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The Economic Impact of the Proposed Danville Resort in the City of Danville (Preliminary)

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About Chmura Economics & Analytics

We have a data-driven culture. We are a group of published scientists contributing to innovations with big data analytics on the forefront of applied economics and technology solutions. We have a very diverse team of people with backgrounds such as PhD economists, statisticians, computer scientists, and transformation strategists. We serve a cross section of decision makers from the defense, government, public, and private sectors.

As data scientists, we help our clients quickly answer big data questions. We provide a reliable picture of economic trends on both a macro and micro level. Our clients rely on the historical, current, and predictive market reports we provide to cut through the confusing information they receive on a daily basis from the media, politicians, and industry resources.

Our clients view us as trusted economic advisors because we help them mitigate risk and prepare for growth by understanding the why, the how, and the what about their local economy. As the nation's preferred provider of labor market data, we help our clients understand both the demand for and the supply of available data. Our clients benefit from our expertise by better understanding their own bottom line costs, sustainability issues, and associated risks.

Background & Summary

White Mill Project is interested in converting the former White Mill property in the city of Danville, Virginia, into a resort and casino (Danville Resort).¹ The structure is a 650,000 square-foot building that previously was a textile manufacturing facility.²

The converted structure will include gaming, food service establishments, and hotel rooms. The project is expected to draw visitors from Southside Virginia, Central Virginia, and the neighboring state of North Carolina. A project of this size will have a significant economic impact in the city of Danville.

Chmura Economics & Analytics (Chmura) estimates that when operations of the resort reach full capacity in 2028,³ the total annual economic impact (direct, indirect, and induced) can amount to \$1.1 billion (in 2028 dollars) that can support 6,835 jobs in the city of Danville. In 2028, the proposed Danville Resort can contribute an estimated \$20.3 million in tax revenue to the city government, and 27.9 million for the state government.

In arriving at the above estimates, Chmura analyzed the potential economic impact of Danville Resort from the following three sources:

- **One-time impact of renovation and construction.** The preliminary estimate of the cost of the project is \$250.0 million.⁴ This includes renovation and construction of the current facility, as well as outfitting it with equipment, furniture, and fixtures.⁵ The renovation and construction activities will benefit city businesses hired as contractors for the project.
- **Danville Resort operations.** Once open, Danville Resort will generate revenue from gaming, food, and lodging. At full capacity in 2028, it is estimated that the resort will employ 5,200 workers and host approximately 4.0 million guests per year.⁶
- **Visitor spending outside Danville Resort.** The resort will attract visitors to the Danville region. While many guests will choose to dine and lodge within the resort,⁷ some guests will patronize other businesses in the city, boosting tourism-related industries.

The three components identified above constitute the direct economic impact of Danville Resort in the city. The total economic impact also includes the economic ripple effects from the direct impact. The ripple impact, categorized as indirect and induced impacts, measures the benefits of Danville Resort to

¹ Virginia currently does not allow casino gambling. This project will only proceed if the existing law is changed.

² Source: https://www.godanriver.com/work_it_sova/news/ida-plans-to-buy-white-mill-property-in-danville/article_51def8fe-09d6-11e7-904d-73c04692592d.html.

³ Source: White Mill Project.

⁴ Ibid.

⁵ Ibid.

⁶ Ibid.

⁷ Please note that guest spending within the resort is part of operational revenue.

businesses other than those directly involved in its construction, operations, and visitor spending. For example, Danville Resort will utilize many city firms to maintain its operations, in the areas of marketing, logistics, and security (indirect impact). In addition, Danville Resort workers will spend their income in places where they live, benefiting businesses such as retail stores, restaurants, and healthcare facilities (induced impact).

The direct impact of the project is estimated based on data provided by White Mill Project. Ripple effects are estimated with IMPLAN Pro⁸ software, which is a model often used by economists to measure the economic impact of events.

Economic Impact of Danville Resort

One-time Economic Impact of Renovation and Construction

The preliminary estimate of capital expenditure for Danville Resort is \$250.0 million, including renovation, construction, as well as outfitting the structure with equipment, furniture, and fixtures. If the project is approved, it is estimated that construction will take five years from 2020 to 2024, but the resort will begin operating in 2022. Some construction will occur in the years after 2022, and operations will reach the full capacity in 2028.⁹

Chmura entered the capital cost of the project into the IMPLAN Pro model to estimate its one-time economic impact of renovation and construction in the city of Danville. Table 1 shows that, from 2020 through 2024, the cumulative economic impact (direct, indirect, and induced) of renovation and construction is estimated to be \$118.7 million in the city, with an estimated \$84.5 million directly spent there.¹⁰ On an annual average basis, the total one-time economic impact (direct, indirect, and induced) is estimated to be \$23.7 million, supporting 182 jobs per year in the city from 2020 to 2024. This includes an annual average of \$16.9 million directly spent in Danville by White Mill Project, creating 130 direct jobs in the city. The annual indirect impact is estimated to be \$4.9 million and 35 jobs in industries supporting renovation and construction, such as truck transportation and utilities. The induced impact is estimated to be \$1.9 million and 17 jobs in the city per year. The induced jobs will be concentrated in consumer service-related industries such as restaurants, healthcare, and retail.

⁸ *IMPLAN Professional* is an economic impact assessment modeling system developed by Minnesota IMPLAN Group that is often used by economists to build models that estimate the impact of economic changes on local economies.

⁹ Source: White Mill Project.

¹⁰ This spending figure is smaller than the total project cost because not all construction spending will occur in the city of Danville. For example, a large percentage of spending on gaming equipment will be spent outside the city. Chmura used the IMPLAN model to estimate the percentage of project spending that will occur in the city.

Table 1: One-time Economic Impact of Danville Resort Renovation and Construction

| | | | Direct | Indirect | Induced | Total Impact |
|------------------|-------------------------------|----------------------|--------|----------|---------|--------------|
| City of Danville | Cumulative (2020-2024) | Spending (\$Million) | \$84.5 | \$24.6 | \$9.6 | \$118.7 |
| | | Employment | 652 | 177 | 83 | 911 |
| | Annual Average (2020-2024) | Spending (\$Million) | \$16.9 | \$4.9 | \$1.9 | \$23.7 |
| | | Employment | 130 | 35 | 17 | 182 |

Note: Numbers may not sum due to rounding

Source: IMPLAN Pro 2016 and Chmura

Economic Impact of Danville Resort Operations

Danville Resort will accrue income through several streams. Included is both gaming revenue and non-gaming revenue such as revenue from food service, hotel operations, and entertainment.

The direct impact of operations is measured by total revenue of the resort, which depends on the total number of guests and their average spending inside the facility. Danville Resort's operations will steadily ramp up after its opening. It is assumed that in the first year (2022), the resort can attract 1.1 million guests, creating 2,000 jobs. The number of visitors will gradually increase to 3.3 million in year 5 (2026) and 4.0 million in year 7 (2028).¹¹ It is also assumed that each guest will spend about \$150 on gaming and over \$70 on non-gaming services per day inside the resort.¹² In 2028, when the resort reaches its full capacity, the annual revenue of Danville Resort can reach an estimated \$889.7 million.¹³ Of this, \$600.0 million is the estimated gaming revenue, and \$289.7 million is the estimated non-gaming revenue. The resort is expected to employ 5,200 workers in 2028.¹⁴

Table 2 presents the estimated economic impact of Danville Resort operations in the city of Danville in 2028. The resort can generate an annual economic impact (direct, indirect, and induced) of \$1.1 billion (in 2028 dollars) in Danville, which can support 6,562 jobs in the city. Of the total impact, \$889.7 million is the estimated direct impact in Danville, which is equivalent to the total revenue from Danville Resort operations. Direct employment is estimated to be 5,200, which are individuals hired by the resort.¹⁵ The indirect impact in the region is estimated at \$119.4 million in 2028, supporting 830 jobs in the city. Beneficiaries include regional businesses in a wide range of industries such as marketing, banking, food suppliers, and landscaping services. The induced impact in the region is estimated to reach \$58.2 million in

¹¹ Source: White Mill Project.

¹² Ibid.

¹³ All revenue and economic figures in this analysis are measured in current dollars, unless otherwise noted.

¹⁴ The revenue and employment numbers for Danville Resort imply that average revenue per worker is \$171,090 in 2028. Nationally, in 2013, the average revenue per worker in the casino industry was \$146,386. The assumption for Danville Resort is consistent with the national figure, considering inflation. The source for the national figure can be found in: Economic Impact of the US Gaming Industry, prepared for American Gaming Association by Oxford Economics, September 2014.

¹⁵ Source: White Mill Project. The estimated number of jobs includes both full-time and part-time positions. They are not full-time equivalent (FTE) jobs. The estimated number of jobs is based on the place of work.

2028, supporting 532 jobs in the city. Beneficiaries of the induced impact are mostly consumer-service businesses such as retail shops, restaurants, and healthcare facilities.

Table 2: Economic Impact of Danville Casino Resort Operations - 2028

| | | Direct | Indirect | Induced | Total Impact |
|------------------|----------------------|---------|----------|---------|--------------|
| City of Danville | Spending (\$Million) | \$889.7 | \$119.4 | \$58.2 | \$1,067.3 |
| | Employment | 5,200 | 830 | 532 | 6,562 |

Note: Numbers may not sum due to rounding
 Source: IMPLAN Pro 2016 and Chmura

Economic Impact of Danville Resort Visitor Spending

Danville Resort can attract visitors to the region. The city is located close to the state border with North Carolina. North Carolina allows casino gambling, and the casino resort closest to the Danville area is in Cherokee, North Carolina, which is more than a four-hour drive. Outside Southside and Central Virginia, many population centers in North Carolina, such as the Triad region (Greensboro, Winston-Salem, and High Point) and the Triangle area (Raleigh, Durham, and Chapel Hill), are closer to Danville than Cherokee. It is assumed that many individuals from those areas may choose Danville Resort over Cherokee since it would be closer.

While many guests will dine and stay within the resort,¹⁶ some will patronize other city businesses. More tourism industries outside the resort would be a benefit in this case.¹⁷ To estimate visitor spending outside Danville Resort, Chmura first calculated the average per-person spending for resort visitors based on a number of national studies.¹⁸ Chmura then removed estimated spending on gaming as well as spending on food, lodging, retail, and entertainment within the resort. This gave an estimate of visitor spending outside the resort. Chmura further allocated out-of-resort visitor spending to spending occurring in the city of Danville, as well as spending occurring outside the city.

National studies indicate that casino visitors spend more than general tourists. It is estimated that each casino visitor will spend an average of \$130 per day, excluding gaming.¹⁹ Excluding spending inside the resort such as spending on food and lodging, it is estimated that spending outside the resort can reach \$89 per visitor per day in 2028. About 6% of this spending is assumed to occur in Danville.²⁰ As a result, Chmura estimates that in 2028, outside the Danville Resort, visitor spending in the city can reach \$19.5 million (in 2028 dollars). Visitor spending is allocated to different sectors such as gasoline, food and drink, lodging, and shopping.

¹⁶ Please note that guest spending within the resort is part of operational revenue.

¹⁷ In economic literature, there are debates on whether visitor spending should be included. One argument is that spending by city residents would occur in the city even if Danville Resort did not exist. While that is true for some visitors, other Danville residents will travel to gaming facilities in neighboring states such as North Carolina. Chmura chose to include visitor spending in this study.

¹⁸ Examples of those studies include: Las Vegas Visitor Profile Study, 2017; Atlantic City Visitor Profile Study, 2013; and Beyond the Casino Floor: Economic Impacts of Commercial Casino Industry by American Gaming Association.

¹⁹ This is estimated by Chmura based on several national studies.

²⁰ It is assumed that overnight visitors will stay within a one-hour drive of the resort. Chmura estimated this percentage based on current tourism employment in the area.

Direct visitor spending can generate additional economic impact in Danville (Table 3). In 2028, the total annual economic impact (direct, indirect, and induced) of Danville Resort visitor spending is estimated to be \$25.2 million (in 2028 dollars) that can support 273 jobs in the city. Of this impact, direct visitor spending can reach \$19.5 million that can support 226 jobs in the city, mostly in tourism-related businesses such as hotels, gas stations, restaurants, and retail shops. The indirect impact is estimated to be \$3.2 million that can support 25 jobs in the city. The induced impact is estimated to be \$2.4 million that can support 21 jobs in the city.

Table 3: Economic Impact of Danville Resort Visitor Spending - 2028

| | | Direct | Indirect | Induced | Total Impact |
|------------------|----------------------|---------------|-----------------|----------------|---------------------|
| City of Danville | Spending (\$Million) | \$19.5 | \$3.2 | \$2.4 | \$25.2 |
| | Employment | 226 | 25 | 21 | 273 |

Note: Numbers may not sum due to rounding

Source: IMPLAN Pro 2016 and Chmura

Danville Resort Recurring Economic Impact Summary

Combining operations and visitor spending, Table 4 presents the recurring economic impact of Danville Resort in the city of Danville. When full capacity is reached in 2028, the total annual economic impact (direct, indirect, and induced) is estimated to be \$1.1 billion (in 2028 dollars) that can support 6,835 jobs in Danville.

Table 4: Recurring Economic Impact of Danville Resort - 2028

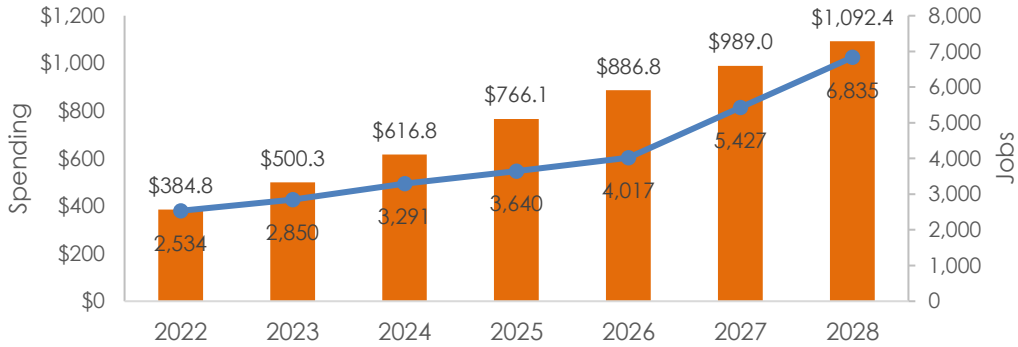
| | | Direct | Indirect | Induced | Total Impact |
|------------------|----------------------|---------------|-----------------|----------------|---------------------|
| City of Danville | Spending (\$Million) | \$909.2 | \$122.7 | \$60.6 | \$1,092.4 |
| | Employment | 5,426 | 855 | 553 | 6,835 |

Note: Numbers may not sum due to rounding

Source: IMPLAN Pro 2016 and Chmura

From 2022 to 2028, the economic impact of Danville Resort will expand gradually as it ramps up its operations and attracts more visitors. As Figure 1 shows, the economic impact in Danville will expand from \$384.8 million and 2,534 jobs in 2022 to \$1.1 billion and 6,835 jobs in 2028.

Figure 1: Recurring Economic Impact of Danville Resort in the City of Danville (Operations & Visitor Spending)



Source: Chmura Economics & Analytics

State and City Fiscal Impact

Danville Resort will also generate tax revenue for the state and city governments. To be conservative, only tax revenue from the direct impact is estimated.²¹

One-time Tax Revenue from Renovation and Construction Activities

During the renovation and construction phase, the state government can benefit from individual and corporate taxes from construction spending. From 2020 to 2024, cumulative individual and corporate income taxes are estimated to be \$2.1 million and \$0.7 million, respectively

Construction spending by contractors in the city is subject to local business, professional, and occupational license (BPOL) tax, depending on spending categories such as construction or professional services. Chmura estimates that the cumulative BPOL tax revenue for the city government is \$154,299 from 2020 to 2024.

Recurring Tax Revenue from Danville Resort & Visitor Spending

Operations of Danville Resort and associated visitor spending can generate recurring tax revenue for the state and city governments. The state government will benefit from the following three main tax streams: sales, individual income, and corporate income. The city government will benefit from local sales, meals, lodging, BPOL, and property taxes.²²

Virginia's sales tax rate is 5.3% for retail; 1% of retail sales is returned to local governments and the rest goes to the state government. For Danville Resort operations, sales tax is applied to the food and beverage sales, lodging, and other merchandise sold within the resort. For visitor spending, this tax is applied to food

²¹ This approach is recommended by Burchell and Listokin in *The Fiscal Impact Handbook*. Source: Burchell, R.W. and Listokin, D. 1978. *The Fiscal Impact Handbook: Estimating Local Costs and Revenues of Land Development*. Center for Urban Policy Research, New Brunswick, NJ; Rutgers, The State University of New Jersey.

²² The tax estimated in this section is based on the current tax rates in Virginia and the city of Danville.

and beverage sales, lodging, retail sales, and gasoline. From Danville Resort operations and visitor spending, sales tax is estimated to be \$12.5 million for the state government, and \$2.7 million for the city of Danville in 2028.

Table 5: Annual Tax Revenue from Danville Resort Operations and Visitor Spending-2028

| Tax | State | City of Danville | State and Local |
|----------------------------|---------------|-------------------------|------------------------|
| Sales | \$12.5 | \$2.7 | \$15.2 |
| Individual Income | \$12.4 | | \$12.4 |
| Corporate Income | \$3.0 | | \$3.0 |
| Meals | | \$10.3 | \$10.3 |
| Lodging | | \$2.6 | \$2.6 |
| BPOL | | \$2.8 | \$2.8 |
| Admission | | \$0.0 | \$0.0 |
| Real Estate Tax | | \$0.9 | \$0.9 |
| Business Personal Property | | \$1.0 | \$1.0 |
| Total | \$27.9 | \$20.3 | \$48.1 |

Note: Number may not sum due to rounding

Source: Chmura

Virginia can collect individual income tax from wages and salaries paid to Danville Resort employees. For visitor spending, individual income tax is collected for wages and salaries from businesses serving Danville Resort visitors. The combined individual income tax is estimated to be \$12.4 million in 2028.²³

Virginia has a state corporate tax rate of 6.0% on business profits. Corporate tax will be collected on the operational profit of Danville Resort. For visitor spending, corporate income tax is levied on profits from businesses serving visitors of the resort. Combined, the state corporate income tax is estimated to be \$3.0 million in 2028.

Food and beverage sales within the resort are subject to the city's 6.5% meals tax.²⁴ Similarly, visitor spending elsewhere in the city on food service will also generate city meals tax. Combined, total meals tax is estimated to be \$10.3 million in 2028.

Similarly, spending on lodging at the Danville Resort is subject to the city's lodging tax, which is 7.0% of lodging revenue.²⁵ Visitor spending in other city hotels outside the resort is subject to lodging tax as well. Combined, lodging tax revenue is estimated to be \$2.6 million in 2028.

²³ Virginia has a progressive individual income tax. Based on the average income of Portsmouth Resort employees, the average income tax rate is 5.5%. Source: Virginia Department of Taxation.

²⁴ Source: Danville City website at: <https://www.danville-va.gov/1013/Taxes>.

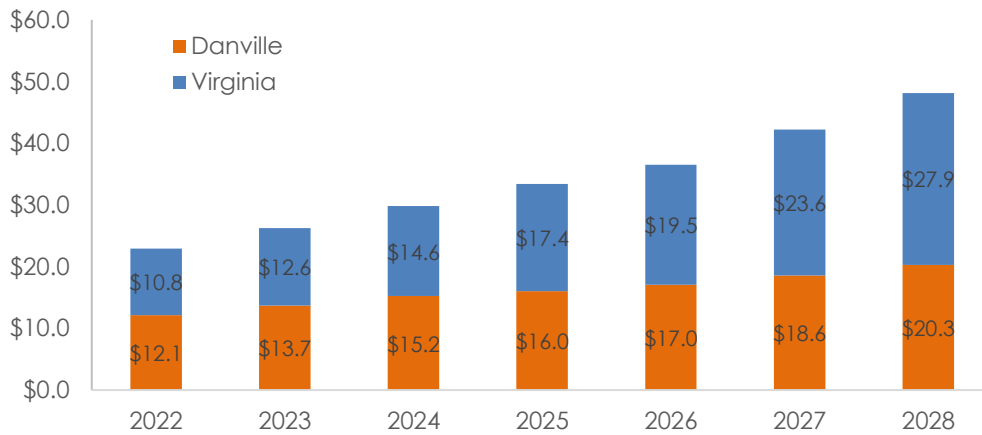
²⁵ Ibid.

Finally, various business revenue streams from Danville Resort operations and visitor spending are subject to local BPOL taxes in Danville; BPOL tax revenue from resort operations and visitor spending is estimated to be \$2.8 million in 2028.

In addition, investment in the existing White Mill facility will expand the tax base of the city, generating real estate and personal property tax revenues. Danville’s current real estate tax rate is 0.8% of assessed value, and the personal property tax rate is 3.5% of assessed value.²⁶ The total assessed value of the real property is estimated to be the assessed value of the existing facility (\$1.3 million), plus the value of new construction. The assessed value of business personal property is based on the original cost of business equipment in the resort.²⁷ In 2028, the real estate tax is estimated to be \$0.9 million and the business personal property tax is estimated to be \$1.0 million.

In summary, including both resort operations and visitor spending, Danville Resort can contribute \$27.9 million to the state government and \$20.3 million to the city government, for a total of \$48.1 million in 2028. Figure 2 presents the estimated state and city government revenues from 2022 to 2028.

Figure 2: Estimated State and City Tax Revenues (\$Million)



Source: Chmura Economics & Analytics

²⁶ Ibid.

²⁷ The city of Danville has an assessment ratio for different business personal properties based on the years of service. For example, in the first year, the assessed value of business equipment is 60% of the original cost, and 50% for the second year, and so forth. Source: Weldon Cooper Center for Public Service, University of Virginia.

Appendix 1: Impact Study Glossary

IMPLAN Professional is an economic impact assessment modeling system. It allows the user to build economic models to estimate the impact of economic changes in states, counties, or communities. It was created in the 1970s by the Forestry Service and is widely used by economists to estimate the impact of specific event on the overall economy.

Input-Output Analysis—an examination of business-business and business-consumer economic relationships capturing all monetary transactions in a given period, allowing one to calculate the effects of a change in an economic activity on the entire economy (impact analysis).

Direct Impact—economic activity generated by a project or operation. For construction, this represents activity of the contractor; for operations, this represents activity by tenants of the property.

Overhead—construction inputs not provided by the contractor.

Indirect Impact—secondary economic activity that is generated by a project or operation. An example might be a new office building generating demand for parking garages.

Induced (Household) Impact—economic activity generated by household income resulting from the direct and indirect impact.

Multiplier—the cumulative impacts of a unit change in economic activity on the entire economy.