# **Economic & Fiscal Impact of the Minnesota Multi-Family Housing Industry**

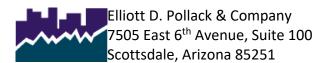


Prepared for:

Minnesota Multi Housing Association

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## **Executive Summary**

This report addresses the economic and fiscal impact of the Minnesota Multi-Family Housing industry and calculates both projected annual construction as well as current operations of existing apartment communities in the State. Economic impacts (jobs, wages and economic output) as well as fiscal impacts (government revenues) generated for the state, counties and local governments are provided.

#### **Economic Impact Analysis**

- Each year, thousands of jobs are created throughout the State in the construction industry from new apartment development. An average of 6,200 units Statewide are projected to be built each year over the next decade, 4,400 of which are expected to be built in the Twin Cities MSA. In total the estimated \$1.0 billion in construction activity for these communities generates an estimated 12,341 jobs in the state each year with wages of \$793.9 million and a total economic impact of \$1.9 billion each year.
- There are an estimated 650,000 apartment units in Minnesota as of 2018. The following table provides the impacts of the operations of those apartments. Based on averages of about 35 units per employee, the Minnesota apartment industry is estimated to employ 16,480 people throughout the State. The operations of the communities create a ripple effect that generate an estimated 11,644 indirect and induced jobs. In total, the apartment industry generates an annual impact of 28,124 jobs, \$1.1 billion in wages and \$5.3 billion in annual economic output each year.
- The impacts for the Twin Cities MSA are also provided in the following tables. The results are not additive, but already part of the Statewide impact.

Economic Impact Summary  Minnesota  (2019 Dollars)					
	Statewide	Twin Cities MSA			
Construction					
Jobs (direct, indirect, induced)	12,341	8,724			
Wages (\$mil)	\$793.9	\$561.2			
Economic Output (\$ mil)	\$1,913.8	\$1,352.9			
Operations					
Jobs (direct, indirect, induced)	28,124	19,387			
Wages (\$mil)	\$1,088.3	\$750.2			
Economic Output (\$ mil)	\$5,284.0	\$3,642.4			



## **Fiscal Impact Analysis**

- The apartment construction industry creates significant tax revenues for the State, counties and local governments. Indeed, construction of the projected 6,200 apartment units each year generates an estimated \$112.5 million from fees and tax collections.
- The operations of the estimated 650,000 apartment units throughout Minnesota also generate significant revenues for governments including property taxes, retail sales taxes on supply purchases, franchise fees and secondary revenues from employees. In total, the State, counties and local governments collect an estimated \$1.1 billion each year from the Minnesota apartment industry operations.

Fiscal Impact of Operations Summary  Minnesota Multi-Family Impact  (2019 Dollars)					
	State of Minnesota	Local Governments	Total		
Statewide					
Impact from Construction					
Sales tax	\$52,471,100	\$3,395,600	\$55,866,700		
Employee generated taxes	\$42,712,000	\$13,887,600	\$56,599,600		
Total - Construction	\$95,183,100	\$17,283,200	\$112,466,300		
Ongoing Annual Operations					
Property tax	N/A	\$493,024,000	\$493,024,000		
General sales tax	\$497,097,700	\$32,169,500	\$529,267,200		
Local Francise Fees	N/A	\$15,573,700	\$15,573,700		
Employee generated taxes	\$58,309,600	\$31,441,187	\$89,750,787		
Total - Operations	\$555,407,300	\$572,208,387	\$1,127,615,687		
Twin Cities MSA					
Impact from Construction					
Sales tax	\$37,693,400	\$2,439,300	\$40,132,700		
Employee generated taxes	\$30,193,300	\$9,817,300	\$40,010,600		
Total - Construction	\$67,886,700	\$12,256,600	\$80,143,300		
Ongoing Annual Operations					
Property tax	N/A	\$385,887,000	\$385,887,000		
General sales tax	\$388,646,100	\$25,151,100	\$413,797,200		
Local Francise Fees	N/A	\$10,735,300	\$10,735,300		
Employee generated taxes	\$40,194,300	\$21,673,188	\$61,867,488		
Total - Operations	\$428,840,400	\$443,446,588	\$872,286,988		



## 1.0 Introduction

#### 1.1 Purpose of Study

The purpose of this study is to analyze the multi-family housing market in Minnesota including both Statewide impacts as well as the impacts generated by the apartment industry in the Twin Cities metropolitan area. These impacts are calculated for annual new construction as well as ongoing annual operations of existing apartment communities in Minnesota. Economic impacts (jobs, wages and economic output) as well as fiscal impacts (government revenues) generated for the state, counties and local governments are provided.

## 1.2 Limiting Conditions

This study prepared by Elliott D. Pollack & Company is subject to the following considerations and limiting conditions.

- It is our understanding that this study is for the client's due diligence and other
  planning purposes. Neither our report, nor its contents, nor any of our work were
  intended to be included and, therefore, may not be referred to or quoted in whole
  or in part, in any registration statement, prospectus, public filing, private offering
  memorandum, or loan agreement without our prior written approval.
- The reported recommendation(s) represent the considered judgment of Elliott D.
   Pollack & Company based on the facts, analyses and methodologies described in the report.
- Except as specifically stated to the contrary, this study will not give consideration to the following matters to the extent they exist: (i) matters of a legal nature, including issues of legal title and compliance with federal, state and local laws and ordinances; and (ii) environmental and engineering issues, and the costs associated with their correction. The user of this study will be responsible for making his/her own determination about the impact, if any, of these matters.
- This study is intended to be read and used as a whole and not in parts.
- Estimates regarding specific land use, construction costs and operating data were provided by the client as well as reputable market resources as specified in the tables within this report. Data has been reviewed and verified to determine its reasonableness and applicability to the project.
- The economic and fiscal impact study evaluates the potential "gross impacts" of construction and operations activities. The term "gross impacts" as used in this study refers to the total revenue, jobs and economic output that would be generated by the construction and operations. The study does not consider the



potential impact on other businesses or real estate property in the trade area that may occur as a result of the apartment industry.

- The analysis is based on the current tax structure and rates imposed by the State, counties, and local governments. Changes in those rates would alter the findings of this study.
- All dollar amounts are stated in current dollars and, unless indicated, do not take into account the effects of inflation.

Our analysis is based on currently available information and estimates and assumptions about long-term future development trends. Such estimates and assumptions are subject to uncertainty and variation. Accordingly, we do not represent them as results that will be achieved. Some assumptions inevitably will not materialize, and unanticipated events and circumstances may occur; therefore, the actual results achieved may vary materially from the forecasted results. The assumptions disclosed in this study are those that are believed to be significant to the projections of future results.



## 2.0 Assumptions & Methodology

#### 2.1 Background

Economic impact analysis examines the regional implications of an activity in terms of three basic measures: output, earnings, and job creation. Fiscal impact analysis evaluates the public revenues and costs created by a particular activity. In a fiscal impact analysis, the primary revenue sources of a city, county, or state government are analyzed to determine how the activity may financially affect them. For this study, the analysis focuses on the impact of a typical year of construction as well as the annual impact of the ongoing operations of the apartment industry in Minnesota and the Twin Cities MSA.

## 2.2 Economic Impact Methodology

Economic impact analysis examines the economic implications of an activity in terms of output, earnings, and employment. The different types of economic impacts are known as direct, indirect, and induced, according to the manner in which the impacts are generated. For instance, direct employment consists of permanent jobs held by construction employees. Indirect employment is those jobs created by businesses that provide goods and services essential to the construction of the project. These businesses range from manufacturers (who make goods) to wholesalers (who deliver goods). Finally, the spending of the wages and salaries of the direct and indirect employees on items such as food, housing, transportation and medical services creates induced employment in all sectors of the economy, throughout the state. These secondary effects are captured in the analysis conducted in this study.

Multipliers have been developed to estimate the indirect and induced impacts of various direct economic activities. IMPLAN, a nationally recognized provider of local multipliers, developed the multipliers used in this study. The economic impact is categorized into three types of impacts:

- (1) <u>Employment Impact</u> the total wage and salary and self-employed jobs in a region. Jobs include both part time and full-time workers.
- (2) <u>Earnings Impact</u> the personal income, earnings or wages, of the direct, indirect and induced employees. Earnings include total wage and salary payments as well as benefits of health and life insurance, retirement payments and any other non-cash compensation.
- (3) **Economic Output** also referred to economic activity, relates to the gross receipts for goods or services generated by the company's operations.

### 2.3 Fiscal Impact Methodology

Fiscal impact analysis studies the public revenues associated with a particular economic activity. The primary revenue sources of local, county, and state governments (i.e., taxes) are analyzed to determine how an activity may affect the various jurisdictions. This section will evaluate the impact of the apartment industry on the State of Minnesota, counties and local governments.



Weighted average tax rates are used to provide an estimated overall impact on county and local governments.

The fiscal impact figures cited in this report have been generated from information provided by a variety of sources including the U.S. Bureau of the Census; the U.S. Department of Labor; the Minnesota Department of Revenue and the U.S. Consumer Expenditure Survey. Elliott D. Pollack & Company has relied upon the estimates of construction cost and operating revenues outlined in this study. Unless otherwise stated, all dollar values are expressed in 2019 dollars.

Fiscal impacts are categorized by type in this study, similar to economic impact analysis. The major sources of revenue generation for governmental entities are related to the proposed construction and ongoing operations.

Construction impacts relate to the revenues generated from construction and include state and local sales taxes levied on construction materials. These are the "primary" revenues generated from the construction. In addition, the direct, indirect and induced employees supported by the construction activity also generate revenues to local and state governments. For instance, employees will spend part of their salaries on retail goods (thereby paying sales taxes), pay property taxes on real estate they own and contribute to the other revenue sources that are collected by local governments.

The ongoing operations of a real estate project also create beneficial fiscal effects for a community. The primary source of revenue for the apartment industry would be generated from sales taxes, property taxes and other various taxes. The following is a description of the applicable revenue sources that will be considered for this analysis.

#### • Sales Tax on Construction Materials

The State and local governments levy a sales tax on materials used in the construction of buildings and land improvements. The tax collection estimates assume that 65% of the construction cost of the building and its land improvements are related to construction materials with the remaining 35% as a deduction for labor. The sales tax rate is then applied to the 65% materials figure.

The prime contracting tax is a one-time collection by the governmental entity. The State currently levies a 6.875% sales tax on construction activity. The weighted average rate for local governments is 0.44%.

#### Use Tax

The State and local governments charge a use tax that is assessed on items purchased outside the jurisdiction and brought in for storage, use or consumption. This tax rate will be applied to a portion of the FF&E (furniture, fixture and equipment) estimate of the developments. The use tax rate for the State is 6.875%. The weighted average use tax rate for local governments is 0.44%.



#### Retail Sales Tax

The State and local governments in Minnesota charge sales tax on retail goods. The sales tax rate for the State is 6.875%. The weighted average sales tax rate used in the analysis for local governments was 0.44%, based on tax rates of Anoka, Carver, Dakota, Hennepin, Ramsey, Scott and Washington counties. These tax rates are applied to estimated lease revenues and on projected local supply purchases as well as the spending of employees. Based on data from the U.S. Consumer Expenditure Survey, the projected extent of retail spending and the resulting sales tax receipts was calculated.

#### Franchise Fees

Local governments levy a franchise fee on utility revenues. The rate used in this analysis is 4.5% and is applied to the projected utility usage of apartment communities throughout Minnesota.

#### Property Tax

Property taxes are collected on each apartment community. The projected property values were based on data provided by the Minnesota Department of Revenue regarding the Net Capacity Tax, classification rate and total collections.

### • State Income Tax

The State of Minnesota collects taxes on personal income. The tax rate used in the analysis averages between 2.6% and 3.7% of earnings. This percentage is based on the most recently available income tax data from the Minnesota Department of Revenue. The factor is applied to the projected wage levels of direct, indirect and induced employees supported by the construction and operations of the project.

### • Motor Fuel Excise Taxes

The State of Minnesota collects specific taxes for gasoline usage. The motor fuel tax is \$0.2025 per gallon and is calculated based on a vehicle traveling 12,000 miles per year at 20 miles per gallon. These factors are applied to the projected direct and indirect employee count.

#### Motor Vehicle Registration Tax

The vehicle registration tax is a personal tax placed on vehicles at the time of annual registration. This factor is applied to the projected direct, indirect and induced employee count. The average tax used in this analysis is \$135 per vehicle.

The above tax categories represent the largest sources of revenues that would be generated to State and local governments. This analysis considers gross tax collections and does not differentiate among dedicated purposes or uses of such gross tax collections.



## 3.0 Economic & Fiscal Impact of Annual Construction

## 3.1 Apartment Construction Assumptions

Each year, thousands of jobs are created throughout the State in the construction industry from new apartment development. According to data released by Marquette Advisors and Dougherty Mortgage LLC, an estimated 4,400 units will be built each year in the Twin Cities MSA over the next decade. Based on historical relations, this equates to 6,200 units statewide. The average size per unit is projected to be 889 square feet with an 80% utilization rate used to project total new building construction. Using an average construction cost of \$150 per square foot, these figures are then used to estimate the total statewide construction impact on the economy and government revenues.

Assumptions  Minnesota Apartment Construction Impact (2019 Dollars)						
Twin Cities Statewide MSA						
Average annual units built	6,200	4,400				
Average sf per unit	889	889				
Utilization rate	80%	80%				
Construction cost per sf	\$150	\$150				
Furniture, fixtures & equipment per unit	\$15,000	\$17,000				
Source: MMHA; ; U.S. Census Bureau; Marquette Advisors; Dougherty Mortgage LLC						

#### 3.2 Economic Impact of Apartment Construction

The \$1.0 billion of apartment construction in Minnesota will generate 7,142 direct construction jobs with wages of \$490.5 million each year. The ripple effect of this activity generates an additional 5,199 indirect and induced jobs with wages of \$303.4 million. In total, the apartment construction industry generates an estimated 12,341 jobs in the state with wages of \$793.9 million and a total economic impact of \$1.9 billion each year.

Within the Twin Cities MSA alone, an estimated \$729.1 million in construction will take place each year. This would generate 5,048 direct jobs and \$346.7 million in direct wages. In total, the impact of apartment construction in the metropolitan area generates an estimated 8,724 jobs, \$561.2 million in wages and \$1.4 billion in economic impact.



Economic Impact of Construction  Minnesota Multi-Family Impact (2019 Dollars)								
Impact Type	Jobs	Wages (\$ mil)	Economic Output (\$ mil)					
Statewide	Statewide							
Direct	7,142	\$490.5	\$1,031.4					
Indirect	1,433	\$107.9	\$315.0					
Induced	3,766	\$195.5	\$567.4					
Total	12,341	\$793.9	\$1,913.8					
Twin Cities MSA								
Direct	5,048	\$346.7	\$729.1					
Indirect	1,013	\$76.3	\$222.7					
Induced	2,662	\$138.2	\$401.1					
Total	8,724	\$561.2	\$1,352.9					

## 3.3 Fiscal Impact of Apartment Construction

The apartment construction industry creates significant tax revenues for the State and local governments as shown on the following tables.

The State of Minnesota is estimated to receive approximately \$95.2 million each year during construction. This includes \$52.5 million in direct construction sales taxes as well as an estimated \$42.7 million in secondary tax revenues generated by construction employees.

Of the total collections listed above, the construction that takes place within the Twin Cities MSA is projected to generate \$67.9 million, or about 71.3% of the statewide total.



# Fiscal Impact of Construction Minnesota Multi-Family Impact State of Minnesota

(2019 Dollars)

		\	J Domais,			
	<b>Primary Revenues</b>		Secondary Revenues			
		Employee	Individual	Motor	Motor	
Impact	Sales	Spending	Income	Vehicle	Fuel	Total
Type	Tax	Sales Tax	Tax	Registration	Tax	Revenues
Statewid	e					
Direct	\$52,471,100	\$8,251,300	\$16,432,300	\$964,100	\$867,700	\$78,986,500
Indirect	N/A	\$1,770,500	\$3,938,100	\$193,400	\$174,100	\$6,076,100
Induced	N/A	\$3,583,900	\$5,570,500	\$508,500	\$457,600	\$10,120,500
Total	\$52,471,100	\$13,605,700	\$25,940,900	\$1,666,000	\$1,499,400	\$95,183,100
Twin Citi	es MSA					
Direct	\$37,693,400	\$5,832,900	\$11,616,000	\$681,500	\$613,400	\$56,437,200
Indirect	N/A	\$1,251,600	\$2,783,900	\$136,700	\$123,100	\$4,295,300
Induced	N/A	\$2,533,500	\$3,937,800	\$359,400	\$323,500	\$7,154,200
Total	\$37,693,400	\$9,618,000	\$18,337,700	\$1,177,600	\$1,060,000	\$67,886,700

<sup>1/</sup>The figures are intended only as a general guideline as to how the State could be impacted by the project. The above figures are based on the current economic structure and tax rates of the State.



Source: MMHA; Elliott D. Pollack & Co.; IMPLAN; MN Dept. of Revenue

The counties and local governments throughout Minnesota are projected to collect an estimated \$17.3 million from apartment construction activity each year. This includes \$12.3 million collected from the construction of the communities located in the metropolitan area.

	Fiscal Impact of Construction Minnesota Multi-Family Impact County and Local Governments						
	Drimany Payanuas	(2019 Dol		•			
	Primary Revenues	Employee	ondary Revenu Employee	Employee			
Impact	Sales	Spending	Franchise	Property	Total		
Туре	Tax	Sales Tax	Fees	Tax	Revenues		
Statewid	e				•		
Direct	\$3,395,600	\$534,000	\$385,600	\$7,141,700	\$11,456,900		
Indirect	N/A	\$114,600	\$77,400	\$1,432,700	\$1,624,700		
Induced	N/A	\$231,900	\$203,400	\$3,766,300	\$4,201,600		
Total	\$3,395,600	\$880,500	\$666,400	\$12,340,700	\$17,283,200		
Twin Citie	Twin Cities MSA						
Direct	\$2,439,300	\$377,500	\$272,600	\$5,048,500	\$8,137,900		
Indirect	N/A	\$81,000	\$54,700	\$1,012,800	\$1,148,500		
Induced	N/A	\$164,000	\$143,800	\$2,662,400	\$2,970,200		
Total	\$2,439,300	\$622,500	\$471,100	\$8,723,700	\$12,256,600		

 $<sup>\</sup>underline{1/}$  The figures are intended only as a general guideline as to how the counties could be impacted. The above figures are based on the current economic structure and tax rates of the counties.



Source: MMHA; Elliott D. Pollack & Co.; IMPLAN; MN Dept. of Revenue

## 4.0 Economic & Fiscal Impact of Annual Operations

## 4.1 Apartment Operations Impact Assumptions

There are an estimated 650,000 apartment units in Minnesota as of 2018. This is based on information from Minnesota Governor's Task Force on Housing. Each of these apartment communities employ various types of jobs such as security, maintenance technicians, housekeeping, leasing professionals, and managers. To estimate total employment at apartment communities throughout the state an average of 35 units per employee was used. This equates to about 2-3 full-time equivalent jobs for a community with 100 units.

Additional assumptions used in the analysis include the average rent per unit and average vacancy to calculate lease tax collections, the percent of income that is devoted to rent (35%) to estimate household incomes, and taxable supplies per employee.

Assumptions Minnesota Apartment Operating Impacts (2019 Dollars)						
Twin Cities Statewide MSA						
Total inventory (units)	650,000	461,500				
Percent rental units	88.7%	86.2%				
Average units per employee	35	35				
Average rent per unit	\$1,100	\$1,200				
Average economic vacancy	5.0%	3.0%				
Percent of income devoted to rent	35%	35%				
Taxable supplies per employee	\$1,000	\$1,000				
Source: MMHA; MN Governor's Task Force on Housing ; U.S. Census Bureau; Marquette Advisors; Dougherty Mortgage LLC						

## 4.2 Economic Impact of Operations

The Minnesota apartment industry is estimated to employ 16,480 people throughout the State. The operations of the communities create a ripple effect that generate an estimated 11,644 indirect and induced jobs. In total, the apartment industry generates an annual impact of 28,124 jobs, \$1.1 billion in wages and \$5.3 billion in annual economic output, Statewide.

The estimated impact of the communities located in the Twin Cities MSA represents about 70% of the Statewide total. That is, a total of 19,387 jobs, \$750.2 million in wages and \$3.6 billion in economic impact.



Annual Economic Impact of Operations Minnesota Multi-Family Impact Minnesota (2019 Dollars)					
Impact Type	Jobs	Wages (\$ mil)	Economic Output (\$ mil)		
tatewide					
Direct	16,480	\$458.4	\$3,432.3		
Indirect	6,484	\$362.7	\$1,075.8		
Induced	5,160	\$267.3	\$776.0		
Total	28,124	\$1,088.3	\$5,284.0		
win Cities MSA					
Direct	11,360	\$316.0	\$2,365.9		
Indirect	4,469	\$250.0	\$741.6		
Induced	3,557	\$184.2	\$534.9		
Total	19,387	\$750.2	\$3,642.4		

## 4.3 Fiscal Impacts of Operations

The State, counties and local governments receive tax revenues from the operations of the apartment communities. Direct revenues are generated by sales taxes, property taxes, and local franchise fees.

Annual operations of apartment communities generate an estimated \$555.4 million in tax revenues for the State. Significant portions of this impact would be generated from direct primary revenues. Additional revenues will be generated by the employees (employee spending sales tax, income tax, motor vehicle registration and motor fuel excise tax). Of this statewide fiscal impact total, the communities located in the Twin Cities MSA are projected to comprise about 77.2% of the tax collections (\$428.8 million of the total).



\$19,880,500

\$2,617,200

\$2,355,500

#### **Annual Fiscal Impact of Operations Minnesota Multi-Family Impact State of Minnesota** (2019 Dollars) **Twin Cities** MSA Statewide **Primary Revenue** \$497,097,700 \$388,646,100 Sales tax \$497,097,700 \$388,646,100 **Sub-Total** Secondary Revenue **Employee Spending Sales Tax** \$22,255,300 \$15,341,100

\$40,194,300 **Sub-Total** \$58,309,600 Total Revenue \$555,407,300 \$428,840,400

\$28,840,500

\$3,796,700

\$3,417,100

1/ The total may not equal the sum of the impacts due to rounding. All of the above figures are representative of the major revenue sources for the State and are based on the current economic structure and tax rates of the State.

Source: MMHA; Elliott D. Pollack & Co.; MN Department of Revenue

Individual Income Tax

Motor Fuel Excise Tax

**GRAND TOTAL** 

Motor Vehicle Registration Tax

Annual operations of the apartment industry generate an estimated \$572.2 million in tax revenues for county and local governments. Primary revenues such as property taxes, franchise fees and retail sales taxes are an estimated \$540.8 million each year. Secondary revenue generated by employee spending (employee spending sales tax, property tax, and state shared revenue) would generate an additional \$31.4 million. Again, the communities located within the Twin Cities MSA account for about 78.0% of the statewide tax collections (\$443.4 million).



# Annual Fiscal Impact of Operations Minnesota Multi-Family Impact Local Governments

(2019 Dollars)

		<b>Twin Cities</b>
	Statewide	MSA
Primary Revenue		
Property tax	\$493,024,000	\$385,887,000
Sales tax	\$32,169,500	\$25,151,100
Local franchise fees (levied on utilities)	\$15,573,700	\$10,735,300
<b>Sub-Total</b>	\$540,767,200	\$421,773,400
Secondary Revenue		
Employee Spending Sales Tax	\$1,798,600	\$1,239,800
Employee Franchise Fees	\$1,518,690	\$1,046,872
Employee Property Tax	\$28,123,896	\$19,386,516
Sub-Total	\$31,441,187	\$21,673,188
Total Revenue		
GRAND TOTAL	\$572,208,387	\$443,446,588

<sup>1/</sup> Figures are representative of the major revenue sources for the counties and are based on the current economic structure and tax rates.

Source: MMHA; Elliott D. Pollack & Co.; MN Department of Revenue

