



BEST'S COMPANY REPORT



NUCLEAR ELECTRIC INSURANCE LIMITED

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FEIN #: 98-0066503

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Cedar Hamilton Limited

A

NEIL Overseas DAC

A



Best's Credit Rating Effective Date
May 15, 2024

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Information

[Best's Credit Rating Methodology](#)
[Guide to Best's Credit Ratings](#)
[Market Segment Outlooks](#)

Financial Data Presented

Financial data in this report: (i) includes data of affiliated entities that are not rating unit members where analytics benefit from inclusion; and/or (ii) excludes data of rating unit member entities if they operate in different segments or geographic areas than the Rating Unit generally. See [list of companies](#) for details of rating unit members and any such included and/or excluded entities.

The financial data in this report reflects the most current data available to the Analytical Team at the time of the rating. Updates to the financial exhibits in this report are available here: [Best's Financial Report](#).

Nuclear Electric Insurance Limited

AMB #: 011284 | **NAIC #:** 34215 | **FEIN #:** 98-0066503
Ultimate Parent: AMB # 011284 - Nuclear Electric Insurance Limited

Best's Credit Ratings - for the Rating Unit Members

Financial Strength Rating (FSR)

A
Excellent
Outlook: Stable
Action: Affirmed

Issuer Credit Rating (ICR)

a+
Excellent
Outlook: Stable
Action: Affirmed

Assessment Descriptors

Balance Sheet Strength	Strongest
Operating Performance	Marginal
Business Profile	Favorable
Enterprise Risk Management	Appropriate

Rating Unit - Members

Rating Unit: Nuclear Electric Insurance Ltd | **AMB #:** 011284

AMB # **Rating Unit Members**
074633 Cedar Hamilton Limited

AMB # **Rating Unit Members**
089012 NEIL Overseas DAC

Rating Rationale

Balance Sheet Strength: **Strongest**

- Risk-adjusted capitalization is in the strongest range, as measured by Best's Capital Adequacy Ratio (BCAR).
- Nuclear Electric Insurance Limited (NEIL) holds capital to pay for two full-limit losses, net of reinsurance, leading to very low net premium leverage.
- If needed, most of NEIL's policies allow Members to be assessed for a significant amount of additional premium.

Operating Performance: **Marginal**

- NEIL's operating performance is subject to substantial volatility due to the nature of the business it underwrites.
- NEIL's diversified investment portfolio continued to be accretive to surplus in 2023 after experiencing losses in 2022.
- Underwriting expenses have been significantly lower than the industry over the last five years.

Business Profile: **Favorable**

- NEIL is the dominant player in the U.S. nuclear power plant market, offering dedicated capacity to the sector, with a highly specialized utility insurance team.
- NEIL is a Member-owned mutual company, providing (re)insurance capacity primarily in the U.S.
- Nuclear power plants have regulatory objectives, which require the purchase of insurance, supporting NEIL's favorable business profile.

Enterprise Risk Management: **Appropriate**

- Member-appointed directors ensure significant board representation from the energy sector.
- NEIL's loss prevention efforts are supported by a staff of loss prevention specialists. The group's specialized loss prevention department has an effective track record of working together with insured Members to control frictional losses.
- High level of risk-adjusted capitalization at the tail (i.e., 1-in-500-year return period or 99.8% VaR).

Outlook

- The stable outlooks reflect AM Best's expectation that NEIL will maintain its rating fundamentals over the intermediate term. As NEIL holds capital to pay for two full-limit losses (net of reinsurance), risk-adjusted capitalization is expected to remain at the strongest level. NEIL is also expected to maintain its dominance in the U.S. nuclear power plant market, and its competitive position is expected to be supported by recent strategic decisions, such as the formation of Cedar Hamilton Limited.

Rating Drivers

- Negative rating action could occur should NEIL experience a significant erosion or loss of capital, such as through the payment of an outsized dividend, loss of Members, or in the event of an extreme loss event, such as core damage to a nuclear reactor.
- Though unlikely at this time, positive rating action could result from a prolonged period of favorable operating performance.

Key Financial Indicators

Best's Capital Adequacy Ratio (BCAR) Scores (%)

Confidence Level	95.0	99.0	99.5	99.6
BCAR Score	80.1	68.6	63.3	62.3

Source: Best's Capital Adequacy Ratio Model - P/C, US

Year End - December 31

Key Financial Indicators USD (000)	2022	2021	2020	2019	2018
Premiums Written:					
Direct	178,890	183,868	201,636	216,827	245,757
Assumed	115,445	144,576	124,744	85,310	69,878
Ceded	39,674	43,768	53,570	49,478	53,472
Net	254,661	284,676	272,810	252,660	262,163
Net Operating Income	32,383	-410,764	-245,301	-368,121	-124,674
Net Income	-189,717	-194,501	-139,424	-61,145	-108,149
Total Admitted Assets	4,566,735	5,673,222	5,655,363	5,658,547	4,985,173
Policyholders' Surplus	3,763,807	4,175,603	4,209,023	4,317,590	4,137,004

Source: BestLink® - Best's Financial Suite

Year End - December 31

Key Financial Ratios (%)	2022	2021	2020	2019	2018	Weighted Average
Profitability:						
Combined Ratio	119.0	278.4	270.1	311.7	211.4	239.2
Reserve Development Combined Ratio Impact	-11.6	-9.4	-13.4	-7.8	-8.8	-10.2
Net Investment Yield	1.5	2.2	1.5	2.2	2.4	1.9
Pre-Tax Operating Return on Net Earned Premiums	12.8	-99.9	-99.9	-99.9	-63.4	-99.4
Net Income Return on Policyholders' Surplus	-4.8	-4.6	-3.3	-1.4	-2.5	-3.3
Total Return on Policyholders' Surplus	-15.2	-0.6	-2.3	5.3	-9.5	-4.4
Leverage:						
Net	0.3	0.4	0.4	0.4	0.3	...
Gross	0.3	0.4	0.4	0.4	0.3	...
Non-affiliated Investment	77.0	81.5	74.6	69.9	72.2	...

Source: BestLink® - Best's Financial Suite

Credit Analysis

Balance Sheet Strength

NEIL continues to target a minimum surplus which is at least sufficient to cover two full-limit nuclear losses, net of reinsurance.

Capitalization

NEIL reported consolidated surplus at 2022 year-end of approximately USD 3.8 billion and surplus of approximately USD 4.0 billion at year-end 2023, growing approximately 7%. Surplus had declined 12% between 2021 and 2022. The decline was driven by net realized losses of USD 721 million stemming from equity market volatility in 2022 and rising interest rates' impact on fixed income valuations. Net realized investment gains were USD 413.5 million in 2023. Surplus has continued to exceed the minimum amount sufficient to cover two full-limit nuclear losses, net of reinsurance. Investment returns were impacted by the market volatility in 2022, although investment income remained positive at USD 69 million in 2022.

According to NEIL guidelines, policyholder distributions are declared and paid at the discretion of the Board of Directors. The company could potentially decide not to declare a distribution in favor of retaining additional capital in any year. Additionally, and at the sole discretion of the Board of Directors, the company can call upon the Members of each nuclear insurance program for payment of a proportionate share of retrospective premium adjustments, in whole or in part, up to a maximum of ten times the Members' annualized policy premiums, to cover underwriting losses and related costs incurred by the company. Each insured has a contingent exposure to the company for retrospective premium adjustments based on losses incurred each year under the Primary Property, Accidental Outage, and Excess Property programs. The liability of the Members for the retrospective premium adjustment for any policy year ceases six years after the end of that policy year unless prior demand has been made. Management believes that it is unlikely that any retrospective premium adjustments will be made for policies whose terms have expired. The retrospective premium provision has remained at up to ten times annual premium for policies written since 2001. The retrospective provision allows NEIL to access approximately \$2.3 billion of capital within 20 business days.

The company's capital and surplus adequately supports its business risks, and the overall capitalization of NEIL is in the strongest range. NEIL has very low underwriting leverage, which offsets the higher asset risk derived from the company's substantial equity holdings. Given the anticipated scenario of claim payments and capital management steps taken following a full-limit loss, in such a

Balance Sheet Strength (Continued...)

scenario the company's capital is still expected to support ongoing operations. In the unlikely occurrence of two full-limit losses, reliance is placed on predicted loss payout patterns, reinsurance, rate increases, the retrospective premium provision, and suspension of distribution payments for a period of time, in order to maintain sufficient capital to support ongoing operations.

	Year End - December 31				
Capital Generation Analysis USD (000)	2022	2021	2020	2019	2018
Beginning Policyholders' Surplus	4,175,603	4,209,023	4,317,590	4,137,004	4,473,964
Net Operating Income	32,383	-410,764	-245,301	-368,121	-124,674
Net Realized Capital Gains (Losses)	-222,101	216,263	105,877	306,976	16,524
Net Unrealized Capital Gains (Losses)	-414,970	170,674	39,717	283,933	-298,889
Other Changes in Capital and Surplus	192,891	-9,592	-8,860	-42,202	70,079
Net Change in Policyholders' Surplus	-411,796	-33,420	-108,567	180,586	-336,960
Ending Policyholders' Surplus	3,763,807	4,175,603	4,209,023	4,317,590	4,137,004
Net Change in Policyholders' Surplus (%)	-9.9	-0.8	-2.5	4.4	-7.5
Net Change in Policyholders' Surplus (5 yr CAGR)	-3.4	...	...	...	...

Source: BestLink® - Best's Financial Suite

	Year End - December 31				
Liquidity Analysis	2022	2021	2020	2019	2018
Net Operating Cash Flow USD (000)	-453,721	-174,033	-450,482	10,342	-216,064
Current Liquidity (%)	383.9	283.1	289.9	345.3	472.6

Source: BestLink® - Best's Financial Suite

Asset Liability Management - Investments

NEIL's investments are externally managed. The Finance and Risk Committee of the Board of Directors meets quarterly to discuss investments and is comprised of Member Directors and three outside Board members, all with financial markets or insurance experience. All investment oversight is conducted through the Chief Investment Officer who coordinates activities with the Chief Executive Officer and Chief Financial Officer. While NEIL's investment philosophy focuses on a three-to-five year investment horizon, the investment portfolio has a higher equity allocation, in comparison to the industry composite, in order to achieve higher risk-adjusted returns. NEIL has exposure across the investment spectrum with investments in both U.S. and non-U.S. equities and fixed income. Investments also include alternative exposures such as real estate, private equity, and hedge funds. Exposure in alternative investments does not materially affect NEIL's overall liquidity.

	Year End - December 31				
Composition of Cash and Invested Assets	2022	2021	2020	2019	2018
Total Cash and Invested Assets USD (000)	4,380,104	5,489,381	5,396,285	5,554,679	4,909,910
Composition Percentages (%)					
Unaffiliated:					
Cash and Short Term Investments	3.0	9.9	7.5	14.0	3.2
Bonds	21.6	21.2	27.8	28.7	33.2
Stocks	45.3	45.7	41.7	40.1	44.9
Other Invested Assets	16.8	16.3	16.1	14.3	15.9
Total Unaffiliated	86.7	93.2	93.1	97.1	97.1
Investments in Affiliates	13.3	6.9	6.9	2.9	3.0
Total	100.0	100.0	100.0	100.0	100.0

Source: BestLink® - Best's Financial Suite

Balance Sheet Strength (Continued...)

Bonds and Short Term Investments - Distribution by Maturity (%)	Years					Average (Years)
	0-1	1-5	5-10	10-20	20+	
Government Bonds	4.6	18.3	2.9	3.2	3.1	6.4
Government Agencies and Municipal Bonds	1.3	3.8	3.2	4.1	2.1	10.3
Industrial and Miscellaneous Bonds	3.3	30.9	12.0	3.3	3.9	6.2
Total Bonds	9.1	53.1	18.1	10.5	9.1	6.9

Source: BestLink® - Best's Financial Suite

Reserve Adequacy

Past claims leading to significant, adverse developments were mediated through settlements. For year-end 2023 and 2022 reserves experienced favorable development of USD 287 thousand and USD 36.1 million respectively. The favorable development was the result of settlements of large claim liabilities that were less than was previously reserved and re-estimation of IBNR on prior-year claims after receiving additional information.

As a result of its close relationship with its policyholders (inherent in a mutual insurer), Members report losses expeditiously so that appropriate measures may be taken to minimize losses or to compensate the utility for the interruption of electricity generation capability. The company uses its wholly owned subsidiary, NEIL Services, Inc., for site surveys and claims adjusting services. NEIL Services determines damage amounts and recommends appropriate reserve levels.

Year End - December 31					
Loss and Loss Adjustment Expense Reserves and Development - Calendar Year	2022	2021	2020	2019	2018
Loss and ALAE* Reserves USD (000)	392,897	382,386	353,741	212,189	225,373
Loss and ALAE* Reserves Development USD (000)	...	-31,298	-36,019	-12,317	-183
Development to:					
Original Reserves (%)	...	-7.6	-9.2	-5.5	-0.1
Prior Year End Surplus (%)	...	-0.7	-0.9	-0.3	...

Source: BestLink® - Best's Financial Suite

* Interim LAE reserves balances displayed include Adjusting and Other Unpaid as well as Defense and Cost Containment Unpaid. Year End LAE balances include Defense and Cost Containment Unpaid only.

Year End - December 31					
Loss and Loss Adjustment Expense Reserves and Development - Accident Year	2022	2021	2020	2019	2018
Original Loss and ALAE Reserves USD (000)	144,605	174,201	289,741	67,963	87,730
Loss and ALAE Reserves Developed thru Latest Year End USD (000)	144,605	150,895	230,009	34,787	57,828
Development to Original Reserves (%)	...	-13.4	-20.6	-48.8	-34.1
Accident Year Loss and LAE Ratio (%)	57.2	53.8	93.9	14.0	24.3
Accident Year Combined Ratio (%)	130.6	279.6	260.8	306.3	208.4

Source: BestLink® - Best's Financial Suite

Operating Performance

NEIL's operating performance is assessed as marginal, given the level of volatility inherent to NEIL's specialty niche. NEIL's expense ratio has been consistently lower than that of the commercial property composite over the past 10 years. Over the past five years, NEIL's average Loss & LAE ratio has compared favorably to its composite. The 2021, 2022, and 2023 pre-policyholder dividend combined ratios returned back below the 100% threshold after rising over 100% in 2020.

In spite of the volatility in its underwriting results, NEIL has generally recorded strong investment income. Net investment return has been mostly positive in each of the past five years. In 2022, NEIL reported a net investment income of USD 69 million, and reported net investment income of USD 105 million in 2023. Despite recent favorable results, historically NEIL's average performance ratios reflect more volatility than that of the composite. NEIL stock investments represent approximately 44% of its invested assets.

Operating Performance (Continued...)

Policyholder distributions are declared and paid at the discretion of the Board of Directors, reflecting favorable experience with respect to the insurance coverage provided to its Members, returns on its investment portfolio, and in light of capital and surplus requirements. Distributions have resulted in a significantly decreased net cost of insurance to its Members over the years.

Year End - December 31
**Operating and Financial Performance Ratios (%)
- Company**

	2022	2021	2020	2019	2018	Weighted Average
Calendar Year Loss and LAE Ratio	45.6	52.6	103.2	19.4	27.3	50.1
Expense and Policyholder Dividend Ratio	73.4	225.8	166.9	292.4	184.1	189.1
Combined Ratio	119.0	278.4	270.1	311.7	211.4	239.2
Reserve Development Ratio Impact	-11.6	-9.4	-13.4	-7.8	-8.8	-10.2
Net Investment Yield	1.5	2.2	1.5	2.2	2.4	1.9
Pre-Tax Operating Return on Net Earned Premiums	12.8	-99.9	-99.9	-99.9	-63.4	-99.4
Net Income Return on Policyholders' Surplus	-4.8	-4.6	-3.3	-1.4	-2.5	-3.3
Total Return on Policyholders' Surplus	-15.2	-0.6	-2.3	5.3	-9.5	-4.4

Source: BestLink® - Best's Financial Suite

Year End - December 31
**Operating and Financial Performance Ratios (%)
- Composite**

	2022	2021	2020	2019	2018	Weighted Average
Calendar Year Loss and LAE Ratio	57.6	58.1	66.8	59.1	71.9	59.0
Expense and Policyholder Dividend Ratio	32.3	36.1	36.4	40.3	40.7	34.8
Combined Ratio	90.0	94.2	103.1	99.4	112.6	93.7
Reserve Development Ratio Impact	-2.3	-4.0	-1.4	-3.8	-5.8	-2.3
Net Investment Yield	1.6	1.8	1.7	2.4	2.3	2.0
Pre-Tax Operating Return on Net Earned Premiums	13.7	10.1	1.5	6.5	-5.5	10.9
Net Income Return on Policyholders' Surplus	5.6	6.7	3.6	6.6	0.8	6.5
Total Return on Policyholders' Surplus	-1.5	10.4	6.1	11.8	-5.7	8.5

Source: BestLink® - Best's Financial Suite

Industry Composite: Commercial Property Composite - BestLink® - Best's Financial Suite

Business Profile

Nuclear Electric Insurance Limited (NEIL) is an industrial insured captive owned by electric power providers with a past or present interest in nuclear power generating facilities. As a service to its Members and as a means to prevent losses, the company pursues a comprehensive Loss Prevention program conducted by staff dedicated to that purpose. Furthermore, NEIL benefits from the extensive requirements, oversight and safety information sharing provided to nuclear plant operators by the Nuclear Regulatory Commission (NRC), the World Association of Nuclear Operators (WANO), and the Institute of Nuclear Power Operations (INPO). These include a requirement that every utility perform an Individual Plant Examination for each of its sites to assess the risk of a severe reactor accident at that particular plant using a generally recognized approach called a Probabilistic Risk Assessment. Due to the nature of the risks involved in this industry, the Member companies employ catastrophe mitigation efforts, including safety systems at each plant that are designed to withstand the effects of the maximum anticipated natural and man-made events, including earthquake, wind, flood, etc., without loss of capability to perform their safety functions. With regard to terrorist threats, NEIL's coverage is provided on a 12-month aggregate approach, which is capped at one full policy limit. Security features and procedures have received significant attention and enhancements at all the power facilities since the perception of these threats became more palpable.

NEIL insures nuclear power plants for property damage caused by an "accident" as that term is defined in its policies. It can also provide for the costs associated with certain interruptions of electric power generation through its Accidental Outage program, when such interruptions are due to accidental property damage to insured sites. Coverage can extend to decontamination expenses incurred at such sites arising from accidental nuclear contamination. NEIL provides coverage for other risks of direct physical loss at such sites, including certain premature decommissioning costs under the property programs. In 1999, the company expanded the opportunity for Membership to include the insurance of foreign nuclear sites. Foreign candidate facilities are very selectively considered for Membership after a comprehensive evaluation utilizing the same standards and criteria used to evaluate U.S. domestic plants.

In 2000, the company began providing certain conventional coverage to existing Members. With the 2021 launch of its wholly-owned subsidiary Cedar Hamilton Limited (CHL), NEIL intends to better meet its Members needs for conventional/specialty product and service offerings.

Business Profile (Continued...)

The company's goal is to provide cost-effective insurance, suitable capacity, and a good core engineering standard by which to gauge the risk exposure at insured plants. NEIL distributes a portion of its profits to its Members. NEIL currently provides property insurance coverage to all of the operating commercial nuclear power generating facilities in the United States, Belgium, and Spain.

Nuclear Electric Insurance Limited (NEIL) is owned by energy companies (the "Members"). NEIL is registered as an insurer under the Bermuda Insurance Act of 1978 and the Captive Insurance Companies Act of Delaware. In 1973, Nuclear Mutual Limited (NML) was formed as a mutual insurance company in Bermuda. NEIL was formed in 1980, and in 1997 NML and NEIL merged into one company. NEIL is headquartered in Wilmington, Delaware.

NEIL has four wholly owned subsidiaries that have different responsibilities. NEIL Services, Inc. is an engineering company that provides NEIL with loss prevention services and claims management. NEIL Overseas dac is the Dublin, Ireland domiciled company providing direct policies for international Member sites. In March 2014 NEIL organized a subsidiary in Delaware, NEIL Specialty Insurance Company (NSIC), which is licensed to conduct business as an industrial captive insurer. NSIC provides high excess non-nuclear property coverage. Cedar Hamilton is a newly formed subsidiary that is strategically important to NEIL in that it enables NEIL to meet its Members' evolving needs for more capacity to support their conventional risks with stable pricing, while also maintaining NEIL's long-standing, strong Member retention rates. NEIL has given explicit financial support to Cedar Hamilton in the form of an 80% intercompany quota share reinsurance agreement, along with a net worth maintenance agreement. Qualitative benefits to Cedar Hamilton from NEIL include an established underwriting framework and experience in CHL's lines of business, integration with NEIL's established ERM framework, and NEIL's experienced management team.

Premium Composition and Growth	Year End - December 31					5 Year CAGR
	2022	2021	2020	2019	2018	
Direct Premiums Written USD (000)	178,890	183,868	201,636	216,827	245,757	...
% Change	-2.7	-8.8	-7.0	-11.8	20.0	-2.7
Reinsurance Premiums Assumed USD (000)	115,445	144,576	124,744	85,310	69,878	...
% Change	-20.1	15.9	46.2	22.1	-9.2	8.4
Reinsurance Premiums Ceded USD (000)	39,674	43,768	53,570	49,478	53,472	...
% Change	-9.4	-18.3	8.3	-7.5	0.2	-5.8
Net Premiums Written USD (000)	254,661	284,676	272,810	252,660	262,163	...
% Change	-10.5	4.3	8.0	-3.6	14.8	2.2

Source: BestLink® - Best's Financial Suite

2022 By Line Business	Direct Premiums Written		Reinsurance Premiums Assumed		Reinsurance Premiums Ceded		Net Premiums Written		Business Retention
	USD (000)	%	USD (000)	%	USD (000)	%	USD (000)	%	%
Comm M.P.	178,890	100.0	91,319	79.1	39,674	100.0	230,535	90.5	85.3
Top 5	178,890	100.0	91,319	79.1	39,674	100.0	230,535	90.5	85.3
All Other	...	...	24,126	20.9	...	...	24,126	9.5	100.0
Total	178,890	100.0	115,445	100.0	39,674	100.0	254,661	100.0	86.5

Source: BestLink® - Best's Financial Suite

Geographic Breakdown by Direct Premiums Written USD (000)	Year End - December 31				
	2022	2021	2020	2019	2018
Delaware	178,890	183,868	201,636	216,827	245,757
Top 5 States	178,890	183,868	201,636	216,827	245,757
Total	178,890	183,868	201,636	216,827	245,757
Geographic Concentration Index	1.00	...	...	...	...

Source: BestLink® - Best's Financial Suite

Enterprise Risk Management

NEIL has an excellent risk management program in place, which is incorporated in the company's overall strategic framework. A risk management conscious environment is promoted throughout the company, with tenor established by management and the Board of Directors. The Directors are limited to serving for nine consecutive years (unless, in its discretion, the Board determines that for the

Enterprise Risk Management (Continued...)

good of the company a Director should be eligible to serve up to an additional two years) and must resign at age seventy-five or when leaving utility company employment. Notwithstanding this, the company has a number of independent Board members as well.

NEIL maintains effective risk oversight through the following: Board of Directors, Finance & Risk Committee, Audit Committee, Leadership Team, Emerging Risk Review Committee, Internal Audit (PwC), and Corporate Risk Management.

The following tasks are performed to ensure that NEIL is maintaining effective risk oversight: Adopt, approve, and oversee RM Framework; Manage the design, implementation, and execution of RM Framework; Evaluate systems/controls which mitigate, monitor, and manage risk exposures; Establish KRIs/KPIs; Evaluate RM and internal compliance within various risk verticals; Identify and evaluate emerging risk and develop a risk response; Cross-functional assessment to identify and prioritize risks across the organization.

NEIL manages climate risk through Enhanced Modeling, Stress Testing & Data, Capital & Exposure, and Risk Appetite Statements.

The NEIL Board implements ad-hoc committees when needed. An ad-hoc committee may be enacted when the internal enterprise risk dashboard approaches or exceeds the risk thresholds set by NEIL. Some results of NEIL's risk management efforts include establishing an Ad-Hoc Committee of the Board of Directors on Emerging Risks to review technical and operational challenges in the industry that may result in an increased risk exposure to the Mutual, improving communication with Members, sharing large project risk best practices, and performing periodic premium adequacy reviews, which take into account industry events and loss experience, in an effort to ensure appropriate collection of premium for the insured perils in the company's core nuclear programs.

Reinsurance Summary

In the normal course of business, the company seeks to reduce its exposure to losses that may arise by reinsuring certain levels of risk with other insurance enterprises or reinsurers. The maximum potential aggregate costs resulting from a full-limit loss include the coverage on a nuclear contamination accident and the associated business interruption claims. Reinsurance secured for the property program is for a three-year term expiring April 2025. It provides reinsurance coverage of \$1.45 billion excess of \$750 million for nuclear events and \$1.5 billion excess of \$750 million for non-nuclear events. Large participants in the ceded reinsurance program include American Nuclear Insurers, Japan Atomic Energy Insurance Pool, XL Reinsurance, various Lloyd's syndicates, Munich Re, Korean Atomic Energy Insurance Pool (KAEIP), Swiss Pool for the Insurance of Nuclear Risks, and Hannover Re. NEIL's internal policy guidelines limit participation of any one reinsurer to a maximum 10% share. In 2021, NEIL added a separate annual reinsurance contract covering its conventional, (non-nuclear) property business for part of \$75 million excess of \$50 million.

Net ceded reinsurance premiums account for 16.5% of net premiums earned in 2023. This low-cost level is due to the very high limits retained by NEIL and the low probability of an occurrence breaching the retained layer. Ceded premiums earned for 2023 were USD 47.5 million.

Environmental, Social & Governance

NEIL plays a vital role in supporting its members' progress towards, safe, clean, reliable, and affordable energy. As the world looks for opportunities to decarbonize the energy industry, nuclear, at the core of NEIL's business, is expected to play a vital role in that process. NEIL is integral to its member companies risk management framework and is embedded in the risk management process of member companies, working to ensure that nuclear energy is a safe alternative to carbon energy sources.

Financial Statements

	Year End - December 31			
	2022		2021	
Balance Sheet	USD (000)	%	USD (000)	%
Cash and Short Term Investments	129,641	2.8	542,782	9.6
Bonds	946,463	20.7	1,165,762	20.5
Preferred and Common Stock	2,382,911	52.2	2,885,492	50.9
Other Invested Assets	921,089	20.2	895,345	15.8
Total Cash and Invested Assets	4,380,104	95.9	5,489,381	96.8
Premium Balances	50,103	1.1	43,427	0.8
Other Assets	136,528	3.0	140,414	2.5
Total Assets	4,566,735	100.0	5,673,222	100.0
Loss and Loss Adjustment Expense Reserves:				
Net Reported Loss Reserves	224,047	4.9	261,540	4.6
Net IBNR Loss Reserves	168,831	3.7	152,135	2.7
Net LAE Reserves	18	...	9	...
Total Net Loss and LAE Reserves	392,896	8.6	413,684	7.3
Net Unearned Premiums	97,514	2.1	95,674	1.7
Other Liabilities	312,518	6.8	988,261	17.4
Total Liabilities	802,928	17.6	1,497,619	26.4
Paid-In and Contributed Surplus	250	...	250	...
Unassigned Surplus	3,763,557	82.4	4,175,353	73.6
Total Policyholders' Surplus	3,763,807	82.4	4,175,603	73.6
Total Liabilities and Surplus	4,566,735	100.0	5,673,222	100.0

Source: BestLink® - Best's Financial Suite

	Year End - December 31	
	2022	2021
Income Statement USD (000)		
Net Premiums Earned	252,820	284,782
Net Losses and LAE Incurred:		
Current Accident Year	144,678	176,660
Prior Accident Years	-29,442	-26,840
Underwriting Expenses Incurred	35,770	42,893
Dividends to Policyholders	150,000	600,000
Net Underwriting Income	-48,185	-507,931
Net Investment Income	73,873	119,361
Other Income (Expense)	6,696	3,965
Pre-Tax Operating Income	32,383	-384,605
Income Taxes Incurred	...	26,160
Net Operating Income	32,383	-410,764
Net Realized Capital Gains (Losses)	-222,101	216,263
Net Income	-189,717	-194,501

Source: BestLink® - Best's Financial Suite

Year End - December 31

Statement of Operating Cash Flows USD (000)	2022	2021
Net Premiums Collected	237,918	259,709
Net Losses Paid	133,599	124,159
Expenses Paid	50,808	42,843
Dividends to Policyholders	600,000	400,000
Net Underwriting Cash Flow	-546,489	-307,292
Net Investment Income	75,684	129,294
Other Income (Expense)	6,696	3,965
Income Taxes Paid (Recovered)	-10,388	...
Net Operating Cash Flow	-453,721	-174,033

Source: BestLink® - Best's Financial Suite

Last Update

May 15, 2024

Identifiers**AMB #:** 011284**NAIC #:** 34215**FEIN #:** 98-0066503**LEI #:** P26NU0MZ1L5NIYDGI317**Contact Information**Domiciliary Address:One Righter Parkway, Suite 210,
Wilmington, Delaware 19803
United States**Web:** www.myneil.com**Phone:** +1-302-888-3000**Fax:** +1-302-426-2179**Financial Data Presented**

The financial data in this report reflects the most current data available at the time the report was printed.

Nuclear Electric Insurance Limited

Operations

Date Incorporated: July 04, 1978 | **Date Commenced:** September 15, 1980**Domiciled:** Delaware, United States**Licensed:** (Current since 12/04/2001). The company is licensed in Delaware.**Business Type:** Property/Casualty**Organization Type:** Mutual**Marketing Type:** Direct Response**Best's Financial Size Category:** XV (Greater than or Equal to USD 2.00 Billion)

Best's Credit Ratings

Rating Relationship**AM Best Rating Unit:** [011284 - Nuclear Electric Insurance Limited](#)**Best's Credit Rating Effective Date:** May 15, 2024

Refer to the [Best's Credit Report for AMB# 011284 - Nuclear Electric Insurance Limited](#) for details regarding the rating rationale, credit analysis, and financial exhibits available at the time the credit analysis was performed.

AMB#	Rating Unit Members	Best's Credit Ratings	
		Financial Strength Rating	Long-Term Issuer Credit Rating
074633	Cedar Hamilton Limited	A	a+
089012	NEIL Overseas DAC	A	a+

Best's Credit Rating History

AM Best has assigned ratings on this company since 1995. In our opinion, the company has an Excellent ability to meet their ongoing insurance obligations and an Excellent ability to meet their ongoing senior financial obligations.

The following are the most recent rating events, for longer history refer to [Rating History](#) in BestLink:

Best's Financial Strength Ratings				Best's Long-Term Issuer Credit Ratings		
Effective Date	Rating	Outlook	Action	Rating	Outlook	Action
Current -						
May 15, 2024	A	Stable	Affirmed	a+	Stable	Affirmed
May 4, 2023	A	Stable	Affirmed	a+	Stable	Affirmed
Apr 21, 2022	A	Stable	Affirmed	a+	Stable	Affirmed
Mar 30, 2021	A	Stable	Affirmed	a+	Stable	Affirmed
Mar 2, 2020	A	Stable	Affirmed	a+	Stable	Affirmed

Corporate Structure

Ultimate Parent: AMB #011284 - Nuclear Electric Insurance Limited

Based on AM Best's analysis, AMB# 011284 Nuclear Electric Insurance Limited is the AMB Ultimate Parent and identifies the topmost entity of the corporate structure. Access in BestLink this company's current [Corporate Structure](#).

Overview

Nuclear Electric Insurance Limited (NEIL) is an industrial insured captive owned by electric power providers with a past or present interest in nuclear power generating facilities. As a service to its Members and as a means to prevent losses, the company pursues a comprehensive Loss Prevention program conducted by staff dedicated to that purpose. Furthermore, NEIL benefits from the extensive requirements and safety information sharing provided to nuclear plant operators by the Nuclear Regulatory Commission (NRC), the World Association of Nuclear Operators (WANO), and the Institute of Nuclear Power Operations (INPO). These include a requirement that every utility perform an Individual Plant Examination for each of its sites to assess the risk of a severe reactor accident at that particular plant using a generally recognized approach called a Probabilistic Risk Assessment. Due to the nature of the risks involved in this industry, the Member companies employ catastrophe mitigation efforts, including safety systems at each plant that are designed to withstand the effects of the maximum anticipated natural and man-made events, including earthquake, wind, flood, etc., without loss of capability to perform their safety functions. With regard to terrorist threats, NEIL's coverage is provided on a 12-month aggregate approach. Security features and procedures have received significant attention at all the power facilities since the perception of these threats became more palpable.

NEIL insures nuclear power plants for property damage caused by an "accident" as that term is defined in its policies. It can also provide for the costs associated with certain interruptions of electric power generation through its Accidental Outage program, when such interruptions are due to accidental property damage to insured sites. Coverage can extend to decontamination expenses incurred at such sites arising from accidental nuclear contamination. NEIL provides coverage for other risks of direct physical loss at such sites, including certain premature decommissioning costs under the property programs. Effective January 1, 1999, the company expanded the opportunity for Membership to include the insurance of foreign nuclear sites. Foreign candidate facilities are very selectively considered for Membership after a comprehensive evaluation utilizing the same standards and criteria used to evaluate U.S. domestic plants. In 2000, the company began providing certain non-nuclear coverage to existing Members. This is provided on a quota-share basis, in conformity with the conventional programs and following the terms and conditions of the program's lead underwriter. Participation in any program is subject to minimum acceptance criteria.

The company's goal is to provide cost-effective insurance, suitable capacity, and a good core engineering standard by which to gauge the risk exposure at insured plants. NEIL distributes a portion of its profits to its Members. NEIL currently provides property insurance coverage to all of the operating commercial nuclear power generating facilities in the United States, Belgium, and Spain.

Management

As a mutual insurer, ownership of the company is held by its Members. The Members of the company are United States energy companies, one Belgian company and five Spanish companies. Each of the Members has, or had, an insurable interest in one or more nuclear generating units.

In addition to being owned by the nuclear industry, the company involves staff from its Member companies in the overall operation and management of the company. The Board of Directors is comprised largely of senior executives from its Member companies. The listing below reflects the Board of Directors as of April 1, 2021. An Engineering Advisory Committee, Legal Advisory Committee, and Insurance Advisory Committee, all with Member representatives, provide additional guidance for the Board of Directors.

The company has an agreement with its wholly owned subsidiary, NEIL Services, Inc., whereby NEIL Services provides claims handling services and performs loss prevention evaluations of nuclear power plants on the company's behalf. Such reviews serve a dual purpose; they are a prime loss-prevention vehicle, and they assist the company in determining premium rates.

Officers

President and CEO: Bruce A. Sassi

SVP and CFO: Anna Arena

SVP, Secretary and General Counsel: Kenneth C. Manne (Corporate Services)

Vice President and Chief Investment Officer: Gregory J. Blackburn

Vice President and Chief Underwriting Officer: Robert Curtis

Vice President: Shawn Galbraith (Claims)

Vice President: R. Benjamin Mays (Loss Control)

Directors

Nicholas K. Akins (Vice Chairman)
 W. Paul Bowers (Chairman)
 Terri J. Dalenta (Independent Director)
 William J. Fehrman
 Ralph Izzo
 Dhiaa M. Jamil
 Paul D. Koonce
 Jeanne L. Mockard (Independent Director)
 Robert P. Restrepo, Jr. (Independent Director)
 Bruce A. Sassi
 Patricia K. Vincent-Collawn
 William A. Von Hoene, Jr.

History

NEIL is incorporated under the laws of Bermuda, has its place of business in Wilmington, Delaware, and is a registered insurer under the Bermuda Insurance Act of 1978 and the Captive Insurance Companies Act of Delaware. NEIL traces its roots to the formation of Nuclear Mutual Limited (NML) in Bermuda.

NML, incorporated under the laws of Bermuda in 1971, was formed by a group of U.S. electric utilities as an alternative to the commercial nuclear market. NML commenced business in 1973. NEIL was formed in 1980 in response to the Three Mile Island accident. In 1988, the company elected to seek on-shore status. As a result, NEIL was licensed on November 9, 1988, as an industrial captive by the Delaware Insurance Department.

On December 31, 1997, NML was merged into NEIL.

The merged entity now provides its Members with long-term self-determination in insurance matters affecting their nuclear plants. NEIL's primary goal is to maintain a financial position to cover two full-limit losses, as well as to ensure continuing coverage of nuclear sites. Other important goals include optimizing net insurance costs, maximizing investment income, and fairly compensating the Members for their premium contributions.

In late 1998, NEIL expanded its operations to insure approved overseas nuclear power plants and formed NEIL Overseas dac in Ireland to provide insurance to countries outside of the U.S. NEIL Overseas dac commenced operations on January 1, 1999.

In March 2014, NEIL organized a subsidiary in Delaware, NSIC, which is licensed to conduct business as an industrial captive insurer.

In September 2020, NEIL organized a subsidiary in Bermuda, Cedar Hamilton Limited. It was licensed in Bermuda as a Class 3 Insurer in December 2020.

Corporate Changes

Date	Event Type	Company Name	Current Company Name	Corporate Changes Text
01/10/1980	Name Change	Energy Mutual Liability, Limited	Nuclear Electric Insurance Limited	This company changed its name to Nuclear Electric Insurance Limited on January 10, 1980.

Search for this company in [Corporate Changes](#) in BestLink to review previous changes.

Regulatory

The annual statement of actuarial opinion is provided by Willis Towers Watson.

Financial Results

Financial exhibits presented in this report provide calculated ratios using the most recent company-filed statements available in BestLink - Best's Statement File – P/C, US. Access [Quantitative Analytical Report \(QAR\) Annual](#)

Currency: US Dollars

Balance Sheet Highlights

	Year End - December 31				
Ceded Reinsurance Analysis	2022	2021	2020	2019	2018
Nuclear Electric Insurance Limited					
Ceded Reinsurance USD (000)	58,076	65,238	70,157	66,244	71,072
Business Retention (%)	86.5	86.7	83.6	83.6	83.1
Reinsurance Recoverables to PHS (%)	0.5	0.5	0.4	0.4	0.4
Ceded Reinsurance to PHS (%)	1.5	1.6	1.7	1.5	1.7
Commercial Property Composite					
Business Retention (%)	40.1	43.2	44.8	47.1	43.7
Reinsurance Recoverables to PHS (%)	61.4	46.2	42.7	39.2	42.9
Ceded Reinsurance to PHS (%)	108.5	81.2	76.2	69.0	78.0

Source: BestLink® - Best's Financial Suite

	Paid & Unpaid Losses	Incurred but not reported (IBNR) losses	Unearned premiums	Other Recoverables	Total Reinsurance Recoverables
2022 Reinsurance Recoverables USD (000)					
US Insurers	4,185	...	374	...	4,559
Pools/Associations	2,657	...	591	...	3,248
Other Non-US	1,327	...	9,268	...	10,595
Total (excluding US Affiliates)	8,169	...	10,233	...	18,402
Grand Total	8,169	...	10,233	...	18,402

Source: BestLink® - Best's Financial Suite

Asset Liability Management | Investments

	Year End - December 31				
	2022	2021	2020	2019	2018
Bond Portfolio					
Bonds & Short Term Investments USD(000)	980,022	1,530,567	1,722,850	2,102,867	1,671,291
By Issuer (%)					
Unaffiliated Bonds:					
US Government	28.8	27.9	25.3	28.3	27.6
Foreign Government	0.9	4.5	3.1	3.1	3.7
Foreign - All other	11.3	11.1	11.9	10.0	10.5
State, Municipal & Special Revenue	15.1	13.7	13.7	13.5	13.9
Industrial and Misc, Hybrid and SVO Identified	44.0	42.8	46.1	45.2	44.4
Bonds and Short Term Investments By Private vs Public (%)					
Private issues	13.2	9.9	9.1	6.4	9.9
Public issues	86.8	90.1	90.9	93.6	90.1
Bonds and Short Term Investments By Quality (%)					
Class 1	79.1	82.0	78.5	85.9	81.3
Class 2	19.9	16.6	18.5	13.4	18.1
Class 3	0.9	1.2	2.7	0.6	0.6
Class 4	0.1	0.1	0.2	...	...
Class 6	0.1	...	...	...	...
Below Investment Grade (NAIC 3-6)	1.1	1.4	3.0	0.6	0.7
Below Investment Grade - % of Policyholders' Surplus	0.3	0.5	1.2	0.3	0.3

Source: BestLink® - Best's Financial Suite

Balance Sheet Highlights

Asset Liability Management | Investments (Continued...)

	Year End - December 31				
	2022	2021	2020	2019	2018
Stock Portfolio					
Stocks USD(000)	2,382,911	2,885,492	2,625,400	2,389,119	2,348,743
By Type (%)					
Unaffiliated Common	83.0	86.7	85.7	93.2	93.8
Affiliated Common	16.7	13.1	14.3	6.8	6.2
Unaffiliated Preferred	0.3	0.2	...	0.1	...

Source: BestLink® - Best's Financial Suite

Operating Performance Highlights

	Year End - December 31				
	2022	2021	2020	2019	2018
Operating and Financial Performance Ratios (%)					
					Weighted Average
Commercial Property Composite					
Calendar Year Loss and LAE Ratio	57.5	58.0	66.8	59.0	71.9
Expense and Policyholder Dividend Ratio	32.3	36.1	36.4	40.3	40.7
Combined Ratio	89.8	94.1	103.2	99.4	112.6
Reserve Development Ratio Impact	-2.3	-4.1	-1.4	-3.8	-5.8
Net Investment Yield	1.6	1.8	1.7	2.4	2.3
Pre-Tax Operating Return on Net Earned Premiums	13.9	10.2	1.5	6.6	-5.5
Net Income Return on Policyholders' Surplus	5.7	6.8	3.6	6.6	0.8
Total Return on Policyholders' Surplus	-1.4	10.4	6.1	11.8	-5.7

Source: BestLink® - Best's Financial Suite

	Year End - December 31				
	2022	2021	2020	2019	2018
By Line - Net Loss Ratio (%)					
Comm M.P.	50.6	39.2	87.0	12.8	31.8
Rein-NPA Liab	-51.0	108.1	111.1	73.2	-2.7
Rein-NPA Prop	655.4	58.9	241.3	-0.4	-10.0
Total	44.6	52.0	102.6	18.7	26.5

Source: BestLink® - Best's Financial Suite

	Year End - December 31				
	2022	2021	2020	2019	2018
Geographic - Direct Loss Ratio (%)					
Delaware	-0.4	33.8	78.7	-4.5	13.9
Total	-0.4	33.8	78.7	-4.5	13.9

Source: BestLink® - Best's Financial Suite

Business Profile Highlights

Historical Market Presence

	Year End - December 31				
	2022	2021	2020	2019	2018
By Line Breakdown - NPW USD (000)					
Comm M.P.	230,535	233,994	213,118	209,269	226,860
Rein-NPA Liab	22,657	44,607	35,206	29,767	23,563
Rein-NPA Prop	1,469	6,075	24,486	13,624	11,740
Total	254,661	284,676	272,810	252,660	262,163

Source: BestLink® - Best's Financial Suite

Business Profile Highlights

Historical Market Presence (Continued...)

	Year End - December 31		
	2022	2021	2020
By Line Reserves USD (000)			
Comm M.P.	269,240	269,691	293,223
Rein-NPA Liab	81,119	112,620	62,103
Rein-NPA Prop	42,537	31,373	34,435
Total	392,896	413,684	389,761

Source: BestLink® - Best's Financial Suite

A Best's Financial Strength Rating opinion addresses the relative ability of an insurer to meet its ongoing insurance obligations. The ratings are not assigned to specific insurance policies or contracts and do not address any other risk, including, but not limited to, an insurer's claims-payment policies or procedures; the ability of the insurer to dispute or deny claims payment on grounds of misrepresentation or fraud; or any specific liability contractually borne by the policy or contract holder. A Financial Strength Rating is not a recommendation to purchase, hold or terminate any insurance policy, contract or any other financial obligation issued by an insurer, nor does it address the suitability of any particular policy or contract for a specific purpose or purchaser.

A Best's Issue/Issuer Credit Rating is an opinion regarding the relative future credit risk of an entity, a credit commitment or a debt or debt-like security.

Credit risk is the risk that an entity may not meet its contractual, financial obligations as they come due. These credit ratings do not address any other risk, including but not limited to liquidity risk, market value risk or price volatility of rated securities. The rating is not a recommendation to buy, sell or hold any securities, insurance policies, contracts or any other financial obligations, nor does it address the suitability of any particular financial obligation for a specific purpose or purchaser.

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