



PSPRS FY2017 Second Quarter newsletter

GET READY FOR PENSION REFORM IN 2017

In the New Year, PSPRS, employers and local boards must prepare for several changes due to 2016 pension reforms.

The most immediate of changes impact current employees who were hired on or after Jan. 1, 2012 (Tier 2 employees). The most sweeping of changes includes the creation of a new and third public safety employee tier starting July 1, 2017.

Implemented to bring stability to PSPRS, Senate Bill 1428 and Prop 124 passed into law. Future Tier 3 employees will be able to choose between a defined benefit (pension) plan and, for the first time, a defined contribution plan (similar to a private sector 401k). Those hired by employers whose public safety members do not contribute to Social Security and choose the defined benefit plan will be in a “hybrid” plan consisting of both a pension and a defined contribution plan. The DC component of the “hybrid” option requires a 3 percent employee contribution and equal employer match.



Tier 3 employee use of the defined contribution plan is incentivized by employer matching contributions. Under the DC-only option, both employee and employer contribute 9 percent of the employee’s salary. This exceeds the typical private sector employer match, which a variety of institutions identify as 3 percent of an employee’s salary.

Additional cost savings to the PSPRS trust will be generated through adjustments to normal retirement requirements (15 years of credited service minimum and member is at least 55 years old), adjusted “multipliers” that reward years of service, as well as the introduction of a 50-50 “split” contribution system for Tier 3 employees that consists of equal retirement contributions from the employee and his or her employer. Prop 124 also replaces the current retiree Permanent Benefit Increase formula with a standard cost-of-living-adjustment capped at 2 percent a year.

Arizona’s introduction of the “hybrid” option for its public safety employees puts the state in line with about half of the country. Currently, 22 other states operate hybrid systems. Increased employee retirement

contribution rates are also common in the wake of huge Recession Era losses incurred by public pension plans, according to the National Association of State Retirement Administrators (NASRA).

A table featuring the benefits available to Tier 1 and 2 employees, as well as pending Tier 3 benefits created by S1428 is included at the end of this newsletter.

NEW PSPRS BOARD OF TRUSTEES APPOINTED



The governance of PSPRS-managed plans also got a shake-up from 2016 pension reforms. Most notable is the expansion of the Board of Trustees to 9 from 7 members.

So far, eight appointments have been made by Governor Doug Ducey, past-House Speaker David Gowan and past-Senate President Andy Biggs. Two serving trustees, Chairman Brian Tobin and Trustee Bill Davis were reappointed to the board. Tobin is a deputy chief and 34-year firefighting veteran of the Phoenix Fire Department while Davis is a managing director of

public finance investment with Piper Jaffray and a chartered financial analyst.

As governor, Ducey appointed four trustees and will select the ninth and final trustee from nominees provided by the eight newly appointed PSPRS Board of Trustees.

Other board members include:

- Will Buividas – Phoenix Police Department officer and representative for the city’s local PSPRS pension board, member of the City of Phoenix Deferred Compensation Board and chairman of the Phoenix Healthcare Benefits Trust Board. Appointed by Sen. Biggs.
- Edward McNeill – Arizona Department of Public Safety sergeant, elected representative for the DPS local PSPRS pension board and Fraternal Order of Police Lodge 32 Investment Committee member. Appointed by Gov. Ducey.
- Bryan Raines – Retired City of Mesa deputy city manager with 27 years of experience with municipal government and chairman of Mesa’s local PSPRS police and fire department pension boards. Appointed by Sen. Biggs.
- Mike Scheidt – City of Tempe firefighter who has served on the Tempe local PSPRS pension board, the city’s Deferred Compensation Board and the Arizona Firefighters Health Care Trust board. Appointed by Rep. Gowan.
- Dean Scheinert – More than 30 years of experience with investment management and capital markets, including terms as senior vice president for J.P. Morgan Chase Private Bank and U.S. Bank. Current corporate & major gifts officer with the Musical Instrument Museum. Appointed by Gov. Ducey.
- Don Smith - Former and 15-year chief executive officer of Copperpoint Insurance and former deputy secretary at the Pennsylvania Department of Labor and Industry. Appointed by Gov. Ducey.

PSPRS PENSION REFORM EDUCATION CAMPAIGN UNDERWAY



Above: PSPRS Local Board Training Coordinator Don Mineer covers the S1428 basics.

PSPRS will spend 2017 engaging employers, boards and members about the pending changes to the public safety pension system. The changes require policy and operational adjustments for things like payroll submissions, member enrollments and investment options for the new defined contribution plan.

The campaign kicked off with a January 10th event-webinar for employers and local board members to cover the broad strokes of the reforms passed last year. PSPRS staff will also host a January 31 event to review the Defined Contribution Tier 2 opt-out process and provisions with employers (more below).

Similar events are planned for March and April in Coconino and Pima counties, and PSPRS is conducting outreach meetings with employers to solicit feedback and improve services. Other communications related projects will include production of informational videos and materials, email campaigns and direct mail.

On the tech side, changes will be required for employer/employee contributions and payroll reporting. PSPRS will be implementing changes that will ensure compliance with statute and allow us to better serve members and employers. Currently, PSPRS is working on allowing employers to submit a single file per pay cycle and enabling the single file to contain all contribution types and even entries from different pay periods. The new file format will also include data elements to indicate if positions are covered by Social Security, applicable pensionable salary of members, contribution non-payment reason codes and new contribution types for DC and DC disability insurance payments.

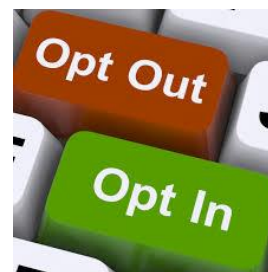
PSPRS also plans to implement ACH debit and credit payments to make the contribution payment process more accurate, efficient and cost effective. Both employer and bank-hosted variants will be available.

PSPRS does recognize the added strain this may have on employers as they may need to reconfigure their systems. The goal is to comply with the law and make operations easier and more efficient and to be as helpful as possible for our employers and members during this transition.

JAN. 31 EMPLOYER SEMINAR FOR TIER 2 OPT-OUT PROCESS

The coming defined contribution (DC) plan to be administered by PSPRS for Tier 3 employees will actually impact Tier 2 employees first. Understanding the plan is critical for employers, who PSPRS is urging to attend or view a Jan. 31 seminar to discuss the “opt-out” process for certain employees.

As written in state law, Tier 2 employees who do not contribute to Social Security will be automatically enrolled into the DC plan starting July 1, 2017. The DC plan requires a 3 percent salary contribution from employees and a full 3 percent employer match and is intended to help equalize retirement benefits made available to public safety employees who are and who are not covered by Social Security.



The DC plan available for Tier 2 employees is considered “opt-out,” meaning that enrollment and pre-tax salary contributions will be automatic unless an employee actively declines enrollment by June 30, 2017. PSPRS will assist employers in educating eligible Tier 2 employees about the DC plan benefit and their right to decline participation. Deliberations on who will manage and what investments will be included in the pending 401(a) DC plan are underway. PSPRS has appointed a Defined Contribution Committee made

up of public safety representatives from police and fire departments, as well as PSPRS officials and investment experts.

GETTING BACK ON TRACK

Questions abound – especially in light of the *Hall* decision – about the funding status and future viability of PSPRS-managed pension plans.

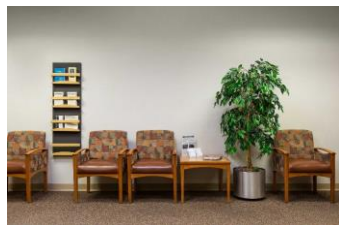
Comparisons by NASRA found the median funding level to be 73.4 percent while the range varied from as low as 24 percent to as high as 127 percent. Data collected from financial media outlets and other organizations supports the NASRA median estimates.

The most recent valuations for PSPRS plans were completed after the Arizona Supreme Court ruled on the *Hall* lawsuit, and many understandably concluded the lawsuit created the actuarial declines for PSPRS and EORP.

However, in reality the 49 to 46 percent drop in the funding ratio for PSPRS was primarily due to Prop 124's replacement of the Permanent Benefit Increase with the COLA adjustment as well as the PSPRS Board of Trustees decision in 2015 to reduce the assumed earnings rate to 7.5 from 7.85 percent. The move to COLA increases has the short-term effect of actually *decreasing* the funding level because it replaces the PBI, a conditional formula based on PSPRS investment returns, with the COLA, which creates the certainty of a pension increase to retirees based on inflationary pressures measured by the U.S. Department of Labor. Fortunately, this forward-thinking move, while counterintuitive to the savings pension reform is designed to create, actually saved \$425 million from an otherwise more costly reversal due to *Hall*.

EORP and CORP were not affected by Prop 124. Therefore, the overall funding rate decline for EORP from 38.8 to 37.6 percent is due to other factors, primarily the change in the assumed rate and inadequate contributions from a statutorily locked in 23.5 percent employer contribution rate. CORP held steady at 57.3 percent. However, it should be understood that the full effects of the *Hall* ruling most likely will be factored into EORP and CORP funding and rates in next year's valuations assuming the legal process surrounding *Hall* has concluded in a timely manner.

THE LATEST WITH THE HALL LAWSUIT



The timetable for a conclusion to the *Hall* lawsuit – and the related *Parker* lawsuit impacting PSPRS – is still difficult to estimate.

As advised in mid-December, EORP, the *Hall* lawsuit defendant, filed a motion to reconsider with the Arizona Supreme Court that will likely extend the timeframe for the implementation of any remedies ordered by the courts.

The motion seeks additional explanation to the court's conclusion that the 2011 contribution rate changes violated the state constitution but does not amount to an "appeal" of the court's actual decision. The *Hall* opinion released by the court in November relied on case law but resisted an analysis based on the state constitution's contract clause, which is what EORP and the state requested in their motions.

Assuming there are no changes to the court's conclusion, the *Hall* litigants still have to return to the trial court to decide how to provide the refund of excess contributions to affected EORP members hired prior to July 2011. The outcome of the lawsuit will also have to be reconciled with *Parker v. PSPRS*, which presumably would result in excess contribution refunds being made available to impacted public safety employees. There is also the possibility that a court could apply a different remedy to the *Parker* lawsuit than the contribution refund ordered in the *Hall* lawsuit by the state supreme court.

PSPRS will continue to provide *Hall* and *Parker* lawsuit updates as information becomes available.

SO LONG PBI, HELLO COLA

Voter approval of Prop 124 brings an end to the retiree PBI, which has been in effect for 30 years and is credited for playing an enormous role in the funding level slide of PSPRS over the past three decades.

The awarding of the PBI is conditional on the rate of PSPRS investment returns exceeding 9 percent a year. When this happens, half of the excess investment returns over 9 percent were set aside to annually pay a flat dollar increase to every eligible retiree based on a maximum 4 percent of the average pension in the System, regardless of their individual benefit amount.

For example, in 1998 PSPRS investments generated a whopping 22 percent return. Under the PBI mechanism, the excess return was 13 percent (22 minus 9 percent) and half of this amount (6.5 percent) was set aside for retiree pension increases but only 4 percent of that amount was divided equally and distributed to retirees. Under law, the remaining 2.5 percent of the investment returns were kept in a separate fund used to generate PBI payments to retirees until the balance of the separate fund hit zero regardless of PSPRS investment returns.

Due to the carry-over provision and years with extremely high investment returns, the separate PBI fund generated monthly pension increases for retirees for 28 straight years – and even during years of massive investment losses from events like the 2001-2002 “Dot.com” crash and the housing crisis of 2008-2009.

In July, when PBIs are applied, PSPRS experiences a flood of retiree phone calls. And it’s no surprise why: Since inception, the PBI mechanism delivered pension increases every year despite the trust’s performance. However, the streak came to an end in 2015 with the depletion of the reserve account.

Starting July 1, 2018, PSPRS retirees will receive annual pension increases up to 2 percent based on adjustments to the Consumer Price Index recognized by the U.S. Department of Labor. A table featuring the impact of investment returns, PBI distributions and funding levels since 2000 is below.

Fiscal Year	Investment Return	Monthly PBI (in \$)	Aggregate Funding Level
2000	12.31%	87.37	124.70%
2001	-16.86%	93.24	126.90%
2002	-15.07%	98.17	113.00%
2003	6.67%	102.53	100.90%
2004	14.97%	111.90	92.40%
2005	9.11%	116.82	82.10%
2006	8.30%	121.76	77.00%
2007	17.05%	127.06	66.40%
2008	-7.27%	134.34	66.50%
2009	-17.73%	138.66	68.20%
2010	13.47%	146.74	65.80%
2011	17.37%	152.84	61.90%
2012	-0.79%	159.13	58.60%
2013	10.64%	121.19	57.10%
2014	13.28%	65.20	49.20%
2015	3.68%	0.00	49%
2016	0.63%	0.00	46%

PSPRS CHIEF INVESTMENT OFFICER RECOGNIZED

The PSPRS investment strategy and performance continues to grab attention and accolades.

PSPRS learned recently that Chief Investment Officer Ryan Parham was named among the Top 30 Pension Fund Chief Investment Officers by Trusted Insight, a financial/investment publication. Parham and 29 other CIOs got credit for structuring pension portfolios that “mitigate risk” and deliver in “highly uncertain” political and economic times.

Parham was also nominated in 2016 as “CIO of the Year” by Institutional Investor magazine, while the same publication also nominated PSPRS “Small Public Pension Plan of the Year.” Jennifer Eichholz, PSPRS’ in-house investment attorney, was also among the finalists for Arizona Business Magazine’s Corporate Counsel Award.

Congrats to Ryan and the PSPRS investment team – Shan Chen, Rose Crutcher, Jennifer Eichholz, Vaida Maleckaite, Mark Steed, Bill Thatcher, Jeff Weston and Owen Zhao.

GOODBYE TO A GREAT FRIEND AND COLLEAGUE

The PSPRS family said goodbye to a friend, colleague and outstanding member of the investment team who played a critical role in developing and executing the low-risk investment strategy for PSPRS-managed portfolios.

Martin “Marty” Anderson passed away unexpectedly on Dec. 13, 2016, leaving behind grieving family and friends.

Hired by PSPRS in 2003, Anderson managed every single asset class in the PSPRS portfolio at one time or another. He was the deputy chief investment officer and most recently was responsible for evaluating and recommending investments in real assets, including the energy, mining, agricultural and real estate sectors.



Anderson was a dedicated and gifted hunter, fisherman and outdoorsman who pursued his passions to the fullest despite being born with a congenital heart condition. At work, he was known for his quiet and intense intellect, investment instincts and his unrivaled ability to argue contrarian views during investment selection meetings. Friends and co-workers also describe Anderson as loyal, humble, caring and funny.

Hired as an investment analyst after the “Dot.com” crash of 2002, Anderson helped transform a risky, stock-heavy PSPRS portfolio that endured enormous losses into a highly diversified and risk-averse trust with alternative investment classes.

“Marty was nothing short of vital in rebuilding the PSPRS portfolio,” said Ryan Parham, PSPRS chief investment officer. “He was a great friend and an incredible investor whose work will benefit Arizona’s first responders, corrections officers and elected officials for decades.”

“While we are all incredibly saddened by Marty’s passing we are also grateful for the years we were able to spend with him,” said PSPRS System Administrator Jared Smout. “He was a great person who was respected and admired by the PSPRS family and those he did business with on behalf of our members.”

SB1428 Pension Reform Matrix of Changes

	Tier 1	Tier 2	Tier 3
Hire Date	Before January 1, 2012	On or after January 1, 2012	On or after July 1, 2017
Plan Type	Defined Benefit	Defined Benefit w/ Hybrid (for non-Social Security only; may opt out by 06/30/17)	Defined Contribution only or Defined Benefit w/ Hybrid (for non-Social Security only)
Determination	Automatic		Irrevocable choice (90 days; default to Hybrid)
Employee Contribution Rate	11.65% (includes 4% maintenance of effort)	DB: 11.65% (includes moe) Hybrid: DB + 3%	DB: 50/50 split with ER DC: 9% Hybrid: DB + 3%
Employer Contribution Rate	Based on individual actuarial valuation	DB: Individual Valuation Hybrid: DB + 4% for short period of time; then 3%	DB: 50/50 split with ER DC: 9% Hybrid: DB + 3%
Salary Cap	As set by Internal Revenue Code		\$110,000 adjusted by custom index
Inter-System Transfers	Total liability is transferred to new employer with assets transferred at market funding level.		Total liability stays with previous employer.
Average Salary	High 3 in past 20 years	High 5 in past 20 years	High 5 in past 15 years
Normal Retirement (age and service)	20 years of service; no age 15 years of service; age 62	25 years of service; age 52.5 (not mutually attained)	15 years of cred service; age 55 (not mutually attained; actuarially reduced at 52.5)
Disability and Survivor Benefits	All 4 types of disability (Accidental, Catastrophic, Ordinary and Temporary) and survivor benefits are available to each tier where the determination, process and benefit amount will be the same as they are now. However, those who choose the DC only option will contribute to a separate disability fund where an actuarially determined equivalent amount will be paid in conjunction with their DC fund. No survivor benefits are available for DC only participants.		
Multipliers (80% max)	50% plus 2.0% for years >20 and <25 2.5% for years >25 (reduced by 4% for <20 yrs)	62.5% plus 2.5% for years >25 (reduced by 4% for <25 yrs)	15 to <17 years: 1.50% 17 to <19 years: 1.75% 19 to <22 years: 2.00% 22 to <25 years: 2.25% 25+ years: 2.50%
Deferred Annuity	At least 10 years (double contributions)	Not Available	
Benefit Increases CPI-based COLA utilizing metro Phoenix-Mesa data published by Bureau of Labor Statistics	Up to 2% No funding requirement No waiting period		Payable after 7 years or age 60 70% to <80% funded: 1.0% cap 80% to <90% funded: 1.5% cap 90% or more funded: 2.0% cap
Smoothing Period	Determined by Board (currently 7 years)		Not more than 5 years
Amortization Period	Closed period of not more than 20 years		Not more than 10 years