



# CONVEX GROUP LIMITED

## Convex Re Limited

Financial Condition Report  
December 31, 2021  
(Expressed in thousands of U.S. Dollars)



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# Executive summary

Convex Group Limited (“CGL”) is a Bermuda-based holding company for the Convex group of companies (collectively, the “Group” or “Convex”). Convex was incorporated under the laws of Bermuda on October 24, 2018. Through its subsidiaries with operations in Bermuda and the United Kingdom, the Company primarily offers property and casualty (“P&C”) insurance and reinsurance focused on large commercial clients with complex insurance requirements.

Convex Re Limited (“CRL”) is the Bermuda-based reinsurance company of the Convex Group Limited and is licensed by the Bermuda Monetary Authority (“BMA”). CRL was incorporated under the laws of Bermuda on November 21, 2018 and is 100% owned by CGL. CRL is registered as a Class 4 insurer under The Insurance Act 1978 of Bermuda, amendments thereto and related Regulations (“The Act”).

This Financial Condition Report (“FCR”) is based on the Insurance (Public Disclosure) Rules 2015 which came into effect on January 1, 2016. These rules specify the requirement for commercial insurers to prepare an FCR and requires that it be made publicly available on the insurer’s website. This report provides a discussion on the Company’s business and performance (section A), governance structure (section B), risk profile (section C), solvency valuation (section D), capital management (section E) and subsequent events (section F).

This report is primarily based on the Economic Balance Sheet (“EBS”) of CGL and CRL as at December 31, 2021. In addition, certain sections include information based on the consolidated financial statements for the year ended December 31, 2021 which have been prepared in accordance with the accounting principles generally accepted in the United States (“U.S. GAAP”).

CRL filed its statutory financial return for the reporting period on a consolidated basis. CRL has been exempted from submitting a separate Financial Condition Report by the BMA. Disclosures that are the same across the legal entities (such as governance, for example) are mentioned once in the Group FCR, and areas where there are differences across the legal entities (such as business and performance, capital management, risk profile, solvency valuation, and subsequent events) are disclosed separately so that the reader of the document would obtain the same understanding of the legal entities as if reading a separate FCR.

“Convex” is used when disclosures are the same across the legal entities. References to the specific legal entities (i.e., “CGL” or “CRL”) is used to denote when there are differences between the legal entities. CGL and CRL each refer to the respective consolidated entities.

# A. Business and performance

## A.1. Business Overview

Having spent the last two years defining and implementing the processes required to underwrite business, in 2021 the Group focused on continued business growth which has resulted in a significant increase in gross written premium to \$2,115m (2020: \$1,095m). A prudent approach to risk retention resulted in significant use of reinsurance protection which in turn resulted in a significant level of ceded written premium.

The continued ramp up of operations in 2021, resulted in increased operating expenses attributed mainly to an increase in headcount, and personnel-related costs such as IT and Travel & Entertainment. As a result of the Group's underwriting portfolio, the Company was exposed to losses from 2021 natural catastrophes including Hurricane Ida, Winter Storm Uri, and the European Floods. The combination of these factors contributed to a net loss in CGL of \$157.9 million (2020: net loss \$179.2 million), and a net loss in CRL of \$142.8 million (2020: net loss \$156.8 million).

On 26 March 2021, Convex Europe S.A ("CES") was incorporated as a non-life insurance company in Luxembourg. CES has a UK branch which received regulatory approval from the UK regulators (PRA and FCA) on 2 December 2021. CES is a 100% owned subsidiary of Convex Insurance UK Limited ("CIL") and began writing business in November 2021. CIL is a 100% subsidiary of CRL. On 25 June 2021, Convex North America Insurance Services LLC ("CUS") was incorporated in Delaware. CUS is a managing general agent and is a 100% owned subsidiary of CIL. On 28 May 2021, Convex Guernsey Limited was incorporated in Guernsey, and is a 100% subsidiary of CRL.

Convex views pricing in the insurance industry to be cyclical. Over the past decade there has been a significant decrease in pricing in both the insurance and reinsurance market, which Convex believe is attributable primarily to the emergence of alternative sources of capital, less disciplined underwriting from incumbent providers, intermediary consolidation, and an expansion of delegated authorities. 2020 was a year of rate increase with COVID-19 and its impacts on a number of insurance and reinsurance players. While 2021 continued to benefit from 2020 of rate increases in many lines of business, this was against a backdrop of rising inflation rates. Despite these market developments, Convex's proposition will continue to be underpinned by a disciplined underwriting approach with a focus on profitability over volume. In addition, the cost advantage enabled by the efficient operating model further enhances Convex's competitive position in a more difficult pricing environment.

Convex believes that the specialty insurance and reinsurance markets offer greater scope for premium growth and profitable underwriting due to on-going dislocation in the market, increasing client demand for underwriting solutions for complex risks and the continued emergence of higher-complexity risk types.

Within these specialty insurance and reinsurance markets, Convex will focus on the most complex end of the risk spectrum, supported by our differentiated operating model and underwriting experience and capabilities. One of the key elements of differentiation within the operating model is Convex's use of outsourcing within Finance, HR, Underwriting Operations and Technology to supplement in-house capabilities. In this, one of our key partners, WNS will continue to provide a breadth and depth of expertise to Convex across a variety of areas.

Convex's differentiated proposition includes the following:

- a focus on large commercial clients and complex risk types;
- appropriate specialist underwriting capabilities and experience of writing consistently profitable business in Convex's target classes of business;
- the ability to provide insurance and/or reinsurance capacity for relatively large risks, with access to additional third-party capacity as appropriate;
- a high-touch client service model supported by a wider operating model tailored to the type of business targeted by Convex; and
- modern supporting technology specifically designed to support the business targeted by Convex, with no outdated legacy systems to be maintained.

In order to guide management in implementing this proposition, as part of its business planning approach, Convex has again constructed a business plan which considers different potential market-level scenarios for the short and long-tailed insurance markets, and how Convex would respond in each scenario.

## **COVID-19**

While financial markets and the economy in wider terms continued to be impacted by COVID-19 in 2021, the financial and operational impact to Convex remained minimal in the year. Convex's conservative investment portfolio protected the business against severe market shocks, and the business continued to be operationally resilient due to the measures put in place at the onset of the pandemic. Both the HR and Marketing teams provided various networks and initiatives to ensure that Convex employees were supported, with employee well-being always being a priority for senior management. The Risk Management function continues to monitor and assess implications of COVID-19 on the business.

## **Ukraine/Russia Conflict**

On 24 February 2022 Russia launched an invasion of Ukraine escalating the ongoing conflict between the two countries. The Company is monitoring, and complying, with sanctions and government guidance, and is in the process of assessing the impact of this on its various operational functions including investments, compliance, and underwriting exposures. In terms of underwriting exposures the Company has exposure in various classes of business, including but not limited to, Aerospace, Marine, and Political Violence. Whilst, there is a high degree of uncertainty in relation to the value of the insured losses, the Company does not expect the impact on capital to be significant.

### **A.1.1. Name of the insurance group**

Convex Group Limited  
Point House, 6th Floor  
6 Front Street  
Hamilton HM11  
Bermuda

### **A.1.2. Name and contact details of the insurance group supervisor**

Bermuda Monetary Authority  
BMA House  
43 Victoria Street  
Hamilton, Bermuda  
Telephone: (441) 295-5278

### **A.1.3. Name and contact details of the approved group auditor**

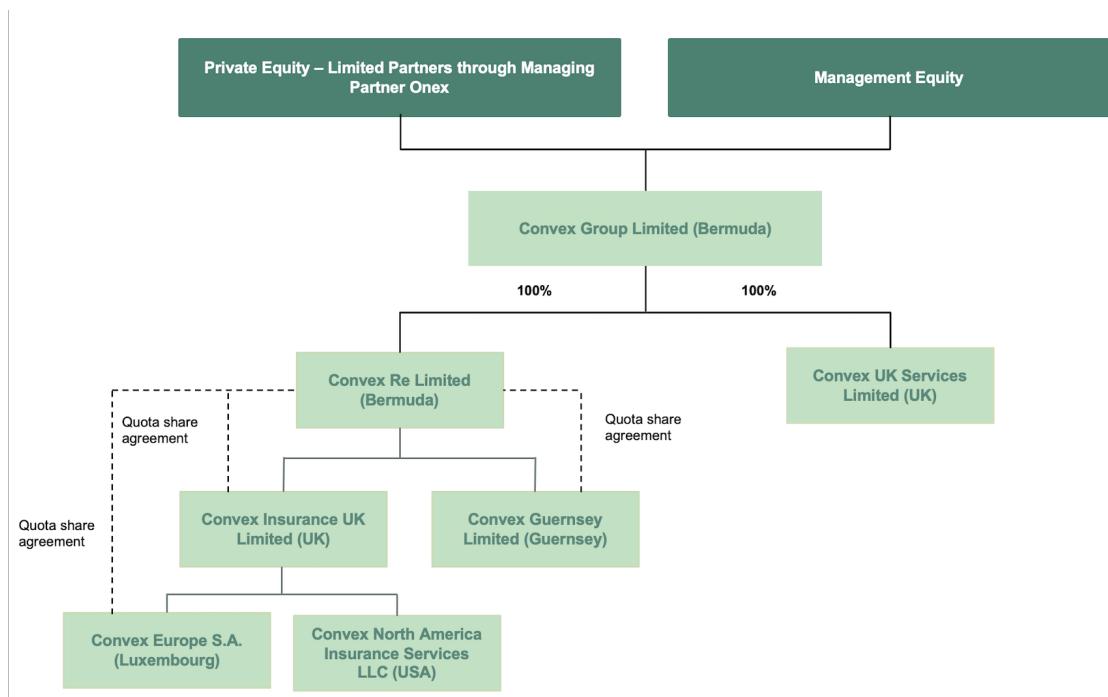
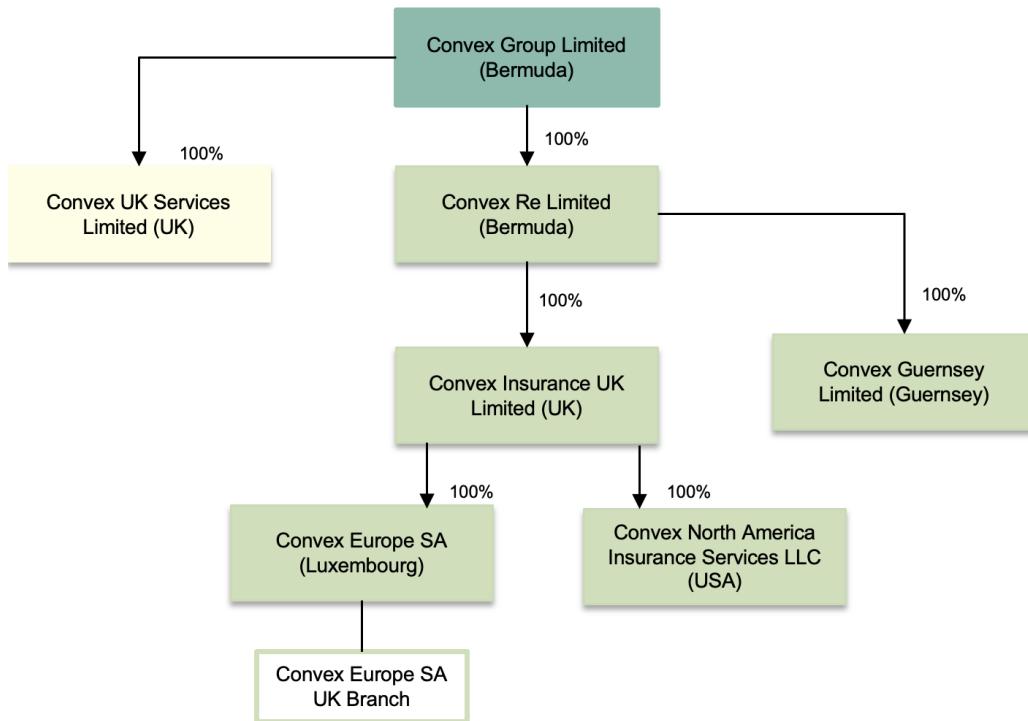
PricewaterhouseCoopers Ltd. (Bermuda)  
Washington House  
4th Floor, 16 Church Street  
Hamilton HM11  
Bermuda

## **A.2. A description of the ownership details including proportion of ownership interest**

The ownership interest of Convex can be viewed in the Group structure chart below. We note that, except where noted, CGL is the ultimate parent owning 100% of all subsidiary companies depicted in the chart, including CRL. CRL is a direct subsidiary of CGL.

Convex's private equity-limited partners through managing partner Onex hold approximately 97% of the total voting shares of the Company with the remaining ownership interest (3%) held by the directors, senior management and employees, as well as families and friends of Convex's founders.

### A.3. Group structure chart for the Company



Convex Group is a property and casualty insurance and reinsurance carrier focused on large commercial clients with complex insurance requirements.

Convex has a streamlined organisational structure consisting of:

- **Convex Group Limited (“CGL”):** Holding company in Bermuda
- **Convex Re Limited (“CRL”):** Bermuda operating company, which seeks to be the best-in-class specialty P&C reinsurer focusing on complex risks
- **Convex Insurance UK Limited (“CIL”):** UK operating company, closely aligned with the Bermuda operating company
- **Convex UK Services Limited (“CSL”):** a services company, which is the main employing and contracting entity in the UK for efficiency and operational purposes
- **Convex Europe S.A. (“CES”):** European operating company, formed as a result of Brexit, closely aligned with the UK operating company
- **Convex Guernsey Limited (“CGU”):** Guernsey operating company
- **Convex North America Insurance Services LLC (“CUS”):** US Managing Agency

#### **A.4. Insurance business written by business segment and by geographical region during the reporting period**

Convex has only one business segment. The following table sets forth the gross premiums written allocated to the territory of coverage exposure for the periods ended December 31, 2021 and 2020, respectively (USD in thousands):

Geographical Region	December 31, 2021 \$000s	December 31, 2020 \$000s
North America	1,164,208	597,905
Europe (including UK)	541,132	258,611
Africa and Middle East	86,240	64,780
Rest of world	323,273	173,962
<b>Total</b>	<b>2,114,853</b>	<b>1,095,258</b>

#### **A.5. Performance of investments, by asset class and details of material income and expenses incurred during the reporting period**

CGL's aggregate investment portfolio was primarily invested in investment grade fixed income securities during 2021 (c96%), with the remaining modest allocation to risk mandates with a focus on fundamental value. Over the period, the CGL aggregate investment assets produced a total return of 0.89% (2020: 3.44%), and the CRL investment assets produced a return of -0.19% (2020: 3.87%). Both portfolios' returns were dampened by increases in risk free yields, as central banks set out plans to unwind some of the extraordinary monetary policy put in place during the pandemic. This caused negative price returns within the portfolio that offset the steady coupon income received throughout the year. The CGL aggregate portfolio return was bolstered by a modest exposure to US equities that performed strongly in 2021.

The duration of the investment portfolio remains short relative to each entity's liability benchmark given the prospect of future increases in risk free yields in 2022 and beyond.

## CGL

During the periods ended and December 31, 2021, and December 31, 2010, respectively, the net investment returns were derived from the following sources (USD in thousands):

	Period ended, December 31, 2021 \$000s	Period ended, December 31, 2020 \$000s
Fixed maturities, short-term investments and other investments	44,414	31,608
Cash and cash equivalents	15	58
Total gross investment income	44,429	31,666
Amortization expenses	(22,283)	(3,827)
Investment expenses	(2,778)	(1,358)
Total net investment income	19,369	26,481
Realized gains on investments	1,951	16,372
Change in unrealized gains on investments	4,483	12,529
<b>Total net investment income</b>	<b>25,803</b>	<b>55,382</b>

## CRL

During the periods ended and December 31, 2021, and December 31, 2020, respectively, the net investment returns were derived from the following sources:

	December 31, 2021 \$000s	December 31, 2020 \$000s
Fixed maturities, short-term investments and other investments	39,052	19,918
Cash and cash equivalents	34	73
Total gross investment income	39,086	19,991
Amortization expenses	(22,100)	(3,925)
Investment expenses	(3,396)	(3,368)
Total net investment income	13,590	12,698
Realized gains on investments	(157)	7,980
Change in unrealized gains on investments	(20,654)	12,835
<b>Total net investment income</b>	<b>(7,221)</b>	<b>33,513</b>

## CGL

As at December 31, 2021, the fair values of the investment portfolio of CGL \$3,129 million and were split by asset class as follows were split by asset class as follows:

	Amortized Cost or Cost \$000s	Fair Value \$000s
U.S. government and government agency	1,325,658	1,322,251
Agency residential mortgage-backed securities	69,001	68,392
Non-agency residential mortgage-backed securities	8,788	8,879
U.S. corporate	976,154	975,788
Non-U.S. corporate	5,204	5,293
Non-U.S. government and government agency	1,703	1,640
Asset-backed securities	118,592	117,717
Commercial mortgage-backed securities	13,777	13,740
<b>Total fixed maturities</b>	<b>2,518,878</b>	<b>2,513,700</b>
<b>Short-term investments</b>	<b>510,607</b>	<b>510,322</b>
<b>Other investments<sup>(a)</sup></b>	<b>70,623</b>	<b>105,095</b>
<b>Total investments</b>	<b>3,100,107</b>	<b>3,129,117</b>

a. Investment partnerships

As at December 31, 2020, the fair values of the investment portfolio of CGL totalled \$2,629.7 million and were split by asset class as follows (USD in thousands):

	Amortized Cost or Cost \$000s	Fair Value \$000s
U.S. government and government agency	455,572	458,525
Agency residential mortgage-backed securities	61,851	63,400
Non-agency residential mortgage-backed securities	8,093	8,224
U.S. corporate	754,899	774,201
Non-U.S. corporate	5,032	5,237
Non-U.S. government and government agency	–	–
Asset-backed securities	151,587	153,520
Commercial mortgage-backed securities	19,061	19,376
<b>Total fixed maturities</b>	<b>1,459,095</b>	<b>1,482,483</b>
<b>Short-term investments</b>	<b>1,092,839</b>	<b>1,092,736</b>
<b>Other investments</b>	<b>50,000</b>	<b>54,498</b>
<b>Total investments</b>	<b>2,601,934</b>	<b>2,629,717</b>

## CRL

As at December 31, 2021, the fair values of the investment portfolio of CRL totalled \$2,694.9 million and were split by asset class as follows (USD in thousands):

	Amortized Cost or Cost \$000s	Fair Value \$000s
U.S. government and government agency	1,171,748	1,168,490
Agency residential mortgage-backed securities	61,412	60,490
Non-agency residential mortgage-backed securities	6,922	6,989
U.S. corporate	796,488	795,813
Non-U.S. corporate	81,237	76,989
Non-U.S. government and government agency	1,703	1,640
Asset-backed securities	101,718	100,830
Commercial mortgage-backed securities	7,336	7,251
<b>Total fixed maturities</b>	<b>2,228,564</b>	<b>2,221,492</b>
<b>Short-term investments</b>	<b>454,999</b>	<b>454,772</b>
<b>Other investments</b>	<b>18,564</b>	<b>18,667</b>
<b>Total investments</b>	<b>2,702,127</b>	<b>2,694,931</b>

As at December 31, 2020, the fair values of the investment portfolio of CRL totalled \$2,243.4 million and were split by asset class as follows (USD in thousands):

	Amortized Cost or Cost \$000s	Fair Value \$000s
U.S. government and government agency	433,535	433,548
Agency residential mortgage-backed securities	59,874	60,764
Non-agency residential mortgage-backed securities	6,488	6,589
U.S. corporate	624,086	638,472
Non-U.S. corporate	5,121	5,237
Non-U.S. government and government agency	–	–
Asset-backed securities	109,716	111,074
Commercial mortgage-backed securities	12,350	12,451
<b>Total fixed maturities</b>	<b>1,251,170</b>	<b>1,268,135</b>
<b>Short-term investments</b>	<b>975,278</b>	<b>975,245</b>
<b>Other investments</b>	<b>–</b>	<b>–</b>
<b>Total investments</b>	<b>2,226,448</b>	<b>2,243,380</b>

## Details of Material Income and Expenses

### CGL

The below table provides summaries of CGL's material income and expenses line items for the periods ended December 31, 2021, and December 31, 2020, respectively (USD in thousands):

	December 31, 2021 \$000s	December 31, 2020 \$000s
<b>Revenues</b>		
Gross premiums written	2,114,853	1,095,258
Net premiums earned	1,042,128	374,875
Net investment income	25,803	55,382
<b>Expenses</b>		
Losses and loss expenses		
Current period	795,533	364,408
Prior years	4,750	(532)
Total losses and loss expenses	800,283	363,876
Policy acquisition costs	147,232	58,791
General and administrative expenses	242,564	162,974

### CRL

The below table provides summaries of the CRL's material income and expenses line items for the periods ended December 31, 2021, and December 31, 2020, respectively (USD in thousands):

	Period ended, December 31, 2020 \$000s	Period ended, December 31, 2019 \$000s
<b>Revenues</b>		
Gross premiums written	2,114,853	1,095,258
Net premiums earned	1,042,128	374,875
Net investment (loss) / income	(7,221)	33,513
<b>Expenses</b>		
Losses and loss expenses		
Current period	795,533	364,408
Prior years	4,750	(532)
Total losses and loss expenses	800,283	363,876
Policy acquisition costs	147,232	58,791
General and administrative expenses	206,109	114,999

Highlights for CGL and CRL for the periods ended December 31, 2021 and December 31, 2020 were as follows:

**Gross premiums written** for the period ended December 31, 2021 amounted to \$2,114.8 million (2020: \$1,095.3 million). Convex underwrites a significant amount of its reinsurance business through three brokers:

Broker	2021	2020
Marsh & McLennan Companies, Inc.	27.8%	28.7%
Aon Benfield	20.0%	19.5%
Willis Towers Watson	13.7%	19.8%

**Net premiums earned** for the period ended December 31, 2021 amounted to \$1,042.1 million (2020: \$374.9 million).

Reinsurance contracts can be written on a risks-attaching or losses-occurring basis. Under risks attaching reinsurance contracts, all claims from cedants' underlying policies incepting during the reinsurance contract period are covered, even if they occur after the expiration date of the reinsurance contract. In contrast, losses occurring reinsurance contracts cover all claims occurring during the period of the contract, regardless of the inception dates of the underlying policies. Any claims occurring after the expiration of the losses occurring contract are not covered.

Insurance and reinsurance premiums written are recorded at the inception of the policy. Reinsurance premiums are estimated based on information received from brokers, ceding companies and reinsureds, and any subsequent differences arising on such estimates are recorded in the periods in which they are determined. For contracts where initial premium is based on an estimate, the amount of premium ultimately received may differ materially from the amounts initially estimated in the consolidated financial statements. These estimates are reviewed regularly and, as new information becomes known, the recorded premiums are adjusted as necessary. These adjustments sometimes lead to an increase or decrease in expected premiums. Adjustments to premium estimates, if any, are recorded in the period in which they become known.

Premiums written are earned on a pro-rated basis over the term of the related policy or contract. For direct insurance, and for facultative and losses-occurring reinsurance contracts, the earnings period is generally the same as the term of the related contract or policy. For reinsurance contracts written on a risks-attaching basis, the earnings period is based on the terms of the underlying contracts and policies and is generally assumed to be 24 months. The portion of the premiums written applicable to the unexpired terms of the underlying contracts and policies in force is recorded as unearned premiums.

**Losses and loss expenses** for the period ended December 31, 2021 was \$800.3 million (2020: \$363.9 million), a loss ratio of 76.8% (2020: 97.1%). Incurred losses and loss expenses consists of gross losses and loss expenses of \$1,131.5 million (2020: \$471.4 million) and estimated reinsurance recoveries of \$331.2 million (2020: \$107.5 million).

#### Event/Non-event losses

Details of Convex's losses and loss expenses for the periods ended December 31, 2021, and December 31, 2020, respectively were as follows (USD in thousands):

	Period ended, December 31, 2021 \$000s	Period ended, December 31, 2020 \$000s
<b>Event</b>		
Current period	286,037	100,804
Prior years	11,526	–
Sub-total	297,563	100,804
<b>Non-Event</b>		
Current period	509,496	263,304
Prior years	(6,776)	(532)
Sub-total	502,720	262,772
<b>Total losses and loss expenses</b>	<b>800,283</b>	<b>363,576</b>

**Policy acquisition costs** are costs that vary with, and are directly related to, the successful production of new and renewal business, and consist principally of commissions and brokerage expenses. These costs are deferred and amortized over the period in which the related premiums are earned. Acquisition costs are shown net of commissions earned on reinsurance ceded. However, if the sum of a contract's expected losses and loss expenses and deferred acquisition costs exceeds related unearned premiums, a premium deficiency is determined to exist. In this event, deferred acquisition costs are immediately expensed to the extent necessary to eliminate the premium deficiency. If the premium deficiency exceeds deferred acquisition costs, then a liability is accrued for the excess deficiency. There were no significant premium deficiency adjustments recognized during the periods ended December 31, 2021, or December 31, 2020. Policy acquisition costs also include profit commissions, which are recognized on a basis consistent with our estimate of losses and loss expenses. Policy acquisition cost ratio for the period ended December 31, 2021 was 14.1% (2020: 15.6%).

**General and administrative expenses** for the period ended December 31, 2021 totalled \$242.6 million (2020: \$155.2 million) for CGL. For CRL these expenses totalled \$206.1 million for the period ended December 31, 2021 (2020: \$115.0 million). General and administrative expenses include staff costs, office and infrastructure related expenses, business expenses and management fees.

#### A.6. Any other material information

No other material information to report.

# B. Governance structure

## B.1. Board and senior management

The CGL Board's role is to be collectively responsible for promoting the long-term sustainability of the company, generating value for shareholders in a manner which also allows it to discharge its responsibilities to its stakeholders whilst maintaining compliance with legal and regulatory requirements. The CGL Board sets the purpose, strategy and values of the company and seeks to ensure that the culture within the company is aligned with these. The CGL Board is also responsible for setting the company's risk appetite and satisfies itself that financial controls and risk management systems are robust, while ensuring the company is adequately resourced. It also ensures that there is appropriate dialogue with shareholders on strategy and remuneration.

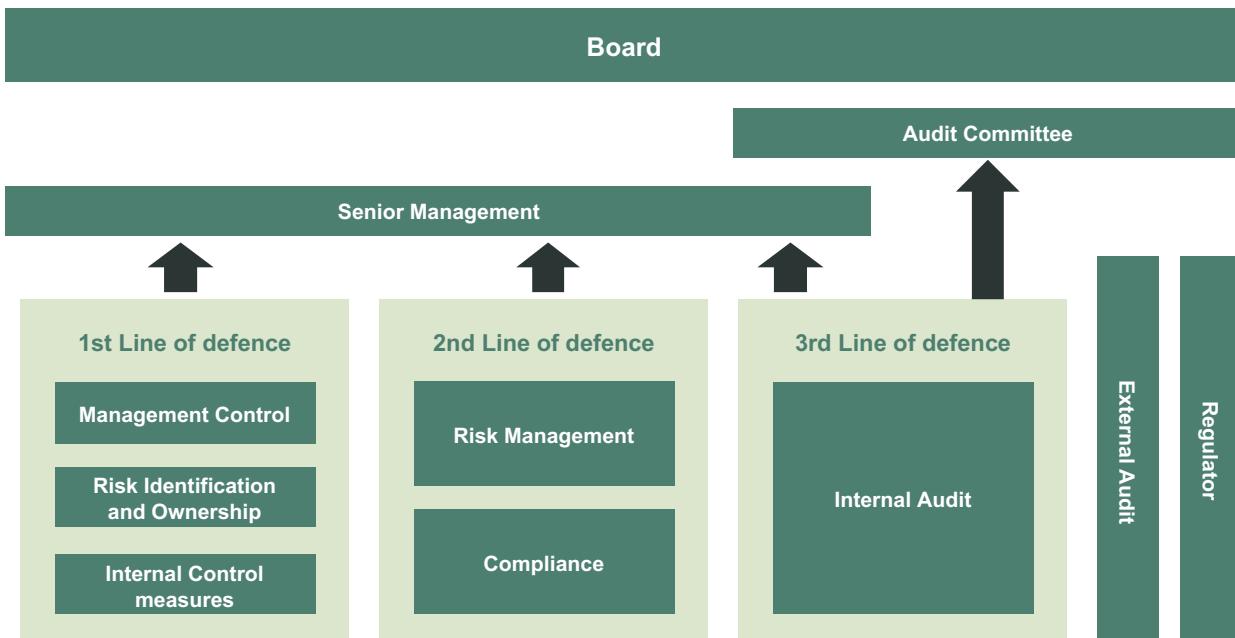
The CGL Board's responsibilities include taking account of other stakeholders including employees, policyholders and customers. This includes ensuring that an appropriate system of risk governance is in place throughout Convex. To discharge this responsibility, the CGL Board has established a robust governance and control framework that includes levels of authority, accountability, responsibility, oversight and challenge and is supported by a 'three lines of defence' model.

### B.1.1. Control Framework

The CGL Board retains ultimate responsibility for Convex's systems of internal control and the risk management framework. They review the effectiveness through the establishment of an effective governance and monitoring process. This includes regular reporting and in-depth monitoring of the establishment and operation of prudent and effective controls.

Convex operates a 'three lines of defence' controls framework whereby the business implements first line controls so as to ensure that the front-line business units comply with the requirements set by the CGL Board regarding risk appetite and control. The compliance and risk management functions undertake monitoring to provide second line assurance that these controls are effective, meet the expectations of our regulators and are in accordance with the company's risk appetite. The Internal Audit function provides independent oversight across Convex and reports to the Audit Committee of the CGL Board on the effectiveness of the risk management and internal control framework.

The respective responsibilities of each line are shown below:



### **First line: Management Monitoring**

Management is responsible for implementing and monitoring the system of internal control and for complying with the risk appetite and controls set by the CGL Board.

### **Second line: Risk and Compliance functions**

The Risk function is accountable for developing the Risk Management Framework (“RMF”) and for the quantitative and qualitative oversight of the process to identify, measure, manage, monitor and report (“IMMMR”) risk. As the business responds to changing market conditions, customer needs and regulatory requirements, the Risk function regularly monitors the appropriateness of the company’s risk policies and the RMF to ensure they remain up to date.

The Compliance function supports and advises the business on the identification, measurement and management of its regulatory, financial crime and conduct risks; in this regard the Compliance function acts as part of the first line of defence. Compliance also monitors, evaluates and provides assurance on the effectiveness of the first line controls and therefore also acts as part of the second line of defence. In addition, Compliance is also accountable for monitoring and reporting on the performance of Convex against the conduct risk metrics agreed by the CGL Board.

### **Third line: Internal Audit**

This function provides independent and objective assessment on the robustness of the RMF and the appropriateness and effectiveness of internal control to the Audit Committees, and the Boards of the respective legal entities.

#### **B.1.2. Board of Directors and Executive officers**

The directors of CGL oversee the management of Convex’s business and affairs and are responsible for the corporate governance framework; as at April 30, 2022, the directors were:

- Stephen Catlin;
- Paul Brand;
- Benjamin Meuli;
- Fiona Luck;
- Dr Claus-Michael Dill;
- Nick Lyons;
- Kelly Lyles;
- Bobby Le Blanc;
- Todd Clegg;
- David Morin; and
- Dan Sawyer.

CGL’s executive officers are responsible for the development and execution of the Company’s internal controls, budgets, strategic plans and objectives. As at April 30, 2022, the executive officers consisted of the following persons:

- Stephen Catlin;
- Paul Brand;
- Benjamin Meuli;Adrian Spieler;
- Mark van Zanden;
- Robina Malik;
- Douglas Howat;
- Theo Butt;
- Claire Ball
- Matt Paskin and
- Brian Bissett.

The directors of CRL oversee the management of the entity's business and affairs and are responsible for the corporate governance framework; as at April 30, 2022 the directors were:

- Matt Paskin;
- Stephen Catlin;
- Robert Marcotte;
- Dr Claus-Michael Dill;
- Fiona Luck; and
- Nicholas Lyons.

CRL's executive officers as at April 30, 2022 consisted of the following persons:

- Matt Paskin;
- Robert Marcotte;
- Lisa Robinson;
- Lorraine Mullins;
- Ben Savill;
- Pierre-Francois Rodriguez; and
- Shannon Dyer.

#### **B.1.3. Description of remuneration policy and practices and performance-based criteria governing the board, and its senior executives and employees**

##### **Remuneration**

Convex's reward principles and arrangements are designed to incentivise and reward employees for achieving stated business goals in a manner that is consistent with the company's approach to sound and effective risk management. The remuneration approach is aligned to the company's strategy, incentivises achievement of the company's annual business plan and longer-term sustainable growth of the business and differentiates reward outcomes based on performance and behaviour that is consistent with the company's values.

The remuneration approach provides market competitive remuneration and incentivises all staff members to contribute towards both the annual business plan and the longer-term strategic objectives of the company. Variable remuneration can be zero if performance thresholds are not met.

Remuneration of staff is split between the following components:

- Basic salary informed by individual and business performance, levels of increase for the broader employee population and relevant pay data;
- Variable components;
- Pensions; and
- Benefits.

Independent non-executive directors receive a basic annual fee in respect of their Convex Board duties. Further fees are paid for membership and, where appropriate, chairing Convex Board committees. Fees will be reviewed annually taking into account market data and trends and the scope of specific Convex Board duties.

#### **B.1.4. Description of the supplementary pension or early retirement schemes for members, the Board and senior executives**

Convex does not maintain a defined benefit pension or retirement plan for its named executive officers. CGL and CRL provide pension benefits to eligible employees through various plans which are managed externally and sponsored by the Company. Contributions are expensed as incurred.

### **B.1.5. Material transactions with shareholder controllers, persons who exercise significant influence, the board or senior executives**

During the period ended December 31, 2021, Convex incurred expenses for professional services, accommodation, travel and entertainment which were provided by various related parties of Convex and totalled \$nil (2020: \$15 thousand).

Included in "Gross premium written" are gross premiums written with various related parties of Convex and totalled \$128,430 (2020: \$18.8 million). The primary related party was Howden UK Group Limited which produced \$17.2 million (2020: \$17.2 million) of the gross premium written. Nicholas Lyons, a director of Convex, serves as a director for Howden UK Group Limited. There was a \$19.2 million (2020: \$8.5 million) balance in insurance receivables at December 31, 2021 related to these transactions.

## **B.2. Fitness and propriety requirements**

### **B.2.1. Description of the fit and proper process in assessing the board and senior executives**

Directors and senior executives are required to be assessed for their fitness and propriety at appointment and on an ongoing basis.

Assessing a person's fitness and propriety includes an assessment of:

- Their honesty, integrity and reputation;
- Their competence and capability;
- Their financial soundness.

The CGL Board identifies the skills and experience that are required at Board level, including the appointments of executive directors or independent non-executive directors, so as to ensure the relevant diversity, experience, skills and knowledge required for effective oversight and challenge.

Convex ensures that the individuals it employs are fit and proper in accordance with the requirements set by regulators in the jurisdictions in which Convex and its subsidiaries operate.

To ensure that Convex identifies and recruits appropriate people, the individual is assessed for:

- Fitness: skills and experience must be adequately matched to the role they are being employed to undertake.
- Propriety: checks are in place to ensure that an individual is honest, of good reputation, has integrity and is financially sound.

A basic level of screening is applied to all employees. Senior executives are also subject to the enhanced screening.

### **B.2.2. Description of professional qualifications, skills and expertise of the board and senior executives to carry out their functions**

CGL's Directors and officers are as follows:

#### **Stephen Catlin – Chairman and CEO**

- More than 45 years of insurance industry experience.
- Founder and CEO of Catlin (1984-2015).
- Executive Deputy Chairman of XL Catlin (2015-17).
- Chairman of The Association of Bermuda Insurers and Reinsurers (2015-17).

#### **Paul Brand – Deputy CEO**

- Insurance industry experience, including 31 years at Catlin and XL Catlin.
- Chief Underwriting Officer at Catlin (2003-15).
- Chief Underwriting Officer (Insurance) at XL Group (2015-17).
- Chairman of Accelerate, XL Catlin's in-house innovation team (2016-18).

**Benjamin Meuli – Chief Financial Officer**

- More than 40 years of insurance and finance experience.
- Spent seven years at Catlin and XL Catlin.
- Held various senior roles at Swiss Re, Morgan Stanley and JP Morgan.
- Vice Chairman of GAM Investments since 2016.

**Fiona Luck – Independent Non-Executive Director**

- Over 30 years of insurance and finance experience.
- Spent eleven years at XL Group.
- Held various senior positions at XL, including Executive Vice-President of Group Operations.
- Serves as a Non-Executive Director on a number of boards including Lloyds' of London Franchise Board and HSBC (Bermuda) Limited.
- Held senior positions at Ace Bermuda and Marsh & McLennan.

**Dr. Claus-Michael Dill – Independent Non-Executive Director**

- Extensive industry experience having served as the CEO of Damp Holding AG, Axa Kozern AG and Switzerland General Insurance.
- Previously Non-Executive Director of XL Group Ltd., Catlin Group Ltd. and General Reinsurance AG.
- Holds a Ph.D. in Economics from University of Munich.

**Nick Lyons – Independent Non-Executive Director**

- Extensive experience in investment banking with 12 years at JP Morgan and 8 years at Lehman Brothers.
- Appointed Chairman of the Board of Directors of Phoenix Group Holdings in 2018.
- Held numerous positions on the boards of other financial institutions including the Pension Insurance Corporation.

**Bobby Le Blanc – Non-Executive Director**

- Extensive capital market and insurance experience as Co-Head of Onex Partners and 7 years at Berkshire Hathaway.
- Holds numerous positions on the boards of companies representing a variety of industries.
- Holds an M.B.A. from New York University.

**David Morin – Non-Executive Director**

- Senior Director of the Direct Private Equity team at the Public Sector Pension Investment Board.
- Advised Credit Suisse clients on mergers and acquisitions in the telecom, media and technology sectors prior to joining PSP investments in 2013.
- Holds an M.B.A. from INSEAD.

**Todd Clegg – Non-Executive Director**

- Extensive capital market experience with responsibility for Onex Partners investment efforts in the financial services industry.
- Worked in the Leveraged Finance Group of JP Morgan prior to joining Onex.
- Holds a B.S. in Economics (magna cum laude) from Wharton School, University of Pennsylvania.

**Dan Sawyer – Non-Executive Director**

- Vice President in GIC's Private Equity, Direct Investments Group, responsible for leading GIC's North American Financial Services Private Equity efforts.
- Prior to joining GIC, worked at Thomas H. Lee Partners, with a focus on business and financial services investing.
- Holds an M.B.A. from Harvard Business School.

**Adrian Spieler – Chief Operating Officer**

- Extensive insurance and asset management experience including 17 years at Swiss Re
- Chief Platform Officer for Insurance and a member of the XL Catlin leadership team (2015- 2018).
- Group Chief Administrative Officer at Catlin (2012-2015).

**Mark van Zanden – Head of Portfolio Optimisation**

- Over 30 years of (re)insurance industry experience.
- Joined Catlin in 2005 and was most recently Chief Executive of Underwriting Capital Management for AXA XL.
- Previous roles include consulting actuary, reinsurance broker and an underwriter.

**Robina Malik – General Counsel**

- More than 25 years of insurance and legal experience.
- General Counsel and Head of Compliance, Risk and Regulatory Affairs for XL Catlin Asia Pacific (2012-2017).
- Started her career in underwriting and claims, working on energy, marine and liability accounts at Lloyd's.

**Brian Bissett – Group Chief Actuary**

- Joined Convex from Zurich Insurance, where he was Group Chief Actuary.
- Chief Data Officer at Catlin and XL Catlin, having joined Catlin in 2001.
- Held roles at Barclays and Generali.
- Fellow of the Institute of Actuaries.

**Claire Ball – Group Human Resources Director**

- An experienced HR Executive with expertise operating across many cultures in an international climate.
- Worked for Zurich Insurance for over 20 years both in the UK and for the last 12 years in global roles based in Switzerland.
- Returned to the UK and joined Alizan Global Investors on a short contract leading their UK People team prior to joining Convex.

**Douglas Howat – Chief Underwriting Officer, Insurance**

- Previously Chief Executive of Global Lines (including Specialty) at XL Catlin.
- Joined Catlin in 1989 as an Assistant Underwriter.
- Held a range of roles, including Chief Executive of the Energy, Property and Construction division.

**Theo Butt – Chief Executive Officer, Convex Insurance UK Ltd**

- Chief Executive of Neon Underwriting Ltd (2019-20).
- Joined Ascot Underwriting in 2006 as a Property Underwriter and held various roles there culminating in Executive underwriter and head of Non-Marine (2011-18)
- Prior to that held various broking roles at March and JLT.

**Matt Paskin – Chief Executive Officer – Convex Reinsurance Limited**

- Became Chief Underwriting Officer of XL Catlin Re in 2015.
- Joined Catlin in 1993 as a class underwriter and went on to hold various roles there, including Chairman of Catlin REXCo.
- Has also held roles at Pan Atlantic/Republic UK and EF Williams Syndicate.

Members of the CRL Board or Executive Committee not already included above are as follows:

**Robert Marcotte – Chief Financial Officer – Convex Reinsurance Limited**

- Previously held a range of senior finance positions at Validus and Axis.
- Canadian CPA, US CPA and a CFA charterholder.

**Lisa Robinson – Head of Human Resources – Convex Reinsurance Limited**

- More than 20 years of insurance industry experience.
- Head of Human Resources for Catlin Bermuda from 2002 – 2015, before becoming HR Business Partner at AXA XL.
- Holds PHR, SHRM-CP professional designations.

**Lorraine Mullins – Chief Compliance Officer**

- Extensive regulatory and compliance experience, serving at the Investment Management Regulator leading an enforcement team and as Head of Equity Compliance at ING Barings investment bank.
- Joined Catlin as Group Compliance Officer and moved to XL Catlin as Chief Regulatory Affairs Officer.
- BA Hons Jurisprudence from Oxford University.
- Qualified Barrister.

**Ben Savill – Chief Underwriting Officer – Convex Reinsurance Limited**

- Extensive reinsurance underwriting experience having joined Convex Re in 2019 from Fidelis where he was Group Chief Underwriting Officer and Chief Executive Officer of Fidelis Bermuda.
- Held the senior role of North American Market Unit Head at Amlin.
- Began his career in Lloyd's on Amlin's reinsurance account in 1997 and moved to Bermuda in 2005 to establish Amlin Bermuda.

**Pierre-Francois Rodriguez – Chief Risk Officer**

- Extensive experience in financial services including various roles at the UK Regulator in Large Insurance Group Supervision and at AM Best.
- Consulted insurance firms on risk management, governance and regulation while at Deloitte.

**Shannon Dyer – Company Secretary**

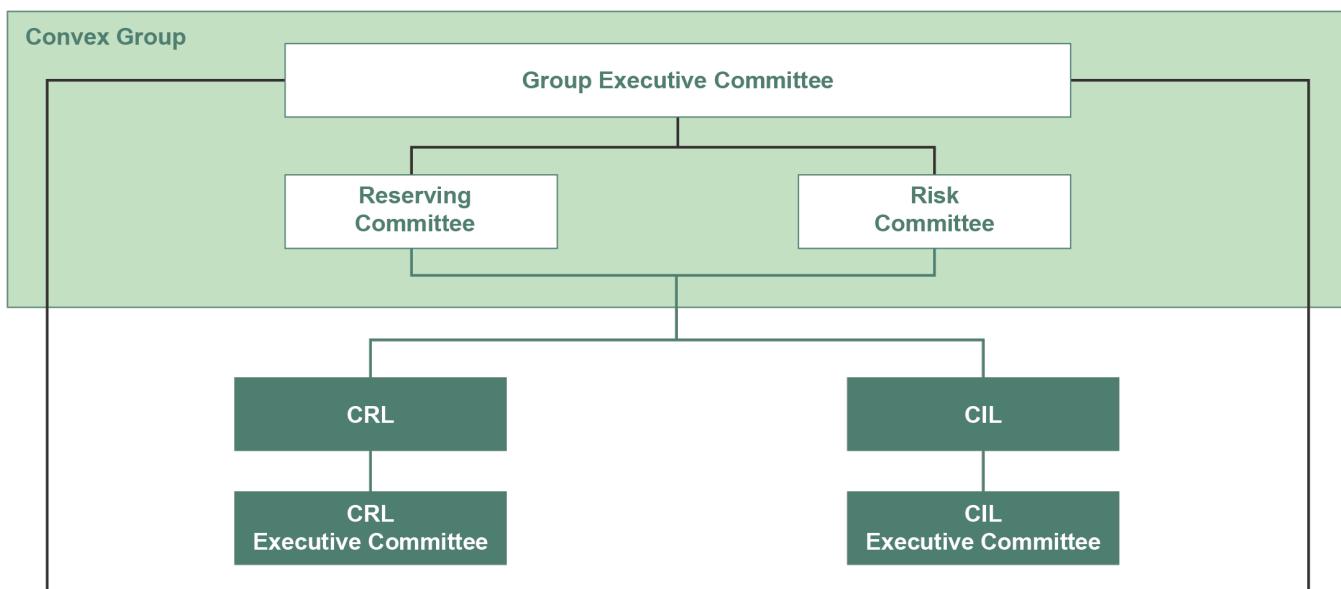
- Qualified UK and Bermudian barrister and attorney.
- Over 10 years legal experience specialising in insurance/reinsurance, regulation, and compliance.
- Held senior positions for various offshore law firms in Hong Kong and Bermuda, including the Bermuda Monetary Authority and as in-house counsel.
- Extensive experience with international insurance/reinsurance arbitrations and mediations in Bermuda, London, and New York.

## B.3. Risk management and solvency self-assessment

### B.3.1. Description of the risk management processes and procedures to effectively identify, measure, manage and report on risk exposures

Risk is defined by Convex as being the possibility of an adverse circumstance that will have a negative impact on Convex or its objectives. The Risk Management function provides risk oversight of the business for all risk types and categories. Oversight of the function's operations is provided by the Group Executive Risk Committee ("ERC") and the Group Executive Committee ("GEC"). The Risk Management function is led by the Chief Risk Officer ("CRO"), who attends Convex's Board and GEC meetings, and chairs the ERC.

The chart below outlines the governance structure throughout the Convex Group.



#### Risk Strategy

The Risk Management function and the Risk Management Framework support Convex in its pursuit of the achievement of its business goals within the established risk tolerances. The Risk Management function provides oversight, monitoring and challenge. As Convex grows, the Risk Management function and Risk Management Framework will continue to evolve to remain adequate for the company's business and risk profile. The Risk Management function supports Convex in achieving the following:

- Lead the development and implementation of the risk strategy across Convex;
- Implement and embed effective risk management frameworks across Convex;
- Coordinate an effective Solvency and Risk Assessment (GSSA) process;
- Oversee and implement an effective risk identification, assessment, management and monitoring process across Convex;
- Monitor risk exposures against approved risk appetite statements and limits;
- Carry out quarterly and annual risk and control assessment;
- Establish appropriate risk policies and processes for Convex and ensure they are in place to meet regulatory requirements;
- Provide risk management information to the Convex Boards and Executive Committees on the current concerns, risks and incidents affecting the business, as well as exposures against approved risk appetite limits;
- Carry-out risk deep-dives across the business to assess key risks and the effectiveness of the controls in place;
- Lead the implementation of the climate change risk framework;

- Engage with the business on a number of ad-hoc projects/initiatives to provide risk oversight and when relevant provide risk opinions; and
- Deliver risk training.

### **Risk Governance**

Convex operates the ‘three lines of defence’ structure as defined in Section B.1.

Convex takes risk seriously, and a strong risk culture is embedded within the business. Risk and assurance reviews are embedded with the first line to ensure risks are adequately identified and mitigated. For example, the Actuarial function is a key stakeholder from the first line in managing underwriting and solvency risks on a day-to-day basis. Convex aims to be different than its peers and its business model requires a strong underwriting and operating cost discipline. As a result, the first line plays a strong role in identifying and managing risks.

Convex’s Board are responsible for the company’s risk and internal control framework, including setting and approving the company’s business strategy, determining its risk appetite, establishing appropriate risk policies and monitoring capital requirements and risks against the agreed risk appetite and in line with the risk appetite statements.

A number of processes support the Risk Management Framework including:

- Risk Appetite framework;
- Risk Governance;
- Solvency and Risk Assessment Reports (GSSA);
- Risk Registers;
- Regular risk reporting;
- Control Frameworks; and
- Risk policies, procedures, systems processes and controls.

### **Risk Identification**

The risk identification process enables Convex to identify the risks, including emerging risks, that the group is facing, and to monitor and mitigate them. The Risk Management function has defined the Risk Universe in which Convex operates.

A key component of the risk identification process at Convex is the Risk Register. Convex has comprehensive Risk Registers for the group and its regulated entities which are mapped against the risk universe. The most material risks included in the Risk Registers are reported to the CGL, CRL, CIL, and CES Boards on a quarterly basis. The Risk Management function reviews and updates the Risk Registers on a quarterly basis.

The effective management of emerging risks is essential for maintaining Convex’s business strategy and underwriting performance. It helps to identify external trends, threats and opportunities, and improves risk selection and knowledge of future risk exposures. Convex is implementing an Emerging Risk and Opportunities Working Group that is Convex-wide. The Emerging Risk and Opportunities Working Group is in its infancy stage and will be further embedded in 2021.

Emerging risks are included in the GSSA report. Convex will embed an annual identification and assessment exercise for emerging risks. The Risk Management team together with relevant stakeholders from the business will review the emerging risks landscape for the year ahead and assess the impact on Convex’s business profile and strategy. This process is performed in conjunction with the Oracle Partnership, an advisory group that specialises in agenda-setting foresight and strategic advice for future threats and opportunities. This annual emerging risk assessment will continue to feed into the GSSA process and report.

Risk Registers are the repository of all material risks and controls in the company. It is one of the Risk Management function’s most important risk management and monitoring tools and drives a significant portion of risk reporting to the CGL, CRL, CIL, and CES Boards as well as to Convex Executive Committees on a quarterly basis.

The fundamental sources of risk give rise to the following top-level risk categories that form the risk universe:

- Credit risk – such as the risk of financial losses due to an investment or other counterparty defaulting.
- Market risk – such as the risk of changes in the valuation of financial assets and liabilities due to movements in financial markets.
- Liquidity risk – such as failing to meet on-going financial obligations as they fall due.
- Insurance risk – such as aggregate exposures and reserves.
- Operational risk – such as operational resilience and disaster recovery.
- Regulatory risk – such as conduct risk and regulatory compliance.
- Strategic risk – such as incorrect assessment of insurance market.

Within these categories, Convex reports on Regulatory and Conduct risks within Operational risk, and Market and Liquidity risks together.

### Risk Assessment

The Risk & Control Assessment (“RCA”) process allows Convex to identify key risks, assess the materiality and status of the risks and controls, and then use this information to manage the risks and their potential impact, and review and monitor them on a periodic basis. The outcome of the RCA process is shared with the relevant stakeholders, Convex Executive Committees, Convex Boards and the ERC on a regular basis.

Risk owners, and/or responsible persons, are responsible for the identification and day-to-day management, implementation of controls and regular monitoring and reporting of the risk status. The Risk Management function holds quarterly risk and control assessment meetings with risk owners to review and provide challenge on the function’s risk profile and effectiveness of controls in place.

All risks in the Risk Registers are assessed in terms of their impact on the business and the current risk performance.

Risk impact is used to highlight the most material risks to each Convex entity using a 1-5 ranking scale, with 1 being the lowest impact and 5 being the most material. Each risk is quantified on at least an annual basis to assess the financial impact of the risk should they occur at different return periods, with and without controls in place. When the financial impact is agreed with the business the Risk Management team will take the 1/25 residual impact and overlay the operational, reputational and regulatory impact (also on a 1-5 scale) and the most material impact will be taken. Risk impact is not expected to change materially on a quarter-by-quarter basis for most risks, though any changes to the business environment or plan will need to be reflected in the impact scores.

The risk performance is the current level of concern the risk owner/responsible person has for the risk. The rating takes into account the control performance, risk appetite metrics (where applicable or relevant), risk incidents and internal/external environment. The risk performance is based on a four-point scale (red, amber, yellow or green).

Together the risk impact and performance provide valuable information to the Risk Management team on the risks that require greater attention and oversight. High materiality risks and/or risks which have the worst performance are displayed in the risk heat map and included in the Risk Management team “area of focus”.

### Risk Mitigation

Risk Mitigation is the process of reducing the potential adverse effects of a risk down to an acceptable level i.e., within Convex’s risk appetite. Risk mitigation is mainly achieved through the implementation of controls and management actions. It is the responsibility of each function at CRL and CIL to own and manage their internal control environment. Risk Management provides an independent second line view of each function’s internal control environment and reports findings to the relevant committees. Risk Management reviews the effectiveness of the CGL, CRL and CIL control environment on a quarterly basis.

Each control is scored for operational effectiveness (effective, partially effective, ineffective or not implemented) by the Control Owner, with oversight and appropriate challenge from the Risk Management function, following extensive discussions with the respective function.

## **Risk Monitoring**

Risk Monitoring is an important part of the risk management process. Effective risk monitoring ensures that Convex is operating within risk appetite and tolerances. It is a continuous and dynamic process of keeping track of identified risks and monitoring residual risks for any changes. It is also used to monitor the effectiveness of controls over time.

Effective risk monitoring enables Convex to make effective decisions on risks, in advance of these materialising. It helps to ensure that the correct risks continue to be represented on the Risk Registers reflecting the changing risk profile of the business and ensures that the correct risk response actions have been implemented and are effectively working.

All identified material risks are monitored through the Risk Register to ensure risk profile changes are identified early, allowing appropriate mitigating actions to be applied in order to prevent negative outcomes. Any material changes identified form part of the risk reporting to the GEC and the ERC and the relevant entity's Board.

In addition to the Risk Registers and the regular risk assessment process, the Risk Management function will continue to build out and embed other second line risk monitoring tools and activities such as risk management deep dives, emerging risks working group and reverse stress testing exercises.

## **Risk reporting**

The purpose of Risk Reporting is to provide management with useful information, allowing them to make effective decisions about the risks the business faces. Risk Reporting is a regular, continuous and important process for Convex as it builds alignment and transparency of risk information between the business, management and the executive. The Risk Management Framework, system and processes facilitate this reporting throughout the year, allowing Convex's Boards and the Convex Executive Committees to review and challenge risk information and make informed decisions about the changing risk profile of the business.

Information from the Risk Registers are aggregated, analysed and presented in the risk report to Convex's Boards and to Convex Executive Committees showing the current concerns and the most material risks to the business and quarter-on-quarter changes in risk profile.

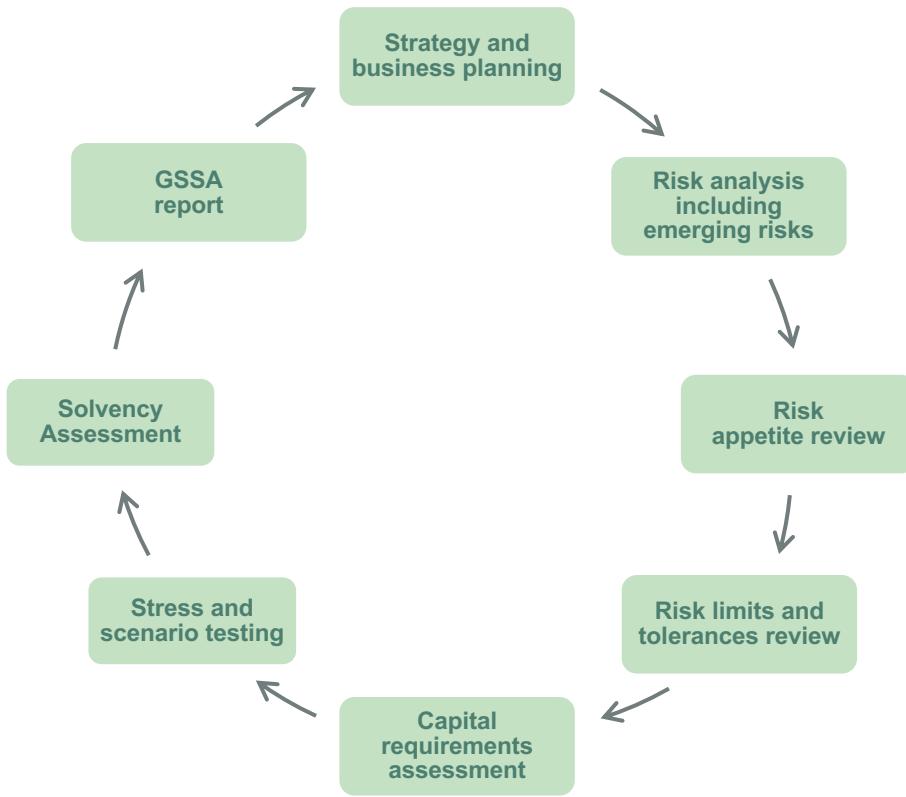
The Risk and Incident Report also provides Convex's Boards and Convex Executive Committees with the Risk Management function's opinion on the risks faced by each area of the business. The report is a combination of qualitative and quantitative information. Qualitative commentary is provided to support understanding of the current risk environment as well as the future risk outlook for the next reporting period. This provides an opportunity for breaches and key trends to be explicitly raised by the Risk Management function, where relevant.

### **B.3.2. Description of how the risk management and solvency self-assessment systems are implemented and integrated into the Insurer's operations; including strategic planning and organizational and decision-making process**

In line with regulatory requirements, the CGL Board require that the GSSA is part of the Risk Management Framework processes, with the quarterly risk appetite dashboard and the annual GSSA report being a trigger for management actions in response to changes in the risk profile.

Overall responsibility for the GSSA framework, output and policy lies with the CGL Board. This policy is reviewed annually by the Risk Management function and any changes approved by the CGL Board in Q4 of each year.

## GSSA Process



The GSSA requires inputs from a number of key business activities including but not limited to:

- Strategy and business planning: The forward-looking assessment section of the GSSA, which is the assessment of Convex's strategic goals made up of the strategy and business planning processes;
- Risk profile: Assessment and understanding of the current and emerging risks facing Convex across all risk categories, this element also includes stress and scenario testing and other RMF techniques to assess risk impacts;
- Risk appetite: Reviews of risk appetites and tolerances to allow Convex to measure the level of risk currently being taken;
- Capital requirements: Assessment of Convex's regulatory capital requirements; and
- Solvency Assessment: Assessment of Convex's solvency against requirements.

Where appropriate, a CRL-specific view is incorporated into CGL's GSSA process and reporting. In addition, the ERC is responsible for the evaluation and monitoring of CRL's risk management policies, procedures and controls which facilitates the ongoing management of CRL's exposure to risks. A key element of these monitoring activities is the evaluation of CRL's position relative to risk tolerances and limits approved by the CRL Board.

### **B.3.3. Description of the relationship between the solvency self-assessment, solvency needs, and capital and risk management systems**

Within Convex, the GSSA plays an important part in the activities of the business and to maintain a strong risk management culture. The GSSA provides a framework to enable the CGL and CRL Boards to be aware of the impact strategic decisions have on the risk and overall solvency needs of the business. The main outcomes of the exercise reported to the CGL and CRL Boards in relation to the GSSA are:

- The capital and solvency position – the capital assessment is produced based on the risk profile of the firm and its business plan. Solvency has also been considered under both normal and stressed conditions;
- The risk profile of Convex is reviewed and reported. The GSSA is based on the risk profile as a group;
- The risk appetite of the Company forms a key part of the risk profile reporting throughout the year and the Convex Boards are informed on a quarterly basis of its position against its agreed risk appetite; and
- The appropriateness of the BSCR.

The Finance function undertakes a periodic assessment of the funds available to support Convex's economic capital requirements ensuring that the proportions of available Tier 1, Tier 2, and Tier 3 capital categories meet or exceed the requirements of the ECR.

The Risk Management function facilitates the risk identification and monitoring process on a quarterly basis via the risk appetite dashboard to the Convex Executive Committees and Convex's Boards. Convex completes an annual Reverse Stress Testing exercise to identify potential stress events that could lead Convex to fail. The Risk Management function involves relevant subject matter experts from key business and functional areas in stress and scenario testing development and selection. Sensitivity analysis is carried out on the business plan as part of the planning cycle and financial impacts of further potential risks to the plan. The results of this exercise are included in the GSSA report.

Identification of emerging risks is important to enable Convex to be proactive in anticipating potential risks that may impact the business and affect its resilience.

In addition to the support provided by the Oracle Partnership, Convex has set up a Strategic and Emerging Risk and Opportunities Working Group in 2020 which will be further embedded in 2021. The purpose of this working group is to:

- Review Convex's emerging risks and opportunities landscape and ensure it remains appropriate for Convex; and
- Carry-out ad-hoc deep-dive on specific themes that require further analysis on their potential impacts to Convex.

The emerging risks that have been identified as being relevant to Convex as a group are included in the GSSA report.

#### **B.3.4. Description of the solvency self-assessment approval process including the level of oversight and independent verification by the board and senior executives**

Oversight of the GSSA process and report is provided by the CGL and CRL Boards and relevant committees, as follows:

CGL Audit Committee	<ul style="list-style-type: none"> <li>Provide independent oversight of the GSSA process through internal audit reports.</li> </ul>
CGL Board	<ul style="list-style-type: none"> <li>Review and sign off the GSSA process and annual GSSA report.</li> <li>Review and challenge the quarterly risk and incident report.</li> <li>Review and challenge the quarterly risk appetite dashboards and liquidity risk reports.</li> <li>Review and sign off the results of any event driven GSSA reports arising from material changes to the business or business operating environment.</li> </ul>
Group Executive Committee	<ul style="list-style-type: none"> <li>Review annual GSSA report and recommend to the Convex Boards for approval.</li> </ul>
Group Executive Risk Committee	<ul style="list-style-type: none"> <li>Review the GSSA Policy.</li> <li>Review the GSSA process and the annual GSSA report.</li> <li>Review the quarterly Risk and Incident report.</li> </ul>
Group Executive Reserving Committee	<ul style="list-style-type: none"> <li>Review the technical provisions and will make recommendations to the CGL and CRL Boards for sign-off.</li> </ul>
CRL Board	<ul style="list-style-type: none"> <li>Review and sign off the GSSA process and annual GSSA report.</li> <li>Review and challenge the quarterly risk and incident report.</li> <li>Review and challenge the quarterly risk appetite dashboards and liquidity risk reports.</li> <li>Review and sign off the results of any event driven GSSA reports arising from material changes to the business or business operating environment.</li> </ul>
CRL Executive Committee	<ul style="list-style-type: none"> <li>Review CRL's risk profile and solvency assessment included in the GSSA report.</li> </ul>

#### **B.4. Internal controls**

##### **B.4.1. Description of the internal control system**

The internal controls framework is based on the three lines model. Risk management is the responsibility of the employees who constitute the first line, the control owners. Oversight and guidance are provided by the second line through the Risk and Compliance Teams.

Control activities carried out by control owners within the business as part of the Risk Management Framework are assessed at least annually. In practice, most are reviewed on a quarterly basis as part of the Risk and Control Assessment to ensure that any deficiencies in the control environment are known, and appropriate actions can be taken to improve the overall control environment. These controls serve to reduce the likelihood of occurrence of risks, to ameliorate any impact caused by the risk crystallising, or to enable early detection of the risk's impact.

Independent oversight of the systems of internal control for the business is the responsibility of the third line, the Internal Audit Function. Internal Audit operates a risk-based audit review programme to provide independent assurance to the Board (via the Audit Committee) that the risk management framework and control environment are suitably designed and properly operated and governed.

##### **B.4.2. Description of how the compliance function is executed**

The primary purpose of the Compliance function is to assess and manage CGL's exposure to regulatory risk. The Compliance function is an integral part of CGL's Risk Management system and constitutes a key part of its corporate governance. The Compliance function manages the relationships with the regulators (including the BMA as the group supervisor for Convex) and is

committed to transparent and constructive relationships with regulators. The Compliance function works closely with the legal function and also with the risk management and internal audit functions.

The compliance function activities include:

- Horizon scanning and identification of forthcoming regulatory changes.
- Identification of conduct risks and supporting the Board in agreeing measures including metrics and conduct risk appetite.
- Providing advice, support, guidance, and challenge to the business in regards conduct risk, regulatory requirements and financial crime.
- Managing regulatory engagement with regulators, including financial crime and data protection.
- Undertaking on-going and ad hoc monitoring of the controls implemented by the business and report findings to the CGL Board.
- Managing compliance risks with outsource partners, ensuring that they are aligned with CGL culture and risk appetite.
- Setting the financial crime policy and sanctions framework.
- Escalating identified risks and breaches to management and the Board.
- Liaising with internal audit regarding key risk areas and effective use of monitoring and audit inspections.
- Participating in the Group Executive Committee.
- Reporting to the CGL Board.

## **B.5. Internal audit – description of how the internal audit function is implemented and how it maintains its independence and objectivity when conducting its functions**

### **B.5.1. Implementation of the internal audit function**

The Purpose, Authority and Responsibility of the Internal Audit function is defined within the Internal Audit Charter. Internal Audit's mission is to provide reliable independent and objective assurance to CGL and its subsidiaries Audit Committees, and to the Convex Executive Committees on the adequacy, effectiveness and sustainability of risk management framework and the system of internal control.

Adequate and effective risk management, internal control, and governance processes reduce but cannot eliminate the possibility of poor judgment in decision-making, human error, control processes being deliberately circumvented or overridden, and the occurrence of unforeseeable circumstances. Adequate and effective risk management, internal control, and governance processes therefore provide reasonable, but not absolute, assurance that Convex will not be hindered in achieving its business objectives, or in the orderly and legitimate conduct of its business.

Internal Audit maintains a professional audit team with sufficient knowledge, skills, experience and professional qualifications. Where specialist technical support is necessary to supplement Internal Audit resource, this is available through a co-sourcing contract with external specialist firms, ensuring that Internal Audit has immediate access to specialist skills where required.

On an annual basis, Internal Audit confirms to the Convex Board Audit Committees that the International Standards for the Professional Practice of Internal Auditing of the Chartered Institute of Internal Auditors are complied with. Internal Audit operates within Convex's three lines of defence model. In order to operate an effective framework Internal Audit maintains regular and ongoing dialogue with the first and second line functions to maintain a current and timely perspective of business direction and issues. Demarcation between the third line of defence and the first two lines must be preserved to enable Internal Audit to provide an independent overview to Convex Board Audit Committees on the effectiveness of risk management and assurance processes within Convex.

Internal Audit's methodology provides a series of different assurance responses to a variety of scenarios to give the stakeholders the most appropriate type of assurance as follows:

- Risk-based internal audits – Internal Audit's standard audit response, this methodology will also be used to respond to most management requests for assurance and focuses on assessing the adequacy and effectiveness of key controls mitigating High risk areas.
- Programme & Project Assurance – a series of risk-based assurance responses to programmes and projects. This differs from standard risk-based audits in that it focuses on key controls as well as the commercial aspects of the programme, such as benefits realisation.

- Close and Continuous – this involves Internal Audit having regular meetings with key stakeholders and attending decision making forums as appropriate. It will also include ongoing assessment of key documents as they are produced. Any concerns will be raised with management at an early stage to allow the programme to address them in a timely manner.

The above are communicated through the following methods:

- Reporting to the Convex Board Audit Committees, including thematic reporting. Quarterly reporting is provided to the Convex Board Audit Committees, where the Chief Audit Officer attends to summarise the output within the reporting period and provide an opinion on a number of key risk themes.
- Reporting to the Convex Executive Committees, where the Chief Audit Officer presents a summary of the key successes/challenges within the period.
- Internal Audit reports. In addition to the audit client, Internal Audit reports are issued to all executive management and relevant members of the business and the external auditor. Reporting of issues focuses on describing the control breakdown or failure, who was responsible, and the risk that has materialised or could potentially materialise. In response to the issues raised by Internal Audit, management are required to document the steps they are taking to address the issue, provide a realistic timescale and, importantly, the action is assigned a single owner to enhance accountability.

### **B.5.2. Maintaining the independence of the internal audit function**

To ensure the independence of Internal Audit, the Chief Audit Officer, a senior position within the Group, reports functionally to the respective independent Chairs of CGL and its subsidiary Audit Committees, and has a secondary reporting line to the CGL Chief Executive Officer and Deputy Chief Executive Officer. The CGL Board Audit Committee approves the performance evaluation, appointment, or removal of the Chief Audit Officer, and reviews his/her annual remuneration each year.

Internal Audit is functionally independent from the activities audited and the day-to-day internal control processes of Convex and is therefore able to conduct assignments on its own initiative, with free and unfettered access to people and information, in respect of any relevant department, establishment or function of the organisation, including the activities of subsidiaries and outsourced activities. The Chief Audit Officer and audit staff are not authorised to perform any operational duties for Convex or the wider Group or direct the activities of any employee not employed by Internal Audit.

To ensure that the system of governance works efficiently and effectively, Internal Audit will work together and co-operate with the other assurance functions in an appropriate open and collegiate way (for example, Risk Management and Compliance). Where such co-operation takes place, the work will be planned and carried out in such a way as to ensure that the independence and objectivity of Internal Audit remain safeguarded.

### **B.6. Actuarial function – a description of how the actuarial function is implemented**

The Actuarial function is led by the Chief Actuary (“CA”), who is also the Approved Group Actuary, and reports to the CGL Deputy CEO. The Actuarial function is accountable for actuarial methodologies and calibrations. It also considers the appropriateness of the capital modelling activities. The Actuarial function produces an annual report to the CGL Board providing information necessary for the Board to form their own opinion on the adequacy of technical provisions and capital requirements, and on underwriting and reinsurance arrangements.

The Actuarial function has the authority to review all areas of Convex and has full, free and unrestricted access to all activities, records, property and personnel necessary to complete its work. The independence of the Actuarial function is derived through its organisational separation from other functional areas. The CA ensures that those persons employed by the Actuarial function in a defined actuarial role are subject to the Fit and Proper policy requirements to ensure they have the requisite skills and knowledge to complete their responsibilities.

### **B.7. Outsourcing**

#### **B.7.1. Description of the outsourcing policy and information on any key or important functions that have been outsourced**

The Convex culture is one that challenges the status quo and incorporates innovation, flexible working and collaboration in our day-to-day working. Working with our outsourced business partners, we believe that we can provide the best support to our underwriters, with nimble, efficient systems and processes to help them make the best decisions and provide value-added service excellence to our clients and brokers.

Convex has considered the impact of outsourcing and have put in place:

- an outsourcing oversight framework including an outsourcing policy;
- effective processes to identify, manage, monitor and report risks;
- methods for assessing the standard of performance of the service provider;
- appropriate escalation measures if the service provider may not be carrying out the functions effectively and in compliance with applicable laws and regulatory requirements;
- the necessary expertise to supervise the outsourced functions effectively; and
- the right to terminate the arrangement without detriment to the continuity and quality of its provision of services to clients.

Convex has also ensured that the service provider must:

- have the ability, capacity, and any authorisation required by law to perform the outsourced functions, services or activities;
- disclose any material impact on its ability to carry out the outsourced functions effectively;
- protect any confidential information relating to Convex and its clients;
- establish, implement and maintain a contingency plan for disaster recovery and periodic testing of backup facilities having regard to the outsourced function, service or activity; and
- obtain prior approval from Convex for the use of sub-delegates and warrant that the primary contract terms and conditions extend to the sub-contract with such sub-delegation.

Convex recognises that the responsibility and accountability of all outsourcing functions remains with the management who will ensure that due diligence, expertise and skill is exercised when entering into, managing or terminating any outsourcing arrangement. The CGL Chief Operating Officer, Adrian Spieler, currently reports to the CGL Board on the performance of services by the major service providers.

Where necessary, the outsourcing agreements will be reviewed annually and where material, changes are brought to the CGL Board for consideration and approval. The governance structure for Convex's major service provider has several oversight and management layers, thereby ensuring the right audience and authority is engaged for discussion and agreement, whilst maintaining overall CGL Board responsibility and accountability.

Convex has outsourced the provision of products/services in the following categories:

- Claims Operations
- Facilities & Workspace Management
- Finance Operations
- HR Operations
- IT Desktop and Application Support
- Underwriting Operations
- Investment Management

The Convex outsourcing oversight framework manages the risk that outsourcing does not result in the undue increase of operational risk, materially impair the quality of system of governance of the Group, impair the ability of supervisory authorities to monitor compliance of Convex nor undermine continuous and satisfactory service to policyholders.

### **B.7.2. Description of material intra-group outsourcing**

Not Applicable

### **B.7.3. Any other material information**

COVID-19 Working and Steering Groups were formed to implement and manage emergency plans to mitigate the impact of COVID-19 pandemic on Convex's operational procedures. The groups' focus has included, but not been limited to:

- Review and ongoing management of workplace (e.g., COVID-19 secure environment, opening and closures in line with government guidance).
- Review and ongoing assurance that our IT infrastructure is able to support an increase in remote work and manage additional volumes of teleconference collaboration.

- Assessment and ongoing monitoring of the risk level to key outsourcing partners such as WNS, as well as other suppliers / partners on whom we depend, and obtaining confirmation that they have robust business continuity plans ("BCP") and are able to deploy them. as needed.
- Monitoring the wellbeing of staff to ensure they cope well with the unfamiliar context of COVID-19 illness, social distancing and self-isolation. This includes, and is not limited to, the launch of the Isolation Wellbeing Questionnaires, Resilience Training, provision of rapid COVID-19 testing and updated hints and tips to support successful working from home.

When devising the business continuity plans, 3 elements of potential impact on Convex were considered:

1. London and Bermuda offices closed
2. Significant illness / inability to work amongst staff
3. Pandemic affecting India operations of WNS

For each element, the business risks that arise have been identified and mitigation actions defined and put in place to ensure that Convex is able to operate effectively in each case. The first element initially came into force following the guidance issued by the Bermuda and UK Governments to shelter in place, and at time of writing Management considers that the company is continuing to operate effectively.

Fortunately, to date there has not been significant illness amongst Convex staff.

The third element was also implemented during March/April 2020, with WNS home working capability proving resilient throughout. Productive capacity estimates are shared weekly with the CGL and CRL teams to ensure WNS remains operational and effective. In addition to this, Convex took the measure of extending the onshore operational capacity from WNS in order to mitigate interim risk should there be a significant deterioration in India or capacity levels drop significantly. This has not happened to date.

# C. Risk Profile

## C.1. Material risks that the insurer is exposed to, including how these risks are measured and any material changes that have occurred during the reporting period

Convex's main risk categories are underwriting, market, credit, liquidity, operational, and strategic risk. Material risk categories are addressed individually below.

### C.1.1. Underwriting risk

#### C.1.1.1. Risk description

Insurance risk contains both Premium Risk and Reserving Risk; each is defined at Convex as the following:

**Premium Risk:** the risk of uncertainty around all unexpired and planned future underwriting exposure.

Premiums may be lower/higher than expected in the business plan as a result of poor pricing and external market events impacting pricing. For example, following a severe catastrophe event in a particular region, the line of business may see sudden rate increases and therefore a tactical decision to underwrite higher volumes of premiums is made. The opposite may also occur, such as rate decreases more than expected in a particular line of business that lead to inadequate pricing for the amount of risk making it no longer viable. As a consequence, the resultant mix of business may also differ from the business plan.

**Reserve Risk:** the risk that current reserves are insufficient to cover claim liabilities as they fall due.

Higher non-catastrophe (attritional/large losses) claims than expected may occur due to higher claims inflation, exceptional loss events, a risk unforeseen at the time of pricing and/or contract inception and also fraud.

#### Risk mitigation

Convex Group mitigates its risks via the use of the following controls:

Convex mitigates its risks via the use of the following controls:

For Premium Risk:

- Convex Measurement Framework (CMF) tracks metrics such as monitoring premiums by line of business regularly against the business plan;
- A Risk Adjusted Return Framework has been developed in early 2022 supporting portfolio optimisation;
- Monitoring premium by line of business regularly against the business plan;
- Portfolio optimisation team supporting underwriters with timely information to support risk ranking;
- Underwriting guidelines;
- Underwriting authorities;
- Pre-bind peer reviews;
- Ceded re programme; and
- Risk appetite limits.

For Reserve Risk:

- Actuarial Function feed into the business planning using metrics such as loss ratio benchmarks;
- A Major Events Committee where complex claims and market situations are discussed as well as reserve trends to ensure adequate reserves are booked;
- An inflation working group has been setup in 2021 to develop a more holistic method to monitor inflation risk that Convex is exposed to;
- Monitoring claims by line of business regularly against the business plan;
- Information flow between underwriters and claims teams;

- Validation of amount of risk being taken using external data given Convex Group does not have proprietary experience data;
- An effective reinsurance program to protect against some adverse claims experience; and
- Technical pricing of select risks.

## **Measures used to assess risk and concentration**

Convex Group uses the following tools to assess the risks, and their concentration:

- In-house exposure management tools;
- External / third-party exposure management tools;
- Regular expected loss modelling output; and
- Solvency capital calculations.

## **Material changes over the reporting period**

Convex Group's business volumes increased significantly over 2021, resulting in an increase to the level of both Premium and Reserve Risk. As a result, the Group maintained a strong focus on continuing to develop the above controls to identify, analyse, mitigate, monitor and report on insurance risks. As the volume of underwriting continues to grow this risk will continue to increase.

### **C.1.2. Market risk**

#### **C.1.2.1. Risk description**

**Market Risk:** The risk which arises from fluctuations in asset values, or interest or exchange rate.

Convex Group is exposed to market risk through the impact of market movements to its asset portfolio and to the market value of its insurance liabilities. Market risk impacts to the balance sheet arise from various factors, including:

- Rising interest rates and/or credit spreads of the fixed-income investments can reduce the market value of the asset portfolio. There is a natural hedge provided by the liabilities, as interest rate increases it decreases their market value, thus absorbing part of the impact. Hence, the net position, managed in the line with the Minimum Risk Benchmark, is sensitive to interest rate movements.
- A decline in the market value of assets other than fixed income, driven by equity and/or property markets could adversely impact the available surplus;
- A change in foreign exchange rates could have an impact for Convex Group, as the asset portfolio is denominated in USD, while future liabilities are also denominated in other currencies, including GBP, EUR, JPY and CAD. Thus, FX movements are expected to have an impact on future non-USD denominated liability and expense related cashflows.
- An increase in inflation rate may lead to a nominal increase in the value of Group liabilities and other expenses, and affect valuation of assets in the Group portfolio. Progress has been made to develop a methodology to identify and measure inflation risk on the Group balance sheet, and a measurement of inflation risk is currently captured within the market risk appetite. Investment strategies that mitigate inflation risk, such as investment in infrastructure equity, are planned to be executed in 2022.
- Changes in equity prices or mis-valued assets can reduce the value of investments. This could impact Convex Group, as the portfolio includes exposure to Kize Capital, with an equity sensitive portion of the fund. This investment sits in the Holding Co.
- Differences in uncertainty in real estate cash flows is a source of property risk. A portion of Kize capital is real estate risk sensitive

#### **Investment management in accordance with the 'Prudent Person' Principle**

CGL manages its investment portfolio by applying the requirements and principles described in the Financial Market Risk Framework and the Investment Guidelines.

These requirements and guidelines ensure that risks in the current portfolio and in new investment proposals can be identified, measured, monitored, managed and controlled.

Assets are invested taking into consideration the profile of the liabilities in terms of timing and sensitivity to market factors.

Concentration risk limits are in place to ensure the portfolio is appropriately diversified and the overall level of risk is limited by an aggregate market risk limit.

Convex Group ensures the availability of assets to pay in a timely manner claims and other obligations by having in place a stressed liquidity risk framework that measures excess liquidity in stressed market conditions.

### Risk mitigation

Market Risk for the Group is kept at a limited level, owing to the prudent investment strategy and asset allocation, which has limited exposure to higher volatility classes.

The level of Market Risk is managed by:

- Taking into consideration the market risks inherent in the Group's insurance business, expenses and other liabilities including shareholder's capital when managing the investment portfolio; and
- Setting and monitoring an Aggregate Market Risk Limit of 20% of the available risk capital, defined as a 1-in-200 probability one-year loss.
- Setting individual stress test risk limits for the respective market sub-risks at 2/3 of the Aggregate Market Risk Limit for interest rate, spread, equity and property risks and at 1/3 of the Aggregate Market Risk Limit for FX and Inflation risk.

### Measures used to assess risk

Measures used to assess Market Risk in the business include:

- Profit and loss results estimated using a set of stress tests, calibrated at a 1-in-200 one-year event, and subject to an overall market risk limit; and
- Capital requirements measured using regulatory and rating agency capital metrics to assess market risk by sub-risk and on aggregate.

### Risk concentration

Concentration to market risk factors is monitored by the quantitative stress tests, including stress tests for:

- Interest Rate Risk (separated by primary components such as parallel and steepening or flattening movements)
- Credit Spread Risk (separated by rating, duration and type of asset)
- Equity Risk, including private equity and other illiquid assets
- Foreign Exchange Risk
- Real Estate Risk
- Hedge Funds
- Inflation Risk

In addition, exposure to each market sub-risk is limited with a risk limit equal to 2/3 of the Aggregate Market Risk Limit for interest rate, spread, equity and property risks and to 1/3 of the Aggregate Market Risk Limit for FX and Inflation risk.

Concentrations to issuers and single investments are limited in the concentration risk framework, discussed in the credit risk section.

### Material changes over the reporting period

Over the year, Group's AuM grew by 20% coming to \$3,153m at YE21. This growth was driven by injected capital and was in line with our business plan. At the same time, market risk exposure increased in absolute terms in line with the growth of the balance sheet and in relative terms due to the introduction of new risks:

- In line with the investment plan modest risk asset allocations were added to the balance sheet in credit and equity funds.
- A measurement of inflation risk in the CGL balance sheet was also added to the framework in Q4, increasing risk utilisation. Market risk exposure remained within risk appetite throughout 2021.

The impact of COVID-19 to the investment portfolio has been minimal over the year.

### C.1.3. Credit Risk

#### C.1.3.1 Risk description

**Credit Risk:** the risk of loss due to the failure of a counterparty to meet its contractual obligation to repay a debt.

Credit Risk arises either from the fixed income portfolio, where a default of a counterparty would incur a financial loss, or through insurance due to the regular transactions with counterparties such as brokers and reinsurance companies.

Convex's credit risks arise principally through the following exposures:

- Fixed income securities, that include investments in sovereign and corporate bonds, and collateralised securities
- Reinsurance receivables, both intragroup and external, where credit risk arises in relation to the reinsurance asset held
- Other assets, including bank deposits and receivables
- Insureds in the political and credit risk line of business

#### Risk mitigation

Credit Risk is mitigated by monitoring a set of limits that control the risk of loss from a potential failure of an individual issuer or issue. These limits aim at managing the default risk of a given issuer, depending on its rating of all bonds issued by the issuer and held by Convex Group (corporate, government and government related) and are defined as a percentage of the Aggregate Market Risk Limit, with higher risk investments set at a lower percentage.

The set of limits ensures a well-diversified investment portfolio, including treasury exposures, limiting the loss following the default of a particular issuer. Convex proactively monitors credit ratings, applying an internal rating that takes into consideration changes in market observable credit spreads that could indicate potential future downgrades.

Compliance with the limits is ensured through defined governance processes. The Financial Risk Management and the Investment functions monitor the exposure against the limits on a daily basis, and reports on a monthly basis, with any issuer exposure breaches reported to the Group's CFO for remediation or, in exceptional circumstances, a waiver.

Credit Risk on insurance assets is managed through Convex Group's Credit Control function, which monitors the ageing of receivables and overdue balances. Further, reinsurance credit risk is managed via a reinsurance approval process, which takes into account the credit rating of the reinsurer and the size of the exposure, and also by holding collateral posted by non-rated counterparties. Limits have been established for reinsurance exposures, by counterparty and Tier. The limits are calibrated with reference to stressed losses given default and the aggregate limit is set with reference to available capital to ensure losses in a shocked environment remain within risk appetite.

A net aggregate exposures limit is in place for the overall political and credit risk underwriting line of business.

#### Measures used to assess risk

Credit Risk is measured in terms of exposure to default, probability of default and loss given default.

Credit ratings are used as indicators to assess Credit Risk, measure capital and take investment decisions. Convex Group uses external credit ratings as well as market adjusted ratings which adjust rating according to spread levels.

#### Risk concentration

Concentration risk is monitored by a set of limits that control the risk of loss from a potential failure of an individual issuer or issue. These limits aim at managing the default risk of a given issuer, depending on its rating, and related to Investment, Treasury and Ceded Reinsurance counterparty exposures. For political and credit risk insurance exposures, counterparty and country limits are also in place to ensure concentrations are managed.

Compliance with the limits is ensured through defined governance processes. The Financial Risk Management and the Investment function monitor the exposure against the limits on a daily basis, and reports on a monthly basis, with any issuer exposure breaches reported to the Group's CFO for remediation or, in exceptional circumstances, a waiver.

As at 31 December 2021, credit risk exposures are well diversified and within limits.

## **Material changes over the reporting period**

Treasury exposures to banking counterparties increased over the period, mainly to fund Letters of Credit. There has also been an increase in both premium and reinsurance receivables over the period, driven by the increased size of the balance sheet.

The exposure of CIL to CRL via the Intragroup Reinsurance also increased in line with the growth in business written but remained well collateralised. Note that at the consolidated CGL level, this is exposure is offset.

Monetary and fiscal policy response led spreads to contract, eventually finishing the year back within their pre-COVID-19 ranges.

The investment into a CLO fund in 2021 at CRL level was the Group's first direct investment into sub-IG rated instruments. The fund has an overall BB rating.

### **C.1.4. Liquidity risk**

#### **C.1.4.1. Risk description**

**Liquidity Risk:** the risk that insufficient liquid funds are held to meet all liabilities as they fall due or that liabilities can only be met at a high cost.

Managing liquidity is about limiting the possibility of having to be forced to sell assets or borrow money to meet obligations in a stressed environment, where either the company or the market itself is weak. Such scenarios would result in a weak bargaining position for the company and will likely force it to give up value at prices below inherent worth. The costs of such events may be compounded by the potential loss of market reputation, which may leave counterparts hesitant to place longer term risks with the company and thus destroy franchise value.

The current risk appetite statement on liquidity requires that "Convex Group will maintain sufficient liquidity to meet its obligations when they fall due, even under a stressed scenario".

To satisfy the risk appetite statement, a Liquidity Stress Testing Framework is in place to ensure Convex Group hold sufficient liquidity to meet an extreme stressed scenario, defined as the combination of a large loss event and a market liquidity shock, while ensuring sufficient liquidity is also available after the extreme stressed scenario to continue to support day-to-day operations.

#### **Risk mitigation**

Convex Group manages liquidity risk by setting up a liquidity risk framework, that measures excess liquidity over five horizons and in stressed scenarios and puts a limit that ensures excess liquidity is positive under all horizons and scenarios considered.

#### **Measures used to assess risk**

The measure employed to assess liquidity risk is Net Excess Liquidity, defined as Available Liquidity less Required Liquidity (including a margin) and should remain positive for over the projected period defined within the Liquidity risk framework for both the normalised and stressed scenarios.

#### **Risk concentration**

There are no Liquidity Risk concentrations identified as at year ended 2021 on the Aggregate Group Level.

#### **Material changes over the reporting period**

Although encumbered assets increased toward the end of the year as assets were pledged as collateral to fund LoC, at Group level Convex holds significant excess liquidity under normal and stressed scenarios.

## C.1.5. Operational risk

### C.1.5.1. Risk description

**Operational Risk** is defined as the risk of greater than expected losses due to the failure of internal processes, people or systems, or from external events.

In order to facilitate the identification and management of operational risk, Convex Group breaks down operational risk into the following sub-categories:

#### Financial and Accounting

These are the risks associated with financial reporting and integrity of the financial information.

#### Outsourcing & Third-Party Service Provider

This risk includes the uncertainty of unintentional or deliberate failures of service providers to deliver services in accordance with pre-agreed service standard contracts or engaging with service providers with no service standards in place.

#### Business Continuity Management

The risk associated with the failure to appropriately manage unforeseen events.

#### IT

The risks associated with IT systems, Data including information security operations and Cyber risk.

#### Financial Crime (Including internal and external fraud)

This is the risk that the firm might be used to further financial crime.

#### Conduct Risk

The Risk associated with the firm of employees' activities that could threaten consumer protection or market integrity.

#### People Risk

This is the risk that people do not follow Convex Group's procedures, practices and/or rules, thus deviating from expected behaviour in a way that could damage Convex Group.

#### Measures used to assess risk

Operational Risk is assessed via the risk management framework, with each risk being assigned an inherent probability and impact, reflecting the level of risk in the absence of functional controls. Risks are then given an equivalent residual impact to reflect the level of risk with the current controls in place. Risks are also given a rating on a RAYG basis, which indicates how comfortable the business is with the level of risk.

#### Material changes over the reporting period

Operational risk has continued to grow throughout 2021, as the operational element of the company has grown substantially. The key developments in operational risk have been:

- Headcount has increased in 2021, this was made more complex by a large number of new employees being onboarded virtually due to COVID-19
- Continued systems and infrastructure development to support underwriting

#### COVID-19

The operational risk associated with COVID-19 was well managed in 2021 given Convex Group has been able to successfully operate in a remote working environment since 2020. The associated operational risk from COVID-19 has been mitigated well by Convex Group's agile technology approach, and no material direct losses have been sustained on an operational basis. There has been the potential for employees to be exposed to the virus, and despite a relatively low mortality rate, with many people catching the virus there was the possibility of multiple employees becoming ill or severely ill, which could have affected Convex Group negatively. To mitigate this risk, Convex continued to strictly follow the relevant government advice as it did throughout 2020 and its personnel were asked to work from home and were conducting business via their company laptops and phones remotely. Convex has also taken extensive precautions within its offices to ensure that the relevant government guidelines for office working is followed and that employees feel comfortable when returning to the office

In addition, Convex has worked closely with its main outsourcer, WNS, and WNS employees have been equipped to work from home to ensure continuity in the Group's operations since 2020 following the Indian Government's announcement. Convex continue to communicate with WNS and monitor its performance of key services to ensure that operations are not interrupted by developments with COVID-19.

The COVID-19 Planning Working Group and the People Team have ensured that there continues to be a number of initiatives to ensure the wellbeing of Convex staff, and to mitigate the impacts of social-distancing and isolation. Wellbeing of Convex staff in this unfamiliar and difficult context remains a priority.

### **Cyber Security**

Information Security and Cyber resilience remains an area of attention for Convex, the emerging threat landscape coupled with the increasing sophistication of cyber-attacks has highlighted the necessity for the Group to ensure it has robust and effective controls in place to mitigate against these threats. Convex Group's IT Security team regularly assess its maturity on cyber security controls with updates provided to the Group Executive Risk Committee to ensure that senior leadership are aware of any related issues and outstanding actions in addition to the quarterly risk and control assessment process carried out by the Risk Management function. Convex carries out regular BCP (Business Continuity Planning) exercises covering the cyber-breach scenarios to test the capabilities of our preparations to deal with a cyber incident.

## **C.1.6. Other material risks**

### **C.1.6.1. Description of other material risks**

#### **Strategic Risk**

There is a degree of strategic risk inherent in the plans of Convex. The aim of the company is to become a scale player in the P&C market, and therefore there is an execution risk if Convex Group fails to deliver on its strategic objectives.

#### **Group Risk**

The Group structure also grew in 2021 with new underwriting entities being established to allow for further growth and expansion of underwriting lines, however, the Group remains relatively small with a lean structure (1 holding company and 4 underwriting entities)

#### **Regulatory and Legal Risk**

There is a risk that Convex Group fails to comply with regulations and laws within jurisdictions in which it operates. This risk is managed primarily by the Compliance function and the Legal function, which report to the Chief Compliance Officer and General Counsel respectively. Key regulatory and legal risks are noted within the Convex Group Risk Register as operational risks.

#### **Financial Risks from Climate Change**

The effects of climate change and global warming are increasingly apparent, as evidenced by increased heatwaves, erratic rainfall, and greater weather extremes. The risks to Convex Group associated with such changes are complex and need to be considered alongside other developing risk factors such as inflation and urbanisation. However, the resulting increasing loss costs to Insurers from weather related events such as Californian wildfires, European floods, or the increased frequency and severity of hurricanes are becoming increasingly evident and mean we need to continually enhance our ability to assess this changing risk profile.

#### **Measures used to assess risk**

Operational Risk is assessed via the risk management framework, with each risk being assigned an inherent impact, reflecting the level of risk in the absence of functional controls. Risks are then given an equivalent residual impact to reflect the level of risk with the current controls in place. Risks are also given a rating on a RAYG basis, which indicates how comfortable the business is with the level of risk.

#### **Material changes over the reporting period**

As with other risks, the material changes were the ones associated with the growth of Convex and continuing to embed a fully operational insurer of scale whilst predominately working from home in 2021.

## **C.2. How risks are mitigated including the methods used and the process to monitor the effectiveness of these methods**

### **C.2.1. Underwriting Risk mitigation**

Underwriting Risk is mitigated via the use of the following controls:

For Premium Risk:

- Convex Measurement Framework (CMF) tracks metrics such as monitoring premium by line of business regularly against the business plan;
- A Risk Adjusted Return Framework has been developed in 2022 supporting portfolio optimisation;
- Monitoring premium by line of business regularly against the business plan;
- Portfolio optimisation team supporting underwriters with timely information to support risk ranking;
- Underwriting guidelines;
- Underwriting authorities;
- Pre-bind peer reviews;
- Ceded re programme; and
- Risk appetite limits.

For Reserve Risk:

- Actuarial Function feed into the business planning using metrics such as loss ratio benchmarks;
- A Risk Committee and a Major Events Committee where complex claims and market situations are discussed as well as reserve trends to ensure adequate reserves are booked;
- An inflation working group has been setup in 2021 to develop a more holistic method to monitor inflation risk that Convex is exposed to;
- Monitoring claims by line of business regularly against the business plan;
- Information flow between underwriters and claims teams;
- Validation of amount of risk being taken using external data given Convex Group does not have proprietary experience data;
- An effective reinsurance program to protect against some adverse claims experience; and
- Technical pricing of select risks.

### **C.2.2. Market risk mitigation**

Market risk for Convex is kept at a limited level, owing to the prudent investment strategy and asset allocation, which has limited exposure to higher volatility classes such as equities.

The level of Market Risk is managed by:

- Taking into consideration the market risks inherent in Convex's insurance business, expenses and other liabilities including shareholder's capital when managing the investment portfolio; and
- Setting and monitoring an Aggregate Market Risk Limit ("AMRL") of 20% for CGL (25% for CRL and CIL) of the available risk capital, defined as a 1-in-200 probability one-year loss.
- Setting individual stress test risk limits for the respective market sub-risks at 2/3 of the AMRL.

Additional market risk mitigation may be taken as appropriate and contingent upon the market environment.

### **C.2.3. Credit risk mitigation**

Credit default risk is mitigated by monitoring a set of limits that control the risk of loss from a potential failure of an individual issuer or issue. These limits aim at managing the default risk of a given issuer, depending on its rating of fixed income securities issued by the issuer and held by Convex (corporate, Government agency and sub-sovereign) and are defined as a percentage of the AMRL, with higher risks set at a lower level.

Compliance with the limits is ensured through defined governance processes. The Financial Risk Management and the Investment function monitors the exposure against the limits on a daily basis, and reports on a monthly basis, with any issuer exposure breaches reported to the relevant entity CFO as appropriate for remediation or, in exceptional circumstances, a waiver.

Credit Risk on insurance assets is managed through Convex's Credit Control function, which monitors the ageing of receivables and overdue balances. Further, reinsurance credit risk is managed via a reinsurance approval process, which takes into account the credit rating of the reinsurer and the size of the exposure, and also by holding collateral posted by non-rated counterparties. Limits have been established for reinsurance exposures, by counterparty and Tier. Further, cash exposures within Trustee accounts that manage reinsurance collateral are subject to a limit.

#### **C.2.4. Liquidity risk mitigation**

Convex manages liquidity risk in accordance with a liquidity risk framework, that measures excess liquidity over a specified time horizon and in stressed scenarios and puts a limit that ensures excess liquidity is positive under all horizons and scenarios considered.

#### **C.2.5. Operational risk mitigation**

Convex Group has developed and embedded an effective control environment to mitigate against operational risk. These controls are rated according to their effectiveness and are stored within the RisKonnект system. Controls are reviewed periodically and analysed to ensure that the risk is being mitigated as expected.

#### **C.2.6. Other material risks mitigation**

##### **Strategic Risk**

Strategic risk is mitigated in part by the expertise of a wide array of industry veterans within the company, and on the Board, who continually review the strategy being enacted, whilst being aware of current market developments. In this phase of business growth, it is essential to remain agile and able to react positively to latest developments.

Additionally, the business planning process has robust controls, setting out the plan against a variety of different market backdrops, and thereby indicating a range of differing outcomes on a multi-year basis.

##### **Group Risk**

Group risk is mitigated largely by ensuring that all parts of the Group are aware of the strategy and priorities of the others, and from maintaining multiple functions and teams at a Group level.

The Risk function have been engaged and involved with the 2021 Group expansion, providing oversight and assurance activities where appropriate.

##### **Regulatory and Legal Risk**

The Compliance and Legal teams have continued to made enhancements and refinements to its control framework in 2021, including around the key areas of regulatory and legal risk, including licensing, sanctions, wordings, and conduct risk.

##### **Financial Risks from Climate Change**

Climate change risk is owned at Convex Group level by our Group CEO. The financial impact of the risks on the investment portfolio and the insurance portfolio has been assessed using a scenario analysis in 2021 for the first time. Other associated impacts from climate change risk such as reputation risk and other emerging risks are identified and monitored through our emerging risk management process.

### **C.3. Material risks concentration**

#### **C.3.1. Market risk concentration**

Concentration to market risk factors is monitored by the quantitative stress tests, including stress tests for:

- Interest Rate Risk (separated by primary components such as parallel and steepening or flattening movements)
- Credit Spread Risk (separated by rating, duration and type of asset)
- Equity Risk, including private equity and other illiquid assets
- Foreign Exchange Risk
- Real Estate Risk
- Hedge Funds

In addition, exposure to each market sub-risk is limited to a risk limit equal to two-thirds of the AMRL.

Concentrations to issuers and single investments are limited in the concentration risk framework, discussed in the credit risk section.

### **C.3.2. Credit risk concentration**

Concentration risk is monitored by a set of limits that control the risk of loss from a potential failure of an individual issuer or issue. These limits aim at managing the default risk of a given issuer, depending on its rating, and related to Investment, Treasury and Ceded Reinsurance counterparty exposures. For political and credit risk insurance exposures, counterparty and country limits are also in place to ensure concentrations are managed.

Compliance with the limits is ensured through defined governance processes. The Financial Risk Management and the Investment function monitors the exposure against the limits on a daily basis, and reports on a monthly basis, with any issuer exposure breaches reported to the relevant entity CFO as appropriate for remediation or, in exceptional circumstances, a waiver.

As at December 31, 2021, credit risk exposures remain well-diversified.

### **C.3.3. Liquidity risk concentration**

There are no Liquidity Risk concentrations identified as at year end 2021.

### **C.3.4. Operational risk concentration**

Other than the analysis of risk incident data, there are no formal procedures relating to the measurement of operational risk concentration at present within Convex's Risk Management Framework.

Risk incident data is analysed for trends or concentrations with regards to root causes, departments, risk owners and other such categories. It is expected that further analysis may be carried out as the risk framework is embedded further within the business.

## **C.4. How assets are invested in accordance with the prudent person principle as stated in paragraph 5.1.2 of the Code**

Convex manages its investment portfolio in line with the Prudent Person Principle, ensuring that risks in the current portfolio and in new investment proposals can be identified, measured, monitored, managed and controlled within the financial market risk framework. Concentration risk limits are in place to ensure the portfolio is appropriately diversified and the overall level of risk is limited by an aggregate market risk limit.

Convex ensures the availability of assets to pay in a timely manner claims and other obligations by having in place a liquidity risk system that measures excess liquidity in stressed market conditions.

## **C.5. Stress testing and sensitivity analysis to assess material risks, including the methods and assumptions used, and the outcomes**

Stress testing and sensitivity analysis is an important part of the business planning process, and of the testing performed by the Risk team to ensure that Convex Group remains prepared for potential deviations from expectations. As part of the 2021 GSSA report, Stress and Scenario Testing ("SST") was carried out at group level and at subsidiary level, and took many different forms such as:

- Sensitivity analysis of the business plan;
- Stress testing to better understand and mitigate what could arise from single events;
- Scenario analysis where several stresses across risks occur at the same time; and
- Reverse stress testing.

These tests allow Convex Group to better understand its business and risk profile by assessing its ability to meet solvency and liquidity requirements under base and stressed conditions, as well as providing a view on how business planning and performance might be affected by these stresses.

The stresses looked at in 2021 GSSA were the following:

1. A US windstorm severe 3-event scenario in which a cluster of three US hurricanes make landfall in continental US.
2. A US severe earthquake scenario that included a severe earthquake of Magnitude ~8.0 along the San Andreas fault, followed by an aftershock of Magnitude ~7.0, leading to significant property losses and disruption to supply chains.
3. A strong financial market stress which involves a parallel downward shift in risk free interest rates of 100 bps; a widening in corporate bond spreads dependent on their current credit rating; and a fall in other asset values.
4. Liquidity stress that observed liquidity requirements over a 12-month horizon following a large loss event.

The scenarios used as part of scenario analysis in the 2021 GSSA were the following:

1. A catastrophe event in India occurs which severely impacts Convex's material outsource partner.
2. A Cyber-attack takes place in which Convex are held to ransom, with the attackers threatening to release sensitive information unless it receives a substantial sum of money.
3. COVID-19 impact on claims and reserving

In none of the scenarios, all detailed within the 2021 GSSA Report, was solvency impacted in a meaningful way.

Reverse stress testing was also carried out where scenarios were developed to show how Convex Group could become unviable. This work showed two quantitative scenarios that are highly unlikely, again showing the resilience of Convex Group given its solvency capital position.

Convex Group continues to enhance its stress and scenario testing capabilities and additional underwriting and reserving stress tests are being considered as part of the 2022 GSSA process

## **C.6. Any other material information**

There is no other material information relating to the risk profile of the business.

# D. Solvency Valuation

## D.1. The valuation bases, assumptions and methods used to derive the value of each asset class

The following methods and assumptions were used in estimating the fair value of each class of financial instrument recorded in the Consolidated Balance Sheets.

The carrying values of cash and cash equivalents (including restricted cash), investment income due and accrued, funds withheld, balances receivable on the sale of investments and reinsurance balances receivable approximated their fair values at December 31, 2021, due to their respective short maturities.

### Accounts and premiums receivable

The accounts and premiums receivable balance represents premiums owed from (re)insurers, less related acquisition costs. Outstanding premiums are valued at fair value, being the amount recoverable, and due to the short-term nature of the receivable no adjustments to valuation, estimates or judgments are required.

The recognition and valuation basis are consistent with the accounting valuation under U.S. GAAP. However, the balance has been adjusted within Convex's Economic Balance Sheet to exclude the amount not yet due on the valuation date.

### Derivative instruments

Convex may enter into derivative instruments in the form of industry loss warranties and foreign currency forward exchange derivatives. These derivative instruments are used to manage exposures to catastrophe losses and currency fluctuations. All outstanding derivative financial instruments are recognized in the Consolidated Balance Sheets at their fair values. Changes in the fair values of derivative instruments are reported in earnings.

### Deferred tax assets

Deferred tax assets and liabilities are recorded in accordance with ASC Topic 740 "Income Taxes". Consistent with ASC 740, Convex records deferred income taxes which reflect operating losses and tax credits carried forward and the tax effect of the temporary differences between the carrying amounts of assets and liabilities for financial reporting purposes and their respective tax bases.

CGL and its Bermuda domiciled subsidiary are not subject to any income, withholding or capital gains taxes under current Bermuda law. Convex has operating subsidiaries in the U.K. which are subject to relevant taxes in that jurisdiction.

Convex recognizes the tax benefits of uncertain tax positions only where the position is more likely than not to be sustained upon examination by tax authorities based upon the technical merits of the position. Based on the more-likely-than-not recognition threshold, we must presume that the tax position will be subject to examination by a taxing authority with full knowledge of all relevant information. If the recognition threshold is met, then the tax position is measured at the largest amount of benefit that is more than 50% likely of being realized upon ultimate settlement. Convex classifies all interest and penalties related to uncertain tax positions in income tax expenses.

### Fixed maturity investments

In general, valuation of Convex's fixed maturity investment portfolio is provided by pricing services, such as index providers and pricing vendors, as well as broker quotations. The pricing vendors provide valuations for a high volume of liquid securities that are actively traded. For securities that do not trade on an exchange, the pricing services generally utilize market data and other observable inputs in matrix pricing models to determine month end prices. Prices are generally verified using third party data. Index providers generally utilize centralized trade reporting networks, available market makers and statistical techniques.

In general, broker-dealers value securities through their trading desks based on observable inputs. The methodologies include mapping securities based on trade data, bids or offers, observed spreads, and performance on newly issued securities. Broker dealers also determine valuations by observing secondary trading of similar securities. Prices obtained

from broker quotations are considered non-binding, however, they are based on observable inputs and by observing secondary trading of similar securities obtained from active, non-distressed markets.

The techniques generally used to determine the fair value of the Company's fixed maturity investments are detailed below by asset class.

#### **U.S. government and government agency**

U.S. government and government agency securities consist primarily of debt securities issued by the U.S. Treasury and mortgage pass-through agencies such as the Federal National Mortgage Association, the Federal Home Loan Mortgage Corporation and the Government National Mortgage Association. Fixed maturity investments included in U.S. government and government agency securities are primarily priced by pricing services. When evaluating these securities, the pricing services gather information from market sources and integrate other observations from markets and sector news. Evaluations are updated by obtaining broker dealer quotes and other market information including actual trade volumes, when available. The fair value of each security is individually computed using analytical models which incorporate option adjusted spreads and other daily interest rate data.

#### **Agency residential mortgage-backed securities**

Convex's agency residential mortgage-backed investments are primarily priced by pricing services using a mortgage pool specific model which utilizes daily inputs from the active to be announced market, which is very liquid, as well as the U.S. treasury market. The model also utilizes additional information, such as the weighted average maturity, weighted average coupon and other available pool level data which is provided by the sponsoring agency. Valuations are also corroborated with daily active market quotes.

#### **Non-agency residential mortgage-backed securities**

Convex's non-agency mortgage-backed investments include non-agency prime residential mortgage-backed fixed maturity investments. Convex has no fixed maturity investments classified as sub-prime held in its non-agency residential mortgage-backed securities. Securities held in these sectors are primarily priced by pricing services using an option adjusted spread model or other relevant models, which principally utilize inputs including benchmark yields, available trade information or broker quotes, and issuer spreads. The pricing services also review collateral prepayment speeds, loss severity and delinquencies among other collateral performance indicators for the securities valuation, when applicable.

#### **U.S. corporate**

U.S. corporate debt securities consist primarily of investment-grade debt of a wide variety of U.S. corporate issuers and industries. Convex's corporate fixed maturity investments are primarily priced by pricing services. When evaluating these securities, the pricing services gather information from market sources regarding the issuer of the security and obtain credit data, as well as other observations, from markets and sector news. Evaluations are updated by obtaining broker dealer quotes and other market information including actual trade volumes, when available. The pricing services also consider the specific terms and conditions of the securities, including any specific features which may influence risk. In certain instances, securities are individually evaluated using a spread which is added to the U.S. treasury curve or a security specific swap curve as appropriate.

#### **Non-U.S. corporate**

Non-U.S. corporate debt securities consist primarily of investment-grade debt of a wide variety of non-U.S. corporate issuers and industries. Convex's non-U.S. corporate fixed maturity investments are primarily priced by pricing services. When evaluating these securities, the pricing services gather information from market sources regarding the issuer of the security and obtain credit data, as well as other observations, from markets and sector news. Evaluations are updated by obtaining broker dealer quotes and other market information including actual trade volumes, when available. The pricing services also consider the specific terms and conditions of the securities, including any specific features which may influence risk.

### **Asset-backed securities**

Asset backed securities include mostly investment-grade debt securities backed by pools of loans with a variety of underlying collateral, including automobile loan receivables, student loans, credit card receivables, and collateralized loan obligations originated by a variety of financial institutions. Securities held in these sectors are primarily priced by pricing services. The pricing services apply dealer quotes and other available trade information such as bids and offers, prepayment speeds which may be adjusted for the underlying collateral or current price data, the U.S. treasury curve and swap curve as well as cash settlement. The pricing services determine the expected cash flows for each security held in this sector using historical prepayment and default projections for the underlying collateral and current market data. In addition, a spread is applied to the relevant benchmark and used to discount the cash flows noted above to determine the fair value of the securities held in this sector.

### **Commercial mortgage-backed securities**

Commercial mortgage backed securities are investment-grade debt primarily priced by pricing services. The pricing services apply dealer quotes and other available trade information such as bids and offers, prepayment speeds which may be adjusted for the underlying collateral or current price data, the U.S. treasury curve and swap curve as well as cash settlement. The pricing services determine the expected cash flows for each security held in this sector using historical prepayment and default projections for the underlying collateral and current market data. In addition, a spread is applied to the relevant benchmark and used to discount the cash flows noted above to determine the fair value of the securities held in this sector.

### **Short-term investments**

Short-term investments consist primarily of highly liquid securities, all with maturities of less than one year from the date of purchase. The fair value of the portfolio is generally determined using amortized cost which approximates fair value.

### **Other investments**

Other investments consist of an investment in an externally managed fund, carried at fair value. Its fair value is established through the net asset value (NAV) practical expedient.

## **D.2. The valuation bases, assumptions and methods used to derive the value of technical provisions and the amount of the best estimate. The amount of the risk margin as well as the level of uncertainty to determine the value of the technical provisions should be included**

We have referred to guidance provided by the BMA to calculate technical provisions. In certain cases, we have referred to technical provision guidance from Lloyd's as that is the framework used for Solvency II purposes. We have utilized the technical provision template provided by the BMA (on its website) as part of our process.

We rely on the following data for technical provision calculation associated with our operating companies:

- Claims provision data provided by Convex's operating companies: These are provided separately by operating company and are based on their underlying U.S. GAAP reserve process for Q4 2021. The operating companies also provide expected reserve cashflows and other adjustments for the claims provision. For intercompany balances, this data comes directly from their Solvency II process. Other adjustments made to the claims provision include:
  - Removal of prudence margins;
  - Adjustments for cost of investment income and bad debt;
  - Inclusion of expected cashflows for future reinstatement premiums ("RIP") and other premium receivables related to claims that have already occurred; and
  - Discounting of cash flows.
- Premium provision data provided by the operating companies: These are provided separately by operating company and are based on expected cashflows related to unearned premium and bound but not inceptioned contracts. Similar to the claims provision, expected cashflows and other adjustments are included. For intercompany balances, this data comes directly from their Solvency II process.
- The risk margin increases the technical provisions from the best estimate to theoretical level needed to transfer obligations to another risk bearing entity. We use the technical provision template provided by the BMA to calculate the risk margin.
- Discount rates: We use risk-free discount rates provided by the BMA. The BMA provides separate discount rates by currency.
- Convex uses a common underwriting system and they map their data to the BMA classes of business by reference to the class business codes in the underwriting system.

The technical provisions are made up of the following elements (USD in thousands):

#### CGL

	December 31, 2021 \$000s	December 31, 2020 \$000s
Best estimate premium provisions	(84,485)	77,978
Best estimate loss and loss provision	803,438	315,168
Risk margin	88,232	41,294
<b>Total general business insurance technical provisions</b>	<b>807,185</b>	<b>434,440</b>

#### CRL

	December 31, 2021 \$000s	December 31, 2020 \$000s
Best estimate premium provisions	(84,485)	77,978
Best estimate loss and loss provision	803,438	315,168
Risk margin	88,232	41,286
<b>Total general business insurance technical provisions</b>	<b>807,185</b>	<b>434,432</b>

### D.3. Description of recoverables from reinsurance contracts, including special purpose insurers and other risk transfer mechanisms

Convex enters into reinsurance and retrocession agreements in order to mitigate its accumulation of loss, reduce its liability on individual risks, enable it to underwrite policies with higher limits and increase its aggregate capacity. Convex primarily purchases reinsurance on either an excess of loss or proportional basis and also purchases industry loss warranties. The ceding of the (re)insurance risk does not legally discharge Convex from its primary liability for the full amount of the policies, and Convex is therefore required to pay the loss and bear collection risk relating to the possibility that the reinsurer or retrocessionnaire fails to meet its obligations under the reinsurance or retrocession agreement.

Reinsurance recoverables are calculated as the probability-weighted average of discounted future cash flows relating to reinsurance contracts, adjusted for the expected losses due to counterparty default. Although established separately, reinsurance recoverables are valued on the same basis and using the same methodology and assumptions used to derive Technical Provisions – Best Estimate Loss and Loss Expense Provisions, as described in Section D.2, subject to the following:

- Internal expenses are only allowed if they are recoverable under the reinsurance agreement;
- Where the timing of recoveries diverges from that for payments a separate projection is used;
- Allowance for risk of default depends on the credit rating and exposure to the reinsurance counterparty; and
- Reinsurance assets take into account reinsurance commissions.

Paid losses recoverable and loss reserves recoverable balances include amounts owed to the Group in respect of paid and unpaid ceded losses and loss expenses, respectively. The balances are presented net of a provision for non-recoverability. In establishing our reinsurance recoverable balances, significant judgment is exercised by management in determining the amount of unpaid losses and loss expenses to be ceded as well as our ability to cede losses and loss expenses under our reinsurance contracts.

Convex's ceded unpaid losses and loss expenses consists of two elements, those for reported losses and those for Incurred But Not Reported ("IBNR"). Ceded amounts for IBNR are developed as part of our loss reserving process. Consequently, the estimation of ceded unpaid losses and loss expenses is subject to similar risks and uncertainties in the estimation of gross IBNR.

#### **D.4. The valuation bases, assumptions and methods used to derive the value of other liabilities**

The carrying values of accounts payable and accrued expenses as well as other liabilities approximated their fair values at December 31, 2021, due to their respective short maturities.

#### **D.5. Any other material information**

There is no other material information regarding the valuation of assets and liabilities.

# E. Capital Management

## E.1. Eligible capital

### E.1.1. Description of the capital management policy and process to determine capital needs for business planning, how capital is managed and any material changes during the reporting period

The primary objective of capital management is to manage the balance between return and risk, whilst maintaining economic capital in accordance with risk appetite. CGL's capital and risk management objectives are closely interlinked, and support the dividend policy, whilst also recognising the critical importance of protecting policyholder and other stakeholder interests. In managing its capital, CGL seeks to, on a consistent basis:

- Maintain sufficient, but not excessive, financial strength in accordance with its risk appetite, to satisfy the requirements of regulators and other stakeholders;
- Retain financial flexibility by maintaining strong liquidity; and
- Allocate capital efficiently to remain within risk appetite and drive value adding growth.

CGL uses a number of sensitivity tests to understand the volatility of earnings, the volatility of its capital requirements, and to manage its capital efficiently. Sensitivities to economic and operating experience are regularly produced on CGL's key financial performance metrics to inform decision making and planning processes over a five-year planning horizon, and as part of the framework for identifying and quantifying the risks to which CGL is exposed.

These requirements include, but are not limited to the following:

#### Regulatory requirements

Minimum capital and/or solvency standards exist for Convex and its subsidiaries in the jurisdictions in which it operates. These jurisdictions and capital requirements/models include:

1. Bermuda – BMA – BSCR model; and
2. U.K. – Solvency II Standard Formula

### E.1.2. Description of the eligible capital categorized by Tiers in accordance with the Eligible Capital Rule

As at December 31, 2021, and December 31, 2020, respectively, Eligible Capital for CGL and CRL was categorized as follows:

All of the Eligible Capital for CRL is Tier 1, the highest quality capital, consisting of capital stock, contributed surplus and statutory surplus.

#### CGL

CGL's eligible capital by Tier under BMA definitions is summarized in the table below (USD in thousands).

	December 31, 2021 \$000s	December 31, 2020 \$000s
Tier 1 Available Capital	2,542,699	2,512,230
Tier 2 Available Capital	–	–
Tier 3 Available Capital	400,000	400,000
<b>Total Eligible Capital</b>	<b>2,942,699</b>	<b>2,912,230</b>

## CRL

CRL's eligible capital by Tier under BMA definitions is summarized in the table below (USD in thousands).

	December 31, 2021 \$000s	December 31, 2020 \$000s
Tier 1 Available Capital	2,086,190	2,109,429
Tier 2 Available Capital	–	–
Tier 3 Available Capital	–	–
<b>Total Eligible Capital</b>	<b>2,086,190</b>	<b>2,109,429</b>

The amounts identified above for CGL and CRL are fully available to meet the ECR regulatory requirements, as outlined below.

### E.1.3. Description of the eligible capital categorized by Tiers, in accordance with the Eligible Capital Rules used to meet the Enhanced Capital Requirement (ECR) and the Minimum Margin of Solvency defined in accordance with section (1)(1) of the Act

All Tier 1 amounts are fully available to meet the Minimum Margin of Solvency ("MSM").

As at December 31, 2021 and December 31, 2020, respectively, Eligible Capital for CGL and CRL as applied to its Minimum Margin of Solvency ("MSM") and ECR was categorized as follows (USD in thousands):

## CGL

Year ended December 31, 2021	Applied to MSM \$000s	Applied to ECR \$000s
Tier 1 Available Capital	2,542,699	2,542,699
Tier 2 Available Capital	–	–
Tier 3 Available Capital	–	400,000
<b>Total Eligible Capital</b>	<b>2,542,699</b>	<b>2,942,699</b>

Year ended December 31, 2020	Applied to MSM \$000s	Applied to ECR \$000s
Tier 1 Available Capital	2,512,230	2,512,230
Tier 2 Available Capital	–	–
Tier 3 Available Capital	–	400,000
<b>Total Eligible Capital</b>	<b>2,512,230</b>	<b>2,912,230</b>

## CRL

Year ended December 31, 2021	Applied to MSM \$000s	Applied to ECR \$000s
Tier 1 Available Capital	2,086,190	2,086,190
Tier 2 Available Capital	—	—
Tier 3 Available Capital	—	—
<b>Total Eligible Capital</b>	<b>2,086,190</b>	<b>2,086,190</b>

Year ended December 31, 2020	Applied to MSM \$000s	Applied to ECR \$000s
Tier 1 Available Capital	2,109,429	2,109,429
Tier 2 Available Capital	—	—
Tier 3 Available Capital	—	—
<b>Total Eligible Capital</b>	<b>2,109,429</b>	<b>2,109,429</b>

### E.1.4. Confirmation that the eligible capital is subject to transitional arrangements as required under the Eligible Capital Rules

Not Applicable.

### E.1.5. Identification of any factors affecting encumbrances affecting the availability and transferability of capital to meet the Eligible Capital Rules

As at December 31, 2021, Convex had cash and cash equivalents, restricted cash, short-term investments and fixed maturity investments that were pledged during the normal course of business, of which certain assets were held in trust. Pledged assets are generally for the benefit of Convex's cedants and policyholders and to facilitate the accreditation of Convex by certain regulators. These assets are released to Convex upon the payment of the obligations or the expiration of the risk period.

### E.1.6. Identification of ancillary capital instruments that have been approved by the Authority

Not Applicable.

### E.1.7. Identification of differences in shareholder's equity as stated in the financial statements versus available statutory capital and surplus

Other than the impact of statutory based technical provision valuation techniques, significant differences between GAAP shareholders' equity and available statutory capital and surplus include a reduction in available statutory capital for the removal of prepaid expenses.

## E.2. Regulatory capital requirements

### E.2.1. Identification of the amount of the ECR and Minimum Margin of Solvency at the end of the reporting period

As at December 31, 2021 and December 31, 2020, respectively the regulatory capital requirements for CGL were assessed as follows (USD in thousands):

	December 31, 2021 \$000s	December 31, 2020 \$000s
Transition ECR	N/A	644,911
ECR	925,741	603,566
Minimum Margin of Solvency	578,312	222,908

CRL's ECR and MSM as determined using the BMA's BSCR model are summarized in the table below (USD in thousands):

	December 31, 2021 \$000s	December 31, 2020 \$000s
Transition ECR	N/A	626,108
ECR	907,755	584,154
Minimum Margin of Solvency	395,368	222,908

As of the end of the reporting period, CGL and CRL are compliant with all ECR and MSM capital requirements.

### E.2.2. Identification of any non-compliance with the Minimum Margin of Solvency and the ECR

As at December 31, 2021, Convex was compliant with the MSM and ECR requirement.

### E.2.3. Description of the amount and circumstances surrounding the non-compliance, the remedial measures taken and their effectiveness

Not applicable.

### E.2.4. Where the non-compliance has not been resolved, a description of the amount of the non-compliance at the end of the reporting period

Not applicable.

### **E.3. Approved internal capital model used to derive the ECR**

#### **E.3.1. A description of the purpose and scope of the business and risk areas where the internal model is used**

Not applicable.

#### **E.3.2. Where a partial internal model is used, a description of how it is integrated with the BSCR Model.**

Not applicable.

#### **E.3.3. A description of methods used in the internal model to calculate the ECR**

Not applicable.

#### **E.3.4. A description of aggregation methodologies and diversification effects**

Not applicable.

#### **E.3.5. A description of the main differences in the methods and assumptions used for the risk areas in the internal model versus the BSCR Model**

Not applicable.

#### **E.3.6. A description of the nature and suitability of the data used in the internal model**

Not applicable.

#### **E.3.7. Any other material information**

Not applicable.

# F. Significant event

## F.1. A description of the significant event

Not Applicable.

## F.2. Approximate date(s) or proposed timing of the significant event

Not Applicable.

## F.3. Confirmation of how the significant event has impacted or will impact, any information provided in the most recent financial condition report filed with the Authority

Not Applicable.

## F.4. Any other material information

Not Applicable



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Convex Group is the trading name of Convex Group Limited, a company incorporated in Bermuda, and the ultimate parent company of the Convex Group of companies, as follows: Convex Re Limited, a company incorporated in Bermuda, which is a wholly-owned subsidiary of Convex Group Limited and licensed and supervised by the Bermuda Monetary Authority; Convex Insurance UK Limited, a company incorporated in England & Wales, which is a wholly-owned subsidiary of Convex Re Limited and authorised by the Prudential Regulation Authority (PRA) and regulated by the Financial Conduct Authority and the PRA; and Convex UK Services Limited, a company incorporated in England & Wales, which is a wholly-owned subsidiary of Convex Group Limited.

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