EURm)	Expected holdings (EURm)[2]	Difference (EURm)	Current WAM of portfolio[3] (in years)	WAM of eligible universe[4] (in years)	Difference (in years)
AT	2.7%	78,139	74,117	4,022	7.2	8.4	-1.2
BE	3.4%	95,598	92,256	3,342	7.2	10.3	-3.1
CY	0.2%	4,328	5,449	-1,121	8.8	9.2	-0.4
DE	24.3%	664,195	667,541	-3,346	6.6	8.0	-1.4
EE	0.3%	444	7,133	-6,689	7.8	7.8	0.0
ES	11.0%	316,826	301,962	14,864	7.8	8.2	-0.5
FI	1.7%	44,340	46,514	-2,174	8.0	9.4	-1.5
FR	18.8%	531,745	517,196	14,549	6.8	8.8	-2.0
GR	0.0%	0	0	0	0.0	0.0	0.0
IE	1.6%	42,964	42,881	83	8.2	8.6	-0.4
IT	15.7%	447,491	430,193	17,298	7.1	10.5	-3.4
LT	0.5%	5,967	14,656	-8,689	10.3	7.9	2.4
LU	0.3%	3,864	8,341	-4,477	5.7	10.3	-4.6
LV	0.4%	3,812	9,867	-6,055	9.1	7.8	1.2
MT	0.1%	1,411	2,656	-1,245	11.3	9.1	2.2
NL	5.4%	129,560	148,401	-18,841	7.8	9.7	-1.9
PT	2.2%	55,468	59,268	-3,800	7.3	9.7	-2.4
SI	0.4%	10,944	12,193	-1,249	9.5	7.6	1.9
SK	1.1%	18,332	29,000	-10,668	7.9	9.6	-1.7
SNAT	10.0%	288,595	274,403	14,192	7.9	8.5	-0.6
Total / Avg.	**100.0%**	**2,744,026**	**2,744,026**	**0**	**7.2**	**8.5**	**-1.3**

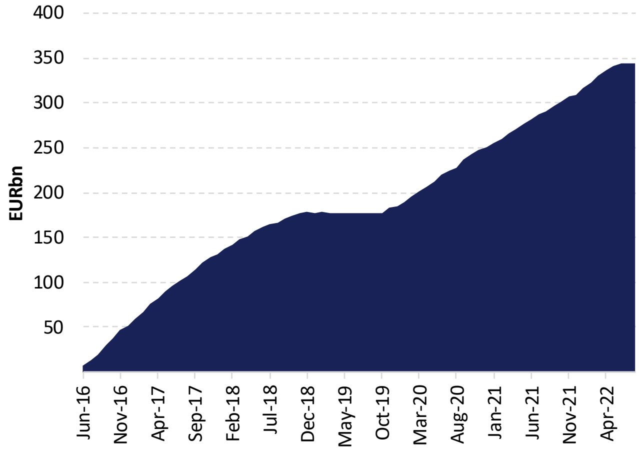
[1] Based on the ECB capital key, adjusted to include supras and the disqualification of Greece
[2] Based on the adjusted distribution key
[3] Weighted average time to maturity of PSPP portfolio holdings
[4] Weighted average time to maturity of the bonds eligible for purchasing under the PSPP
Source: ECB, NORD/LB Markets Strategy & Floor Research

Corporate Sector Purchase Programme (CSPP)

Weekly purchases

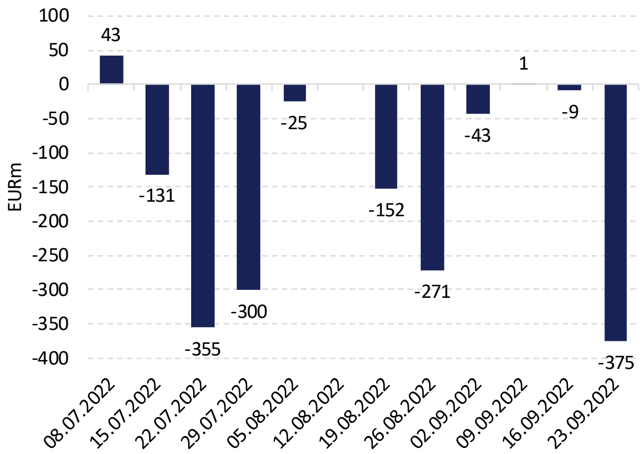


Development of CSPP volume

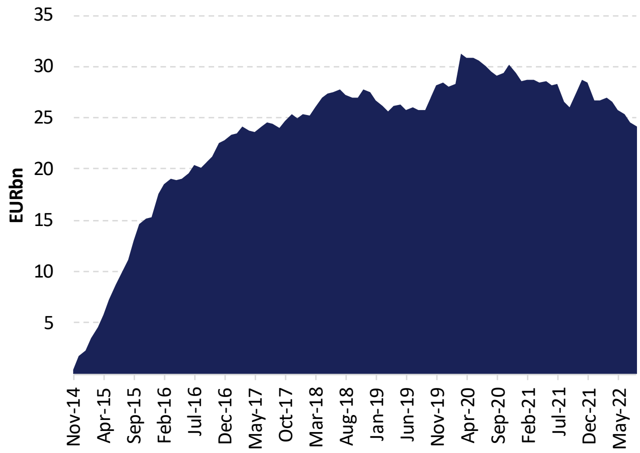


Asset-Backed Securities Purchase Programme (ABSPP)

Weekly purchases



Development of ABSPP volume



Source: ECB, Bloomberg, NORD/LB Markets Strategy & Floor Research

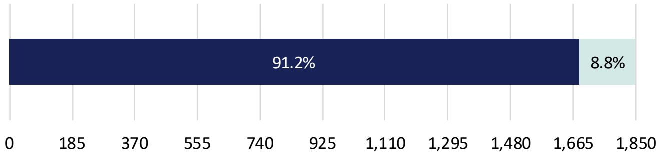
NORD/LB

Pandemic Emergency Purchase Programme (PEPP)

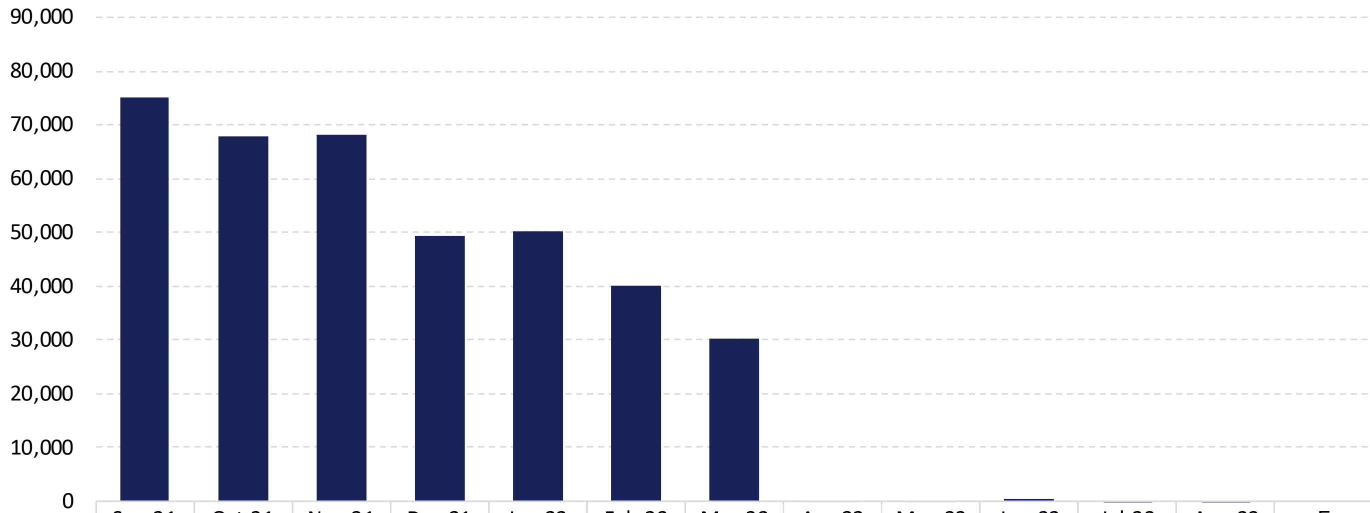
Holdings (in EURm)

	PEPP
Jul-22	1,717,352
Aug-22	1,714,539
Δ (net purchases)	-2,813

Invested share of PEPP envelope (in EURbn)

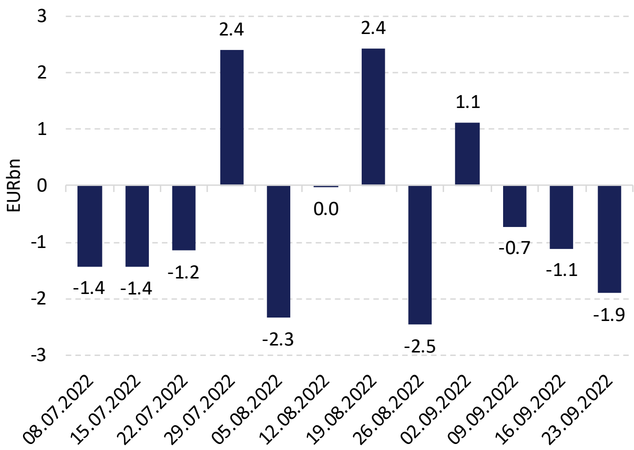


Monthly net purchases (in EURm)

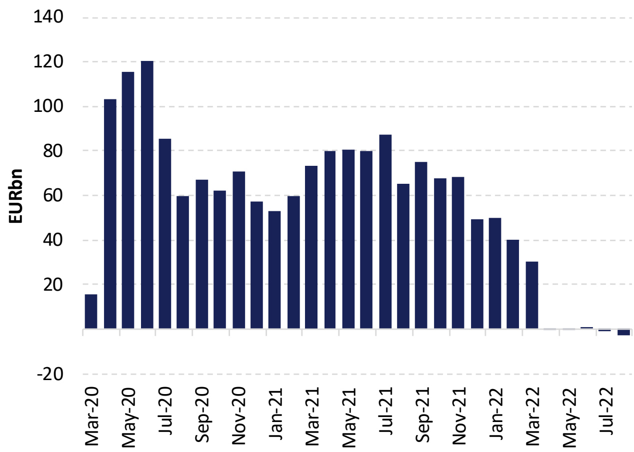


	Sep-21	Oct-21	Nov-21	Dec-21	Jan-22	Feb-22	Mar-22	Apr-22	May-22	Jun-22	Jul-22	Aug-22	∑
PEPP	75,051	67,855	68,045	49,375	50,113	40,184	30,214	-4	-10	12	-722	-2,813	377,300

Weekly purchases



Development of PEPP volume

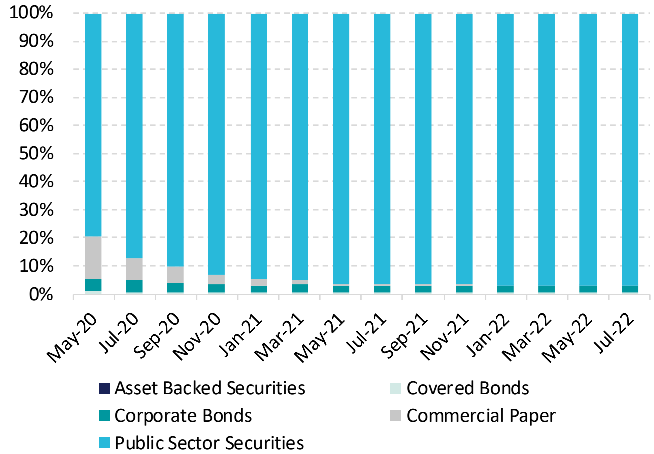


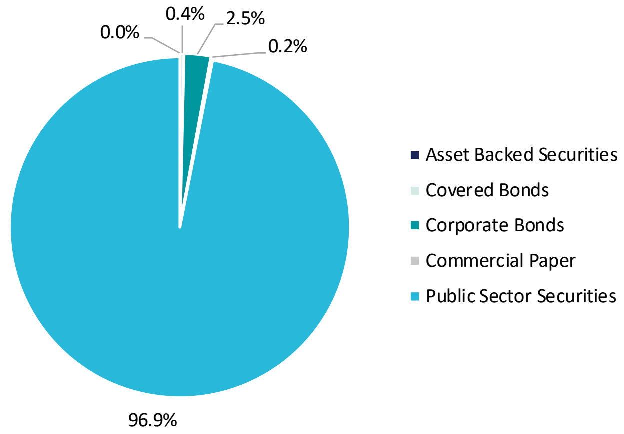
Source: ECB, Bloomberg, NORD/LB Markets Strategy & Floor Research

Holdings under the PEPP (in EURm)

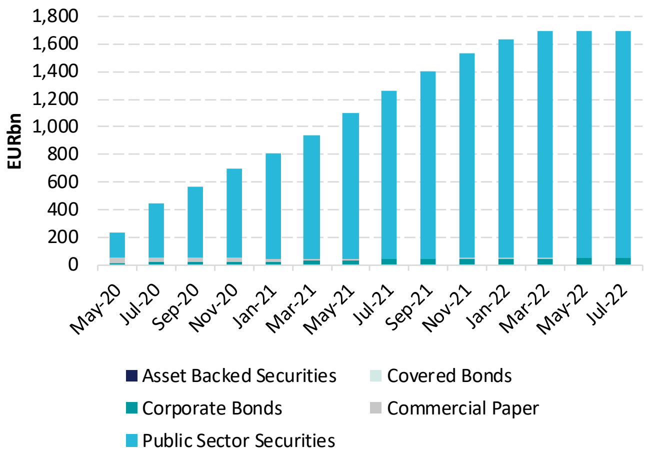
	Asset-backed Securities	Covered Bonds	Corporate Bonds	Commercial Paper	Public Sector Securities	PEPP
May-22	0	6,067	41,825	4,352	1,644,230	1,696,474
Jul-22	0	6,062	42,814	3,322	1,639,774	1,691,971
Δ (net purchases)	0	0	+1,025	-1,029	-705	-709

Portfolio structure

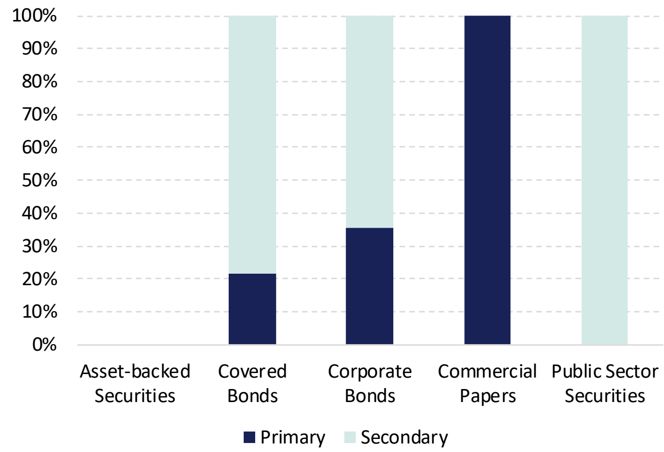




Portfolio development



Share of primary and secondary market holdings



Breakdown of private sector securities under the PEPP

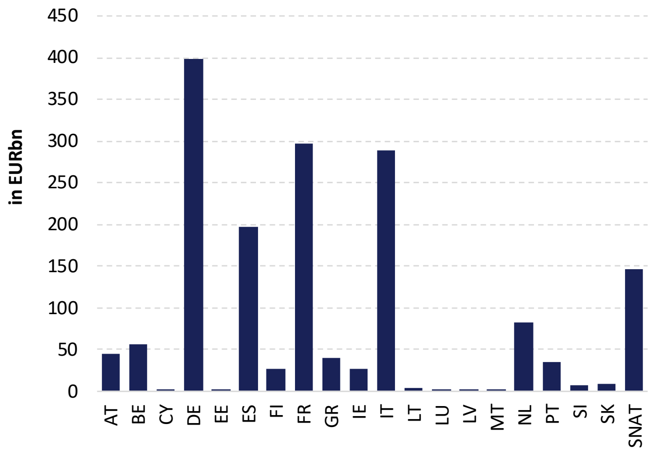
Jul-22	Asset-backed securities		Covered bonds		Corporate bonds		Commercial paper	
	Primary	Secondary	Primary	Secondary	Primary	Secondary	Primary	Secondary
Holdings in EURm	0	0	1,298	4,764	15,262	27,552	3,322	0
Share	0.0%	0.0%	21.4%	78.6%	35.7%	64.4%	100.0%	0.0%

Source: ECB, Bloomberg, NORD/LB Markets Strategy & Floor Research

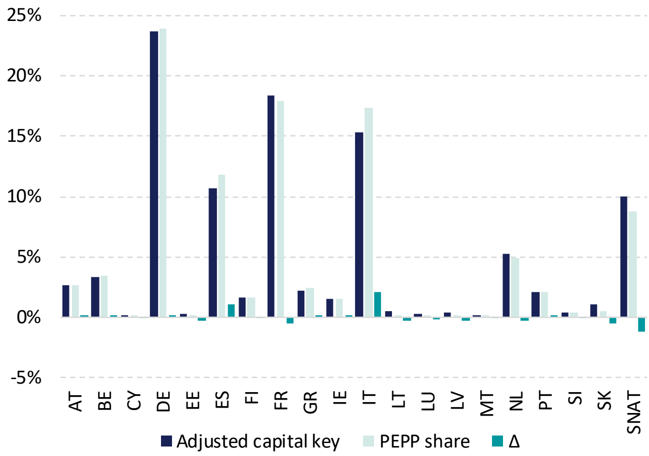
Breakdown of public sector securities under the PEPP

Jurisdiction	Holdings (in EURm)	Adj. distribution key[1]	PEPP share	Deviations from the adj. distribution key[2]	Current WAM[3] (in years)	WAM of eligible universe[4] (in years)	Difference (in years)
AT	44,424	2.6%	2.7%	0.0%	7.7	7.3	0.3
BE	57,057	3.3%	3.4%	0.1%	6.4	9.6	-3.2
CY	2,464	0.2%	0.1%	0.0%	8.9	8.2	0.7
DE	398,212	23.7%	23.9%	0.2%	6.6	7.0	-0.3
EE	256	0.3%	0.0%	-0.2%	7.9	6.5	1.4
ES	196,377	10.7%	11.8%	1.1%	7.5	7.4	0.1
FI	27,454	1.7%	1.6%	0.0%	7.1	8.2	-1.2
FR	297,766	18.4%	17.9%	-0.5%	8.0	7.8	0.2
GR	39,765	2.2%	2.4%	0.2%	8.4	9.4	-1.0
IE	26,004	1.5%	1.6%	0.0%	8.8	9.7	-0.8
IT	289,065	15.3%	17.4%	2.1%	7.1	7.0	0.1
LT	3,235	0.5%	0.2%	-0.3%	9.9	9.6	0.4
LU	1,865	0.3%	0.1%	-0.2%	6.2	7.0	-0.8
LV	1,890	0.4%	0.1%	-0.2%	8.4	8.3	0.1
MT	603	0.1%	0.0%	-0.1%	10.9	9.0	2.0
NL	82,741	5.3%	5.0%	-0.3%	7.9	8.7	-0.7
PT	35,315	2.1%	2.1%	0.0%	6.6	7.0	-0.4
SI	6,542	0.4%	0.4%	0.0%	9.0	9.2	-0.2
SK	7,966	1.0%	0.5%	-0.6%	8.6	8.1	0.5
SNAT	145,953	10.0%	8.8%	-1.2%	10.5	8.7	1.8
Total / Avg.	**1,664,955**	**100.0%**	**100.0%**	**0.0%**	**7.6**	**7.6**	**0.0**

Distribution of public sector assets by jurisdiction



Deviations from the adjusted distribution key



[1] Based on the ECB capital key, adjusted to include supras [2] Based on the adjusted distribution key
[3] Current WAM of public sector securities holdings under the PEPP [4] WAM of eligible universe of public sector securities holdings under the PEPP
Source: ECB, Bloomberg, NORD/LB Markets Strategy & Floor Research

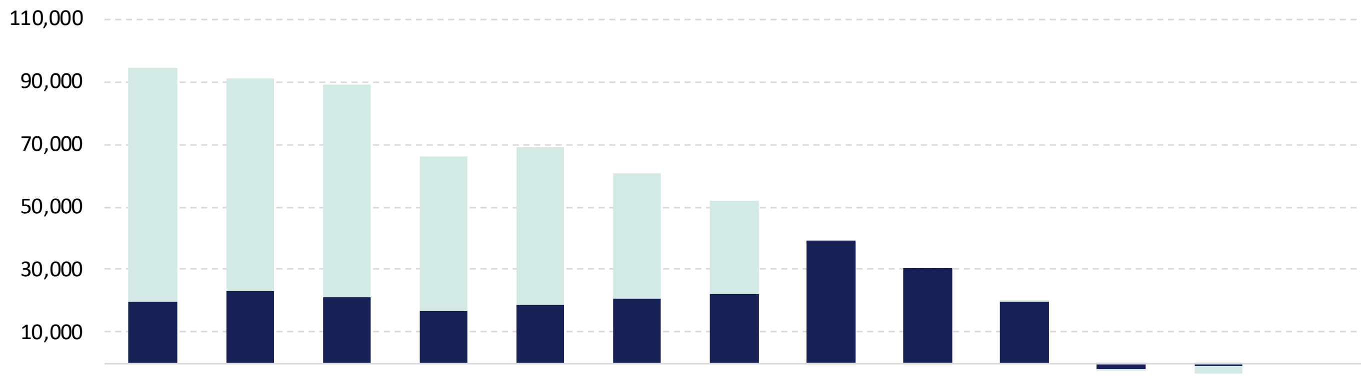
NORD/LB

Aggregated purchase activity under APP and PEPP

Holdings (in EURm)

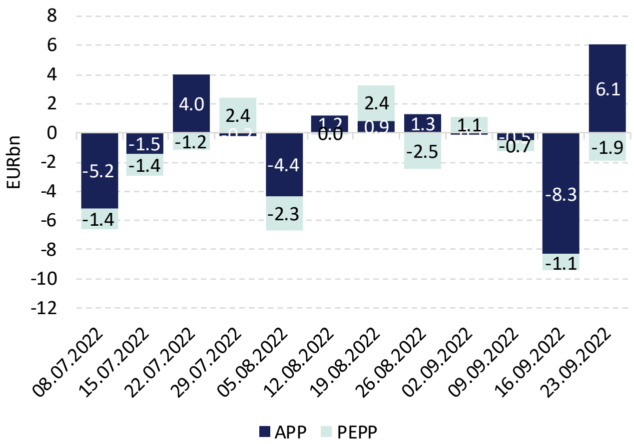
	APP	PEPP	APP & PEPP
Jul-22	3,263,385	1,717,352	4,980,737
Aug-22	3,262,730	1,714,539	4,977,269
Δ	-655	-2,813	-3,468

Monthly net purchases (in EURm)

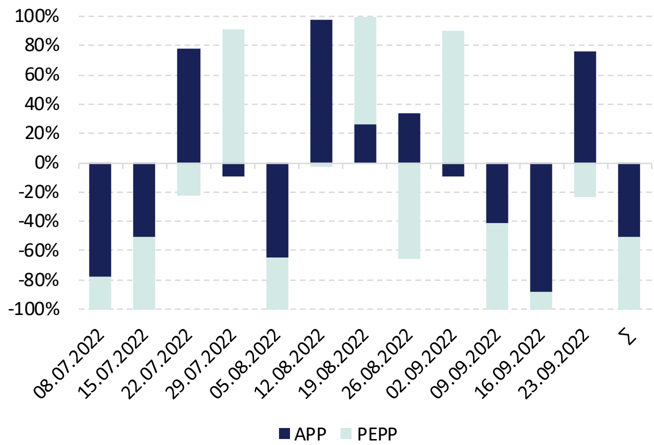


	Sep-21	Oct-21	Nov-21	Dec-21	Jan-22	Feb-22	Mar-22	Apr-22	May-22	Jun-22	Jul-22	Aug-22	∑
∑	94,710	90,872	89,245	65,971	68,951	60,882	52,143	39,393	30,222	19,734	-2,481	-3,468	606,174
PEPP	75,051	67,855	68,045	49,375	50,113	40,184	30,214	-4	-10	12	-722	-2,813	377,300
APP	19,659	23,017	21,200	16,596	18,838	20,698	21,929	39,397	30,232	19,722	-1,759	-655	228,874

Weekly purchases



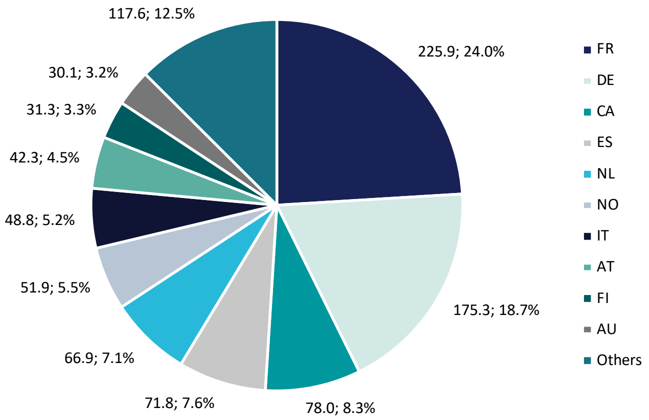
Distribution of weekly purchases



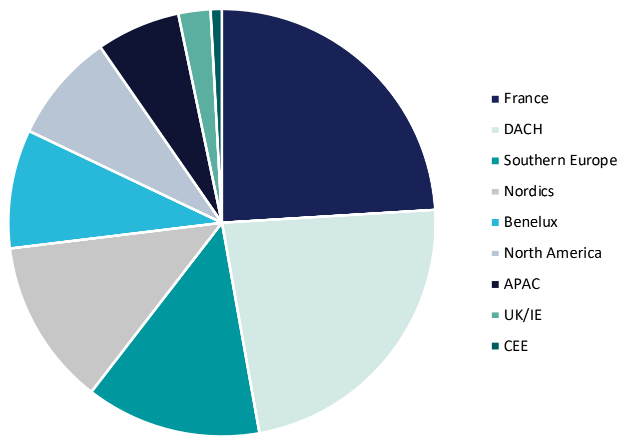
Source: ECB, Bloomberg, NORD/LB Markets Strategy & Floor Research

Charts & Figures
Covered Bonds

EUR benchmark volume by country (in EURbn)



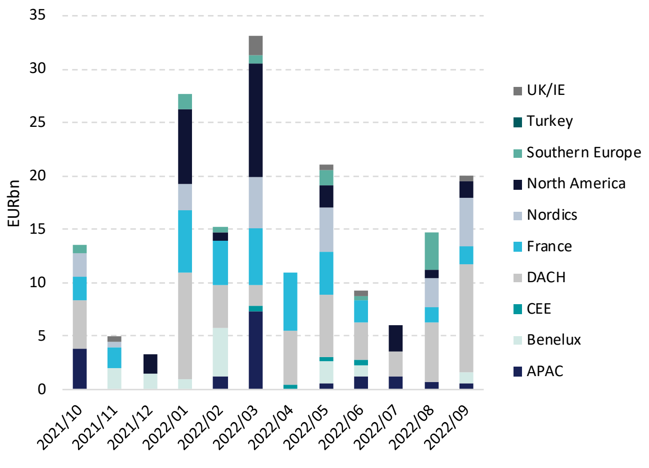
EUR benchmark volume by region (in EURbn)



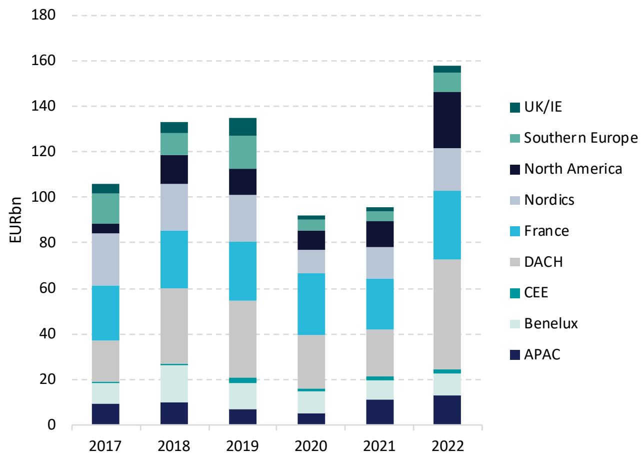
Top-10 jurisdictions

Rank	Country	Amount outst. (EURbn)	No. of BMKs	There of ESG BMKs	Avg. issue size (EURbn)	Avg. initial maturity (in years)	Avg. mod. Duration (in years)	Avg. coupon (in %)
1	FR	225.9	219	14	0.94	10.0	5.4	0.86
2	DE	175.3	251	25	0.64	8.4	4.5	0.58
3	CA	78.0	60	0	1.26	5.8	3.1	0.37
4	ES	71.8	57	5	1.15	11.7	3.7	1.74
5	NL	66.9	69	1	0.91	11.4	7.3	0.78
6	NO	51.9	61	10	0.85	7.3	3.9	0.51
7	IT	48.8	59	2	0.79	9.2	3.9	1.28
8	AT	42.3	75	3	0.56	9.2	5.9	0.77
9	FI	31.3	33	2	0.95	7.6	3.7	0.51
10	AU	30.1	31	0	0.97	8.1	4.0	0.91

EUR benchmark issue volume by month



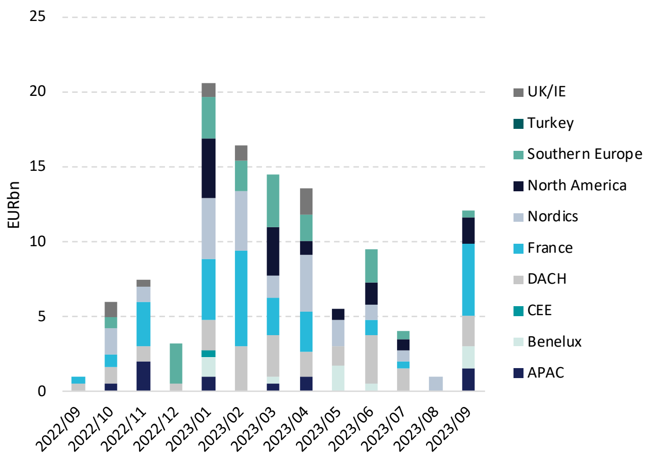
EUR benchmark issue volume by year



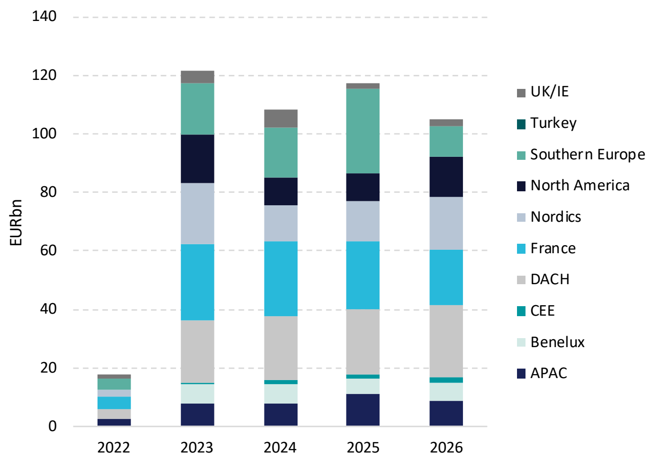
Source: Market data, Bloomberg, NORD/LB Markets Strategy & Floor Research

NORD/LB

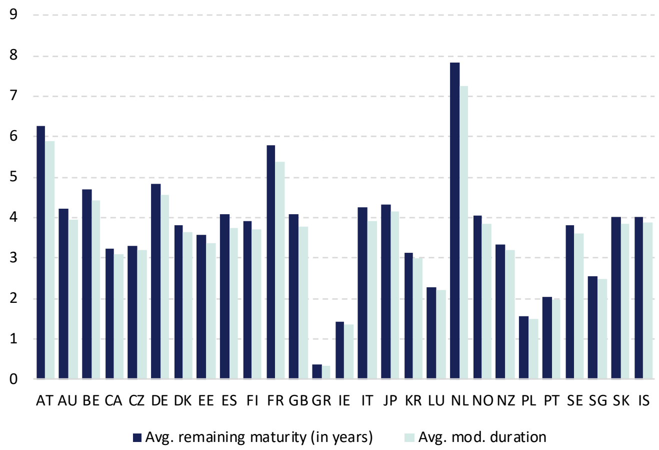
EUR benchmark maturities by month



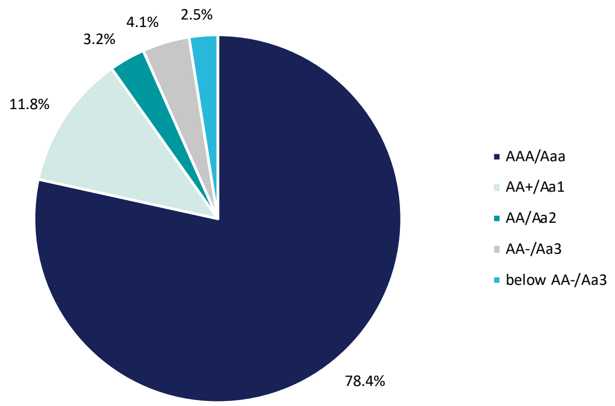
EUR benchmark maturities by year



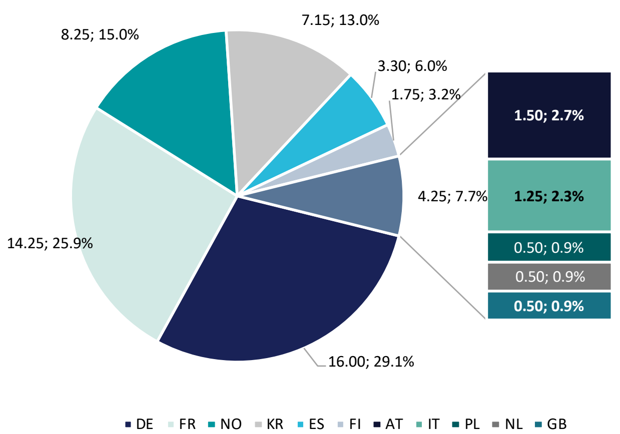
Modified duration and time to maturity by country



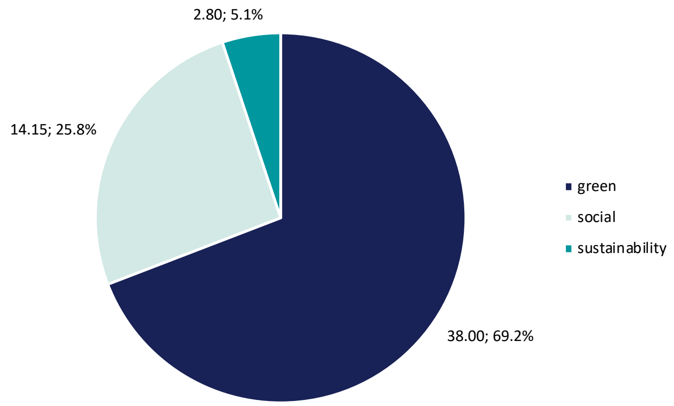
Rating distribution (volume weighted)



EUR benchmark volume (ESG) by country (in EURbn)

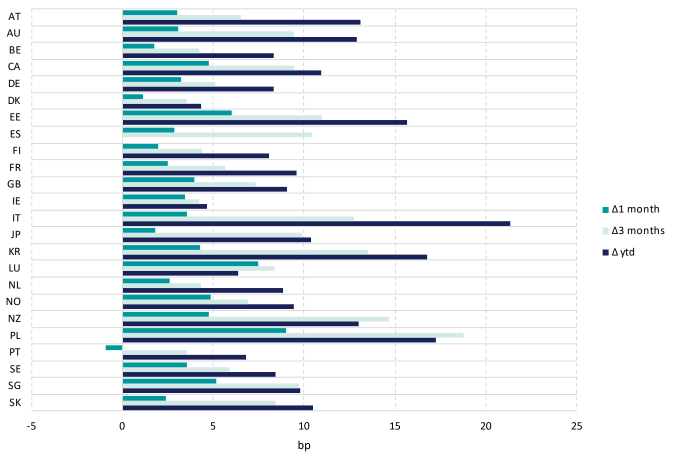


EUR benchmark volume (ESG) by type (in EURbn)

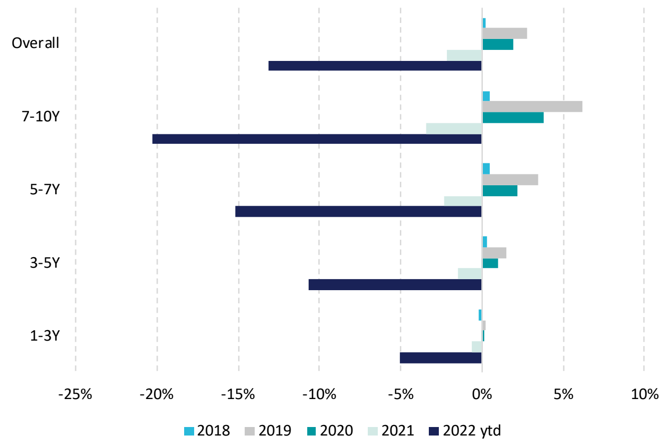


Source: Market data, Bloomberg, NORD/LB Markets Strategy & Floor Research

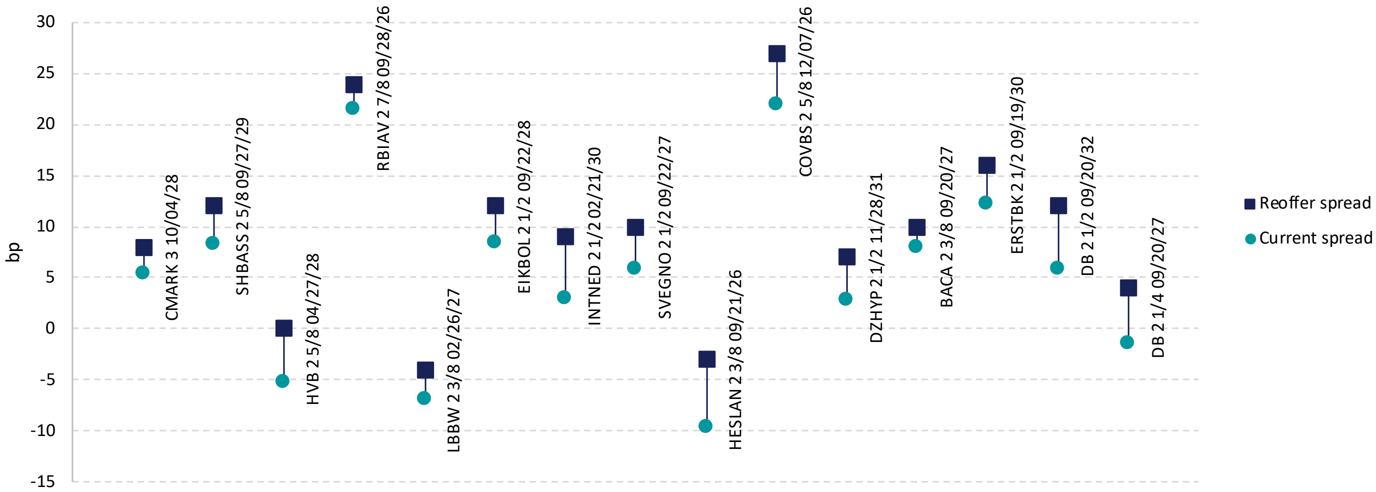
Spread development by country



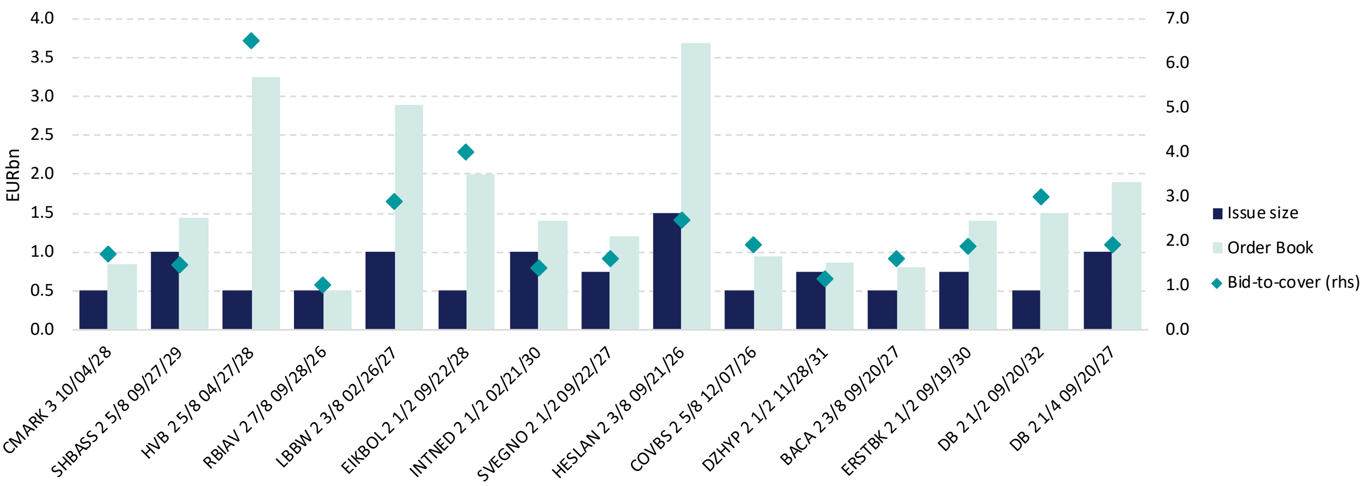
Covered bond performance (Total return)



Spread development (last 15 issues)



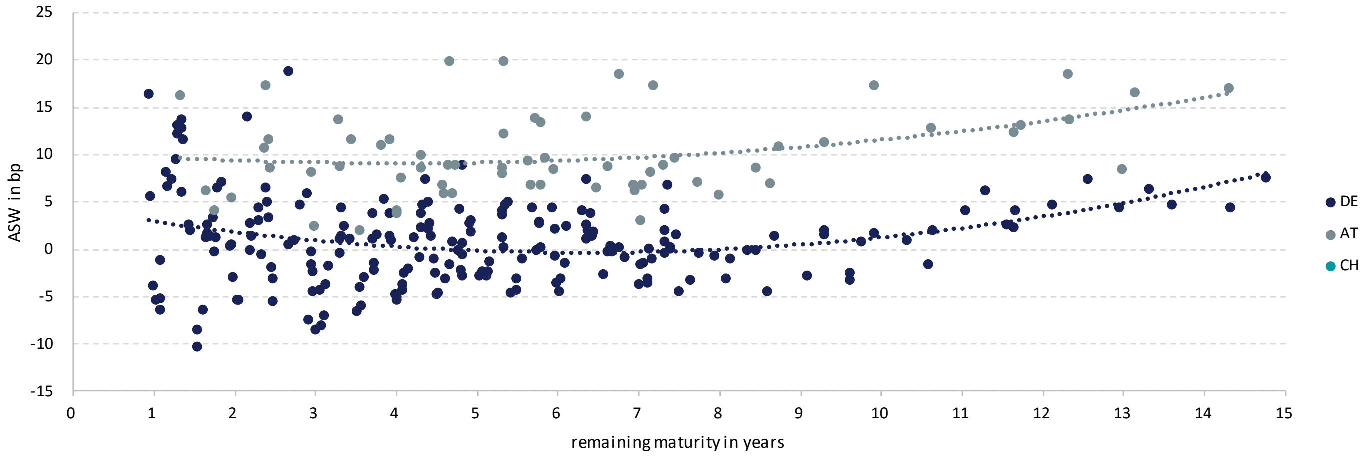
Order books (last 15 issues)



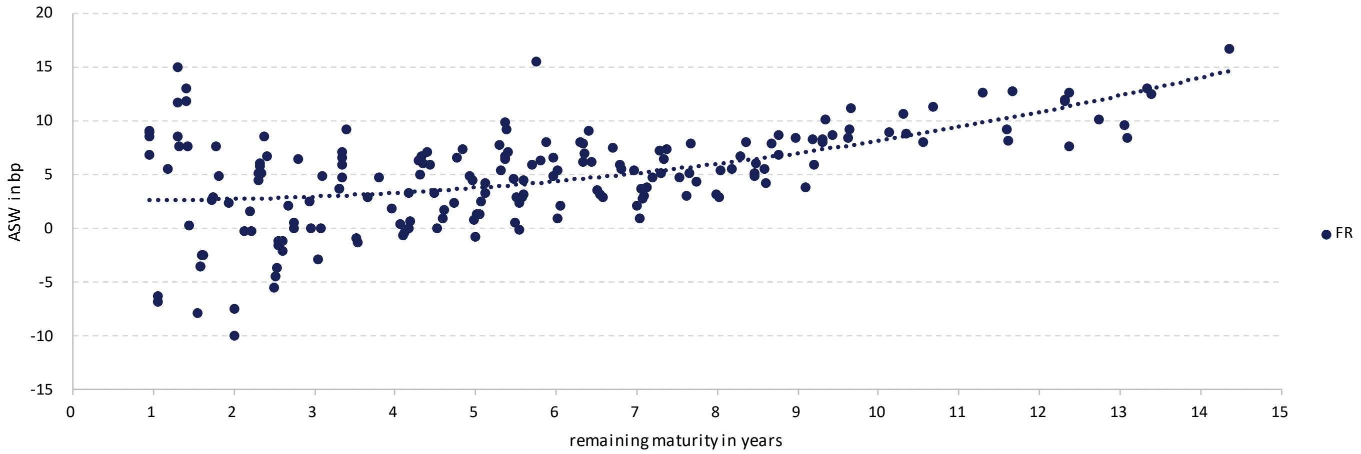
Source: Market data, Bloomberg, NORD/LB Markets Strategy & Floor Research

Spread overview[1]

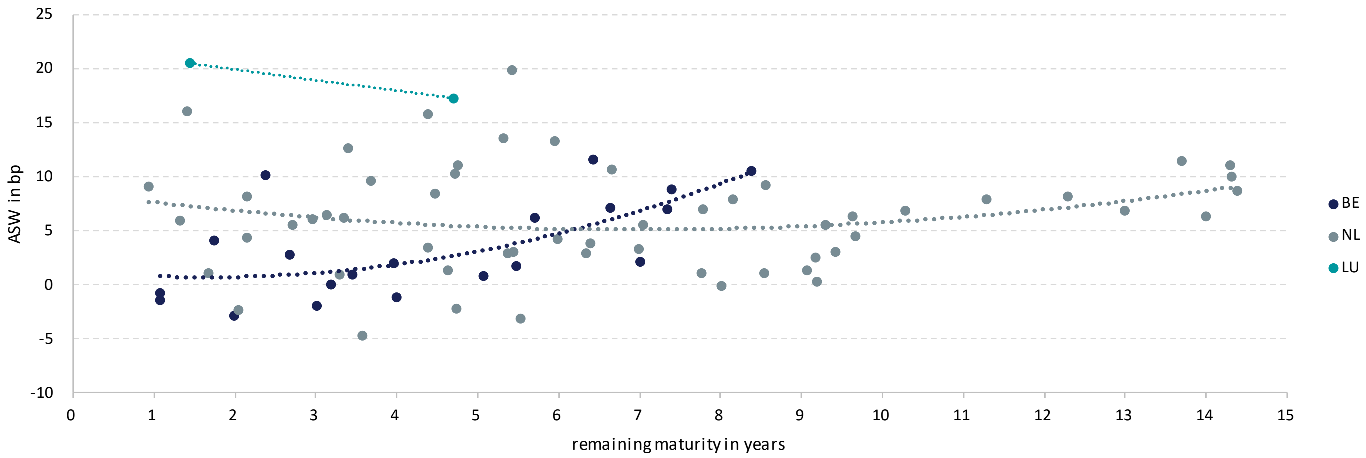
DACH



France



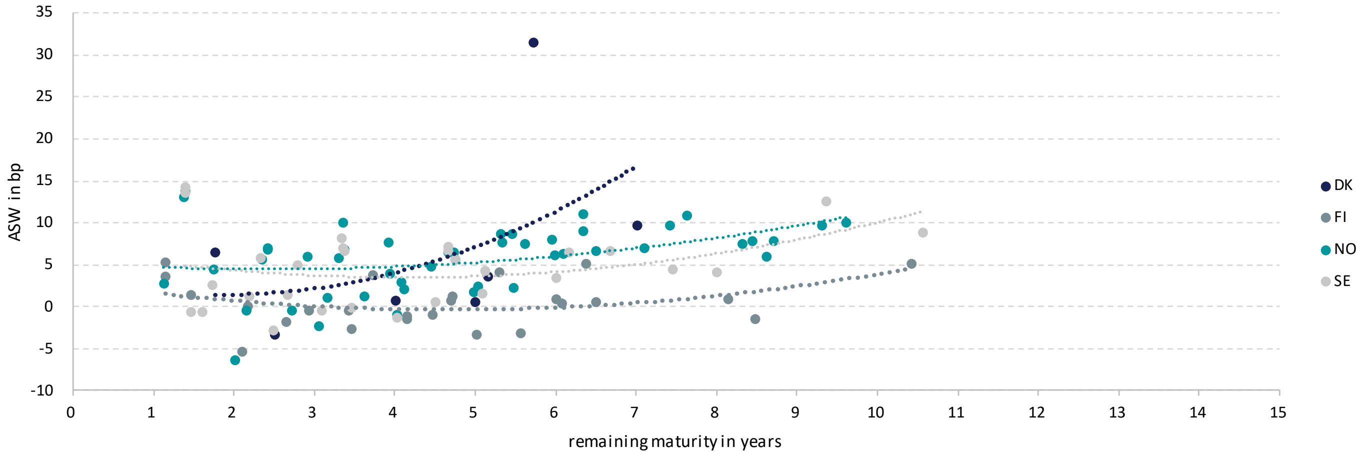
Benelux



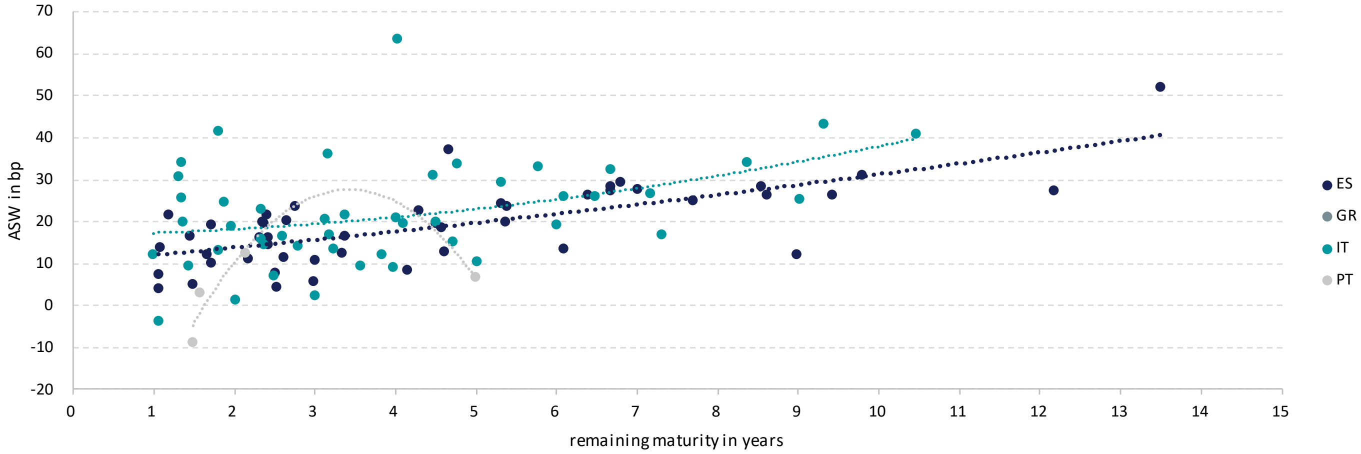
Source: Market data, Bloomberg, NORD/LB Markets Strategy & Floor Research [1]Time to maturity 1 ≤ y ≤ 15

NORD/LB

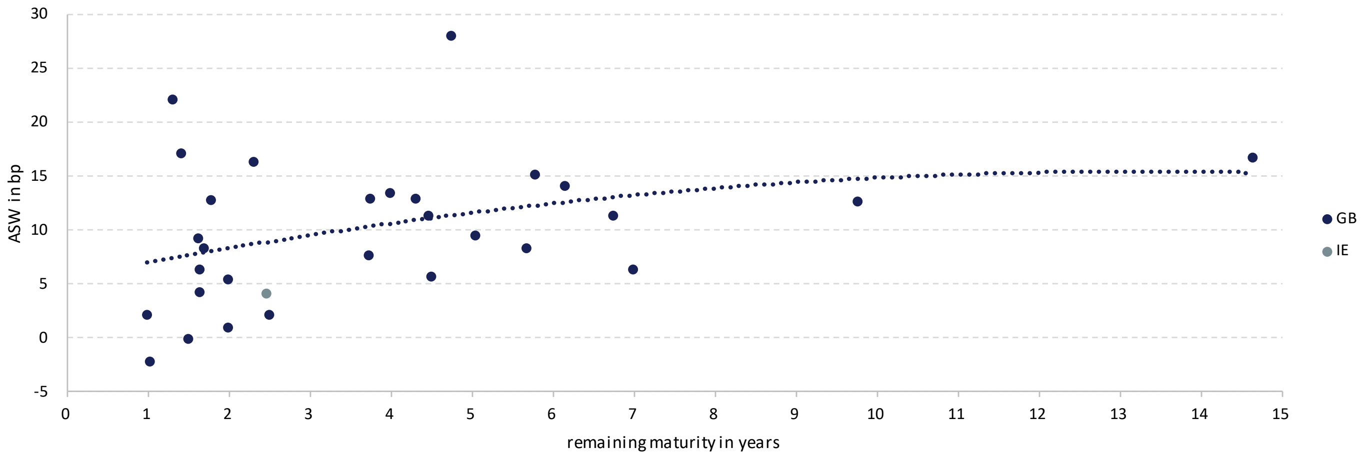
Nordics



Southern Europe

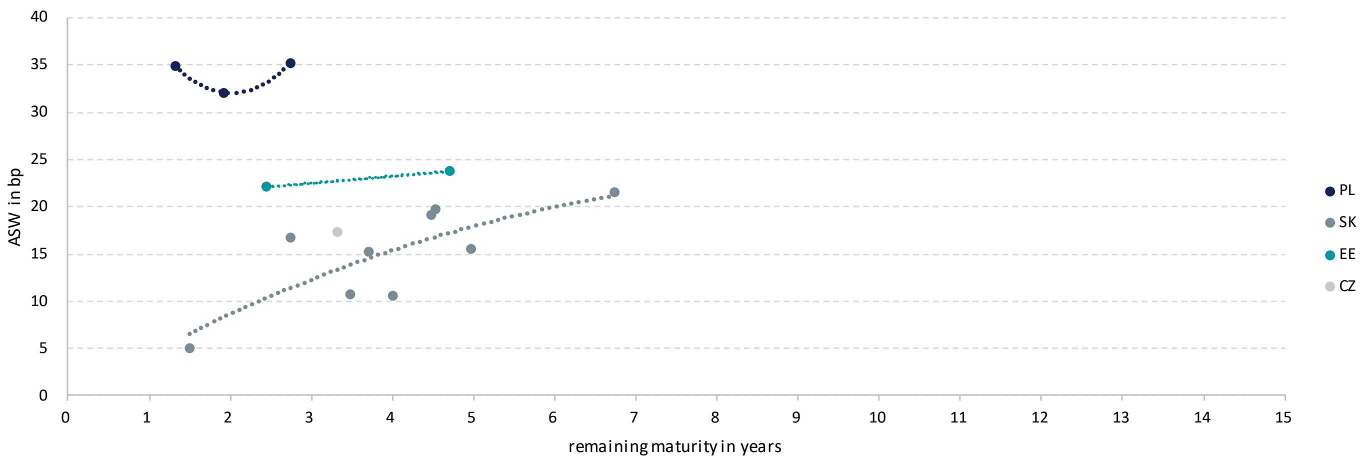


UK/IE

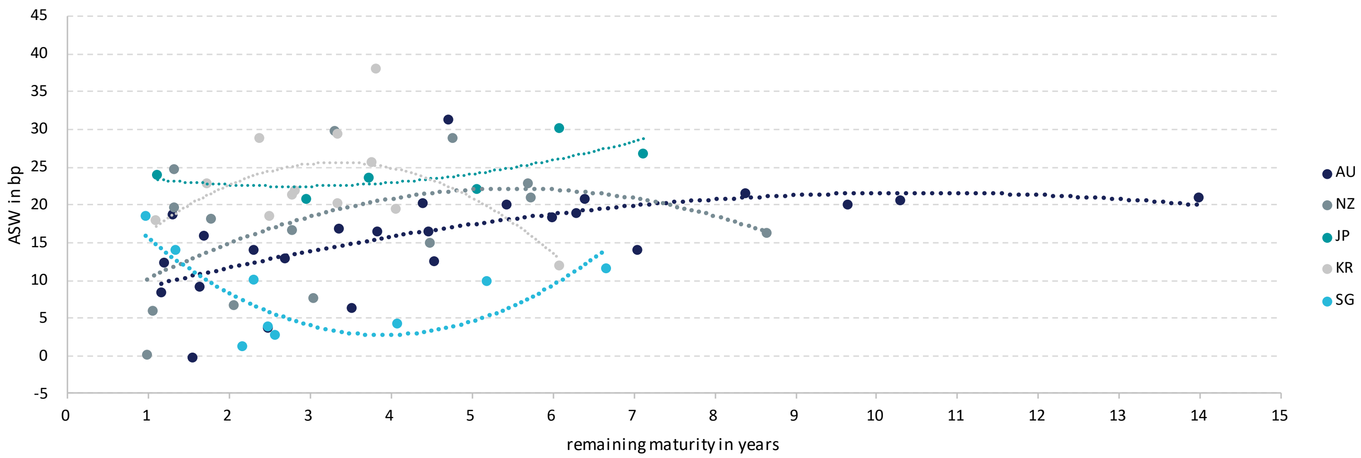


Source: Market data, Bloomberg, NORD/LB Markets Strategy & Floor Research

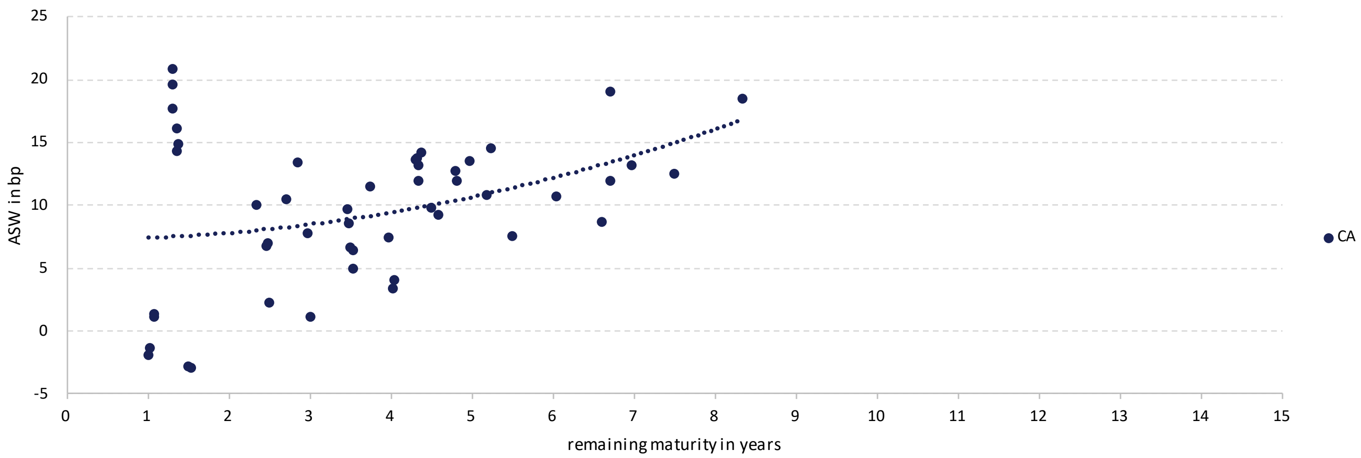
CEE



APAC



North America

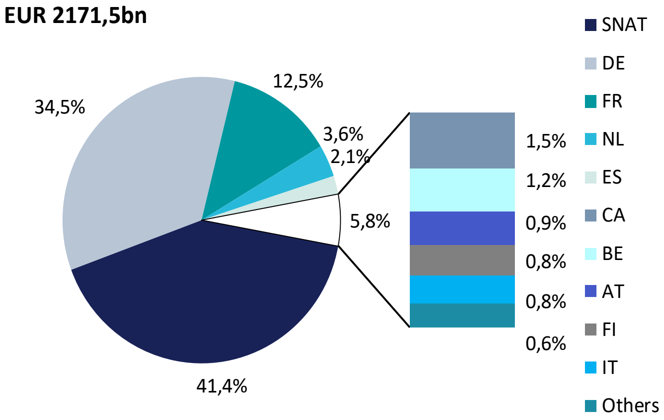


Source: Market data, Bloomberg, NORD/LB Markets Strategy & Floor Research

NORD/LB

Charts & Figures
SSA/Public Issuers

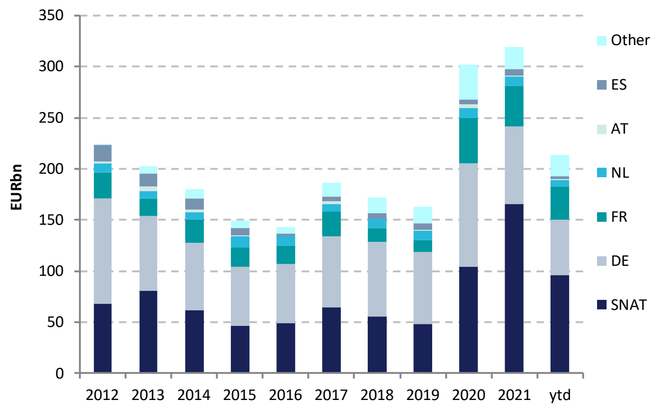
Outstanding volume (bmk)



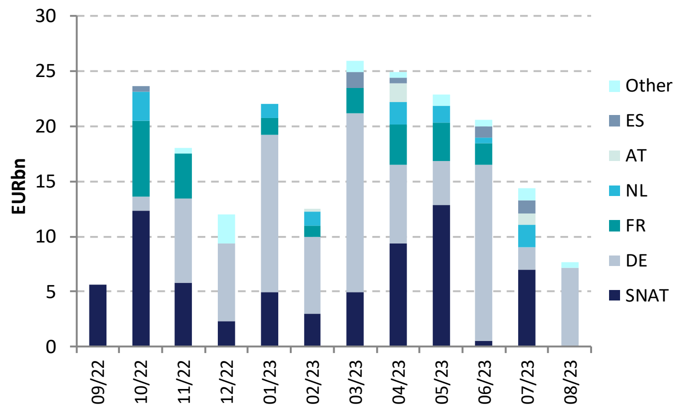
Top 10 countries (bmk)

Country	Vol. (€bn)	No. of bonds	ØVol. (€bn)	Vol. weight. ØMod. Dur.
SNAT	900,0	219	4,1	8,1
DE	749,0	561	1,3	6,4
FR	272,1	183	1,5	6,3
NL	78,6	68	1,2	6,4
ES	45,1	59	0,8	4,8
CA	32,6	23	1,4	4,8
BE	25,5	29	0,9	12,1
AT	19,8	23	0,9	4,7
FI	18,2	22	0,8	5,7
IT	16,8	20	0,8	5,0

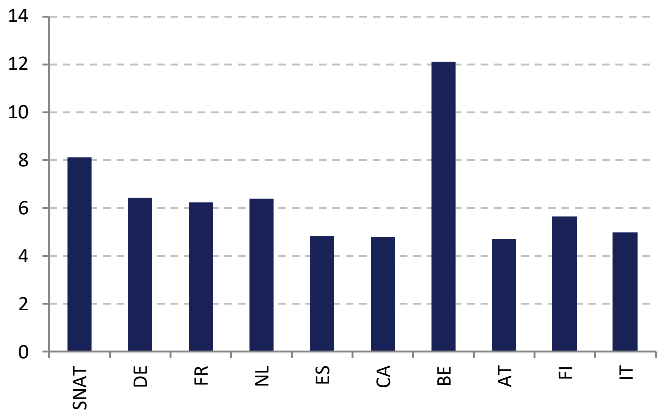
Issue volume by year (bmk)



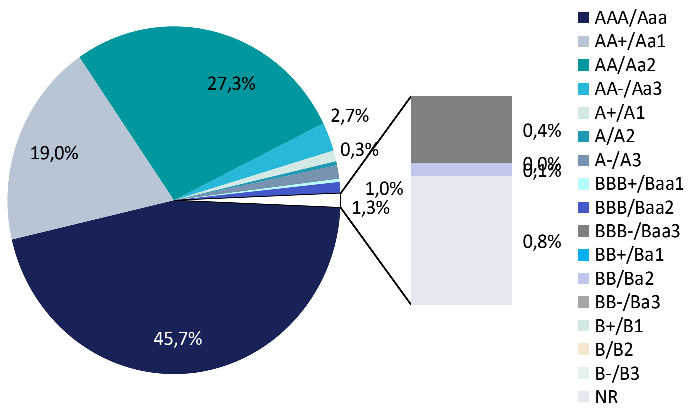
Maturities next 12 months (bmk)



Avg. mod. duration by country (vol. weighted)

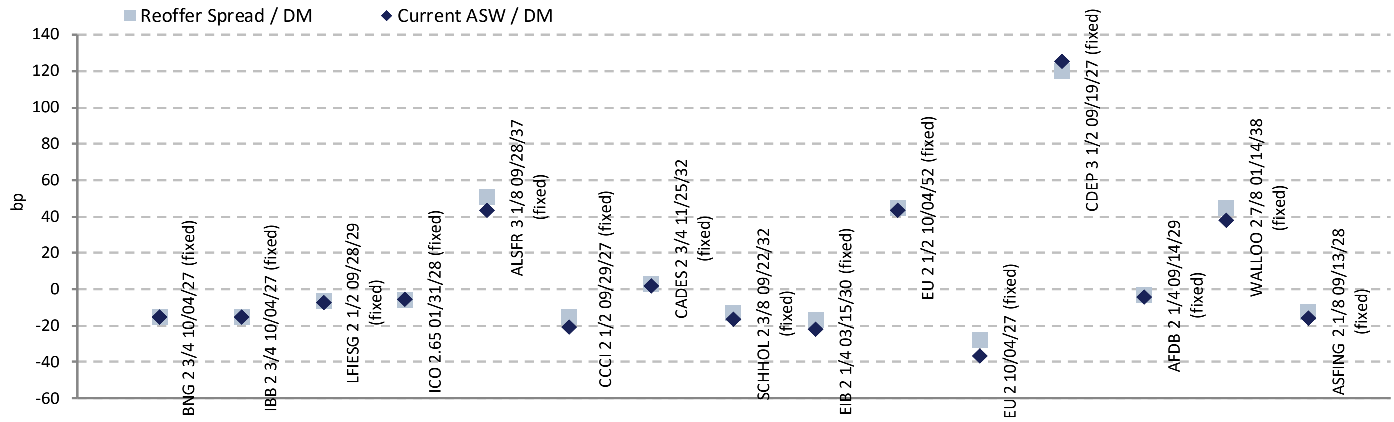


Rating distribution (vol. weighted)

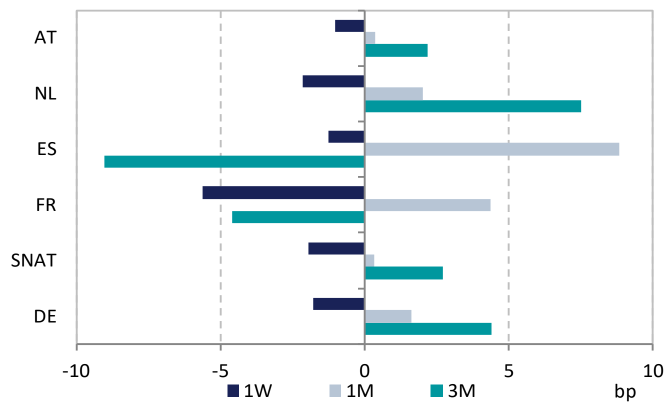


Source: Bloomberg, NORD/LB Markets Strategy & Floor Research

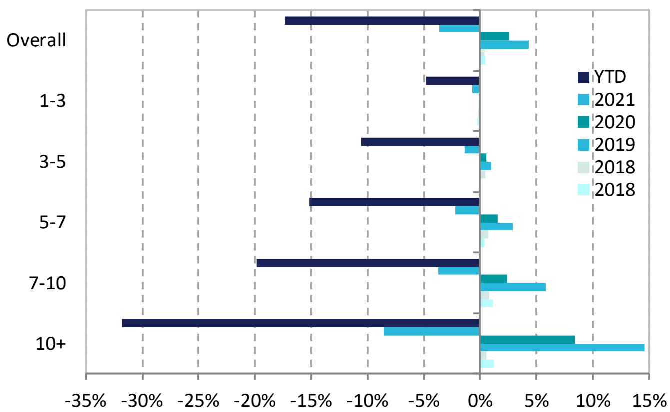
Spread development (last 15 issues)



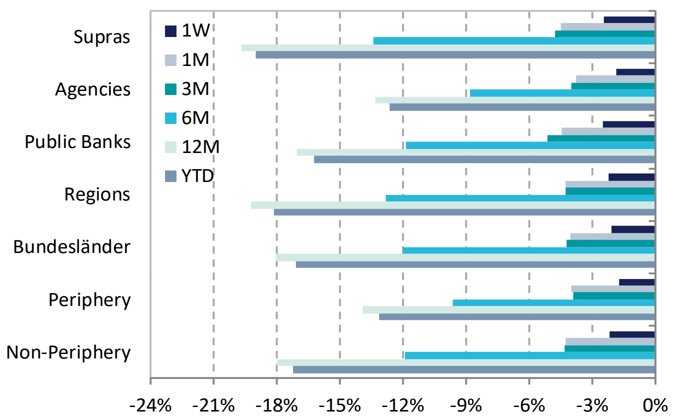
Spread development by country



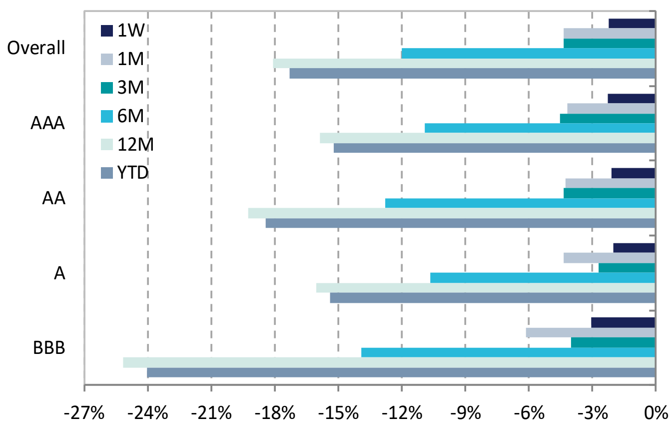
Performance (total return)



Performance (total return) by segments

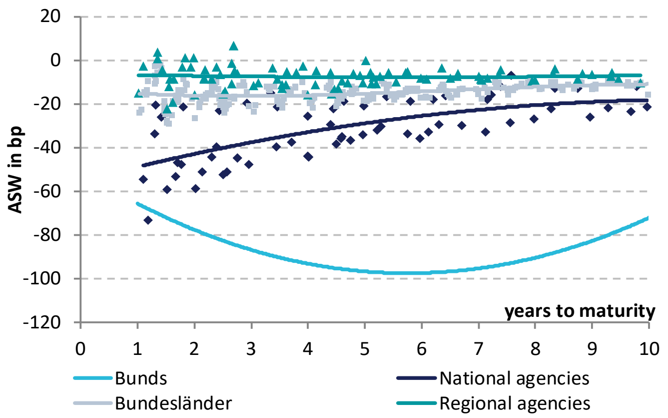


Performance (total return) by rating

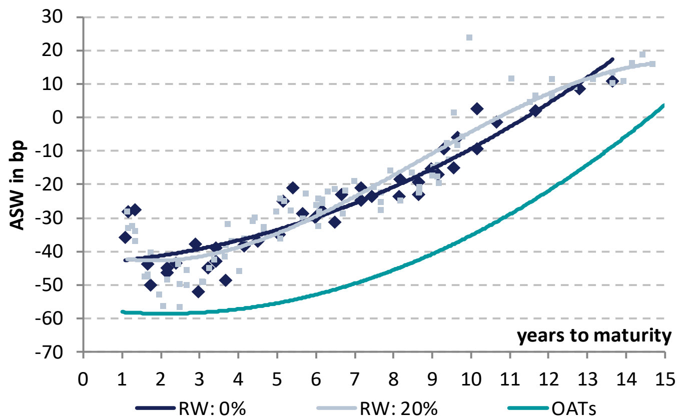


Source: Bloomberg, NORD/LB Markets Strategy & Floor Research

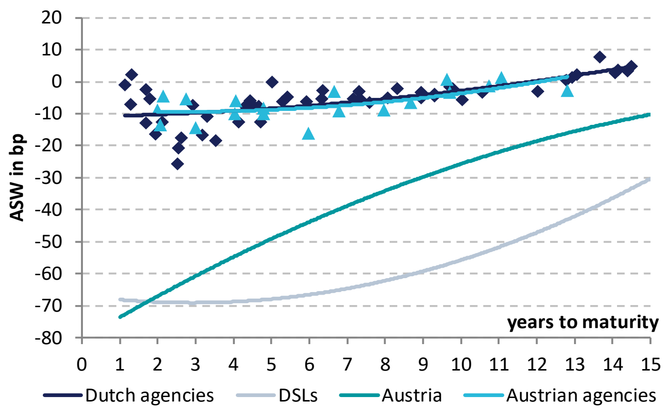
Germany (by segments)



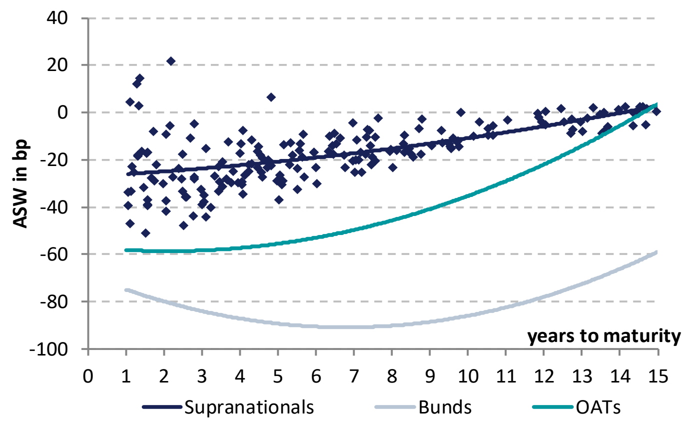
France (by risk weight)



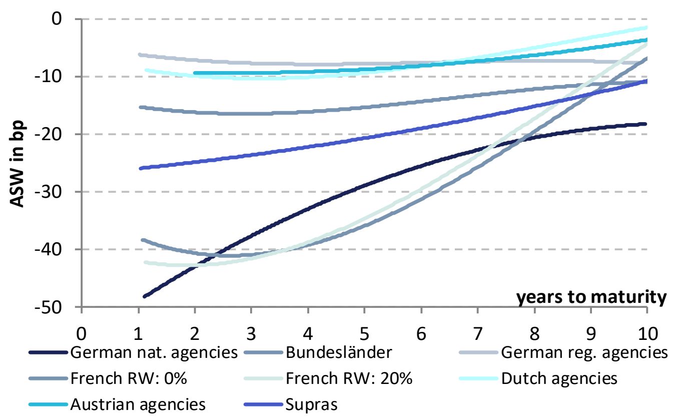
Netherlands & Austria



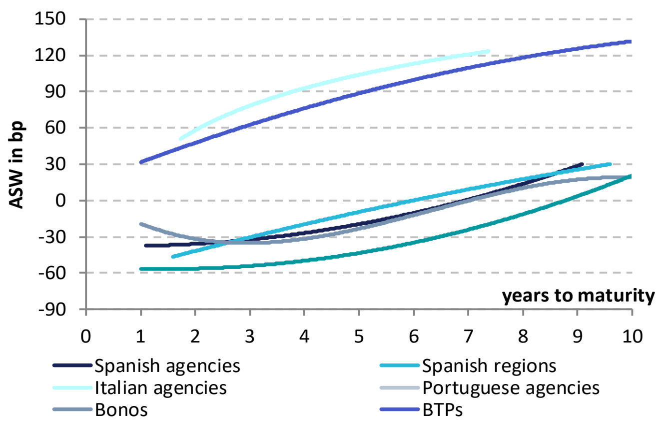
Supranationals



Core



Periphery



Source: Bloomberg, NORD/LB Markets Strategy & Floor Research

NORD/LB

Appendix
Overview of latest Covered Bond & SSA View editions

Publication	Topics
29/2022 ♦ 21 September	▪ ECBC publishes annual statistics for 2021 ▪ Update: Gemeinschaft deutscher Laender (Ticker: LANDER)
28/2022 ♦ 07 September	▪ Primary market: A little more to come! ▪ ECB: PEPP visibly active as first line of defence
27/2022 ♦ 31 August	▪ ECB rate hikes: minimum of +100bp still to come by year-end ▪ Australia: Macquarie returns to the EUR benchmark segment
26/2022 ♦ 24 August	▪ Development of the German property market ▪ Transparency requirements §28 PfandBG Q2/2022
25/2022 ♦ 27 July	▪ ECB likes abbreviations: After OMT and SMP, we now have TPI ▪ Covereds vs. Senior Unsecured Bonds
24/2022 ♦ 20 July	▪ A brief spotlight on the EUR sub-benchmark segment ▪ Deutsche Hypo real estate climate: index falls again
23/2022 ♦ 13 July	▪ ECB preview: might the ECB go slightly further? ▪ EBA Report on Asset Encumbrance: levels increasing
22/2022 ♦ 06 July	▪ H1 review and outlook for H2 2022 ▪ Half time in the 2022 SSA year – taking stock
21/2022 ♦ 22 June	▪ Focus on ESG covered bonds: BayernLB's "green rail" public sector Pfandbrief ▪ Stability Council convenes for 25th meeting
20/2022 ♦ 15 June	▪ Covered bond jurisdictions in focus: a look at Australia and New Zealand ▪ NGEU: Green Bond Dashboard
19/2022 ♦ 01 June	▪ ECB: 3, 2, 1 – lift-off! Decisive June, active summer ahead ▪ The covered bond universe of Moody's: an overview ▪ ECB Financial Stability Review identifies increasing risks in the eurozone: a brief overview of covered bonds
18/2022 ♦ 25 May	▪ Transparency requirements §28 PfandBG Q1 2022 ▪ ESG: EUR-benchmarks 2022 in the SSA segment (ytd)
17/2022 ♦ 18 May	▪ Development of the German property market ▪ The SSA market in 2022 a review of the first four months
16/2022 ♦ 11 May	▪ Focus on covered bond jurisdictions: a look at Austria ▪ Update on DEUSTD – Joint German cities (bond No. 1)
15/2022 ♦ 04 May	▪ Focus on covered bond jurisdictions: Spotlight on Sweden ▪ ESG covered bonds from Germany: DKB issues social Pfandbrief in the form of a "Berlin Social Housing Bond" ▪ Issuer Guide SSA 2022: The Spanish agency market
14/2022 ♦ 13 April	▪ First ECB meeting after the end of the PEPP: (Not) a non-event!? ▪ PEPP reporting: (Not) an obituary

Appendix
Publication overview

Covered Bonds:

Covered Bond Directive: Impact on risk weights and LCR levels

Issuer Guide Covered Bonds 2021

Risk weights and LCR levels of covered bonds (updated semi-annually)

Transparency requirements §28 PfandBG (quarterly update)

Covered bonds as eligible collateral for central banks

SSA/Public Issuers:

Issuer Guide – German Laender 2021 (updated annually)

Issuer Guide – German Agencies 2022

Issuer Guide – Dutch Agencies 2022

Beyond Bundeslaender: Greater Paris (IDF/VDP)

Spotlight on Belgian regions

Spotlight on Spanish regions

Fixed Income Specials:

ESG-Update 2022

ECB acts as the 'House of Hikes' - or: Winter is coming!

ECB frontloads rate hike by +50bp and breaches pre-commitment

ECB ready for lift-off: Every journey starts with a first step

Face-saving ECB decision: Hawks have won – for now

Appendix
Contacts at NORD/LB

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Sales

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Sales Sparkassen & Regionalbanken	+49 511 9818-9400
Sales MM/FX	+49 511 9818-9460
Sales Europe	+352 452211-515

Trading

Covereds/SSA	+49 511 9818-8040
Financials	+49 511 9818-9490
Governments	+49 511 9818-9660
Laender/Regionen	+49 511 9818-9550
Frequent Issuers	+49 511 9818-9640

Origination & Syndicate

Origination FI	+49 511 9818-6600
Origination Corporates	+49 511 361-2911

Sales Wholesale Customers

Firmenkunden	+49 511 361-4003
Asset Finance	+49 511 361-8150

Treasury

Collat. Management/Repos	+49 511 9818-9200
Liquidity Management	+49 511 9818-9620 +49 511 9818-9650

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