

# ECONOMIC IMPACT ANALYSIS

## MADISON STATION REDEVELOPMENT PROJECT

MADISON, TN  
DAVIDSON COUNTY, TN

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## EXECUTIVE SUMMARY

The Madison Station Redevelopment Project (“Madison Station”) is located at 721 Madison Square in Madison, Tennessee just outside of Metropolitan Nashville and in Davidson County, Tennessee. The project is being led by a joint-venture between Texas-based Artesia Real Estate and Nashville-based The Cauble Group. The concept plan includes 236,000 square feet of office space, 55,600 square feet of retail space, 31,450 square feet of ground floor amenity/retail, 1,694 multifamily residential units, and 3,193 structuring parking stalls.

The site is the largest, privately-owned parcel in Nashville representing a tremendous opportunity to bring mixed-use, urban form outside of the urban core and stimulate economic development activity in the greater Madison area.

Over the 10-year construction period, the Madison Station estimated construction investment of \$631.4 million is projected to:

- Create 545 average annual direct construction jobs onsite
- Create 732 average annual total jobs in the local area
- Create average annual direct labor income of \$47.2 million in the local area
- Create average annual total labor income of \$60.9 million in the local area
- Over the buildout period, create total labor income of \$608.8 million in the local area

At buildout, the permanent operating activities of the new businesses in Madison Station and the occupancy of the 1,694 new residential units are expected to:

- Create 845 direct permanent jobs onsite
- Create 2,026 total permanent jobs in the local area
- Create annual direct labor income of \$98.1 million in the local area
- Create annual total labor income of \$185.2 million in the local area

## INTRODUCTION

Madison historically started as a bedroom community and in the 1950's experienced a residential boom at the height of Nashville's music growth. Madison Square Shopping Center began its life in July 1954 when the ground was broken on 30 acres of former farmland along Gallatin Pike, just south of Neely's Bend Road. At the time, Madison Square was the 5th largest retail center in the South in the late 50's. It was known for high-end retailers such as Levy's, JC Penney's, and McClures. With the opening of Rivergate Mall and the relocation of JC Penney's, over the next three decades Madison Square experienced a rapid decline in business.

Today, Madison Square Shopping Center consists of approximately 330,000 square feet of 1- to 2-story retail use on an entirely impervious 32-acre site. The site is the largest, privately-owned parcel in Nashville representing a tremendous opportunity to bring mixed-use, urban form outside of the urban core and stimulate economic development activity in the greater Madison area.

Madison Station presents an opportunity to create a walkable, mixed-use community in the heart of one of Nashville's growing suburbs. Madison Station will support and operate in conjunction with the exceptional, community-oriented investment that has already been seen in the new Madison Station Boulevard, the Timberhawk Hall concert venue, Amqui Station, the Madison Public Library, and the prospective investment in the Park at Madison Station.

The proposed development program for Madison Station is presented in Table 1.

**Table 1: Madison Station Development Program**

Description	Square Feet
	Units Stalls
Office	236,000
Retail	55,600
Ground Floor Amenity/Retail	31,450
Nonresidential Total	323,050
Multifamily Residential	1,694
Structured Parking Stalls	3,193

Source: Artesla Real Estate, DPFPG, 2022

As shown in Table 2, the 291,600 square feet of commercial land uses is expected to generate 845 new permanent direct employees.

**Table 2: Madison Station Direct Permanent Employees**

Non-Residential Land Use	Sq. Ft.	Occupancy %	Occupied Sq. Ft.	Sq. Ft. Per Employee	FTE Employees	Conversion Factor	Total Direct Employees
Retail	55,600	95%	52,820	430	123	0.82550	149
Office	236,000	95%	224,200	340	659	0.94684	696
<b>Non-Residential</b>	<b>291,600</b>				<b>782</b>		<b>845</b>

Source: ITE Trip Generation Manual 10<sup>th</sup> Edition, IMPLAN, DPFPG, 2022

## ECONOMIC IMPACT ANALYSIS

A *fiscal benefits analysis* measures the direct revenues produced by new land uses (ad valorem taxes for real property, sales taxes, state revenue sharing, etc.). In comparison, an *economic benefits analysis* estimates the broader local economic impacts of land use projects during both the construction and permanent phases.

While fiscal impact analysis generally focuses on the impacts affecting the government sector, economic impact analysis evaluates the impacts of new development on the private sector. The construction investment generates new jobs and the demand for goods and services. These dollars are spent and respent throughout the local economy and create economic benefits measured in terms of direct, indirect, and induced effects. Once the project is completed, in the permanent ongoing phase, new jobs and the demand for goods and services are stimulated. Likewise, these resulting dollars are spent and respent throughout the local economy generating economic benefits.

### CONSTRUCTION PERIOD IMPACTS

Over the estimated 10-year construction period, the Madison Station construction investment of \$631.4 million is projected to generate 946 annual direct construction jobs and 1,272 total jobs, on average.

**Table 3: Madison Station Average Annual Construction Period Economic Impact**

Impact Type	Jobs	Labor Income	Value Added	Output
Direct Effect	545	\$47.2 Million	\$48.8 Million	\$63.1 Million
Indirect Effect	50	\$3.8 Million	\$6.1 Million	\$10.1 Million
Induced Effect	137	\$9.8 Million	\$16.1 Million	\$25.3 Million
<b>Total Effect</b>	<b>732</b>	<b>\$60.9 Million</b>	<b>\$71.0 Million</b>	<b>\$98.6 Million</b>

Source: IMPLAN, DPFPG, 2022

Madison Station is expected to create cumulative total labor income of \$608.8 million for the local area over the 10-year construction period.

**Table 4: Madison Station Cumulative Construction Period Economic Impact**

Impact Type	Labor Income	Value Added	Output
Direct Effect	\$472.1 Million	\$488.0 Million	\$631.4 Million
Indirect Effect	\$38.2 Million	\$60.8 Million	\$101.5 Million
Induced Effect	\$98.4 Million	\$160.9 Million	\$252.9 Million
<b>Total Effect</b>	<b>\$608.8 Million</b>	<b>\$709.7 Million</b>	<b>\$985.7 Million</b>

Source: IMPLAN, DPGF, 2022

### PERMANENT ONGOING IMPACTS

As shown in Table 5, Madison Station is anticipated to generate 845 direct onsite average annual employees. On an annual basis, the businesses located in Madison Station are expected to generate 1,431 total jobs and \$141.3 million in annual labor income in the local area.

**Table 5: Madison Station Annual Economic Impact from Ongoing Operations**

Impact Type	Jobs	Labor Income	Value Added	Output
Direct Effect	845	\$98.1 Million	\$115.5 Million	\$162.5 Million
Indirect Effect	291	\$21.8 Million	\$32.7 Million	\$55.0 Million
Induced Effect	295	\$21.4 Million	\$34.9 Million	\$54.9 Million
<b>Total Effect</b>	<b>1,431</b>	<b>\$141.3 Million</b>	<b>\$183.1 Million</b>	<b>\$272.5 Million</b>

Source: IMPLAN, DPGF, 2022

Annually, local spending by the residents of Madison Station is expected to support 595 total jobs and generate \$43.9 million in annual labor income in the local area.

**Table 6: Madison Station New Resident Spending Annual Economic Impact**

Impact Type	Jobs	Labor Income	Value Added	Output
Direct Effect				
Indirect Effect				
Induced Effect	595	43,898,000	71,658,000	112,446,000
<b>Total Effect</b>	<b>595</b>	<b>\$ 43,898,000</b>	<b>\$ 71,658,000</b>	<b>\$ 112,446,000</b>

Source: IMPLAN, DPGF, 2022

The top 12 industries benefiting from the new resident spending are shown in Table 7. High-paying health care sector jobs are prevalent along with jobs in the retail sectors.

**Table 7: Madison Station New Resident Spending – Top 12 Industries**

Rank	Industry	Jobs
1	Hospitals	39
2	Limited-service restaurants	33
3	Full-service restaurants	33
4	Offices of physicians	19
5	Retail - General merchandise stores	18
6	Other real estate	18
7	Retail - Food and beverage stores	16
8	All other food and drinking places	14
9	Employment services	13
10	Individual and family services	12
11	Retail - Nonstore retailers	11
12	Nursing and community care facilities	11

Source: IMPLAN, DPGF, 2022

Combining the effects reflected in Tables 5 and 6 results in 2,026 total jobs and \$185.2 million in annual labor income for the local area.

**Table 8: Madison Station Total Annual Economic Impacts**

Impact Type	Jobs	Labor Income	Value Added	Output
Direct Effect	845	\$ 98,116,000	\$ 115,501,000	\$ 162,491,000
Indirect Effect	291	21,780,000	32,705,000	55,043,000
Induced Effect	890	65,256,000	106,595,000	167,362,000
<b>Total Effect</b>	<b>2,026</b>	<b>\$ 185,152,000</b>	<b>\$ 254,801,000</b>	<b>\$ 384,896,000</b>

Source: IMPLAN, DPGF, 2022

## KEY ASSUMPTIONS AND METHODOLOGY

### KEY ASSUMPTIONS

Because substantial growth is projected for the Greater Nashville area over the next decade, the residential and commercial impacts in this analysis are considered “new”. For example, even if new residents do not directly rent apartments in Madison Station, vacancies left by existing residents will make existing units available for new residents. Likewise, population and job growth are expected to fuel the demand for the new commercial facilities in Madison Station.

All amounts in this report are presented in constant dollars (2022). Results are rounded to the nearest one thousand dollars (\$1,000).

Supporting tables are provided in the Appendix.

## ECONOMIC IMPACT METHODOLOGY

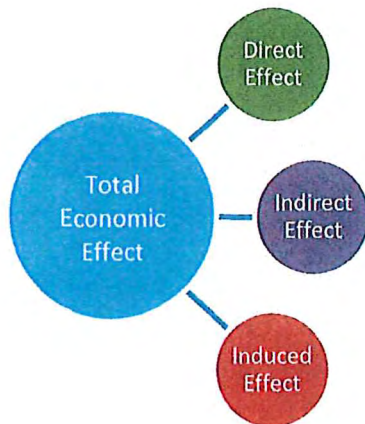
A key concept in economic impact analysis is that one form of economic activity almost always stimulates other economic activities. The total economic impact of a specific project or event on a study area is the sum of the direct, indirect and induced impacts.

Direct Impacts are the initial, immediate economic impacts (jobs and income) generated by a project or development. Direct impacts coincide with the first round of spending in the economy. For example, a new high-tech manufacturing facility that has a payroll of \$5 million and purchases \$5 million of goods and services from local suppliers would directly contribute \$10 million to the local economy. To determine direct economic impacts, it is ideal to use economic data supplied by the project's development team or financial information, if available, about similar projects implemented in similar communities. A common method of establishing direct impact parameters is to use available industry averages for the study area.

Indirect Impacts are the production, employment and income changes occurring in other businesses/industries in the community that supply inputs to the project's industry(s).

Induced Impacts are the effects of spending by the households in the local economy as a result of the direct and indirect effects from an economic activity. The induced effects arise when employees who are working for the project (i.e., new manufacturing facility) spend their new payroll dollars in the study area.

Figure 1: Components of Economic Impact Analysis



The primary economic benefits of Madison Station will be experienced in the local area; however, benefits will also extend to the region and the state. In our experience with similar projects nationally, the smaller the study area, the more leakages (purchases and sales) occur outside the area. Fewer ripple effects occur inside the area thus multipliers and related impacts generally become larger as the geographic area increases in size. The study area for this report was limited to Davidson County.



This analysis utilizes models generated by the IMPLAN modeling system. IMPLAN is a nationally recognized system of local economic models that are specifically designed to represent a local economy such as Davidson County.

The economic impacts from the annual operations of new businesses in Madison Station were modeled using Industry Change, which is the increase or decrease in economic activity due to the expansion or change in production of new businesses. Instead of value of production or value added, new employment by industry sector was used as a proxy for production changes.

Direct full-time equivalent jobs were converted to total average annual jobs using the appropriate IMPLAN conversion factors. The resulting direct jobs were assigned to the various IMPLAN industry sectors based on a direct correlation (e.g., dental office) or were allocated proportionately based on existing industry sector employment.

## GENERAL AND LIMITING CONDITIONS

Every reasonable effort has been made to ensure that the data contained in this report are accurate as of the date of this study; however, factors exist that are outside the control of DPFG and that may affect the estimates and/or projections noted herein. This study is based on estimates, assumptions and other information developed by DPFG from its independent research effort, general knowledge of the industry, and information provided by and consultations with the client and the client's representatives. No responsibility is assumed for inaccuracies in reporting by the client, the client's agent and representatives, or any other data source used in preparing or presenting this study.

This report is based on information that was current as of September 2022, and DPFG has not undertaken any update of its research effort since such date.

Because future events and circumstances, many of which are not known as of the date of this study, may affect the estimates contained therein, no warranty or representation is made by DPFG that any of the projected values or results contained in this study will actually be achieved.

Possession of this study does not carry with it the right of publication thereof or to use the name of DPFG in any manner without first obtaining the prior written consent of DPFG. No abstracting, excerpting or summarization of this study may be made without first obtaining the prior written consent of DPFG. This report is not to be used in conjunction with any public or private offering of securities, debt, equity, or other similar purpose where it may be relied upon to any degree by any person other than the client, nor is any third party entitled to rely upon this report, without first obtaining the prior written consent of DPFG. This study may not be used for purposes other than that for which it is prepared or for which prior written consent has first been obtained from DPFG. Any changes made to the study, or any use of the study not specifically prescribed under agreement between the parties or otherwise expressly approved by DPFG, shall be at the sole risk of the party making such changes or adopting such use.

This study is qualified in its entirety by, and should be considered in light of, these limitations, conditions and considerations.

## APPENDIX

**Appendix Table 1: Madison Station Construction Inputs**

Description	Square Feet		Tax Value	Construction	
	Units Stalls	Tax Value Per Sq Ft/Unit		Cost per Sq Ft/ Unit/Stall	Construction Cost
Office	236,000	\$ 275	\$ 64,900,000	\$ 375	\$ 88,500,000
Retail	55,600	\$ 275	15,290,000	\$ 375	20,850,000
Ground Floor Amenity/Retail	31,450	\$ 275	8,648,750	\$ 375	11,794,000
Nonresidential Total	323,050		\$ 88,838,750		\$ 121,144,000
Multifamily Residential	1,694	\$ 233,388	395,359,272	\$ 255,456	432,742,000
Structured Parking Stalls	3,193	N/A		\$ 24,270	77,494,000
<b>Total</b>			<b>\$ 484,198,022</b>		<b>\$ 631,380,000</b>

Source: Artesla Real Estate, DPGF, 2022

**Appendix Table 2: Madison Station Household Income Estimate**

Description	Amount
Madison Station Multifamily Units	1,694
Monthly Household Income/Gross Rent	3.23
Gross Rent	\$ 2,000
Months in Year	12
Occupancy Rate	97%
Occupancy-Adjusted Household Income per Unit	<u>\$ 75,000</u>
<b>Madison Station Total Household Income</b>	<b><u>\$ 127,050,000</u></b>

Source: Artesla Real Estate, 2020 ACS 5-Year Estimates Detailed Tables, DPGF, 2022

**Appendix Table 3: Madison Station Industry Sector Employment Allocation**

Industry #	Retail Industry Name	Davidson		New FTE Employees	FTE	
		County	%		Conversion Factor	Total New Employees
404	Retail - Electronics and appliance stores	4,271.12	4.4%	5	0.87608319	6
406	Retail - Food and beverage stores	6,321.56	6.5%	8	0.87624239	9
407	Retail - Health and personal care stores	3,850.78	4.0%	5	0.87608319	6
408	Retail - Gasoline stores	1,704.08	1.7%	2	0.87608319	2
409	Retail - Clothing and clothing accessories stores	4,995.67	5.1%	6	0.87608319	7
410	Retail - Sporting goods, hobby, musical instrument and book stores	2,917.25	3.0%	4	0.87608319	4
411	Retail - General merchandise stores	6,068.92	6.2%	8	0.87627464	9
412	Retail - Miscellaneous store retailers	5,310.81	5.5%	7	0.87608319	8
509	Full-service restaurants	27,864.17	28.5%	35	0.79252049	44
510	Limited-service restaurants	15,476.05	15.9%	20	0.79252049	25
511	All other food and drinking places	13,466.51	13.8%	17	0.79252049	21
517	Personal care services	5,179.31	5.3%	7	0.86424242	8
<b>Total</b>		<b>97,426.22</b>	<b>99.9%</b>	<b>123</b>		<b>149</b>

Industry #	Office Industry Name	Davidson		New FTE Employees	FTE	
		County	%		Conversion Factor	Total New Employees
455	Legal services	5,042.29	5.3%	35	0.95553618	37
456	Accounting, tax preparation, bookkeeping, and payroll services	16,609.38	17.5%	114	0.95491273	120
457	Architectural, engineering, and related services	6,527.83	6.9%	45	0.95491273	48
458	Specialized design services	567.36	0.6%	4	0.95491273	4
459	Custom computer programming services	4,112.29	4.3%	28	0.95524412	30
460	Computer systems design services	4,952.85	5.2%	34	0.95524412	36
461	Other computer related services, including facilities management	360.10	0.4%	3	0.95524412	3
462	Management consulting services	12,904.51	13.6%	90	0.95491273	94
463	Environmental and other technical consulting services	574.12	0.6%	4	0.95491273	4
464	Scientific research and development services	6,377.86	6.7%	44	0.95491273	46
465	Advertising, public relations, and related services	4,053.62	4.3%	28	0.95491273	30
468	Marketing research and all other miscellaneous professional, scientific, and technical services	834.75	0.9%	6	0.95491273	6
469	Management of companies and enterprises	12,034.68	12.8%	84	0.97417133	87
483	Offices of physicians	14,904.53	15.7%	102	0.91235326	112
484	Offices of dentists	2,978.77	3.1%	20	0.91235326	22
485	Offices of other health practitioners	2,299.19	2.4%	16	0.91235326	17
<b>Total</b>		<b>95,134.12</b>	<b>100.3%</b>	<b>659</b>		<b>696</b>

Source: IMPLAN, DPF, 2022