

# PSF Long/Short Large-Cap

Available through Pacific Life Variable Annuity Products  
Benchmark: S&P 500 TR USD

Overall Morningstar Rating™

★★★★

Morningstar Return

Above Average

Morningstar Risk

High

Out of 273 Long-Short Equity VA subaccounts. An investment's overall Morningstar Rating, based on its risk-adjusted return, is a weighted average of its applicable 3-, 5-, and 10-year Ratings. See disclosure for details.

## Investment Strategy

from underlying investment's prospectus

The investment seeks above-average total returns.

Under normal circumstances, this fund invests at least 80% of its assets in securities of companies with large market capitalizations. The sub-advisor generally considers a company to be a large-capitalization company if the company has a market capitalization similar to companies contained within the S&P 500 Index.

## Category Description: Long-Short Equity

Long-short portfolios hold sizeable stakes in both long and short positions in equities, exchange traded funds, and related derivatives. Some funds that fall into this category will shift their exposure to long and short positions depending on their macro outlook or the opportunities they uncover through bottom-up research. At least 75% of the assets are in equity securities or derivatives, and funds in the category will typically have beta values to relevant benchmarks of between 0.3 and 0.8 over a three-year period.

## Morningstar Proprietary Statistics

	Fund Rank	Morningstar	out of # of
	Percentile	Rating	Investments
YTD	42	—	348
1 Year	33	—	335
3 Year	38	★★★★	273
5 Year	42	★★★★	231
10 Year	—	—	—

## Operations

Subaccount Incp Date	05-01-08
Management Company	Pacific Life Fund Advisors LLC (PLFA)
Subadvisor	J.P. Morgan Investment Management, Inc.

## Portfolio Manager(s)

Susan Bao. Since 2008.  
Scott Davis. Since 2016.

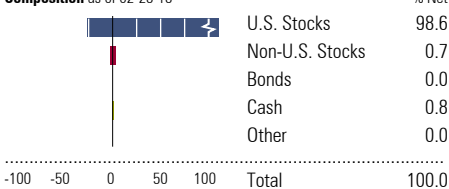
## Notes

This investment option is available only through variable annuities from Pacific Life. Variable annuities are long-term investments designed for retirement. The value of the variable investment options will fluctuate so that shares, when redeemed, may be worth more or less than the original cost. Annuity withdrawals and other distributions of taxable amounts, including death benefit payouts, will be subject to ordinary income tax. For nonqualified contracts, an additional tax of 3.8% may apply on net investment income. If withdrawals and other distributions are taken prior to age 59 1/2, an additional 10% federal tax may apply. A withdrawal charge also may apply. Withdrawals will reduce the contract value and the value of the death benefits, and also may reduce the value of any optional benefits.

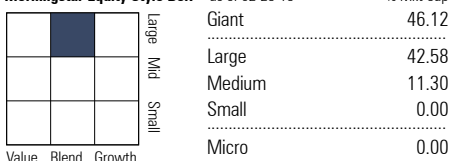
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## Portfolio Analysis

Composition as of 02-28-18



Morningstar Equity Style Box™ as of 02-28-18



Morningstar Sectors as of 02-28-18

Sector	% Fund
Cyclical	35.94
Basic Materials	4.13
Consumer Cyclical	12.83
Financial Services	18.30
Real Estate	0.68
Sensitive	43.46
Communication Services	2.73
Energy	7.38
Industrials	14.33
Technology	19.02
Defensive	20.60
Consumer Defensive	5.88
Healthcare	13.06
Utilities	1.66

Top Holdings as of 02-28-18

Company	% Assets
Microsoft Corp	4.04
Apple Inc	3.43
Amazon.com Inc	3.30
Alphabet Inc C	3.07
Bank of America Corporation	2.57
Pfizer Inc	2.54
Occidental Petroleum Corp	2.51
UnitedHealth Group Inc	2.39
Alphabet Inc A	2.33
Citigroup Inc	2.28
Northrop Grumman Corp	2.21
DowDuPont Inc	2.04
The Home Depot Inc	1.91
Morgan Stanley	1.87
Union Pacific Corp	1.87

Total Number of Stock Holdings	165
Total Number of Bond Holdings	0
Annual Turnover Ratio %	163.00
Tax Cost Ratio 3 Yr	0.00
Total Fund Assets (\$mil)	59.44

Statistics as of 02-28-18	Port Avg	Rel S&P 500	Rel Cat
P/E Ratio	17.26	1.02	1.05
P/B Ratio	2.49	0.88	0.97
P/C Ratio	12.91	1.04	1.26
GeoAvgCap (\$mil)	75,219.18	0.81	1.71

Risk Measures as of 03-31-18	Port Avg	Rel S&P 500	Rel Cat
3 Yr Std Dev	11.76	1.15	1.31
3 Yr Beta	1.10	—	1.43
3 Yr Sharpe Ratio	0.57	0.57	1.16
3 Yr Alpha	-4.56	—	1.51
3 Yr R-squared	92.67	—	1.23
Income Ratio	-0.01	—	—
3-Yr Information Ratio	-1.18	—	1.22

## before investing.

This page must be accompanied by all disclosure pages.

any fixed subaccount crediting rates or annuity payout rates, are backed by the financial strength and claims-paying ability of the issuing insurance company and do not protect the value of the variable investment options. They are not backed by the broker/dealer from which this annuity is purchased, by the insurance agency from which this annuity is purchased, or any affiliates of those entities, and none makes any representations or guarantees regarding the claims-paying ability of the issuing insurance company. Variable annuities and shares of the Pacific Select Fund are distributed by **Pacific Select Distributors, LLC** (member FINRA & SIPC), a subsidiary of Pacific Life Insurance Company (Newport Beach, CA) and an affiliate of Pacific Life & Annuity Company, and are available through licensed third parties.

**This fact sheet must be preceded or accompanied by the product and underlying fund prospectuses which are available from your financial advisor. These prospectuses contain more complete information about Pacific Life and a variable annuity's risks, charges, limitations, and expenses, as well as the risks, charges, expenses, and investment objectives of the underlying investment options. Read the prospectuses carefully**

# Disclosure

Pacific Life Insurance Company contracts Morningstar Inc., for a fee, as a third-party advisor to produce this fact sheet. In this capacity, Morningstar independently provides analysis on the underlying investment options for Pacific Life. Pacific Life and its affiliates have not independently verified this information.

The Morningstar Fact Sheet is provided to help you further evaluate the investment options available within Pacific Life variable annuities. This information (including Morningstar Rating) does not reflect expenses and charges that are, or may be, imposed under your variable annuity contract. For information on these charges, please refer to the applicable variable annuity contract or variable annuity prospectus.

Morningstar chooses the applicable benchmark for each portfolio. This index may differ from the benchmark index or the indices in the underlying prospectuses. The index is an unmanaged portfolio of specified securities and the index does not reflect any initial or ongoing expenses. Indexes cannot be invested in directly. See the underlying prospectuses for more information on benchmarks and definitions.

Pacific Life Fund Advisors, LLC (PLFA), is the investment adviser to the Pacific Select Fund (PSF) and the manager of certain PSF portfolios. PLFA also does business under the name Pacific Asset Management and manages certain PSF portfolios under that name.

For PSF investment options, the information presented is about subaccounts funded by corresponding Pacific Select Fund portfolios. Pacific Select Fund is an underlying investment vehicle to Pacific Life variable products.

American Century Investment Services, Inc., American Funds Distributors, Inc., BlackRock Distributors, Inc., Fidelity Distributors Corporation, First Trust Portfolios L.P., Franklin Templeton Distributors, Inc., Invesco Distributors, Inc., Ivy Distributors, Inc. Janus Henderson Distributors LLC, JPMorgan Distribution Services, Inc., Legg Mason Investor Services, LLC, Lord Abbett Distributor LLC, MFS Fund Distributors, Inc., Neuberger Berman Management LLC, OppenheimerFunds Distributor, Inc., PIMCO Investments LLC, State Street Global Markets, VanEck Securities Corporation, and the products each distributes are not affiliated with Pacific Life or Pacific Select Distributors, LLC. Third-party trademarks and service marks are the property of their respective owners.

## Applicable to Franklin Templeton Funds

Because the Franklin Templeton Founding Funds Allocation VIP Fund invests in underlying funds that may engage in a variety of investment strategies involving certain risks, this fund may be subject to those same risks. It also involves direct expenses for each fund and indirect expenses for the underlying funds, which together can be higher than expenses incurred when investing directly in an underlying fund. Investments in stocks offer the potential for long-term gains but can be subject to short-term price fluctuations. Because the underlying funds invest in bonds and other debt obligations, the fund's share price and yield will be affected by interest rate movements. Bond prices generally move in the opposite direction from interest rates. Thus, as the prices of bonds in the fund adjust to a rise in interest rates, the fund's share price may decline. High yield, lower-rated (junk) bonds generally have greater price swings and higher default risks than investment-grade bonds. Foreign investing, especially in emerging markets, involves additional risks, including

currency fluctuations, economic instability, market volatility, and political and social instability. These and other risks are described more fully in the fund's prospectus. The fund is a series of Franklin Templeton Variable Insurance Products Trust (FTVIP). Shares are generally sold only to insurance company separate accounts. The fund is distributed by Franklin Templeton Distributors, Inc., One Franklin Parkway, San Mateo, CA 94403-1906. Franklin Advisers, Inc. serves as the fund's investment manager. Templeton Global Advisors Limited serves as the fund's investment manager. Franklin Mutual Advisers, LLC serves as the fund's investment manager.

## Applicable to Russell Indexes

The Russell 2000 Index and Russell 2000 Value Index (together, the "Indexes") are calculated by Russell or its agent, are trademarks of Frank Russell Company ("Russell"), and have been licensed for use by Pacific Select Fund ("PSF"). Neither Russell nor the London Stock Exchange Group companies (together the "Licensor Parties") sponsor, endorse, sell or promote any portfolios of PSF, the content of this communication, or make any claim, prediction, warranty or representation whatsoever, expressly or impliedly, either as to (i) the results to be obtained from the use of the Indexes, or (ii) the suitability of the Indexes for the purpose to which they are being put. The Licensor Parties do not and will not provide any financial or investment advice or recommendation in relation to the Index to Pacific Select Fund or its clients. The Licensor Parties do not accept any liability to any person for any errors or omissions in the Russell Indexes and are under no obligation to advise any person of any error therein.

## Morningstar Portfolio Analysis and Morningstar Sector Weightings

For individual subaccounts, the purpose of these sections is to provide an analysis of the individual subaccount. Morningstar prepares this information based on publicly available holdings information. Generally, each underlying subaccount's holdings are for the prior month end; however, certain underlying subaccounts' holdings are for the month ended one or two months prior.

## Benchmark Definition

S&P 500 TR USD: The index measures the performance of 500 widely held stocks in US equity market. Standard and Poor's chooses member companies for the index based on market size, liquidity and industry group representation. Included are the stocks of industrial, financial, utility, and transportation companies. Since mid 1989, this composition has been more flexible and the number of issues in each sector has varied. It is market capitalization-weighted.

## Morningstar Rating™

The Morningstar Rating™ for funds, or "star rating", is calculated for funds and separate accounts with at least a three-year history. Exchange-traded funds and open-ended mutual funds are considered a single population for comparative purposes. It is calculated based on a Morningstar Risk-Adjusted Return measure that accounts for variation in a managed product's monthly excess performance, placing more emphasis on downward variations and rewarding consistent performance.

The Morningstar Rating does not include any adjustment for sales loads. The top 10% of products in each product category receive 5 stars, the next 22.5% receive 4 stars, the next 35% receive 3 stars, the next 22.5% receive 2 stars, and the bottom 10% receive 1 star. The Overall Morningstar Rating for a managed product is derived from a weighted average of the performance figures associated with its three-, five-, and 10-year (if applicable) Morningstar Rating metrics.

## Morningstar Return

The Morningstar Return rates a fund's performance relative to other managed products in its Morningstar Category. It is an assessment of a product's excess return over a risk-free rate (the return of the 90-day Treasury Bill) in comparison with the products in its Morningstar category. In each Morningstar category, the top 10% of products earn a High Morningstar Return (High), the next 22.5% Above Average (+ Avg), the middle 35% Average (Avg), the next 22.5% Below Average (- Ave), and the bottom 10% Low (Low). Morningstar Return is measured for up to three time periods (three, five, and 10 years). These separate measures are then weighted and averaged to produce an overall measure for the product. Products with less than three years of performance history are not rated.

## Morningstar Risk

Morningstar Risk evaluates a fund's downside volatility relative to that of other products in its Morningstar Category. It is an assessment of the variations in monthly returns, with an emphasis on downside variations, in comparison with the products in its Morningstar category. In each Morningstar category, the 10% of products with the lowest measured risk are described as Low Risk (Low), the next 22.5% Below Average (-Avg), the middle 35% Average (Avg), the next 22.5% Above Average (+Avg), and the top 10% High (High). Morningstar Risk is measured for up to three time periods (three, five, and 10 years). These separate measures are then weighted and averaged to produce an overall measure for the product. Products with less than three years of performance history are not rated.

## Morningstar Style Box™

The Morningstar Style Box reveals a portfolio's investment style. For equity portfolios, the vertical axis shows the market capitalization of the stocks owned. The horizontal axis shows investment style (value, blend, or growth).

## Definitions

Alpha is a measure of the difference between a portfolio's actual returns and its expected performance, given its level of risk as measured by beta.

Beta is a measure of a portfolio's sensitivity to market movements.

Credit Analysis on bond portfolios is based on Moody's ratings.

Duration is a time measure of a bond's interest-rate sensitivity. Average effective duration is a weighted average of the duration of the underlying fixed-income securities within the portfolio.

Information Ratio is a risk-adjusted performance measure. The information ratio is a special version of the Sharpe Ratio in that the benchmark doesn't have to be the risk-free rate.

No bank guarantee	Not a deposit	May lose value	Not FDIC/NCUA insured	Not insured by federal government agency
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# Disclosure

Income Ratio reveals the percentage of current income earned per share. The income ratio can be used as a gauge of how much of the total return comes from income.

Price/Book (P/B) Ratio is the weighted average of the price/book ratios of all the stocks in a portfolio.

Price/Cash (P/C) Ratio represents the weighted average of the price/cash-flow ratios of the stocks in a portfolio.

Price/Earnings (P/E) Ratio is a stock's current price divided by the company's trailing 12-month earnings per share.

Geometric Average Cap is the geometric mean of the market capitalization for all of the stocks the portfolio owned.

Maturity is the average effective maturity, which is a weighted average of all the maturities of the bonds in a portfolio, computed by weighting each maturity date by the market value of the security.

R-squared reflects the percentage of a portfolio's movements that can be explained by movements in its benchmark.

Sharpe Ratio is a risk-adjusted measure calculated by using standard deviation and excess return to determine reward per unit of risk.

Standard Deviation is a statistical measure of the volatility of the portfolio's returns.

Subaccount Inception (Incp) Date is when the investment option became part of the separate account.

Weighted (Wtd) Coupon is the average weighted coupon, which is generated from the portfolio by weighting the coupon of each bond by its relative size in the portfolio. Coupons are fixed percentages paid out on a fixed-income security on an annual basis.

Weighted (Wtd) Price is the average weighted price, which is generated from the portfolio by weighting the price of each bond by its relative size in the portfolio. This number reveals if the portfolio favors bonds selling at prices above or below face value (premium or discount securities, respectively). A higher number indicates a bias toward premiums. This statistic is expressed as a percentage of par (face) value.

## Investment Risk

Each investment option has varying degrees of risk depending on the investments and investment strategies used. See the applicable underlying fund prospectus for more complete information regarding investment risks.

**Active Management** The investment is actively managed and subject to the risk that the advisor's usage of investment techniques and risk analyses to make investment decisions fails to perform as expected, which may cause the portfolio to lose value or underperform investments with similar objectives and strategies or the market in general.

**Currency** Investments in securities traded in foreign currencies or more directly in foreign currencies are subject to the risk that the foreign currency will decline in value relative to the U.S. dollar, which may reduce the value of the portfolio. Investments in currency hedging positions are subject to the risk that the value of the U.S. dollar will decline relative to the currency being hedged, which may result in a loss of money on the investment as well as the position designed to act as a hedge. Cross-currency hedging strategies and active currency positions may increase currency risk because actual currency exposure may

be substantially different from that suggested by the portfolio's holdings.

**Derivatives** Investments in derivatives may be subject to the risk that the advisor does not correctly predict the movement of the underlying security, interest rate, market index, or other financial asset, or that the value of the derivative does not correlate perfectly with either the overall market or the underlying asset from which the derivative's value is derived. Because derivatives usually involve a small investment relative to the magnitude of liquidity and other risks assumed, the resulting gain or loss from the transaction will be disproportionately magnified. These investments may result in a loss if the counterparty to the transaction does not perform as promised.

**Emerging Markets** Investments in emerging- and frontier-markets securities may be subject to greater market, credit, currency, liquidity, legal, political, and other risks compared with assets invested in developed foreign countries.

**Equity Securities** The value of equity securities, which include common, preferred, and convertible preferred stocks, will fluctuate based on changes in their issuers' financial conditions, as well as overall market and economic conditions, and can decline in the event of deteriorating issuer, market, or economic conditions.

**Foreign Markets** Exposure to foreign markets can involve additional risks relating to market, economic, political, regulatory, geopolitical, or other conditions. These factors can make foreign investments more volatile and less liquid than U.S. investments.

**Forwards** Investments in forwards may increase volatility and be subject to additional market, active management, currency, and counterparty risks as well as liquidity risk if the contract cannot be closed when desired. Forwards purchased on a when-issued or delayed-delivery basis may be subject to risk of loss if they decline in value prior to delivery, or if the counterparty defaults on its obligation.

**Geographic Focus** Focusing investments in a single country, limited number of countries, or particular geographic region increases the risk that economic, political, social, or other conditions in those countries or that region will have a significant impact on performance.

**Growth Investing** Growth securities may be subject to increased volatility as the value of these securities is highly sensitive to market fluctuations and future earnings expectations. These securities typically trade at higher multiples of current earnings than do other securities and may lose value if it appears their earnings expectations may not be met.

**Industry and Sector Investing** Concentrating assets in a particular industry, sector of the economy, or markets may increase volatility because the investment will be more susceptible to the impact of market, economic, regulatory, and other factors affecting that industry or sector compared with a

more broadly diversified asset allocation.

**Issuer** A stake in any individual security is subject to the risk that the issuer of that security performs poorly, resulting in a decline in the security's value. Issuer-related declines may be caused by poor management decisions, competitive pressures, technological breakthroughs, reliance on suppliers, labor problems or shortages, corporate restructurings, fraudulent disclosures, or other factors. Additionally, certain issuers may be more sensitive to adverse issuer, political, regulatory, market, or economic developments.

**Large Cap** Concentrating assets in large-capitalization stocks may subject the portfolio to the risk that those stocks underperform other capitalizations or the market as a whole. Large-cap companies may be unable to respond as quickly as small- and mid cap companies can to new competitive pressures and may lack the growth potential of those securities. Historically, large-cap companies do not recover as quickly as smaller companies do from market declines.

**Leverage** Leverage transactions may increase volatility and result in a significant loss of value if a transaction fails. Because leverage usually involves investment exposure that exceeds the initial investment, the resulting gain or loss from a relatively small change in an underlying indicator will be disproportionately magnified.

**Restricted/Illiquid Securities** Restricted and illiquid securities may fall in price because of an inability to sell the securities when desired. Investing in restricted securities may subject the portfolio to higher costs and liquidity risk.

**Market/Market Volatility** The market value of the portfolio's securities may fall rapidly or unpredictably because of changing economic, political, or market conditions, which may reduce the value of the portfolio.

**Mid-Cap** Concentrating assets in mid-capitalization stocks may subject the portfolio to the risk that those stocks underperform other capitalizations or the market as a whole. Mid-cap companies may be subject to increased liquidity risk compared with large-cap companies and may experience greater price volatility than do those securities because of more-limited product lines or financial resources, among other factors.

**Mortgage-Backed and Asset-Backed Securities** Investments in mortgage-backed and asset-backed securities may be subject to increased price volatility because of changes in interest rates, issuer information availability, credit quality of the underlying assets, market perception of the issuer, availability of credit enhancement, and prepayment of principal. The value of ABS and MBS may be adversely affected if the underlying borrower fails to pay the loan included in the security.

**Nondiversification** A nondiversified investment, as defined under the Investment Act of 1940, may have an increased potential for loss because its portfolio includes a relatively small number of investments. Movements in the prices of the

No bank guarantee	Not a deposit	May lose value	Not FDIC/NCUA insured	Not insured by federal government agency
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# Disclosure

individual assets may have a magnified effect on a nondiversified portfolio. Any sale of the investment's large positions could adversely affect stock prices if those positions represent a significant part of a company's outstanding stock.

**Price Volatility** As with any investment, the value of the Fund's holdings will fluctuate so that shares, when redeemed, may be worth more or less than their original cost.

**Small Cap** Concentrating assets in small-capitalization stocks may subject the portfolio to the risk that those stocks underperform other capitalizations or the market as a whole. Smaller, less-seasoned companies may be subject to increased liquidity risk compared with mid- and large-cap companies and may experience greater price volatility than do those securities because of limited product lines, management experience, market share, or financial resources, among other factors.

**Underlying Funds** Because the Fund may serve as an underlying fund of one or more "fund of funds" and thus have a significant percentage of its outstanding shares held by such fund of funds, a change in asset allocation by the fund of funds could result in large redemptions out of the Fund, causing potential increases in expenses to the Fund and sale of securities in a short timeframe, both of which could negatively impact performance.

**Value Investing** Value securities may be subject to the risk that these securities cannot overcome the adverse factors the advisor believes are responsible for their low price or that the market may not recognize their fundamental value as the advisor predicted. Value securities are not expected to experience significant earnings growth and may underperform growth stocks in certain markets.

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No bank guarantee	Not a deposit	May lose value	Not FDIC/NCUA insured	Not insured by federal government agency
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