

# Thunder Bay's Economic Activity Index

ISSUE THREE  
Fall 2018



Thunder Bay  
**Ventures**  
Community Futures Development Corporation

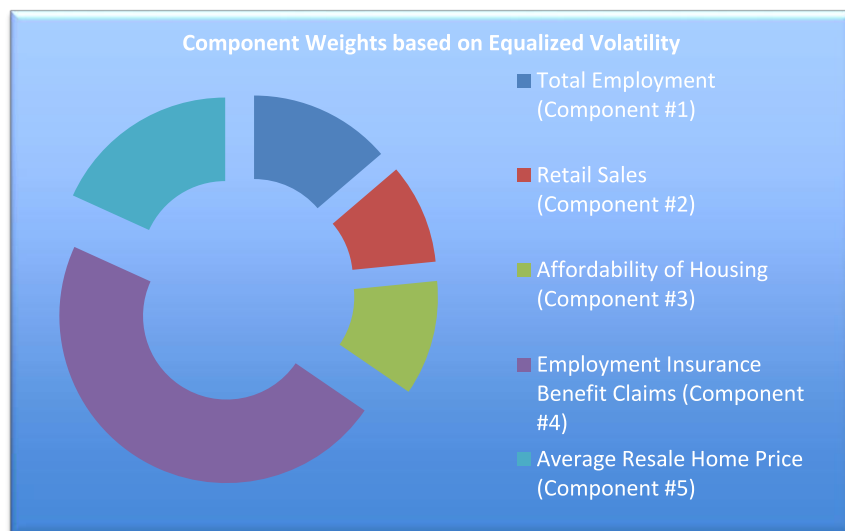
Dr. Bahram Dadgostar  
Dr. Camillo Lento

## TBEAI Background

Gross Domestic Product (GDP) measures are often used to determine the health of an economy. However, a different methodology is applied to calculate the GDP of a national versus regional economy. As a result, regional GDP estimates are subject to various assumptions which may result in reduced reliability. Moreover, GDP measures are general and have complex compositions. Often, a regional index is used to complement GDP measures by highlighting the major factors that contribute to the expansion or contraction of economic activities.

Thunder Bay Ventures (TBV) commissioned a study which established the Thunder Bay Economic Activity Index (TBEAI). The TBEAI is a unique, customized regional index that considers the nature of Thunder Bay's economy. The objective of the TBEAI is to better reflect the reality and dynamic of Thunder Bay's economy, and to help the community stay informed about changes in economic activity.

The TBEAI uses five major factors that signal changes in Thunder Bay's economic activity. The five factors are: i) total employment; ii) retail sales; iii) average resale home price; iv) employment insurance benefit claims; and v) affordability of housing. These factors were selected based on empirical and theoretical economic rationale. The following chart displays each component's weight after applying the methodology outlined to the right.



## Summary Highlights

- TBEAI signals continued, moderate growth after two years of stronger growth (2016 and 2017).
- Thunder Bay's long-term growth continues to lag behind the Province, but, the gap has not been widening in recent years.
- Manufacturing sector stagnant, whereas construction sector is strong. Service sector limited by soft housing market.
- Employment levels rebound to historical levels, while retail sales experience record growth.
- The Aboriginal population make a significant contribution to Thunder Bay's GDP.

## TBEAI Methodology

*The methodology utilized to calculate the TBEAI is based on the Conference Board of Canada's model for calculating a composite index. Six steps are undertaken to calculate the TBEAI:*

1. Period-to-period changes are computed for each component.
2. The period contributions of the components are adjusted to equalize the volatility of each component.
3. The adjusted period contribution across the components for each period is summed to obtain the growth rate of the index.
4. The sum of the adjusted contributions of the composite index is adjusted to equate their trend to that of the coincident index.
5. The level of the index is computed using the symmetric percentage change formula.
6. The index is rebased to average 100 in the base year.

## GDP Outlook

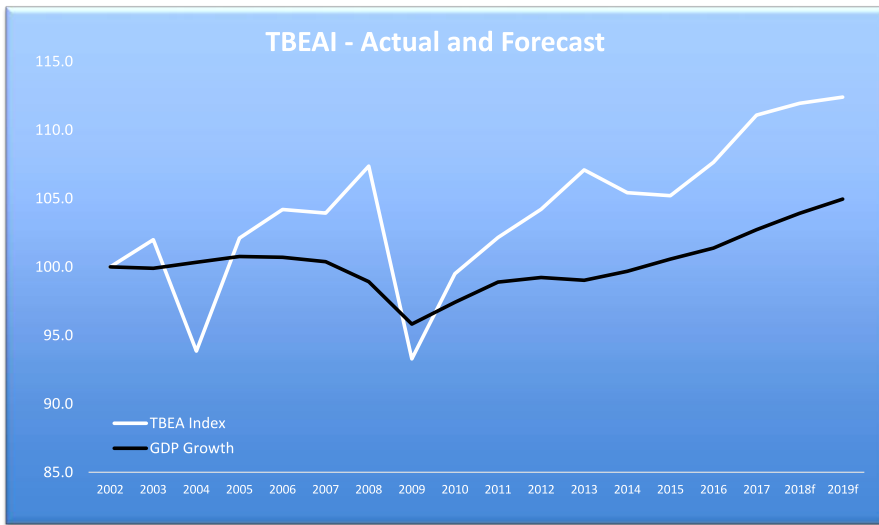
*The following is the Conference Board of Canada's summary of the real GDP outlook for Thunder Bay:*

Real GDP Growth			
2011 to 2015	2016	2017	2018 to 2019
0.6%	0.8%	1.3%	1.1%

Thunder Bay's GDP outlook has improved in 2016 and 2017 compared to the average growth from 2011 to 2015 (0.6%), with real GDP growth forecasted in 2018 and 2019.

However, Thunder Bay's forecasted GDP growth of 1.1% is below the forecasted growth of 2.2% for the Province as a whole.

# Thunder Bay's Economic Activity Index



## TBEAI signals continued, moderate growth after two years of relatively stronger growth (2016 and 2017)

The TBEAI suggests above average economic growth in 2016 and 2017. The individual components show that growth was driven by a return of employment to more historical levels (i.e., total employment increase to 61,500 in 2017 from 59,675 in 2015), a decline in employment insurance claims to multi-year lows (i.e., lowest levels in over 15 years), and strong retail sales growth. The average resale home price also exhibits moderate growth levels during 2016 and 2017, while housing affordability remained stable.

The TBEAI forecasts average economic growth of 0.6% for 2018 and 2019 which is below the Conference Board of Canada's average GDP growth forecast of 1.1% per annum for over the same period.

The following risks are important to consider when forecasting Thunder Bay's economic growth:

- **Commodity prices**
- **Reduced Toronto Transit Commission street car orders**
- **Population declines**

## TBEAI suggests long-term growth continues to lag behind the Province; however, the gap has not been widening in recent years.

The TBEAI, as compared on the same basis to Ontario (Ontario Economic Activity Index - OEAI), suggests that Thunder Bay's economy activity has historically lagged behind the Province.

However, it is important to note that the gap in growth between Thunder Bay and Ontario did not widen in 2016 and 2017, and expected to remain consistent over the next few years. This suggests that recent economic growth in Thunder Bay has matched that of the Province.

## Additional Commentary ...

*The following are some key economic highlights, based on commentary from the Conference Board of Canada.*

### 1. Manufacturing Continues to Inch Higher

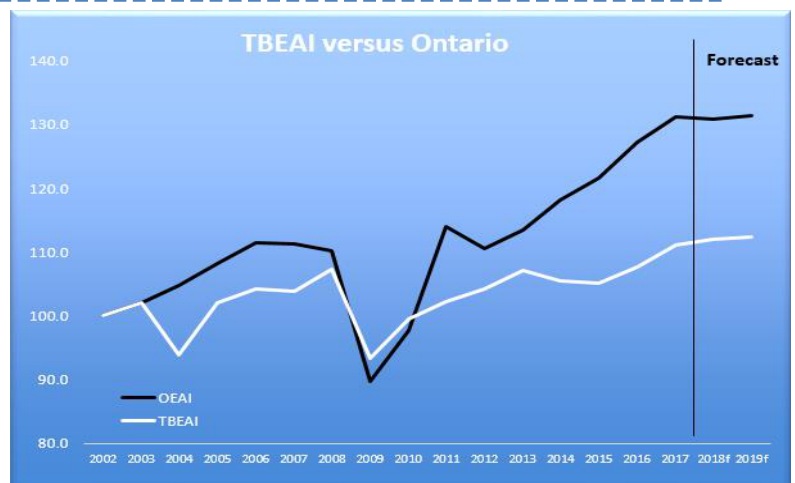
The manufacturing sector is expected to post marginal growth again in 2018, which is reflective of the past four years of activity. Major issues were avoided when the U.S. Commerce Department found that Resolute had a "dumping rate" of zero percent. Resolute also reached a new four-year agreement with Unifor. The Bombardier plant continues to work on streetcars for the Toronto Transit Commission.

### 2. Recent Construction Growth Strong

Construction output is expected to grow by 4.5 per cent in 2018, following strong expansion of 5.9 per cent in 2017 to cap off five consecutive years of growth. Non-residential investment activity is being driven mainly by smaller projects. Although major projects have been scarce in recent years, new projects such as the Thunder Bay Art Gallery and a new 325-bed jail could change this trend. Stagnant population growth has limited the number of new residential builds; however, the sector has been buoyed in recent years by new apartment activity.

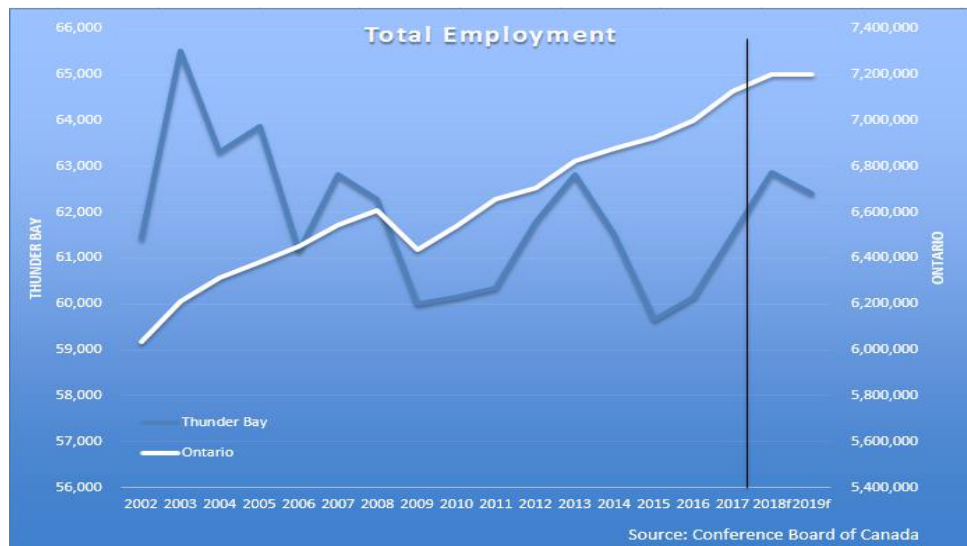
### 3. Service Sector Limited by Weak Housing Market

Service sector grew by 0.9 per cent in 2017, which is expected to continue into 2018. Service growth has been constrained by the poor performance of its biggest industry, finance, insurance and real estate. This sector has declined by 17 per cent over the past five years, on the backdrop of a softer real estate market (i.e., soft re-sale market and housing starts). Conversely, transportation and warehousing industry continues to be an economic bright spot, with the local port and airport helping to explain this strong showing. Also, strong retail sales pushed the wholesale trade and retail industries to record gains in 2017.



# Employment levels rebound to historical levels (Component #1)

Thunder Bay's total employment reached 61,500 in 2017 which is consistent with recent historical levels. This increase comes after job levels declining in 2015 to multi-year lows. However, lack of job growth in Thunder Bay continues to be a theme. Since 2002, Thunder Bay has not experienced any job growth, whereas, the Province's total employment grew by 18.1 per cent.



## Employment Insurance beneficiaries decline to multi-year lows (Component #4)

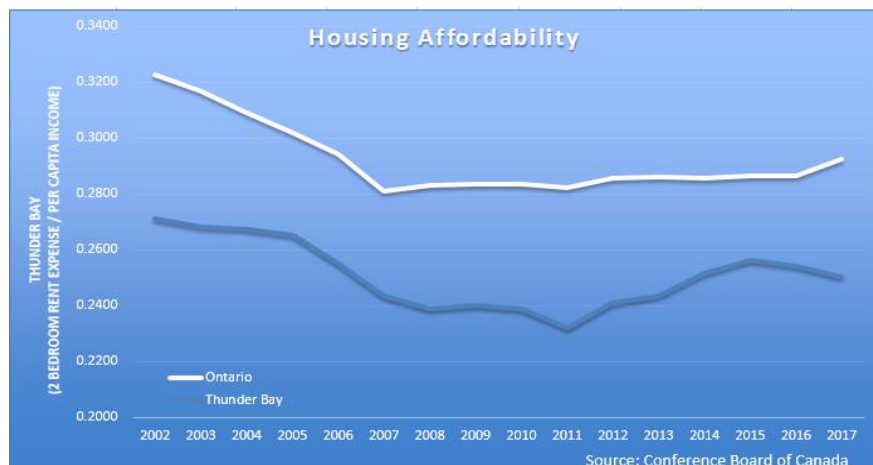
The number of employment insurance beneficiaries in Thunder Bay continued to decline over the years. EI Beneficiaries declined by an average of 3.3 per cent in 2016 and 2017, whereas, the overall Ontario average decline was 1.8 per cent over the same time period.

The number of EI beneficiaries in Thunder Bay in 2017 is its lowest level in over fifteen years.

## Retail sales display strong growth, consistent with Province (Component #2)

The increase in employment (Component #1) and income helped to drive growth of 6.9 per cent in Thunder Bay's retail sales, the largest increase in approximately 30 years. As noted by the Conference Board, although both employment and income are expected to experience some growth 2018 and 2019, this level of growth, may not be unsustainable. Future growth is expected to be at a more moderate level of 3.2 per cent. Over the past five years, retail sales have grown by 21.6 per cent in Thunder Bay relative to 31.6 per cent for the Province.

## Housing becomes slightly more affordable as rent costs stabilize (Component #3)



## Resale Home Prices Continue to Grow (Component #5)

Average resale prices in Thunder Bay continued their upward trend in 2017, after slow growth in 2016. However, price increases have been much less than what has been experienced by the Province. Specifically, Thunder Bay resale prices have increased by a total of 3.4 per cent during 2016 and 2017, whereas, Ontario resale prices increased by 23.5 per cent over the same period (n.b., the Provincial average is significantly impacted by Toronto home price increases).

Thunder Bay's resale market has slowed down in recent years, however, prices have still increased by 90.3 per cent from 2006 to 2017 compared to a 105.7 per cent increase for Ontario as a whole over the same period.

Rental accommodations have become slightly more affordable in Thunder Bay as growth in per capita income has outpaced increases in rent costs. Specifically, per capita income has increased by approximately 6.5 per cent from 2015 to 2017, while rental costs have only increased by approximately 4.1 per cent. Over this same period, Ontario has experienced declining affordability as the growth in rental costs outpace per capita income growth.

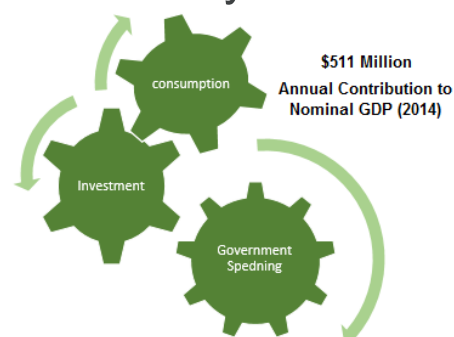


# Economic Impacts of Aboriginal population in Thunder Bay

- ✓ The following is a summary of a study conducted by Dr. Bahram Dadgostar and Dr. Karen Peterson entitled, *ENHANCING THE PARTICIPATION OF ABORIGINAL PEOPLE IN THE SOCIO-ECONOMIC LIFE OF THUNDER BAY*. The study was conducted with the purpose of providing insight into the economic activity of Aboriginal people in Thunder Bay as well as developing ideas for creating a supportive urban environment.
- ✓ The study had two main research objectives. The first objective is to provide a high-level estimate of the contribution of the Aboriginal population to the Thunder Bay GDP based on secondary data. The second objective is to provide insights, based on primary data, into the sources of the GDP contribution by administering a survey to key stakeholders in the Aboriginal population.

## Objective #1 – Estimating Contributions to Thunder Bay's GDP

- ✓ Over the past few decades, Aboriginal economic development has been transforming from dependency on government transfers to one of developing local economies, entrepreneurship and capacity development.
- ✓ This transformation is evidenced by the increasing numbers of Aboriginal students in post-secondary institutions, the rising number of community owned businesses, increased employment, entrepreneurship and partnerships of Aboriginal communities with industry that focus on socio-economic goals.
- ✓ The National Household Survey (NHS) and Conference Board of Canada's report were used, in conjunction with an adapted Sharpe et al. (2007) methodology, to estimate the contribution of the Thunder Bay Aboriginal population to the GDP.



### Aboriginal Contributions

**6.9% to 9.8% of Thunder Bay's Nominal GDP\***

\* Results are based on 2014 figures, median and mean wages

## Objective #2 – Insights into the nature of GDP Contributions

- ✓ The following is a summary of survey responses from Aboriginal city residents, organizations, Chiefs & Council, and visitors.

Reason for Coming to Thunder Bay	Frequency of Visit	Money Spent each trip
<ul style="list-style-type: none"> <li>✓ Education</li> <li>✓ Meetings</li> <li>✓ Professional Services</li> <li>✓ Visiting friends and family</li> <li>✓ Shopping</li> <li>✓ Health</li> <li>✓ Entertainment</li> </ul>	<ul style="list-style-type: none"> <li>✓ Once per month to three times per year</li> </ul>	<ul style="list-style-type: none"> <li>✓ \$1 to \$2,000</li> </ul>
Opportunities / Challenges	Possible Initiatives / Activities	Improving Awareness
<ul style="list-style-type: none"> <li>✓ Create a more welcoming environment</li> <li>✓ Tackle issues around racism</li> </ul>	<ul style="list-style-type: none"> <li>✓ Sensitivity and Cross Cultural Training</li> <li>✓ Affordable Housing</li> <li>✓ Cultural Events</li> </ul>	<ul style="list-style-type: none"> <li>✓ Awareness and Education</li> <li>✓ Media</li> <li>✓ Research</li> </ul>