

CHEBOYGAN COUNTY ROAD COMMISSION
A Component Unit of Cheboygan County, Michigan

NOTES TO FINANCIAL STATEMENTS
DECEMBER 31, 2017

NOTE 11 - PENSION PLANS:

Defined Benefit Plan:

Plan Description -

The Road Commission participates in the Michigan Municipal Employees Retirement System (MERS); an agent multiple employer state-wide, public employee defined benefit pension plan (the "Plan") created under Public Act 135 of 1945, and now operates under Public Act 220 of 1996, and the MERS Plan Document as revised. MERS was established to provide retirement, survivor and disability benefits on a voluntary basis to the State of Michigan's local government employees. Act No. 427 of the Public Acts of 1984, as amended, establishes and amends the benefit provisions of the participants in MERS. MERS issues a publicly-available financial report that includes financial statements and required supplementary information which may be obtained at www.mersofmich.com, by writing to MERS at 1134 Municipal Way, Lansing, Michigan 48917, or by calling (800) 767-6377.

For the purpose of measuring the net pension liability, deferred outflows of resources and deferred inflows of resources related to the pension and pension expense have been determined on the same basis as they are reported by the Plan. The Plan uses the economic resources measurement focus and the full accrual basis of accounting. Investments are stated at fair value or estimated fair value. Road Commission contributions to the Plan are recognized when due pursuant to legal requirements. Benefit payments and refunds of employee contributions are recognized as expense when due and payable in accordance with benefit terms.

The membership at December 31, 2016 was comprised of 33 active participants, 63 retirees and beneficiaries, and 6 other vested inactive participants.

Benefits Provided -

Retirement benefits are calculated based on division as 2.0% to 2.5% of the employee's final three-year (3) average salary times the employee's years of service. Employees are vested after 10 years of service. Normal retirement age is 60. Early retirement with a reduced benefit is at 50 with 25 years of service or at 55 with 15 years of service. Early retirement with an unreduced benefit is at 55 with 25 years of services for Divisions 01 and 13, and 55 with 30 years of service for Division 12. Employees are eligible for non-duty disability benefits after 10 years of service and for duty-related disability benefits upon hire. Disability benefits are determined in the same manner as retirement benefits but are payable immediately. An employee who leaves service may withdraw his or her contributions, plus accumulated interest. Benefit terms provide for annual cost-of-living adjustments to each employee's retirement benefit subsequent to the employee's retirement date of 2.00% to 2.50%.

Benefit terms, within the parameters established by MERS, are established and amended by authority of the Board of County Road Commissioners. Effective January 1, 2015, non-union employees previously included within Division 01 were put into a separate division, establishing Division 13.

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NOTE 11 - PENSION PLANS - (cont'd):

Contributions -

The Road Commission pays the actuarially determined amount, which for the year ended December 31, 2017 was a flat rate of \$64,988 per month for Division 01, 10.82% of covered payroll for Division 12 for the period January-August 2017, a flat rate of \$2,867 per month for Division 12 for the period September-December 2017, and a flat rate of \$9,154 per month for Division 13. Division 01 was closed on April 1, 2013 to new hires, transfers, and rehires. Effective March 12, 2016, Division 12 was closed to new hires, transfers, and rehires. Employee contributions of 1.50% were required for the period January 1, 2017 - March 31, 2017 for Divisions 01 and 12. Employee contributions of 2.50% were required for Divisions 01 and 12 for the period April 1, 2017 - December 31, 2017 and Division 13 for the entire fiscal year. In November 2017, the Road Commission amended the Plan that will require employee contributions of 3.00% in fiscal 2018 as follows: Division 01 (effective April 1, 2018), Division 12 (effective June 1, 2018), and Division 13 (effective January 1, 2018).

Net Pension Liability -

The net pension liability of the Road Commission has been measured as of December 31, 2017 as determined by an actuarial valuation performed as of December 31, 2016 and is composed of the following:

	<u>Total Pension Liability</u>	<u>Plan's Net Position</u>	<u>Net Pension Liability</u>
Beginning balance	\$ 20,201,012	\$ 8,872,279	\$ 11,328,733
Service cost	168,083	-	168,083
Changes in benefits	(12,242)	-	(12,242)
Interest on total pension liability	1,569,927	-	1,569,927
Difference between expected and actual experience	212,191	-	212,191
Net investment income	-	1,153,497	(1,153,497)
Contributions from employer	-	1,066,779	(1,066,779)
Contributions from employees	-	29,845	(29,845)
Benefit payments	(1,321,944)	(1,321,944)	-
Administrative costs	-	(18,271)	18,271
Other	(12,367)	-	(12,367)
Ending balance	<u>\$ 20,804,660</u>	<u>\$ 9,782,185</u>	<u>\$ 11,022,475</u>

Plan fiduciary net position as a percentage of the total pension liability 47.02%

Pension Liabilities, Pension Expense, Deferred Outflows of Resources, and Deferred Inflows of Resources Related to Pensions -

At December 31, 2017, the Road Commission had a net pension liability of \$11,022,475. The net pension liability was measured as of December 31, 2017, and the total pension liability used to calculate the net pension liability was determined by an actuarial valuation as of December 31, 2016.

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NOTE 11 - PENSION PLANS - (cont'd):

For the year ended December 31, 2017, the Road Commission recognized pension expense related to the Plan of \$1,461,015. At December 31, 2017, the Road Commission reported deferred outflows of resources and deferred inflows of resources related to pensions from the following sources:

	<u>Deferred Outflows of Resources</u>	<u>Deferred Inflows of Resources</u>
Net difference between projected and actual earnings on Plan investments	\$ -	\$ 185,471
Difference between expected and actual experience	165,694	-
Changes in assumptions	<u>338,965</u>	<u>-</u>
	<u>\$ 504,659</u>	<u>\$ 185,471</u>

The amounts of deferred outflows and inflows of resources related to pension will be recognized in pension expense as follows:

2018	\$ 459,227
2019	96,028
2020	(145,374)
2021	<u>(90,693)</u>
	<u>\$ 319,188</u>

Actuarial Assumptions -

The total pension liability was determined by an actuarial valuation as of December 31, 2016, which used updated procedures to roll forward the estimated liability to December 31, 2017. The valuation used the following actuarial assumptions based on the most recent study of Plan experience covering the period from December 31, 2008 through December 31, 2013.

Salary Increases - 3.00%

Inflation - 2.50%

Investment Rate of Return - 7.75%

Mortality Rates - 50% Male and 50% Female blend of the following tables: 1) the RP-2014 Healthy Annuitant Mortality Tables with rates multiplied by 105%, 2) the RP-2014 Employee Mortality Tables, and 3) the RP-2014 Juvenile Mortality Tables. For disabled retirees, the RP-2014 Disabled Retiree Mortality Tables using a 50% Male and 50% Female blend were used.

Discount Rate - The discount rate used to measure the total pension liability was 8.00 percent. The projection of cash flows used to determine the discount rate assumed that employee contributions will be made at the current contribution rate and that Road Commission contributions will be made at rates equal to the difference between actuarially determined contribution rates and the employee rate.

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NOTE 11 - PENSION PLANS - (cont'd):

Projected Cash Flows -

Based on the assumptions above, the Plan's fiduciary net position was projected to be available to make all projected future benefit payments of current active and inactive employees. Therefore, the long-term expected rate of return on Plan investments was applied to all periods of projected benefit payments to determine the total pension liability.

The long-term expected rate of return on Plan investments was determined using a building-block method in which best-estimate ranges of expected future real rates of return (expected returns, net of Plan investment expense and inflation) are developed for each major asset class. These ranges are combined to produce the long-term expected rate of return by weighing the expected future real rates of return by the target asset allocation percentage and by adding expected inflation. Best estimates of arithmetic real rates of return as of December 31, 2016 for each major asset class included in the Plan's target asset allocation, as disclosed in the investment footnote of the Plan, are summarized in the following table.

Asset Class	Target Allocation	Long-term Expected Real Rate of Return
Global Equity	57.5 %	5.0 %
Global Fixed Income	20.0	2.2
Real Assets	12.5	4.2
Diversifying Strategies	10.0	6.6
	100.0 %	

Sensitivity of the Net Pension Liability to Changes in the Discount Rate -

The following presents the net pension liability of the Road Commission, calculated using the discount rate of 8.00 percent, as well as what the Road Commission's net pension liability would be if it were calculated using a discount rate that is 1-percentage-point lower (7.00 percent) or 1-percentage-point higher (9.00 percent) than the current rate.

	1% Decrease (7.00%)	Current Discount Rate (8.00%)	1% Increase (9.00%)
Net pension liability	\$ 13,280,045	\$ 11,022,475	\$ 9,104,678

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NOTE 11 - PENSION PLANS - (cont'd):

Defined Contribution Plans:

The Road Commission has established a Defined Contribution Plan through MERS. The Defined Contribution Plan is open to the Engineer/Manager, new hires, rehires, and transfers of current Defined Benefit Plan Division #13 for non-union hired employees hired after October 16, 2015. The Defined Contribution Plan requires the Road Commission to contribute 5% of a participant's compensation. The Road Commission will also contribute a 1:1 match for employee contributions up to 3%. Vesting for the Defined Contribution Plan is as follows: 0% for the first two years of service, and then increases by 25% each service year thereafter. The Defined Contribution Plan fully vests after 6 years of service. Employer contributions related to the Defined Contribution Plan for the year ended December 31, 2017 were \$28,937.

Deferred Compensation Plan:

Effective July 18, 2013, the Road Commission now offers a MERS 457 Supplemental Retirement Program Plan, created in accordance with the Internal Revenue Code Section 457, which covers all full-time employees and commissioners, as well as the Engineer/Manager. The assets of the deferred compensation plan are held in trust for the exclusive benefit of the participants and their beneficiaries. MERS as the custodian holds the custodial account for the beneficiaries of this Section 457 plan, and the assets may not be diverted to any other use. The administrators are agents of the Road Commission for purposes of providing direction to MERS from time to time for the investment of funds held in the account, transfer of assets to or from the account and all other matters. In accordance with the provisions of GASB Statement No. 32, Section 457 plan balances and activities are not reflected in the Road Commission's financial statements.

NOTE 12 - OTHER POSTEMPLOYMENT BENEFITS:

Plan Description -

In addition to the pension benefits described in Note 11, the Road Commission provides postemployment benefits through a single-employer defined benefit healthcare plan (the "Retiree Health Plan") to eligible employees who retire from the Road Commission. Benefit provisions are established through negotiations between the Road Commission's management, the Board of Commissioners, and the various collective bargaining units. Management of the Retiree Health Plan is provided by the Board of County Road Commissioners, which consists of five members.

The Retiree Health Plan is audited within the scope of the audit of the basic financial statements; separate audited financial statements are not issued.

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NOTE 12 - OTHER POSTEMPLOYMENT BENEFITS - (cont'd):

Benefits Provided -

Benefits provided by the Retiree Health Plan consist of healthcare, dental, and prescription drug coverage for the retiree and spouse. Benefit eligibility is based on the employees' union agreement as noted below:

Bargaining Unit	Dates Hired	Retirement Age/ Years of Service	Benefits Received
Local 1325	Pre March 11, 2003	55/10	100% of premiums
	March 12, 2003 - June 30, 2009	55/10	50-100% of premiums depending on years of service*
	July 1, 2009 - April 1, 2013	55/25 or 60/10	50-100% of premiums depending on years of service*
	April 2, 2013 - March 12, 2016	55/30 or 60/20	50-100% of premiums depending on years of service*
	Post-March 13, 2016	55/30 or 60/20	50-100% of premiums depending on years of service**
Supervisors	Pre-March 11, 2003	60/10	100% of premiums
	March 12, 2003 - May 31, 2013	60/10	50-100% of premiums depending on years of service*
	Post-June 1, 2013	55/30 or 60/20	50-100% of premiums depending on years of service*
Non Union	Pre-August 1, 2009	55/10	100% of premiums
	August 1, 2009 - December 31, 2016	55/25 or 60/10	50-100% of premiums depending on years of service*

* Benefits received cease when the retiree and spouse become Medicare eligible.

** Benefits received are for the retiree only. Benefits cease when the retiree becomes Medicare eligible.

Non-union employees hired on or after January 1, 2017 are not eligible to receive benefits.

Plan Membership -

At December 31, 2017, Retiree Health Plan membership consisted of 38 active members and 51 inactive members or beneficiaries receiving benefits.

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NOTE 12 - OTHER POSTEMPLOYMENT BENEFITS - (cont'd):

Funding Policy -

The Road Commission recognizes the cost of providing these benefits on a pay-as-you-go method for current retirees. The Retiree Health Plan requires no member contributions for Road Commission employees. The Road Commission can periodically make contributions to an irrevocable trust to provide advance funds for these benefits which are counted towards the ARC contribution. During the year, total contributions were \$659,430, including \$134,452 to the irrevocable trust fund.

Annual OPEB Cost and Net OPEB Obligation -

The Road Commission's annual other postemployment benefit (OPEB) cost is calculated based on the annual required contribution of the employer (ARC), an amount calculated in accordance with the alternative measurement method permitted by GASB Statement 45 for employers in plans with fewer than one hundred total plan members. The ARC represents the level of funding necessary to cover the normal cost each year and the amortization of any unfunded actuarial liabilities (or funding excess) amortized over a period not to exceed thirty years. The Road Commission's annual OPEB cost for the year, the amount actually contributed, and changes in the net OPEB obligation are as follows:

Annual required contribution	\$ 829,932
Interest on net OPEB obligation	196,366
Adjustment to annual required contribution	(182,484)
Annual OPEB cost (expense)	843,814
Contributions made	(659,430)
Increase in net OPEB obligation	184,384
Net OPEB obligation - beginning of year	<u>2,805,227</u>
Net OPEB obligation - end of year	<u>\$ 2,989,611</u>

Schedule of Employer Contributions -

Year Ended December 31,	Annual OPEB Cost	Percentage Contributed	Net OPEB Obligation
2015	\$ 1,069,829	49.18 %	\$ 2,365,309
2016	1,072,431	58.98	2,805,227
2017	843,814	78.15	2,989,611

Schedule of Funding Progress -

Actuarial Valuation Date	Actuarial Value of Assets (a)	Actuarial Accrued Liability (AAL) (b)	Unfunded (Overfunded) Accrued Liability (UAAL) (b-a)	Funded Ratio (a/b)	Covered Payroll (c)	UAAL as a % of Covered Payroll (b-a)/c
12/31/11	\$ 51,667	\$ 7,968,733	\$ 7,917,066	0.65 %	\$ 1,688,622	469 %
12/31/14	265,967	14,257,885	13,991,918	1.87	1,835,645	762
12/31/17	640,135	12,380,885	11,740,750	5.17	1,536,334	764

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NOTE 12 - OTHER POSTEMPLOYMENT BENEFITS - (cont'd):

Actuarial Methods and Assumptions - Actuarial valuations of an ongoing plan involve estimates of the value of reported amounts and assumptions about the probability of occurrence of events far into the future. Examples include assumptions about future employment, mortality, and the healthcare cost trend. Amounts determined regarding the funded status of the plan and the annual required contributions of the employer are subject to continual revision as actual results are compared with past expectations and new estimates are made about the future. The schedule of funding progress, presented above, presents multiyear trend information about whether the actuarial value of plan assets is increasing or decreasing over time relative to the actuarial accrued liabilities for benefits.

Projections of benefits for financial reporting purposes are based on the substantive plan (the plan as understood by the employer and the plan members) and include the types of benefits provided at the time of each valuation and the historical pattern of sharing of benefit costs between the employer and plan members to that point. The actuarial methods and assumptions used include techniques that are designed to reduce the effects of short-term volatility in actuarial accrued liabilities and the actuarial value of assets, consistent with the long-term perspective of the calculations.

The following simplifying assumptions were made:

Retirement Age of Active Employees - Based on the historical average retirement age for the covered group, active plan members were assumed to retire at age 55 or 60, depending on the applicable collective bargaining units benefit provisions.

Marital Status - Marital status of members at the calculation date was assumed to continue throughout retirement.

Mortality - Life expectancies were based on mortality tables from the National Center for Health Statistics. The United States Life Tables for Males and for Females were obtained from the Center for Disease Control (www.cdc.gov). The most recent data are the life tables for males and females, 2014 version (Tables 2 and 3 from the National Vital Statistics Report, Vol. 66, No. 4 dated August 14, 2017).

Turnover - Nongroup-specific age-based turnover data from GASB Statement No. 45 was used as the basis for assigning active members a probability of remaining employment until the assumed retirement age and for developing an expected future working lifetime assumption for purposes of allocating to periods the present value of total benefits to be paid.

Healthcare Cost Trend Rate - The expected rate of increase in healthcare insurance premiums was based on projections of the Office of the Actuary at the Centers for Medicare & Medicaid Services. The rate was estimated at 3.4 percent for 2019, fluctuating between 4.4 percent and 4.9 percent before decreasing to 4.8 percent in 2024 and for the years thereafter.

Health Insurance Premiums - 2018 health insurance premiums for retirees were used as the basis for calculation of the present value of total benefits to be paid.

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NOTE 12 - OTHER POSTEMPLOYMENT BENEFITS - (cont'd):

Inflation Rate - The expected long-term inflation assumption of 2.0 percent was based on projected changes in the Consumer Price Index for Urban Wage Earners and Clerical Workers (CPI-W) in *The 2010 Annual Report of the Board of Trustees of the Federal Old-Age and Survivors Insurance and Disability Insurance Trust Funds* for an intermediate growth scenario.

Payroll Growth Rate - The expected long-term payroll growth rate was assumed to equal the rate of inflation.

Based on historical and expected returns of the short-term investment portfolio, a discount rate of 5 percent and 7 percent investment rate was used. In addition, a simplified version of the entry age actuarial cost method was used. The unfunded actuarial accrued liability is being amortized as a level percentage of payroll on an open period with a remaining amortization period of 30 years.

Investment Policy -

The Retiree Health Plan's policy in regards to the invested assets is established and may be amended by the Board of County Road Commissioners by a majority of its members. The policy does not address a target allocation or long-term expected rate of return for invested assets.

Rate of Return -

For the year ended December 31, 2017, the annual money-weighted rate of return on Retiree Health Plan investments, net of investment expense, is 10.52%. The money-weighted rate of return expresses investment performance, net of investment expense, adjusted for the changing amounts actually invested.

Net OPEB Liability (Unfunded Accrued Liability) of the Road Commission -

For 2017, the Road Commission reports OPEB expense based on funding requirements, as directed by GASB Statement No. 45. Beginning next year, the Road Commission will adopt GASB Statement No. 75, which will require measurement of OPEB expense as it is earned, rather than as it is funded. The components of the net OPEB liability of the Road Commission as measured at December 31, 2017 are as follows:

Total OPEB liability	\$	12,380,885
Retiree Health Plan fiduciary net position		640,135
Net OPEB liability	\$	11,740,750
Retiree Health Plan fiduciary net position as a percentage of total OPEB liability		5.17%

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NOTE 12 - OTHER POSTEMPLOYMENT BENEFITS - (cont'd):

Single Discount Rate -

A single discount rate of 5.00% was used to measure the total OPEB liability. The projection of cash flows used to determine this single discount rate assumed that employer contributions will be made when the projected benefit payments come due. Based on these assumptions, the Retiree Health Plan's fiduciary net position was projected to be available to make all projected future benefit payments of current Retiree Health Plan members. Therefore, the long-term expected rate of return on Retiree Health Plan investments was applied to all periods of projected benefit payments to determine the total OPEB liability.

Sensitivity of the Net OPEB Liability to Changes in the Discount Rate -

The following presents the net OPEB liability of the Road Commission, calculated using the discount rate of 5.00%, as well as what the net OPEB liability would be if it were calculated using a discount rate that is one percentage-point lower (4.00%) or one percentage-point higher (6.00%) than the current rate.

	<u>1% Decrease (4.00%)</u>	<u>Current Discount Rate (5.00%)</u>	<u>1% Increase (6.00%)</u>
Net OPEB Liability	<u>\$ 13,231,482</u>	<u>\$ 11,740,750</u>	<u>\$ 10,465,258</u>

Sensitivity of the Net OPEB Liability to Changes in the Healthcare Cost Trend Rates -

The following presents the net OPEB liability of the Road Commission, calculated using the healthcare cost trend rate of 3.40%, increasing to 4.90% before decreasing to 4.80%, as well as what the net OPEB liability would be if it were calculated using a healthcare cost trend rate that is one percentage-point lower or one percentage-point higher than the current rate.

	<u>1% Decrease (2.40-3.90%)</u>	<u>Current Healthcare Cost Trend Rate (3.40-4.90%)</u>	<u>1% Increase (4.40-5.90%)</u>
Net OPEB Liability	<u>\$ 10,474,955</u>	<u>\$ 11,740,750</u>	<u>\$ 13,219,734</u>

NOTE 13 - ADVANCES:

An advance of \$129,615 at December 31, 2017 was provided by the State for working capital under a road maintenance contract the Road Commission has with MDOT. The advance is adjusted annually by the State and must be repaid if the maintenance contract is cancelled.