

***OUTSTATE MICHIGAN TROWEL TRADES
PENSION PLAN***

***Preliminary Actuarial Valuation Report
For Plan Year Commencing
January 1, 2025***

May 1, 2025

Board of Trustees
Outstate Michigan Trowel Trades Pension Plan

Dear Trustees:

We have been retained by the Board of Trustees of the Outstate Michigan Trowel Trades Pension Plan to perform annual actuarial valuations of the pension plan. This report presents the preliminary results of our actuarial valuation for the plan year beginning January 1, 2025. The valuation results contained herein are based on current plan provisions summarized in Appendix A, the actuarial assumptions and methods listed in Appendix B, on cash flow from unaudited financial statements provided by TIC Midwest Administrative Solutions, and on the estimated 2024 asset return of 10.20% provided by the investment consultant. Participant data was provided by TIC Midwest Administrative Solutions. While we have reviewed the data for reasonableness in accordance with Actuarial Standards of Practice No. 23, we have not audited it. The data was relied on as being both accurate and comprehensive.

This report has been prepared in order to (1) assist the Trustees in evaluating the current actuarial position of the plan, (2) determine the minimum required and maximum deductible contribution amounts under Internal Revenue Code §431 and §404, (3) provide the fund's auditor with information necessary to comply with Accounting Standards Codification 960, and (4) document the plan's certified status under Internal Revenue Code §432 for the current year and provide the basis to certify such status for the subsequent year. In addition, information contained in this report will be used to prepare Schedule MB of Form 5500 that is filed annually with the IRS and could be used to calculate employer withdrawal liability. We are not responsible for the use of, or reliance upon, this report for any other purpose.

We have prepared this report in accordance with generally accepted actuarial principles and practices and have performed such tests as we considered necessary to assure the accuracy of the results. The results have been determined on the basis of actuarial assumptions that, in my opinion, are appropriate for the purposes of this report, are individually reasonable and in combination represent my best estimate of anticipated experience under the plan. Actuarial assumptions may be changed from previous valuations due to changes in mandated requirements, plan experience resulting in changes in expectations about the future, and/or other factors. An assumption change does not indicate that prior assumptions were unreasonable when made. For purposes of current liability calculations, assumptions are prescribed by regulation or statute. By relying on this valuation report, the Trustees confirm they have accepted the assumptions contained in the report.

The results are based on my best interpretation of existing laws and regulations and are subject to revision based on future regulatory or other guidance.

Future actuarial measurements may differ significantly from the current measurements presented in this report due to such factors as the following: plan experience differing from that anticipated by the economic or demographic assumptions, changes in economic or

demographic assumptions, increases or decreases expected as part of the natural operation of the methodology used for these measurements (such as the end of an amortization period or additional cost or contribution requirements based on the plan's funded status), and changes in plan provisions or applicable law.

United Actuarial Services, Inc. does not provide, nor charge for, investment, tax or legal advice. None of the comments made herein should be construed as constituting such advice. I am not aware of any direct or material indirect financial interest or relationship that could create a conflict of interest that would impair the objectivity of our work.

Please note this preliminary report uses unaudited financial statements and an estimated return provided by the investment consultant and is subject to change. At the time of this preliminary report, a draft audit has yet to be issued by Benda, Grace, Stulz & Company, P.C.

The undersigned actuary meets the Qualification Standards of the American Academy of Actuaries to render the actuarial opinion contained in this report. I am available to respond to any questions you may have about this report.

UNITED ACTUARIAL SERVICES, INC.

Enrolled Actuary



Paul Wedding, ASA, EA, MAAA
Consulting Actuary

TABLE OF CONTENTS

PART I: SUMMARY OF RESULTS	5
5 - Year Summary of Valuation Results	6
5 - Year Summary of Demographics	7
Changes From Prior Study	8
History of Major Assumptions	9
Experience vs. Assumptions	10
Plan Maturity	11
Unfunded Vested Benefits/Employer Withdrawal Liability	12
Contribution Allocation	13
Funding Standard Account Projection	14
Funded Ratio Projection	15
PPA Status Projection	16
Stochastic Projections	17
Sensitivity Analysis and Scenario/Stress Testing	18
 APPENDICES	
Plan Provisions	Appendix A
Actuarial Assumptions and Methods	Appendix B
Minimum Funding Amortization Bases	Appendix C
Summary of Rules Under PPA, MPRA and ARPA	Appendix D
Glossary of Common Pension Terms	Appendix E

PART I: SUMMARY OF RESULTS

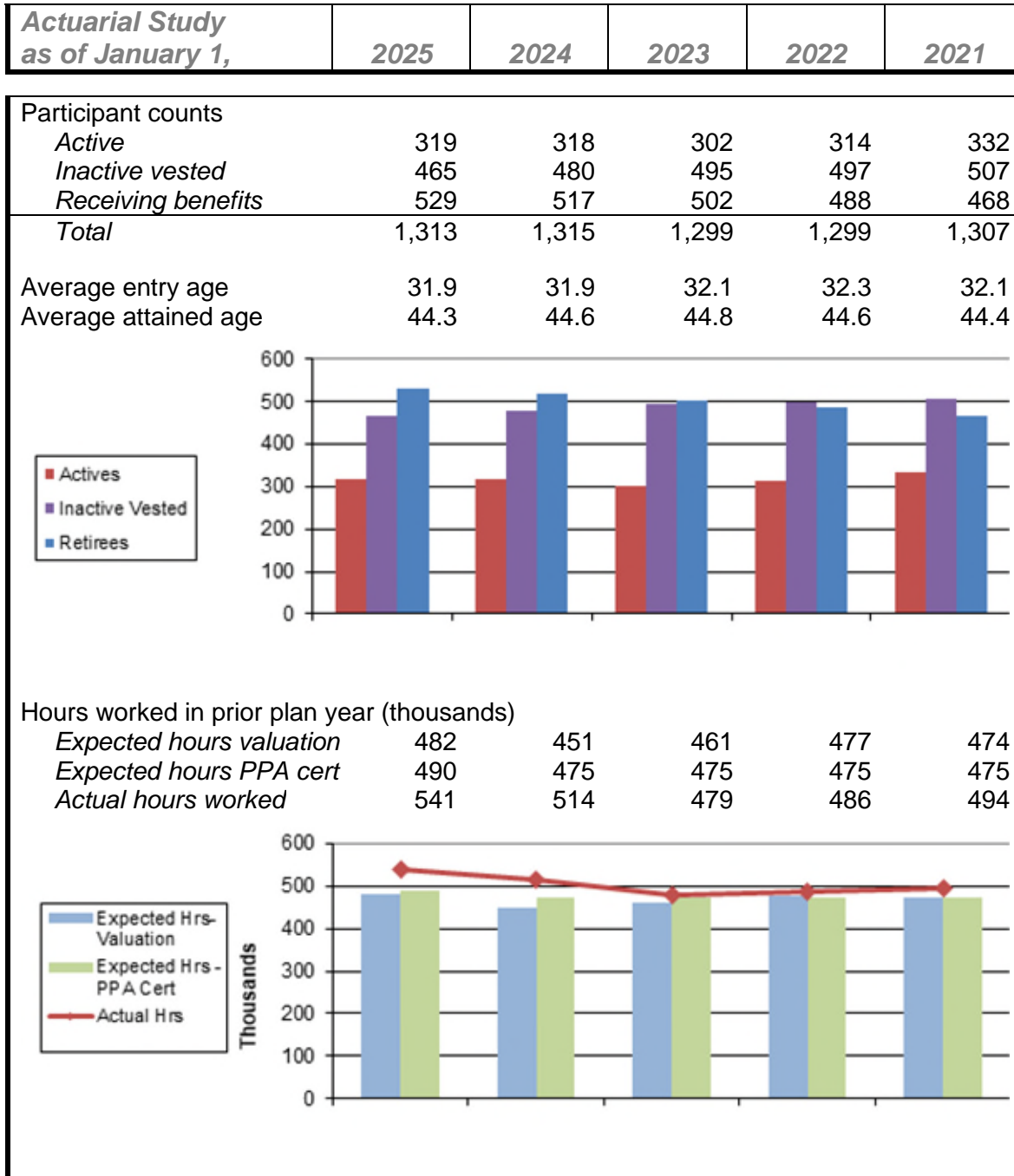
5 - YEAR SUMMARY OF VALUATION RESULTS

Actuarial Study as of January 1,	2025	2024	2023	2022	2021
PPA funded status	Safe	Safe	Safe	Safe	Safe
Improvements restricted*	Yes	Yes	Yes	Yes	Yes
Funded ratio					
<i>Valuation report (AVA)</i>	91.2%	90.4%	89.8%	91.7%	90.9%
<i>Valuation report (MVA)</i>	90.1%	86.1%	80.9%	95.7%	91.5%
<i>PPA certification (AVA)</i>	90.9%	89.8%	90.2%	93.7%	89.7%
Proj. year of insolvency	None	None	None	None	None
Credit balance (\$ 000)	16,172	16,844	17,369	16,743	16,025
Date of first projected funding deficiency (with extension)					
<i>Valuation report</i>	None	None	12/31/31	None	None
<i>PPA certification</i>	None	None	12/31/30	None	None
Net investment return					
<i>On market value</i>	10.20%	12.61%	-9.96%	12.65%	9.47%
<i>On actuarial value</i>	6.25%	6.31%	4.08%	8.85%	7.95%
Asset values (\$ 000)					
<i>Market</i>	87,022	81,193	73,992	84,345	76,374
<i>Actuarial</i>	88,134	85,215	82,100	80,890	75,836
Accum. ben. (\$ 000)	96,622	94,299	91,434	88,169	83,440

Year	Assets (Actuarial)	Assets (Market)	Accumulated Benefits
2021	75,836	76,374	83,440
2022	80,890	84,345	88,169
2023	82,100	73,992	91,434
2024	85,215	81,193	94,299
2025	88,134	87,022	96,622

* Benefit improvement restrictions due to fund having amortization extension. Restrictions will remain in place until 1/1/2038 when bases with amortization extension have been fully amortized.

5 - YEAR SUMMARY OF DEMOGRAPHICS



CHANGES FROM PRIOR STUDY

Changes in Plan Provisions

The plan provisions underlying this valuation are the same as those valued last year.

Changes in Actuarial Assumptions and Methods

The actuarial assumptions and methods used in this valuation differ from those used in the prior valuation in the following respects:

- The assumed retirement rates were changed according to the schedule in Appendix B to represent our best estimate of future retirement patterns based on recent plan experience.
- The assumed withdrawal rates were changed according to the schedule in Appendix B to represent our best estimate of future withdrawal patterns based on recent plan experience.
- The assumed disability rates were changed according to the schedule in Appendix B to represent our best estimate of future disablement patterns based on recent plan experience.
- The assumed operational expenses were increased from \$241,644 to \$310,000 for the 2024-25 plan year and an assumed 2.50% annual increase continues to apply to reflect our best estimate of future expenses based on recent plan experience and expected inflationary increases.
- The assumed future hours worked were increased from 1,250 hours to 1,300 hours per future year for non-vested active lives and remained at 1,650 for vested active lives. This represents our best estimate of future hours based on recent plan experience.
- The current liability interest rate was changed from 2.77% to 3.35%. The new rate is within established statutory guidelines.

HISTORY OF MAJOR ASSUMPTIONS

Assumption	Actuarial Study as of January 1,				
	2025	2024	2023	2022	2021
Future rate of net investment return	7.50%	7.50%	7.50%	7.50%	7.75%
Mortality table	PRI-2012	PRI-2012	PRI-2012	PRI-2012	PRI-2012
<i>Adjustment</i>	110%M/ 105%F	110% M/ 105% F	105% M/ 95% F	105% M/ 95% F	100% M/ 95% F
<i>Projection scale</i>	MP-2021	MP-2021	MP-2021	MP-2021	MP-2020
Future expenses					
<i>Initial year</i>	\$310,000	\$235,750	\$230,000	\$240,000	\$240,000
<i>Annual increase</i>	2.50%	2.50%	2.50%	0.00%	0.00%
Average future hourly contribution rate*					
<i>Credited</i>	\$4.43	\$4.47	\$4.45	\$4.43	\$4.39
<i>Non-credited</i>	<u>2.62</u>	<u>2.62</u>	<u>2.52</u>	<u>2.22</u>	<u>2.22</u>
<i>Total</i>	\$7.05	\$7.09	\$6.97	\$6.65	\$6.61
Average future annual hours					
<i>Vested</i>	1,650	1,650	1,600	1,600	1,550
<i>Non-vested</i>	1,300	1,250	1,225	1,200	1,200
Assumptions used for projections					
<i>Return, first 10 years</i>	7.25%	7.25%	7.25%	6.75%	6.75%
<i>Annual hours (000)</i>	490	490	490	475	475

* Actual average derived from application of assumptions specified in Appendix B.

EXPERIENCE VS. ASSUMPTIONS

Comparing the prior year's experience to assumptions provides indications as to why overall results may differ from those expected

Actuarial assumptions are used to project certain future events related to the pension plan (e.g. deaths, withdrawals, investment income, expenses, etc.). While actual results for a single plan year will rarely match expected experience, it is intended that the assumptions will provide a reasonable long term estimate of developing experience.

The following table provides a comparison of expected outcomes for the prior plan year with the actual experience observed during the same period. This display may provide insight as to why the plan's overall actuarial position may be different from expected.

<i>Plan Year Ending December 31, 2024</i>	<i>Expected</i>	<i>Actual</i>
Decrements		
<i>Terminations</i>		43
less: <i>Rehires</i>		14
<i>Terminations (net of rehires)</i>	26.8	29
<i>Active retirements</i>	13.9	11
<i>Active disabilities</i>	1.7	-
<i>Pre-retirement deaths</i>	4.5	4
<i>Post-retirement deaths</i>	22.0	26
<i>Monthly benefits of deceased retirees</i>	\$ 15,901	\$ 20,688
Financial assumptions		
<i>Rate of net investment return on actuarial value</i>	7.50%	6.25%
<i>Administrative expenses</i>	\$ 235,750	\$ 262,586
Other demographic assumptions		
<i>Average retirement age from active (new retirees)</i>	61.3	60.7
<i>Average retirement age from inactive (new retirees)*</i>	62.1	63.9
<i>Average entry age (new entrants)</i>	31.9	32.7
<i>Hours worked per vested active</i>	1,650	1,760
<i>Hours worked per non-vested active</i>	1,250	1,428
<i>Total hours worked (valuation assumption)</i>	482,050	540,730
<i>Total hours worked (PPA certification assumption)</i>	490,000	540,730
Unfunded liability (gain)/loss		
<i>(Gain)/loss due to asset experience</i>		\$ 1,050,232
<i>(Gain)/loss due to liability experience</i>		298,862
<i>Total (gain)/loss</i>		\$ 1,349,094

* Expected average based on the average for the total group of participants.

PLAN MATURITY

Measures of plan maturity can play a part in understanding risk and a plan's ability to recover from adverse experience

When a new pension plan is first established, its liabilities are typically limited to active plan participants. However, as people become vested and retire, a plan begins to develop liabilities attributable to nonactive participants (retirees and inactive vested participants). The process of adding nonactive liabilities (often referred to as "maturing")

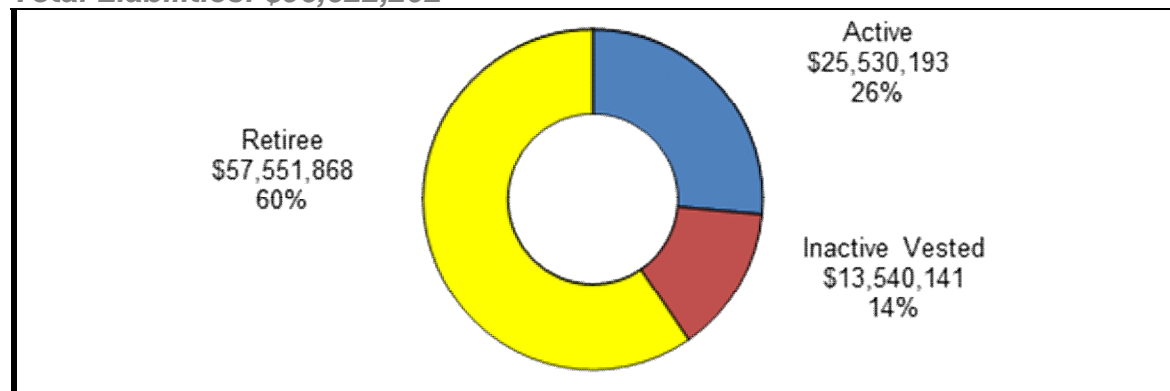
is a natural outgrowth of the operation of the plan. As a plan matures, its liabilities tend to balloon in relation to its contribution base, making it more difficult to correct for adverse outcomes by increasing contribution rates or reducing future benefit accruals.

Headcount ratios show the number of retired or inactive participants supported by each active participant. While there is no hard and fast rule, we generally consider a plan to be mature if each active is supporting more than 1 retiree or more than 2 nonactives. A negative net cash flow (benefits payments and expenses greater than contributions) can also be an indicator of a mature plan. A negative cash flow, when expressed as a percentage of assets, in excess of the assumed rate of return on fund assets may not be sustainable in the long term.

Actuarial Study as of January 1,	2025	2024	2023	2022	2021
Retiree/active headcount ratio	1.66	1.63	1.66	1.55	1.41
Nonactive/active headcount ratio	3.12	3.14	3.30	3.14	2.94
Cash flow					
Contr.-ben.-exp. (\$000)	(2,335)	(2,007)	(2,051)	(1,590)	(1,713)
Percent of assets	-2.68%	-2.47%	-2.77%	-1.88%	-2.24%

Liabilities of Actives, Retirees, and Inactive Vesteds

Total Liabilities: \$96,622,202



UNFUNDED VESTED BENEFITS/EMPLOYER WITHDRAWAL LIABILITY

An employer withdrawing during the coming year may have withdrawal liability

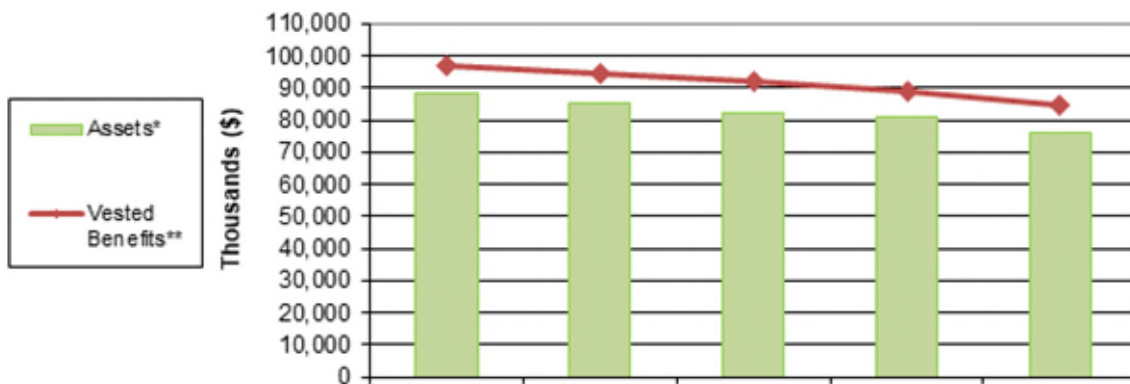
The following table shows a history of the plan's unfunded vested benefits (UVB) required to compute a specific employer withdrawal liability under the presumptive method. If all unfunded vested benefits since the inception of the

Multiemployer Pension Plan Amendments Act of 1980 (MPPAA) are zero (\$0) or less, there will be no withdrawal liability assessed to a withdrawing employer. Otherwise, an employer may be assessed withdrawal liability payments pursuant to MPPAA. The display does not reflect adjustments for prior employer withdrawals.

In accordance with IRC Section 432(e)(9)(A) and PBGC Technical Update 10-3, the impact of reducing adjustable benefits is reflected by adding the unamortized portion of the value of affected benefits (VAB) to the most recent year's unfunded vested benefits pool. An employer who is assessed withdrawal liability will be assessed a portion of the UVB and the VAB.

Presumptive Method (\$ 000)

December 31,	2024	2023	2022	2021	2020
Vested benefits interest	7.50%	7.50%	7.50%	7.50%	7.75%
Vested benefits	94,364	91,677	89,076	85,787	81,209
less: Asset value*	88,134	85,215	82,100	80,890	75,836
UVB	6,230	6,462	6,976	4,897	5,373
Unamortized VAB	2,618	2,893	3,147	3,384	3,603
UVB + VAB	8,848	9,355	10,123	8,281	8,976



* Actuarial value

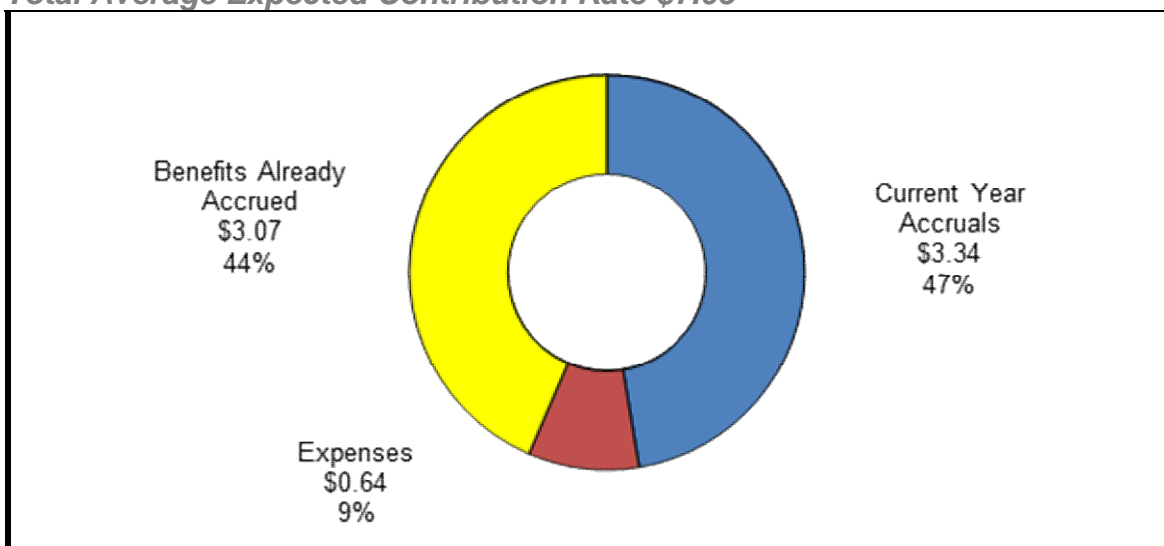
** Includes VAB

CONTRIBUTION ALLOCATION

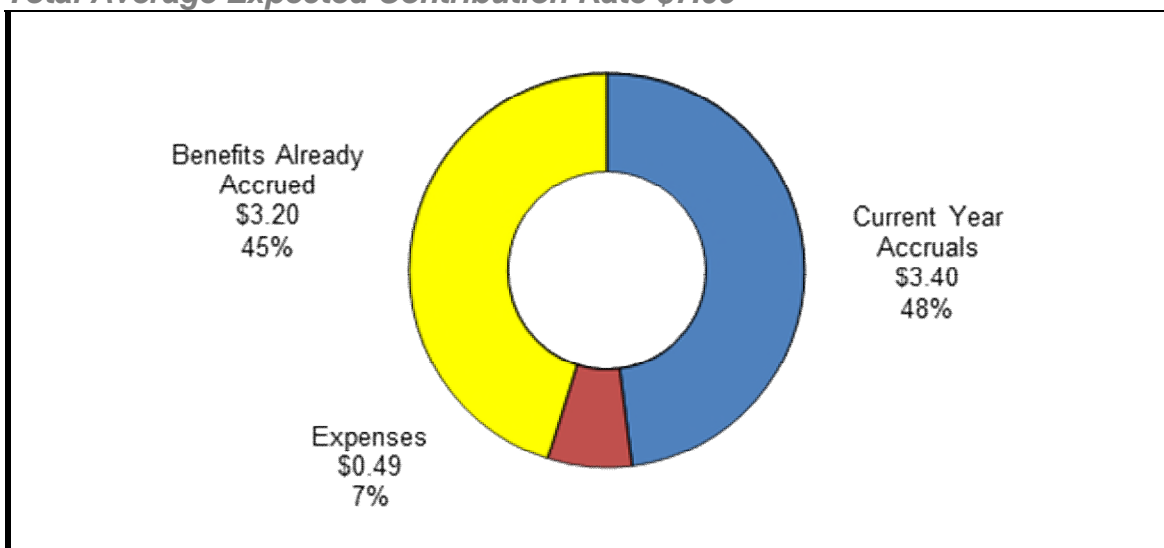
These graphs show how the contributions are being spent

The following allocation charts illustrate how the expected contribution rate for the coming plan year will be “spent” to pay for benefits being earned in the current year, plan expenses, and funding of past unfunded liabilities.

Contribution Allocation as of January 1, 2025
Total Average Expected Contribution Rate \$7.05



Contribution Allocation as of January 1, 2024
Total Average Expected Contribution Rate \$7.09



FUNDING STANDARD ACCOUNT PROJECTION

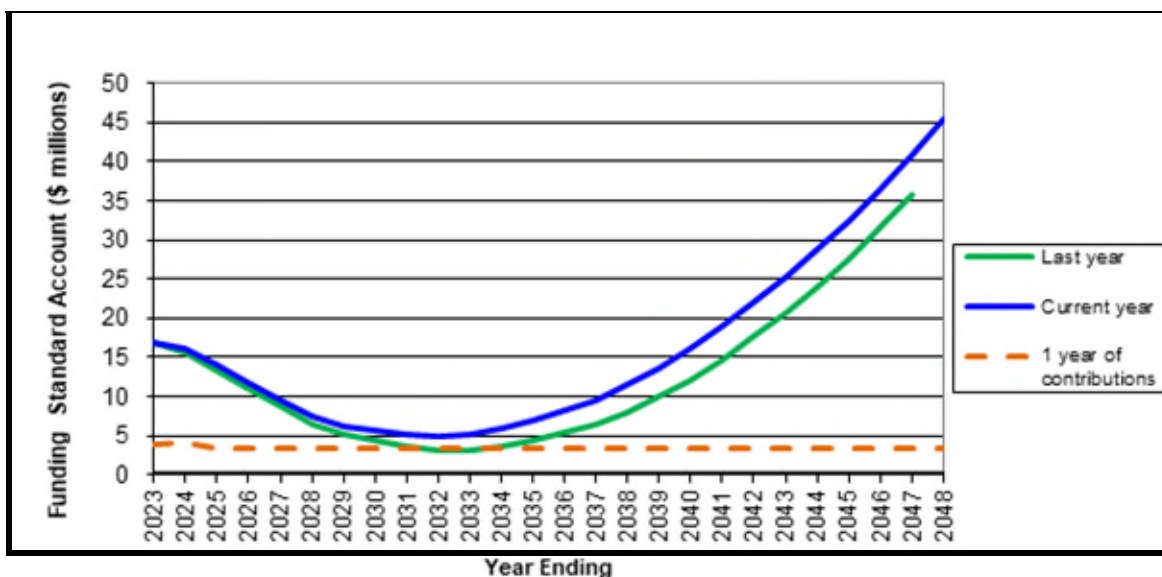
The funding standard account projection is a major driver of PPA status

The funding standard account (FSA) was established by ERISA as a means of determining compliance with minimum funding standards. The FSA is hypothetical in the sense that it does not represent actual assets held by a custodian.

Rather, a positive FSA balance (called a “credit balance”) means that the plan has exceeded minimum funding standards on a cumulative basis, while a negative balance (called a “funding deficiency”) means that the plan has fallen short of such standards.

Actuaries must project the plan’s FSA each year in order to determine PPA status. If a funding deficiency is projected in a future year, the plan could be forced into yellow (endangered) or red (critical) status depending how far into the future the first projected funding deficiency is. The plan’s FSA projection appears below. These projections are based on the assumptions summarized in the “Actuarial Assumptions used for Projections” section of Appendix B.

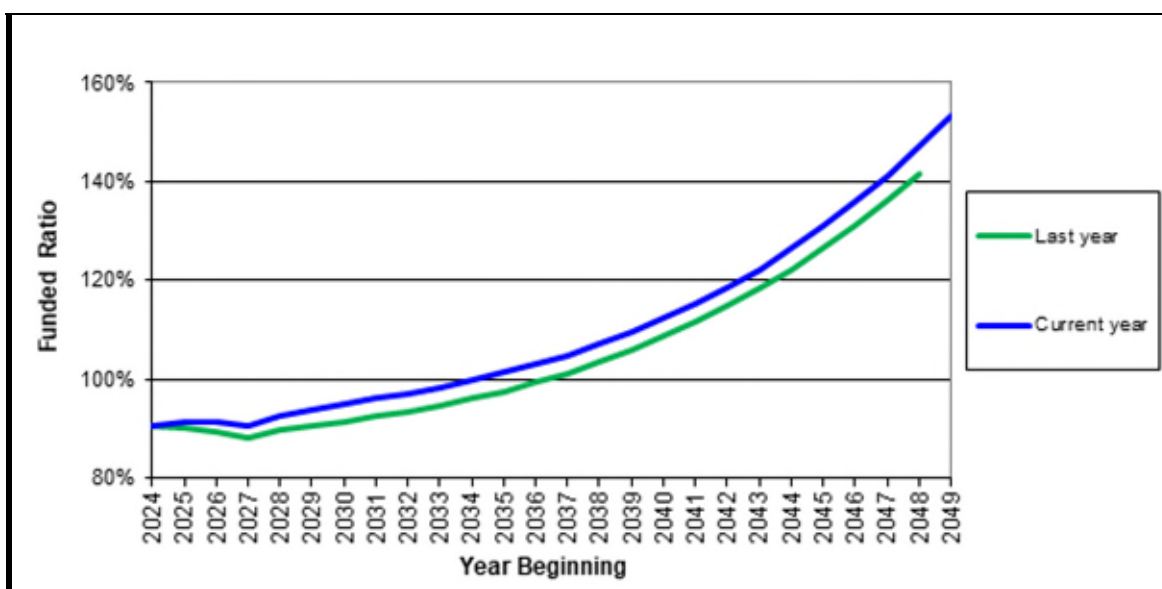
As a rule of thumb, UAS recommends in non-Critical status year that plans maintain a projected credit balance of at least one year’s contributions (shown as an orange dotted line in the graph below) in each future year. Maintaining a “cushion” in the Funding Standard Account helps minimize the risk of a surprise funding deficiency at the end of a non-Critical status plan year. Such a deficiency could trigger an excise tax payable directly by employers. If the Plan is in Critical status at the start of plan year, it is protected from these excise taxes so long as scheduled progress has been satisfied in at least one of the past three plan years.



FUNDED RATIO PROJECTION

The plan's funded ratio is a major driver of PPA status

The funded ratio is defined as the actuarial value of plan assets divided by the plan's liabilities for accrued benefits. Along with the funding standard account projection, funded ratio is one of the two major drivers of PPA funded status. In order for a plan to enter the green zone (also called "safe") the funded ratio must be at least 80%. An insolvency, which is the plan year when the plan would run out of money, occurs if the funded ratio is projected to be 0%. In order for a plan to enter critical and declining status, an insolvency needs to be projected within 20 plan years of the PPA certification (it may need to be within 15 years under certain conditions) and they must meet one of the initial critical tests. The projection of the funded ratio appears below. These projections are based on the assumptions summarized in the "Actuarial Assumptions used for Projections" section of Appendix B.



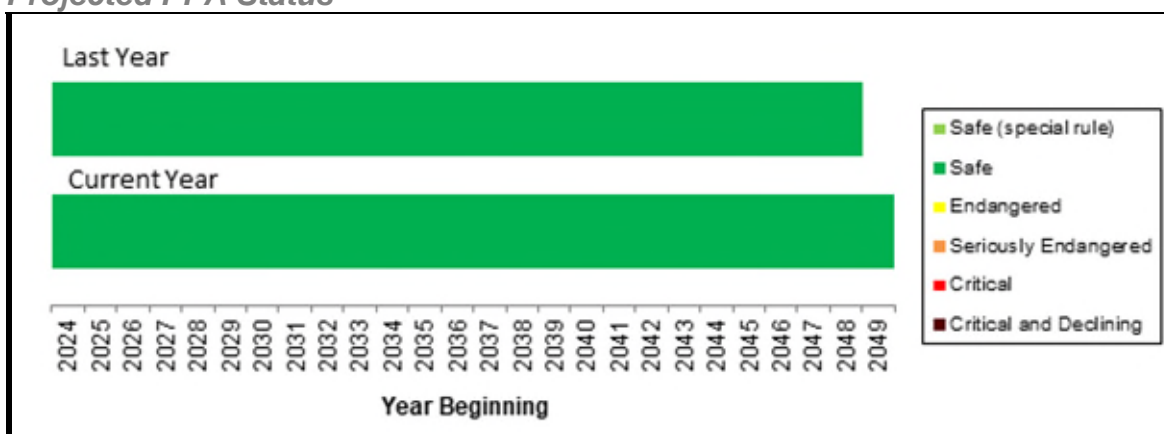
PPA STATUS PROJECTION

A plan that is not in green (i.e. safe) zone is subject to additional requirements and restrictions

The following graph shows the projection of PPA status based on the assumptions summarized in the “Actuarial Assumptions used for Projections” section of Appendix B. The projection is based on the current plan

and does not assume any changes in plan provisions or contribution rates, even if the plan moves to a worse PPA zone.

Projected PPA Status



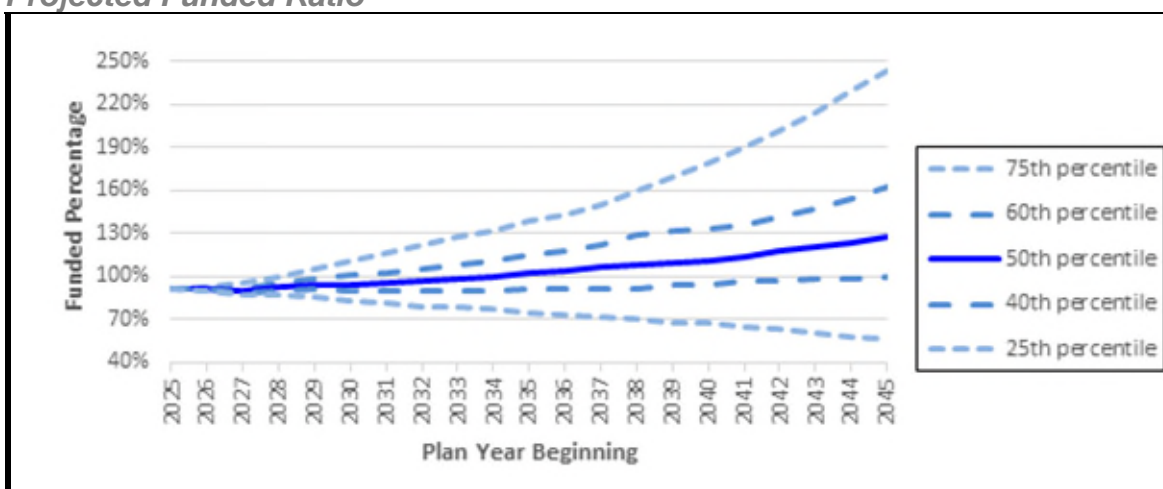
STOCHASTIC PROJECTIONS

Stochastic projections show the probability of being in a certain status or the projected percentiles of funded ratio.

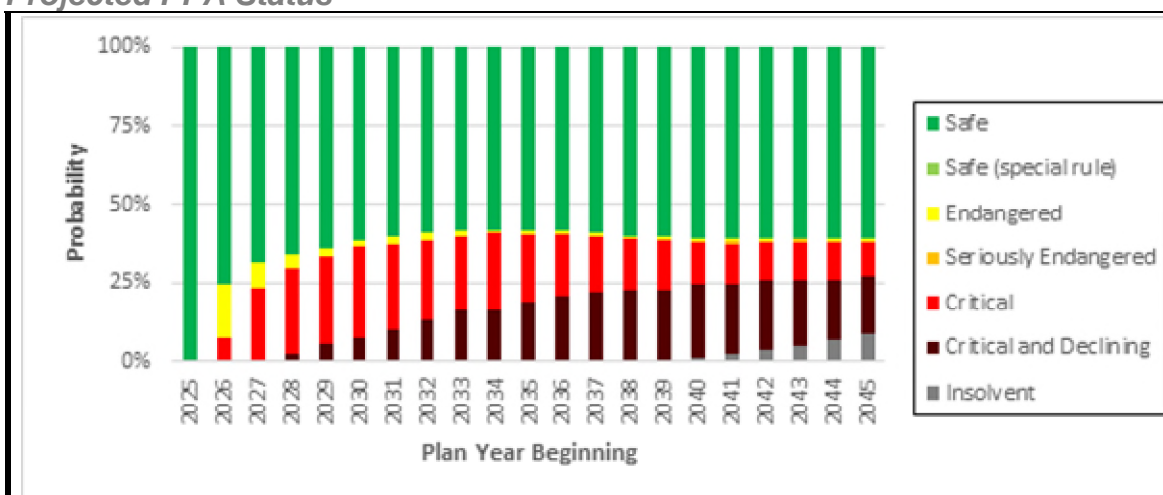
The stochastic projections below show the estimated probability of being in each status and the projected percentiles of funded ratios based on the assumptions summarized in the “Actuarial Assumptions used for Projections” section of Appendix B.

The projections are based on the current plan and do not assume any changes in plan provisions or contribution rates, even if the plan moves to a worse PPA zone. The distribution of returns is based on the mean and standard deviation of the Plan’s investment portfolio. This illustrates the projected impact of the Plan’s investment risk. The mean for years 1-10 is based on short-term expectations, while the mean for years 11-20 is based on long-term expectations.

Projected Funded Ratio



Projected PPA Status



SENSITIVITY ANALYSIS AND SCENARIO/STRESS TESTING

Sensitivity analysis along with scenario and stress testing can help Trustees gauge a plan's key risks

Sensitivity analysis studies the funding impact to the plan when a given assumption changes. *Scenario testing* studies the funding impact from actual experience for one or more possible outcomes. *Stress testing* studies the funding impact from poor experience. The sensitivity analysis

along with the scenario and stress testing below can be used to gauge a plan's key risks from investments and hours.

Currently, the plan is projected to be 100% funded by 2035, is projected to have no unfunded vested benefits in 2033, and is projected to have no funding deficiencies. In the table below we use these results to perform scenario and stress testing on the investment return assumption by assuming asset returns for the 2025 plan year of 16.70%, 7.25%, and -2.20%. The 7.25% return represents the assumed short-term return on assets over the next 10 years. The other two returns are 75% of one standard deviation from the expected return. Statistically, the return has about a 55% probability of being within this range for the year. We also perform sensitivity analysis on the future hours assumption by showing the effect of varying it by $\pm 5\%$. We also show the minimum return in the 2025 plan year needed for the plan to project no deficiencies and the Safe or green zone in all future years.

Key Funding Statistics (without rate increases) and Non-Credited Rate Increase Needed on June 1, 2025 to Project No Funding Deficiencies

Assumptions	Funding Stats	Scenario Testing: Return for 2025 PY then 7.25% until 2034 and 7.50% thereafter			Minimum 2025 Return to Project Green in All Years
		16.70%	7.25%	-2.20%	

<u>5% Lower Hours</u> 465,500 in 2024 and thereafter	100% Funded: No UVB: Proj. Deficiency: Increase:	2029 2032 None None	2036 2033 None None	2051 2049 2031 79¢	3%
<u>Baseline Hours</u> 490,000 in 2024 and thereafter	100% Funded: No UVB: Proj. Deficiency: Increase:	2029 2032 None None	2035 2033 None None	2047 2045 2032 54¢	2%
<u>5% Higher Hours</u> 514,500 in 2024 and thereafter	100% Funded: No UVB: Proj. Deficiency: Increase:	2029 2032 None None	2034 2032 None None	2045 2043 2032 30¢	0%

SENSITIVITY ANALYSIS AND SCENARIO/STRESS TESTING (CONT.)

More action can be taken in any funding result to provide an even bigger “cushion” against future losses. There are other possible solutions besides the provided contribution rate increase schedule shown above, including different lengths of contribution rate increases. Benefit reductions could also be added to lower or eliminate the necessary contribution rate increases.

All actions taken to eliminate projected funding deficiencies need to be in place until the credit balance projection is past its low point. This is about 15 years out. Asset gains or strong hours could speed up this timeframe.

APPENDICES

PLAN HISTORY

Origins/Purpose

The Outstate Michigan Trowel Trades Pension Plan was established January 1, 1972 as a result of a merger between the Pension Plans of the Outstate O.P.C.M.I.A. (which was established May 1, 1963) and the Michigan Highway Construction Industry Cement Masons' Pension Plan (which was established September 1, 1965).

The Pension Plan is managed under the provisions of the Labor Management Relations Act by a Board of Trustees consisting of an equal number of representatives from Labor and from Management.

The purpose of the Pension Plan is to provide Normal and Early Retirement Benefits, Joint and Survivor Benefits, Total and Permanent Disability Benefits, Vested Benefits and Death Benefits.

Employer Contributions

The Pension Plan is financed entirely by contributions from the employers as specified in the applicable Collective Bargaining Agreements. Following is a history of recent hourly contribution rates in effect for each local and craft.

<i>Local</i>	<i>Craft</i>	<i>Hourly Contribution Rate*</i>	<i>Effective Date</i>
Benton Harbor/St. Joe	D0	\$ 7.72	June 1, 2023
Big Rapids	E0	\$ 7.22	June 1, 2023
Flint	F0	\$ 7.72	June 1, 2023
Grand Rapids/Muskegon	H1	\$ 7.62	June 1, 2023
Highway Construction Zone 1	H0	\$ 6.55	June 1, 2023
Highway Construction Zone 2	H0	\$ 6.55	June 1, 2023
Kalamazoo/Battle Creek	I0	\$ 7.67	June 1, 2023
Lansing/Jackson	J0	\$ 7.72	June 1, 2023
Lapeer	K0	\$ 7.72	June 1, 2023
Saginaw	M0	\$ 7.22	June 1, 2023
Traverse City	N0	\$ 7.22	June 1, 2023
Upper Peninsula	O0/P0	4.97\$ 8.27	June 1, 2023
Southwest	P0	\$ 8.17	June 1, 2023
Lansing/Jackson	P0	\$ 8.27	June 1, 2023
Flint	P0	\$ 8.62	June 1, 2023
Saginaw/Bay City	P0	\$ 8.27	June 1, 2023

* These rates include \$2.62 of non-credited contribution.

Reciprocity

The Trustees have entered into Money Follows the Man Reciprocity Agreements with the Trustees of several other Pension Plans. The Trustees have also entered into a Pro-Rata Reciprocity Agreement with the Operative Plasterers' and Cement Masons International Association of the United States and Canada, the Michigan BAC Pension Plan, and the Michigan Laborers' Pension Plan.

SUMMARY OF PLAN PROVISIONS

Plan year	The 12-month period beginning January 1 and ending the following December 31.
Participation	12 consecutive month period with 500 hours.
Year of service	Plan Year with at least 500 hours.
Break in service	Plan Year with less than 500 hours.
Active participant	A participant who has not become a retired, deceased or disabled participant and who has not suffered a permanent break in service and who <i>has</i> accrued at least one year of service in either the current plan year at the time of reference or in either of the two preceding plan years.
Inactive participant	A participant who has not become a retired, deceased or disabled participant and who has not suffered a permanent break in service and who has <i>not</i> accrued at least one year of service in either the current plan year at the time of reference or in either of the two preceding plan years.
Normal retirement benefit	
<i>Eligibility</i>	Age 65 or 5 th anniversary of participation, if later.
<i>Monthly amount</i>	Accrued benefit as of January 1, 1976; plus 3.60% of contributions for the period January 1, 1976 through December 31, 2003; plus 1.70% of contributions for the period January 1, 2004 through May 31, 2008; plus 1.70% of credited contributions thereafter. Payable for life. No future service credit is given for less than 300 hours of work in plan years 1976-2010. No future service credit is given for less than 500 hours of work in plan years 2011 and after. This requirement does not apply during participant's initial or last year of participation before retirement.
Early retirement benefit	
<i>Eligibility</i>	Age 55 and 10 years of service. Retired from active status
<i>Monthly amount</i>	Normal, reduced by ½ of 1% for each month under age 62 (reduction is calculated from age 58 if participant has 25 or more years of service). Payable for life.

SUMMARY OF PLAN PROVISIONS (CONT.)

Total and permanent disability benefit	
<i>Eligibility</i>	Disabled while active.
<i>Monthly amount</i>	10 + years of service: 75% of normal payable until the earlier of age 65, recovery or death. Normal at age 65.
<i>or</i>	
<i>Single sum amount</i>	Less than 10 years of service: Greater of 75% of contributions for which participant received any special or future service credit or the single sum actuarial equivalent of the basic vested benefit.
Vested benefit	
<i>Eligibility</i>	Terminated. 5 years of service.
<i>Monthly amount</i>	Deferred normal or early, if eligible. Payable for life.
Vested early benefit	
<i>Eligibility</i>	Terminated. 10 years of service.
<i>Monthly amount</i>	Normal reduced by an actuarial equivalent factor for each month under age 65.
Optional forms of payment	<ul style="list-style-type: none"> • Joint and 50% survivor (with popup)* • Joint and 75% survivor (with popup)* • Joint and 100% survivor (with popup)* • Life with 10 years guaranteed
	* Effective June 1, 2016, inactive vested participants who retire will no longer receive the "pop up" feature.
Pre-retirement single sum death benefit	
<i>Eligibility</i>	Death of active, disabled, or inactive vested participant who is ineligible for surviving spouse benefit and who has not yet received any retirement benefits.
<i>Single sum amount</i>	75% of contributions payable to beneficiary of active or disabled participant. 50% of contributions payable to beneficiary of inactive vested participant.

SUMMARY OF PLAN PROVISIONS (CONT.)

Pre-retirement surviving spouse benefit

Eligibility

Death of vested participant with eligible spouse.

Monthly amount

75% of participant's joint and 75% survivor benefit (50% of participant's joint and 50% survivor benefit for inactive vested participants). Payable to spouse for life beginning at earliest retirement age of participant. Spouse may elect single sum death benefit.

Post-retirement death benefit

Eligibility

Death of participant receiving normal, early or vested benefits. Not eligible if receiving joint and survivor.

Single sum amount

Pre-retirement single sum death less benefits paid to participant. Payable to beneficiary.

HISTORICAL PLAN MODIFICATIONS

Special and future service credit/Retiree increase	
<i>Effective date</i>	January 1, 1998
<i>Adoption date</i>	August 18, 1997
<i>Provisions</i>	The special and future service credit was increased from 3.30% to 3.45% and the lives receiving benefits received a 4½% increase.
Vesting eligibility	
<i>Effective date</i>	January 1, 1998
<i>Adoption date</i>	August 18, 1997
<i>Provisions</i>	Eligibility for vesting changed from a 5/10 year graded scale to 100% after 5 years of vesting service for active participants who earn at least one hour of service on or after January 1, 1998.
Special and future service credit/Retiree increase	
<i>Effective date</i>	January 1, 1999
<i>Adoption date</i>	May 6, 1998
<i>Provisions</i>	The special and future service credit was increased from 3.45% to 3.55% and the lives receiving benefits received a 3% increase.
Special and future service credit/Retiree increase	
<i>Effective date</i>	January 1, 2000
<i>Adoption date</i>	January 20, 2000
<i>Provisions</i>	The special and future service credit was increased from 3.55% to 3.60% and the lives receiving benefits received a 2% increase.

HISTORICAL PLAN MODIFICATIONS (CONT.)

Early retirement benefit	
<i>Effective date</i>	January 1, 2000
<i>Adoption date</i>	January 20, 2000
<i>Provisions</i>	The early retirement benefit was improved by changing the plan so that the early retirement reduction factor is calculated from age 60 if the participant has 25 or more years of service. If the participant does not meet the 25-year requirement, the reduction factor is calculated from age 62.
New optional forms	
<i>Effective date</i>	January 1, 2000
<i>Adoption date</i>	January 20, 2000
<i>Provisions</i>	Joint and 75% survivor, joint and 100% survivor and life with 10-years certain annuities were added as optional forms of payment under the plan.
Early retirement benefit	
<i>Effective date</i>	January 1, 2001
<i>Adoption date</i>	January 23, 2001
<i>Provisions</i>	The early retirement benefit was improved by changing the plan so that the early retirement reduction factor is calculated from age 58 if the participant has 25 or more years of service. If the participant does not meet the 25-year requirement, the reduction factor is calculated from age 62.
Special and future service credit/Retiree increase	
<i>Effective date</i>	January 1, 2004
<i>Adoption date</i>	December 20, 2002
<i>Provisions</i>	The special and future service credit was changed from 3.60% to 1.70% for accruals on and after January 1, 2004.

HISTORICAL PLAN MODIFICATIONS (CONT.)

Pre-retirement surviving spouse benefit	
<i>Effective date</i>	January 1, 2007
<i>Adoption date</i>	June 12, 2008
<i>Provisions</i>	The Plan's Qualified Pre-Retirement Survivor Annuity Benefit (QPSA) was increased from 50% to 75%. Further, the age reduction has been eliminated.
Disability benefit	
<i>Effective date</i>	January 1, 2011
<i>Adoption date</i>	October 27, 2010
<i>Provisions</i>	Disability benefits retroactive to the date of disablement have been eliminated. The disability benefit has also been lowered from 100% to 75% of the participant's accrued benefit, for disabilities beginning on or after January 1, 2011.
Benefit accrual and service year	
<i>Effective date</i>	January 1, 2011
<i>Adoption date</i>	October 27, 2010
<i>Provisions</i>	The hours requirement for a year of service and benefit accrual was increased from 300 to 500 hours.
Early Retirement Reduction Factor	
<i>Effective date</i>	June 1, 2016
<i>Adoption date</i>	April 18, 2016
<i>Provisions</i>	For inactive participants retiring on or after June 1, 2016, the early retirement factor was changed from ½ of 1% for each month before age 62 to an actuarial equivalent factor for each month before age 65.

HISTORICAL PLAN MODIFICATIONS (CONT.)

Pre-Retirement Survivor Annuity	
<i>Effective date</i>	June 1, 2016
<i>Adoption date</i>	April 18, 2016
<i>Provisions</i>	The 75% Pre-Retirement Survivor Annuity for surviving spouses was replaced with a 50% Pre-Retirement survivor annuity for inactive vested participants.
Single sum death benefit	
<i>Effective date</i>	June 1, 2016
<i>Adoption date</i>	April 18, 2016
<i>Provisions</i>	The pre-retirement single sum death benefit payable following the death of an inactive participant was eliminated for inactive vested participants.
“Pop-Up” on Joint and Survivor	
<i>Effective date</i>	June 1, 2016
<i>Adoption date</i>	April 18, 2016
<i>Provisions</i>	The “Pop-Up” feature on Joint and Survivor Benefits was eliminated for inactive vested participants.
Single sum death benefit	
<i>Effective date</i>	October 1, 2018
<i>Adoption date</i>	December 5, 2018
<i>Single sum amount</i>	A pre-retirement single sum death benefit payable following the death of an inactive vested participant was added to the plan, payable immediately to the beneficiary at 50% of contributions.

ACTUARIAL ASSUMPTIONS

The following assumptions are used throughout this report except as specifically noted herein.

Valuation date	January 1, 2025
Interest rates	
<i>ERISA rate of return used to value liabilities</i>	7.50% per year net of investment expenses
<i>Unfunded vested benefits</i>	7.50% per year net of investment expenses
<i>Current liability</i>	3.35% (in accordance with Section 431(c)(6) of the Internal Revenue Code)
<i>Lump sum disability benefit</i>	<p>417(e) lump sum segment rates in effect 1 month before the valuation date. As of December 1, 2024, the segment rates were:</p> <ul style="list-style-type: none"> • 4.65% for payments scheduled in the first five years out, • 5.28% for payments in the next 15 years out, • 5.63% for payments scheduled more than 20 years out.
Operational expenses	
<i>Funding</i>	\$310,000 in the 2025 plan year excluding investment expenses, increasing 2.5% per year.
<i>ASC 960</i>	A 4.25% load was applied to the accrued liabilities for 2025 (4.25% for 2024).
Loading for pop-up feature	<p>Liabilities for non-retired active participants' benefits to be paid after retirement increased 0.7%.</p> <p>Retirees receiving a joint and survivor form of benefit have pop-up amounts provided by the administrator. If a pop-up amount has not been provided, their liability has been increased 1.8%.</p>

ACTUARIAL ASSUMPTIONS (CONT.)

Mortality

Assumed plan mortality

The PRI-2012 Blue Collar Mortality Tables for employees and healthy annuitants projected forward using the MP-2021 projection scale. For male annuitants, a 110% multiplier was used. For female annuitants, a 105% multiplier was used.

Current liability

Separate annuitant and non-annuitant rates based on the RP-2000 Mortality Tables Report developed for males and females as prescribed by Section 431(c)(6) of the Internal Revenue Code.

Withdrawal

T-5 Turnover Table from The Actuary's Pension Handbook (less GAM 51 mortality) – specimen rates shown below. Assumed rate during second of employment is 30%* and 20% for the next three years.

Withdrawal	
<u>Age</u>	<u>Rate</u>
25	.0772
30	.0722
35	.0628
40	.0515
45	.0398
50	.0256
55	.0094

No withdrawal assumed after participant reaches early retirement age.

* All newly reported participants are considered to have already worked their first year of employment.

Appendix B - Actuarial Assumptions and Methods
Outstate Michigan Trowel Trades Pension Plan
January 1, 2025 Preliminary Actuarial Valuation

ACTUARIAL ASSUMPTIONS (CONT.)

Disability	75% of 1964 OASDI Disability Table for males. Specimen rates shown below:		
	Age	Disability Rate	
	25	.0006	
	30	.0008	
	35	.0011	
	40	.0017	
	45	.0027	
	50	.0045	
	55	.0076	
	60	.0122	
Future retirement rates	According to the following schedule:		
Active lives	Retirement Rates:		
	Age	<25 yrs. svc	25+ yrs. svc
	55-56	.04	.10
	57	.04	.20
	58	.05	.45
	59	.05	.15
	60-61	.05	.35
	62	.40	.85
	63-64	.40	.40
	65+	1.00	1.00
	Resulting in an average expected retirement age of 60.4.		
Inactive vested lives	Age 55, or the earliest eligible retirement age if later.		
Disabled lives	Disability benefit assumed payable until the earlier of age 65, recovery or death. Then normal retirement benefit commences.		
Timing of decrements	Middle of year		
Future hours worked			
Vested lives	1,650 hours per year, 0 after assumed retirement age		
Non-vested lives	1,300 hours per year, 0 after assumed retirement age		

*Appendix B - Actuarial Assumptions and Methods
Outstate Michigan Trowel Trades Pension Plan
January 1, 2025 Preliminary Actuarial Valuation*

ACTUARIAL ASSUMPTIONS (CONT.)

Future hourly contribution rate	Individual's average credited rate contributed for the most recent plan year adjusted for any rate changes in the past year and for non-credited contributions. The credited rate cannot be lower than the lowest negotiated rate or higher than the highest negotiated rate.
Age of participants with unrecorded birth dates	Based on average entry age of participants with recorded birth dates and same vesting status.
Marriage assumptions	80% assumed married with the male spouse 3 years older than his wife
Optional form assumption	All non-retired participants assumed to elect the life annuity with 2 years certain form of benefit.
Inactive vested lives over age 74	Continuing inactive vested participants age nearest 74 and older are assumed deceased and are not valued. Participants assumed deceased under age 74 prior to January 1, 2021 are still assumed to be deceased.
QDRO benefits	Benefits to alternate payee included with participant's benefit until payment commences
Section 415 limit assumptions	
<i>Dollar limit</i>	\$285,000 per year
<i>Assumed form of payment for those limited by Section 415</i>	Qualified joint and 100% survivor annuity
Benefits not valued	None
Benefits vested	No death benefits are vested. Disability benefits are considered vested only in relation to corresponding retirement benefit. Early retirement subsidies are considered vested when participant reaches age 55 and has 10 years of vesting service.

RATIONALE FOR SELECTION OF ACTUARIAL ASSUMPTIONS

The non-prescribed actuarial assumptions were selected to provide a reasonable long term estimate of developing experience. The assumptions are reviewed annually, including a comparison to actual experience. The following describes our rationale for the selection of each non-prescribed assumption that has a significant effect on the valuation results.

**ERISA rate of return used
to value liabilities**

Future rates of return were modeled based on the Plan's current investment policy asset allocation and composite, long-term capital market assumptions taken from Horizon Actuarial's 2024 survey of investment consultants.

Based on this analysis, we selected a final assumed rate of 7.50%, which we feel is reasonable. This rate may not be appropriate for other purposes such as settlement of liabilities.

Due to the special rules related to withdrawal liability for a construction industry plan and the nature of the building trades industry, we believe the valuation interest rate is also appropriate for withdrawal liability purposes.

Mortality

The PRI-2012 Blue Collar Mortality Tables for employees and healthy annuitants projected forward using the MP-2021 projection scale was chosen as the base table for this population. The blue collar table was chosen based on the industry of plan participants.

Finally, multipliers of 110% for males and 105% for females were applied in order to more closely match projected deaths to actual post-retirement death experience. The period of actual data studied to develop this multiplier was from January 1, 2020 to December 31, 2024 for this plan, blended with a study of deaths for larger plans in similar industries. Based on information from the CDC on COVID-19 deaths through April 20, 2024, this study was adjusted to reflect an ongoing expectation of slightly higher deaths due to COVID-19 by 1) including an increase in deaths due to COVID-19 for the study period prior to March 15, 2020 and 2) excluding the high increase in deaths due to COVID-19 for the study period March 15, 2020 to March 15, 2022.

Retirement

Actual rates of retirement by age were last studied for this plan for the period January 1, 2020 to December 31, 2024. The assumed future rates of retirement were selected based on the results of this study.

*Appendix B - Actuarial Assumptions and Methods
Outstate Michigan Trowel Trades Pension Plan
January 1, 2025 Preliminary Actuarial Valuation*

RATIONALE FOR SELECTION OF ACTUARIAL ASSUMPTIONS (CONT.)

Withdrawal	Actual rates of withdrawal by age were last studied for this plan for the period January 1, 2020 to December 31, 2024. The assumed future rates of withdrawal were selected based on the results of this study.
Future hours worked	Based on review of recent plan experience.

ACTUARIAL ASSUMPTIONS USED FOR PROJECTIONS

The assumptions used for the credit balance, funded ratio and PPA zone projections are the same as used throughout the report with the following exceptions.

Assumed return on fund assets	
<i>Current year projections</i>	7.25% for the first 10 years (1/1/2025-12/31/2034)* 7.50% thereafter
<i>Prior year projections</i>	7.25% for the first 10 years (1/1/2024-12/31/2033)* 7.50% thereafter
* For PPA certification projections, the 7.25% short-term assumption is used for years prior to the certification date only; the 7.50% long-term assumption is used for all years following the certification date.	
Expenses	
<i>Current year projections</i>	\$310,000 in the 2025 plan year excluding investment expenses, increasing 2.5% per year. Additional increases are reflected in 2031 to account for the scheduled PBGC premium rate increase to \$52 per participant.
<i>Prior year projections</i>	\$235,750 in the 2024 plan year excluding investment expenses, increasing 2.5% per year. Additional increases are reflected in 2031 to account for the scheduled PBGC premium rate increase to \$52 per participant.
Future total hours worked	
<i>Current year projections</i>	490,000 for the plan year ending 2025 and thereafter
<i>Prior year projections</i>	490,000 for the plan year ending 2024 and thereafter
Contribution rate increases	
<i>Current year projections</i>	None
<i>Prior year projections</i>	None
Plan changes since prior year	None

ACTUARIAL ASSUMPTIONS USED FOR PROJECTIONS (CONT.)

Open group projections

Current year projections

Stable population assumed with new entrants replacing active participants as they withdraw, retire or die. New entrants are based upon entry age of actual new entrants over the last 5 years.

Prior year projections

Projected normal costs and benefit payment amounts are adjusted using the open group percentage increases from the prior year.

Stochastic modeling

1000 trials. Future returns are modeled using an expected return of 8.00% for the first 10 years and 8.31% thereafter and a standard deviation of 12.63%, which is representative of the plan's investment portfolio. The preceding expected returns are one year values which are not representative of longer-term geometric average returns as considered when setting the ERISA return assumption.

Appendix B - Actuarial Assumptions and Methods
Outstate Michigan Trowel Trades Pension Plan
January 1, 2025 Preliminary Actuarial Valuation

ACTUARIAL METHODS

Funding method <i>ERISA Funding</i>	Traditional unit credit cost method, effective January 1, 2015.
<i>Funding period</i>	Individual entry age normal with costs spread as a level dollar amount over service
Population valued <i>Actives</i>	Participants in the plan who accrued a year of service during the preceding plan year and who had non-reciprocity hours during the preceding plan year
<i>Inactive vested</i>	Vested participants with no non-reciprocity hours during the preceding plan year or vested participants who had reciprocity hours during the preceding plan year
<i>Retirees</i>	Participants and beneficiaries in pay status as of the valuation date.
Asset valuation method <i>Actuarial value</i>	Smoothed market value with phase-in effective January 1, 1999. Each year's gain (or loss) is spread over a period of 5 years. The actuarial value is limited to not less than 80% and not more than 120% of the actual market value of assets in any plan year.
<i>Unfunded vested benefits</i>	For the presumptive method, actuarial value, as described above, is used
Effective date of amortization extension	January 1, 2010

Appendix C - Minimum Funding Amortization Bases
Outstate Michigan Trowel Trades Pension Plan
January 1, 2025 Preliminary Actuarial Valuation
Bases Shown: With Extension

Date Established	Source of Change in Unfunded Liability	Original Amount	Original Period	Remaining Period		1/1/2025 Outstanding Balance	1/1/2025 Amortization Payment
				Years	Months		
Charges							
1/1/1991	Assumption		35	1	0	49,035	49,035
1/1/1993	Amendment		35	3	0	118,662	42,446
1/1/1993	Assumption		35	3	0	46,236	16,540
1/1/1995	Assumption	535,520	35	5	0	161,265	37,079
1/1/1996	Assumption	1,210,310	35	6	0	428,482	84,917
1/1/1997	Amendment	318,428	35	7	0	128,682	22,600
1/1/1997	Assumption	83,931	35	7	0	33,913	5,957
1/1/1998	Amendment	892,619	35	8	0	403,075	64,014
1/1/1999	Amendment	807,784	35	9	0	400,872	58,460
1/1/1999	Assumption	2,846,312	35	9	0	1,412,462	205,980
1/1/2000	Assumption	763,910	35	10	0	411,228	55,731
1/1/2001	Amendment	1,524,278	35	11	0	880,822	112,005
1/1/2001	Assumption	55,139	35	11	0	31,855	4,051
1/1/2002	Assumptions	1,518,437	35	12	0	933,411	112,251
1/1/2003	Assumptions	299,355	35	13	0	194,355	22,250
1/1/2006	Experience Loss	2,125,905	20	1	0	181,780	181,780
1/1/2007	Experience Loss	1,832,215	20	2	0	309,481	160,334
1/1/2008	Assumptions	34,081	20	3	0	8,502	3,041
1/1/2009	Amendment	146,878	20	4	0	48,005	13,332
1/1/2009	Experience Loss	7,556,829	20	4	0	2,469,727	685,935
1/1/2012	Experience Loss	1,912,754	15	2	0	392,539	203,363
1/1/2013	Experience Loss	2,106,787	15	3	0	625,555	223,766
1/1/2014	Experience Loss	2,056,465	15	4	0	785,661	218,206
1/1/2015	Assumptions	1,449,529	15	5	0	668,316	153,661
1/1/2015	Experience Loss	3,402,303	15	5	0	1,568,659	360,667
1/1/2016	Experience Loss	4,002,646	15	6	0	2,139,028	423,916
1/1/2017	Assumptions	236,918	15	7	0	142,743	25,069
1/1/2017	Experience Loss	3,415,873	15	7	0	2,058,027	361,448
1/1/2018	Assumptions	940,061	15	8	0	625,791	99,386
1/1/2018	Experience Loss	2,272,247	15	8	0	1,512,619	240,227
1/1/2019	Amendment	19,336	15	9	0	14,008	2,042
1/1/2019	Experience Loss	1,807,282	15	9	0	1,309,126	190,909
1/1/2020	Assumptions	523,298	15	10	0	407,559	55,233
1/1/2020	Experience Loss	1,625,413	15	10	0	1,265,905	171,558
1/1/2022	Assumptions	1,567,737	15	12	0	1,373,819	165,214

Appendix C - Minimum Funding Amortization Bases
Outstate Michigan Trowel Trades Pension Plan
January 1, 2025 Preliminary Actuarial Valuation
Bases Shown: With Extension

Date Established	Source of Change in Unfunded Liability	Original Amount	Original Period	Remaining Period		1/1/2025 Outstanding Balance	1/1/2025 Amortization Payment
				Years	Months		
1/1/2023	Experience Loss	3,292,901	15	13	0	3,031,295	347,017
1/1/2024	Experience Loss	2,391,100	15	14	0	2,299,552	251,982
1/1/2025	Experience Loss	1,349,094	15	15	0	1,349,094	142,172
Total Charges:						30,221,146	5,573,574

Credits

1/1/2011	Amendment	976,701	15	1	0	103,953	103,953
1/1/2011	Assumptions	197,776	15	1	0	21,048	21,048
1/1/2011	Experience Gain	602,507	15	1	0	64,124	64,124
1/1/2012	Assumptions	339,642	15	2	0	69,700	36,108
1/1/2016	Amendment	2,611,164	15	6	0	1,395,421	276,546
1/1/2016	Assumptions	4,940	15	6	0	2,641	524
1/1/2017	Amendment	2,009,662	15	7	0	1,210,802	212,651
1/1/2019	Assumptions	226,125	15	9	0	163,794	23,887
1/1/2021	Assumptions	329,485	15	11	0	273,267	34,749
1/1/2021	Experience Gain	585,443	15	11	0	485,553	61,743
1/1/2022	Experience Gain	475,388	15	12	0	416,588	50,098
1/1/2024	Assumptions	1,050,674	15	14	0	1,010,447	110,724
1/1/2025	Assumption	343,596	15	15	0	343,596	36,209
Total Credits:						5,560,934	1,032,364

Net Charges: 24,660,212 4,541,210

Less Credit Balance: 16,172,160

Less Reconciliation Balance: 0

Unfunded Actuarial Liability: 8,488,052

Appendix C - Minimum Funding Amortization Bases
Outstate Michigan Trowel Trades Pension Plan
January 1, 2025 Preliminary Actuarial Valuation
Bases Shown: Without Extension

Date Established	Source of Change in Unfunded Liability	Original Amount	Original Period	Remaining Period		1/1/2025 Outstanding Balance	1/1/2025 Amortization Payment
				Years	Months		
Charges							
1/1/1996	Assumption	1,210,310	30	1	0	96,888	96,888
1/1/1997	Amendment	318,428	30	2	0	49,165	25,471
1/1/1997	Assumption	83,931	30	2	0	12,953	6,710
1/1/1998	Amendment	892,619	30	3	0	199,552	71,382
1/1/1999	Amendment	807,784	30	4	0	232,479	64,569
1/1/1999	Assumption	2,846,312	30	4	0	819,101	227,494
1/1/2000	Assumption	763,910	30	5	0	265,424	61,027
1/1/2001	Amendment	1,524,278	30	6	0	614,132	121,710
1/1/2001	Assumption	55,139	30	6	0	22,209	4,401
1/1/2002	Assumptions	1,518,437	30	7	0	689,732	121,136
1/1/2003	Assumptions	299,355	30	8	0	150,220	23,857
1/1/2012	Experience Loss	1,912,754	15	2	0	392,539	203,363
1/1/2013	Experience Loss	2,106,787	15	3	0	625,555	223,766
1/1/2014	Experience Loss	2,056,465	15	4	0	785,661	218,206
1/1/2015	Assumptions	1,449,529	15	5	0	668,316	153,661
1/1/2015	Experience Loss	3,402,303	15	5	0	1,568,659	360,667
1/1/2016	Experience Loss	4,002,646	15	6	0	2,139,028	423,916
1/1/2017	Assumptions	236,918	15	7	0	142,743	25,069
1/1/2017	Experience Loss	3,415,873	15	7	0	2,058,027	361,448
1/1/2018	Assumptions	940,061	15	8	0	625,791	99,386
1/1/2018	Experience Loss	2,272,246	15	8	0	1,512,617	240,227
1/1/2019	Amendment	19,336	15	9	0	14,008	2,042
1/1/2019	Experience Loss	1,807,282	15	9	0	1,309,126	190,909
1/1/2020	Assumptions	523,298	15	10	0	407,559	55,233
1/1/2020	Experience Loss	1,625,413	15	10	0	1,265,905	171,558
1/1/2022	Assumptions	1,567,737	15	12	0	1,373,819	165,214
1/1/2023	Experience Loss	3,292,901	15	13	0	3,031,295	347,017
1/1/2024	Experience Loss	2,391,100	15	14	0	2,299,552	251,982
1/1/2025	Experience Loss	1,349,094	15	15	0	1,349,094	142,172
Total Charges:						24,721,149	4,460,481

Appendix C - Minimum Funding Amortization Bases
Outstate Michigan Trowel Trades Pension Plan
January 1, 2025 Preliminary Actuarial Valuation
Bases Shown: Without Extension

Date Established	Source of Change in Unfunded Liability	Original Amount	Original Period	Remaining Period		1/1/2025 Outstanding Balance	1/1/2025 Amortization Payment
				Years	Months		
Credits							
1/1/2011	Amendment	976,701	15	1	0	103,953	103,953
1/1/2011	Assumptions	197,776	15	1	0	21,048	21,048
1/1/2011	Experience Gain	602,507	15	1	0	64,124	64,124
1/1/2012	Assumptions	339,642	15	2	0	69,700	36,108
1/1/2016	Amendment	2,611,164	15	6	0	1,395,421	276,546
1/1/2016	Assumptions	4,940	15	6	0	2,641	524
1/1/2017	Amendment	2,009,662	15	7	0	1,210,802	212,651
1/1/2019	Assumptions	226,125	15	9	0	163,794	23,887
1/1/2021	Assumptions	329,485	15	11	0	273,267	34,749
1/1/2021	Experience Gain	585,443	15	11	0	485,553	61,743
1/1/2022	Experience Gain	475,388	15	12	0	416,588	50,098
1/1/2024	Assumptions	1,050,674	15	14	0	1,010,447	110,724
1/1/2025	Assumption	343,596	15	15	0	343,596	36,209
Total Credits:						5,560,934	1,032,364
Net Charges:						19,160,215	3,428,117
Less Credit Balance:						10,672,163	
Less Reconciliation Balance:						0	
Unfunded Actuarial Liability:						8,488,052	

SUMMARY OF PPA AND MPRA RULES

Background

All multiemployer pension plans in effect on July 16, 2006 are required to engage an actuary to annually certify their status under the Pension Protection Act of 2006 (“PPA”). Such certification must be filed with the government by the 90th day of the plan year.

This Appendix D provides a high-level summary of some of the rules related to PPA, which were further modified in 2015 by the Multiemployer Pension Reform Act of 2014 (“MPRA”). Please seek advice from your actuary or Fund Counsel for more detailed information.

PPA Status Criteria

The table below summarizes the criteria for each PPA status. Projected deficiencies are calculated as of the last day of each plan year and are based on contribution rates codified in bargaining agreements and, if applicable, wage allocations.

PPA Status	Getting In	Getting Out
Safe (“green zone”)	A plan is safe if it is not described in any of the other statuses. Generally, a plan that is at least 80% funded and has no projected funding deficiencies in the current year or next 6 years is safe.	A plan leaves safe status when it is certified as being in another status
Safe (“green zone”) special rule	Beginning in 2015, a plan that would otherwise be endangered, but was safe for the prior year, remains safe if it is projected to return to safe within 10 years	A plan leaves safe status when it is certified as being in another status
Endangered (“yellow zone”)	A plan is endangered if it is <u>not</u> in a worse status <u>and</u> it is described in one of the following: <ul style="list-style-type: none">Funded percentage is less than 80%, orProjected funding deficiency in the current year or next 6 years.	A plan leaves endangered status when it no longer meets the requirements to be classified as endangered or when it enters a worse status
Seriously endangered (“orange zone”)	A plan is seriously endangered if it is <u>not</u> in a worse status <u>and</u> it meets <u>both</u> of the following: <ul style="list-style-type: none">Funded percentage is less than 80%, <u>and</u>Projected funding deficiency in the current year or next 6 years.	A plan leaves seriously endangered status when it no longer meets both of the requirements listed or when it enters a worse status

SUMMARY OF PPA AND MPRA RULES (CONT.)

<i>PPA Status</i>	<i>Getting In</i>	<i>Getting Out</i>
Critical (“red zone”)	<p>A plan is critical if it is described in one or more of the following:</p> <ul style="list-style-type: none"> • Projected funding deficiency (<u>not</u> recognizing extensions) in the current year or next 3 years (next 4 years if funded at less than 65%), or • Funded percentage is less than 65%, <u>and</u>, inability to pay nonforfeitable benefits and expenses for next 7 years, or • (1) Contributions are less than current year costs (i.e. “normal cost”) plus interest on any unfunded past liabilities, <u>and</u>, (2) value of vested benefits for non-actives is greater than for actives, <u>and</u>, (3) projected funding deficiency (<u>not</u> recognizing extensions) in the current year or next 4 years, or • Inability to pay all benefits and expenses for next 5 years. <p>A plan with a 5-year amortization extension under IRC Section 431(d) that previously emerged from critical status in 2015 or later will re-enter critical status <u>only</u> if it is described in one of the following:</p> <ul style="list-style-type: none"> • Projected funding deficiency in the current year or next 9 years (<u>including</u> amortization extensions), or, • Projected insolvency within the next 30 years <p>If a plan is certified as safe or endangered status but projected to be critical within the next 5 years, the Trustees have the <u>option</u> of electing to have the plan treated as critical status immediately.</p>	<p>A plan emerges from critical status when it meets all of the following:</p> <ul style="list-style-type: none"> • No longer meets any of the critical status tests, and, • No projected funding deficiencies in the current year or next 9 years, and, • No projected insolvencies in the next 30 years <p>A plan with a 5-year amortization extension under IRC Section 431(d) emerges from critical status when it meets both of the following:</p> <ul style="list-style-type: none"> • No projected funding deficiencies in the current year or next 9 years, and, • No projected insolvencies in the next 30 years

SUMMARY OF PPA AND MPRA RULES (CONT.)

<i>PPA Status</i>	<i>Getting In</i>	<i>Getting Out</i>
Critical and declining ("deep red zone")	<p>Beginning in 2015, a plan is in critical and declining status if:</p> <ul style="list-style-type: none"> It satisfies one or more of the initial four critical status criteria on the previous page, and, It is projected to become insolvent within the next 15 years (20 years if the plan has a ratio of inactive participants to active participants that exceeds 2 to 1 or if the funded percentage of the plan is less than 80%) 	A plan leaves critical and declining when it no longer satisfies the criteria. Status cannot change to safe, endangered, or seriously endangered unless the plan also meets the critical status emergence rules (see above).

Restrictions for Non-Safe Zone Plans

The Trustees of a plan that is not in safe zone face a number of restrictions in plan improvements that can be adopted and bargaining agreements that can be accepted.

<i>Period</i>	<i>Endangered/Critical Restrictions</i>
Date of first certification through adoption of funding improvement/rehabilitation plan ("plan adoption period")	<ul style="list-style-type: none"> No reduction in level of contributions for any participants No suspension of contributions No exclusion of new or younger employees No amendment that increases the <u>liabilities</u> of the plan by reason of any increase in benefits, change in accrual, or change in vesting unless required by law
After adoption of a funding improvement/rehabilitation plan until end of funding improvement/rehabilitation period	<ul style="list-style-type: none"> Cannot be amended so as to be inconsistent with funding improvement/rehabilitation plan No amendment that increases benefits, including future accruals, unless actuary certifies as being paid for with contributions not contemplated in funding improvement/rehabilitation plan and still expected to meet applicable benchmark after considering the amendment

Additionally, critical, and critical and declining status plans cannot pay benefits greater than the single life annuity once the initial red zone notice is sent unless the benefit is eligible for automatic cash-out.

SUMMARY OF PPA AND MPRA RULES (CONT.)

Employer Surcharges for Critical Status Plans

When a non-critical plan enters critical status, employers must pay the plan a surcharge equal to 5% of their bargained contributions (the amount increases to 10% after the end of the plan year). The surcharges cannot be used to accrue benefits. Surcharges will generally commence about 5 months into the initial critical plan year.

Once the Trustees have adopted a rehabilitation plan, each set of bargaining parties is asked to adopt one of the schedules contained in such rehabilitation plan. Surcharges cease to apply to contributions made under a CBA where the bargaining parties have adopted a schedule. If this can be accomplished within the first 5 months of the initial critical year, then surcharges can be avoided altogether.

Special Critical/Critical and Declining Status Tools

The Trustees of a plan that is in critical status have the ability (as the result of collective bargaining) to cut “adjustable benefits” that, for the most part, cannot be reduced under other circumstances. Adjustable benefits include early retirement subsidies, optional forms of payment, disability benefits, and death benefits. Normal retirement benefits are never adjustable benefits.

The Trustees of a critical and declining plan may apply to the Treasury Department for approval to suspend certain payments under MPRA (suspensions are benefit cuts that will be restored once they are no longer needed). The suspensions may affect even those participants who are already in pay status. However, certain protections apply to participants who are age 75 or older or are disabled. Furthermore, no one’s benefit can be reduced below 110% of the amount guaranteed by the PBGC. While not officially repealed with ARPA (see below), benefit suspensions have effectively been eliminated for existing deeply troubled plans in favor of the special financial assistance program.

SUMMARY OF ARPA RULES

Overview

The American Rescue Plan Act (ARPA) was passed in March 2021 with an interim final rule in July, 2021 and a final rule in July, 2022. ARPA provides options for eligible multiemployer plans to receive special financial assistance and all multiemployer plans to elect funding relief. The PBGC premium will increase to \$52 in 2031 with inflationary increases afterward.

Special Financial Assistance

A multiemployer plan is eligible for the special financial assistance program if:

- The plan is in critical and declining status in any plan year beginning in 2020 through 2022 using 2020 certification assumptions;
- A suspension of benefits has been approved with respect to the plan under MPRA as of the date of the enactment of the law;
- The plan is certified to be in critical status, has a current liability funded percentage of less than 40%, and has a ratio of active to inactive participants which is less than two to three in any plan year beginning in 2020 through 2022; or
- The plan became insolvent after December 16, 2014, and has remained insolvent and has not been terminated as of the date of the enactment of the law.

An eligible plan must submit an application to the PBGC for special financial assistance by December 31, 2025. The PBGC gave priority consideration for special financial assistance to eligible plans that will become insolvent soon, have more than \$1 billion liability, or suspended benefits. Plans without priority consideration will have to enter a wait list until the PBGC reopens the portal for a limited number of applications.

The amount of special financial assistance to be provided by the PBGC shall be the amount required for the plan to pay all benefits due through the last day of the plan year ending in 2051 without any further reductions. This amount will be the best of three different calculations for plans with a MPRA suspension. For this determination, the actuary will use the assumptions from the plan's 2020 PPA certification except interest rate limits may apply. The special financial assistance will be paid by the PBGC in a single, lump sum payment as soon as practicable upon approval of the application and does not have to be paid back.

Several restrictions do apply for plans receiving special financial assistance including:

- Up to 33% of the special financial assistance can be invested in publicly traded equities or high yield bonds. The rest must be invested in investment-grade bonds;
- The plan will be deemed in critical status through the 2051 plan year end;
- Contribution decreases are not permitted unless it would lessen the risk of loss;
- For the first ten years, only future benefits can be improved if they are paid for with new contributions. Then, past or future increases can be made with PBGC approval if they do not create a projected insolvency;
- Use mass withdrawal interest for EWL for 11 years or when SFA runs out, if later; and
- A statement of compliance must be annually filed with the PBGC.

GLOSSARY OF COMMON PENSION TERMS

Benefits

Accrued Benefit: A benefit that an employee has earned (or accrued) through past participation in the plan. It is the amount payable at normal retirement age.

Why it matters: Under the law, Accrued Benefits generally may not be reduced by plan amendment (note that special rules allowing for limited reduction and/or suspension of accrued benefits apply to critical status, critical and declining status and insolvent plans).

Actuarial Equivalence: Given a set of actuarial assumptions, when two different sets of payment scenarios have an equal present value.

Early Retirement Reduction Factor: A retirement benefit that begins before normal retirement age may be reduced. The plan document defines the amount of the reduction by formula or a table of factors. This reduction may or may not be actuarially equivalent, but its present value can be no less than actuarially equivalent to the benefit payable at normal retirement age.

Benefit Crediting (Accrual) Rate: A general reference to the calculation of the amount of monthly retirement benefit earned per dollar contributed or per year or hour worked.

Assets

Market Value of Assets: This is the fair value of all assets in the fund on an accrued, not cash basis. The market value of assets matches the value in the plan audit.

Actuarial Value of Assets: The amount of assets recognized for actuarial valuation purposes. Recent changes in market value may be partially recognized (there are variations allowed on the exact recognition). Generally the actuarial value is limited to not be less than 80% or more than 120% of the market value.

Why it matters: Many funding calculations use this “smoothed” asset value method to lessen the impact of volatility in the market value of plan assets.

Assumed Rate of Return: Long term assumption of the rate of return on assets based upon the diversification mix of invested assets.

Why it matters: This assumption is used in calculating the present values discussed in the Liabilities section below. The Assumed Rate of Return has an inverse relationship with plan liabilities. In other words, a lower Assumed Rate of Return increases liabilities, while a higher Assumed Rate of Return decreases plan Liabilities.

GLOSSARY OF COMMON PENSION TERMS (CONT.)

Liabilities

Present Value of Accrued Benefits: The discounted value of benefit payments due in the future but based only on the current Accrued Benefits of each participant. The value is based on actuarial assumptions including an assumed rate of investment return.

Why it matters: This liability is one of the primary factors in determining a plan's annual PPA funded status (see Funded Ratio).

Present Value of Vested Benefits: The discounted value of Accrued Benefits that are considered vested (non-forfeitable). Benefits that are not vested include those of participants who have not satisfied the plan vesting requirement (usually five years of service). In addition under the law some death and temporary disability benefits are also considered non-vested regardless of service because they are not considered protected benefits.

Why it matters: This liability is the primary driver of a plan's Employer Withdrawal Liability.

Actuarial (Accrued) Liability: For inactive members this is the same as the Present Value of Accrued Benefits above. For active members this depends on the cost method selected by the actuary. Under the accrued benefit or traditional unit credit cost method this is also the same as the Present Value of Accrued Benefits. Under other cost methods (including most commonly entry age normal) this represents an alternate allocation of projected benefit cost over the working lifetime of active members. Under the entry age normal cost method, the active Actuarial Liability is larger than the Present Value of Accrued Benefits.

Unfunded Actuarial Liability: The Actuarial Liability less the Actuarial Value of Assets.

Current Liability: This is similar to the Present Value of Accrued Benefits, but uses a statutory, significantly lower, interest rate (equivalent to an expected rate of return on a bond only-type portfolio) and statutory mortality tables. The lower interest rate means that Current Liability tends to be significantly higher than the Present Value of Accrued Benefits. This number has very little impact on multiemployer plans.

Normal Cost: The present value of all benefits that are expected to accrue or to be earned under the plan during the plan year. The way in which a benefit is considered to be earned varies with the actuarial cost method.

Risk: The potential of future deviation of actual results from expectations derived from actuarial assumptions.

GLOSSARY OF COMMON PENSION TERMS (CONT.)

Funding

Funded Ratio (Funded Percentage): Actuarial Value of Assets divided by the Present Value of Accrued Benefits. This is one of two key measures used to determine a plan's annual PPA funded status. This may also be referred to as PPA Funded Ratio. This must be greater than 80% to avoid endangered status.

Credit Balance: The accumulated excess of actual contributions over legally required minimum contributions as maintained in the funding standard account. The funding standard account is maintained by the actuary in the valuation process and reported annually in schedule MB to the Form 5500 filing. A negative credit balance is known as an accumulated funding deficiency. Prior to PPA, an accumulated funding deficiency caused an immediate excise tax (waiver under PPA if certain conditions are met). After PPA, a current or projected funding deficiency is one of the key measures used in determining the annual PPA status. It can eventually trigger an excise tax levied on contributing employers.

Withdrawal Liability

Unfunded Vested Benefits (UVB): Present Value of Vested Benefits less the value of plan assets determined on either an actuarial or market value basis. The selection of asset measurement is part of the withdrawal liability method of the Plan.

Employer Withdrawal Liability (EWL): An employer that withdraws from a multiemployer plan is liable for its proportionate share of Unfunded Vested Benefits, determined as of the date of withdrawal.

Why it matters: If a contributing employer leaves the plan while it has Unfunded Vested Benefits liability, that employer's allocated share of Employer Withdrawal Liability is either assessed, as applicable, or reallocated among the plan's remaining active employers if the presumptive method is used. A construction employer withdrawing from a construction industry plan will not be assessed unless they continue performing work within the jurisdiction of the CBA or restart such work within a period of 5 years. Small amounts (under \$150,000) are generally reduced or eliminated pursuant to the "de minimis rule."