



Cavanaugh Macdonald

CONSULTING, LLC

The experience and dedication you deserve

March 22, 2024

Ms. Mary Beth Foley
Executive Director
Ohio Police & Fire Pension Fund
140 East Town Street
Columbus, OH 43215

RE: Review of PTA Report Titled “Ohio Police and Fire Funding Period and Actuarial Status as of January 2023” dated February 27, 2024

Dear Ms. Foley

We have reviewed the above-mentioned PTA report which we received February 27, 2024. For the second year in a row, we do not agree with the funding period developed by PTA. The above-mentioned report states that the January 2023 funding period is 29 years, a two-year reduction from 31-year period reported by PTA for January 2022. According to the PTA report, the difference in our conclusions is dependent upon the administrative expense assumption. More specifically they specify that the OPERS Contributions for the OP&F staff is not a reasonable assumption.

The expense assumption is normally inconsequential. For example, a one million dollar increase in expenses increases the OP&F funding period by about five weeks. Since the OP&F funding period is relatively close to the 30-year threshold, it can technically make a difference for 30-year funding. There are many common practices to consider when implementing an administrative expense assumption. These include, but aren't limited to, using:

- a slight reduction in the investment return assumption
- a percent of payroll,
- a percent of assets,
- the previous year's administrative expense, and
- a projection of the current year administrative expenses.

None of these perfectly project the future, but the difference is typically small enough that the extra modelling effort is not justified.

Having said this, the administrative expense reported by the system is based on accrual accounting and may occasionally be affected by items that don't actually affect cash flow – and it is cash flow that ultimately affects our results. While the PTA assumption employs a reasonable methodology, the 1.03% of payroll assumption is significantly above recent experience. Because the GASB 68



and 75 accrual-based expenses differ from the actual contribution made by OP&F to OPERS, we propose that the reported administrative expenses administrative expense assumption be adjusted by replacing the accrual based OP&F GASB 68 and 75 expenses from OPERS with the actual amount contributed by OP&F to OPERS for OP&F staff benefits. Using this refined assumption, the OP&F funding period remains below 30 years as of both January 1, 2022 and 2023.

PTA Assumed OPERS Contributions Are Over Five Times Larger Than the Actual OPERS Contributions

The administrative expense assumption used in the PTA report to develop the 29-year funding period is 1.03% of payroll. Our understanding is that this amount includes all administrative expenses, including OPERS Contributions. PTA, with the assistance of ORSC staff, developed a history of administrative expenses without OPERS Contributions which is shown on page 2 of the PTA report. OP&F Staff assisted us in verifying these amounts. We note that the OPERS Contributions provided by PTA on page 2 of both the 2022 and 2023 reports are not contributions to OPERS but rather the accrual-based OP&F GASB 68 and 75 expenses from OPERS – but we will continue to refer to them as OPERS Contributions to limit confusion. Below is a chart containing:

1. Total Administrative Expenses developed based on the PTA 1.03% assumption,
2. Net Administrative Expenses from page 2 of the PTA report, and
3. The Difference between 1 and 2, which is the implied amounts used by PTA for OPERS Contributions.

History of Administrative Expenses Base on PTA Assumptions			
Calendar Year	Total Administrative Expenses based on PTA 1.03% Assumption	Net Administrative Expenses per PTA and ORSC Staff	Implied OPERS Contributions Based on PTA Assumptions
2016	\$ 22,085,934	\$ 15,845,370	\$ 6,240,564
2017	22,399,070	15,792,367	6,606,703
2018	23,366,690	15,439,837	7,926,853
2019	24,365,802	16,404,715	7,961,087
2020	24,869,735	16,094,368	8,775,367
2021	26,129,069	18,701,965	7,427,104
2022	27,760,348	19,302,297	8,458,051

We note that the dollar amount of the Total Administrative Expenses based on the PTA assumption of 1.03% of OP&F membership payroll is not contained in either the PTA reports or in the public testimony made by PTA at the ORSC Board meetings. Similarly, the implied OPERS Contributions based on PTA Assumptions is not contained in either PTA reports or in public



testimony made by PTA at the ORSC Board meetings. CavMac asks that PTA confirm our development of these dollar amounts conforms with the amounts they used.

With the assistance of OP&F Staff, we have accumulated the actual OPERS Contributions – that is the amount that OP&F contributed to OPERS. As seen below, the implied OPERS Contributions based on PTA assumptions is over five times as large as the actual OPERS contributions made by OP&F over the period.

History of OPERS Contributions			
Calendar Year	Implied OPERS Contributions Based on PTA Assumptions	OPERS Contributions Actually Made per OP&F Staff	Ratio of PTA OPERS Contributions to Actual OPERS Contributions
2016	\$ 6,240,564	\$ 1,356,608	460%
2017	6,606,703	1,403,108	471%
2018	7,926,853	1,472,029	538%
2019	7,961,087	1,523,056	523%
2020	8,775,367	1,543,347	569%
2021	7,427,104	1,559,294	476%
2022	8,458,051	1,557,189	543%
Average	\$ 7,627,961	\$ 1,487,804	513%

The dollar amount of the overstatement ranges from \$4.8 to \$7.2 million per year.



Proposed OP&F Administrative Assumption

In order to be of assistance to the council and eliminate the distraction, we propose to refine the ACFR administrative assumption CavMac currently uses by replacing the accrual-based OP&F GASB 68 and 75 expenses from OPERS with the actual amount contributed by OP&F to OPERS for OP&F staff benefits for OP&F staff. The proposed administrative expense amount represents the amount of cash administrative expense for OP&F. The development is in the chart below:

Development of Proposed Administrative Expense Assumption				
Calendar Year	(a) Administrative Expense From ACFR	(b) OPERS GASB Expense	(c) OPERS Contributions Actually Made per OP&F Staff	Proposed Administrative Expense (a) - (b) + (c)
2016	\$ 19,517,891	\$ 3,672,521	\$ 1,356,608	\$ 17,201,978
2017	20,218,704	4,426,337	1,403,108	17,195,475
2018	16,780,220	1,340,383	1,472,029	16,911,866
2019	21,612,071	5,207,345	1,523,056	17,927,782
2020	19,218,035	3,123,667	1,543,347	17,637,715
2021	9,780,703	(8,921,262)	1,559,294	20,261,259
2022	12,810,009	(6,492,288)	1,557,189	20,859,486

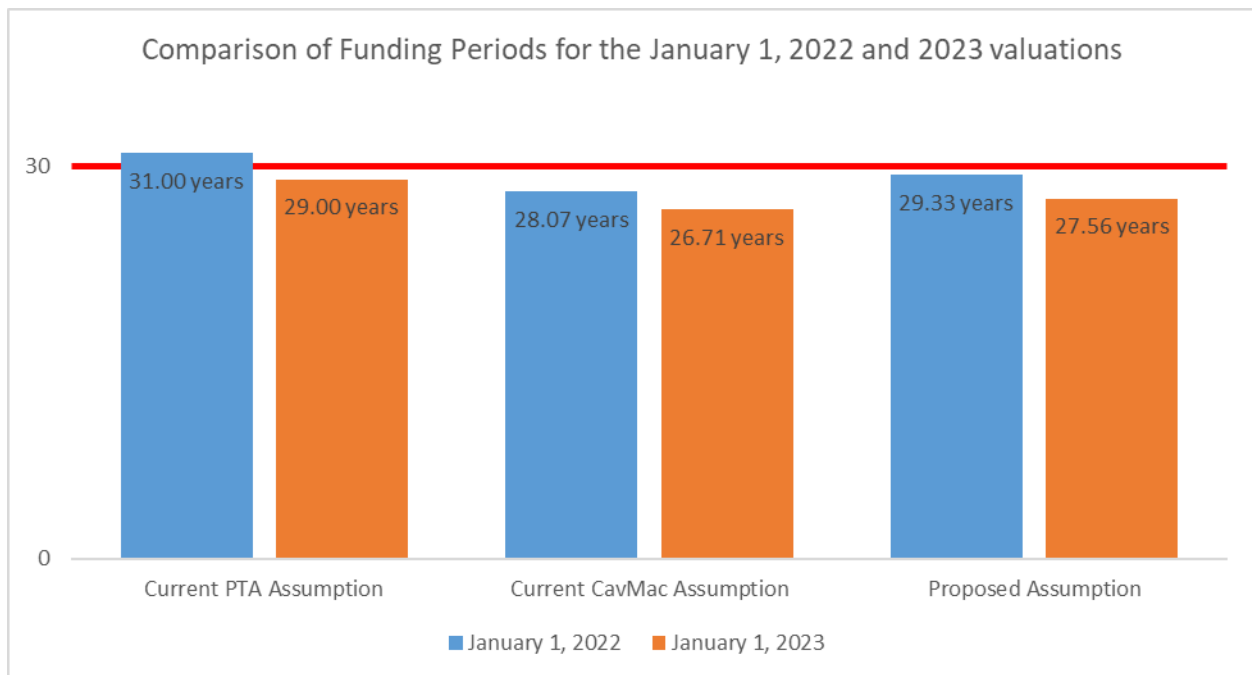
As seen below, neither the current PTA nor CavMac assumptions track the actual administrative expense above within a reasonable tolerance. The PTA 1.03% assumption consistently overstates the administrative expense and resulting funding period. By using actual numbers, the CavMac assumption both over and understates the amounts and resulting funding period.

Comparison of Current PTA and CavMac Assumptions to Proposed Assumption				
Calendar Year	Current PTA Administrative Expense Assumption	Ratio of PTA to Proposed Administrative Expense Assumption	Current CavMac Administrative Expense Assumption	Ratio of CavMac to Proposed Administrative Expense Assumption
2016	\$ 22,085,934	128%	\$ 19,517,891	113%
2017	22,399,070	130%	20,218,704	118%
2018	23,366,690	138%	16,780,220	99%
2019	24,365,802	136%	21,612,071	121%
2020	24,869,735	141%	19,218,035	109%
2021	26,129,069	129%	9,780,703	48%
2022	27,760,348	133%	12,810,009	61%
Average	\$ 24,425,235	134%	\$ 17,133,948	96%



The Funding Period for OP&F based on the Proposed Administrative Expense Assumption Continues to be Under 30 Years

Based on their administrative expense assumption of 1.03% of pay, PTA reports the OP&F Funding period is 31 years and 29 years as of January 1, 2022 and January 1, 2023 respectively. The funding period developed by CavMac based on the ACFR Administrative expense is 28.07 years and 26.71 years as of January 1, 2022 and January 1, 2023 respectively. Using the proposed administrative expense assumption, the OP&F funding period is 29.33 years and 27.56 years as of January 1, 2022 and January 1, 2023 respectively. The following graph illustrates these amounts.



Reflecting the proposed administrative expense assumption results in the same primary conclusion of the January 1, 2022 and January 1, 2023 CavMac Actuarial Valuation reports; the funding period for OP&F is under 30 years. Furthermore, for the ninth consecutive valuation, OP&F is under the 30-year threshold.

Ms. Mary Beth Foley
March 22, 2024
Page 6



Conclusion

Under any reasonable administrative expense assumption, OP&F continues to be under the 30-year funding threshold for the 2022 and 2023 valuations. We propose the refined administrative expense assumption detailed above. We will implement this change for the January 1, 2024 actuarial valuation.

Please feel free to call with any questions.

Sincerely,

A handwritten signature in blue ink, appearing to be 'LL' with a horizontal line underneath.

Larry Langer, ASA, EA, FCA, MAAA
Principal and Consulting Actuary

A handwritten signature in blue ink, appearing to be 'Wendy Ludbrook'.

Wendy Ludbrook, FSA, EA, FCA, MAAA
Consulting Actuary