

BUILDING CONDITION ASSESSMENT

SHED 1 AT GRAVEL PIT

351028 17TH LINE
EAST GARAFRAXA, ONTARIO

Prepared for:

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December 15, 2023

CONTENTS:

1.0 EXECUTIVE SUMMARY.....	3
1.1 INTRODUCTION	3
1.2 GENERAL SITE DESCRIPTION.....	3
1.3 GENERAL SITE DETAILS	3
1.4 SUMMARY OF FACILITY CONDITION INDEX (“FCI”)	3
1.5 GENERAL CONDITION	4
1.6 RECOMMENDATION FOR FURTHER STUDY	4
2.0 PURPOSE AND SCOPE	4
2.1 PURPOSE	4
2.2 SCOPE & METHODOLOGY	4
2.3 STANDARDS OF REFERENCE.....	5
3.0 SYSTEMS AND OBSERVATIONS	7
3.1 SITE IMPROVEMENTS.....	7
3.1.1 PAVING & CURBING	7
3.1.2 FLATWORK	7
3.1.3 LANDSCAPING & APPURTENANCES	7
3.2 STRUCTURE & BUILDING ENVELOPE	7
3.2.1 SUBSTRUCTURE	7
3.2.2 SUPERSTRUCTURE	7
3.2.3 EXTERIOR.....	8
3.2.4 ROOFING	9
3.3 MECHANICAL SYSTEMS.....	9
3.3.1 PLUMBING	9
3.3.2 HVAC.....	9
3.3.3 ELECTRICAL	9
3.4 SPECIAL SYSTEMS	10
3.4.1 SECURITY	10
3.4.2 FIRE PROTECTION & LIFE SAFETY	10
3.5 INTERIOR ELEMENTS.....	10
3.5.1 FINISHES.....	10
3.6 MISCELLANEOUS	10
3.6.1 MAINTENANCE & OTHER	10
4.0 REPAIR/ REPLACEMENT RESERVES	10
5.0 LIMITATIONS.....	10

APPENDICIES:

- Appendix A: SELECTED PHOTOGRAPHS
- Appendix B: FACILITY CONDITION INDEX TABLE
- Appendix C: RESUMES

1.0 EXECUTIVE SUMMARY

1.1 Introduction

Keller Engineering performed a Building Condition Assessment (“BCA”) of 351028 17th Line East Garafraxa, ON. (“Site”) on October 24, 2023, on behalf of The Township of East Garafraxa (“Client”). The report that follows is based on that review. The weather was sunny and approximately 17°C.

1.2 General Site Description

The Site is composed of 1 building. The building is a one-level structure currently being used as a storage space for town vehicles/equipment. The building was constructed in 1978. The site size is approximately 461 m² (4,965 ft²). The building has a footprint of approximately 283 m² (3,048 ft²). The site area excluding the building is mainly trimmed grass and trees. The surrounding area is primarily fields. The Site is accessed off the 17th Line. For the purposes of this report, the building’s elevation facing the 17th Line is facing east and is located on the west side of the 17th Line.

1.3 General Site Details

City/Town:	East Garafraxa
Province:	Ontario
Number of Stories:	1
Year Built:	1978
Structure:	Footings, gravel base, wood structural framing.
Exterior:	Metal siding, Translucent Glassfibre panels, wood framed windows, sliding barn doors, metal door.
Roof:	Sloped metal roof.
Plumbing:	Not applicable.
Heating, Ventilation & Cooling:	Not applicable.
Electrical:	Copper wire. Disconnected, abandoned. Not available.
Services:	Potable Water: Not applicable. Sewer: Not applicable. Storm: Surface, not applicable. Fuel: Not applicable. Electricity: Overhead, disconnected. Not applicable.

1.4 Summary of Facility Condition Index (“FCI”)

The current condition of the building and components is expressed as a percentage derived from the ratio of aggregated total cost of repairs/renewal/upgrades to the current replacement value of the building. This ratio is referred to as the Facility Condition Index (“FCI”). Refer to **Appendix B** for a detailed description.

The aggregated total costs estimated for the building is \$122,760 adjusted for inflation. The current replacement value of the building is estimated to be \$250,000.00.

Based on the estimated values, the FCI for this building is 48% and is classified as Critical.

Refer to Section 2.3, Standards of Reference, for definitions and classifications.

1.5 General Condition

The building(s) critical condition compared to other structures of similar age and use. In our opinion, maintenance activity has been fair. As a result, the property is showing effects of wear and tear at an average rate compared with other similar facilities. Refer to Section 3.0, Systems and Observations.

Overall, the structure is in fair condition compared to other developments of similar age and use.

Overall, the building envelope is in poor condition compared to other developments of similar age and use.

The Owner advised that they are not aware of any outstanding work orders, building code violations, building code infractions, building ordinances and municipal health and fire safety by-laws violations.

1.6 Recommendations for Further Study

We have identified the need for a Structural Study, Life Safety Audit and Designated Substances Survey to review conditions to protect people based on building construction, protection, and occupancy features.

2.0 PURPOSE AND SCOPE

2.1 Purpose

The purpose of this BCA is to determine the current condition of the building envelope, systems, paved areas, utilities, and site improvements, and to assign an FCI value for the building.

2.2 Scope & Methodology

Keller Engineering, formerly Criterium-Jansen Engineers performed the BCA according to the scope as generally defined in ASTM 2018-15. The survey is based on a review of available documents, an examination of the building and the Site; in particular, the footings (where visible), the roof, the exterior walls, the framing, mechanical systems, exterior doors and windows, and utilities.

The report contains the following:

- A description of the overall condition of buildings components and systems and conditions that may limit the expected useful life of the buildings and their components.
- Information about significant deficiencies, deferred maintenance items, and material code violations based on a visual survey of the building and grounds, research of documents, and conversations with people who have knowledge about the facility.

The statements in the report are opinions about the present condition of the subject property. They are based on visual evidence available during a diligent review of all reasonably accessible areas. Standard BCA practices excludes the operation of equipment by the field observer and is to be conducted without the aid of special protective clothing, exploratory probing, removal or relocation of materials, testing, or the use of equipment, such as ladders, stools, scaffolding, metering/testing equipment, or devices of any kind, etc. It is literally the field observer's visual observations while walking through the subject property. The study is not an exhaustive technical evaluation. Such an evaluation would entail a

significantly larger scope than this effort. For additional limitations, see Section 5.0. As per standard BCA practices, the user of this report is required to arrange for the field observer to receive timely complete, supervised, and safe access to the subject property's improvements including roofs. Where access was not provided Keller Engineering is obligated to state within the report all such material impediments that interfered with the conducting of the assessment.

Our mandate for this BCA excluded assessment of the facility's compliance to accessibility related standards and the Accessibility for Ontarians with Disabilities Act. Barrier Free Design of the National Building Code of Canada governed handicap accessibility guidelines for buildings constructed after 1990. Possible retroactive compliance for buildings constructed prior to 1990 was not required until subsequent provincial legislation was enacted. A significant change of building use or an Authority Having Jurisdiction may trigger the need for accessibility related building upgrades under certain circumstances. As the timing, scope of work and associated costs cannot be reasonably predicted, we have not included any Capital Costs for future upgrades in the term of the report.

2.3 Standards of Reference

For your reference, the following definitions may be helpful:

All ratings are determined by comparison to other buildings of similar age and construction type.

All directions (left, right, rear, etc.) are taken from the viewpoint of an observer standing in front of the building and facing it.

Condition

Excellent: Component or system is in "as new" condition, requiring no rehabilitation and should perform in accordance with expected performance.

Good: Component or system is sound and performs its function, although it may show signs of normal wear and tear. Some minor rehabilitation work may be required.

Fair: Component or system falls into one or more of the following categories: a) Evidence of previous repairs not in compliance with commonly accepted practice, b) Workmanship not in compliance with commonly accepted standards, c) Component or system is obsolete, d) Component or system approaching end of expected performance. Repair or replacement is required to prevent further deterioration or to prolong expected life.

Poor: Component or system has either failed or cannot be relied upon to continue performing its original function as a result of having exceeded its expected performance, excessive deferred maintenance, or state of disrepair. Present condition could contribute to or cause the deterioration of other adjoining elements or systems. Repair or replacement is required.

Critical: Immediate repair/replacement recommended in less than 1 year. Physical deficiencies that require immediate action as a result of existing or potentially unsafe conditions, building code violations, poor or deteriorated conditions of a critical element or system, or a condition that if left "as is" would result in a critical element or system failure.

Priority

Urgent – Immediate repair/replacement recommended in less than 1 year. Physical deficiencies that require immediate action as a result of existing or potentially unsafe conditions, building code violations, poor or deteriorated conditions of a critical element or system, or a condition that if left "as is" would result in a critical element or system failure.

High – Repair/replacement anticipated within the first 2 years. Physical deficiencies including deferred maintenance that may not warrant immediate attention but require repairs or replacements that should be undertaken on a priority basis, taking precedence over routine preventive maintenance work within a zero to one-year time frame. Included are such physical deficiencies resulting from improper design, faulty installation, and/or substandard quality of original systems or materials. Components or systems that have exceeded their expected useful life that may require replacement to be implemented within a zero to one-year time frame are also included.

Medium - Repair/replacement is anticipated between 3 to 5 years.

Low - Replacement is not anticipated within the first 5 years.

Facility Condition ("FCI") Levels

Good Condition (0-5% FCI) – Asset is in reasonable condition and does not require capital expenditure.

Fair Condition (6-10% FCI) – Asset is deteriorating, requires capital expenditure and will likely become "poor" within a few years if not addressed.

Poor Condition (11-30% FCI) – Asset is deteriorated and requires immediate capital expenditure.

Critical (31% + FCI) – Asset is in disrepair or dilapidated and requires urgent significant capital expenditure.

Repair/Replacement Reserves - Non-routine maintenance items that will require significant expenditure over the timeframe of this study. Included are items that will reach the end of their estimated useful life during the term of the study or in the opinion of the consultant will require attention during that time. Items with estimated expenditures below \$5,000.00 are below the capital threshold for this study and may or may not be reported since it is anticipated that those items will be repaired/replaced within the scope of regular building maintenance. The recommended repairs will be

3.0 SYSTEMS AND OBSERVATIONS

scheduled appropriately over a 20-year period in 5-year intervals. All the prices quoted are in Canadian 2023 dollars and are presented in the Capital Expenditure Tables.

3.1 Site Improvements

Refer to **Appendix B**, Facility Condition Index Table for the estimated time-period of replacement or repairs and associated estimated costs.

3.1.1 Paving & Curbing

Description

There is no paving or curbing at the site. Not applicable.

3.1.2 Flatwork

Description

There is no flatwork at the site. Not applicable.

3.1.3 Landscaping & Appurtenances

Description

Landscaping on the site consists of grass and trees on all sides of the property.

Observations & Comments

The landscaping is in poor condition with plant overgrowth surrounding the building. Costs associated with plant and trees overgrowth trimming and removals are expected to be below the Capital Threshold and are not included.

3.2 Structure & Building Envelope

3.2.1 Substructure

Description

The footings were not visible for review; however, the building likely has footings for the wood framing supports.

The building has a gravel base.

Observations & Comments

The footings were not visible for review. Replacement is not expected to occur within the timeframe of this report.

The gravel base is in fair condition with areas of bare/eroded sections. A budget for repairs and regrading has been allowed during the time-period of this study.

3.2.2 Superstructure

Description

The building and roof structure is composed of wood framing with joists, columns, prefabricated trusses, and other bracing supports.

Observations & Comments

We observed no significant adverse conditions concerning visible superstructure systems; however, there are some damaged columns and truss chords consistent with impact damage. Replacement is not anticipated during the timeline of this report. A budget for repairs has been allowed during the time-period of this study.

3.2.3 Exterior

Description

Due to localized damage of some structural components and the age of the building, we recommend that a structural study be completed to provide reporting, review, and recommendations. A budget for a structural study has been allowed for as an urgent item.

The shed has painted metal corrugated siding, sheet metal flashings, single pane wood windows, a metal service door and sliding barn doors. Translucent glassfibre panel windows are provided at the rear of the building.

Observations & Comments

The metal siding and sheet metal are in fair condition with damage in the form of dents and holes. Replacement is not anticipated to occur with the timeframe of this study. A budget for repairs has been allowed for during the time-period of this report.

Paint coatings of the metal siding and sheet metal is in poor condition with faded, rusted, and deteriorated surfaces. A budget for metal siding paint coatings restoration has been allowed for during the time-period of this report.

The windows and glassfibre panel windows are aged and are operating beyond their expected service life. One of the windows is missing a windowpane. The window frames are damaged and deteriorated. A budget for the replacement of windows and frames has been allowed for during the time-period of this report.

The windows security bars are aged and in poor condition. Costs associated with replacement of the security bars are expected to be below the Capital Threshold and are not included.

The service door is operational and aged with deteriorated paint coatings and a damaged frame. Costs associated with replacement of the service door are expected to be below the Capital Threshold and are not included.

There is localized damage to the barn doors and weatherstripping and although operational appear to require repairs. A budget for repairs has been allowed for during the timeframe of this study.

Service life of doors can be extended with moderate repairs that are anticipated to be below the capital threshold. Costs associated with replacement are expected to be below the Capital Threshold and are not included.

Sealants should be inspected and maintained at regular intervals to assess overall condition and continuity. Review and periodic replacement of sealant should be part of a regular maintenance schedule. If not maintained, sealant failure can lead to costlier repairs due to damage from water leakage. Costs associated with sealant replacement are expected to be below the Capital Threshold and are not included.

3.2.4 Roofing

Description

There is a sloped metal roof, ridge vents and sheet metal flashings.

Eavestroughs, rainwater leaders and snow/ice guards are not provided.

Observations & Comments

The metal roof panels and roof vents appear to be original and are in fair condition with damage in the form of deformed sheet metal and surface deterioration. Replacement is not anticipated to occur with the timeframe of this study. A budget for repairs has been allowed for during the time-period of this report.

Paint coatings of the metal roof is in poor condition with faded, rusted, and deteriorated surfaces. A budget for metal roof paint coatings restoration has been allowed for during the time-period of this report.

Eavestroughs, rainwater leaders and snow/ice guards are not provided. We recommend these components be provided to prevent building damage due to snow, ice and rainwater runoff. A budget for installation of new eavestroughs, rainwater leaders and snow/ice guards has been allowed for during the timeframe of this study.

3.3 Mechanical Systems

3.3.1 Plumbing

Description

There are no plumbing systems. Not applicable.

3.3.2 HVAC

Description

There are no HVAC systems. Not applicable.

3.3.3 Electrical

Description

The electrical systems are disconnected. Interior lighting is provided but not in operation. Exterior lights are not provided.

Observations & Comments

The electrical systems are disconnected. Interior lighting is provided but not in operation. Exterior lights are not provided. A budget for electrical systems replacement including installation of exterior lighting and thermographic scanning has been allowed for during the timeframe of this study.

Typically, periodic thermographic scanning is recommended by utility and insurance companies. For the main switches, breakers and other connections, scans should be completed and repeated as part of regular maintenance every 3 years, note that an amount is included in the short term, but in subsequent years the thermographic scan will fall under regular maintenance. Electrical repairs are considered a high priority. Typically, the power distribution system should last for decades if not for the life of the building if properly maintained.

3.4 Special Systems

3.4.1 Security

Description

There is no security or special systems. Not applicable.

3.4.2 Fire Protection & Life Safety

Description

There is no fire protection or life safety equipment in the structure.

Observations & Comments

Fire and life safety systems such as exit signs, detectors/sensors, emergency lights, and fire extinguishers are not provided. It is recommended that fire and life safety systems appropriate for the use of this building be provided for the safety of people frequenting the building.

A budget to install new fire protection and life safety systems including a life safety audit to determine requirements for the building has been allowed for during the timeframe of this report as an urgent item.

3.5 Interior Elements

3.5.1 Finishes

Description

There are no interior finishes. Not applicable.

3.6 Miscellaneous

3.6.1 Maintenance & Other

Observations & Comments

Planned maintenance is necessary for the longevity of assets and to control and reduce repair and replacement costs. Preventative maintenance work should be completed promptly.

From our observations we did not see anything that could not be repaired. There are some current items that require maintenance, but every building requires maintenance.

4.0 REPAIR/ REPLACEMENT RESERVES

Refer to **Appendix B, Schedule of Anticipated Reserve Requirements.**

5.0 LIMITATIONS

The information, observations, and conclusions described in this report are valid on the date of the report and have been made under the terms, conditions, limitations, and constraints noted in the report. We prepared the report for the exclusive use of the Client. No other individual or party shall be entitled to rely upon the report without our express written consent. If another individual or party relies on the report, such individual or party shall indemnify and hold Keller Engineering, formerly Criterium-Jansen Engineers, harmless for any damages, losses, or expenses incurred because of such use. Any use or reliance of the report by an individual or party other than the Client shall constitute acceptance of these terms and conditions. Any electronic copies of this report that are provided, are for the convenience of the Client, and are not to be construed as the original or final report.

The report is limited to the visual observations made during our review. We did not remove materials, conduct any destructive or invasive testing, move furnishings or equipment, or undertake any digging or excavation. Accordingly, we cannot comment on the condition of systems that we could not see, such as buried structures and utilities, nor are we responsible for conditions that could not be seen or were not within the scope of our services at the time of review. We did not undertake to completely assess the stability of the buildings or the underlying foundation soil since this effort would require excavation and destructive testing. Likewise, this is not a seismic assessment.

We do not render an opinion on uninspected portions of the facility.

We did not perform any computations or other engineering analysis as part of this evaluation, nor did we conduct a comprehensive code compliance investigation. We did not provide an environmental assessment or opinion on the presence of any environmental issues such as asbestos, hazardous wastes, toxic materials, the location, and presence of designated wetlands, IAQ, etc.

The report is not to be considered a warranty of condition, and no warranty is implied. The photographs are an integral part of this report and must be included in any review.

If opinions of probable costs are presented, they are preliminary only. Opinions are based on our general knowledge of building systems and the contracting/construction industry. When appropriate, we have relied on standard sources, such as Means Building Construction Cost Data, to develop opinions of probable costs. However, for some items for which we have developed opinions of probable costs (e.g., structural repairs), no standard guide for developing such costs exists. It is not the intent of the BCA to provide/prepare exact quantities or identify the exact locations of items or systems as a basis for preparing the opinions of costs.

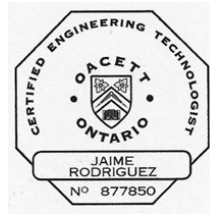
We have performed no design work as part of the study, nor have we obtained competitive quotations or estimates from contractors as this also is beyond the scope of the project. The actual cost to remedy deficiencies and deferred maintenance items that we have identified may vary significantly from estimates and competitive quotations from contractors.

This report has been prepared in strict confidence. No reproduction or reuse is permitted without express written consent. Furthermore, we will not release this report to anyone without your permission. If you have any questions about this report or review, please call.

Thank you for the opportunity to be of assistance to you.

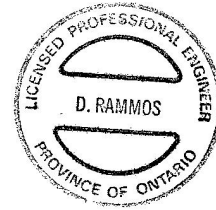
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Senior Project Manager



Report Reviewed by:

Jim Rammos, P.Eng.
Director, Building Science &
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APPENDIX A

SELECTED PHOTOGRAPHS

Location:
Shed 1 - 351028 17th Line
East Garafraxa, ON

Photo Taken by:
Jaime Rodriguez
Emma Bresil

Date:
October 24, 2023



Description:

East and north (front) elevations of the shed.

The shed has metal corrugated siding, sloped metal roof, sheet metal flashings, single pane wood windows, a metal service door and sliding barn doors.

Eavestroughs and rainwater leaders are not provided.

Paint coatings of the siding are aged.

Photo Number

1



Description:

South elevation (rear) of the shed building.

Translucent glass fibre panels windows are provided and are in poor condition.

Paint coatings of the siding and sheet metal fascias are faded, deteriorated and surfaces are rusted.

Photo Number

2

Location:
Shed 1 - 351028 17th Line
East Garafraxa, ON

Photo Taken by:
Jaime Rodriguez
Emma Bresil

Date:
October 24, 2023



Description:

North (front) elevation of the shed building.

The metal roof paint coatings are deteriorated, and metal panel surfaces are rusted.

Ridge vents surfaces appear to be rusted.

Paint coatings of the sheet metal fascias are faded, deteriorated and surfaces are rusted.

Photo Number

3



Description:

West elevation of the shed.

Paint coatings of the siding and sheet metal fascias are faded, deteriorated and surfaces are rusted.

There is an area beside the shed that is made of concrete that stores culverts and other materials. Not included.

Photo Number

4

Location:
Shed 1 - 351028 17th Line
East Garafraxa, ON

Photo Taken by:
Jaime Rodriguez
Emma Bresil

Date:
October 24, 2023



Description:

The structure has sloped corrugated metal roofing panels.

The roof is supported by prefabricated wood trusses. No decking/sheathing is provided.

Photo Number

5



Description:

The superstructure is wood, including roof slats, columns, and bracing.

The structure is in fair condition.

The building is not insulated or heated.

Photo Number

6

Location:
Shed 1 - 351028 17th Line
East Garafraxa, ON

Photo Taken by:
Jaime Rodriguez
Emma Bresil

Date:
October 24, 2023



Description:

Interior.

The structure has manually sliding barn doors composed of wood and metal panel sliding.

The doors are operational.

Photo Number

7



Description:

Interior lighting is abandoned and not working.

Photo Number

8

Location:
Shed 1 - 351028 17th Line
East Garafraxa, ON

Photo Taken by:
Jaime Rodriguez
Emma Bresil

Date:
October 24, 2023



Description:

There are holes in the siding, likely from impact damage.

The metal panels should be replaced.

Photo Number

9



Description:

Some sheet metal components are loose, damaged/dislodged.

There is localized damage to the barn doors and weatherstripping and although operational appear to require repairs.

Photo Number

10

Location:
Shed 1 - 351028 17th Line
East Garafraxa, ON

Photo Taken by:
Jaime Rodriguez
Emma Bresil

Date:
October 24, 2023



Description:
The shed has a
gravel base.

Photo Number
11



Description:
The electrical
system is
abandoned and not
in operation.

The building does
not have HVAC,
plumbing or other
services.

Interior lighting is
not in operation.
Exterior lights are
not provided.

Photo Number
12

Location:
Shed 1 - 351028 17th Line
East Garafraxa, ON

Photo Taken by:
Jaime Rodriguez
Emma Bresil

Date:
October 24, 2023



Description:

Some bottom chords of the trusses are damaged, likely impact damage.

There are ad-hoc repairs to some damaged chords.

Photo Number

13



Description:

There is damage to the siding, likely from impact.

Photo Number

14

Location:
Shed 1 - 351028 17th Line
East Garafraxa, ON

Photo Taken by:
Jaime Rodriguez
Emma Bresil

Date:
October 24, 2023



Description:

The windows are original wood framed and in poor condition.

One window is glazed with transparent acrylic sheets.

Security bars are provided.

Photo Number

15



Description:

Main electrical feed to the building is disconnected.

One window is single glass pane.

Security bars are provided.

Photo Number

16

Location:
Shed 1 - 351028 17th Line
East Garafraxa, ON

Photo Taken by:
Jaime Rodriguez
Emma Bresil

Date:
October 24, 2023



Description:

The wood framing, sheet metal panning and sealants of windows are aged and in poor condition.

Photo Number

17



Description:

General view of the property in front of the first shed.

The driveway is gravel. Not included.

Photo Number

18

Location:
Shed 1 - 351028 17th Line
East Garafraxa, ON

Photo Taken by:
Jaime Rodriguez
Emma Bresil

Date:
October 24, 2023



Description:
The columns and siding have damage, likely from impact damage.

Photo Number
19

APPENDIX B

FACILITY CONDITION INDEX

Facility Condition Index Table

NA = Not Anticipated during the timeframe of the report based on the condition at the time of the study.

BLW = Below Capital Threshold

The recommendations and comments included in this report are based on the collective experience of Keller Engineering. Any costs or other comments contained herein do not necessarily infer that subcontracts, quotes, or opinions of other professionals were solicited.

This table summarizes probable costs of repairs or replacements, including both labor and materials. These costs are based on our general knowledge of building systems, local contracting/construction industry conditions, and other sources such as Means Building Construction Cost Data. We have performed no design work as part of this study, nor have we obtained competitive quotations or estimates. Costs are uninflated.

Condition Values:

1. 0-10 Excellent. "As new" condition.
2. 11-30 Good. Sound and performs its function.
3. 31-60 Fair. Repair or replacement may be required to prolong life.
4. 61-80 Poor. Component has failed or cannot be relied on to perform function.
5. >81 Critical. Immediate repair/replacement is less than 1 year and may relate to safety or code violations.

**Township of East Garafraxa - Shed 1 at Gravel Pit
351028 17th Line, East Garafraxa**

REPAIR/REPLACEMENT RESERVES

ITEM	DESCRIPTION	UNIT COSTS & TIME-PERIOD ESTIMATES						CONDITION ESTIMATE		ANTICIPATED PRIORITY			PREDICTED LIFE CYCLE				
		URGENT	YEARS 1 - 5	YEARS 6 - 10	YEARS 11 - 15	YEARS 16 - 20	TOTAL	CONDITION LEVEL	CONDITION VALUE	IMPORTANCE WEIGHTING SCALE	PRIORITY VALUE INDEX	PRIORITY LEVEL	INCEPTION YEAR (ESTIMATED)	ACTUAL AGE	LIFE EXPECTANCY	OBSERVED AGE	REMAINING LIFE EXPECTANCY
		2023	2024 - 2028	2029 - 2033	2034 - 2038	2039 - 2043	20 YEAR										
1.0 SITE IMPROVEMENTS																	
1.1 Paving	Not applicable						\$ -	-	-	-	-	-	-	-	-	-	
1.2 Flatwork	Not applicable						\$ -	-	-	-	-	-	-	-	-	-	
1.3 Landscaping	Plants - Sod - Overgrowth - Trimming/removals - BLW						\$ -	Poor	70	20	50	Medium	1978	45	50	45	5
2.0 STRUCTURE & BUILDING ENVELOPE																	
2.1 Substructure	Foundations - Replacement - NA						\$ -	Fair	50	60	54	High	1978	45	100	45	55
	Gravel Base - Repairs	\$ 5,000					\$ 5,000	Fair	50	60	54	High	2000	23	25	25	0
2.2 Superstructure	Structural Framing - Wood - Columns, Beams and Prefabricated Trusses - Repairs	\$ 10,000					\$ 10,000	Fair	60	60	60	High	1978	45	100	45	55
	Structural Study - Review & Reporting	\$ 5,000					\$ 5,000	-	-	-	-	-	-	-	-	-	-
2.3 Exterior	Metal Cladding & Sheet Metal - Repairs	\$ 10,000					\$ 10,000	Fair	50	40	46	Medium	1978	45	75	45	30
	(2) Windows & Translucent Glassfibre Panels - Replacement	\$ 5,000					\$ 5,000	Poor	70	40	58	High	1978	45	25	45	0
	Window Security Bars - Replacement - BLW						\$ -	Fair	50	20	38	Medium	1978	45	25	45	0
	(1) Exterior Door - Swing - Replacement - BLW						\$ -	Fair	50	40	46	Medium	2000	23	30	30	0
	(2) Barn Doors & Weatherstripping - Sliding - Repairs	\$ 5,000					\$ 5,000	Fair	50	40	46	Medium	1978	45	50	40	10
	Exterior Paint Coatings - Service Doors, Metal Cladding - Restoration	\$ 25,000					\$ 25,000	Poor	70	40	58	High	2000	23	30	20	10
	Sealants - Replacement - BLW						\$ -	Poor	70	50	62	High	1978	45	15	45	0
2.4 Roofing	Sloped Metal Roof & Sheet Metal - Repairs	\$ 5,000					\$ 5,000	Fair	60	35	50	Medium	1978	45	75	45	30
	Paint/coatings - Restoration	\$ 25,000					\$ 25,000	Poor	70	50	62	High	1978	45	30	45	0
	Eavestroughs, Rainwater Leaders & Snow/Ice Guards - Install new	\$ 10,000					\$ 10,000	-	-	-	-	-	-	-	-	-	-
3.0 MECHANICAL SYSTEMS																	
3.1 Plumbing	Not applicable						\$ -	-	-	-	-	-	-	-	-	-	-
3.2 HVAC	Not applicable						\$ -	-	-	-	-	-	-	-	-	-	-
3.3 Electrical	Distribution & Wiring Systems - Replacement & Thermographic Scanning	\$ 10,000					\$ 10,000	Poor	70	50	62	High	1978	45	30	45	0
4.0 SPECIAL SYSTEMS																	
4.1 Security	Not applicable						\$ -	-	-	-	-	-	-	-	-	-	-
4.2 Fire & Life	Fire & Life Safety Systems - Exit signs, detectors, emergency lights, fire extinguishers incl. life safety audit - Install new	\$ 5,000					\$ 5,000	-	-	-	-	-	-	-	-	-	-
5.0 INTERIOR ELEMENTS																	
5.1 Finishes	Not applicable						\$ -	-	-	-	-	-	-	-	-	-	-
6.0 MISCELLANEOUS																	
6.1 Other	Not applicable						\$ -	-	-	-	-	-	-	-	-	-	-

FACILITY CONDITION INDEX (FCI)

Current Estimated Replacement Value of Assets

\$ 250,000

	IMMEDIATE	YEARS 1 - 5	YEARS 6 - 10	YEARS 11 - 15	YEARS 16 - 20	TOTAL
	2023	2024 - 2028	2029 - 2033	2034 - 2038	2039 - 2043	
Current Aggregated Total Costs Estimate	\$ 10,000	\$ 110,000	\$ -	\$ -	\$ -	\$ 120,000
Inflated Aggregated Total Costs	\$ 10,230	\$ 112,530	\$ -	\$ -	\$ -	\$ 122,760
Current FCI	4%	44%	0%	0%	0%	48% CRITICAL

FCI Classifications:

1. FCI = 0-5% Good Condition. Asset in reasonable condition and does not require capital expenditure.
2. FCI = 6-10% Fair Condition. Asset is deteriorating, requires capital expenditure and will likely become "poor" within a few years if not addressed.
3. FCI = 11-30% Poor Condition. Asset is deteriorated and requires immediate capital expenditure.
4. FCI = > 31% Critical Condition. Asset is in disrepair or dilapidated and requires urgent significant capital expenditure.

APPENDIX C

RESUMES

25 First Street
Orangeville, Ontario L9W 2C8
Tel: 519-940-0571
Email: info@kellerengineering.com



Jim Rammos, P.Eng., IEEE ~ CURRICULUM VITAE

AREAS OF EXPERTISE

Mr. Rammos has extensive knowledge and experience in the Building Science and Forensics industry. His specific areas of expertise include building science, thermographic scanning, mechanical & electrical engineering, new and restoration construction, reserve fund studies, performance audits, mechanical & electrical systems designs and assessments.

QUALIFICATIONS

Keller Engineering, located in Orangeville, Ontario services Southern Ontario and South Saskatchewan. We specialize in building inspection and commercial real estate consulting services. Our firm is a consulting engineering company that combines the resources of engineering leaders with the service and responsiveness of your own dedicated, local firm. With broad expertise and carefully controlled standards of quality our engineers provide a resource base that offers our clients the highest quality engineering evaluations.

Keller Engineering services encompass investigations and analyses vital to property acquisition and management, including: Due Diligence Reports, Property Condition Assessments, Reserve Studies, Performance Audits, Environmental Site Assessments, Construction Plan and Cost Reviews, Construction Loan Monitoring, Construction Quality Inspections, Structural Investigations, Facilities Management Consulting, Forensic Engineering, Insurance Investigations, and Design and Related Services.

Jim Rammos, P.Eng., IEEE is a Senior Engineer at Keller Engineering. Mr. Rammos is a licensed Professional Engineer in the province of Ontario and has over 25 years of engineering experience. To complement his portfolio of work Mr. Rammos also works with our clients to complete restoration work, building condition assessments, capital replacement studies and is a certified thermographer to complete electrical thermographic scanning and energy audits.

25 First Street
Orangeville, Ontario L9W 2C8
Tel: 519-940-0571
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EDUCATION

- Bachelor of Technology (B.Tech.), Ryerson Polytechnical University, Toronto, ON
- Bachelor of Engineering (B.Eng.), University of Toronto, Toronto, ON
 - Major: Mechanical Engineering
- Bachelor of Applied Science (B.A.Sc.), University of Toronto, Toronto, ON
 - Major: Electrical Engineering
- Professional Engineer, Professional Engineers Ontario, licensed since 1995
- BCIN – Building Code Identification Number 35394
- Certified Thermographer – Level 1, since 2007

PROFESSIONAL REGISTRATIONS

Licensed, Association of Professional Engineers of Ontario (PEO)
American Society of Heating, Refrigeration & Air-Conditioning Engineers (ASHRAE)
Canadian Society for Mechanical Engineers (CSME)
Canadian Automated manufacturing Society (CAMS)
Institute of Electronics & Electrical Engineers (IEEE)
Ontario Building Envelope Council (OBEC)

Jaime Rodríguez, B.Tech. (Arch.Sc.), C.E.T., RRO ***~ CURRICULUM VITAE***

AREAS OF EXPERTISE

Mr. Jaime Rodriguez specializes in building science and building envelope engineering. Jaime provides design & replacement/repair planning, quality control, building envelope forensics, diagnostic testing, and contract management services. He is primarily engaged in engineering project management, providing technical expertise, and building science/engineering design and property condition assessments.

QUALIFICATIONS

Keller Engineering, located in Orangeville, Ontario services Southern Ontario and South Saskatchewan. We specialize in building inspection and commercial real estate consulting services. Our firm is a consulting engineering company that combines the resources of engineering leaders with the service and responsiveness of your own dedicated, local firm. With broad expertise and carefully controlled standards of quality our engineers provide a resource base that offers our clients the highest quality engineering evaluations.

Keller Engineering services encompass investigations and analyses vital to property acquisition and management, including: Due Diligence Reports, Property Condition Assessments, Reserve Studies, Performance Audits, Environmental Site Assessments, Construction Plan and Cost Reviews, Construction Loan Monitoring, Construction Quality Inspections, Structural Investigations, Facilities Management Consulting, Forensic Engineering, Insurance Investigations, and Design and Related Services.

Jaime Rodríguez is Senior Project Manager at Keller Engineering. Mr. Rodriguez is a Certified Engineering Technologist in the Province of Ontario and has over 20 years of engineering experience. Jaime has effective problem-solving skills that provide practical engineering, project management & field applied solutions.

EDUCATION

- Bachelor of Technology (B.Tech.), Ryerson University, Toronto, ON

PROFESSIONAL REGISTRATIONS

Certified Engineering Technologist, Ontario Association of Engineering Technicians and Technologists (OACETT).

International Institute of Building Enclosure Consultants (IIBEC), RRO Designation.