Janus Hendersor

Janus Henderson Overseas Portfolio

Ticker: N/A Service Shares

SUMMARY PROSPECTUS DATED APRIL 28, 2023

Before you invest, you may want to review the Portfolio's Prospectus, which contains more information about the Portfolio and its risks. You can find the Portfolio's Prospectus, reports to shareholders, and other information about the Portfolio online at janushenderson.com/VIT. You can also get this information at no cost by calling a Janus Henderson representative at 1-877-335-2687 or by sending an email request to prospectusrequest@janushenderson.com.

INVESTMENT OBJECTIVE

Janus Henderson Overseas Portfolio ("Overseas Portfolio") seeks long-term growth of capital.

FEES AND EXPENSES OF THE PORTFOLIO

This table describes the fees and expenses that you may pay if you buy, hold, and sell Shares of the Portfolio. Owners of variable insurance contracts that invest in the Shares should refer to the variable insurance contract prospectus for a description of fees and expenses, as the following table and examples do not reflect deductions at the separate account level or contract level for any charges that may be incurred under a contract. Inclusion of these charges would increase the fees and expenses described below.

ANNUAL FUND OPERATING EXPENSES

(expenses that you pay each year as a percentage of the value of your investment)

Management Fees ⁽¹⁾	0.79%
Distribution/Service (12b-1) Fees	0.25%
Other Expenses	0.10%
Total Annual Fund Operating Expenses	1.14%

(1) This fee may adjust up or down monthly based on the Portfolio's performance relative to its benchmark index over the performance measurement period. For more information regarding performance-based advisory fees, refer to "Management Expenses" in the Portfolio's Prospectus.

EXAMPLE:

The Example is intended to help you compare the cost of investing in the Portfolio with the cost of investing in other mutual funds. The Example assumes that you invest \$10,000 in the Portfolio for the time periods indicated, reinvest all dividends and distributions, and then redeem all of your Shares at the end of each period. The Example also assumes that your investment has a 5% return each year and that the Portfolio's operating expenses remain the same. Although your actual costs may be higher or lower, based on these assumptions your costs would be:

	1 Year	3 Years	5 Years	10 Years
Service Shares	\$ 116	\$ 362	\$ 628	\$ 1,386

Portfolio Turnover: The Portfolio pays transaction costs, such as commissions, when it buys and sells securities (or "turns over" its portfolio). A higher portfolio turnover rate may indicate higher transaction costs. These costs, which are not reflected in annual fund operating expenses or in the Example, affect the Portfolio's performance. During the most recent fiscal year, the Portfolio's turnover rate was 36% of the average value of its portfolio.

PRINCIPAL INVESTMENT STRATEGIES

The Portfolio pursues its investment objective by investing, under normal circumstances, at least 80% of its net assets (plus any borrowings for investment purposes) in securities of issuers or companies from countries outside of the United States. The Portfolio normally invests in a portfolio of 30-50 securities of issuers from several different countries, excluding the United States, and it may, under unusual circumstances, invest all or substantially all of its assets in a single country. The Portfolio may invest up to 20% of its net assets, measured at the time of purchase, in U.S. issuers. An issuer is deemed to be from a country or countries outside of the United States if one or more of the following tests are met: (i) the issuer is organized in, or its primary business office or principal trading market of its equity is located in, a country outside of the United States. The Portfolio may also invest in Chinese companies listed on U.S. and other exchanges structured as variable interest entities. The Portfolio may have significant exposure to emerging markets. The

Portfolio typically invests in equity securities (such as stocks or any other security representing an ownership interest) in all market capitalizations.

Portfolio management applies a "bottom-up" approach in choosing investments. In other words, portfolio management looks at companies one at a time to determine if a company is an attractive investment opportunity and if it is consistent with the Portfolio's investment policies. Portfolio management will generally consider selling a security when, among other things, the security no longer reflects portfolio management's investment thesis, the security approaches or exceeds its targeted value, there has been a change in a security's risk/reward potential, or a better idea is identified.

The Portfolio may invest in equity and debt securities of real estate-related companies. Such companies may include those in the real estate industry or real estate-related industries. These securities may include common stocks, preferred stocks, and other securities, including, but not limited to, real estate-backed securities, securities of real estate investment trusts ("REITs") and similar REIT-like entities.

The Portfolio may take long or short positions in derivatives, which are instruments that have a value derived from, or directly linked to, an underlying asset, such as equity securities, commodities, currencies, interest rates, or market indices. For purposes of meeting its 80% investment policy, the Portfolio may include derivatives that have characteristics similar to the securities in which the Portfolio may directly invest. The types of derivatives in which the Portfolio may invest include options, futures, swaps, warrants, and forward currency contracts. The Portfolio may use derivatives to hedge, to earn income or enhance returns, as a substitute for securities in which the Portfolio invests, to increase or decrease the Portfolio's exposure to a particular market, to adjust the Portfolio's currency exposure relative to its benchmark index, to gain access to foreign markets where direct investment may be restricted or unavailable, or to manage the Portfolio's risk profile.

The Portfolio may seek to earn additional income through lending its securities to certain qualified broker-dealers and institutions on a short-term or long-term basis, in an amount equal to up to one-third of its total assets as determined at the time of the loan origination.

PRINCIPAL INVESTMENT RISKS

The biggest risk is that the Portfolio's returns will vary, and you could lose money. The Portfolio is designed for long-term investors seeking an international equity portfolio, including common stocks. Common stocks tend to be more volatile than many other investment choices. The principal risks associated with investing in the Portfolio are set forth below.

Market Risk. The value of the Portfolio's holdings may decrease due to short-term market movements and over more prolonged market downturns. As a result, the Portfolio's net asset value may fluctuate and it may be more difficult to value or sell the Portfolio's holdings. Market risk may affect a single issuer, industry, economic sector, or the market as a whole. Market risk may be magnified if certain social, political, economic, and other conditions and events (such as terrorism, conflicts, including related sanctions, social unrest, natural disasters, epidemics and pandemics, including COVID-19) adversely interrupt the global economy and financial markets. It is important to understand that the value of your investment may fall, sometimes sharply, in response to changes in the market, and you could lose money.

Foreign Exposure Risk. Foreign markets, including emerging markets, can be more volatile than the U.S. market. As a result, the Portfolio's returns and net asset value may be affected by fluctuations in currency exchange rates or political or economic conditions in a particular country. In some foreign markets, there may not be protection against failure by other parties to complete transactions. It may not be possible for the Portfolio to repatriate capital, dividends, interest, and other income from a particular country or governmental entity. In addition, a market swing in one or more countries or regions where the Portfolio has invested a significant amount of its assets may have a greater effect on the Portfolio's performance than it would in a more geographically diversified portfolio. The Portfolio's investments in emerging market countries, if any, may involve risks greater than, or in addition to, the risks of investing in more developed countries.

Emerging Markets Risk. Emerging market securities involve a number of risks, which may result from less government supervision and regulation of business and industry practices (including the potential lack of strict finance and accounting controls and standards), stock exchanges, brokers, and listed companies. Information about emerging market companies, including financial information, may be less available or reliable and the Adviser's ability to conduct due diligence with respect to such companies may be limited. Accordingly, these investments may be potentially more volatile in price and less liquid than investments in developed securities markets, resulting in greater risk to investors. There is a risk in developing countries that a current or future economic or political crisis could lead to price controls, forced mergers of companies,

expropriation or confiscatory taxation, imposition or enforcement of foreign ownership limits, seizure, nationalization, sanctions or imposition of restrictions by various governmental entities on investment and trading, or creation of government monopolies, any of which may have a detrimental effect on the Portfolio's investments. In addition, the taxation systems at the federal, regional, and local levels in developing or emerging market countries may be less transparent, inconsistently enforced, and subject to change. Emerging markets may be subject to a higher degree of corruption and fraud than developed markets, and financial institutions and transaction counterparties may have less financial sophistication, creditworthiness, and/or resources than participants in developed markets. In addition, the Portfolio's investments may be denominated in foreign currencies and therefore, changes in the value of a country's currency compared to the U.S. dollar may affect the value of the Portfolio's investments. To the extent that the Portfolio invests a significant portion of its assets in the securities of emerging markets issuers in or companies of a single country or region, it is more likely to be impacted by events or conditions affecting that country or region, which could have a negative impact on the Portfolio's performance. Additionally, foreign and emerging market risks, including but not limited to price controls, expropriation or confiscatory taxation, imposition or enforcement of foreign ownership limits, nationalization, and restrictions on repatriation of assets may be heightened to the extent the Portfolio invests in Chinese local market securities. Foreign and emerging market risks may also be heightened to the extent the Portfolio has exposure to Chinese issuers through variable interest entities, which subjects the Portfolio to the risks associated with the underlying Chinese issuer or operating company.

Industry and Sector Risk. Although the Portfolio does not concentrate its investments in specific sectors, it may have a significant portion of its assets invested in securities of companies conducting similar business or business within the same economic sector. Companies in the same industry or economic sector may be similarly affected by economic or market events, making the Portfolio more vulnerable to unfavorable developments than portfolios that invest more broadly. As the Portfolio's holdings become more concentrated, the Portfolio is less able to spread risk and potentially reduce the risk of loss and volatility. In addition, the Portfolio may be overweight or underweight in certain industries or sectors relative to its benchmark index, which may cause the Portfolio's performance to be more or less sensitive to developments affecting those sectors.

Portfolio Management Risk. The Portfolio is an actively managed investment portfolio and is therefore subject to the risk that the investment strategies and research process employed for the Portfolio may fail to produce the intended results. The Portfolio may underperform its benchmark index or other mutual funds with similar investment objectives.

Issuer Concentration Risk. The Portfolio's holdings may be comprised of a relatively small number of issuers in comparison to other funds. As a result, the Portfolio may be subject to greater risks than a portfolio that invests in a greater number of issuers. A change in the value of any single investment held by the Portfolio may affect the overall value of the Portfolio more than it would affect a portfolio that holds more investments. In particular, the Portfolio may be more susceptible to adverse developments affecting any single issuer held by the Portfolio and may be susceptible to greater losses because of these developments.

Geographic Concentration Risk. To the extent the Portfolio invests a substantial amount of its assets in issuers located in a single country or region, the economic, political, social, regulatory, or other developments or conditions within such country or region will generally have a greater effect on the Portfolio than they would on a more geographically diversified portfolio, which may result in greater losses and volatility. Adverse developments in certain regions could also adversely affect securities of other countries whose economies appear to be unrelated and could have a negative impact on the Portfolio's performance.

• *Europe and United Kingdom Risk.* The Portfolio is subject to certain risks related to Europe and the United Kingdom. Investments in British companies may subject the Portfolio to social, regulatory, political, currency, security, and economic risk specific to the United Kingdom. The United Kingdom has one of the largest economies in Europe, and the United States and other European countries are substantial trading partners of the United Kingdom. As a result, the British economy may be impacted by changes to the economic health of the United States and other European countries. Western Europe has, in certain instances, been susceptible to serious financial hardship, high debt levels, and high levels of unemployment. The European Union itself has experienced difficulties in connection with the debt loads of some of its member states. The markets in Eastern Europe remain relatively undeveloped and can be particularly sensitive to political and economic developments.

Small- and Mid-Sized Companies Risk. Investments in securities issued by small- and mid-sized companies, which can include smaller, start-up companies offering emerging products or services, may involve greater risks than are customarily associated with larger, more established companies. For example, while small- and mid-sized companies may realize more

substantial growth than larger or more established issuers, they may also suffer more significant losses as a result of their narrow product lines, limited operating history, greater exposure to competitive threats, limited financial resources, limited trading markets, and the potential lack of management depth. Securities issued by small- and mid-sized companies tend to be more volatile and somewhat more speculative than securities issued by larger or more established companies and may underperform as compared to the securities of larger or more established companies. These holdings are also subject to wider price fluctuations and tend to be less liquid than stocks of larger or more established companies, which could have a significant adverse effect on the Portfolio's returns, especially as market conditions change.

Growth Securities Risk. Securities of companies perceived to be "growth" companies may be more volatile than other stocks and may involve special risks. If portfolio management's perception of a company's growth potential is not realized, the securities purchased may not perform as expected, reducing the Portfolio's returns. In addition, because different types of stocks tend to shift in and out of favor depending on market and economic conditions, "growth" stocks may perform differently from other types of securities and the market as a whole.

Value Investing Risk. Because different types of stocks tend to shift in and out of favor depending on market and economic conditions, "value" stocks may perform differently than other types of stocks and from the market as a whole, and can continue to be undervalued by the market for long periods of time. It is also possible that a value stock will never appreciate to the extent expected by portfolio management.

Derivatives Risk. Derivatives can be volatile and involve risks in addition to the risks of the underlying referenced securities or asset. Gains or losses from a derivative investment can be substantially greater than the derivative's original cost and can therefore involve leverage. Leverage may cause the Portfolio to be more volatile than if it had not used leverage. Derivatives entail the risk that the counterparty will default on its payment obligations. Derivatives used for hedging purposes may reduce or eliminate gains or cause losses if the market moves in a manner different from that anticipated by portfolio management or if the cost of the derivative outweighs the benefit of the hedge.

Liquidity Risk. The Portfolio may invest in securities or instruments that do not trade actively or in large volumes, and may make investments that are less liquid than other investments. Also, the Portfolio may make investments that may become less liquid in response to market developments or adverse investor perceptions. Investments that are illiquid or that trade in lower volumes may be more difficult to value. When there is no willing buyer and investments cannot be readily sold at the desired time or price, the Portfolio may have to accept a lower price or may not be able to sell the security or instrument at all. Investments in foreign securities, particularly those of issuers located in emerging market countries, tend to have greater exposure to liquidity risk than domestic securities. In unusual market conditions, even normally liquid securities may be affected by a degree of liquidity risk (i.e., if the number and capacity of traditional market participants is reduced). An inability to sell one or more portfolio positions can adversely affect the Portfolio's value or prevent the Portfolio from being able to take advantage of other investment opportunities.

Securities Lending Risk. There is the risk that when portfolio securities are lent, the securities may not be returned on a timely basis, and the Portfolio may experience delays and costs in recovering the security or gaining access to the collateral provided to the Portfolio to collateralize the loan. If the Portfolio is unable to recover a security on loan, the Portfolio may use the collateral to purchase replacement securities in the market. There is a risk that the value of the collateral could decrease below the cost of the replacement security by the time the replacement investment is made, resulting in a loss to the Portfolio.

REIT Risk. REITs are subject to certain risks inherent in the direct ownership of real estate, including without limitation, a possible lack of mortgage funds and associated interest rate risks, overbuilding, property vacancies, increases in property taxes and operating expenses, changes in zoning laws, losses due to environmental damages and changes in neighborhood values and appeal to purchasers. In addition, a REIT could fail to qualify for tax-free pass-through of its income under the Internal Revenue Code of 1986, as amended, or fail to maintain its exemption from registration under the Investment Company Act of 1940, as amended, which could produce adverse economic consequences for the REIT and its investors, including the Portfolio. Dividends received by the Portfolio from a REIT generally will not constitute qualified dividend income.

Currency Risk. Currency risk is the risk that changes in the exchange rate between currencies will adversely affect the value (in U.S. dollar terms) of an investment. As long as the Portfolio holds a foreign security, its value will be affected by the value of the local currency relative to the U.S. dollar. When the Portfolio sells a foreign currency denominated security, its value may be worth less in U.S. dollars even if the security increases in value in its home country. U.S. dollar-denominated

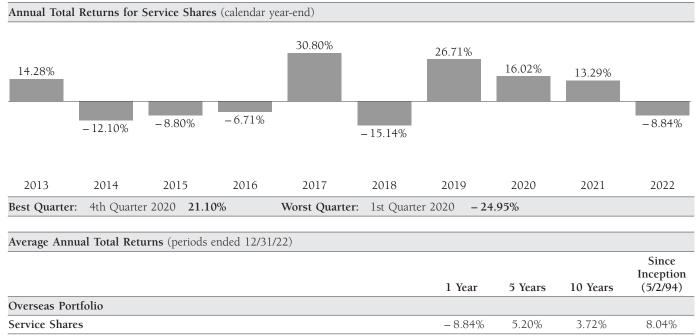
securities of foreign issuers may also be affected by currency risk, as the value of these securities may also be affected by changes in the issuer's local currency.

An investment in the Portfolio is not a bank deposit and is not insured or guaranteed by the Federal Deposit Insurance Corporation or any other government agency.

PERFORMANCE INFORMATION

The following information provides some indication of the risks of investing in the Portfolio by showing how the Portfolio's performance has varied over time. The Portfolio's Service Shares commenced operations on December 31, 1999. The returns shown for the Service Shares for periods prior to December 31, 1999 reflect the historical performance of a different class of shares (the Institutional Shares), restated based on the Service Shares' estimated fees and expenses (ignoring any fee and expense limitations). The bar chart depicts the change in performance from year to year during the periods indicated, but does not include charges or expenses attributable to any insurance product, which would lower the performance illustrated. Total return figures include the effect of the Portfolio's expenses. The table compares the average annual returns for the Service Shares of the Portfolio for the periods indicated to a broad-based securities market index. All figures assume reinvestment of dividends and distributions.

The Portfolio's past performance does not necessarily indicate how it will perform in the future. Updated performance information is available at janushenderson.com/VITperformance or by calling 1-877-335-2687.



MSCI All Country World ex-USA Index[™] (reflects no deduction for fees, expenses, or taxes, except foreign withholding taxes)

The Portfolio's primary benchmark index is the MSCI All Country World ex-USA Index. The index is described below.

• The MSCI All Country World ex-USA Index is designed to measure equity market performance in global developed and emerging markets outside the United States.

- 16.00%

0.88%

3.80%

N/A

MANAGEMENT

Investment Adviser: Janus Henderson Investors US LLC

Portfolio Management: George P. Maris, CFA, is Executive Vice President and Lead Portfolio Manager of the Portfolio, which he has managed or co-managed since January 2016. **Julian McManus** is Executive Vice President and Co-Portfolio Manager of the Portfolio, which he has co-managed since January 2018.

PURCHASE AND SALE OF PORTFOLIO SHARES

Purchases of Shares may be made only by the separate accounts of insurance companies for the purpose of funding variable insurance contracts or by certain qualified retirement plans. Redemptions, like purchases, may be effected only through the separate accounts of participating insurance companies or through qualified retirement plans. Requests are duly processed at the NAV next calculated after your order is received in good order by the Portfolio or its agents. Refer to the appropriate separate account prospectus or plan documents for details.

TAX INFORMATION

Because Shares of the Portfolio may be purchased only through variable insurance contracts and certain qualified retirement plans, it is anticipated that any income dividends or net capital gains distributions made by the Portfolio will be exempt from current federal income taxation if left to accumulate within the variable insurance contract or qualified retirement plan. The federal income tax status of your investment depends on the features of your qualified retirement plan or variable insurance contract.

PAYMENTS TO INSURERS, BROKER-DEALERS, AND OTHER FINANCIAL INTERMEDIARIES

Portfolio shares are generally available only through an insurer's variable contracts, or through certain employer or other retirement plans (Retirement Products). Retirement Products are generally purchased through a broker-dealer or other financial intermediary. The Portfolio or its distributor (or its affiliates) may make payments to the insurer and/or its related companies for distribution and/or other services; some of the payments may go to broker-dealers and other financial intermediaries. These payments may create a conflict of interest for an intermediary, or be a factor in the insurer's decision to include the Portfolio as an underlying investment option in a variable contract. Ask your financial advisor, visit your intermediary's website, or consult your insurance contract prospectus for more information.

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