ACCRUED-TO-DATE PENSION ENTITLEMENTS IN SOCIAL INSURANCE: FACT SHEET

Germany

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1. Table 29 column A: Defined contribution schemes (funded, non-general government)

1. General description of the scheme and the calculation model	
a. Coverage of the scheme	
As of writing, pure defined contribution schemes have not been effectively established in Germany. However on January 1st 2018, a pension reform act (the occupational pension support act) has been enacted that allows for the introduction of pure defined contribution schemes based on collective labour agreements between employer associations and trade unions. Previously, the employers' retirement benefits law prescribed the implementation of a guaranteed minimum benefit for defined contribution schemes. According to section 17.59f in conjunction with section 17.63, those schemes are classified as part of defined benefit schemes. As of 2023, while there is no specific data available, public information indicates a very slow adaption of pure defined contribution schemes. Therefore, no schemes are entered into column A.	
b. Institutional set-up	
Data sources/ suppliers	-
Which institution is running/managing the calculations?	-
2. Any other comments	

2. Table 29 column B: Defined benefit schemes and other non-defined contribution schemes (funded, non-general government)

1. General description of the scheme and the calculation model	
a. Coverage of the scheme	
In Germany, column B comprises occupational pension schemes for non-general government employees. These include three kinds of pension promises: defined contribution pension promises with guaranteed minimum benefit, contribution-oriented defined benefit promises and purely defined benefit promises. According to the employers' retirement benefits law, five types of funding vehicles exist: direct promises, benevolent funds, direct insurance, staff pension funds and pension funds. Those funding vehicles cover all occupational pensions for employees in Germany. A share of those occupational pensions, which are entitlements of public service employees, has to be included in column E however. Also part of occupational pensions in column B are pension entitlements of self-employed workers, namely those of the *pension schemes of the liberal professions for members of professional associations.* As of 2019, 15.1mn active insurance contracts for occupational pension schemes of non-general government employees exist.	
b. Institutional set-up	
Data sources/ suppliers	For social contributions already included in the core accounts data is provided by the *German Mutual Pension Insurance Association*, the *Federal Financial Supervisory Authority (BaFin)* and others. The amount of pension entitlements is based on regulatory data from the *German Central Bank*, the *Financing Statistics*, which includes the financial assets of private households, including *AF.6 (Insurance, pension and standardised guarantee schemes*).
Which institution is running/managing the calculations?	The *German Central Bank* produces the *Financing Statistics* as an aggregate based on several data sources, including information from the *BaFin.* Data available is used as the amount of pension entitlements in row 1 and 10 for each year, while transactions are based on core account data.
c. Major formulas: Benefit formula; Indexation of benefits	

Benefit formula	As pension plans differ widely, no information is available on the benefit formula. In defined benefit plans, often a percentage of final salary (or a fixed amount) is being granted for each year of service. This is often the case where the projected unit credit method is applied to determine the reserves for pensions in tax accounting.
Indexation of benefits	According to the employers' retirement benefits law, pension indexation is obligatory every three years if the economic circumstances of the employer are favourable. The indicator for indexation is either the consumer price index or net wage growth of comparable groups of employees. After 1999, this obligation can be replaced by a fixed annual nominal indexation of 1%.

d. Type and structure of the calculation model

Data on pension entitlements are aggregated from balance sheets of the included corporations and pension managers by the *German Central Bank*. No original calculation of pension entitlements has been carried out, which is not feasible due to the heterogeneous structure and large number of pension managers and the lack of available data.

2. Assumptions and methodologies applied

a. Discount rate

Since the implementation of the *German accounting law modernization act (BilMoG)* in May 2009, the discount rate for the accounting of pension reserves is determined by section 253 paragraph 2 of the Commercial Code. The discount rate is calculated by the German Central Bank. As of December 2021, the applicable discount rate is 1.35% (7 years average with a duration of 15 years). However, employers can choose a different duration if their obligations differ; also, transitional rules are applicable in an intermediate timeframe.

b. Wage growth

According to the *BilMoG*, future increases in costs and prices have to be included in the valuation of pension entitlements.

c. Valuation method: ABO/PBO

With the BilMoG, the valuation should reflect the expected value of the amount payable according to reasonable economic judgement. Pension entitlements are to be determined as accrued-to-date pension liabilities including wage growth.

3. Data used to run the model

a. Mortality tables

While no definitive rule regarding the mortality table is being made, their choice should reflect a rational judgement of the expected value of pensions to be paid.

b. Entitlement statistics; other relevant statistics

-

4. Reforms incorporated in the model

-

5. Specific assumptions

a. How are careers modelled?

Career trends should not be included.

b. How are survivor pensions calculated?

Survivor pensions should be included in pension reserves if they are part of the occupational pension plan.

c. How is the retirement age modelled over time?

According to current legal practice, the retirement age in occupational pension plans follows the retirement age in the statutory pension insurance.

d. Other specific features of the model

-

6. Any other comments

The aggregated amount of pension entitlements published in the financing statistics covers both occupational pension schemes outside of general government and the supplementary pension funds for public service employees in column E. No detailed breakdown of the pension schemes is available, however, according to information from the *German Central Bank*, 85% of the pension entitlements accrue outside of the general government sector. This share is applied to column B accordingly.

3. Table 29 column D: Defined contribution schemes (funded, general government)**1. General description of the scheme and the calculation model**	
a. Coverage of the scheme	
In coincidence with column A of table 29, there are currently no occupational pension schemes of the pure defined contribution type in Germany.	
b. Institutional set-up	
Data sources/ suppliers	-
Which institution is running/managing the calculations?	-
2. Any other comments	
As mentioned in section 1, a reform act (the occupational pensions support act) has been enacted that provides a framework for the implementation of defined contribution schemes without guarantees, starting from January 1st 2018.	

4. Table 29 column E: Defined benefit schemes (funded, for general government employees, classified in financial corporations)

1. General description of the scheme and the calculation model	
a. Coverage of the scheme	
Column E of table 29 records the supplementary pension funds for public service employees. These are occupational pensions by employers in the public service, mandatory for their employees. They include Federal, state level and municipal employees, including those of churches, hospitals and the like. Several supplementary pension funds exist, the VBL (Supplementary benefits for public service employees of the federal government and the federal states) being the largest one, while others are organized in the AKA (Working committee of municipal or ecclesiastic pension schemes). Together, they cover 10.0mn insurants and 3.1mn pensioners.	
b. Institutional set-up	
Data sources/ suppliers	For social contributions already included in the core accounts data is provided by the *German Mutual Pension Insurance Association*, the *Federal Financial Supervisory Authority (BaFin)* and others. The amount of pension entitlements is based on regulatory data from the *German Central Bank*, the *Financing Statistics*, which includes the financial assets of private households, including *AF.6 (Insurance, pension and standardised guarantee schemes*).
Which institution is running/managing the calculations?	The *German Central Bank* produces the *Financing Statistics* as an aggregate based on several data sources, including information from the *BaFin.* Data available is used as the amount of pension entitlements in row 1 and 10 for each year, while transactions are based on core account data.
c. Major formulas: Benefit formula; Indexation of benefits	
Benefit formula	For pension schemes organized in the AKA, no information is available on the benefit formulae. For the VBL benefits are defined as following: Contributions are proportional to individual gross wages up to the contribution ceiling. For each year of employment, benefit points are accrued in proportion to gross income (1 point for 12,000€ of gross income per year), multiplied with an age factor that is decreasing with progressing age, reflecting an imputed payment of interest. Benefits points have a nominal value of 4€ by definition.
Indexation of benefits	For pension schemes organized in the AKA, no information is available on the indexation of benefits. For the VBL pensions are increased at 1% per annum on the 1st of July each year.
d. Type and structure of the calculation model	

Data on pension entitlements are aggregated from balance sheets of the included corporations and pension managers by the *German Central Bank*. No original calculation of pension entitlements has been carried out, which is not feasible due to the heterogeneous structure and large number of pension managers and the lack of available data.
2. Assumptions and methodologies applied
a. Discount rate
Since the implementation of the *German accounting law modernization act (BilMoG)* in May 2009, the discount rate for the accounting of pension reserves is determined by section 253 paragraph 2 of the Commercial Code. The discount rate is calculated by the German Central Bank. As of December 2021, the applicable discount rate is 1.35% (7 years average with a duration of 15 years). However, employers can chose a different duration if their obligations differ; also transitional rules are applicable in an intermediate timeframe.
b. Wage growth
According to the *BilMoG*, future increases in costs and prices have to be included in the valuation of pension entitlements.
c. Valuation method: ABO/PBO
With the BilMoG, the valuation should reflect the expected value of the amount payable according to reasonable economic judgement. Pension entitlements are to be determined as accrued-to-date pension liabilities including wage growth.
3. Data used to run the model
a. Mortality tables
While no definitive rule regarding the mortality table is being made, their choice should reflect a rational judgement of the expected value of pensions to be paid.
b. Entitlement statistics; other relevant statistics
-
4. Reforms incorporated in the model
-
5. Specific assumptions
a. How are careers modelled?
Career trends should not be included.
b. How are survivor pensions calculated?
Survivor pensions should be included in pension reserves if they are part of the occupational pension plan.
c. How is the retirement age modelled over time?
According to current legal practice, the retirement age in occupational pension plans follows the retirement age in the statutory pension insurance.
d. Other specific features of the model
-
6. Any other comments
The aggregated amount of pension entitlements published in the financing statistics covers both occupational pension schemes outside of general government and the supplementary pension funds for public service employees in column E. No detailed breakdown of the pension schemes is available, however, according to information from the *German Central Bank*, 15% of the pension entitlements accrue for general government pension schemes. This share is applied to column E accordingly.

5. Table 29 column F: Defined benefit schemes (funded, for general government employees, classified in general government)

1. General description of the scheme and the calculation model
a. Coverage of the scheme
In Germany, defined benefit schemes for general government employees are classified in financial corporations. This is due to the fact that the scheme manager is considered to have autonomy of decision and can decide independently. No schemes are recorded in column F of table 29.

b. Institutional set-up	
Data sources/ suppliers	-
Which institution is running/managing the calculations?	-
c. Major formulas: Benefit formula; Indexation of benefits	
Benefit formula	-
Indexation of benefits	-
d. Type and structure of the calculation model	
-	
2. Assumptions and methodologies applied	
a. Discount rate	
-	
b. Wage growth	
-	
c. Valuation method: ABO/PBO	
-	
3. Data used to run the model	
a. Mortality tables	
-	
b. Entitlement statistics; other relevant statistics	
-	
4. Reforms incorporated in the model	
-	
5. Specific assumptions	
a. How are careers modelled?	
-	
b. How are survivor pensions calculated?	
-	
c. How is the retirement age modelled over time?	
-	
d. Other specific features of the model	
-	
6. Any other comments	
-	

6. Table 29 column G: Defined benefit schemes (unfunded, for general government employees, classified in general government)

1. General description of the scheme and the calculation model	
a. Coverage of the scheme	
Column G covers the civil servant pension scheme. It is a combined first- and second pillar pension scheme mandatory scheme for the 1.89 million civil servants and soldiers. Civil servants account for 41.0% of the personnel in public service, while 59.0% are regular employees, who are participating in the statutory pension insurance (column H) and receive the supplementary occupational pension assigned to column E. Pensions from the civil servant pension scheme are provided on a pay-as-you-go financing based on a percentage of final salary proportional to years of service.	
b. Institutional set-up	
Data sources/ suppliers	Calculations are mainly based on data sets of the personnel statistics and pensioner statistics, both available from Destatis. Mortality is based on a cohort-specific mortality table for civil servants, available internally only. For marriage probabilities

	and the age difference for married couples, data from the microcensus is used. Furthermore, publically available information on the remuneration of civil servants is applied as well.
Which institution is running/managing the calculations?	Calculations for the civil servant pension scheme are carried out by Destatis using an actuarial calculation tool applying all relevant parameters in line with the *Technical Compilation Guide for Pension Data in National Accounts.*
c. Major formulas: Benefit formula; Indexation of benefits	
Benefit formula	For each year of service, 1.79375% of the salary received before retirement (for at least two years) is granted as a pension, up to a maximum of 71.75% corresponding to 40 years of service. Part time work reduces the accrual rate proportionally. Attribution times are granted in case of invalidity. Also, periods of military service (or alternative civilian service) as well as certain periods of employment can be counted as eligible for pensions.
Indexation of benefits	Pensions are granted as a percentage of the eligible position in the remuneration table at retirement, therefore pensions are indexed in line with the wages and salaries of active civil servants.
d. Type and structure of the calculation model	
The calculation model is a self-developed, actuarial model to provide accrued-to-date pension liabilities for columns G and H of the supplementary table on pensions. It incorporates a projection of stock figures for active personnel, retirees and dependants based on generational mortality tables, the production and projection of entitlement statistics and a differentiated approach to retirement probabilities for future years.	
2. Assumptions and methodologies applied	
a. Discount rate	
The discount rate is set at 4% in nominal terms, while sensitivity analyses are carried out with a discount rate of 3% and 5% respectively. This approach is in line with the recommendations from the *Technical Compilation Guide for Pension Data in National Accounts* and the assumptions of the Ageing Working Group.	
b. Wage growth	
Assumptions on wage growth are based on the report from the *Ageing Working Group*. The country-specific growth rates of labour productivity per hour in real terms are added to the inflation rate of 2% per annum to define the nominal rate of wage growth. As there is a reduction of pension indexation for civil servants pensions of 0.2%p per annum as of now, the growth rates are reduced accordingly.	
c. Valuation method: ABO/PBO	
As the calculations follow the PBO approach, the projection of future wages and nominal pension values includes wage increases and expected promotions (career trends). This is especially important since pensions in the civil servant pension scheme are based on the final salary before retirement.	
3. Data used to run the model	
a. Mortality tables	
Following the recommendations of the *Technical Compilation Guide for Pension Data in National Accounts,* a specific mortality table for civil servants is used as the life expectancy of civil servants is significantly higher than that of the general population. This table, only available internally, includes projections for increases in future life expectancy and distinguishes by gender.	
b. Entitlement statistics; other relevant statistics	
Entitlement statistics are calculated directly from a number of source statistics (personnel and pensioners statistics from Destatis) via a model approach that incorporates the institutional setup of civil servants pensions in Germany. While calculating widow/-er pensions, marriage probabilities and the age difference for married couples are used in the model, based on data from the Destatis microcensus.	
4. Reforms incorporated in the model	
The raise in retirement age of the pension reform act 2008 has been included to implement the stepwise increase in retirement age by two years from 2012 onwards (as it is the case for the statutory pension insurance.	
5. Specific assumptions	
a. How are careers modelled?	

Pension entitlements are calculated accrued-to-date based on the past service times and the current pensionable wage. Since with PBO valuation promotions are included, pensions are calculated based on the expected pay grade and experience grade (based on working years) at the age of retirement. As a data source, the distribution of new pensioners by career bracket, pay grade and experience grade is used to estimate future careers.
b. How are survivor pensions calculated?
Survivor pensions are calculated as derived pensions from the primary pension recipient. For widows and widowers, the number of persons depends on the number of widows/widowers in the base year, plus the number of new widows/widowers minus the number of deceased widows/widowers. The model differentiates by individual age and gender. The number of new widows/widowers is determined by the number of deceased primary pension recipients, multiplied with the age-specific marriage probability. For orphans, a simplified approach is used, as their entitlements are relatively low.
c. How is the retirement age modelled over time?
Entry into retirement is modelled with retirement quotas by individual age that allow for a gradual transition into retirement. Further differentiation is made by entry path to reflect the appropriate deductions for early retirement. The stepwise increase of the (legal) retirement age is incorporated through a projection for future years $t, \cdots, t+n$ with specific retirement quotas for each year to adjust actual retirement age in line with the increase.
d. Other specific features of the model
-
6. Any other comments
-

7. Table 29 column H: Social security pension schemes (unfunded)

1. General description of the scheme and the calculation model	
a. Coverage of the scheme	
Column H includes two schemes which are characterized as social security pension schemes: The German statutory pension insurance and the farmers' pension insurance. While the former represents the main social security pension system for the general population in Germany, the latter provides additional benefits for persons in agricultural professions. Participation in the statutory pension insurance is mandatory for employees whose income exceeds the threshold for marginal employment. Self-employed professions are also exempt, some of which participate instead in the *pension schemes of the liberal professions for members of professional associations.* Civil servants are covered by the civil servant pension scheme. Participation in the farmers' pension insurance is obligatory by law for farmers and related professions and their spouses. Therefore, and due to the institutional setup (which includes substantial government subsidies) the system is considered as social security, even though the included persons are self-employed. The statutory pension insurance covers 56.1 million insurants (thereof 38.7 million active insurants) and 25.7 million pensioners. It is financed on a pay-as-you go basis from actual social contributions, split equally between employers and employees. The farmers' pension insurance includes 188,700 insurants and provides benefits for 578,700 pensioners (2018 figures). It is financed by contributions and to a large share (ca. 81%) by Federal government funding. Both schemes include old-age pensions, invalidity pensions, widow/widower pensions and pensions for orphans.	
b. Institutional set-up	
Data sources/ suppliers	Calculations for the statutory pension insurance scheme are based on data provided by the German Federal pension insurance, while the data required for the calculations of the farmers' pension insurance scheme are provided by its administrator, the social insurance for agriculture, forestry and horticulture. This comprises statistics on stock and age distribution of insurants and pensioners and pension entitlements or amount of pension paid by age/age group. Most of this data

	is publically available. However for the statutory pension insurance, entitlement statistics are provided as a special evaluation. Mortality is based on the Destatis coordinated population projections (intermediate assumption "L2") with a modest increase in life expectancy until the year 2060. For marriage probabilities and the age difference for married couples, data from the microcensus is used.
Which institution is running/managing the calculations?	Calculations for the social security pension scheme and the farmers' pension insurance are carried out by Destatis using an actuarial calculation tool applying all relevant parameters in line with the *Technical Compilation Guide for Pension Data in National Accounts.*
c. Major formulas: Benefit formula; Indexation of benefits	
Benefit formula	The accrual of pension benefits in one year in the statutory pension insurance is proportional to contributions paid (up to the contribution ceiling). If income subject to contribution in a year matches the average income of insurants in the statutory pension insurance of the same time frame, one earnings point is acquired, valued at 32.03€ in the western states and 30.69€ in the eastern states (as of July, 2018). In the farmers' pension insurance, benefits are defined as the product of the accrual rate, the pension type factor and the general pension value. The accrual rate is the sum of contribution years (with a lower factor for working family members), the pension type factor depends on the type of pension (0.2 for orphan pensions, 0.5 for invalidity pensions, 0.6 for widow pensions, 1.0 for old age pensions) and the pension value (14.79€ in western Germany and 14.15€ in eastern Germany as of July 2018).
Indexation of benefits	Pension benefits are indexed via the pension value, which is the value of one earnings point in both the statutory pension insurance and the farmers' pension insurance. Pension point value differs for those systems and is explained in the previous paragraph. The indexation is calculated using a formula (the pensions adjustment formula). It is determined by the growth in gross wages and salaries in the previous year, adjusted by the change in wages and salaries subject to contributions in the year before last. Furthermore, a sustainability factor, incorporating the ratio of pensioners to contributors is taken into account. Additionally, pension indexation cannot be negative at any time, in that case, missing reductions in pensions will be caught up on with following positive pension indexations.
d. Type and structure of the calculation model	
The calculation model is a self-developed, actuarial model to provide accrued-to-date pension liabilities for columns G and H of the supplementary table on pensions. It incorporates a projection of stock figures for active personnel, retirees and dependants based on generational mortality tables, the production and projection of entitlement statistics and a differentiated approach to retirement probabilities for future years.	
2. Assumptions and methodologies applied	
a. Discount rate	
The discount rate is set at 4% in nominal terms, while sensitivity analyses are carried out with a discount rate of 3% and 5% respectively. This approach is in line with the recommendations from the *Technical Compilation Guide for Pension Data in National Accounts* and the assumptions of the Ageing Working Group.	
b. Wage growth	
Assumptions on wage growth are based on the report from the *Ageing Working Group*. The country-specific growth rates of labour productivity per hour in real terms are added to the inflation rate of 2% per annum to define the nominal rate of wage growth. As pension indexation is influenced by other factors besides wage growth, an adjustment is being made that results in a reduction of growth rates. Those are based on projections made in the pension insurance report by the *Federal Ministry of Labour and Social Affairs* on the replacement rate.	
c. Valuation method: ABO/PBO	

As the calculations follow the PBO approach, the projection of future wages and nominal pension values includes future wage increases. Since in the statutory pension insurance pension entitlements are proportional to the sum of contributions (and to wages and salaries subject to contributions), there is no separate effect of final wage on pension entitlements. Therefore, future promotions do not have to be included separately. In the farmers' pension insurance, pension entitlements do not depend on wages and salaries at all.

3. Data used to run the model

a. Mortality tables

Mortality is based on the Destatis coordinated population projections (intermediate assumption "L2") with a modest increase in life expectancy until the year 2060. For pension entitlements of 31st of December 2018, revised assumptions on mortality have been used from Destatis 14th coordinated population projections for the general population, resulting in higher mortality (and therefore a reduction in entitlements) compared to the previously used 13th projection.

b. Entitlement statistics; other relevant statistics

Entitlement statistics are provided by both the German Federal pension insurance and the social insurance for agriculture, forestry and horticulture. They provide average accrued pension entitlements (monthly pension payment) for active/dormant insurants by individual age (or age group). Data for the statutory pension insurance is based on a special evaluation of the German Federal pension insurance that includes entitlements for age groups below 30 years of age in a differentiated dissemination. While calculating widow/-er pensions, marriage probabilities and the age difference for married couples are used in the model, based on data from the Destatis microcensus. For pension entitlements of 31st of December 2018, slightly revised assumptions have been used from the 2018 microcensus.

4. Reforms incorporated in the model

The raise in retirement age of the pension reform act 2008 has been included to implement the stepwise increase in retirement age by two years from 2012 onwards (as it is the case for the civil servant pension scheme). Furthermore, the 2014 reform in the statutory pension insurance has been included as well: It incorporates changes in the retirement age for particularly long-term insured, in the calculations of benefits for mothers and regarding the calculation of invalidity pensions.

For the supplementary table of 2018, pension reforms of the statutory pension insurance have been implemented according to the law on improvements for disability pensions ("EM-Leistungsverbesserungs-gesetz", July 17th, 2017) and the law on improved and stabilized social security pensions ("RV-Leistungsverbesserungsgesetz", November 27th, 2018). While the former led to improved recognition of attribution times for disability pensioners (included in entitlement statistics), the latter introduced a minimum threshold of the gross replacement rate before taxes until 2015, resulting in higher wage growth in the short term.

In July 2020, a new basic pension was enacted which became effective from 2021 onwards. It increases the value of pensions points of low-income earners (between 30% and 80% of the average wage) who have a long contribution history of 33 years or more by doubling earned pension points up to a cap of 0.8 points per year (which equals 80% of the average wage) for up to 35 years. This basic pension is granted in addition to regular pension entitlements, however reduced by 12.5% and subject to means-testing and further requirements.

As the calculation of the basic pension does require substantial consideration of individual circumstances such as earnings and contribution history, as well as other taxable income, it is only evaluated upon retirement by the statutory pension insurance by also considering data from tax offices.

Currently, data on average basic pension supplements do exist for current retirees and are accounted for in the pension entitlements from 2021 onwards. As data on prospective basic pension entitlements of currently active workers is not available, these have so far not been accounted for in the pension entitlements for 2021. In the future, it is planned to include estimates for these supplements also for active insurants.

5. Specific assumptions

a. How are careers modelled?

There is no explicit modelling of careers, since pension entitlements are based on the whole career, reflected in the entitlement statistics.

b. How are survivor pensions calculated?

Survivor pensions are calculated as derived pensions from the primary pension recipient. For widows and widowers, the number of persons depends on the number of widows/widowers in the base year, plus the

number of new widows/widowers minus the number of deceased widows/widowers. The model differentiates by individual age and gender. The number of new widows/widowers is determined by the number of deceased primary pension recipients, multiplied with the age-specific marriage probability. For orphans, a simplified approach is used, as their entitlements are relatively low.
c. How is the retirement age modelled over time?
Entry into retirement is modelled with retirement quotas by individual age that allow for a gradual transition into retirement. Further differentiation is made by entry path to reflect the appropriate deductions for early retirement. The stepwise increase of the (legal) retirement age is incorporated through a projection for future years $t, \cdots, t+n$ with specific retirement quotas for each year to adjust actual retirement age in line with the increase.
d. Other specific features of the model
-
6. Any other comments
-

8. Table 29 column K: Entitlements of non-resident households

[to be completed only if data are transmitted for column K]

1. General description and the calculation model	
a. Coverage of the scheme	
Regarding pension entitlements of non-resident households, data availability is very limited. In line with ESA 2010, an estimation is only made for the social security pension scheme as other schemes are not considered to have significant shares of non-resident entitlements.	
b. Institutional set-up	
Data sources/methods	Data on the pension entitlements for non-resident households is estimated for the statutory pension insurance, based on data on the number of pensioners and the number of insurants residing abroad. No information is available on differences in pension entitlements per person between resident and non-resident households, so it is assumed that the overall average applies to non-resident households. From the number of pensioners and the number of insurants residing abroad, quotas are calculated as per cent of totals, to estimate the pension entitlements of these households as a percentage of the present value of pension entitlements accordingly. This simplified estimation is made since there is no detailed breakdown of these groups whatsoever. For the supplementary table for 2021, the complete sequence of column K (and J) has been filled. Actual social contributions of employers and households are based on actual figures from the calculation of the compensation of employees of commuters. Pension payments are based on the fraction of pensioners of the statutory pension insurance that do reside abroad or whose place of residence is unknown. These figures are not adjusted in the sensitivity analysis, as the effect of variations of the discount rate on transactions is difficult to quantify. Rows 6, 7, 8 and 9 are based on the share of the pension entitlements of non-residents from the total of pension entitlements in the statutory pension insurance.
Which institution is running/managing the calculations?	The estimation is carried out by Destatis based on results from the actuarial calculations and the data sources mentioned above.
2. Any other comments	
-	

9. Links to (national) publications providing further information on the pension schemes

https://www.destatis.de/DE/Themen/Wirtschaft/Volkswirtschaftliche-Gesamtrechnungen-Inlandsprodukt/AnwartschaftenBeschaeftigungsbezogeneAlterssicherungssystemen.html

https://www.destatis.de/DE/Methoden/WISTA-Wirtschaft-und-Statistik/2018/02/berechnung-pensions-rentenanwartschafte-022018.pdf

ANNEX

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