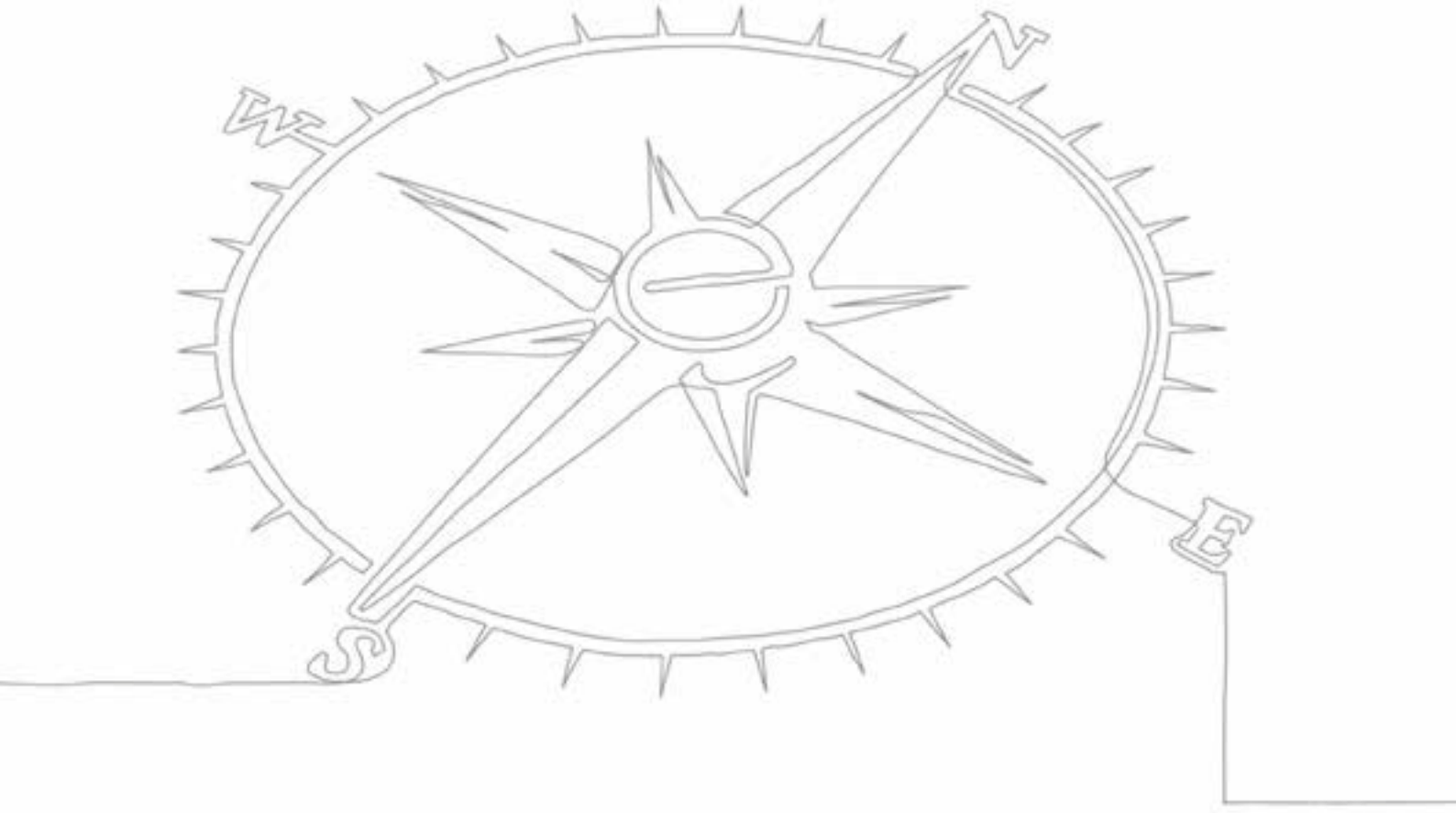
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42 Appendix: Quantitative reporting

Beazley Insurance dac reinsures and provides capital to support the underwriting activities of Beazley Underwriting Limited in the Lloyd's market. The company also writes non-life insurance through its European branch network.

Summary

The EU-wide regulatory regime for insurance and reinsurance companies, known as Solvency II, came into force with effect from 1 January 2016, requiring new reporting and public disclosure of information. This document is the fourth version of the Solvency and Financial Condition Report (SFCR) that is required to be published annually by Beazley Insurance dac (BIdac or the company).

The report covers the business and performance of the company, its system of governance, risk profile, valuation for solvency purposes and capital management and has been approved by the board of directors.

In July 2017 the company received authorisation from the Central Bank of Ireland (CBI) to convert from a reinsurance company into a non-life insurance company permitted to transact business throughout the European Union. To that end the company was renamed Beazley Insurance dac. Subsequently the company established a branch network in the United Kingdom, France, Germany and Spain and operates across Europe on a freedom of services basis. The company underwrote its first policies for European banks in the fourth quarter of 2017.

Through 2019, the company continued to invest in and develop its business across Europe. The company underwrote its first risks across a number of new classes of business including $7.2m gross reinsurance business from our Munich office. The company also underwrote its first risks through Beazley's e-trading platform, MyBeazley. Premiums from the company's non-life insurance and reinsurance business carried out through its branches grew from $8.2m in 2018 to $43.8m in 2019. The company expanded its branch network by obtaining authorisation from FINMA and the Central Bank of Ireland to open a Swiss branch in November 2019. The company underwrote its first risks through the Swiss branch in December 2019.

The company also continues to act as an intra-group reinsurer and provides capital to support the underwriting activities of its sister company, Beazley Underwriting Limited (BUL). BUL is a Lloyd's of London corporate member. It participates in the Lloyd's insurance market on a limited liability basis through syndicates 2623, 3622 and 3623. The company has an aggregate excess of loss reinsurance agreement with BUL.

BUL cedes 75% (less a profit retention of $4m) of the final declared result of its participation in syndicates 2623 and 3623 to the company. In the event that the declared result is a loss, the extent of the reinsurance is limited to the loss in excess of $4m not exceeding 75% of the Funds at Lloyd's provided by the company.

The Solvency II technical provisions have been calculated in line with a literal interpretation of the Solvency II regulation that considers the contract cash flows, particularly in relation to the aggregate excess of loss reinsurance agreement with BUL with effect from year end 2017. The cash flows represent the premium (provided the declared result of BUL is a profit) or claim (in the case of a loss) paid in respect of BUL's declared result and the fees for providing capital to support BUL's reinsured underwriting at Lloyd's.

In September 2019, the company issued an additional $300m Tier 2 subordinated debt.

The main political change that both Beazley as a group and the company continued to navigate in 2019 was Brexit. Where possible, the company is providing an alternative platform for syndicate business under threat from Brexit which has required the company to make a number of applications to the CBI to broaden its business plans to cover additional lines of business. In this regard, the company has received authorisation from the CBI to write non Specialty lines and Cyber & executive risks (the Specialty lines division was split into two divisions from 1 January 2019 – Specialty lines and Cyber and executive risks). In addition, the company has applied to the Prudential Regulation Authority (PRA) for authorisation of our UK branch as a third country branch. We have been registered under the PRA's temporary permissions regime until such time as the application process has been completed. The group has received authorisation to establish Beazley Solutions International Limited (BSIL), an insurance intermediary domiciled in Ireland to replace Beazley Solutions Ltd (BSOL), the company incorporated and resident in the UK and previously used as our delegated underwriter in Europe.

The company continues to monitor and respond to the global COVID-19 outbreak. While significant uncertainty exists as to the full extent of the impact of this outbreak on the company, the main impacts are expected to relate to the company's reinsurance contracts with Beazley Underwriting Limited and the company's investment portfolio. The company's investment portfolio at 31 December 2019 was heavily weighted toward government issued and investment grade corporate debt, however the company took further action throughout the first quarter of 2020 to reduce its exposures to equities and to lengthen the duration of the investment portfolio as a whole.

From an operational perspective, we have invested significantly in the resilience of the Beazley workforce, ensuring they can all work remotely and are able to be flexible about how, when and where they work. Since the outbreak of COVID-19 the group and company have spent time confirming the level of preparedness with both staff and stakeholders. The group and company boards continue to monitor the situation and are able to activate continuity plans at short notice.

BIdac holds a level of capital over and above its regulatory requirements. As at 31 December 2019, total own funds were $1,706.5m, compared to the Solvency Capital Requirement (SCR) of $709.6m. The amount of surplus capital held is considered on an ongoing basis in light of the current regulatory framework, opportunities for growth and a desire to maximise returns for the shareholder.

A. Business and performance

A.1 Business

Beazley Insurance dac (BIdac or the company) is a company incorporated in Ireland.

The address of the registered office is:
2 Northwood Avenue
Santry
Dublin
D09 X5N9
Ireland

The supervisor of BIdac and the Beazley group (the group) is the Central Bank of Ireland (CBI) and can be contacted at:
Central Bank of Ireland
PO Box 559
New Wapping Street
North Wall Quay
Dublin 1
Ireland

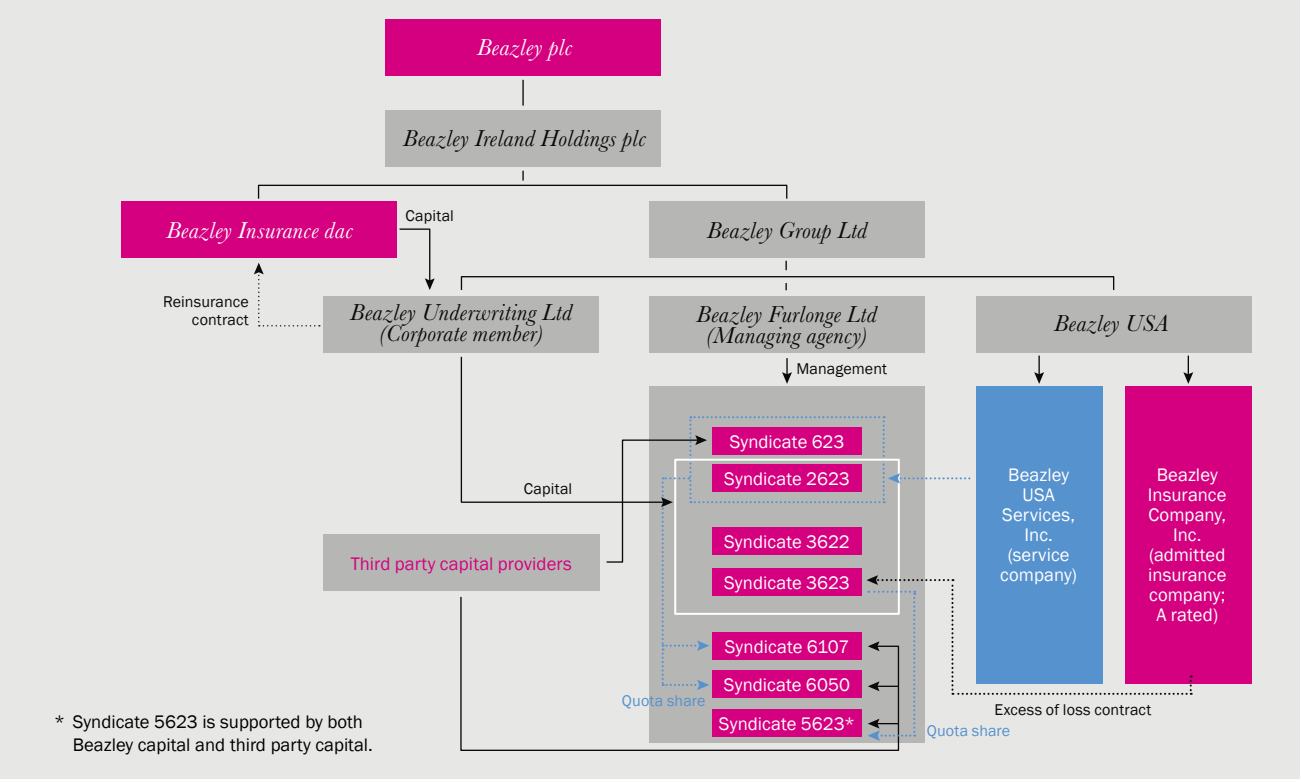
The independent auditor of the company is:
Ernst & Young
Harcourt Centre
Dublin 2
Ireland

BIdac is a wholly owned subsidiary of Beazley Ireland Holdings plc, which is in turn wholly owned by Beazley plc.

The group operates across Lloyd's of London, the US and Europe through a variety of legal entities and structures. The main entities within the legal entity structure are demonstrated in the diagram at the bottom of this page.

In July 2017 the company received authorisation from the CBI to convert from a reinsurance company into a non-life insurance company permitted to transact business throughout the European Union. To that end the company was renamed Beazley Insurance dac. Subsequently the company established a branch network in the United Kingdom, France, Germany and Spain and operates across Europe on a freedom of services basis. The initial focus was on specialty lines business however in 2018 the company obtained authorisation from the CBI to write other lines of business. In 2019, the company grew its Specialty lines business (this division was split into two divisions from 1 January 2019 – Specialty lines and Cyber & executive risks) and underwrote its first Reinsurance, Marine and Political, Accident and Contingency (PAC) risks. The company also expanded its branch network by obtaining authorisation from FINMA and the Central Bank of Ireland to open a Swiss branch. We underwrote our first risks through the Swiss branch in December 2019.

The company also continues to act as an intra-group reinsurer and provides capital to support the non-life underwriting activities of its sister company, Beazley Underwriting Limited (BUL). BUL is a Lloyd's of London corporate member. It participates in the Lloyd's insurance market on a limited liability basis through syndicates 2623, 3622 and 3623.



A.1 Business *continued*

BUL cedes 75% of the final declared result of its participation in syndicates 2623 and 3623 less a profit retention of $4m, to the company. In the event that the declared result is a loss, the extent of the reinsurance is limited to the loss in excess of $4m not exceeding 75% of the Funds at Lloyd's which is provided to BUL by the company under the reinsurance arrangement.

In 2019, the company's business consisted of two operating divisions – direct insurance/reinsurance and intra-group reinsurance, reflecting the reporting and governance structure of the company. Within the direct insurance/reinsurance division the company has underwritten policies in the Specialty lines, Cyber & executive risks, Reinsurance, PAC and Marine divisions. The following tables provide a breakdown of net premiums written by division in 2019 and 2018. Premiums written in the PAC and Marine divisions represents less than 1% of the total premium written in 2019 therefore is not represented in the below table due to rounding.

	2019
Specialty lines	**55%**
Cyber & executive risks	**29%**
Reinsurance	**16%**
PAC	–
Marine	–
Intra-group reinsurance[1]	–

	2018
Specialty lines	7%
Cyber & executive risks[2]	1%
Intra-group reinsurance	92%

1 No premium was recognised for intra-group reinsurance in 2019 as the reinsurance contracts with BUL were in a loss making position at the reporting date.
2 2018 comparative information updated to reflect split of Specialty Lines division into Specialty lines and Cyber & executive risks.

The table below provides an analysis of the geographical breakdown of premiums written. Our operating divisions are split between intra-group reinsurance (contracts with BUL, a UK domiciled company) and insurance/reinsurance (contracts written through our EU branches in the Specialty lines, Cyber & executive risks, Reinsurance, PAC and Marine divisions), therefore our geographical breakdown of premium is solely in Europe. In 2019, over 35% of our premium was sourced from the UK, with the remainder in continental Europe.

	2019 %	2018 %
US	–	–
Europe	100%	100%
Other	–	–
Total	**100%**	**100%**

Premiums, claims and expenses by country, as disclosed in the appendix, presents the underlying breakdown by country of the business written in Europe. Additional information on underwriting performance by Solvency II line of business can be found in section A.2.

In September 2019, the company issued an additional $300m Tier 2 subordinated debt.

The main political change that both Beazley as a group and the company continued to navigate in 2019 was Brexit, although this is not a significant threat to the company directly or indirectly through the reinsurance contract with BUL as the majority of premium underwritten by syndicates 2623 and 3623 is from the US. Where possible, the company is providing an alternative platform for syndicate business under threat from Brexit. In this regard, the company obtained authorisation from the CBI to write non-Specialty lines and Cyber & executive risks, lines of business. The group has received authorisation to establish Beazley Solutions International Limited (BSIL), an insurance intermediary domiciled in Ireland to replace BSOL – the company incorporated and resident in the UK and previously used as our delegated underwriter in Europe. In addition, the company has applied to the Prudential Regulation Authority (PRA) for authorisation of our UK branch as a third country branch. We have been registered under the PRA's temporary permissions regime until such time as the application process has been completed.

The company is targeting additional growth in Europe by writing direct insurance/reinsurance through its European branch network. This direct business is projected to grow substantially in the coming years. The company intends to further expand its product offering throughout Europe during 2020 having underwritten its first risks through our Reinsurance, PAC and Marine divisions in 2019. The company is also looking to enter into a limited number of delegated underwriting agreements in 2020 as it continues to expand its underwriting capability in Europe.

The main driver of the company's performance and capital position over the coming years is still projected to be the company's intra-group reinsurance contracts with BUL. Through these contracts, the company will benefit from the diverse portfolio which the Beazley group maintains across its underwriting divisions.

Looking forward, the group and BUL will actively seek to grow the areas of where we see the best opportunities for future profitability and shrink areas where margins are challenged. As we enter 2020, the Beazley group will continue to grow our business prudently and anticipate achieving double digit premium growth within our syndicates, which should benefit the company through the reinsurance contracts with BUL. A key component of growth throughout the group will be the growth of Specialty lines international, of which the European branches of the company, including our newly opened Swiss branch, play an important role.

A. Business and performance *continued*

A.1 Business *continued*

Beazley's underwriting strategy of exercising discipline across a diverse portfolio of specialist insurance products will remain a constant, and leaves the company well positioned for 2020.

A.2 Underwriting performance

Data in the table below presents the GAAP underwriting performance by Solvency II line of business

The below table shows the classification of the company's divisions into their lines of business for Solvency II purposes.

Division	Solvency II Lines of Business
Specialty lines	General Liability/Non-Proportional casualty reinsurance
Cyber & executive risks	General Liability
Reinsurance	Non-Proportional property reinsurance
PAC	Credit & Suretyship
Marine	Marine, Aviation and Transport
Intra-group reinsurance	Non-Proportional casualty reinsurance

The underwriting performance of each line of business is outlined in the below table.

2019	General Liability $m	Non-proportional property reinsurance $m	Credit and Suretyship $m	Marine, Aviation and Transport $m	Non-proportional casualty reinsurance $m	Total $m
Net premiums written	29.1	5.8	0.1	0.1	0.6	**35.7**
Net earned premiums	20.1	5.6	–	–	0.6	**26.3**
Net claims incurred	(13.5)	(1.7)	–	–	126.6	**111.4**
Expenses incurred	(11.1)	(2.2)	–	0.1	(5.6)	**(18.8)**
Underwriting performance	**(4.5)**	**1.7**	**–**	**–**	**121.6**	**118.8**

2018	General liability $m	Non-proportional casualty reinsurance $m	Total $m
Net premiums written	7.1	96.4	**103.5**
Net earned premiums	2.6	96.4	**99.0**
Net claims incurred	(1.7)	(32.0)	**(33.7)**
Expenses incurred	(1.8)	(18.4)	**(20.2)**
Underwriting performance	**(0.9)**	**46.0**	**45.1**

A.2 Underwriting performance *continued*

Geographical breakdown

From a Solvency II perspective, the GAAP gross premiums written underwritten by the branches of $43.8m (2018: $8.2m) are all classified as originating from the UK and continental Europe. No gross premium has been recognised in relation to the reinsurance contract with BUL (2018: $96.4m) as the reinsurance contracts were in a loss making position at the reporting date. Further details on the geographical breakdown is presented in the S.05.02.01 quantitative reporting template within the appendix.

GAAP segmental analysis

Segment information is presented in respect of reportable segments. These are based on the company's management and internal reporting structures and represent the level at which financial information is reported to the board, being the chief operating decision-maker.

The company's activities are displayed below in segments representing insurance/reinsurance (represented below as Specialty lines, Cyber & executive risks, Reinsurance, PAC and Marine) and intra-group reinsurance activities which reflects the reporting and governance within the company, with the insurance underwriting group monitoring the performance of the insurance/reinsurance business and the reinsurance underwriting group monitoring the performance of the intra-group reinsurance business.

31 December 2019	Specialty lines $m	Cyber & executive risks $m	Reinsurance $m	Marine $m	PAC $m	Intra-group reinsurance $m	Total reportable segments $m	Unallocated $m	Total $m
Segment results									
Gross premiums written	22.8	13.6	7.2	0.1	0.1	–	43.8	–	43.8
Net earned premiums	14.1	6.6	5.6	–	–	–	26.3	–	26.3
Net investment income	–	–	–	–	–	114.0	114.0	–	114.0
Revenue	**14.1**	**6.6**	**5.6**	**–**	**–**	**114.0**	**140.3**	**–**	**140.3**
Net insurance claims	(10.0)	(4.1)	(1.7)	–	–	126.9	111.1	–	111.1
Net operating expenses	(7.9)	(2.9)	(2.3)	–	(0.3)	(3.1)	(16.5)	–	(16.5)
Foreign exchange loss	–	–	–	–	–	–	–	(1.2)	(1.2)
Finance costs	–	–	–	–	–	–	–	(20.0)	(20.0)
Expenses	**(17.9)**	**(7.0)**	**(4.0)**	**–**	**(0.3)**	**123.8**	**94.6**	**(21.2)**	**73.4**
Profit on ordinary activities before tax	**(3.8)**	**(0.4)**	**1.6**	**–**	**(0.3)**	**237.8**	**234.9**	**(21.2)**	**213.7**

31 December 2018	Specialty lines $m	Cyber & executive risks $m	Intra-group reinsurance $m	Total reportable segments $m	Unallocated $m	Total $m
Segment results						
Gross premiums written	7.0	1.2	96.4	104.6	–	104.6
Net earned premiums	2.2	0.4	96.4	99.0	–	99.0
Net investment income	–	–	29.7	29.7	–	29.7
Revenue	**2.2**	**0.4**	**126.1**	**128.7**	**–**	**128.7**
Net insurance claims	(1.6)	(0.2)	(32.0)	(33.8)	–	(33.8)
Net operating expenses	(1.5)	(0.2)	(17.0)	(18.7)	–	(18.7)
Foreign exchange loss	–	–	–	–	(12.3)	(12.3)
Finance costs	–	–	–	–	(14.9)	(14.9)
Expenses	**(3.1)**	**(0.4)**	**(49.0)**	**(52.5)**	**(27.2)**	**(79.7)**
Profit on ordinary activities before tax	**(0.9)**	**–**	**77.1**	**76.2**	**(27.2)**	**49.0**

2018 comparative information updated to reflect split of Specialty lines division into Specialty lines and Cyber & executive risks.

2019 was the second full year of operations of our direct insurance division. Premium was written through our five European branches – London, Paris, Barcelona, Munich and Zurich across a number of focus groups including financial institutions, management liability, cyber, property catastrophe, aviation and political.

A. Business and performance *continued*

A.2 Underwriting performance *continued*

The company's profit before tax increased to $213.7m in 2019 (2018: $49.0m) primarily due to increased investment income recognised directly on the company's financial assets, and indirectly through the company's reinsurance contract with BUL. Further GAAP segmental analysis is presented in note 3 of the Beazley Insurance dac 2019 annual report.

A.3 Investment performance

Summary of investment return including income from intercompany financing arrangements

Investment return	2019 $m	2018 $m
Income derived from financial assets[1]	87.7	11.0
Income from intercompany financing arrangements[2]	28.6	20.1
Investment income	116.3	31.1
Investment expenses and charges	(2.3)	(1.4)
Total	**114.0**	**29.7**

1 Income derived from financial assets reflects the investment return generated from Bidac's financial assets, including the assets it deposits with Lloyd's, as trustee, to support the underwriting activities of BUL. This data is comparable between 2019 and 2018.
2 Income from intercompany financing arrangements includes fees received from BUL in connection with Bidac's provision of assets supporting BUL underwriting activity.

Summary of investment return excluding income received from intercompany financing activities

	2019		2018	
	%	$m	%	$m
Income derived from financial assets	–	87.7	–	11.0
Investment expenses and charges	–	(2.3)	–	(1.4)
Total	**5.4**	**85.4**	**0.7**	**9.6**

A.3 Investment performance *continued*

Income and expenses by asset class ($m)

2019	Fixed interest	Capital growth: Equity	Capital growth: Hedge funds	Total $m
Income	67.5	17.3	2.9	87.7
Expenses	(2.0)	(0.1)	(0.2)	(2.3)
Net	65.5	17.2	2.7	85.4

2018	Fixed interest	Capital growth: Equity	Capital growth: Hedge funds	Total $m
Income	21.4	(10.9)	0.5	11.0
Expenses	(1.1)	(0.1)	(0.2)	(1.4)
Net	20.3	(11.0)	0.3	9.6

Breakdown of total return on investment assets (%)

2019	Fixed interest	Capital growth: Equity	Capital growth: Hedge funds	Capital growth: Total	%	Total $m
Total return	5.3	24.7	6.0	16.2	5.5	87.7

2018	Fixed interest	Capital growth: Equity	Capital growth: Hedge funds	Capital growth: Total	%	Total $m
Total return	1.7	(13.2)	0.5	(7.8)	0.8	11.0

Investment assets returned 5.5% in 2019 (2018: 0.8%) . The 2019 return exceeded expectations, helped by benign investment conditions throughout much of the year as bond yields fell, credit spreads narrowed and equities rallied strongly.

There are currently no investments in structured securities and no plans to add exposure during 2020.

A.4 Performance of other activities

BIdac has no material income or expenses other than the income and expenses included within the segmental in A.2 and A.3.

A.5 Any other information

There are no material leasing arrangements in place (2018: nil).

The company continues to monitor and respond to the global COVID-19 outbreak. While significant uncertainty exists as to the full extent of the impact of this outbreak on the company, the main impacts are expected to relate to the company's reinsurance contracts with Beazley Underwriting Limited and the company's investment portfolio. The company's investment portfolio at 31 December 2019 was heavily weighted toward government issued and investment grade corporate debt, however the company took further action throughout the first quarter of 2020 to reduce its exposures to equities and to lengthen the duration of the investment portfolio as a whole.

From an operational perspective, we have invested significantly in the resilience of the Beazley workforce, ensuring they can all work remotely and are able to be flexible about how, when and where they work. Since the outbreak of COVID-19 the group and company have spent time confirming the level of preparedness with both staff and stakeholders. The group and company boards continue to monitor the situation and are able to activate continuity plans at short notice.

B. System of governance

B.1 General information on the system of governance

The Beazley Insurance dac (BIdac or the company) board has a majority of independent non-executive directors. The chair is an independent non-executive director.

The board retains ultimate authority for all strategic issues and management decisions of BIdac including effective, prudent and ethical oversight as well as setting the company strategy and ensuring that risk and compliance are properly managed. The board may delegate its powers for review and research purposes within specific terms of reference to committees and working groups. The committees and working groups act in an advisory capacity to the board.

The BIdac board has formed the following sub committees:

- audit committee; and
- risk and compliance committee.

These committees have the power to carry out activities on behalf of the board to the extent of the authority delegated to them by the board, as set out in their terms of reference.

The board has also established a number of executive committees or groups:

- reinsurance underwriting group;
- insurance underwriting group;
- regulatory review committee;
- operations group;
- branch manager committee; and
- Swiss branch management committee

The general manager has responsibility for operations, compliance and performance which includes the smooth running of the business and effective function of the day-to-day operations of BIdac and for any changes thereto.

BIdac has a head of compliance, head of actuarial function and chief risk officer as approved by the Central Bank of Ireland (CBI). The key functions of risk management, actuarial, internal audit and compliance are all supported by the Beazley group functions under the terms of an intra-group service agreement between BIdac and Beazley Management Limited (BML).

A review of the systems of governance is carried out annually and the 2019 review concluded that no actions were required.

Remuneration policy and practices

The board has adopted a remuneration policy which is overseen and reviewed by the Beazley plc remuneration committee.

The main aim of the policy is to ensure that management and staff are remunerated fairly and in such a manner as to facilitate the recruitment, retention and motivation of suitably qualified personnel.

B.1 General information on the system of governance *continued*

Beazley believes that:

- performance-related remuneration is an essential motivation to management and staff and should be structured to ensure that executives' interests are aligned with those of shareholders;
- individual rewards should reflect the group objectives and be dependent on the profitability of the group but should be appropriately balanced against risk considerations;
- the structure of packages should support meritocracy, an important part of Beazley's culture;
- reward potentials should be market-competitive; and
- executives' pay should include an element of downside risk.

Beazley's policy is to maintain a suitable balance between fixed and variable remuneration which will vary depending on an individual's role and seniority.

Independent non-executive directors' fees comprise payment of an annual basic fee and additional fees to reflect specific responsibilities, where applicable. No independent non-executive director participates in the group's incentive arrangements or pension plan.

The following tables set out the additional incentive arrangements for staff within the organisation other than executive directors of Beazley plc:

Element	Objective	Summary
Profit related pay plan	To align underwriters' reward with the profitability of their account.	Profit on the relevant underwriting account as measured at three years and later.
Support bonus plan	To align staff bonuses with individual performance and achievement of objectives.	Participation is limited to staff members not on the group executive or in receipt of profit related pay bonus. The support bonus pool may be enhanced by a contribution from the enterprise bonus pool.
Retention shares	To retain key staff.	Used in certain circumstances. Full vesting dependent on continued employment over six years.

The remuneration committee regularly reviews remuneration governance in the context of Solvency II remuneration guidance, other corporate governance developments and institutional shareholders' guidance. The group chief risk officer reports annually to the remuneration committee on risk and remuneration as part of the regular agenda. The committee believes the group is adopting an approach which is consistent with, and takes account of, the risk profile of the group.

All employees of BIdac may participate in a defined contribution pension plan, which is non-contributory, and are offered benefits such as private medical insurance and permanent health insurance. Beazley also operates an Irish Revenue-approved SAYE scheme for the benefit of Irish-based employees of the group.

The performance criteria on which variable components of remuneration are based are as follows:

Incentive plan	Performance measures	Why performances measures were chosen and target is set
Annual bonus plan	Profit and ROE, risk adjustment, individual performance.	• The committee believes the approach to the determination of bonuses creates alignment to shareholders' interests and ensures that bonuses are affordable, while the ROE targets increase the performance gearing and the risk adjustment is consistent with and promotes effective risk management. • The committee reviews the bonus pool framework each year to ensure that it remains appropriate and targets are set taking into account the prevailing environment, interest rates and expected investment returns, headcount and any other relevant factors. • A key principle of the process is that the committee exercises its judgement in determining individual awards taking into account the individual's contribution and performance.

B. System of governance *continued*

B.1 General information on the system of governance *continued*

Incentive plan	Performance measures	Why performances measures were chosen and target is set
Profit related pay (PRP)	To align the interests of the group and the individual through aligning underwriters to the long-term profitability of their portfolio. Profit related pay is awarded irrespective of the results of the group.	• Underwriters that have significant influence over a portfolio are offered this arrangement. There is no automatic eligibility. • This bonus is awarded as cash and is based on the performance of the individual's account as measured by the results following the Q3 peer review in the third year. Under the profit related plan payments are aligned with the timing of profits achieved on the account. For long-tail accounts this may be in excess of six years. If the account deteriorates then payouts are 'clawed back' through adjustments to future payments. • Targets are set through the business planning process and reviewed by a committee formed of executive committee members including the chief risk officer and functional specialists including group actuary and head of talent management. • From 2012 onwards any new profit related pay plans may be at risk of forfeiture or reduction if, in the opinion of the remuneration committee, there has been a serious regulatory breach by the underwriter concerned, including but not limited to the group's compliance, bribery, conflicts of interest or conduct risk policies.
Deferred share plan	Award of nil cost share awards. Generally awarded as a deferred element of the annual bonus.	• This is a discretionary award. • Vesting is dependent on continued employment for three years. • An element of all bonuses (including those from the variable incentive pool), apart from PRP, may be awarded in deferred shares. • Awards from this plan may also be awarded with performance conditions in special circumstances, for example, recruitment.
Long term incentive plan	Award of shares to align the senior employees to the out-performance of the group by setting stretching performance targets over the longer-term growth in net asset value per share (NAVps) over three years and five years. In accordance with the updated UK Corporate Governance Code the first tranche of the 2019 LTIP award will be subject to a further two year holding period (for executive directors only) taking the total time frame for the entire award to five years.	• Creates alignment to one of Beazley's key performance indicators. • The committee reviews the NAVps targets periodically to ensure they remain appropriate with reference to the internal business plan, the external environment and market practice. • In the event that NAVps were to become unsuitable as a performance measure in the opinion of the committee (for example due to a change in accounting standards) the committee would substitute a measure which followed broadly similar principles.
Investment in underwriting	The plan mirrors investment in an underwriting syndicate.	• The Beazley staff underwriting plan provides for participants to contribute personal capital to Beazley syndicates. Selected staff are invited to participate through bonus deferral with an element of cash incentives 'at risk' as capital commitments.
Malus	To include provisions that would enable the company to recover sums paid or withhold payment of any sum in circumstances when it would be appropriate to do so.	• Malus provisions apply to the LTIP and deferred shares whereby the committee has the discretion to reduce or withhold an award in certain circumstances.

During 2019 two senior individuals were granted an award of deferred shares. (2018: no individual was granted an award of deferred shares).

B.2 Fit and proper requirements

Our approach is to ensure that all key functions are identified with prescribed responsibilities allocated and that persons who effectively run the undertaking or have other key functions, and are important to the sound and prudential management of the undertaking, fulfil the following requirements:

- their professional qualifications, knowledge and experience are adequate to enable sound and prudent management (fit);
- they are of good repute and integrity (proper); and
- they currently meet and annually subscribe to continue to meet all relevant supervisory standards.

Beazley group's policy is that CBI pre-approved controlled functions (PCFs) and controlled functions (CFs) must meet the fitness and probity standards as required by the CBI, and in that regard we will ensure compliance with the provisions of Solvency II, to which the CBI regime is aligned.

Beazley Insurance dac seeks to ensure that members of the BIdac governance bodies, all PCFs and CFs (collectively – 'approved persons') possess sufficient professional qualifications, knowledge and experience in the relevant areas of the business to give adequate assurance that they are collectively able to provide a sound and prudent management of the company. The assessment of whether a person is 'fit' shall take account of the respective duties allocated to that person and, where relevant, the insurance, financial, accounting, actuarial and management skills of the person. In the case of members of the board, the assessment shall take account of the respective duties allocated to individual members to ensure appropriate diversity of qualification, knowledge and relevant experience to ensure that the business is managed and overseen in a professional manner.

Additionally our policy is to assess the fitness of approved persons against the key competencies required by the CBI, namely:

- conduct to be competent and capable – a person shall have the qualifications, experience, competence and capacity to the relevant function;
- conduct to be honest, ethical and to act with integrity – a person must be able to demonstrate that his or her ability to perform the relevant function is not adversely affected to a material degree; and
- financial soundness – a person shall manage his or her affairs in a sound and prudent manner.

Our policy is to apply this approach to both external and internal appointments. We then tailor individual development plans, including mentoring as appropriate, for the appointee to ensure that they are able to fulfil their obligations in their approved person roles.

B.3 Risk management system including the own risk and solvency assessment

Risk management strategy

The Beazley Insurance dac risk and compliance committee provides oversight of the risk management framework and reports to the Beazley Insurance dac board. Beazley Insurance dac risk management sits within and is in accordance with the group's overall risk management framework.

Clear roles, responsibilities and accountabilities are in place for the management of risks and controls, and all employees and BML staff working on behalf of the company are aware of the role they play in all aspects of the risk management process, from identifying sources of risk to their part in the control environment. The impact of each risk is recorded in the risk register on a 1:10 likelihood of that risk manifesting in the next 12 months. A risk owner has been assigned responsibility for each risk, and it is the responsibility of that individual to periodically assess the impact of the risk and to ensure appropriate risk mitigation procedures are in place. External factors facing the business and the internal controls in place are routinely reassessed and changes are made when necessary. On an annual basis, the board agrees the risk appetite for each risk event and this is documented in the risk management framework document. The residual financial impact is managed in a number of ways, including:

- mitigating the impact of the risk through the application of controls;
- transferring or sharing risk through outsourcing and purchasing insurance and reinsurance; and
- tolerating risk in line with the risk appetite.

In addition, the following risk management principles have been adopted:

- risk management is a part of the wider governance environment;
- techniques employed are fit for purpose and proportionate to the business;
- risk management is a core capability for all employees;
- risk management is embedded in day-to-day activities;
- there is a culture of risk awareness, in which risks are identified, assessed and managed;
- risk management processes are robust and supported by verifiable management information; and
- risk management information and reporting is timely, clear, accurate and appropriately escalated.

B. System of governance *continued*

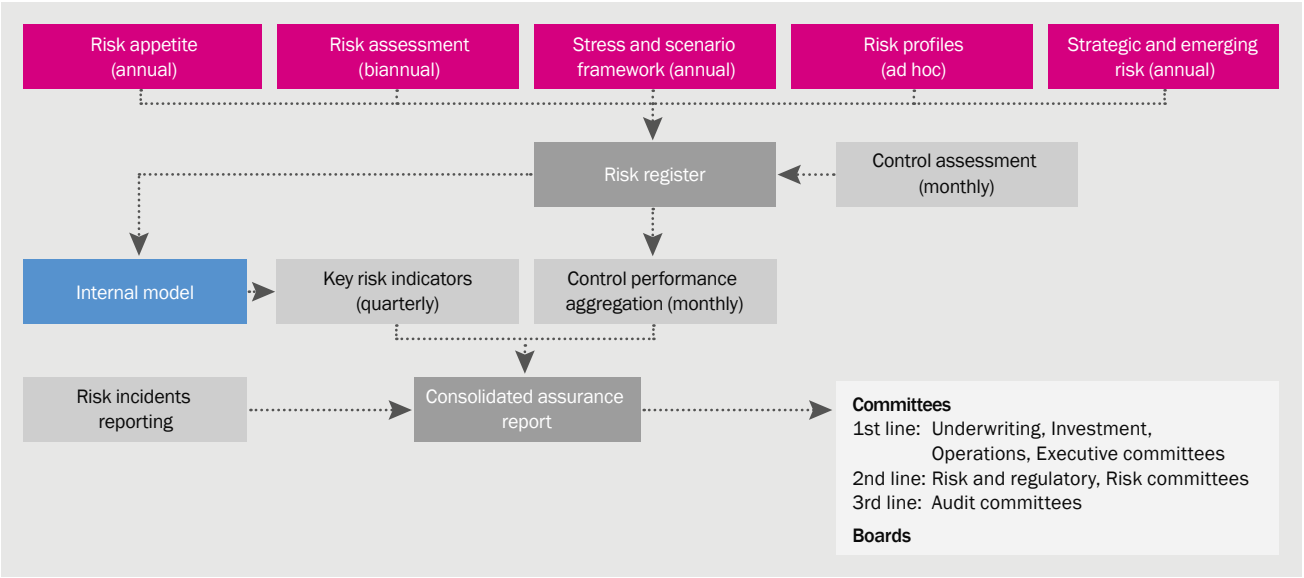
B.3 Risk management system including the own risk and solvency assessment *continued*

Risk management framework

Beazley has adopted the 'three lines of defence' framework: Across the business, there are two defined risk and control roles: risk owner and control reporter. Each risk event is owned by the risk owner who is a senior member of staff. Risk owners, supported by the risk management team, formally perform a risk assessment twice a year, including an assessment of heightened and emerging risks.

Business risk management *Risk ownership*	*Risk management* *Risk oversight*	*Internal audit* *Risk assurance*
– *Identifies risk* – *Assesses risk* – *Mitigates risk* – *Monitors risk* – *Records status* – *Remediates when required*	– *Are risks being identified?* – *Are controls operating effectively?* – *Are controls being signed off?* – *Reports to committees and board*	– *Independently tests control design* – *Independently tests control operation* – *Reports to committees and board*

The risk management framework comprises a number of risk management components, which when added together describe how risk is managed on a day to day basis. The framework includes a Beazley Insurance dac risk register that captures the risk universe (52 risk events grouped into eight risk categories: insurance, market, credit, liquidity, operational, regulatory and legal, group and strategic), the risk appetite set by the Beazley plc board and cascaded to Beazley Insurance dac and the control environment that is operated by the business to remain within the risk appetite which is monitored and signed off by control reporters.



In summary, the board identifies risk, assesses risk and approves risk appetite. The business then implements a control environment which describes how the business should operate to stay within risk appetite. Risk management then reports to the board on how well the business is operating using a risk management report. For each risk, the risk management report brings together a view of how successfully the business is managing risk, and whether there have been any events that we can learn from (risk incidents). Finally, the framework is continually evaluated and where appropriate improved, through the consideration of stress and scenario testing, themed reviews using risk profiles and an assessment of strategic and emerging risks. There were no material changes made during 2019.

A suite of risk management reports are provided to the board and committees to assist senior management and board members to discharge their oversight and decision making responsibilities. The risk reports include the risk appetite statement, the risk management report, risk profiles, stress and scenario testing, reverse stress testing, an emerging and strategic report, a report to the remuneration committee and the Own Risk and Solvency Assessment (ORSA) report.

B.3 Risk management system including the own risk and solvency assessment *continued*

The internal audit function considers the risk management framework in the development of its audit universe to determine its annual risk-based audit plan. The plan is based on, among other inputs, the inherent and residual risk scores as captured in the risk register. Finally, a feedback loop operates, with recommendations from the internal audit reviews being assessed by the business and the risk management function for inclusion in the risk register as appropriate.

Own risk and solvency assessment

The Solvency II directive indicates that the ORSA is 'the entirety of the processes and procedures employed to identify, assess, monitor, manage, and report the short and long term risks a company faces or may face and to determine the own funds necessary to ensure that the undertaking's overall solvency needs are met at all times'.

In other words, the ORSA is the consolidation of a collection of processes resulting in the production of a quarterly report to provide the Beazley Insurance dac risk and compliance committee and Beazley Insurance dac board with sufficient information to enable an assessment of the short term and long term risks faced by the entity and the capital required to support these risks.

The majority of these underlying processes have existed at Beazley Insurance dac for some time and so an important role of the ORSA is to ensure that the timing of these processes are coordinated in order to provide the appropriate management information in a timely manner.

Beazley Insurance dac's interpretation is that there are three parts to the ORSA deliverables:

- ORSA governance;
- ORSA processes: coordination of a number of underlying processes; and
- ORSA reports: summary of the findings from these processes.

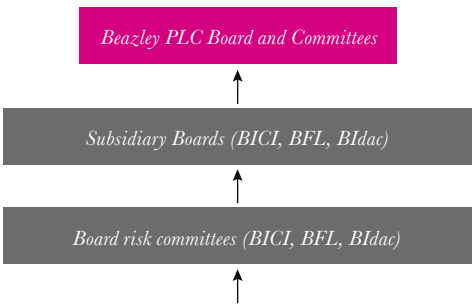
ORSA governance

The risk management function is responsible for the coordination of the ORSA process and the production of the ORSA report.

The ORSA process is run regularly on a quarterly basis (unless the risk profile significantly changes, see below). As the underlying processes are not all updated on a quarterly basis, we will use the latest version of each. The timeframes and interactions between the underlying processes over a typical year are set out below.

The BIdac risk and compliance committee will oversee an ad hoc ORSA outside this regular reporting period when there has been a material change to the risk profile or the environment within which Beazley Insurance dac is operating. The triggers for such an ad hoc ORSA are:

- major internal model changes as per model change policy;
- new business plan is submitted to the CBI;
- prior completion of a board sponsored acquisition; and
- any other changes deemed by the board to be significant.



	Pillar I	Pillar II	Pillar III
Oversight Committee	Risk and Regulatory committee		Audit Committee
Working Group	Internal Model Group (IMG)	N/A	Regulatory review Committee

B. System of governance *continued*

B.3 Risk management system including the own risk and solvency assessment *continued*

Committee and board oversight

An ORSA report is produced after the completion of each ORSA process and is reviewed by Beazley Insurance dac risk and compliance on a quarterly basis. In addition to providing challenge from a non-executive perspective, this review also forms part of the quality assurance process. The ORSA is then presented to the board for consideration and approval.

On an annual basis, a more detailed year end ORSA is produced for submission to the CBI. This regulatory ORSA combines the contents of the quarterly ORSAs reviewed by the board. In addition, it contains any other supporting information requested by the CBI such as policies and supplementary evidence. An assessment is made against the regulatory guidance prior to submission to regulators to ensure that the ORSA meets the relevant regulatory requirements.

The Beazley Insurance dac risk and compliance committee and board evidence the consideration of the ORSA by way of minutes to demonstrate the discussion, decision making and actions taken as a result of the ORSA.

The ORSA is subject to an independent review by internal audit as part of their risk based audit.

Relationship between the internal model and the ORSA

The internal model is an important input into the ORSA. The ORSA uses the same internal model and basis as that used to estimate the Solvency Capital Requirement (SCR) and so there is no difference in the recognition and valuation bases. Any limitations of the internal model relevant to the ORSA will be discussed in the regulatory ORSA. Any risks not covered by the internal model are considered in the ORSA report.

ORSA process

The underlying processes that make up Beazley Insurance dac's ORSA process are summarised in the table below.

Process	Process owner / oversight committee
Beazley Insurance dac and Beazley Group strategy Bi-annual strategy and performance group meetings Annual board strategy away day Monthly monitoring of the strategic initiatives by the executive committee	Chief executive officer Executive committee Board
Risk appetite Approve risk appetite statements Approve annual risk appetite levels for Beazley Insurance dac	Chief risk officer Board
Risk assessment – current Risk profile Risk management report: • control performance and comments from assurance function; • comparison of residual risk score with risk appetite; and • risk incident log entries. Assessment of key risk indicators Exposure management Changes to risk profile	Chief risk officer Risk and compliance committee
Risk assessment – future Bi-annual risk assessment with risk owners Annual review of strategic and emerging risks Risk profiles	Chief risk officer Risk and compliance committee
Stress and scenario testing Stress testing Scenario testing Reverse stress testing	Chief risk officer Risk and compliance committee
One year business plan Challenge process overseen by underwriting committee Formal report produced by underwriting committee	Chief underwriting officer Underwriting committee Board

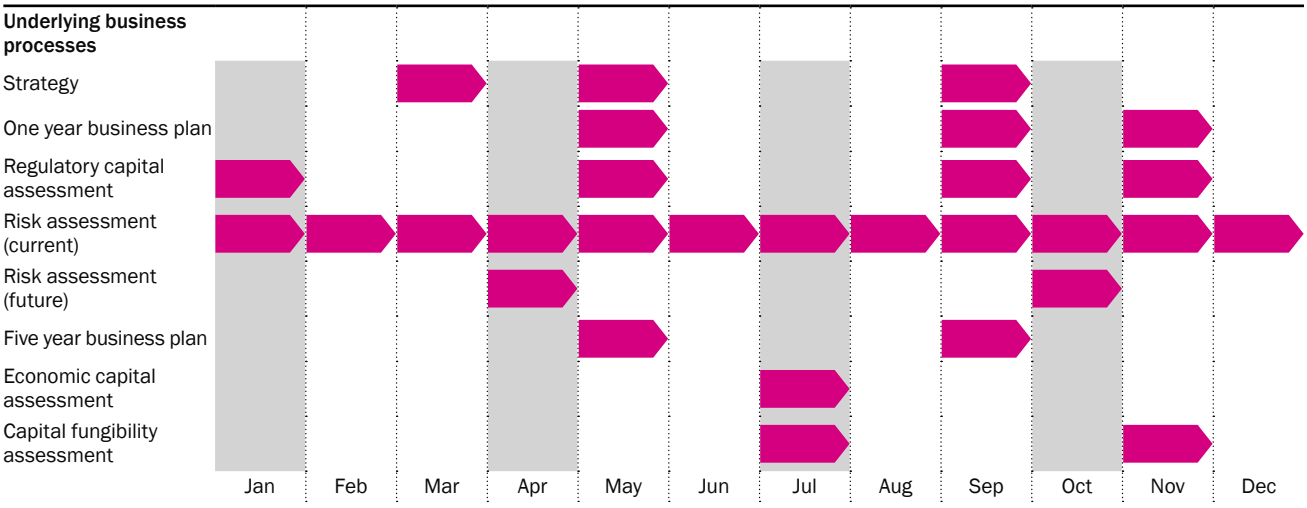
B.3 Risk management system including the own risk and solvency assessment *continued*

Process	Process owner / oversight committee
Regulatory capital assessment Parameterised from one year business plan Analysis of change and capital requirement agreed with regulators	Chief risk officer Risk and compliance committee
Economic capital assessment Capital required to achieve and maintain rating agency ratings Capital fungibility Establish dividends in line with dividend strategy	Finance director Executive committee Board
Five year business plan Bi-annual update of the five year plan Consideration of a number of scenarios based on macro economic trends Assessment of capital requirements under each scenario Identification of capital and dividend stress points	Chief underwriting officer Executive committee Board

The current timetabling of the underlying processes throughout a typical year is illustrated below. The shaded months indicate when the ORSA process occurs and the report is provided to the risk and regulatory committee for onwards reporting to the Beazley Insurance dac risk and compliance committee and the Beazley Insurance dac board.

Each of the four regular ORSA processes has been aligned with the timing of the cascade of reporting to the Beazley Insurance dac risk and compliance committees and the Beazley Insurance dac board. An ORSA report will be produced after the completion of each ORSA process to address the required confirmation statements, set out the key themes arising from the underlying processes and summarise any action being proposed.

Timetabling during a typical year

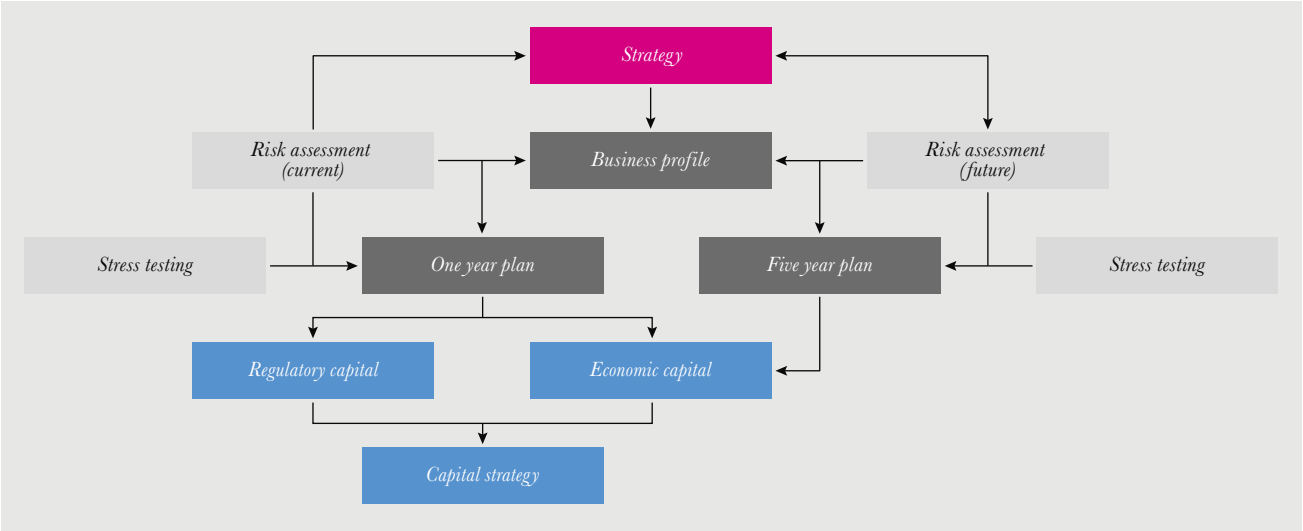


The linkages between the underlying processes are illustrated below. Each process will take the most up to date information from other processes.

B. System of governance *continued*

B.3 Risk management system including the own risk and solvency assessment *continued*

Linkages between underlying processes



B.4 Internal control system

Beazley's internal control system includes administrative and accounting procedures, an internal control framework, appropriate reporting arrangements at all levels of the business and a compliance function. It is designed to:

- secure compliance with applicable laws, regulations and administrative processes, the effectiveness and efficiency of operations in view of the business objectives and the availability and reliability of financial and non-financial information;
- ensure that adequate and orderly records of the business and internal organisation are maintained; and
- create a strong control environment with control activities that are adequately aligned to the risks of the business and the group's processes.

The effectiveness of the internal control system is monitored regularly to ensure that it remains relevant, effective and appropriate.

Beazley operates a three lines of defence framework and the actuarial function and the three assurance functions of compliance, risk management and internal audit are defined as 'required' functions under the Solvency II framework. Each function is structured so that it is free from influences which may compromise its ability to undertake its duties in an objective, fair and independent manner and in the case of the internal audit function in a fully independent manner.

The board receives assurance that the business is operating how it expects from the following required functions:

- the actuarial function provides assurance that the reserves held on the balance sheet are appropriate;
- the compliance function provides assurance that Beazley is operating within the relevant legal and regulatory framework;
- the risk management function provides assurance that the business is operating within risk appetite; and
- the internal audit function provides assurance that the whole internal control framework (including the activities of the other functions set out above) is designed and operating effectively.

Compliance function

The Beazley Insurance dac board has set a residual minimal risk appetite for regulatory breaches. Directors, senior management and staff are all expected to comply with these high standards of ethical business conduct.

1. Compliance within the corporate governance and risk management frameworks

Whilst ultimately the board of Beazley Insurance dac (BIdac) is responsible for ensuring compliance with the relevant regulations, Beazley Insurance dac's governance framework includes a number of board and executive committees with delegated authority to consider matters within their remit.

The BIdac head of compliance is a member of the operations group, the branch management committee and the CBI regulatory reporting committee and attends by invitation the risk and compliance committee, underwriting committee and the reinsurance underwriting committee. The function may provide updates to these forums.

Within the group's risk management framework, the compliance function's activities fall within both the first and second 'lines of defence'.

B.4 Internal control system *continued*

2. Compliance framework

Independence and authority

To help ensure independence, the Beazley Insurance dac head of compliance and the function have full and free access to the Beazley Insurance dac Chair of the Risk and Compliance committee, the Chair of the Audit Committee and the Chair of the Board of Directors. The function is authorised to have full, free and unrestricted access to all members of Beazley Insurance dac's management, its books and records, physical properties, vendors, and other sources of information relevant to the performance of its work.

Within the compliance function itself, compliance monitoring is performed by a separate team which has a direct reporting line to the global Head of Compliance.

Adequacy of resources

It is important that the function is appropriately resourced to meet the current and future needs of the business. A review of compliance resources is carried out as necessary and at least annually as part of the planning process. In situations where additional resources are needed in the short term (e.g. for projects), compliance management will consider the use of contract and temporary staff.

Risk appetite

The compliance function undertakes all of its responsibilities within the regulatory risk appetite set by the board. Within the risk management framework, there are four regulatory risk events with associated controls. The compliance function is responsible for these events including reporting on the controls mapped to them:

- *Regulatory and legal risk* – risk arising from not complying with external regulatory and legislative requirements leading to financial loss, sanctions or reputational damage;
- *Trading status* – risk arising from Beazley Insurance dac and staff trading without appropriate licences and permissions leading to financial loss, sanctions or reputational damage;
- *Regulatory reporting* – risk arising from insufficient or incorrect disclosures to relevant regulatory authorities leading to financial loss, sanctions or reputational damage; and
- *Financial crime risk* – risk of regulator or police action as a result of money laundering, breach of trading restrictions, internal or external fraud, bribery or corruption or other financial crime leading to financial loss, sanctions or reputational damage.

3. Compliance activities

The function's two overarching activities, Advisory and Monitoring fit within the three lines of defence as follows:

Advisory (first line of defence): Assessing the potential impact of changes in the legal & regulatory environment to the group. Advising, and where applicable training, the business on the proper application of upcoming and existing regulatory requirements in relation to both, business as usual, and project activities. Amending policies and procedures accordingly and providing corresponding training where necessary.

Monitoring (second line of defence): Providing assurance that the group's regulatory policies and procedures are being adhered to, which in turn ensures the business operates within established external regulatory requirements.

The function's other key activities are summarised below.

Regulatory relationships: The compliance function coordinates Beazley Insurance dac's relationship with the Central Bank of Ireland.

Authorisations, licences and permissions: The function is responsible for obtaining the necessary authorisations, licences and permissions for the company. This is to ensure that the company and its employees have the appropriate authorities throughout each country for their business activities. Some of the general types of licenses and permissions are listed below with detailed descriptions in the compliance manual:

- Central Bank of Ireland permissions – legal entity and individuals;
- Approved persons and competency requirements
- Freedom of Establishment permissions;
- Freedom of Services permissions; and
- Permissions to expand the scope of the company's business beyond what has been agreed with the Central Bank of Ireland.

B. System of governance *continued*

B.4 Internal control system *continued*

Group policies: The function is responsible for ensuring group policies align to Beazley Insurance dac regulatory requirements and make any adjustments as necessary to the following group policies:

Whistleblowing – The function supports the Chair of the plc Audit and Risk committee in their overall ownership of the group's whistleblowing process. Details of the process and compliance's responsibilities can be found in the whistleblowing policy.

Financial Crime – This policy is owned by the compliance function, which is responsible for setting and disseminating the policy and its associated control framework.

Sanctions – This policy is owned by the Group Head of Compliance and the function is primarily responsible for: 1) advising on appropriate preventative controls, 2) monitoring that the controls are being implemented by the business, and 3) perform enhanced due diligence when required by the policy.

Anti-Fraud – This policy is owned by the Group Head of Compliance who is responsible for: 1) maintaining and communicating this policy, 2) delivering mandatory anti-fraud training, and 3) monitoring the application of the policy when alerted to a potential fraud.

Gifts and hospitality – Owned by the Group Head of Compliance and Marketing team, this policy explains the group's approach to giving and receiving gifts and hospitality.

Anti-Bribery and Corruption – Owned by the Group Head of Compliance, this policy sets out how employees need to comply with anti-bribery and corruption rules and regulation.

Committee and board reporting: The function provides regular reports to the Risk and Compliance committee and other committees in the executive governance framework. The reports are designed to facilitate oversight of the function's activities, or provide updates on internal and external regulatory matters.

Regulatory returns: The CBI (and other regulators) require BIdac to submit regulatory returns. For some of those returns the function plays a key role supporting the business to ensure they are filed with our regulators in a timely and accurate fashion. The function may work closely with other areas, such as finance, data management, and the regulatory review committee, to support the accurate and timely filing of returns.

Regulatory breaches: The function is responsible for reporting regulatory breaches both within the internal governance framework and externally as required.

Product development: The function provides regulatory and legal assistance during the design and launching of new products, including the expansion of existing products. Assistance includes legal research and advice to ensure products are developed efficiently, consistent with local regulations and in line with the group's regulatory risk appetite.

Complaints: The complaints team which is part of the conduct review group is responsible for the complaints policy. The compliance function assists with complaints activity for example by reviewing and monitoring the effectiveness of the complaints handling process and reports complaint activity and root cause analysis to the Insurance Underwriting Group.

B.5 Internal audit function

The internal audit team implementation

The roles, responsibilities, remit, objectives, processes and reporting procedures of the internal audit function have been set out in an internal audit charter approved by the BIdac audit committee. For functional purposes the head of internal audit reports to the chair of Beazley plc audit and risk committee and, for administrative purposes to the Beazley plc chief executive officer. The internal audit charter is reviewed and approved every year by the BIdac audit committee.

The internal audit function operates as a global audit team and has resources that are appropriate, sufficient, and effectively deployed to achieve the approved annual internal audit plan. Internal audit resource requirements (headcount and co-sourcing) are approved on an annual basis by the Beazley plc audit and risk committees.

In addition to its headcount the internal audit function has a budget which it uses to supplement its team with subject-matter expertise through co-sourcing.

The internal audit function has an 'audit universe'. The Beazley plc audit universe is used as a reference for the BIdac audit universe. Both audit universes represents the potential range of business areas and topics – known as 'audit entities' – that internal audit reviews based on risk and cyclicality. The frequency with which audit entities are reviewed is also considered in light of regulatory requirements and emerging risks. The BIdac audit committee has agreed that all entities are audited at least once a year on a four year cycle (i.e cyclically).

The remit of the internal audit function extends to any business activity undertaken for BIdac. Using a risk based methodology, audit entities are prioritised with a view to ensuring that the most material or highest risk audit entities are audited most frequently. The internal audit function also considers the audits included in the Beazley plc annual internal audit plan on which BIdac audit committee will rely as a key component to developing the BIdac annual internal audit plan.

B.5 Internal audit function *continued*

The Beazley plc audit universe – and the resulting annual internal audit plan – is reviewed and approved annually by the Beazley plc audit and risk committee. The BIdac audit universe – and the resulting BIdac annual internal audit plan – is reviewed and approved annually by the BIdac audit committee. The Beazley plc annual internal audit plan consists of dedicated BIdac audits in addition to group-wide audits which may cover business activity undertaken by the group on BIdac's behalf. Any potential changes to the BIdac internal audit plan are proposed and agreed with the BIdac audit committee. Typically the annual internal audit plan for BIdac consists of between 1-3 audits and cover topics which include, for example: underwriting; governance;risk management;reserving etc.

Generally the Beazley plc annual internal audit plan consists of between 15-25 audits and cover topics which include, for example: underwriting; claims; IT and information security; and compliance.

The BIdac audit committee has the authority to add, remove or change the internal audit plan as required. During the year, the BIdac audit committee continually assess whether the annual internal audit plan remains appropriate. This mirrors the Beazley plc approach.

An established part of the internal audit process includes undertaking work to verify that management has adequately completed actions arising from audits. The internal audit function undertakes verification work over management's audit actions on a risk-based approach (i.e. the internal audit function checks evidence related to all high actions and checks evidence for a risk based sample of medium and low actions). To date, where verification work has been undertaken it has been very rare for the internal audit function to identify issues with the actions management have confirmed they would implement. Verification work can include, for example: interviewing staff, reviewing documentation and re-performing the control. Overdue actions are reported to the BIdac audit committee as part of ongoing audit committee reporting.

Internal Audit's independence and objectivity

The internal audit function's independence and objectivity is maintained in a number of ways:

- the head of internal audit reports to a non-executive director (the chair of the Beazley plc audit and risk committee), and for operational matters to the Beazley plc chief executive officer;
- the BIdac audit committee annually reviews and approves an internal audit charter that sets out the roles and responsibilities of the head of internal audit and the internal audit function;
- the internal audit function is not mandated to undertake any form of business activity and its remit is restricted to assurance and consultation work as set out in the internal audit charter;
- the BIdac annual internal audit plan is approved by the BIdac audit committee (a non-executive committee);
- the head of internal audit rotates staff between audit assignments to ensure objectivity and independence; and
- the head of internal audit must provide annual representations to the BIdac audit committee on the ongoing independence and objectivity of the internal audit function.

B.6 Actuarial function

BIdac has a Head of Actuarial Function (HOAF) as required under the CBI Domestic Actuarial Regime. The BIdac HOAF reports to the group actuary. Actuarial services are provided under the management services agreement with Beazley Management Limited (BML) by the group function located in London. The actuarial function fulfills the regulatory role as outlined under Solvency II and associated Central Bank guidance and provides professional actuarial advice to BIdac in a range of other areas as required. The HOAF can express actuarial/professional opinions free from undue influence from the business. The members of the actuarial function are required to be objective and take reasonable steps to ensure they are free from bias or from conflicts of interest that could suggest bias. The HOAF does not perform any other function at Beazley that could give rise to a conflict of interest.

The actuaries that comprise the actuarial function are fellows/students of the Society of Actuaries in Ireland/Institute & Faculty of Actuaries (or equivalent) and operate under the standards set out by those bodies and the Financial Reporting Council (or equivalent).

The head of actuarial function is responsible for producing an annual actuarial opinion on technical provisions to be submitted to the CBI in accordance with the Solvency II annual quantitative reporting templates. In addition, the head of actuarial function must present an actuarial report on technical provisions, at least in summary form, to the board at the same time as the actuarial opinion on technical provisions and in full within two months of that date.

In addition the head of actuarial function role must provide:

- an opinion on the underwriting policy;
- an opinion on the reinsurance arrangements; and
- a contribution to the risk management system (including the opinion on the ORSA).

B. System of governance *continued*

B.6 Actuarial function *continued*

Board interaction

The head of actuarial function and the actuarial function have a number of interactions with the board and its various committees. Examples of this include (but are not limited to):

- the head of actuarial function is a member of the BIdac insurance and reinsurance underwriting committees and presents to those committees on a number of areas including pricing, rate change and reserving (including summary output from the peer review committee);
- the head of actuarial function (or members of the actuarial function) presents the BIDAC audit committee with results of the technical provision valuation;
- the head of actuarial function (or members of the actuarial function) presents the BIdac audit committees with the actuarial function report;
- the head of actuarial function presents the ORSA opinion to the Risk and Compliance committee;
- the peer review committee of BFL, delegated from the underwriting committee of BFL, carries out detailed reviews of reserves. Here, the members of the actuarial function of BFL present details of their reserving output as well as that from the underwriting teams. The BIDAC head of actuarial function for BIDAC attends these meetings; and
- the head of actuarial function has regular catch ups with the Group Actuary and chair of the audit committee when required.

Interaction with other key functions

The actuarial function at Beazley interacts with key functions as summarised below:

Function	Relationship
Underwriting teams	The actuarial function provides support and challenge during the business planning process, support on pricing of risks and development of pricing tools and analysis in support of reinsurance purchase and optimisation.
Claims teams	The actuarial function interacts with claims managers throughout the quarterly claims reserving process and particularly during the pre-peer reviews where individual assessments are reviewed.
Risk management	The actuarial function reviews the initial reserve risk ranges from the internal model and adjusts the range in specific cases where it is not deemed appropriate. The risk function provides the actuarial function with internal model output and assumptions for use in the calculation of the bad debt and risk margin components of the technical provisions. The actuarial function provides the chief risk officer with actuarial support when needed and is involved in a number of other areas of the ORSA.
Talent management	Support the training and development needs of the actuarial function such that a professional staff can be maintained with sufficient skills, experience and professional qualifications to meet the requirements of the actuarial function.
Data management	The actuarial function is a key consumer of data at Beazley and that data is managed by the data management team. The data management team and various business system owners ensure that the actuarial function has the internal data necessary to discharge its responsibilities. The key data inputs for the actuarial function are the gross and net triangles produced on a monthly basis.
Finance	The actuarial function and finance function work closely together, particularly during the valuation of insurance liabilities on an underwriting year, GAAP or Solvency II basis. The finance function provides the expense provision valuation for technical provisions.
IT	The actuarial function relies on IT for the maintenance of its hardware and software to agreed service levels, and for the delivery of agreed projects.
Underwriting and claims operations	Ensure the data in the source systems is of the required quality.

B.7 Outsourcing

Although activities may be transferred to an outsourced provider, the responsibility, including regulatory responsibility is not.

BIdac remains fully responsible for meeting all of its obligations when outsourcing functions or activities.

Outsourcing of critical or important functions or activities shall not be undertaken in such a way as to lead to any of the following:

- materially impairing the quality of the system of governance of the undertaking concerned;
- unduly increasing the operational risk;
- impairing the ability of the supervisory authorities to monitor the compliance of the undertaking with its obligations; and
- undermining continuous and satisfactory service to policy holders.

The board of BIdac is responsible for ensuring that the outsourcing policy and the outsourcing arrangements themselves comply with the relevant regulations for ensuring that due skill, care and diligence is exercised when entering into, managing or terminating any arrangement for the outsourcing to a service provider of critical, important or material functions or activities.

Beazley requires service providers to cooperate with the relevant supervisory authorities in connection with the outsourced function or activity. The service provider is required to notify and seek Beazley approval prior to sub-contracting any of the outsourced function and the due diligence undertaken. Any sub-contract is required to contain no lesser terms and conditions as that of the main contract with Beazley. Beazley staff, auditors and the relevant supervisory authorities have effective access to data related to the outsourced functions or activities and, where appropriate, the supervisory authorities have effective access to the business premises of the service provider and must be able to exercise those rights of access.

BIdac has entered into a management services agreement with BML, a UK company, in relation to certain services that are provided centrally.

Services covered by the agreement relate to:

- information technology;
- talent management;
- commercial management and facilities;
- actuarial;
- internal audit;
- risk management;
- compliance;
- finance;
- underwriting;
- claims;
- ceded reinsurance;
- marketing, brand and communications;
- company secretariat;
- corporate development;
- operations; and
- legal services.

The services provided by BML are closely monitored by the BIdac operations group. The agreement is reviewed annually and, where material, changes are brought to the board for consideration and approval.

The operations group submits a report to the BIdac board on the performance of the services to BIdac for each board meeting.

BIdac has also entered into a delegated authority underwriting agreement with Beazley Solutions Limited and Beazley Solutions International Limited for the provision of underwriting and claims services.

B.8 Any other information

There is no other material information to report.

As disclosed in further detail at section A.5, the company continues to monitor and respond to the global COVID-19 outbreak.

C. Risk profile

Beazley Insurance dac (BIdac or the company), in conjunction with the group, has identified the risks arising from its activities and has established policies and procedures to manage these items in accordance with its risk appetite. Beazley Insurance dac is exposed to risks both directly and, through its reinsurance contracts with Beazley Underwriting Limited (BUL). The group categorises its risks into eight areas: insurance, strategic, market, operational, credit, regulatory and legal, liquidity and group risk. The sections below outline the group's risk appetite and explain how it defines and manages each category of risk. The amount of risk taken, and therefore capital required, by risk category is shown section E.2.

The risk management framework described in section B.3 includes the ongoing assessment of these risks and of the continued effectiveness of risk mitigation techniques.

The stress and scenario framework is an important element of the risk management framework. The stress and scenario framework is applied to a range of business processes to assist management understand the vulnerabilities within the business model. This approach encourages management's involvement in risk oversight by using real life scenarios to provide qualitative and quantitative information on what risks might look like under stressed conditions and encourages a forward looking view of risk.

In addition, as a validation tool the stress and scenario framework tests:

- assumptions, particularly where data is sparse;
- assumed correlations between assumptions;
- the availability of resources and what action might be required under stressed situations;
- whether controls perform as expected under stressed situations; and
- the effect of changes in the operating environment (e.g. external events).

There are three elements to the framework:

- **Stress testing** involves looking at the impact on the business model of changing a single factor.
- **Scenario testing** involves the impact on the business model of simulating or changing a series of factors within the operating environment.
- **Reverse stress testing** involves considering scenarios that are most likely to render the current business model to become unviable.

C.1 Underwriting risk

Beazley Insurance dac assumes insurance risk through its reinsurance contract with BUL and through the direct insurance it writes in Europe and the UK. The four key components of insurance risk are underwriting, reinsurance, claims management and reserving. Each element is considered below.

a) Underwriting risk

Underwriting risk comprises three categories; attritional claims, large claims and catastrophe events. In addition, all classes of business are impacted by a key driver of risk, market cycle risk, which is the risk that business is written without full knowledge as to the adequacy of rates, terms and conditions.

The Beazley Insurance dac underwriting strategy is to seek a diverse and balanced portfolio of risks in order to limit the variability of outcomes. This is achieved by accepting a spread of business over time, segmented between different products, geographies and sizes.

The annual business plans for each underwriting team reflect the underwriting strategy, and set out the classes of business, the territories and the industry sectors in which business is to be written. These plans are approved by the board of Beazley Furlonge Limited (BFL) for syndicate business and by the board of BIdac for insurance business.

Our underwriters calculate premiums for risks written based on a range of criteria tailored specifically to each individual risk. These factors include but are not limited to the financial exposure, loss history, risk characteristics, limits, deductibles, terms and conditions and acquisition expenses.

Beazley Insurance dac also recognises that insurance events are, by their nature, random, and the actual number and size of events during any one year may vary from those estimated using established statistical techniques.

To address this, Beazley Insurance dac sets out the exposure that it is prepared to accept in certain territories to a range of events such as natural catastrophes and specific scenarios which may result in large industry losses. This is monitored through regular calculation of realistic disaster scenarios (RDS). The aggregate position is monitored at the time of underwriting a risk, and reports are regularly produced to highlight the key aggregations to which the Beazley Insurance dac is exposed.

C.1 Underwriting risk *continued*

A number of modelling tools to monitor its exposures against the agreed risk appetite set and to simulate catastrophe losses in order to measure the effectiveness of its reinsurance programmes. Stress and scenario tests are also run using these models. The range of scenarios considered includes natural catastrophe, cyber, marine, liability, political, terrorism and war events as applicable.

One of the largest types of event exposure relates to natural catastrophe events such as windstorm or earthquake. Where possible we measure geographic accumulations and uses its knowledge of the business, historical loss behaviour and commercial catastrophe modelling software to assess the expected range of losses at different return periods. Upon application of the reinsurance coverage purchased, the key gross and net exposures are calculated on the basis of extreme events at a range of return periods.

The Beazley Insurance dac board establishes the catastrophe risk appetite and the business plans of each team are determined within these parameters. The Beazley plc board may adjust these limits over time as conditions change. In 2019 Beazley Insurance dac operated to a catastrophe risk appetite for a probabilistic 1-in-250 years US event of $312.0m net of reinsurance (2018: $312.0m).

Beazley Insurance dac also has exposure to man-made claim aggregations, such as those arising from terrorism and data breach events. Beazley Insurance dac chooses to underwrite data breach insurance within the cyber and executive risk and the specialty lines divisions using our team of specialist underwriters, claims managers and data breach services managers. Other than for data breach, Beazley Insurance dac's preference is to exclude cyber exposure where possible.

To manage the potential exposure, the board has established a risk budget for the aggregation of data breach related claims which is monitored by reference to the largest of the RDSs that have been developed internally. These scenarios include the failure of a data aggregator, the failure of a shared hardware or software platform, the failure of a cloud provider and a ransomware event. Whilst it is not possible to be precise, as there is sparse data on actual aggregated events, these severe scenarios are expected to be very infrequent. The reinsurance programmes that protect the cyber and executive risk and specialty lines divisions would partially mitigate the cost of most, but not all, data breach catastrophes.

The RDSs monitor both data breach and property damage related cyber exposure. Given Beazley Insurance dac's risk profile, the quantum from the data breach scenarios is larger than any of the cyber property damage related scenarios.

To manage underwriting exposures, the group has developed limits of authority and business plans which are binding upon all staff authorised to underwrite and are specific to underwriters, classes of business and industry.

These authority limits are enforced through a comprehensive sign-off process for underwriting transactions including dual sign-off for all line underwriters and peer review for all risks exceeding individual underwriters' authority limits. Exception reports are also run regularly to monitor compliance.

All underwriters also have a right to refuse renewal or change the terms and conditions of insurance contracts upon renewal.

Rate monitoring details, including limits, deductibles, exposures, terms and conditions and risk characteristics are also captured and the results are combined to monitor the rating environment for each class of business.

Where risks are transacted by third parties under delegated underwriting authorities. Each third party is thoroughly vetted by our coverholder approval group before it can bind risks, and is subject to rigorous monitoring to maintain underwriting quality and confirm ongoing compliance with contractual guidelines.

b) Reinsurance risk

Beazley Insurance dac participates in the group reinsurance program for the insurance and reinsurance business it writes in Europe. It is further exposed if any of the group's reinsurers fail to meet their commitments. Reinsurance risk to the group arises where reinsurance contracts put in place to reduce gross insurance risk do not perform as anticipated, result in coverage disputes or prove inadequate in terms of the vertical or horizontal limits purchased. Failure of a reinsurer to pay a valid claim is considered a credit risk.

The group's reinsurance programmes complement the underwriting team business plans and seek to protect group capital from an adverse volume or volatility of claims on both a per risk and per event basis. In some cases the group deems it more economic to hold capital than purchase reinsurance. These decisions are regularly reviewed as an integral part of the business planning and performance monitoring process.

The group's reinsurance security committee examines and approves all reinsurers to ensure that they possess suitable security. The group's ceded reinsurance team ensures that these guidelines are followed, undertakes the administration of reinsurance contracts and monitors and instigates our responses to any erosion of the reinsurance programmes.

The Beazley Insurance dac board has oversight of its participation in the group reinsurance program.

C. Risk profile *continued*

C.1 Underwriting risk *continued*

c) Claims management risk

Claims management risk may arise in the event of inaccurate or incomplete case reserves and claims settlements, poor service quality or excessive claims handling costs. These risks may damage the Beazley Insurance dac brand and undermine its ability to win and retain business, or incur punitive damages. These risks can occur at any stage of the claims life cycle.

The claims teams are focused on delivering quality, reliability and speed of service to both internal and external clients. Their aim is to adjust and process claims in a fair, efficient and timely manner, in accordance with the policy's terms and conditions, the regulatory environment, and the business's broader interests. Prompt and accurate case reserves are set for all known claims liabilities, including provisions for expenses.

d) Reserving and ultimate reserves risk

Reserving and ultimate reserves risk occurs where established insurance liabilities are insufficient through inaccurate forecasting, or where there is inadequate allowance for expenses and reinsurance bad debts in provisions.

To manage reserving and ultimate reserves risk, our actuarial team uses a range of recognised techniques to project gross premiums written, monitor claims development patterns and stress-test ultimate insurance liability balances. An external independent actuary also performs an annual review to produce a statement of actuarial opinion.

The objective of Beazley Insurance dac's reserving policy is to produce accurate and reliable estimates that are consistent over time and across classes of business. The estimates of gross premiums written and claims prepared by the actuarial department are used through a formal quarterly peer review process to independently test the integrity of the estimates produced by the underwriting teams for each class of business.

In accordance with the terms of the new reinsurance contracts, the company records an outstanding claim reserve in respect of any open year reinsurance contract with Beazley Underwriting Limited which, at the reporting date, is in a loss making position for the company. Further information in relation to the claims recorded under these contracts is provided in note 1 and note 13 of the company's 2018 annual report. A five percent increase or decrease in total claims liabilities would have the following effect on profit or loss and equity on a GAAP basis.

	5% increase in claims reserves		5% decrease in claims reserves	
Sensitivity to insurance risk (claims reserves)	2019 $m	2018 $m	2019 $m	2018 $m
Impact on profit	**(2.5)**	(7.2)	**2.5**	7.2

C.2 Market risk

Market risk arises where the value of assets and liabilities changes as a result of movements in foreign exchange rates, interest rates and market prices. Efficient management of market risk is key to the investment of Beazley Insurance dac assets. Appropriate levels of investment risk are determined by limiting the proportion of forecast Beazley Insurance dac earnings which could be at risk from lower than expected investment returns, using a 1 in 10 confidence level as a practical measure of such risk. In 2019, this permitted variance from the forecast investment return was set at $124.0m. For 2020, the permitted variance will reduce to $115.0m. Investment strategy is developed to be consistent with this limit and investment risk is monitored on an ongoing basis, using outputs from our internal model.

Changes in interest rates also impact the present values of estimated liabilities, which are used for solvency and capital calculations. Our investment strategy reflects the nature of our liabilities, and the combined market risk of investment assets and estimated liabilities is monitored and managed within specified limits.

Beazley's investment risk controls combine to ensure that Beazley Insurance dac 'only invest in assets and instruments the risks of which we can properly identify, measure, monitor, manage and control and appropriately take into account in the assessment of our overall solvency needs' as required by the Solvency II prudent person principle. In particular:

- some investment activities are outsourced to expert managers and advisors, as appropriate, but the Beazley investments team retains responsibility for, oversees, monitors and assesses all investments of the group;
- investment parameters specify detailed quantitative restrictions for all mandates;
- the governance structure ensures that all material changes to strategy are reviewed and approved at board level;
- unusual or complex investments have separate requirements for valuation, risk modelling and governance review;
- the Beazley internal model provides a comprehensive view of asset risk for the purpose of managing Beazley Insurance dac's investments;
- derivatives use is strictly limited and monitored;
- investment key risk indicators are independently monitored and reported;
- combined financial risks of assets and liabilities are a key element of our risk management; and
- liquidity risk is actively monitored and managed.

a) Foreign exchange risk

The functional currency of the company is the US dollar. Therefore, the foreign exchange risk is that the company is exposed to fluctuations in exchange rates for non-dollar denominated transactions and net assets. However foreign exchange risk is actively managed as described below. The company is exposed to changes in the value of assets and liabilities due to movements in foreign exchange rates. The company deals in five main currencies US dollars, UK sterling, Canadian dollars, Euro and Swiss francs. Transactions in all non-dollar currencies are converted to US dollars on initial recognition and revalued at the reporting date.

C.2 Market risk *continued*

In 2019, the company managed its foreign exchange risk by periodically assessing its non-dollar exposures and hedging these to a tolerable level while targeting net assets to be predominantly US dollar denominated. On a forward looking basis an assessment is made of expected future exposure development and appropriate currency trades put in place to reduce risk.

The following table summarises the carrying value of assets categorised by currency:

Net assets by currency	UK £ $m	CAD $ $m	EUR € $m	CHF $m	Subtotal $m	US $ $m	Total $m
31 December 2019	**67.0**	**(16.2)**	**2.1**	**1.8**	**54.7**	**1,123.1**	**1,177.8**
31 December 2018	195.5	(21.3)	(5.6)	–	168.6	918.0	1,086.6

As part of this hedging strategy, exchange rate derivatives were used to rebalance currency exposure across the company. On a forward looking basis an assessment is made of expected future exposure development and appropriate currency trades put in place to reduce risk. The company's assets are matched by currency to the principal underlying currencies of its insurance liabilities. This helps mitigate the risk that the company's assets required to cover its insurance liabilities are not materially affected by any future movements in exchange rates. Fluctuations in the company's trading currencies against the US dollar would result in a change to profit after tax and net asset value. The table below gives an indication of the impact on net assets of a percentage change in the relative strength of the US dollar against the value of sterling, Canadian dollar and euro, simultaneously. The analysis is based on the current information available and is presented net of the impact of the exchange rate derivatives referenced above.

	Impact on profit after tax for the year ended		Impact on net assets	
Change in exchange rate of sterling, Canadian dollar and euro relative to US dollar	2019 $m	2018 $m	2019 $m	2018 $m
Dollar weakens 30% against other currencies	14.4	44.3	14.4	44.3
Dollar weakens 20% against other currencies	9.6	29.5	9.6	29.5
Dollar weakens 10% against other currencies	4.8	14.8	4.8	14.8
Dollar strengthens 10% against other currencies	(4.8)	(14.8)	(4.8)	(14.8)
Dollar strengthens 20% against other currencies	(9.6)	(29.5)	(9.6)	(29.5)
Dollar strengthens 30% against other currencies	(14.4)	(44.3)	(14.4)	(44.3)

b) Interest rate risk

Some of the company's financial instruments, including financial investments, are exposed to movements in market interest rates. The company manages interest rate risk by primarily investing in short duration financial investments. The board of Beazley Insurance dac monitors the duration of these assets on a regular basis.

The following table shows the average duration at the reporting date of the financial instruments. Duration is a commonly used measure of volatility and we believe gives a better indication than maturity of the likely sensitivity of our portfolio to changes in interest rates.

Duration 31 December 2019	<1 yr $m	1-2 yrs $m	2-3 yrs $m	3-4 yrs $m	4-5 yrs $m	5-10 yrs $m	>10 yrs $m	Total $m
Fixed and floating rate securities	508.5	420.1	210.7	164.2	135.2	87.6	14.3	1,540.6
Cash and cash equivalents	12.5	–	–	–	–	–	–	12.5
Derivative financial instruments	4.1	–	–	–	–	–	–	4.1
Borrowings	–	–	–	–	–	(546.8)	–	(546.8)
Total	**525.1**	**420.1**	**210.7**	**164.2**	**135.2**	**(459.2)**	**14.3**	**1,010.4**

C. Risk profile *continued*

C.2 Market risk *continued*

Duration 31 December 2018	<1 yr $m	1-2 yrs $m	2-3 yrs $m	3-4 yrs $m	4-5 yrs $m	5-10 yrs $m	>10 yrs $m	Total $m
Fixed and floating rate securities	400.0	229.2	397.5	157.6	69.7	42.1	–	1,296.1
Cash and cash equivalents	20.9	–	–	–	–	–	–	20.9
Derivative financial instruments	(6.9)	–	–	–	–	–	–	(6.9)
Borrowings	–	–	–	–	–	(248.7)	–	(248.7)
Total	**414.0**	**229.2**	**397.5**	**157.6**	**69.7**	**(206.6)**	**–**	**1,061.4**

In November 2016, the company issued $250m of subordinated tier 2 notes due in 2026. Annual interest, at a fixed rate of 5.875%, is payable in May and November each year. In September 2019, the company issued $300m of additional subordinated tier 2 notes due in 2029. Annual interest, at a fixed rate of 5.5%, is payable each year on this debt.

Sensitivity analysis

The company holds financial assets and liabilities that are exposed to interest rate risk. Changes in interest yields, with all other variables constant, would result in changes in the capital value of debt securities and a change in value of borrowings and derivative financial instruments. This would affect reported profits and net assets as indicated in the table below:

	Impact on profit after income tax for the year		Impact on net assets	
	2019 $m	2018 $m	2019 $m	2018 $m
Shift in yield (basis points)				
150 basis point increase	(43.3)	(32.9)	(43.3)	(32.9)
100 basis point increase	(28.9)	(21.9)	(28.9)	(21.9)
50 basis point increase	(14.4)	(11.0)	(14.4)	(11.0)
50 basis point decrease	14.4	11.0	14.4	11.0
100 basis point decrease	28.9	21.9	28.9	21.9

c) Price risk

Debt securities and equities that are recognised on the balance sheet at their fair value are susceptible to losses due to adverse changes in prices. This is referred to as price risk.

Investments are made in debt securities and equities depending on the company's appetite for risk. These investments are well diversified with high quality, liquid securities. The board has established comprehensive guidelines with investment managers setting out maximum investment limits, diversification across industries and concentrations in any one industry or company.

Listed investments are recognised on the balance sheet at quoted bid price. If the market for the investment is not considered to be active, then the company establishes fair value using valuation techniques. This includes using recent arm's length market transactions, reference to current fair value of other investments that are substantially the same, discounted cash flow models and other valuation techniques that are commonly used by market participants.

	Impact on profit after tax for the year ended		Impact on net assets	
	2019 $m	2018 $m	2019 $m	2018 $m
30% increase in fair value	49.2	26.9	49.2	26.9
20% increase in fair value	32.8	17.9	32.8	17.9
10% increase in fair value	16.4	9.0	16.4	9.0
10% decrease in fair value	(16.4)	(9.0)	(16.4)	(9.0)
20% decrease in fair value	(32.8)	(17.9)	(32.8)	(17.9)
30% decrease in fair value	(49.2)	(26.9)	(49.2)	(26.9)

C.2 Market risk *continued*

d) Investment risk

Managing investment risk is central to the operation and development of our investment strategy. Our internal model includes an asset risk module, which uses an economic scenario generator (ESG) to simulate multiple simulations of financial conditions, to support stochastic analysis of investment risk. We use internal model outputs to assess the value at risk of our investments, at different confidence levels, including '1 in 200', which reflects Solvency II modelling requirements, and '1 in 10', identifying a level of investment losses which are more likely to occur in practice. Risk is typically considered to a 12 month horizon. It is assessed for investments in isolation and also in conjunction with net present value of our insurance liabilities, to help us monitor and manage market risk across both sides of the balance sheet.

Our investment strategy is developed by reference to an investment risk budget, set annually by the board as part of the overall risk budgeting framework of the business. The internal model is used to monitor compliance with the budget. It is important to note that stochastic risk modelling is not a precise discipline. Our ESG outputs are regularly validated against actual market conditions, but we also use a number of other, qualitative, measures to support the monitoring and management of investment risk. These include stress testing, as well as selective historic and prospective scenario analysis.

C.3 Credit risk

Credit risk arises where counterparties fail to meet their financial obligations in full as they fall due. The primary sources of credit risk for the company are:

- investments – whereby issuer default results in the company losing all or part of the value of a financial instrument; and
- amounts receivable under the reinsurance contracts – whereby counterparties fail to pass on premiums due under the reinsurance contracts. The main credit risk exposure facing the company arises by virtue of the reinsurance contract in place with its sister company, Beazley Underwriting Limited and the underlying risk facing that company.

The company's core business is to accept significant insurance risks and the appetite for other risks is low. This protects the company's capital from erosion so that it can meet its insurance liabilities. To assist in the understanding of credit risks, AM Best, Moody's and Standard & Poor's (S&P) ratings are used. These ratings have been categorised below as used for Lloyd's reporting:

	A.M. Best	Moody's	S&P
Tier 1	A++ to A-	Aaa to A3	AAA to A-
Tier 2	B++ to B-	Baa1 to Ba3	BBB+ to BB-
Tier 3	C++ to C-	B1 to Caa	B+ to CCC
Tier 4	D, E, F, S	Ca to C	R, (U,S) 3

The following tables summarise the company's concentrations of credit risk:

31 December 2019	Tier 1 $m	Tier 2 $m	Tier 3 $m	Tier 4 $m	Unrated $m	Total $m
Financial assets at fair value						
– fixed and floating rate debt securities	914.1	626.5	–	–	–	1,540.6
– equity linked funds	–	–	–	–	135.6	135.6
– hedge funds	–	–	–	–	51.9	51.9
– derivative financial instruments	–	–	–	–	10.5	10.5
Cash and cash equivalents	12.5	–	–	–	–	12.5
Accrued interest	9.9	–	–	–	–	9.9
Claims outstanding, reinsurer's share	–	–	–	–	3.4	3.4
Debtors arising from reinsurance operations	–	–	–	–	–	–
Debtors arising from direct insurance operations	–	–	–	–	18.3	18.3
Total	**936.5**	**626.5**	**–**	**–**	**219.7**	**1,782.7**

C. Risk profile *continued*

C.3 Credit risk *continued*

31 December 2018	Tier 1 $m	Tier 2 $m	Tier 3 $m	Tier 4 $m	Unrated $m	Total $m
Financial assets at fair value						
– fixed and floating rate debt securities	867.8	428.3	–	–	–	1,296.1
– equity linked funds	–	–	–	–	53.5	53.5
– hedge funds	–	–	–	–	49.0	49.0
– derivative financial instruments	–	–	–	–	1.0	1.0
Cash and cash equivalents	20.9	–	–	–	–	20.9
Accrued interest	8.7	–	–	–	–	8.7
Claims outstanding, reinsurer's share	–	–	–	–	0.5	0.5
Debtors arising from reinsurance operations	–	–	–	–	121.2	121.2
Debtors arising from direct insurance operations	–	–	–	–	4.3	4.3
Total	**897.4**	**428.3**	**–**	**–**	**229.5**	**1,555.2**

The carrying amount of financial assets at the reporting date represents the maximum credit exposure.

At 31 December 2018, the company held no financial assets that were past due or impaired, either for the current year under review or on a cumulative basis.

C.4 Liquidity risk

Liquidity risk arises where cash may not be available to pay obligations when due at a reasonable cost.

The company's approach is to manage its liquidity position so that it can reasonably survive a significant individual or market loss event. This means that the company maintains sufficient liquid assets, or assets that can be translated into liquid assets at short notice and without any significant capital loss, to meet expected cash flow requirements. These liquid funds are regularly monitored using cash flow forecasting to ensure that surplus funds are invested to achieve a higher rate of return.

The following is an analysis by business segment of the estimated timing of the net cash flows based on the net claims liabilities balance held at 31 December 2019 and 31 December 2018:

31 December 2019	Within 1 year $m	1-3 years $m	3-5 years $m	Greater than 5 years $m	Total $m	Weighted average term to settlement (years)
Specialty lines	1.9	3.8	2.7	3.1	11.5	3.8
Cyber & executive risk	1.2	2.0	0.8	0.3	4.3	2.2
Reinsurance	0.7	0.6	0.2	0.1	1.6	1.9
Intra-group Reinsurance	–	36.6	–	–	36.6	1.5
Net claims liabilities	**3.8**	**43.0**	**3.7**	**3.5**	**54.0**	

31 December 2018	Within 1 year $m	1-3 years $m	3-5 years $m	Greater than 5 years $m	Total $m	Weighted average term to settlement (years)
Specialty lines	0.2	0.5	0.4	0.4	1.5	3.5
Cyber & executive risk	0.1	0.1	–	–	0.2	2.9
Intra-group Reinsurance	–	163.5	–	–	163.5	1.5
Net claims liabilities	**0.3**	**164.1**	**0.4**	**0.4**	**165.2**	

C.4 Liquidity risk *continued*

The next two tables summarise the carrying amount at reporting date of financial instruments analysed by maturity date.

Maturity 31 December 2019	<1 yr $m	1-2 yrs $m	2-3 yrs $m	3-4 yrs $m	4-5 yrs $m	5-10 yrs $m	>10 yrs $m	Total $m
Fixed and floating rate securities	395.9	447.3	228.3	177.3	238.3	27.5	26.0	1,540.6
Cash and cash equivalents	12.5	–	-	-	-	-	-	12.5
Derivative financial instruments	4.1	–	-	-	-	-	-	4.1
Borrowings	–	–	-	-	-	(546.8)	-	(546.8)
Total	**412.5**	**447.3**	**228.3**	**177.3**	**238.3**	**(519.3)**	**26.0**	**1,010.4**

Maturity 31 December 2018	<1 yr $m	1-2 yrs $m	2-3 yrs $m	3-4 yrs $m	4-5 yrs $m	5-10 yrs $m	>10 yrs $m	Total $m
Fixed and floating rate securities	243.2	276.7	453.8	170.1	102.1	50.3	–	1,296.1
Cash and cash equivalents	20.9	–	–	–	–	–	–	20.9
Derivative financial instruments	(6.9)	–	–	–	–	–	–	(6.9)
Borrowings	–	–	–	–	–	(248.7)	–	(248.7)
Total	**257.2**	**276.7**	**453.8**	**170.1**	**102.1**	**(198.4)**	**–**	**1,061.4**

In November 2016 the company issued $250.0m of subordinated tier 2 notes due in 2026. Annual interest, at a fixed rate of 5.875%, is payable in May and November of each year. In September 2019, the company issued an additional $300m Tier 2 subordinated debt.

C.5 Operational risk

Operational risk arises from the risk of losses due to inadequate or failed internal processes, people, systems, service providers or external events.

There are a number of business activities for which the Beazley Insurance dac uses the services of a sister group company, such as underwriting, actuarial and information technology.

Beazley Insurance dac actively manages operational risks and minimises them where appropriate. This is achieved by implementing and communicating guidelines to staff and other third parties. The company also regularly monitors the performance of its controls and adherence to these guidelines through the risk management reporting process.

Key components of the company's operational control environment include:

- modelling of operational risk exposure and scenario testing;
- management review of activities;
- documentation of policies and procedures;
- preventative and detective controls within key processes;
- contingency planning; and
- other systems controls.

C. Risk profile *continued*

C.6 Other material risks

Strategic risk

This is the risk that Beazley Insurance dac's strategy is inappropriate or that the company is unable to implement its strategy. Where events supersede the company's strategic plan this is escalated at the earliest opportunity through the company's monitoring tools and governance structure.

Regulatory and legal risk

Regulatory and legal risk is the risk arising from not complying with regulatory and legal requirements. The operations of Beazley Insurance dac are subject to legal and regulatory requirements within the jurisdiction in which it operates and the company's compliance function is responsible for ensuring that these requirements are adhered to.

Group risk

Group risks are losses or failure experienced in one Beazley entity triggering secondary losses in another Beazley entity. These risks can have a range of causes including:

- intra-group reinsurance arrangements, credit facilities, guarantees, debt and equity cross-holdings that trigger or are revalued as a result of the experience of an individual entity; and
- pooled reinsurance contracts where exhaustion of available cover could lead to greater than anticipated loss for the entity.

Beazley Insurance dac provides capital held at Lloyd's (Funds at Lloyd's) through its aggregate excess of loss contract and lends the remainder to BUL through a credit facility agreement. The risk associated with the capital lent through these agreements represents the most material group risk in the Beazley Insurance dac model.

Brexit

Beazley has prepared for the UK leaving the EU, assuming a hard Brexit. European clients have the choice of either using the Lloyd's Brussels platform, which has been operating successfully since 1 January 2019, or using Beazley Insurance dac. which is authorised to underwrite all of Beazley's non-life products. As such, Beazley remains prepared for whatever the Brexit outcome.

Climate Change

Beazley Insurance dac continues to monitor the impact and risks of climate change on insurance portfolio and investment portfolio. The group has been undertaking initial stress tests of physical and transitional risks on behalf of the Managing Agent of the syndicates. In addition, a pilot assessment was undertaken to investigate the impact of climate change on the liability lines offered by our US architects and engineers team. These analyses will be extended to Beazley Insurance dac in 2020 to better understand the physical, transition and liability risks and assess how the insurance and investment portfolios should change over time.

C.7 Any other information

Internal model governance

Beazley Insurance dac operates a three lines of defence process throughout the business. As with any other process in Beazley this approach is applied to the internal model. An overview of the three lines of defence for the internal model is set out below.

First line of defence: capital modelling team with controls including;

- formal governance through committees;
- governance through the 'knowledge requirements of an internal model' (KRAM) process; and
- in team testing process.

Second line of defence: risk management with controls including;

- control monitoring and reporting.

Third line of defence: internal audit with controls including;

- conducting annual reviews of the validation framework and process.

Further to the three lines of defence, the fourth element to the internal model governance framework is the independent validation (out of team testing) of the internal model that is performed annually.

Features of Beazley's governance include:

- incorporation into the existing governance structure with clear accountability;
- overlap of members on the various committees;
- the KRAM process i.e. executive and non-executive director training programme for the internal model;
- transparency of internal model limitations;
- internal model control mechanisms; and
- use of external review.

C.7 Any other information *continued*

Stress and scenario testing

Purpose

The stress and scenario framework is performed as part of business processes to assist senior management understand the vulnerabilities within the business model. This approach encourages management's involvement in risk oversight by using real life scenarios to provide qualitative and quantitative information on what risks might look like under stressed conditions and encourages a forward looking view of risk. In addition, as a validation tool the stress and scenario framework:

- tests assumptions, particularly where data is sparse;
- tests assumed correlations between assumptions;
- tests the availability of resources and what action might be required under stressed situations;
- tests whether controls perform as expected under stressed situations; and
- considers the effect of changes in the operating environment (e.g. external events).

Scope

Beazley Insurance dac stress and scenario framework covers the following three tests:

- stress testing involves looking at the impact on the business model of changing a single factor;
- scenario testing involves the impact on the business model of simulating or changing a series of factors within the operating environment; and
- reverse stress testing involves considering scenarios that are most likely to render the current business model to become unviable.

The framework consists of a four step process, namely:

1. identify and design;
2. estimation;
3. senior management input and challenge; and
4. management action and feedback loop.

Identify and design (step one)

The risk management team identifies potential assumptions and scenarios for testing within each of the following business processes:

- one year business planning;
- five year business planning;
- risk assessment and risk appetite;
- emerging and strategic risk;
- capital assessment;
- realistic disaster scenarios;
- asset portfolio;
- liquidity risk;
- disaster recovery and business continuity planning; and
- corporate transactions such as acquisitions.

Estimation (step two)

Once scenarios are defined, the risk management team facilitate the estimation of the stress test or scenario. In summary, the following steps are performed:

- identify data and where necessary cleanse or adjust data onto a consistent basis;
- validate data;
- where there is insufficient data apply expert judgement and document this in line with the expert judgement policy;
- run the stress test or scenario test and quantify impact;
- review results for reasonableness and validate against available data; and
- iterate this process as required.

Senior management input and challenge (step three)

Following the completion of step two, the risk management team then meet with the relevant executive and non-executive directors (for example risk owners or as set out in the KRAM) and present the analysis performed and associated results for further discussion. This is an important step in the stress and scenario testing process as it:

- helps inform the senior management team at a detailed level of the key sensitivities and vulnerabilities for Beazley Insurance dac; and
- makes uses of the directors' experience to sense check the analysis and results.

It is expected that further iteration is required following discussion which in turn is summarised.

Management action and feedback loop (step four)

The results of the stress test and scenario planning exercises are reported to the relevant first line of defence group committees (the underwriting, investment, operations and executive committees and the Beazley Insurance dac underwriting and operations groups) as part of the business process and the second line of defence committee (the group risk and regulatory committee and Beazley Insurance dac risk and compliance committee) within the ORSA. The ORSA is then reported to the relevant subsidiary board and the Beazley plc board, usually through their risk committees. It is expected that the discussion at these forums will facilitate further management input and challenge and will give rise to management actions which are captured by the minutes and actioned by the relevant individual. Where relevant, this may include informing other business processes of the results of certain tests.

COVID-19

As disclosed in further detail at section A.5, the company continues to monitor and respond to the global COVID-19 outbreak.

D. Valuation for solvency purposes

Basis of presentation

In addition to writing direct insurance in the UK and continental Europe, Beazley Insurance dac (BIdac or the company) reinsures Beazley Underwriting Limited (BUL), providing aggregate excess of loss cover for syndicates 2623 and 3623. The premium/claim payable under the contract is defined relative to the profit/loss of those syndicates. A profit will trigger a premium defined as 75% of the profit within those syndicates, in excess of $4m. A loss will trigger a claim defined as 75% of the loss within those syndicates, in excess of $4m, capped at an amount of Funds at Lloyd's (FAL) that BIdac has committed under the reinsurance contract to support BUL's participation in the syndicates' activity.

In line with the 2019 financial statements, BIDAC presents the reinsurance contract reserves as either a single premium or outstanding claim balance depending on whether the reported result of the syndicates is a profit or a loss. As the premium/claim balance presented in the profit or loss account represents the company's share of the profit/loss before tax of the syndicates, premium earnings adjustments and expense deferrals have already been taken into account and therefore the balance sheet no longer contains balances related to technical balances such as deferred acquisition costs and the provision for unearned premium underlying the reinsurance contracts.

The Solvency II technical provisions are calculated in accordance with relevant Solvency II regulations. The regulations require the valuation of the contracted cash flows, which in relation to the aggregate member level excess of loss reinsurance agreement with BUL in respect of syndicates 2623 and 3623 are either a premium or a claim, This represents BIdac's share of the net profit or loss (after $4m excess) of the underlying business (A single claim cash flow occurs if the outcome of the underlying business is a loss and a premium is paid if the outcome is a profit). Also within scope of the reinsurance arrangement (and therefore within the technical provisions) are the future cashflows in respect of fees due from BUL to BIdac in respect of BIdac putting up FAL to support BUL's participation in the syndicates as well as the profit commissions due from BIdac to BUL on the premiums.

D.1 Assets

	2019 Solvency II $m	2019 GAAP $m	Difference $m
Insurance and intermediaries receivables	5.5	18.3	(12.8)
Deferred acquisition costs	–	6.4	(6.4)
Financial assets – investments	1.748.5	1,738.6	9.9
Other assets	0.1	9.9	(9.8)
Reinsurance recoverables	2.1	7.6	(5.5)
Deferred tax asset	0.5	–	0.5
Fixed assets	0.0	–	–
Receivables (trade, not insurance)	38.2	32.5	5.7
Cash and cash equivalents	12.5	12.5	–
Total assets	**1,807.5**	**1,825.8**	**(18.3)**

Differences between valuation for solvency purposes and financial statements

Insurance and intermediaries receivables

Insurance and intermediaries receivables includes the following:

- amounts due from direct insurance operations undertaken in the branches; and
- amounts due in respect of the reinsurance arrangement due to BIdac from BUL.

FAL fees and profit commissions that relate to future cashflows are implicitly included within the Solvency II technical provisions.

On a Solvency II basis, the future premium cashflows within this balance that are not overdue are recognised within the technical provisions.

Deferred acquisition costs

Deferred acquisition costs comprise brokerage, premium levy and staff-related costs of the underwriters acquiring new business and renewing existing contracts on the direct insurance business. Deferred acquisition costs are excluded from the valuation of assets for solvency purposes and there are no deferred acquisition costs relating to the reinsurance arrangement.

D.1 Assets *continued*

Financial assets – investments

On the GAAP balance sheet, financial assets are valued using a valuation hierarchy that reflects the significance of the inputs used in making the measurements. The fair value hierarchy has the following levels:

- Level 1 – valuations based on quoted prices in active markets for identical instruments. An active market is a market in which transactions for the instrument occur with sufficient frequency and volume on an ongoing basis such that quoted prices reflect prices at which an orderly transaction would take place between market participants at the measurement date. Included within level 1 are bonds and treasury bills of government and government agencies which are measured based on quoted prices in active markets. Assets are valued using the bid price.
- Level 2 – valuations based on quoted prices in markets that are not active, or based on pricing models for which significant inputs can be corroborated by observable market data (e.g. interest rates, exchange rates). Included within level 2 are government bonds, asset backed securities and mortgage-backed securities.
- Level 3 – valuations based on inputs that are unobservable or for which there is limited market activity against which to measure fair value.

The table below analyses financial instruments measured at fair value at 31 December 2019, by the level in the fair value hierarchy into which the fair value measurements is categorised:

31 December 2019 Financial assets at fair value through: $m	Level 1 $m	Level 2 $m	Level 3 $m	Total
Fixed and floating rate debt securities				
1) Government issued	459.1	8.1	–	467.2
2) Supernational	–	–	–	–
3) Corporate bond – Investment grade	419.9	567.7	–	987.6
4) Corporate bonds – High yield	–	85.8	–	85.8
Equity linked funds	–	135.6	–	135.6
Hedge funds/uncorrelated strategies	–	51.9	–	51.9
Derivative financial assets	10.5	–	–	10.5
Total financial assets at fair value	**889.5**	**849.1**	**–**	**1,738.6**

The Solvency II valuation of financial assets is consistent with the GAAP valuation, except for accrued interest which is reclassified from other assets into financial assets.

Other assets

On the GAAP balance sheet, other assets are comprised principally of accrued interest. This is reclassified into the underlying investments on the Solvency II balance sheet.

Reinsurance recoverables

The GAAP balance sheet presents the reinsurer's share of unearned technical provisions and claims outstanding relating to reinsurance of direct business. On a Solvency II basis, this balance presents the net of cash inflows with respect to recoveries on direct business bound at the reporting date and cash outflows with respect to premiums payable on outwards reinsurance arrangements in respect of direct business that has been allocated to BIdac.

Deferred tax asset

Solvency II recognition and valuation with respect to deferred taxes is consistent with the GAAP balance sheet (IAS 12). As a result of the adjustments from GAAP to Solvency II, in particular with respect to the reinsurance recoverables on the direct business, a decrease in Solvency II net assets is generated and hence a deferred tax asset is recognised on a Solvency II basis. This deferred tax asset is not offset against the deferred tax liability as it relates to the business written in branches which are subject to a different tax jurisdiction to the company.

Fixed assets

Capitalised leasehold improvements that are valued on the GAAP balance sheet at amortised cost are deemed to have no economic value on a Solvency II basis.

D. Valuation for solvency purposes *continued*

D.1 Assets *continued*

Receivables (trade, not insurance)

Receivables mainly comprise of non-insurance related inter-group balances. These are measured at fair value on both the GAAP and Solvency II balance sheet.

Cash and cash equivalents

On the GAAP balance sheet, cash and cash equivalents consist of cash held at bank, cash in hand, deposits held at call with banks, and other short term highly liquid investments that are readily convertible to known amounts of cash and which are subject to an insignificant risk of changes in value. These investments have less than three months maturity from the date of acquisition. The Solvency II valuation and recognition of cash and cash equivalents is consistent with that used for the GAAP balance sheet.

D.2 Technical provisions

Summary of Beazley Insurance dac Technical provisions

	Undiscounted			Discounted		
Solvency II line of business All amounts $m	Net technical provisions ex. risk margin	Risk margin	Net technical provisions inc. risk margin	Net technical provisions ex. risk margin	Risk margin	Net technical provisions inc. risk margin
Non-proportional casualty reinsurance	(359.5)	131.3	(228.1)	(345.7)	99.7	(246.0)
General liability insurance	12.0	1.1	13.1	11.8	1.0	12.8
Proportional general liability reinsurance	1.8	0.2	2.0	1.8	0.2	2.0
Non-proportional property reinsurance	(0.1)	0.0	0.1	0.1	0.0	(0.1)
Credit and Suretyship	0.0	0.0	0.0	0.0	0.0	0.0
Total	(345.8)	132.6	(212.9)	(332.0)	100.9	(231.1)

The BIdac technical provisions consist of two elements:

- the BIdac aggregate excess of loss reinsurance protection of BUL (intra-group reinsurance), which is classified as non-proportional casualty reinsurance; and
- the non-life insurance and third-party reinsurance business which BIdac commenced writing in 2017. The business written to date has been a mix of general liability, non proportional property, marine, aviation and transport as well as credit and suretyship. A small amount of third party reinsurance has been written and classified as proportional general liability reinsurance and non-proportional casualty reinsurance.

Given the nature of the underlying business, the approach used to estimate the technical provisions for the intra-group reinsurance differs from that used for the non-life insurance and third part reinsurance.

Intra-group reinsurance

Overview of reinsurance contract

The approach used to estimate the technical provisions is based on the structure and expected cashflows under the reinsurance contracts. The company enters into a reinsurance contract with BUL covering its participation on a year of account for syndicates 2623 and 3623. The potential cashflows in summary are as follows:

- premium – 75% of any profit made by the syndicates reinsured (subject to a $4m excess);
- claim – 75% of any loss made by the syndicates reinsured (subject to a maximum of 75% of the FAL and $4m excess);
- fees – BUL pays BIdac a fee as BIdac provides 75% FAL for the syndicates covered under the reinsurance contract. The fee payable is 1% of the first £201m of FAL and 3% of the remainder of FAL; and
- profit commission – 15% and is payable by BIdac to BUL on any premiums received under the contract.

D.2 Technical provisions *continued*

Bases, methods and main assumptions used for valuation for solvency purposes

The bases, methods and main assumptions used for valuation for solvency purposes are as follows:

The expected profit/loss of the underlying BUL business reinsured forms the largest component of the technical provisions. The expected profit/loss is the total of the following:

- the current view of the profit/loss of each year of account. For the closing year of account the profit/loss is the final syndicate declared result as reported to Lloyd's. For open years of account this is based on held loss ratios from the Beazley Long Term Plan applied to the ultimate premium, with allowance for incurred expenses;
- the reserve releases expected between the current view of profitability and when the final syndicate result is declared;
- expected investment income;
- expenses that are expected to be incurred until the year of account closes;
- FAL fees payable from BUL to BIdac; and
- profit commissions payable for each contract forecasting profit.

Whilst the initial view of profitability is assessed at the end of the first calendar year for the business that has been reinsured, the reserve releases and expected future investment income are derived from the assumptions used in the Beazley Long Term Business plan. The long term plan is updated twice per year to reflect experience to date. In addition to this, during quarters where the long term plan is not updated, a validation check of the long term plan assumptions are carried out against experience, where this suggests an update to the long term plan assumptions are required, technical provisions are updated accordingly.

The provisions for profit commissions and fees have been calculated in line with the terms of the reinsurance contract for each contract forecasting a profit. FAL fees over the term of the contract are calculated.

Allowance has also been made for events not in data and a risk margin:

- the events not in data allowance is based on the load included in the underlying syndicates reinsured and this is calculated using the truncated lognormal distribution, as per Lloyd's guidelines; and
- the risk margin is based on the SCR output from the BIdac internal model – this is projected forward and discounted using yield curves prescribed by European Insurance and Occupational Pensions Authority (EIOPA), with the discounted cost of capital being calculated by multiplying the discounted SCR figures by the prescribed cost of capital rate of 6% and then summing up the resulting discounted cost of capital amounts.

Unincepted business is defined as policies that have not yet incepted, but to which Beazley is legally obliged at the valuation date. The 2020 reinsurance contract between BIdac and BUL which incepts on 1 January 2020 has been included within the technical provisions as it was signed in December 2019.

The technical provisions estimated have been split between the claims and premium provisions based on whether or not the profit/loss for each reinsurance contract is known at the valuation date – the technical provisions arising for those contracts for which the actual profit is as yet unknown have been allocated to the premium provision, with the provisions for those contracts where the profit/loss has been finalised being included within the claims provision.

Future cash flows are projected using payment patterns, as detailed in the contract and discounted using the latest available EIOPA yield curves for the relevant currencies.

There is no reinsurance on this contract and so no allowance is made for recoverables from reinsurers in respect of this business.

Key uncertainties

At a macro level, the key areas of downside risk in the estimated profit/loss figures of the underlying BUL business being reinsured are that:

- claims experience in the specialty lines division could be worse than expected because of adverse claim frequency and/or severity or the systemic inadequacy of premium rates;
- catastrophe claims experience is materially worse than expected; and
- investment returns may be materially different to the returns estimated.

Changes in methodology/assumptions since the previous reporting period

The key changes made in approach at this valuation are follows:

- The cashflows in the contract are discounted using the USD yield curve, as published by EIOPA. Previous models used the GBP yield curve. This better reflects the operational cashflows of the contract and is in line with the cashflow concepts underlying Solvency II regulations.
- The model has been updated to reflect the FAL fee cashflows in the contract.
- Actual investment return in the first quarter has no longer been included in the result, as the impact of this versus expected investment return is not material.

D. Valuation for solvency purposes *continued*

D.2 Technical provisions *continued*

GAAP reserves vs technical provisions

The main differences between the GAAP and Solvency II technical provisions for the intra-group reinsurance business written in BIdac are as follows:

- the GAAP reserves only consider the performance of business earned up to and including the valuation date whereas the Solvency II technical provisions allow for both the earned and unearned portions of the business written;
- within Solvency II technical provisions, there is an explicit allowance for premiums and claims on bound but unincepted contracts which are not recognised within the GAAP reserves. As a result, the 2020 reinsurance contract between BIdac and BUL which incepts on 1 January 2020 has been included within the Solvency II technical provisions as it was signed in December 2019; the Solvency II technical provisions include an allowance for the expected investment income on the underlying business being reinsured whereas the GAAP reserves do not; the Solvency II technical provisions include an allowance for events not in data whereas the GAAP reserves do not, the Solvency II technical provisions are discounted for the time value of money whilst the GAAP reserves are not and:
- the Solvency II technical provisions recognise expected future reserve releases from the 2018, 2019 and 2020 years of account, on the underlying business reinsured up to and including the finalisation of the 2020 reinsurance contract whereas the GAAP reserves only recognise reserve releases known as at the valuation date.

The total BIdac GAAP reserves are $67.8m on a net of reinsurance basis, and $36.6m of these reserves are for the intra-group reinsurance business. The Solvency II net technical provisions (including the risk margin) for this business amount to $(246.0)m on a discounted basis.

General Liability Insurance & third party reinsurance

BIdac began writing non-life insurance and third party business during 2017 and increased the volume of premiums written in 2018 and 2019. The business written comprises of four classes – general liability, marine, aviation & transport, non-proportional property and credit and suretyship.

Bases, methods and main assumptions used for valuation for solvency purposes

The best estimate reserves form the largest component of the technical provisions. The reserves (direct insurance, proportional reinsurance and non-proportional casualty reinsurance) have been set at a level equivalent to that of other similar business written within the group, but given this is new business written by BIdac a temporary loading has also been applied to the 2017 and 2018 years of account. This will continue to be applied until such time as the book reaches an appropriate level of maturity. If the actual experience is unable to support this loading it will be reviewed and updated as necessary. For the 2019 and subsequent years of account, the general liability business and non-proportional property reinsurance are set at equivalent levels to that of other similar business written within the group.

An assumption is made as to what amount of the total premiums to which Beazley is legally obliged at the balance sheet date have already been written – as only the portion associated with business already written is included within the technical provisions. Earning assumptions are used to allocate between the premium and claims provision. The methodology used to derive earnings patterns assumes that premium is earned uniformly throughout the policy period.

Unincepted business is defined as policies that have not yet incepted, but to which Beazley is legally obliged at the valuation date. The unincepted business has resulted in the year-end 2019 reinsurance recoverables being negative, reflecting that the outwards reinsurance premiums payable that cover the full subsequent period are allowed for, compared to only the expected recoveries arising from the unincepted gross business.

Provisions for bad debts, future expenses and events not in data are added to the best estimate technical provisions:

- the bad debt component uses reinsurer default probabilities and loss given default percentages from the internal model. The expected reinsurer bad debt is calculated as probability of default x loss given default x exposure x average duration;
- the expense provision includes the future expenses required to run off the legally obliged business as at the valuation date. This is calculated using the historical calendar year expenses and budgeted expenses, provided by the finance team; and
- the load for events not in data is calculated using the truncated lognormal approach, as per Lloyd's guidelines.

A risk margin is also calculated, though a simplified approach has been used. The simplified approach utilises the risk margin estimated for syndicates 2623 and 3623 and then applies the ratio of the BIdac net premium to these syndicates' net premium to this risk margin figure.

Future cashflows are projected using payment patterns, allocated into the required currencies and discounted using the latest available EIOPA yield curves for the relevant currencies.

The reinsurance recoverables have been calculated based on the underlying reinsurance cashflows.

Key uncertainties

At a macro level, the key area of downside risk is in the reserving assumptions used to derive the general liability best estimate reserves. Claims experience may be worse than expected because of adverse claim frequency and/or severity or the systemic inadequacy of premium rates. Additionally the lack of actual BIdac claims development history means that an approximation of the expected performance of this business has had to be used.

Changes in Methodology

There have been no changes since the previous reporting period.

D.2 Technical provisions *continued*

GAAP reserves vs technical provisions

The main differences between the GAAP and Solvency II technical provisions for the general liability insurance business written in BIdac are as follows:

- there are items within the GAAP reserves that are not included under Solvency II and thus lead to a reduction in the Solvency II technical provisions. This reduction includes:
  - accelerating the recognition of profit with the unearned premium reserve; and
  - a reclassification of premium debtors to Solvency II technical provisions to recognise future premium cashflows.
- Solvency II technical provisions are calculated on a best estimate basis and so the margin included in the GAAP reserves is excluded;
- within Solvency II technical provisions there is an explicit allowance for premiums and claims on bound but unincepted contracts which are not recognised within the GAAP reserves; and
- Within Solvency II technical provisions, there is an allowance for events not in data as well as the time value of money. Neither are included within GAAP reserves.

The total BIdac GAAP reserves are $67.8m on a net of reinsurance basis, and $31.2m of these reserves are for the insurance and third party reinsurance business. The Solvency II net technical provisions (including the risk margin) for the insurance and third party reinsurance business amount to $14.9m on a discounted basis. The main reason for the decrease in the net reserves on a Solvency II basis relative to a GAAP basis is driven by the treatment of outwards reinsurance. On a Solvency II basis, the technical provisions make an allowance for the outwards reinsurance premiums payable that cover the full subsequent period but only allow for the expected recoveries arising from the business written to date together with the bound but not incepted business.

Other items

The matching adjustment referred to in Article 77b of Directive 2009/138/EC is not applied. The volatility adjustment referred to in Article 77d of Directive 2009/138/EC is not used. The transitional risk-free interest rate-term structure referred to Article 308c of Directive 2009/138/EC is not applied. The transitional deduction referred to in Article 308d of Directive 2009/138/EC is not applied.

D.3 Other liabilities

	2019 Solvency II $m	2019 GAAP $m	Difference $m
Deferred tax liabilities	25.2	–	25.2
Subordinated liabilities in basic own funds	598.7	546.8	51.9
Reinsurance payables	–	1.2	(1.2)
Payables (trade, not insurance)	45.7	9.5	36.2
Derivatives	6.4	6.4	–
Any other Liabilities	8.7	8.7	–
Total liabilities	**684.7**	**572.6**	**112.1**

Deferred tax liabilities

Solvency II recognition and valuation bases with respect to deferred taxes are consistent with the GAAP balance sheet (IAS 12). As a result of the adjustments from GAAP to Solvency II, an increase in Solvency II net assets is generated for the company and hence a deferred tax liability is recognised on a Solvency II basis. This deferred tax liability is not offset against the deferred tax asset as it relates to the company which is subject to a different tax jurisdiction to its branches.

Subordinated liabilities

The subordinated liabilities, which are listed on the London stock exchange, are shown in the GAAP financial statements valued at fair value at the date of issue less transaction costs. The subordinated liabilities are valued at fair value based on quoted market price under Solvency II.

Reinsurance payables

As part of BIdac's participation in the Beazley group reinsurance programme covering general liability insurance, amounts relating to reinsurance payables are allocated to BIdac. This amount due is recorded in the GAAP balance sheet as reinsurance payables. Under Solvency II, this amount is reclassified into the technical provisions as it constitutes a future cashflow.

Payables

Payables (trade, not insurance) comprise the net of:

- amounts due to other entities within the group;
- amounts due to BUL in respect of profit commission; and
- amounts due from BUL in respect of FAL fees.

FAL fees and profit commissions that relate to future cashflows are implicitly included within the Solvency II technical provisions.

Derivatives

Derivatives are initially recognised at fair value on the date on which a derivative contract is entered into and are subsequently re-measured at their fair value. Fair values are obtained from quoted market prices in active markets, recent market transactions, and valuation techniques which include discounted cash flow models. All derivatives are carried as assets when fair value is positive and as liabilities when fair value is negative.

Other payables and liabilities

Other payables comprise salaries and other accruals.

D.4 Alternative methods for valuation

BIdac does not use any alternative methods of valuation in its valuation of assets or liabilities.

D.5 Any other information

There is no other material information to report.

As disclosed in further detail at section A.5, the company continues to monitor and respond to the global COVID-19 outbreak.

E. Capital management

E.1 Own funds

Beazley Insurance dac's (BIdac or the company) capital strategy is to:

- invest its capital to generate an appropriate level of return;
- maintain sufficient solvency cover;
- support other Beazley group businesses; and
- pay dividends to its shareholder.

Whilst not formalised, the company holds a significant amount of the group capital. Since inception the company has always been well capitalised and the capital base has grown with earnings from the reinsurance contract with Beazley Underwriting Limited (BUL). The amount of dividend paid is determined by the solvency of the company and the requirements of the group.

BIdac holds a level of capital over and above its regulatory requirements. The amount of surplus capital held is considered on an ongoing basis in light of the current regulatory framework, opportunities for growth and a desire to maximise returns for its shareholder. Available capital and capital requirements are projected as part of the five year business plan, which is in turn considered as part of the ORSA process.

The following table sets out BIdac's sources of funds on a Solvency II basis:

	Tier 1 $m	Tier 2 $m	Tier 3 $m	Total $m
Basic own funds				
Ordinary share capital	–	–	–	–
Reconciliation reserve	815.4	–	–	815.4
Subordinated liabilities	–	598.7	–	598.7
Deferred tax assets	–	–	0.5	0.5
Capital contribution	536.3	–	–	536.3
Total basic own funds after deductions	1,351.7	598.7	0.5	1,951.0
Ancillary own funds	–	–	–	–
Total available own funds to meet the SCR	1,351.7	598.7	1.0	1,951.0
Total available own funds to meet the MCR	**1,351.7**	**598.7**	**–**	**1,950.0**
Total eligible own funds to meet the SCR	**1,351.7**	**354.8**	**0.5**	**1,707.0**
Total eligible own funds to meet the MCR	**1,351.7**	**35.5**	**–**	**1,387.2**
SCR				**709.6**
Ratio of Eligible own funds to SCR				**240.5%**

Tier 1 basic own funds

BIdac has issued one share with a nominal value of €1 (2018: €1).

A capital contribution of $536.3m was approved as tier 1 own funds by the Central Bank of Ireland (CBI) on 15 December 2015.

The reconciliation reserve at 31 December 2019 was $815.4m (2018 $832.9m). The variance represents the change in the excess of assets over liabilities in the period. The reconciliation reserve can be considered as Solvency II retained earnings net of dividends.

Tier 1 own funds are eligible in full to meet both the Solvency Capital Requirement (SCR) and Minimum Capital Requirement (MCR).

	2019 $m	2018 $m
Ordinary share capital	-	–
Capital contribution	536.3	536.3
Reconciliation reserve	815.4	832.9
	1,351.7	**1,369.2**

The reconciliation reserve is calculated as follows:

	2019 $m	2018 $m
Reconciliation reserve		
Excess of assets over liabilities	1,352.3	1,370.2
Foreseeable dividends	–	–
Other basic own funds	536.9	(537.3)
	815.4	**832.9**

Tier 2 basic own funds

	2019 $m	2018 $m
Tier 2 subordinated debt (2026) – issued in 2016	279.5	248.8
Tier 2 subordinated debt (2029) – issued in 2019	319.2	–
	598.7	**248.8**

In November 2016, the company issued $250m of subordinated tier 2 notes due in 2026 and in September 2019, the company issued $300m of additional subordinated tier 2 notes due in 2029, the net proceeds of the notes are being used along with our retained earnings to support the future growth plans of the group and were also used to redeem other outstanding debt issued by the group. This debt is listed on the London stock exchange and is valued at fair value based on quoted market price.

As at 31 December 2019, $354.8m of the tier 2 own funds were eligible to meet the SCR, being 50% of the SCR as at that date. $35.5m was eligible to meet the MCR, being 20% of the MCR as at that date.

E.1 Own funds *continued*

Reconciliation of GAAP net assets to Solvency II net assets

The table below presents the changes in net assets from the GAAP balance sheet to the Solvency II balance sheet.

	$m
GAAP net assets	**1,177.8**
Elimination of leasehold improvements	(0.0)
Revaluation of subordinated debt to market value	(51.9)
Elimination of GAAP technical provisions (net of reinsurance and deferred acquisition costs)	61.5
Elimination of inter-group debtors relating to future technical cashflows	(41.6)
Replacement of Solvency II technical provisions	231.1
Recognition of net deferred tax on Solvency II adjustments arising	(24.7)
Solvency II net assets	**1,352.2**

The inter-group balances due to BIdac from BUL are included on the GAAP balance sheet. These consist of the following components:

- 2017 YoA profit distribution;
- FAL fees payable from BUL to BIdac up to the reporting date; and
- profit commission payable from BIdac to BUL.

The 2017 YoA profit distribution, FAL fees and profit commissions that relate to future cashflows are implicitly included within the Solvency II technical provisions.

There are no basic own-fund items subject to the transitional arrangements referred to in Articles 308b(9) and 308b(10) of Directive 2009/138/EC and there are no ancillary own funds items.

E.2 Solvency Capital Requirement and Minimum Capital Requirement

The SCR and MCR for BIdac are as follows:

	2019 $m	2018 $m
Solvency Capital Requirement	709.6	656.2
Minimum Capital Requirement	177.4	164.0

The SCR is subject to CBI review. The MCR is calculated based on net of reinsurance technical provisions at the year end and written premiums in the 12 months to that date.

BIdac uses an internal model to calculate its SCR. The model is designed to produce output on the required basis, namely the capital required to meet a 1 in 200 adverse loss on the Solvency II balance sheet over a one-year time horizon.

The table below shows the SCR split by risk category.

Model	Insurance risk	Market risk	Operational risk	Credit risk
2020 SCR	72%	19%	7%	2%
2019 SCR	60%	21%	17%	2%

BIdac also monitors its capital against a Strategic Solvency Target (SST) which has been set at the capital required to meet a 1 in 500 adverse loss on the Solvency II balance sheet over a one-year time horizon. BIdac must notify the CBI when the available capital falls below the SST. As at 31 December 2019, the SST was $846.9m (2018: $796.7m). Although the reinsurance contract is presented as a single cash flow, the management of the reinsurance contract looks through the underlying risk exposures when assessing risks to the company and the performance of the contracts.

E. Capital management *continued*

E.2 Solvency Capital Requirement and Minimum Capital Requirement *continued*

Use of the internal model

Beazley's internal model is regularly used across the group in a number of management processes as well as to input into a range of ad-hoc analysis that is presented to the business to support decision making e.g. reinsurance analysis.

Regular uses include:

- capital setting: the internal model is used to calculate the capital for each entity quarterly. The calculated capital is split by major risk i.e. insurance, market, credit, liquidity, operational and group risk;
- business planning including capital allocation: the internal model is used in the business planning process to allocate capital between divisions. This, when combined with the plan profit, allows management to compare the performance of the different business lines on a risk adjusted basis;
- business planning – catastrophe loss ratios: the internal model is used to calculate catastrophe loss ratios and reinsurance recoveries included in the plan;
- business planning – investment income: the internal model is used to calculate the investment income assumptions in the plan;
- business planning – portfolio optimisation;
- business planning – reinsurance and Special Purpose Arrangement review;
- long term plan: the capital projections and stress scenarios in the long term plan are developed using internal model output;
- reserving: the internal model is used to allow the actuarial team to develop the reserve strength indicators which are used to communicate the level of prudence in the reserves;
- exposure management: the catastrophe model component of the internal model is used to monitor catastrophe risk against appetite and natural catastrophe risk model output for is used for capital modelling;
- investment management: the asset risk component of the internal model is used to monitor investment risk and investment risk output is used for capital modelling; and
- reinsurance credit risk: credit risk output is used for capital modelling;
- ORSA: 1-in-10 output is used to calculate key risk indicators to determine whether the syndicates are operating within risk appetite.

Scope of the internal model

The scope of the internal model includes all material risks faced by Beazley split by the group's divisions. No known important risks are excluded from the internal model. The material risks currently included in the internal model are:

- premium risk;
- catastrophe risk (both natural and man-made);
- reserving risk;
- market (or asset) risk;
- operational risk (including regulatory and legal risk);
- credit risk;
- group risk; and
- liquidity risk.

Methods used in the internal model

The internal model estimates the probability distribution forecast using a structured quantitative process that makes use of methods that are: in line with good actuarial and statistical practice; subject to regular independent challenge; and appropriate to the analysis and risk profile in question. These methods use parameters that are estimated using all relevant internally available data; appropriate externally sourced industry data; data embedded in external models that have been prepared by experts; judgements based on appropriately qualified and challenged experts, and distributions which are statistically consistent with the historic data relating to the frequency and severity of loss.

Beazley uses a full internal model to calculate the SCR. The SCR is calculated by the internal model in accordance with the specifications of Article 101 of Directive 2009/138/EC; specifically that it is taken from the 99.5th percentile value at risk over a 1-year time horizon, taken directly from the probability distribution output generated by the calculation kernel and covers insurance (underwriting and reserving), asset (market), credit, and operational and group risk.

E.2 Solvency Capital Requirement and Minimum Capital Requirement *continued*

Data used in the internal model

Model inputs are made up of two key components:

- inputs to model stand-alone risk which requires:
  - exposure data. For example the number of policies of a given size and type; and
  - risk assumptions. For example setting out the range of claim sizes for a given policy. These assumptions are based on relevant historic experience.
- input to aggregate the risk:
  - risk is aggregated using a 'risk drivers' approach where the assumptions are set based on historic experience for each driver.

On-going appropriateness is ensured through the capital team's in-team testing process which includes:

- quarterly internal model data input testing which includes a reconciliation of key data items; and
- annual data quality testing which includes testing of data quality standards (materiality, accuracy, completeness and appropriateness) for the internal model inputs.

E.3 Use of the duration-based equity risk sub-module in the calculation of the Solvency Capital Requirement

Not applicable.

E.4 Differences between the standard formula and any internal model used

The internal model uses a modular structure comprising of a number of free-standing modules each addressing a risk category within scope of the internal model (see section E.2). A distribution is generated from each module. The modules are aggregated using a 'risk drivers' approach in an overall module that calculates model output. Given the risk profile of Beazley (roughly an equal split of medium-tailed and short-tailed exposures) the most important risk driver is the market cycle which impacts all classes of business and all underwriting years. Driver variables for some risk modules are based upon the output results from other modules. For example, in the credit risk module, the probability of default for reinsurers is increased when the size of the modelled catastrophe exceeds a defined level.

The internal model assesses all risk factors based on the underlying risks of the reinsurance contract. The standard formula calculation is based on the solvency II balance sheet, which presents the reinsurance result as a single net cash flow for each contract. As a result the main differences in the methodologies and underlying assumptions used in the standard formula (SF) and in the internal model (IM) by risk module are as follows:

- greater premium and reserve risk is assumed for the IM reflecting the underlying economic risks while the SF assumptions are applied to the technical provisions;
- catastrophe risk assumptions are lower in the IM reflecting the detailed modelling of the portfolio;
- IM market risk is greater than the SF due to greater interest rate and credit spread risk assumptions as well as making allowance for the full economic risk within the underlying asset portfolio;
- greater credit and operational risk is assumed for the IM than for the SF;
- the IM assumes greater diversification between risk categories than that assumed in the SF with the driver of risk assumptions reflecting the risk profile; and
- IM explicitly includes profit offsetting the risk.

The risks covered in the IM are in line with those covered in the SF; however some risks, for example court inflation, are explicitly rather than implicitly modelled.

E.5 Non-compliance with the Minimum Capital Requirement and non-compliance with the Solvency Capital Requirement

There have been no material changes or instances of non-compliance with the SCR or MCR over the reporting period, nor is there a foreseeable risk of non-compliance which is considered in the ORSA report where a confirmation statement of continued compliance (for regulatory capital requirements and regulatory requirements for technical provisions) is made.

E.6 Any other information

There is no other material information to report.

As disclosed in further detail at section A.5, the company continues to monitor and respond to the global COVID-19 outbreak.

Appendix: Quantitative reporting

The following quantitative reporting templates are appended to this report.

S.02.01.02 – Balance sheet
S.05.01.02 – Premiums, claims and expenses by line of business
S.05.02.01 – Premiums, claims and expenses by country
S.17.01.02 – Non-life technical provisions
S.19.01.21 – Claims triangles
S.23.01.01 – Own funds
S.25.03.21 – Solvency Capital Requirement calculated using a full internal model
S.28.01.01 – Minimum capital requirement

All monetary amounts are in thousands of US dollars. Please note that totals may differ from the sum of component parts due to rounding. For improved presentation, some blank columns in the quantitative reporting templates have been omitted. All items disclosed are consistent with the quantitative reporting submitted privately to the Central Bank of Ireland.

S.02.01.02 – Balance sheet

		Solvency II value
		C0010
Assets		
Intangible assets	R0030	
Deferred tax assets	R0040	543
Pension benefit surplus	R0050	
Property, plant & equipment held for own use	R0060	
Investments (other than assets held for index-linked and unit-linked contracts)	**R0070**	**1,748,547**
Property (other than for own use)	R0080	
Holdings in related undertakings, including participations	R0090	
Equities	*R0100*	
Equities – listed	R0110	
Equities – unlisted	R0120	
Bonds	*R0130*	*1,464,761*
Government Bonds	R0140	482,292
Corporate Bonds	R0150	982,469
Structured notes	R0160	
Collateralised securities	R0170	
Collective Investments Undertakings	R0180	273,311
Derivatives	R0190	10,474
Deposits other than cash equivalents	R0200	
Other investments	R0210	
Assets held for index-linked and unit-linked contracts	R0220	
Loans and mortgages	**R0230**	
Loans on policies	R0240	
Loans and mortgages to individuals	R0250	
Other loans and mortgages	R0260	
Reinsurance recoverables from:	**R0270**	**(2,143)**
Non-life and health similar to non-life	R0280	(2,143)
Non-life excluding health	R0290	(2,143)
Health similar to non-life	R0300	
Life and health similar to life, excluding health and index-linked and unit-linked	R0310	
Health similar to life	R0320	
Life excluding health and index-linked and unit-linked	R0330	
Life index-linked and unit-linked	R0340	
Deposits to cedants	R0350	
Insurance and intermediaries receivables	R0360	5,519
Reinsurance receivables	R0370	518
Receivables (trade, not insurance)	R0380	38,166
Own shares (held directly)	R0390	
Amounts due in respect of own fund items or initial fund called up but not yet paid in	R0400	
Cash and cash equivalents	R0410	12,548
Any other assets, not elsewhere shown	R0420	55
Total assets	**R0500**	**1,808,039**

Appendix: Quantitative reporting *continued*

S.02.01.02 – Balance sheet

		Solvency II value
		C0010
Liabilities		
Technical provisions – non-life	**R0510**	**(229,000)**
Technical provisions – non-life (excluding health)	**R0520**	**(229,000)**
TP calculated as a whole	R0530	
Best estimate	R0540	(329,916)
Risk margin	R0550	100,916
Technical provisions – health (similar to non-life)	**R0560**	
TP calculated as a whole	R0570	
Best estimate	R0580	
Risk margin	R0590	
TP – life (excluding index-linked and unit-linked)	**R0600**	
Technical provisions – health (similar to life)	**R0610**	
TP calculated as a whole	R0620	
Best estimate	R0630	
Risk margin	R0640	
TP – life (excluding health and index-linked and unit-linked)	**R0650**	
TP calculated as a whole	R0660	
Best estimate	R0670	
Risk margin	R0680	
TP – index-linked and unit-linked	**R0690**	
TP calculated as a whole	R0700	
Best estimate	R0710	
Risk margin	R0720	
Contingent liabilities	R0740	
Provisions other than technical provisions	R0750	
Pension benefit obligations	R0760	
Deposits from reinsurers	R0770	
Deferred tax liabilities	R0780	25,235
Derivatives	R0790	6,373
Debts owed to credit institutions	R0800	
Debts owed to credit institutions resident domestically	ER0801	
Debts owed to credit institutions resident in the euro area other than domestic	ER0802	
Debts owed to credit institutions resident in rest of the world	ER0803	
Financial liabilities other than debts owed to credit institutions	R0810	
debts owed to non-credit institutions	ER0811	
debts owed to non-credit institutions resident domestically	ER0812	
debts owed to non-credit institutions resident in the euro area other than domestic	ER0813	
debts owed to non-credit institutions resident in rest of the world	ER0814	
other financial liabilities (debt securities issued)	ER0815	
Insurance & intermediaries payables	R0820	
Reinsurance payables	R0830	
Payables (trade, not insurance)	R0840	45,722
Subordinated liabilities	**R0850**	**598,717**
Subordinated liabilities not in BOF	R0860	
Subordinated liabilities in BOF	R0870	598,717
Any other liabilities, not elsewhere shown	R0880	8,739
Total liabilities	**R0900**	**455,786**
Excess of assets over liabilities	**R1000**	**1,352,253**
Excess of assets over liabilities minus Subordinated Liabilities in BOF		**1,950,969**

S.05.01.02 – Premiums, claims and expenses by line of business

		Line of Business for: non-life insurance and reinsurance obligations (direct business and accepted proportional reinsurance)						Line of Business for: accepted non-proportional reinsurance			
		Income protection insurance	Marine, aviation and transport insurance	Fire and other damage to property insurance	General liability insurance	Credit and suretyship insurance	Miscellaneous financial loss	Health	Casualty	Property	Total
		C0020	C0060	C0070	C0080	C0090	C0120	C0130	C0140	C0160	C0200
Premiums written											
Gross – Direct Business	R0110		138		32,800	56					32,994
Gross – Proportional reinsurance accepted	R0120				3,070						3,070
Gross – Non-proportional reinsurance accepted	R0130								584	7,168	7,752
Reinsurers' share	R0140				6,756				20	1,355	8,131
Net	R0200	0	138	0	29,114	56	0	0	564	5,813	35,685
Premiums earned											
Gross – Direct Business	R0210		33		20,924	45					21,002
Gross – Proportional reinsurance accepted	R0220				2,634						2,634
Gross – Non-proportional reinsurance accepted	R0230								619	6,757	7,376
Reinsurers' share	R0240				3,540				12	1,146	4,698
Net	R0300	0	33	0	20,018	45	0	0	607	5,611	26,314
Claims incurred											
Gross – Direct Business	R0310		21		14,639	27					14,687
Gross – Proportional reinsurance accepted	R0320				1,611						1,611
Gross – Non-proportional reinsurance accepted	R0330								(126,542)	1,847	(124,695)
Reinsurers' share	R0340				2,707				10	149	2,866
Net	R0400	0	21	0	13,543	27	0	0	(126,552)	1,698	(111,263)
Changes in other technical provision											
Gross – Direct business	**R0410**										0
Gross – Proportional reinsurance accepted	R0420										0
Gross – Non-proportional reinsurance accepted	R0430										0
Reinsurers' share	R0440										0
Net	R0500	0	0	0	0	0	0	0	0	0	0
Expenses incurred	R0550	0	43	0	11,128	17	0	0	5,594	2,224	19,006
Other expenses	R1200										
Total expenses	R1300										19,006

The following columns, which are blank, have been omitted for improved presentation:

C0010 Medical expense insurance
C0030 Workers' compensation insurance
C0040 Motor vehicle liability insurance
C0050 Other motor insurance
C0100 Legal expenses insurance
C0110 Assistance
C0150 Marine, aviation, transport

Appendix: Quantitative reporting *continued*

S.05.02.01 – Premiums, claims and expenses by country

Home Country – non-life obligations

		Home Country	Top 5 countries (by amount of gross premiums written) – non-life obligations					Total Top 5 and home country
		C0010	C0020	C0030	C0040	C0050	C0060	C0070
		Ireland	FR	GE	ES	GB	PL	
R0010		C0080	C0090	C0100	C0110	C0120	C0130	C0140
Premium written								
Gross – Direct Business	R0110	0	**6,172**	**5,762**	**8,678**	12,306	0	**32,918**
Gross – Proportional reinsurance accepted	R0120	0	**1,356**	**0**	**0**	1,714	0	**3,070**
Gross – Non-proportional reinsurance accepted	R0130	0	**0**	**6,693**	**0**	384	599	**7,676**
Reinsurers' share	R0140	0	**973**	**851**	**1,291**	3,606	0	**6,721**
Net	**R0200**		**6,555**	**11,604**	**7,387**	**10,798**	**599**	**36,943**
Premium earned								
Gross – Direct Business	R0210	0	**4,217**	**4,243**	**6,334**	6,162	0	**20,955**
Gross – Proportional reinsurance accepted	R0220	0	**1,356**	**0**	**0**	1,278	0	**2,634**
Gross – Non-proportional reinsurance accepted	R0230	0	**0**	**6,317**	**0**	373	612	**7,303**
Reinsurers' share	R0240	0	**0**	**0**	**0**	0	0	**0**
Net	**R0300**		**5,573**	**10,560**	**6,334**	**7,813**	**612**	**30,892**
Claims incurred								
Gross – Direct Business	R0310	0	**2,662**	**3,151**	**4,390**	4,456	0	**14,659**
Gross – Proportional reinsurance accepted	R0320	0	**1,043**	**0**	**0**	569	0	**1,611**
Gross – Non-proportional reinsurance accepted	R0330	0	**0**	**1,746**	**0**	(126,757)	292	**(124,718)**
Reinsurers' share	R0340	0	**472**	**552**	**724**	1,106	11	**2,865**
Net	**R0400**		**3,233**	**4,345**	**3,666**	**(122,838)**	**282**	**(111,313)**
Changes in other technical provisions								
Gross – Direct Business	R0410	0	**0**	**0**	**0**	0	0	**0**
Gross – Proportional reinsurance accepted	R0420	0	**0**	**0**	**0**	0	0	**0**
Gross – Non-proportional reinsurance accepted	R0430	0	**0**	**0**	**0**	0	0	**0**
Reinsurers' share	R0440	0	**0**	**0**	**0**	0	0	**0**
Net	**R0500**	**0**	**0**	**0**	**0**	**0**	**0**	**0**
Expenses incurred	R0550	0	**2,335**	**3,864**	**2,692**	9,882	186	**18,959**
Other expenses	R1200							
Total expenses	**R1300**							**18,959**

S.17.01.02 – Non-life technical provisions

		Direct business and accepted proportional reinsurance						Accepted non-proportional reinsurance:			
		Income protection insurance	Marine, aviation and transport insurance	Fire and other damage to property insurance	General liability insurance	Credit and suretyship insurance	Miscellaneous financial loss	Non-proportional health reinsurance	Non-proportional casualty reinsurance	Non-proportional property reinsurance	Total non-life obligations
		C0030	C0070	C0080	C0090	C0100	C0130	C0140	C0150	C0170	C0180
Technical provisions calculated as a whole	**R0010**										**0**
Total Recoverables from reinsurance/SPV and Finite Re after the adjustment for expected losses due to counterparty default associated to TP as a whole	R0050										0
Technical Provisions calculated as a sum of BE and RM											
Best estimate											
Premium provisions											
Gross – Total	**R0060**		**(3)**	**(2,908)**	**(3)**			**(334,712)**	**(794)**	**(338,421)**
Total recoverable from reinsurance/SPV and Finite Re after the adjustment for expected losses due to counterparty default	R0140		(66)	87					(292)	(271)
Net Best Estimate of Premium Provisions	**R0150**		**63**	**(2,995)**	**(3)**			**(334,712)**	**(502)**	**(338,150)**
Claims provisions										
Gross – Total	R0160		(2)	17,690	(12)			(10,960)	1,790	8,505
Total recoverable from reinsurance/SPV and Finite Re after the adjustment for expected losses due to counterparty default	R0240			2,917					(504)	2,413
Net Best Estimate of Claims Provisions	**R0250**		**(2)**	**14,773**	**(12)**			**(10,960)**	**2,294**	**6,092**
Total Best estimate – gross	**R0260**		**(6)**	**14,782**	**(15)**			**(345,673)**	**995**	**(329,916)**
Total Best estimate – net	**R0270**		**60**	**11,778**	**(15)**			**(345,673)**	**1,791**	**(332,058)**
Risk margin	**R0280**		**5**	**1,024**	**1**			**99,667**	**219**	**100,916**

Appendix: Quantitative reporting *continued*

S.17.01.02 – Non-life technical provisions

		Direct business and accepted proportional reinsurance						Accepted non-proportional reinsurance:			
		Income protection insurance	Marine, aviation and transport insurance	Fire and other damage to property insurance	General liability insurance	Credit and suretyship insurance	Miscellaneous financial loss	Non-proportional health reinsurance	Non-proportional casualty reinsurance	Non-proportional property reinsurance	Total non-life obligations
		C0030	C0070	C0080	C0090	C0100	C0130	C0140	C0150	C0170	C0180
Amount of the transitional on Technical Provisions											
TP as a whole	R0290										0
Best estimate	R0300										0
Risk margin	R0310										0
Technical Provisions											
Technical provisions – total	R0320		(1)		15,806	(14)		(246,005)		1,215	(228,999)
Recoverable from reinsurance contract/SPV and Finite Re after the adjustment for expected losses due to counterparty default – total	R0330		(66)		3,004					(795)	2,143
Technical provisions minus recoverables from reinsurance/SPV and Finite Re-total	R0340		65		12,802	(14)		(246,005)		2,010	(231,142)

The following columns, which are blank, have been omitted for improved presentation:

C0020	Medical expense insurance	C0110	Legal expenses insurance
C0040	Workers' compensation insurance	C0120	Assistance
C0050	Motor vehicle liability insurance	C0160	Non-proportional marine, aviation and transport reinsurance
C0060	Other motor insurance		

S.19.01.21 – Claims triangles

Accident year/ Underwriting year	Z0020	Underwriting year

Gross Claims Paid (non-cumulative)
(absolute amount)

		Development year										
	Year	0	1	2	3	4	5	6	7	8	9	10 & +
		C0010	C0020	C0030	C0040	C0050	C0060	C0070	C0080	C0090	C0100	C0110
Prior	R0100											–
N-9	R0160	–	–	–	–	–	–	–	–	–	–	
N-8	R0170	–	–	–	–	–	–	–	–	–		
N-7	R0180	–	–	–	–	–	–	–	–			
N-6	R0190	–	–	–	–	–	–	–				
N-5	R0200	–	–	–	–	–	–					
N-4	R0210	–	–	–	–	–						
N-3	R0220	–	–	–	–							
N-2	R0230	–	–	–								
N-1	R0240	–	–									
N	R0250	–										

		In current year	Sum of years (cumulative)
		C0170	C0180
	R0100	–	–
	R0160	–	–
	R0170	–	–
	R0180	–	–
	R0190	–	–
	R0200	–	–
	R0210	–	–
	R0220	–	–
	R0230	–	–
	R0240	–	–
	R0250	–	–
Total	R0260	–	–

Appendix: Quantitative reporting *continued*

S.19.01.21 – Claims triangles

Gross undiscounted Best Estimate Claims Provisions
(absolute amount)

		Development year										
	Year	0	1	2	3	4	5	6	7	8	9	10 & +
		C0200	C0210	C0220	C0230	C0240	C0250	C0260	C0270	C0280	C0290	C0300
Prior	R0100											
N-9	R0160											
N-8	R0170											
N-7	R0180											
N-6	R0190											
N-5	R0200			(151,633)								
N-4	R0210		(81,373)	(203,276)								
N-3	R0220	48,886	0	(106,341)								
N-2	R0230	(12)	363	(10,711)								
N-1	R0240	2,513	4,036									
	R0250	**15,387**										

		Year end (discounted data)
		C0360
	R0100	
	R0160	
	R0170	
	R0180	
	R0190	
	R0200	
	R0210	
	R0220	
	R0230	(10,647)
	R0240	(6,626)
	R0250	**8,505**
Total	R0260	17,010

S.23.01.01 – Own funds

		Total	Tier 1 – unrestricted	Tier 2	Tier 3
		C0010	C0020	C0040	C0050
Basic own funds before deduction for participations in other financial sector as foreseen in article 68 of Delegated Regulation (EU) 2015/35					
Ordinary share capital (gross of own shares)	R0010	1	1		
Share premium account related to ordinary share capital	R0030				
Initial funds, members' contributions or the equivalent basic own – fund item for mutual and mutual-type undertakings	R0040				
Subordinated mutual member accounts	R0050				
Surplus funds	R0070				
Preference shares	R0090				
Share premium account related to preference shares	R0110				
Reconciliation reserve	R0130	815,392	815,392		
Subordinated liabilities	R0140	598,717		598,717	
An amount equal to the value of net deferred tax assets	R0160	543			**543**
Other own fund items approved by the supervisory authority as basic own funds not specified above	R0180	536,317	536,317		
Own funds from the financial statements that should not be represented by the reconciliation reserve and do not meet the criteria to be classified as Solvency II own funds					
Own funds from the financial statements that should not be represented by the reconciliation reserve and do not meet the criteria to be classified as Solvency II own funds	R0220				
Deductions					
Deductions for participations in financial and credit institutions	R0230				
Total basic own funds after deductions	R0290	1,950,969	1,351,709	598,717	543
Ancillary own funds					
Unpaid and uncalled ordinary share capital callable on demand	R0300				
Unpaid and uncalled initial funds, members' contributions or the equivalent basic own fund item for mutual and mutual – type undertakings, callable on demand	R0310				
Unpaid and uncalled preference shares callable on demand	R0320				
A legally binding commitment to subscribe and pay for subordinated liabilities on demand	R0330				
Letters of credit and guarantees under Article 96(2) of the Directive 2009/138/EC	R0340				
Letters of credit and guarantees other than under Article 96(2) of the Directive 2009/138/EC	R0350				
Supplementary members calls under first subparagraph of Article 96(3) of the Directive 2009/138/EC	R0360				
Supplementary members calls – other than under first subparagraph of Article 96(3) of the Directive 2009/138/EC	R0370				
Other ancillary own funds	R0390				
Total ancillary own	R0400				

Appendix: Quantitative reporting *continued*

S.23.01.01 – Own funds

		Total	Tier 1 – unrestricted	Tier 2	Tier 3
		C0010	C0020	C0040	C0050
Available and eligible own funds					
Total available own funds to meet the SCR	R0500	1,950,969	1,351,709	598,717	543
Total available own funds to meet the MCR	R0510	1,950,426	1,351,709	598,717	
Total eligible own funds to meet the SCR	R0540	1,706,531	1,351,709	354,822	0
Total eligible own funds to meet the MCR	R0550	1,387,191	1,351,709	35,482	
SCR	R0580	709,644			
MCR	R0600	177,411			
Ratio of Eligible own funds to SCR	R0620	240.48%			
Ratio of Eligible own funds to MCR	R0640	781.91%			

		C0060
Reconciliation reserve		
Excess of assets over liabilities	R0700	1,352,253
Own shares (held directly and indirectly)	R0710	
Foreseeable dividends, distributions and charges	R0720	
Other basic own fund items	R0730	536,861
Adjustment for restricted own fund items in respect of matching adjustment portfolios and ring fenced funds	R0740	
Reconciliation reserve	R0760	815,392
Expected profits		
Expected profits included in future premiums (EPIFP) – Life Business	R0770	
Expected profits included in future premiums (EPIFP) – Non-life business	R0780	312,546
Total Expected profits included in future premiums (EPIFP)	R0790	312,546

The following columns, which are blank, have been omitted for improved presentation:

C0030 Tier 1 restricted

S.25.03.21 – Solvency Capital Requirement calculated using a full internal model

Unique number of component C0010	Components description C0020	Calculation of the Solvency Capital Requirement C0030
RES01	Reserve risk	471,318
PRM01	Premium risk	506,977
MKT01	Market risk	369,550
OPL01	Operational risk	72,779
CRT01	Credit risk	186,207

Calculation of Solvency Capital Requirement		C0100
Total undiversified components	R0110	1,606,831
Diversification	R0060	(897,187)
Capital requirement for business operated in accordance with Art. 4 of Directive 2003/41/EC	R0160	
Solvency capital requirement excluding capital add-on	R0200	709,644
Capital add-ons already set	R0210	
Solvency capital requirement	R0220	709,644
Other information on SCR		
Amount/estimate of the overall loss-absorbing capacity of technical provisions	R0300	
Amount/estimate of the overall loss-absorbing capacity of deferred taxes	R0310	34,696
Total amount of Notional Solvency Capital Requirements for remaining part	R0410	
Total amount of Notional Solvency Capital Requirements for ring fenced funds	R0420	
Total amount of Notional Solvency Capital Requirement for matching adjustment portfolios	R0430	
Diversification effects due to RFF nSCR aggregation for article 304	R0440	
Net future discretionary benefits	R0460	

Approach to tax rate	C0109
Approach based on average tax rate	Yes
	LAC DT

	C0130
Amount/estimate of LAC DT	34,696
Amount/estimate of LAC DT justified by reversion of deferred tax liabilities	34,696
Amount/estimate of LAC DT justified by reference to probable future taxable economic profit	
Amount/estimate of AC DT justified by carry back, current year	
Amount/estimate of LAC DT justified by carry back, future years	
Amount/estimate of Maximum LAC DT	

Appendix: Quantitative reporting *continued*

S.28.01.01 – Minimum Capital Requirement

Linear formula component for non-life insurance and reinsurance obligations

MCR calculation non-life		Non-life activities		
		Net (of reinsurance/SPV) best estimate and TP calculated as a whole	Net (of reinsurance) written premiums in the last 12 months	Linear formula component for non-life insurance and reinsurance obligations – MCR calculation
		C0020	C0030	
Medical expense insurance and proportional reinsurance	R0020			
Income protection insurance and proportional reinsurance	R0030			
Workers' compensation insurance and proportional reinsurance	R0040			
Motor vehicle liability insurance and proportional reinsurance	R0050			
Other motor insurance and proportional reinsurance	R0060			
Marine, aviation and transport insurance and proportional reinsurance	R0070	60	95	
Fire and other damage to property insurance and proportional reinsurance	R0080			
General liability insurance and proportional reinsurance	R0090	11,778	19,217	
Credit and suretyship insurance and proportional reinsurance	R0100		38	
Legal expenses insurance and proportional reinsurance	R0110			
Assistance and proportional reinsurance	R0120			
Miscellaneous financial loss insurance and proportional reinsurance	R0130			
Non-proportional health reinsurance	R0140			
Non-proportional casualty reinsurance	R0150		103,923	
Non-proportional marine, aviation and transport reinsurance	R0160			
Non-proportional property reinsurance	R0170	1,791	2,334	

S.28.01.01 – Minimum Capital Requirement

Linear formula component for life insurance and reinsurance obligations

MCR calculation Life		Life activities		
		Net (of reinsurance/SPV) best estimate and TP calculated as a whole C0050	Net (of reinsurance/SPV) total capital at risk C0060	Linear formula component for life insurance and reinsurance obligations – MCR calculation
Obligations with profit participation – guaranteed benefits	R0210			
Obligations with profit participation – future discretionary benefits	R0220			
Index-linked and unit-linked insurance obligations	R0230			
Other life (re)insurance and health (re)insurance obligations	R0240			
Total capital at risk for all life (re)insurance obligations	R0250			

		MCR components		
		Non-life activities C0010	Life activities C0040	Total
MCR_{NL} Result	R0010	20,983		20,983
MCR_{L} Result	R0200			

Overall MCR calculation			C0070
Linear MCR	R0300		20,983
SCR	R0310		709,644
MCR cap	R0320	45.00%	319,340
MCR floor	R0330	25.00%	177,411
Combined MCR	R0340		177,411
Absolute floor of the MCR	R0350		2,789
			C0070
Minimum Capital Requirement	R0400		177,411

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