Item No. 6

The Economics of Land Use

Economic and Fiscal Impact Analysis of Proposed Innovation Centers in Davis

Prepared for:

City of Davis

Prepared by:

Economic & Planning Systems, Inc. (EPS)

September 8, 2015

EPS #152006

Economic & Planning Systems, Inc.
2295 Gateway Oaks Drive, Suite 250
Sacramento, CA 95833-4210
916 649 8010 tel
916 649 2070 fax

Oakland
Sacramento
Denver
Los Angeles

www.epsys.com

Table of Contents

List of Maps

List of Tables

1. INTRODUCTION

The City of Davis (City), Yolo County (County), and the Sacramento Region have the potential to see fiscal and other economic benefits as a result of the successful implementation of the proposed Innovation Centers in Davis. To provide information before potential 2016 ballot initiatives to annex the proposed Innovation Centers to the City, it is necessary to determine the likely economic and fiscal implications at buildout.

Proposed Innovation Centers

This report is centered on the two actively proposed Innovation Center projects as of September 2015: the 47-acre Nishi Gateway Innovation District (Nishi) site[1] and the 229-acre Mace Ranch Innovation Center (MRIC) site, shown in **Map 1**. **Table 1** provides an overview of assumed land uses. Together, the two projects are expected to generate approximately 3.1 million square feet of commercial development at buildout, capable of accommodating about 6,500 jobs. In addition, 650 housing units are proposed as part of the Nishi project. This land use program, in addition to key assumptions described later in the attached Economic Impact Analysis and Fiscal Impact Analysis exhibits, is defined as the "Base Development Program."

A third proposed project, the Davis Innovation Center (Davis IC), was placed on hold in May 2015. This project was initially proposed for a 208-acre area located to the north of Sutter Davis Hospital along SR 113. This project is not analyzed in the ensuing report.

In July 2015, Economic & Planning Systems (EPS) prepared a Draft Report evaluating economic and fiscal assumptions of the Innovation Center proposals as well as key success factors, referred to herein as the Phase I report.[2] EPS has also been commissioned to prepare the ensuing Phase II report as a precursor to the aforementioned ballot initiatives, which 1) provides a synopsis of the "Innovation Center" concept, 2) summarizes chief fiscal and other economic impacts expected at buildout of the proposed Innovation Centers, and 3) provides a qualitative evaluation of Draft Environmental Impact Report (DEIR) alternatives. The "economic impact analysis", included as **Exhibit 1**, analyzes the direct, indirect, and induced impacts (also known as the "ripple effect") of the planned projects on the City of Davis and Yolo County economies at buildout. The "fiscal impact analysis", included as **Exhibit 2**, evaluates the effects of the proposed projects on the City of Davis operating budget to evaluate whether public revenues from the projects are able to offset public service costs at buildout.

[1] The Nishi project is characterized as the Downtown University Mixed Use Innovation District in the City's Dispersed Innovation Center Strategy.

[2] "Davis Innovation Centers Fiscal and Economic Impact Assumptions," Economic and Planning Systems, July 2015.

Map 1
Proposed Innovation Centers in Davis

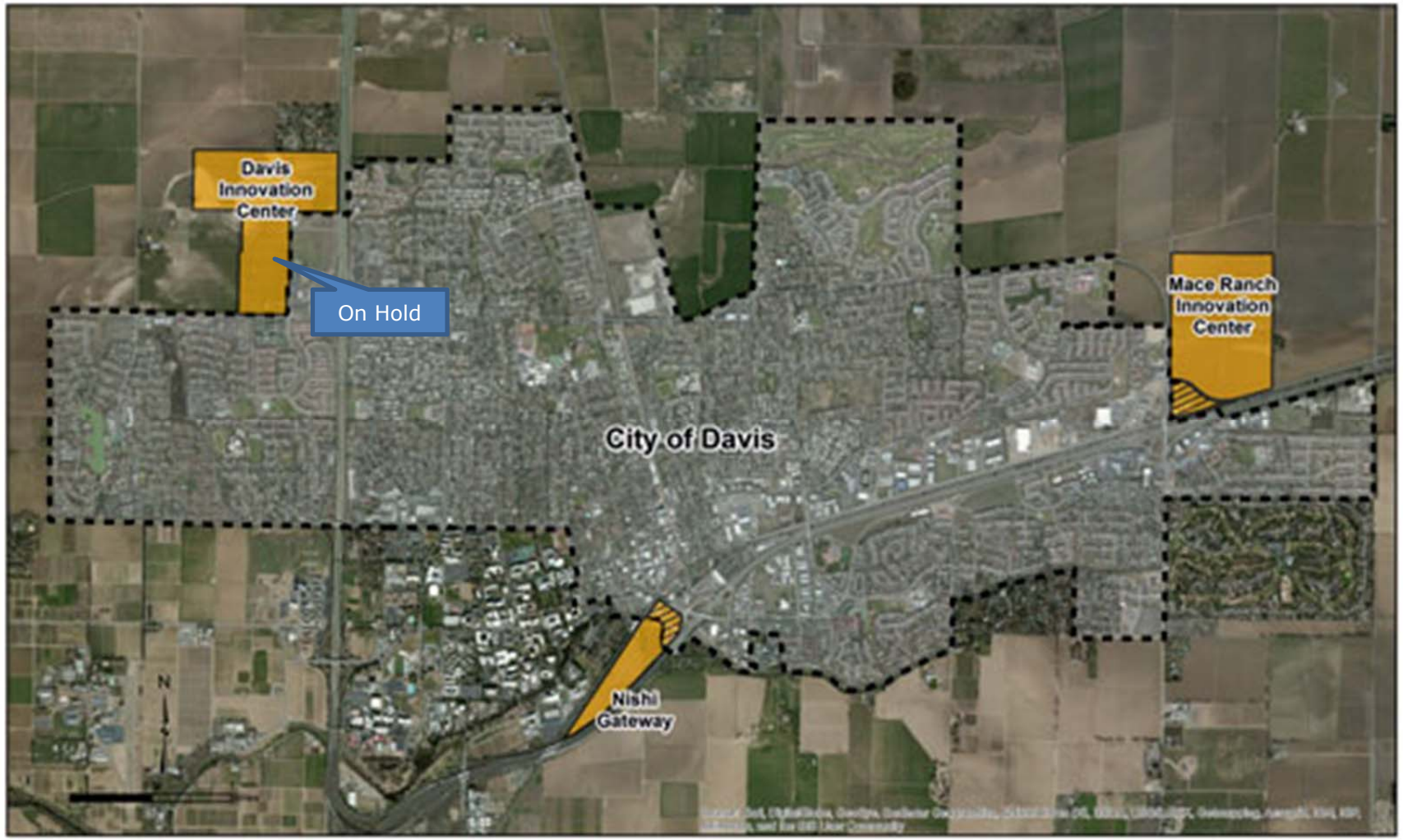


Table 1
Economic and Fiscal Impact Analysis of Proposed Innovation Centers in Davis
Project Framework

Item	Base Development Program: 2nd Street/Interland URP Mix		
	MRIC [1]	Nishi [2]	Total
Dwelling Units [3]			
Renter Occupied	0	440	**440**
Owner-Occupied	0	210	**210**
Total Dwelling Units	**0**	**650**	**650**
Nonresidential Square Feet [4]			
Office	846,468	172,387	**1,018,855**
Flex: R&D/Office	513,011	72,162	**585,173**
Manufacturing	952,169	28,221	**980,390**
Industrial Commercial	62,578	10,000	**72,578**
Ancillary Retail	62,578	37,950	**100,528**
Hotel	160,000	0	**160,000**
Public/Non-Profit	128,253	80,180	**208,433**
Total Square Feet	**2,725,056**	**400,900**	**3,125,956**
Parking Spaces [4]			
Parking Garage	0	843	**843**
Acres [5]	229	47	**276**

framework

Source: EPS.

[1] Includes Mace Triangle.
[2] Development numbers includes Nishi Gateway and West Olive Drive area. Acreage numbers only include Nishi Gateway.
[3] See Exhibit 1, Table B-1.
[4] See Exhibit 1, Table A-2.
[5] See Exhibit 1, Table A-3.

Organization of Report

The study analysis is presented in the following five chapters. **Chapter 2** summarizes the key findings from the Phase I analysis of the viability of Innovation Centers in Davis, as well as the findings from separate memorandums on the economic and fiscal impacts of the Centers. **Chapter 3** provides an overview of the Innovation Center concept and what it entails, followed by a synopsis of the existing innovation ecosystem and related types of companies in Davis. The chapter closes with an overview of the expected benefits and concerns generated by the Innovation Centers. **Chapter 4** describes the economic attributes necessary for successful implementation of the Innovation Centers. It begins with an overview of the coordinated local economic development efforts in Davis, followed by a brief discussion of the national and local underlying market conditions, a digest of important recent dynamics relating to local clusters that signal opportunities in the region, and ending with a synopsis of the Innovation Center project proposals in Davis. **Chapter 5** examines the overlap between regional economic strengths and University of California, Davis (UC Davis) research specialties to identify a group of industry clusters and company types that the Innovation Centers in Davis could be best suited to support. **Chapter 6** provides an outlook for the centers, based on an assessment of how local market trends influence feasibility, as well as an evaluation of project proposals and DEIR alternatives using key qualitative criteria.

2. SUMMARY OF FINDINGS: CONCEPT VIABILITY, ECONOMIC IMPACTS, AND FISCAL IMPLICATIONS

Innovation Centers, as defined by the Brookings Institution's district concept, are areas where anchor institutions (often universities) and companies cluster together and connect with start-ups, business incubators, and accelerators. The proposed Innovation Centers have the potential to create benefits that generate economic value to the City and UC Davis alike. The projects could also support the goal of strengthening academic-industry partnerships in Davis and throughout the region, in support of the Next Economy Capital Region Prosperity Plan (Next Economy). The proposed Innovation Centers have great potential to move forward simultaneously. If phased and developed in concert with evolving market forces, the market should be able to accommodate both projects. These projects each contribute to the innovation ecosystem in Davis in unique ways, and their overall impact may be greater than the sum of their individual impacts.[3]

While this report focuses on the impacts of the projects if built, it bears mention that the City faces significant opportunity costs if the projects are not built. The City runs the risk of losing more fast-growing companies to other communities due to its limited supply of land and buildings for business activity. It may be more difficult to fund specialized infrastructure and there will be less overall synergy among users if they are located in a dispersed geographic pattern. Innovative companies will continue to locate in Davis in order to access the community's significant resources, but in a manner that more closely resembles the concept of the Spontaneous Research District as discussed in the Phase I report. Compared to the concept of a focused concentration of innovators strategically organized within an innovation center framework, a piecemeal development pattern is far less likely to meet the City's goals.

Concept Viability

1. ***The proposed Innovation Centers have the potential to generate benefits to the City, Yolo County, and the region.***

   Davis supports several competitive advantages that can be leveraged for economic vitality, including a technically skilled labor force, a major research university with renowned academic programs and research initiatives, and high quality of life for residents and businesses. In particular, UC Davis has established research strengths that are aligned with challenges of our global food system through rigorous multi-disciplinary study of food and health, water and energy systems, adaptation to global warming, and development of sustainable technologies.

[3] The economic and fiscal impacts of each project were measured as distinct, separate events. While there is potential for economic impacts that arise from an interplay between the projects, it is not feasible to quantify those impacts under standard methodological practice.

Over the past few decades, the community has seen a notable amount of employment-oriented development in areas like the 2nd Street Corridor and the Interland University Research Park (Interland URP) that has attracted several prominent tenants drawn to the community's competitive advantages such as DMG Mori, FMC Shilling Robotics, Marrone Bio Innovations, and other firms.

However, in recent years, local and regional economic development representatives have noted interest from several companies that have not been able to find suitable space in Davis and have located elsewhere in the region or in other competitive communities. At the same time, UC Davis has placed a renewed emphasis on technology transfer, aligned with a handful of local and regional entities focused on supporting startup and technology companies, as well as the Next Economy goals of fostering a strong innovation environment and enhancing growth across core business clusters. The proposed Innovation Centers offer the opportunity to expand the amount of space that can house establishments interested in maintaining or establishing a presence in Davis. This integration of new employment-oriented development and enhanced economic activity has the potential to generate significant fiscal and economic benefits for the City, County, and region.

2. The intersection of UC Davis research strengths and the regional innovation economy point to clusters and related types of industries and companies that can potentially fill space in the proposed Innovation Centers.

The Innovation Center proposals show a total of roughly 3.1 million square feet of research and tech space, which ultimately could take the form of a mix of office, flex, and industrial space. These projects will be in a position to attract users that are aligned with industries that have gained traction in the regional economy, as well as activities that receive support from the university through strong research programs and efforts aimed at commercializing related research.

The potential clusters and company type opportunities share several common attributes, including regional economic development focus reflected in Next Economy and Moving Solano Forward (MSF), regional innovation and investment activity (e.g., venture capital investment and patent generation), prominent UC Davis academic programs and research units, visible company presence in the local economy, and flex and industrial space requirements. A subset of five clusters that are targets for regional investment, as well as a group of four knowledge-intensive technical services that cut across all the clusters, represent potential areas of focus for the proposed Innovation Centers. In these various economic activities, the service-providing, administrative, design and prototyping, and technical-based manufacturing functions could fit most closely with the local economic and labor force characteristics. Even among this concentration of activities, there is a wide range of types of companies that can be integrated into tenanting strategies for the Innovation Centers.

Target Clusters and Services for Regional Investment

Clusters	Knowledge-Intensive Services
• Clean Energy Technology • Agriculture & Food Production • Life Sciences & Health Services • Information & Communications Technology • Advanced Manufacturing & Materials	• Scientific Research & Development Services • Management, Scientific, & Technical Services • Architectural, Engineering, & Related Services • Specialized Design Services

3. The proposed Innovation Centers have the potential to more than double the amount of existing office, flex, and industrial space in Davis, while fostering a stronger and more competitive innovation ecosystem.

Davis has over 2.6 million square feet of office, flex, and industrial space, with more than two-thirds of the space falling in the office category. This is a very small and specialized market nested within a major commercial market area with about 297 million square feet of space in these categories.

Land and space constraints in Davis have led to volatility with the periodic loss of large tenants, however the City generally features lower vacancy rates and higher rents compared to regional averages, owing to its competitive advantages across a number of success factors related to university proximity and quality of life. The Innovation Centers could help Davis gain a stronger competitive position in the region if the ultimate mix of space in the projects contributes to a strengthened innovation ecosystem. This ecosystem would offer opportunities for a mix of growing and more established firms relying on other specialized uses and support services that, while required by many innovative companies, are in short supply in the region. The development of multiple projects could help foster competition in the local market that facilitates lower lease rates and land values, thereby generating the ability to support a broad cross section of firms at different levels of maturity.

4. There are four primary development prototypes that support the types of targeted clusters and companies for the Innovation Centers and are present in the 2nd Street Corridor and Interland URP areas.

The clusters applicable for Davis demand a comparable mix of office, flex, and industrial space, with a few requiring specialized space such as clean rooms and wet labs. Examining the pertinent built space in the 2nd Street Corridor and Interland URP areas shows a roughly equal mix of Flex/Office R&D, Industrial, and Office building types. While this space primarily supports the types of targeted users being contemplated for the Innovation Centers, over the years, several commercial and sales-service entities also have become tenants. Based on the built space and tenants in these areas, four broad development prototypes are used as proxies for the types of space that could be built in the Innovation Centers: Office, Flex-R&D/Office, Manufacturing, and Industrial Commercial. These uses provide opportunities for both ownership and leased space, the combination of which is critical to appealing to the widest range of users and to maximizing potential absorption rates.

The Flex-R&D/Office prototype is likely to be a critical component of the proposed Innovation Centers because of its alignment with targeted clusters and company types and its ability to generate high assessed values and sales tax. If lease rate improvements do not effectively

outpace cost escalations, then development is more likely to consist of build-to-suit activity where owner-users commission purpose-built facilities predicated on a need to be in Davis for strategic business reasons. Some types of businesses are highly cost sensitive, while others are able to more equally weigh the value of proximity to the university and the quality of place in their site location criteria. For some users willing to accept alternative locations, competitive communities in the region can offer existing attractive space for less than it could be built, which could be a factor that may limit absorption in Davis until the surplus of vacant space in the region is drawn down.[4] Considering these dynamics, absorption of space in the Innovation Centers is likely to be modest at first and improve over time.

5. ***The Innovation Centers could develop differently than the initial analysis suggests.***

Many factors are discussed throughout this report that could result in much slower absorption rates than the upper end evaluated in the BAE report completed to inform the EIR process[5] (about 350,000 square feet absorbed over a 20-year buildout). The cumulative scenario for the BAE report includes the Davis IC project, though the report posits that removing Davis IC would reduce the absorption period roughly in proportion to Davis IC's square footage, which accounted for 56 percent of the total project. In summary, any factor that reduces revenue or increases the cost structure could drive absorption rates down. Based on the evaluation of local and regional market conditions in the City and other revenue and cost factors examined as part of this study, absorption could range between 128,000 and 175,000 building square feet annually in all Innovation Centers, consistent with the annual absorption estimated in the BAE study (about 150,000 square feet annually). This range of absorption for the cumulative scenario with Davis IC removed reflects a much higher absorption than the City's historical annual average of about 33,000 square feet. It would result in a buildout period of about 21 years,[6] though it is possible that a faster development scenario could arise out of interest among one or more major campus users, who could in turn serve as anchor tenants to attract other businesses in similar sectors. The new employees associated with this absorption will need access to housing options. As discussed in the Phase I report, the presence of housing would enhance the mixed-use character that is valued in Innovation Centers, and would likely improve lease rates and land values.

---

[4] Davis has important competitive advantages in the region related to its strong university research programs and well-documented quality-of-life factors that may translate to lease rate improvements, particularly among established firms able to afford regional cost premiums, including firms seeking relief from Bay Area costs. As noted elsewhere in this document, Davis office lease rates are about 14 percent higher than the Sacramento Region on average but comprised only about 60 percent of average office lease rates in the Bay Area in the last quarter of 2014.

[5] "Economic Evaluation of Innovation Park Proposals," BAE Urban Economics, July 2015.

[6] Historical net absorption figure is based on annual averages for office, retail, flex, and industrial development in the City from 2000 through 2014 (office, flex, industrial) and 2006 through 2014 (retail), based on data collected from CoStar. It is important to note that this time frame includes the economic downturn occurring during "the Great Recession."

6. There are several factors related to university presence, the regional economy, local market conditions, and project implementation that could impact how successful the Innovation Centers will be in developing and generating fiscal and economic impacts.

Published research and case studies demonstrate that several common factors were present in successful research park developments built around the innovation ecosystem concept. While much of the evidence centers on parks with official university investment or commitment, many of the common factors also were present in spontaneous research centers driven by the private sector and supported by regional economic strengths. These common factors, whose presence can help determine the success of an Innovation Center, are detailed in the table below.

Because the projects still are in the early stages, many of the market and project implementation factors are important considerations as the planning process moves forward. These factors directly relate to the type of space that will be integrated, feasibility elements, the tenant mix, available amenities, connectivity, and related policies, most of which are under direct control of the City and the developers. On the other hand, the City and the Innovation Center developers have limited influence on the university-related and regional economy factors and, therefore, must prepare for any opportunities and threats that arise from these dynamics over the development period. Providing a range of spaces that meet the needs of a wide variety of tenants, including flexible building types with specialized and costly features, will be instrumental in terms of financial viability as well as supporting the diversity that is a key element of the Innovation Center concept. The projects will likely start off as less dense and fill in over time with higher densities as the market matures. Development Agreements between developers and the City should allow flexibility to respond to market conditions while providing assurances that the Innovation Centers will adhere to expected uses and design features.

Success Factors for Innovation Centers

University-Related	Regional Economy	Market	Project Implementation
• University proximity • University-tenant match • University investment or commitment	• Regional economic health • Regional cluster-innovation match • Regional entrepreneurial support and tech transfer • Regional access to capital	• University as a tenant • Ability to accommodate tech companies and "gazelles" • Ability to accommodate start-ups and early stage companies • Real estate feasibility • Developer investment horizon • Public-private approach to value creation	• Diversity of space and tenants • Neighborhood amenities • Connectivity • On-site start-up support infrastructure • Supportive policy environment • Project development and management expertise • Private development opportunities

7. Some of the DEIR alternatives could reduce the connection to UC Davis and the possibility for university-industry interaction.

The DEIR alternatives limit the relationship to UC Davis in different ways. The Nishi Off-Site alternative lacks the university proximity that is both fundamental to the Innovation Center concept and is the strongest feature of the Nishi baseline project, while the MRIC Off-Site alternatives are less proximate to the 2nd Street Corridor, which has many university-related users itself. The Nishi Alternative Land Use Mix, which removes a portion of the R&D space, reduces the possibilities for university-related tech transfer along with it. On the other hand, removing all housing in favor of more R&D space in the Nishi R&D Only alternative does not allow for the project to house UC Davis faculty or staff, which would otherwise bolster university ties.[7] Under the same logic, the MRIC Mixed Use alternative that adds housing could reinforce links with the university. In the MRIC Reduced Project, the removal of the hotel precludes stays from visiting scholars, and rotating staff from global partners, while the omission of the conferencing space reduces possibilities for university-related events and activities that would strengthen the UC Davis connection.

8. The DEIR alternatives that reduce the intensity of tech development or move it off-site could reduce the contributions to the regional economy.

Davis suffers from a limited supply of suitable land and space for R&D companies. Multiple alternatives reduce the amount of R&D space in Nishi and MRIC, leaving a substantial R&D space deficiency, especially for specialized space such as wetlabs, in the City as well as the region. Conversely, while the Nishi R&D Only alternative may bring more jobs to the regional economy, those jobs come at the expense of supporting uses that will make the project more competitive. Overall success is most likely to result from a balanced land use approach lending vitality and a sense of place to each site.

9. The DEIR alternatives could have negative effects on absorption rates and, in some cases, bring higher costs that jeopardize feasibility.

Most of the DEIR alternatives involve reducing the intensity of development or altering the land uses. In each case, the resulting land use mix does not achieve the balance necessary for an Innovation Center of having a critical mass of tech-oriented development along with supporting land uses to make for a dynamic environment that will attract high end users. The Nishi Off-Site alternative lacks the university proximity that is a selling point for many prospective users, while the MRIC Off-Site alternatives have potentially higher site acquisition costs in addition to being less appealing to prospective users due to poor connectivity to major highways as well as to the existing 2nd Street Corridor. The Nishi R&D Only alternative lacks housing, a use which can positively influence overall average lease rates and land values. Increasing the density in MRIC, as reflected in the Reduced Site Size Alternative and the Mixed-Use Alternative, brings needs for structured parking as well as additional-story R&D space that may require local market conditions to improve before it can be phased in.

---

[7] The majority of the renter-occupied housing in Nishi in the Base Development Program is student-oriented, and therefore may not be appropriate for housing faculty.

10. Project implementation factors supporting the Innovation Center concept, such as connectivity, diversity of space and tenants, and neighborhood amenities, are compromised to varying degrees by the DEIR alternatives.

The DEIR alternatives are each deficient in at least one project implementation aspect of the Innovation Center concept. The patchwork development inherent in the No Project alternatives lacks the connectivity of a true Innovation Center. The MRIC Reduced Site Size and Reduced Project Alternatives hurt the diversity of possible users as well as opportunities for neighborhood amenities. In Nishi, the R&D Only alternative lacks the housing necessary to support quality neighborhood amenities, while the replacement of some R&D uses with a hotel in Nishi reduces alignment with the Innovation Centers' mission of supporting tech-driven development. The Off-Site alternatives all suffer from poor connectivity, either to the rest of the region or to the university. The only alternative that similarly supports the Innovation Center concept is the MRIC Mixed-Use Alternative. In this case, the potential for slightly higher development costs may well be offset by improved overall vitality offered by the inclusion of housing in a mixed use format. If well-designed and properly integrated, housing could lead to strengthened overall economic performance and would be attractive to younger, knowledge-based workers. That said, the Base Development Program for MRIC still satisfies the City's Request for Expressions of Interest for Innovation Center development without the inclusion of housing and will expand the amount of nonresidential space to support economic development.

Economic Impact Findings

1. The construction activities associated with the backbone infrastructure, nonresidential, and residential development for the proposed MRIC and Nishi projects will generate a one-time, temporary economic impact.

Building over 3.1 million square feet of commercial space and 650 housing units on 276 acres of land will directly support a significant amount of construction activity associated with backbone infrastructure, nonresidential, and residential development. This construction activity will also indirectly generate an economic response from suppliers of goods and services. Because these are temporary activities that will end after buildout, the total economic impact represents a one-time stimulus to the local economy. The estimated one-time economic impact resulting from construction activities through buildout of the MRIC and Nishi projects equates to a cumulative total of about 3,400 jobs (full- and part-time), $605 million of output (market value of goods and services), and $271 million of labor income (earnings and benefits) in the Davis economy. Expanding the analysis to the Yolo County economy increases the estimated total economic impact of the construction activities to approximately 5,900 jobs, $1.1 billion of output, and $462 million of labor income. The countywide economy is able to support a greater amount of construction and supplier activity, leading to a larger economic impact. The MRIC project accounts for approximately 71 percent of the total one-time economic impact.

2. Establishments operating in the nonresidential space and residents occupying the housing units in the proposed Innovation Center projects will support ongoing economic impacts in the local economy.

Establishments using the 3.1 million square feet of commercial space to produce goods or provide services and the residents occupying the 650 housing units and spending money in the local economy will support a considerable amount of economic activity on an ongoing

basis. Suppliers of goods and services will also indirectly benefit from this economic activity and employee spending will induce additional economic effects, both of which are captured in the multiplier or "ripple" effect. The cumulative ongoing economic impact associated with the proposed MRIC and Nishi projects is estimated at approximately 11,000 jobs, $2.9 billion output, and $704 million of labor income on an annual basis in the Davis economy. Within the larger Yolo County economy, the total estimated economic impact expands to approximately 13,000 jobs, $3.1 billion of output, and $766 million of labor income. The larger countywide impact is a result of additional capture of supplier demand and household spending. About 85 percent of the total ongoing economic impact in Davis and Yolo County is generated by the MRIC project.

3. ***The majority of the DEIR alternatives for the Innovation Center projects could produce decreased one-time and ongoing economic impacts compared to the Base Development Program proposals.***

   A total of 10 alternatives are considered as part of the DEIRs for the MRIC and Nishi projects. Seven of the alternatives could lead to a decreased one-time economic impact due to shifts in project size and land uses that will likely require less construction activity. This includes the Nishi Alternative Land Use Mix that was included as a quantitative sensitivity analysis to measure the economic impact of reallocating some of the nonresidential space to a hotel use.

   In terms of the ongoing economic impacts, seven of the alternatives could result in a decreased economic impact because of reductions in the amount of built space or changes in project land uses. The sensitivity analysis related to the Nishi Alternative Land Use Mix is in this category due primarily to the lower employment densities supported by the hotel use.

   On the other end of the spectrum, two alternatives could lead to increased one-time and ongoing economic impacts. These include the MRIC Mixed-Use alternative studied as a sensitivity analysis with 850 housing units, as well as the R&D Only alternative for Nishi. The former adds residential construction activity and household spending on top of the base MRIC proposal, while the latter shifts residential to nonresidential uses in the Nishi project that tend to support a greater amount of construction activity and establishment operations. The remaining alternatives could support economic impacts similar to the base proposals.

4. ***The ripple effect generated by the ongoing economic activities associated with the MRIC and Nishi projects will generate new offsite market demand for nonresidential real estate.***

   At buildout, the proposed MRIC and Nishi projects could directly support about 7,000 jobs on an ongoing basis. As a result of the multiplier effect, which accounts for estimated economic activity resulting from demand on suppliers and household spending, these projects could generate an additional 5,000 jobs in the local economy. These additional jobs will create incremental off-site demand for commercial real estate, which could translate to roughly 1.5 million square feet. The supply of existing vacant space could take down a small share of this incremental market demand, but the majority will likely need to be addressed through different means. To avoid a shift of the ongoing economic impact to surrounding communities over the absorption period, the supply of commercial space will need to expand through densification of existing development areas and new development on vacant land zoned for nonresidential uses. The effectiveness of the latter option to address incremental market demand could be impacted to the extent that off-site DEIR alternatives are explored,

which remove vacant land from the supply and maintain the existing agricultural land uses on the proposed, undeveloped MRIC and Nishi sites.

5. ***The Innovation Centers can benefit substantially from the economic impacts of a specific group of targeted clusters if the appropriate conditions are created.***

   The six main clusters and company type opportunities represent strong drivers of local economic impacts. Assuming that appropriate supporting conditions are in place to allow for these clusters to thrive, every 100 jobs in these clusters are estimated to support roughly 170 to 210 jobs, $27 million to $69 million of output, and $10 million to $15 million of labor income within the Davis economy. The variation between the high and low ends of the ranges is determined by the scale of interindustry relationships in the Davis economy as well as the category and value of the economic activities.

Fiscal Impact Findings

The fiscal impact analysis estimates the overall fiscal impacts to the City's General Fund under the Base Development Program. The objective of the analysis is to determine whether the proposed Innovation Centers will generate adequate revenues at buildout to meet the costs of providing new development with City services (e.g., police protection, fire protection). The analysis is based on the assumption that the unincorporated portion of the projects will be annexed into the City and municipal services will be provided by the City.

1. ***The projects are estimated to generate an annual net fiscal surplus of approximately $2.1 million for the City's General Fund at buildout.***

   Development of the MRIC project is estimated to generate an annual net fiscal surplus of about $2.2 million for the City's General Fund. However, the Nishi project is estimated to produce an annual net General Fund deficit of approximately $78,000 at buildout. These results assume a 50%/50% property tax sharing allocation between the City and County of the applicable property tax rate for the portion of the Innovation Centers in the unincorporated County, among other key assumptions described in the fiscal impact analysis memorandum. Below is a summary table illustrating the estimated net fiscal impacts to the City's General Fund under the Base Development Program in total and for each project.

Estimated Annual Fiscal Impact Summary at Buildout (2015$)

Fund	Base Development Program		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = a + b*
City General Fund			
Annual Revenues	$3,786,000	$1,273,000	$5,059,000
Annual Expenditures	$1,585,000	$1,351,000	$2,936,000
Annual General Fund Surplus/(Deficit)	**$2,201,000**	**($78,000)**	**$2,123,000**

buildout

Source: EPS.

2. Although the Nishi project is estimated to result in an annual net fiscal deficit at buildout, the project is envisioned to contain land uses that contribute to a successful innovation ecosystem.

The estimated annual net fiscal deficit for the Nishi project is attributable to two key factors: 1) the inclusion of 650 residential units; and 2) an assumption of approximately 80,000 square feet of public/nonprofit space (20% of total nonresidential space). Residential development – in particular higher-density, moderately-valued residential development – is often a net fiscal burden on a city's operating budget. That is, the cost of providing municipal services can exceed General Fund revenues (e.g., property tax revenue, sales tax revenue) generated per unit. However, cities desire residential land uses to accommodate a balance of land uses, provide workforce housing, and fulfill other policy objectives. For the Nishi project in particular, the presence of housing is a positive attribute that will enhance the mixed-use character valued in innovation centers and will likely improve the internal economics of the project (e.g., lease rates, land values). Similarly, public/nonprofit space is estimated to be a net fiscal burden on a city's General Fund because of low General Fund revenue generation (i.e., public/nonprofit uses are assumed to be exempt from paying property tax revenue and real property transfer tax revenue, and are not estimated to generate any onsite taxable sales tax revenue). However, this type of space – in particular for the Nishi project – has the potential to attract UC Davis-related users, capitalizing on the university's research strengths and strengthening the local innovation ecosystem and local project economics.

3. The annual net fiscal deficit of the Nishi project may be lessened by actual conditions that are more favorable than those modeled in the analysis.

The fiscal impact analysis is predicated on a set of assumptions that reflect current, conservative economic and demographic conditions. However, more favorable assumptions may significantly diminish the deficit or result in an annual net fiscal surplus for the City's General Fund. For example, a moderate increase in taxable sales generated by the onsite retail and other nonretail, nonresidential uses will produce additional sales tax revenue that may diminish the estimated annual deficit for the City's General Fund. In addition, a higher property tax sharing allocation for the City or the addition of a potential hotel project onsite may result in an annual net fiscal surplus for the City's General Fund. Finally, privatization of parks, open space, and public works maintenance obligations may also result in an annual net fiscal surplus for the City's General Fund. The details of these potential amendments to the Base Development Program (sensitivity scenarios) are discussed in detail in the fiscal impact analysis memorandum (**Exhibit 2**).

4. The fiscal impact analysis includes ten sensitivity scenarios which recognize that key modifications to the Base Development Program could have notable impacts on the net fiscal impacts of the Innovation Centers.

The fiscal impact analysis evaluated modifications to key land uses and assumptions used in the base analysis. Six sensitivity scenarios will have positive impacts on the annual net fiscal impacts to the City's General Fund (i.e., net fiscal revenues will increase). These include: the addition of an onsite hotel in the Nishi project, an increased City share of the applicable property tax rate (75 percent), increased taxable sales per square foot assumptions similar to those generated by land uses in the City's existing 2nd Street Corridor and Interland URP, a higher capture of taxable sales generated from the Innovation Centers' residents and

employees, and privatized operations and maintenance of onsite infrastructure facilities. Increased annual revenues at project buildout from these five scenarios ranged from $58,000 (privatized operations and maintenance of onsite infrastructure facilities) to nearly $1.2 million (increased taxable sales per square foot). Four scenarios are estimated to generate an annual net fiscal surplus for the Nishi project: the inclusion of an onsite Nishi hotel; an increased City share of the applicable property tax rate; and both alternative maintenance funding scenarios described further in the fiscal impact analysis memorandum (**Exhibit 2**).

5. ***Four sensitivity scenarios examined in the fiscal impact analysis are estimated to decrease annual net fiscal revenues for the Innovation Centers, although all scenarios would continue to produce a sizable net fiscal surplus for the City's General Fund.***

   Four sensitivity scenarios will have negative impacts on the annual net fiscal impacts to the City's General Fund (i.e., net fiscal revenues will decrease). However, none of these scenarios will result in the projects generating an annual net fiscal deficit for the City's General Fund. These scenarios include: the addition of housing in the MRIC project; the removal of the planned hotel in the MRIC project; a decreased City share of the applicable property tax rate (25 percent); and a lower capture of taxable sales generated from the Innovation Centers' residents and employees.[8] Decreased annual revenues at project buildout from these scenarios ranged from $102,000 (low taxable sales capture rate) to $732,000 (removal of planned MRIC hotel).

6. ***While the MRIC DEIR project alternatives are estimated to result in either reduced net fiscal revenues or have similar impacts to the proposed project, all Nishi DEIR project alternatives are estimated to have a positive effect relative to the impacts of the Base Development Program.***

   Unsurprisingly, the MRIC "No Project" alternative would eliminate the project's significant annual net fiscal surplus for the City's General Fund. The MRIC "Reduced Project" alternative, with 2.1 million fewer square feet of nonresidential development, would substantially reduce key revenues (e.g., property tax revenue, sales tax revenue) thereby reducing the estimated annual net fiscal surplus. Remaining MRIC DEIR project alternatives ("Reduced Site Size," "Off-Site Alternative A," and "Off-Site Alternative B") are estimated to have similar impacts to the Base Development Program based on their location within the unincorporated County and similar land uses.

   The Nishi "No Project" alternative would eliminate the annual net fiscal deficit to the City's General Fund. The Nishi "R&D Only" alternative, which includes nearly 875,000 additional square feet of R&D space and no residential units, would substantially increase estimated General Fund revenues and likely result in an annual net fiscal surplus to the City's General Fund. The Nishi "Off-Site Option" alternative has the potential to eliminate the estimated annual net fiscal deficit of the proposed project (and possibly result in an annual net fiscal surplus), given its location within the City and higher City General Fund property tax share

[8] Although the addition of MRIC housing results in a lower net fiscal impact for the City's General Fund, as mentioned previously, the presence of housing is a positive attribute that will enhance the mixed-use character valued in innovation centers and may improve the internal economics of the project.

allocation. However, a combination of reduced nonresidential space and the proposed residential units in this DEIR alternative may counter any reductions in the estimated net fiscal deficit to the City's General Fund. It is likely that the "Off-Site Option" would have a fiscally neutral impact on the City's General Fund, though as previously discussed, it lacks the immediate university proximity that is the main intent of the project.

3. THE INNOVATION CENTER CONCEPT

Overview

The concept of the "Innovation Center" is a product of two driving forces. First, emanating from universities interested in furthering their research mission through industry partnerships, the notion of the university-related research park has evolved over the years, with early examples such as Stanford Research Park setting the standard. Recent studies from the Brookings Institution and others back up empirical evidence that these "science parks", like other traditional business parks containing single land uses, are not satisfying the needs of many tenants. Not only are these tenants seeking proximity to centers of higher education and environments that support knowledge exchange among firms, but they are also compelled by the inclusion of activating retail amenities, services, and other amenities that establish more of a *bona fide* community environment.

Second, the prospect for local communities of competing within traditional, established industries on the basis of price alone has become increasingly unsustainable in a global economy. Innovation Centers provide a climate in which new tech markets can be explored and nurtured. The Milken Institute found that high technology industries accounted for 65 percent of the difference in regional economic success in the United States from 1975 to 1998.[9] Such emerging markets have the potential to become the basis of much future prosperity in Davis.

Innovation Centers are therefore an evolving form of business parks and research centers that bring improved vitality and interest through the creation of an enriched sense of place, responding to user preferences for available indoor and outdoor meeting spaces, internal and external connections to community assets, and the inclusion of entertainment, civic, and recreational uses. These environments provide the kind of formal and informal opportunities for interactions across industries and companies that encourage innovation. Increasingly, these Centers are characterized by mixed-use settings, including housing, which have the advantages of improving overall development economics through (1) working multiple market segments and (2) leveraging the above-referenced sense of place to effectively improve lease rates and land values.

Numerous recent publications reinforce the notion that Innovation Centers perform particularly well when they are developed in intense, active urban centers with research strengths and a variety of cultural, civic, educational, and other supporting uses. When the proposed projects in Davis are evaluated collectively, as part of the larger innovation ecosystem that includes UC Davis and Downtown Davis, this umbrella network has the potential to enhance the City's existing innovation ecosystem. Synergies are likely to arise from the combination of the Nishi and MRIC projects, as well as existing concentrations of technology-driven users in Davis. Many key factors suggested by leading practitioners, thought leaders, and empirical evidence as necessary to support Innovation Centers are present within the proposed Innovation Centers,

[9] Milken Institute, America's High-Tech Economy: Growth, Development and Risks for Metropolitan Areas, 1999.

including university proximity, a mix of business facilities, and supporting uses such as ancillary retail, hotel/conference centers, and housing. There are relatively few communities that feature the key attributes needed to support the concept. This report finds that Davis has many of the required intellectual and quality of life elements needed for this type of development to succeed. These "success factors" are discussed in **Chapter 6** of this report.

While Davis is one of few Northern California communities outside of the Bay Area with the requisite higher education, regional economic, and local quality of life factors creating the conditions under which an Innovation Center may develop, it should also be noted that these Centers need to be "nurtured" in their early phases, especially where they are targeting new types or intensities of development. While Davis has a solid track record of incrementally growing a tech sector concentrated in two parts of the City (Interland URP and the 2nd Street Corridor), the Innovation Center proposals seek to provide more compelling urban design, use mixes, and levels of investment than have been traditionally realized in Davis. Observations from Davis and elsewhere suggest that the industry clusters being targeted in this case are capable of yielding substantial economic benefits to local economies and city governments over time. However, rather than viewing the project through the lens of generating these benefits, the main priority in the early stages of development should be to "create an environment that encourages innovation and entrepreneurship," which serves broader, regional economic development goals.[10] By prioritizing the larger objective of fostering innovation, the goal of generating revenue and other economic benefits may be achieved.

Emergence of an "Innovation Ecosystem" in Davis

Davis already is home to two districts that exhibit many characteristics of Innovation Centers. Interland URP, shown in **Map 2**, is an office and R&D park located just south of I-80 and within a mile east of campus. It is owned and operated by Interland, LLC, a developer of offices and apartment complexes that moved the firm's headquarters to the park from the Bay Area. The park is a mix of professional office, university, and agricultural biotech companies. The largest employer, Marrone Bio Innovations, is an agricultural biotech company with more than 150 employees.

The 2nd Street Corridor, shown in **Map 3**, is a former industrial center that has reinvented itself as a district for innovative companies. This reinvention has been largely organic, lacking the direction of a private facilitator as in the case of Interland URP. Major tenants include advanced manufacturers DMG Mori and FMC Schilling Robotics, which support a total of over 200 employees.

The classic Innovation Center, typically defined as a dense urban project or a university-related project, is different from the projects being proposed in Davis. However, the combination of the proposed projects potentially contributes to the assembly of diverse opportunities and economic activities that can be described as an overall ecosystem. The realization of a fully developed ecosystem in this regard is fundamental to the notion of segmenting the market and providing as

[10] "Driving Regional Innovation and Growth." Battelle Technology Partnership Practice, August 2013.

Map 2
Interland University Research Park

Map 3
2nd Street Corridor

Second Street (1,037,129 sf)

Source: City of Davis Geographic Information System

broad a range of activities as possible to foster meaningful economic development and diversification. Creation of a healthy and diverse range of tech-driven business opportunities and activities in Davis, if successful, can help the City become more diverse economically, and can provide fiscal support by generating revenues to fund public services.

The following opportunities are associated with the proposed MRIC and Nishi projects:

- Generate demand for infill projects in existing tech concentrations created by relocation of space-limited users to Innovation Centers.
- Related to above, provide start-up opportunities for nascent firms.
- Contribute to diversification of Davis, including retaining talent trained at UC Davis as local or nearby residents by providing local job opportunities for young, highly-skilled professionals.
- Add amenities and employment opportunities appealing to the talent base of the creative class.
- Meet needs of knowledge-based industries through specialized facilities.
- Support the downtown and other existing commercial areas through increased economic activity.
- Increase fiscal revenue from business-to-business (B2B) and point-of-sale transactions.
- Improve university access to industries aligned with research strengths and offering partnership potential.
- Provide opportunities for support businesses, including those in product or process chains.
- Attract prominent companies aligned with university and regional strengths.
- Enhance the regional innovation ecosystem and expand economic development opportunities.

The key to realizing rapid absorption is the inherent market segmentation embodied by such an ecosystem in Davis. This environment should strive to provide opportunity for companies at every stage of the firm life cycle to leverage the presence of UC Davis. This will allow mature industry to collaborate with and benefit UC Davis through research partnerships, similar to Seed Central and those being developed under the rubric of the World Food Center, and other university research institutes.

Overview: Project Benefits and Concerns

Benefits

Based on these and other dynamics, the expected types of benefits typically emanating from Innovation Centers are:

- **Fiscal Benefits:** The fiscal and economic impact of land use projects can be analyzed as a means for understanding and comparing the implications of various public policy decisions. Costs and revenues to local jurisdictions, jobs and output, and the likely change in sales on both subject land uses and nearby businesses are all critical to sustaining service provision

levels in Davis. Overall results indicate these projects may collectively offer fiscal benefits to the City of Davis, over and above annual project-related costs, once the Centers are built out.

- **Ripple Effect/Economic Benefits:** The establishments operating in the Innovation Centers will generate ongoing multiplier or "ripple" effects as a result of the demand on suppliers of goods and services as well as employee spending. These effects support incremental jobs and output in the local and regional economies.

- **Economic Diversification:** Effectively segmenting the market is necessary to ensure projects are characterized and phased to be developed feasibly and deliver fiscal and other community benefits, while protecting and bolstering downtown. By increasing the supply of employment opportunities to be more in proportion to the housing available in Davis, the concept has the ability to improve the local jobs-to-housing balance while making fiscal revenues available to fund key City services in support of continued economic innovation and the overall quality of life in Davis.

Issues/Concerns

Key issues discussed in the Phase I document and summarized in the following pages include:

- **Local Economic and Market Considerations:** The type, amount, and location of real estate development are linked to underlying economic and market forces. The Davis market sits between a thriving Bay Area market that is pushing users eastward, and a recovering Sacramento regional economy that continues to offer buildings at prices lower than new construction values. Davis must compete for Innovation Center uses on the basis of university- and quality of life-related competitive advantages.

- **Financial Feasibility Outlook:** In addition to land constraints, Davis has suffered from a lack of built space to offer growing companies. The financial feasibility of real estate development for office and R&D products built on a speculative basis is improving but still tenuous. The City will need to work with the private sector to ensure project costs such as environmental mitigation measures are spread effectively across project phases to ensure viable projects emerge in the short term.

4. DAVIS ECONOMIC ATTRIBUTES

In order to effectively implement Innovation Centers in Davis, it is necessary to have a reasoned understanding of the market conditions that currently exist in Davis and what can be done to influence them. This chapter first provides on overview of local economic development objectives as they relate to Davis, followed by a synopsis of the current market prospects for Innovation Centers in Davis. The chapter closes with a review of the recent Innovation Center proposals that have arisen.

Local Economic Development Dynamics

Over the past several years, the City of Davis has established a strategic direction for economic development in the community and enhanced activities aimed at improving local economic vitality. Earlier work focused on setting strategic goals, understanding economic opportunities, and engaging stakeholders laid the groundwork for proactive efforts to build an innovation economy. Recent efforts have resulted in the creation of the Innovation and Economic Vitality Work Program, formal support of the Next Economy initiative, and release of the Request for Expressions of Interest (RFEI) for Innovation Center proposals. These efforts have been aligned in a way that creates the potential for the City to see a number of desirable economic development outcomes.

Although there is no common definition of local economic development, the concept generally refers to a set of policies and programs that are directed at enhancing the economic well-being of the community. These policies and programs help create the conditions for businesses to prosper, economic growth, and improved quality of life. The practice of economic development has evolved in recognition of several key dynamics that are applicable to the City of Davis.

1. **Interconnected goals of growth and development** – Growth in a local economy generally refers to increases in the number of businesses and jobs; related development can be positioned not only to accommodate this growth, but to effect improvements in economic well-being and quality of life. There is an increasing recognition of the need to align the two goals to enhance overall economic vitality.

2. **Diversification and wealth creation** – Diversification in the local economy can help sustain healthy conditions by limiting overexposure to business cycles of specific industries or segments of the economy. A major consideration in economic diversification is the balance between those sectors that generate net new wealth through domestic and international exports, known as economic base activities, versus those that simply move wealth around by serving the local market. The proposed Innovation Centers bring one of the greatest opportunities the City has had to leverage the proximity of UC Davis to substantially bolster its economic base.

3. **Role in sustaining local quality of life** – There is a connection between a strong economy and quality of life, as successful businesses generate tax revenue that supports local services and amenities. Additionally, locally-based companies and major corporations often contribute to community events, local non-profit organizations, and

other philanthropic endeavors. Quality of life has been shown to be a major factor in business and talent location decisions.

The City of Davis has recognized the unique opportunity to orient economic development efforts around two key strengths – the presence of UC Davis and a desirable quality of life for residents, including cultural and entertainment amenities as well as access to the natural environment. These strengths, along with a strong core of community values related to sustainability, attract the kinds of innovative companies that tend to be interested in the Bay Area, but may not consider other communities in the Sacramento Region as viable options. Communities with similar strengths in other regions have benefitted from four other key trends, which are exhibited in many of the City's recent economic development-related efforts.

1. **University engagement** – Research institutions develop the talent and ideas that can translate into economic value through technology development and deployment in the private sector. Strong relationships between the community and university are important to align interests and realize economic outcomes that are derived through technology transfer, an innovation support network, and corporate partnerships.

2. **Advanced and knowledge-based industries** – The importance of advanced, high value-added industries in the national economy has increased following the last recession.[11] These industries, which include advanced manufacturers such as DMG Mori, are knowledge-based and rely heavily on research and development, innovation resources, and skilled workers that are concentrated in many of the leading regions with a tech industry base and prominent research institutions.

3. **Creative class** – Access to a highly skilled workforce is one of the top site selection factors for businesses across nearly every industry, and the shift toward entrepreneurship and proprietor-based employment make talent a key economic development asset. The creative class[12] is typically drawn to communities with a high quality of life and access to civic amenities.

4. **Agglomeration and industry clusters** – The combination of university research, knowledge-based industries, and a skilled labor force enhance the conditions necessary for industry agglomeration with critical inter-industry relationships that define a successful cluster. An innovation economy is often driven by the presence of one or more functioning clusters.

---

[11] Advanced industries, according to the Brookings Institution, represent the nation's tech sector at its broadest and most consequential. They are defined as a selection of 50 industries with high R&D spending per worker as well as a high share of science, technology, engineering, and math (STEM) workers. They cut across manufacturing and energy sectors, as well as high-tech services such as computer software.

[12] A class of knowledge-based workers defined originally by economist and social scientist Richard Florida based on standard occupational codes that involve creative and innovative thinking. Florida's work posits that regions which can attract and retain the creative class enjoy more productive economies.

City Guiding Principles for Innovation Centers:

- Density
- Sustainability
- Transportation
- Work Environment
- Uses
- Timing and Project Phasing
- Fiscal Consideration and Net Community Benefit
- Facilitate Collaborative Partnerships

The proposed Innovation Centers offer the potential to enhance the City's ability to realize many of the desirable economic development outcomes discussed above. In particular, the Innovation Centers provide space that would allow the City to grow and diversify its economy, build a larger corporate presence in the community, support a desirable quality of life, and leverage the university as an economic asset. The City's unique characteristics, along with the Guiding Principles it established for Innovation Center development, position the community to capitalize on many of the advantages of innovation districts. In terms of economic development outcomes, creating a strong innovation district has the potential to make progress in four areas that are reflected in the strategic direction established in the City's Innovation and Economic Vitality Work Program.

1. **Support an innovation ecosystem** – Increasing the amount of space available to companies across clusters and at various stages of the life cycle while providing support services and facilities (e.g., incubators, accelerators, and third places) could enhance the local innovation ecosystem.

2. **Meet special needs of advanced and knowledge-based industries** – Integrating specialized facilities (e.g., wet labs, clean rooms, flex space) could allow the City to attract and retain companies in the types of advanced and knowledge-based industries that align with the local labor force, university research strengths, and regional dynamics.

3. **Achieve agglomeration and critical mass** – The most successful communities with innovation-based economies have seen growth and development occur with the clustering of companies and suppliers. Providing space for companies within the clusters already developing in the local and regional economies could help build a critical mass.

4. **Enhance economic competitiveness** – The ability to compete for companies interested in Davis and the type of space being proposed could allow the community to elevate its prominence in the regional economy, which currently contains limited examples of innovation districts.

Innovation Center Prospects in Davis

Underlying Market Conditions

Domestic macroeconomic indicators are very strong, with the U.S. emerging as the most stable growing economy in the world. While national average commercial construction is somewhat below prerecession levels, activity levels in key markets, such as San Francisco, are well above historic peaks. This growth largely is being driven by technology users. Along with the energy sector, tech growth is contributing to more than half of the 60 million square feet of space pre-

committed for occupancy through 2017 in new office developments in the United States. The dominance of tech-driven office demand is expected to continue.[13]

In the regional context, Davis finds itself in the midst of several dynamic regional confluences. To the west, the Bay Area represents one of the most vital innovation ecosystems in existence. The combined effects of UC Berkeley, UC San Francisco (UCSF) and Stanford, accompanied by several additional universities, have helped the Bay Area emerge as the center of tech innovation across a myriad of industries, anchored by the information technology and life sciences industries. The Bay Area entered 2015 with arguably the strongest economy in the nation, adding more than 580,000 jobs since 2010. Capital flows are very strong, with venture capital (VC) trending near historic "dotcom" levels, receiving 50 percent of all venture capital activity.[14]

Within the Bay Area, the East Bay, which has been the source of some relocation activity to Solano County and the Sacramento Region, represents the second largest submarket in terms of total market size, but is by far the lowest (relative to the North Bay, San Francisco, the Peninsula, and Silicon Valley) in terms of sales volume.[15] In the East Bay, the strongest tech submarket has been Emeryville, which experienced more than 140,000 square feet of positive net absorption in 2015 through the end of the second quarter. Emeryville has emerged over the past 2 decades as a de-facto UC Berkeley-related Innovation Center, as investment until recently has skipped over West Berkeley because of prohibitive zoning constraints. Overall, the I-880 and I-80 corridors are receiving interest from firms seeking lease rate relief that don't need locations in more expensive submarkets such as San Francisco. These firms often still have access to the desirable attributes in the Bay Area such as labor force, high quality-of-life communities, agglomeration of firms in clusters, and an established innovation ecosystem. However, the chain reaction can continue with some East Bay firms looking further east for economic relief as the market catches up with the balance of the Bay Area.

Local Cluster Dynamics

The following key market dynamics illustrate recent key trends and dynamics, providing evidence of a robust and promising overall development outlook:[16]

Davis

- Recently, in the fourth quarter 2014, two agricultural biotech companies, AgraQuest and Nunhems, became consolidated operating units of Bayer CropScience and relocated into ±160,000 square feet in West Sacramento. Bayer first did a Request for Qualifications (RFQ) and sought space in Davis, and when they were unable to find a timely, available, and affordable alternative, they acquired and rehabbed a property in the neighboring city of West Sacramento, spending more than $60 million in tenant improvements and equipment.

---

[13] CBRE, "Why New Office Construction in the U.S. is not "Low," Volume 16, Number 16, April 23, 2015.

[14] DTZ Bay Area Investment Snapshot (Q2 2015)

[15] Ibid.

[16] Provided to EPS by Jim Gray and Nahz Anvary of DTZ.

- Marrone Bio Innovations in the fourth quarter 2014 immediately backfilled and released ±55,000 square feet previously occupied by Bayer CropScience units. As Bayer continues their exodus, additional agricultural biotech companies are moving into the space, such as Agrinos.

- In 2014, FMC Shilling Robotics, a robotic engineering and underwater oil services firm, announced they have outgrown their ±100,000 feet of space in Davis (50-percent leased and 50-percent owned). FMC Schilling is reported to be planning on obtaining a ±40-acre parcel to build their own facility.

- In 2010, DMG Mori, a Japanese global manufacturing and engineering company, selected a site in Davis, acquired ±17 acres, and built an initial ±240,000-square-foot building, which they own and from which they operate their manufacturing business. Additional land for expansion and future facilities already is owned. This large manufacturing facility follows DMG Mori's earlier R&D facility in which Digital Technology Labs, a spin-off from the structural engineering department at UC Davis, with the financial backing of DMG Mori, negotiated a build-to-suit facility of ±71,173 square feet.

- In 2011, Expression Systems, a bio-tech company that cultivates and manufactures cell culture media, constructed a 27,484-square-foot, 2-story building for laboratory, manufacturing, and office uses on a 1.24-acre vacant parcel located at the northwest corner of Second Street and Cantrill Drive. This enabled the company to relocate from Woodland, California, and achieve its goal to be closer to UC Davis.

- In 2012, Monsanto, one of the world's largest agricultural companies, built a ±90,000-square-foot R&D lab in Woodland as an addition to their now ±200,000 square feet for their seed company, on a 112-acre farm they acquired as a part of purchasing the Seminis Seed Company and now are moving R&D, field trials, and production to one site. UC Davis until recently was in escrow to acquire the former Monsanto/Calgene property in Davis for labs, but there were complications and costs that made that transaction terminate. There likely will be interest from other firms, though the building and its improvements are old and may require significant improvements and upgrades. The ability to expand and properly park at the subject property is also problematic.

- In 2012, UC Davis made the decision to create a Shared Services space at 260 Cousteau to enhance efficiencies and save costs by consolidating varied administrative services, including payroll, human resources, and accounts payable in a single operating unit, and leased ±25,000 square feet from Buzz Oates (initially occupied ±15,000 square feet with an obligation to take an additional ±10,000 square feet and has subsequently done so). Also, a division of UC Davis is reported to have finalized a ±10,000-square-foot lease, so there will be no further vacancy in this building. The Buzz Oates properties in the 2nd Street Corridor and Interland URP always have been seen as the "overflow" for UC Davis, and there is very limited available supply with little if any remaining large floor plate spaces available.

- In 2012, HM.CLAUSE, part of Limagrain, now the 4th largest seed company in the world, purchased Campbell Soup Company's Vegetable Seed Operations, located on Mace Boulevard in Davis. These operations include the company's research facility for vegetable breeding and seed development and sale of seeds to farmers and growers around the world. The 19 full-time employees joined HM.CLAUSE. In 2015, it opened the HM.CLAUSE Life Science

Innovation Center, a new start-up incubator in partnership with UC Davis that is hosted in the old Campbell's Soup facility.

- In 2013, HM.CLAUSE expanded from a 4,000-square-foot space on Mace Boulevard into an 11,000-square-foot space on Cousteau Place. The Davis location hosts an administrative support and research center for the company. Stephen Tomasello, external communicationmanager for Harris Moran in the Americas, said that having a research center in the same town as UC Davis was no accident. The proximity to UC Davis, a renowned agricultural research university, was key to the location decision. He noted that "several other seed companies are also setting down roots in Davis for the same reason… it's like a Silicon Valley for seed companies."[17]

- UC Division of Agriculture and Natural Resource acquired a ±42,600-square-foot office building for its 125-person operating unit by converting a ±33,000-square-foot industrial/sports building and adding a ±9,600-square-foot second story. This marks the first presence of the Office of the President in Davis itself, which functions as the UC's systemwide headquarters.

- In 2014, Stratovan, a company started by a UC Davis PhD graduate, moved back to Davis. Stratovan specializes in next-generation interactive, visual analysis software and software toolkits for 3D imaging, diagnostics, surgical planning, life science applications, and airport security. The company's core product line includes a range of novel, next-generation visual analysis applications, including 3D image viewing station software, airport screening simulation software, and system solutions that include Automated Threat Recognition (ATR), DICOM, and DICOS (Digital Imaging and Communications in Medicine/Security) -based toolsets. In addition, its innovative 3D surgical planning and diagnostic tools are used in areas such as orthopedics, craniofacial surgery, neuroimaging, oncology, ophthalmology, otolaryngology, anthropology, and veterinary medicine. In February 2014, Stratovan was awarded two contracts with the U.S. Transportation Security Administration for up to $6.2 million to develop technology to detect explosives for baggage screening systems.

- CleanWorld and UC Davis unveiled a Renewable Energy Anaerobic Digester in 2014 on the site of a retired UC Davis landfill. The biodigester, the result of an $8.5 million investment, converts food and yard waste into clean energy. It is estimated to create 5.6 million kilowatt-hours each year.

- In 2015, Cedaron, a local, growing medical technology company started in 1990 by serial entrepreneurs, purchased property at Da Vinci Court and obtained approval for site and building modifications, enabling the company to expand in Davis.

West Sacramento

- In 2013, Nippon Shokken, a Japanese spice and sauce company, opened a 70,000-square-foot facility which could ultimately house 400 employees.

- In 2014, TOMRA Sorting Solutions, a Norwegian company providing sorting and processing systems for food industries, opened a 60,000-square-foot facility in West Sacramento.

---

[17] "Seed company Harris Moran grows into bigger space," Sacramento Business Journal, May 2013.

- In 2015, Shinmei, one of the world's largest rice-bun producers, opened a $10 million, 28,000-square-foot facility. It currently has 20 employees, but could be expanded with more production lines to employ more than 100 people.

Woodland

- Swiss-based seed company Syngenta expanded into a $11.2 million, 42,000-square-foot melon and squash research headquarters.
- In 2012, Dow Agro Sciences acquired Cal/West Seeds, a supplier of crops to seed growers that is expected to grow substantially as a result of the acquisition.
- Monsanto completed its expansion into a $31 million, 90,000-square-foot vegetable seed research headquarters in 2013.
- Food manufacturer SF Spices announced in 2014 that it would relocate its headquarters and manufacturing operations from San Francisco to Woodland, bringing 70 new jobs. SF Spices has leased a 171,000-square-foot space to create a new plant.
- Boundary Bend, Australia's largest olive producer, announced in 2015 that it will build a $20 million olive press with 25-40 full-time employees. It has also acquired 1,000 acres of land to plant olive trees.

Emergence of Proposed Davis Projects

Property interests in Davis have acquired and held major, strategically located aggregations of agricultural land just outside the City. Meanwhile, the City has been facing budget challenges stemming from issues such as limited diversity in the retail sales base, removal of property and equipment from tax rolls because of UC Davis commercial leases, limited commercial land base, a heavily renter-oriented housing stock, and continued retail leakage. Drawing focus to the City's tepid tax receipts, the City's populace continues to demand high levels of service in line with the community's desirable quality of life. As discussed in this report, the proposed Innovation Centers have the potential to be a financial boost to the City's coffers, but only if these projects are nurtured from the outset to ensure that they successfully develop into full-fledged centers of R&D and advanced manufacturing capable of matching the contributions of firms such as Schilling Robotics and DMG Mori, which make significant contributions to the City's General Fund through high assessed values and B2B sales and use tax receipts.

Setting the table for this outcome, UC Davis has improved its standing as a major research university, creating rising expectations for a burgeoning high-tech and innovation concentration that contributes to the region's efforts to diversify the economic base.

The proposed Innovation Center projects signal the next phase in the development of a university town predicated on a major research presence: the advent of private investment leveraging a nationally significant public investment in the form of UC Davis. This is an opportunity to generate regional economic benefit, having local fiscal benefits through a strategy of university-related economic growth and diversification. The degree to which these anticipated benefits will occur greatly depends on the alignment between UC Davis and the local real estate market, as well as the ability to leverage regional strengths.

In late May 2014, an RFEI was circulated soliciting responses by June 2014. At this time, the 47-acre Nishi project, owned by Nishi Gateway LLC, located adjacent to the UC Davis campus, was already underway. This project includes housing as a base-case scenario. In addition to Nishi, which was not required to submit a proposal, the City received proposals for two distinct sites, shown in **Map 1**: the 229-acre MRIC project, owned by Oates/Ramos, on the eastern edge of Davis towards Sacramento, and the 208-acre Davis IC project, which, as discussed earlier, has been put on hold. As shown in **Table 1**, combined, the Nishi and MRIC projects represent approximately 3.1 million square feet of new commercial development and 650 housing units.

One of the advantages of having a third project in the mix (Davis IC) was to establish a competitive environment where prospective users would compare and contrast development opportunities at each site. This typically would have the effect of reducing the average cost of land or leases applying to both sites. All things being equal, lower leases and land prices would improve Davis' overall competitive position in the Northern California Region and increase absorption. Accordingly, any increase in prices will be accompanied by potential reduced annual absorption in Davis among price-sensitive uses. However, it is possible that opportunities now exist for one or more other projects to fill the void, such as the recently announced 15-acre Panatonni office/R&D center proposed south of I-80.

Voter Approval

In 2010, the City extended Measure J, now known as Measure R, an ordinance requiring voter approval for any project that changes a land use designation from agricultural to urban under the City's planning process. Both the Nishi and MRIC projects will require Measure R approval, creating some initial uncertainty prior to the vote. Removal of this uncertainty will provide additional incentive to move into the next phase of due diligence activities, including more detailed characterization of site engineering and other project elements.

Voters may seek assurance that the range of uses allowed in the projects will be primarily oriented to the types of "tech" uses described in this report. Further discussions may need to explore the prospects for any development regulations affecting considerations such as uses and appearance that may be under consideration. Overall, it appears there is a shared commitment and alignment of interest between the City and the developers of these projects, as the planning framework and estimated infrastructure costs are indicative of a much higher level of quality than would typically be planned for business park uses in the region.

The City wishes to use a balanced approach in order to facilitate some flexibility to respond to market demands on the one hand, while on the other hand ensuring that the projects reflect the City's Guiding Principles for Innovation Center development as detailed earlier in the chapter. In this regard, it will be important to ensure that project phasing and features are developed in a prudent and cost-sensitive way, buttressed by appropriate Development Agreements between developers and the City.

5. INNOVATION CENTER CLUSTERS AND COMPANY TYPES

The success of the Innovation Centers will largely be driven by the growth opportunities that are present both within UC Davis and the larger region. This chapter isolates these overlapping opportunities in order to determine the types of industry clusters and companies that can be supported by the Innovation Center projects in Davis.

UC Davis and the Local Innovation Economy

To understand the impacts of Innovation Centers that largely are inspired by the proximity to UC Davis, it is important to recognize more broadly the impacts universities have on innovation economies.

As a fundamental part of the shift to a "knowledge economy," academia increasingly has emerged as a major "anchor industry," driving economic growth and generating employment opportunities and other benefits.

One of the primary ways universities improve local economies is through development and commercialization of new technologies, otherwise known as technology transfer. Universities facilitate technology transfer in many ways, including business incubators, support and training networks, and university centers that partner with private industry. Universities lead to the creation of R&D-related start-ups or spin-off firms, as well as clusters of ancillary and support-related businesses and services, all of which catalyze additional local job generation.[18]

Universities also play an active role in creating new businesses through the operation of business incubators. There are hundreds of incubators affiliated with colleges and universities across the country, which catalyze the commercialization of research and assist in the formation of start-ups created by faculty. Sharing space with other start-ups fosters a creative atmosphere conducive to networking, and simply having an address in university space provides firm founders exposure to venture capitalists looking for new investment opportunities.[19] Shared access to expensive resources, such as laboratory equipment, is another key to success.

UC Davis has long been one of the largest driving forces in the region's innovation economy and has been taking steps recently to further its leadership role in this regard. Chancellor Katehi's Vision 2020 Initiative calls for a mix of university incentives, funding mechanisms, and training programs to encourage innovative collaborations, self-sustaining initiatives, next-generation technologies, and entrepreneurial activity.

Research Strengths

UC Davis brings in over $700 million in research grants annually, more than UC Berkeley, MIT, or Harvard. It is a leading academic partner for innovative research in agriculture, biotechnology, clean energy, medicine, information technology, and engineering.

---

[18] "The University of California's Economic Contribution to the State of California," EPS, 2011.

[19] "A Study of the Economic and Fiscal Impact of UCSF," EPS, 2010.

UC Davis research programs routinely are ranked among the highest in the nation, including key areas of specialty such as agriculture and forestry, food science, ecology, plant and animal sciences, veterinary medicine, and a number of specialties within the School of Medicine. **Table 2** provides an expanded list of research specialties and centers. Situated within one of the largest food sources in the world in California's Central Valley, UC Davis has been ranked the world's top university for agricultural teaching and research, and many innovative agriculture companies, including several leading seed research companies, have located in Davis as a result.[20]

Tech Transfer and Entrepreneurial Support

Technology transfer at UC Davis has garnered increased attention from the leadership of Chancellor Katehi, who was trained as an electrical engineer and circuit designer and holds 19 patents herself. The Chancellor created a blue ribbon committee to evaluate tech transfer in UC Davis and has helped grow the Office of Research. The university now operates several programs benefitting entrepreneurs:[21]

- **Venture Catalyst** is a series of programs facilitating tech transfer and assisting UC Davis start-ups, partly modeled on QB3's "startup in a box" program.
- **Science Translation and Innovative Research (STAIR)** provides proof-of-concept grants of $25,000 to $50,000 for faculty to show their ideas are commercially feasible.
- **Smart Toolkit of Accelerated Research Translation (START)** provides a series of tools to entrepreneurs, including deferment of patent expenses, company incorporation and legal support, connection to business and technology mentors, grant writing workshops, and access to contract service providers.
- **The Child Family Institute for Innovation and Entrepreneurship (CFI)**, established in 2011 and housed under the Graduate School of Management, helps entrepreneurially minded faculty, staff, and students determine if they have viable business ideas, using the expert resources of VCs, lawyers, and other professionals.
- **The Engineering Translational Technology Center (ETTC)**, housed in the School of Engineering, is the one incubator hosted on campus. It assists university professors who want to commercialize their ideas by providing incubator space, business coaching, and help in obtaining seed financing.

[20] UC Davis Web site, QS World University Rankings.

[21] A resource not listed is Davis Roots, a nonprofit business accelerator. While not technically a university facility, it was founded by CFI's director and commonly assists the same start-ups at different points of their life cycle with the goal of retaining them in Davis.

Table 2
Economic and Fiscal Impact Analysis of Proposed Innovation Centers in Davis
UC Davis Research Specialties and Centers

Engineering	Agricultural and Environmental Sciences	Medicine and Veterinary Medicine	Interdisciplinary Centers
Biological and Agricultural Engineering	Food security	Cancer Biology	Cancer Center
Biomedical Engineering	Clean energy, air and water	Vascular Biology	Center for Mind and Brain
Chemical Engineering	Agricultural sustainability	Genetic Diseases and Functional Genomics	Genome Center
Materials Science	Food systems	Health Services	Center for Neuroscience
Civil and Environmental Engineering	Climate change	Infectious Diseases	M.I.N.D. Institute
Computer Science	Biodiversity	Neuroscience	Center for Comparative Medicine
Electrical and Computer Engineering	Disease prevention	Nutrition	Center for Tissue Regeneration and Repair
Mechanical and Aerospace Engineering		Telemedicine	Institute for Transportation Studies
		Vision Science	California Lighting Technology Center
		Biodefense	Energy Efficiency Center
		Equine Health	Energy Institute
		Wildlife Health	World Food Center
		Companion Animal Health	Seed Central
		Aquatic Health	Institute of Food and Agricultural Research
		Children's Health	

research

Source: UC Davis; EPS.

- **Sustainable AgTech Innovation Center (SATIC)** supports the commercialization of clean ag technologies by identifying and accelerating new ventures that promote sustainability in the agricultural field, supported by the UC Davis Center for Entrepreneurship and the recently-disbanded Sacramento Regional Technology Alliance (SARTA).

- **Translating Engineering Advances to Medicine (TEAM).** Design, Prototyping, and Fabrication Facilities were created under the Biomedical Engineering Department to speed up the adoption and commercialization of freshly developed technologies through design aid and inexpensive rapid prototyping techniques.

- **The HM.CLAUSE Life Science Innovation Center**, managed by Venture Catalyst, provides UC Davis start-ups with shared access to 3,100 square feet of office and lab space for biochemistry, molecular biology, and chemistry, as well as 1,800 square feet of greenhouse facilities.

- **The Distributed Research, Incubation, and Venture Engine (DRIVE)** is a project overseen by the Associate Vice Chancellor for Technology Management and Corporate Relations. It aims to take the ETTC and Life Science Innovation Center concepts and apply them campus-wide across all academic departments. DRIVE will provide UC Davis start-ups access to affordable, mixed office/lab business incubation spaces in Davis and Sacramento, as well as funnel start-ups to resources provided by other incubators.

- **The Office of Corporate Relations** helps companies engage with campus research activity.

- **Seed Central** is a joint initiative of UC Davis's Seed Biotechnology Center and SeedQuest that hosts networking and educational meetings for the seed industry. According to HM.CLAUSE, Seed Central is helping to attract new firms to the area and build increased visibility for the economy within the seed industry.

- **The World Food Center**, just recently announced, will create a large campus to address the agricultural, technological, and political aspects of feeding the world's growing population. The Center will house the Innovation Institute for Food and Health, which will help create start-ups and research. The exact location of the Center has not been determined, though the other related programs are generally in or very near Davis.

Innovation Center Industry Clusters and Company Types in Davis

Significant overlap exists between the innovative growth areas in UC Davis and the larger region, which is understandable given the role that UC Davis plays in shaping the regional innovation economy. While UC Davis has certain strengths relative to the larger region and vice versa, the areas of overlap indicate the clusters and related types of industries and companies that are potential candidates for space in the proposed Innovation Centers. These are the clusters that not only have gained traction in the regional economy, but also receive support from the university through strong research programs that bring industry activity forward, as well as resources to commercialize that research. Several prominent companies representing most of these clusters already have a presence in Davis.

A subset of five clusters that are targets for regional investment in the Next Economy and MSF economic development initiatives exemplify the overlap of innovative growth areas. All display a set of common attributes and represent a mix of manufacturing elements and supporting activities. In addition, two of these clusters were identified in the BAE report as possible areas of emphasis for the Innovation Centers. These are the five clusters:

- Clean Energy Technology
- Agriculture & Food Production
- Life Sciences & Health Services
- Information & Communications Technology
- Advanced Manufacturing & Materials

The Next Economy initiative also emphasized that a set of knowledge-intensive technical services cuts across all identified clusters and represents another area of focus for regional economic development. Growth across these types of services is necessary to enhance performance in each of the clusters. Companies providing these types of services in and across the five clusters also represent strong candidates for space in the Innovation Centers, particularly in the following areas (many of which were highlighted in the Business Park Land Strategy):

- Scientific R&D Services
- Management, Scientific, and Technical Consulting Services
- Architectural, Engineering, and Related Services
- Specialized Design Services

It is important to note that the clusters and related knowledge-intensive services represent opportunities for the entire region. Each local area presents different conditions that can support a specific subset of the numerous types of economic activities included as part of the clusters. Evidence from existing development in Davis and the characteristics of the local workforce signal the general types of activities in the clusters that might display a stronger fit for the community and the Innovation Center space.

The local labor force is highly concentrated (more than two times the statewide average) in three occupational categories: Computer, Engineering, & Science; Educational, Legal, Community Service, Arts, & Media; and Healthcare Practitioners & Technical Support. Local labor force concentration in nearly every other occupational category is well below the statewide average, including Production, Transportation, & Material Moving, which is important for manufacturing-based activities. This demonstrates that the labor force strengths align most closely with the knowledge-intensive services, as well as the administrative functions and design and prototyping components of the clusters.

Possible Concentration of Economic Activities:

- Knowledge-Intensive Services
- Administrative Functions
- Design and Prototyping
- Technical-Based Manufacturing

Establishment-based data for the 2nd Street and Interland URP areas in Davis reveal that about one-third of the nonretail or local service employment falls in the Professional, Scientific, & Technical Services industry. This provides further evidence that the knowledge-intensive services could represent a notable share of the opportunities for the Innovation Centers. Another one-third of the nonretail or local service employment in the 2nd Street and Interland URP areas is captured in the Manufacturing

industry. These types of activities could be supported by the Innovation Centers with a continued draw from the regional production labor force and an orientation toward more technical-based manufacturing that is reinforced by the local labor force strengths.

Cluster-Related Development Prototypes

The industry clusters applicable for Davis described above require a comparable mix of industrial, office, and retail space; life science and agricultural biotech firms often have very specialized buildings.

In looking at development prototypes in Davis, there are four primary building types that show up in the City's existing tech clusters located on the 2nd Street Corridor and at Interland URP. These are the four broad classes:

- **Office.** This use has the highest employment density, typically ranging from 175 to 350 square feet per employee. It can be configured as multistory or single-story space.

- **Flex—R&D / Office.** Schilling Robotics' main facility and the DMG Mori Digital Technology Lab, both in the 2nd Street Corridor, as well as the Marrone facility in Interland URP are classic examples, showing some similarities to office but having larger workstations, more internal equipment, and often roll-up doors to facilitate equipment and materials delivery. Because of the nature of activity involving larger work stations and laboratory facilities, employment density usually is lower than office uses. In many cases, these operations generate substantial B2B transactions resulting in sales and use tax receipts for their host jurisdictions. This is a key prototype for Davis featuring the following specialized needs:

  — **Wet laboratories** are ventilated spaces designed for the handling of chemicals and biological materials. They are a necessity for Life Sciences & Health Services and Agriculture & Food Production, even though this type of space is in very short supply in Davis and the region.

  — **High-load capacity** is a concern for many innovative companies that need to power equipment for advanced manufacturing.

  — **High-speed broadband** is a necessity for Information & Communications Technology companies and many other technology-related companies.

Built Space Square Footage in Davis Innovation Ecosystem:

2nd Street Corridor

- Industrial = 23.9%
- Flex/Office R&D = 37.6%
- Office = 30.9%
- General Commercial = 7.1%
- Educational = 0.5%

Interland URP

- Flex/Office R&D = 36.3%
- Office = 63.7%

- **Industrial Commercial.** Similar in appearance to low-density versions of the above two prototypes, this usually is configured as a basic single-story shell without HVAC and other high performance core building infrastructure needed to accommodate specialized operations. These facilities may be used for a very broad array of tenants, ranging from office to sales-service.

- **Manufacturing.** As discussed in the preceding discussion, advanced manufacturing is a strong candidate for future development. These are specialized facilities for specific tenants

(including DMG Mori) and, while the overall "shell" may be a very basic tilt-up, the foundations, power, specialized HVAC, and specialized manufacturing equipment can lead to high assessed values. These facilities, it should be noted, do require larger sites than demanded by the other prototypes mentioned above.

- **Campus Uses.** In addition to the above referenced individual prototypes, there is a substantial possibility that one or more campus users will seek to develop multi-function facilities combining two or more of these prototypes.

6. OUTLOOK FOR DAVIS INNOVATION CENTERS

Feasibility Outlook

The biggest challenge to developing Innovation Centers is financing, primarily in finding capital for park development and renovations. Based on a survey conducted among university research park developers and operators,[22] key challenges are expressed in order of importance below:

- Capital for park development and renovations.
- Identifying, growing, and supporting a sufficient tenant base.
- Equity capital for tenants.
- Financing for wet-lab space.
- Financing for multi-tenant space.
- Competition from other sources.
- Decreasing demand for office space as companies move to operate virtually.
- Insufficient customer use to expand retail/commercial components of the park.
- Gaining developer interest in partnering with public or non-profit entities in expanding or diversifying research parks.

Local Market Trends

Overall, according to DTZ, Davis is on the cusp of fundamental market improvements. For example, rents are expected to increase between 3 and 4 percent in the coming year for commercial space in Davis. Openings caused by relocations have been backfilled quickly in the life sciences and agricultural biotechnology sectors. Indicators point to possible speculative development in the future, beyond that planned to come on-line at the Cannery.

Nevertheless, Davis has struggled to demonstrate consistent demand. According to local commercial brokers, this is a direct result of a lack of available product, especially among larger floor plate properties.

Capital and Fiscal Mitigation Measures

While universities provide many tangible benefits to the communities in which they locate, they often have negative fiscal impacts, due to their tax-exempt status, intense need for services, and low-earning student population.

Recognition of these impacts can lead to concessions by the university. For example, as part of the process of its Long Range Development Plan, UC Berkeley agreed in 2005 to pay the City of Berkeley $1.2 million per year to mitigate impacts related to sewer infrastructure, fire services, neighborhood improvements, and joint transportation efforts.

[22] "Driving Regional Innovation and Growth." Battelle Technology Partnership Practice, August 2013.

Nationally, there are a small number of major corporate relocations or expansions that occur annually with a large number of communities competing for the opportunities. Recent research indicates there is a downward pattern in the number of planned expansions or new facilities as companies are integrating efficiencies in existing facilities rather than realizing the large capital outlay required for a relocation project.[23] Groups like the California Manufacturers and Technology Association suggest that California receives less than its fair share of these expansions and new facilities.[24] Even so, the Greater Sacramento Area Economic Council (formerly the Sacramento Area Commerce & Trade Organization) maintains an active prospect roster of hundreds of companies exploring the Sacramento Region for new or expanded sites.

Data indicate that over the past decade, on average, there has been one deal per year that directly expressed interest in a Davis location, but in most cases was not able to find suitable available space. Each of these deals required between 100,000 and 150,000 square feet of space.[25] In many instances, these deals had some unique tie to UC Davis either through research or alumni relationships.

While this prospective activity demonstrates steady interest in Davis, the history of large completed projects in the community and general corporate site location trends suggest that additional economic development attention on established small and medium enterprises will be necessary to generate a notable uptick in the demand for space. In addition to the initial location—which could range from 10,000 to 40,000 square feet—the growth trajectory of many successful small and medium enterprises could lead to consistent incremental demand for space as they expand.[26]

UC Davis is on a growth trajectory with the projected addition of 5,000 undergraduates and related staff/faculty, as well as the planned World Food Center. UC Davis historically has used off-site lands as part of its facilities-development approach, with facility capital funding potentially oriented to $1.3 billion worth of on-campus deferred maintenance needs. However, this trend cannot be ensured in the future because there is a very real possibility UC Davis may elect to refocus future expansion activities on its own land. If there is a strong policy established in this regard, it does not necessarily preclude UC Davis from being a part of the future use mix among the proposed Innovation Centers, but its presence could be less than current trends would otherwise indicate, resulting in slower overall absorption.

---

[23] Area Development Magazine, *Annual Consultant Survey* and *Annual Survey of Corporate Executives*.

[24] California Manufacturers and Technology Association, *California Manufacturing Economy Watch*.

[25] Interview with Bob Burris from the Greater Sacramento Area Economic Council, March 27, 2015.

[26] Interviews with Bob Burris from the Greater Sacramento Area Economic Council, March 27, 2015, Scott Ragsdale from Davis Roots, April 28, 2015, and Kirk Uhler from the Sacramento Regional Area Technology Alliance, April 8, 2015.

Implications of Market Trends

- Lease rates may be too low to capitalize multi-tenant speculative construction of higher end flex office/R&D space and too high for many start-ups to afford.
- Improvement of lease rates is expected to continue. The question is whether lease escalations effectively can outpace cost inflation, such that net value accrues to the land and encourages speculative development.
- If conditions do not continue to improve as described above, development in Davis will be more likely to consist of build-to-suit activity, where owner-users commission purpose-built facilities predicated on a need to be in Davis for strategic business reasons. This possibility would suggest continued uneven levels of annual absorption, and possibly less absorption overall over the next 20 years.
- Competitive cities in the region can offer built space below replacement cost, offering state-of-the-art structures for less than they could be built. In addition, competitive cities (e.g., Vacaville, Roseville, Folsom) have lower combined impact fee and Community Facility District (CFD) burdens. These will continue to be factors limiting absorption in Davis among certain users inclined to consider regional location options for whom university proximity is not paramount and are willing to trade off location for cost.
- As continued market recovery draws down the surplus of vacant buildings in the Sacramento region, lease rates will climb and the differential between Davis and its regional competitors will diminish, improving absorption over time. Continuing lease rate and land price escalation in the Bay Area will support continued eastward migration of firms where strategic opportunities exist.
- Overall absorption in Davis, provided quality land is made available, may be modest at first and improve over time because of above-referenced dynamics. Annual absorption will be higher if one or more new speculative multi-tenant projects come on line in the short term and succeed, demonstrating that risk is manageable and market fundamentals are in place.
- It will be important to carefully weigh the costs and benefits of any project requirements such as mitigation measures to facilitate project feasibility. Similarly, it will be important to ensure that project entitlement processes are clear and straight forward, reducing time to market to the extent possible to create "shovel ready" development opportunities.
- The ability to implement economic development programs that improve prospects for start-ups and other early-stage companies will strengthen demand and absorption for the planned Innovation Centers.

Summary of Key Factors and Effects on the Innovation Centers

Chief success factors were identified through analysis of key concepts and trends of innovation districts, as well as stakeholder interviews. Descriptions of the success factors are provided below. These factors are used as a basis for a qualitative evaluation of DEIR alternatives at the end of the chapter.

University-Related Factors

***University Proximity*:** In addition to a university's presence as an anchor tenant in the center, close access to the larger university campus is important to facilitate collaborations and resource sharing. It is a leading academic partner for innovative research in agriculture, biotechnology, clean energy, medicine, information technology, and engineering. While any site within Davis is within a few miles of UC Davis, there is no substitute for immediate proximity. The potential connection to the university, including the promise of meaningful, ongoing collaborations with UC Davis institutions, is weaker for the more distant sites under consideration.

***University-Tenant Match*:** The research strengths of the university should align with the types of businesses the center targets, in terms of the space and resources provided, as well as the outreach campaigns devised. The cross section of industries prevalent in existing Davis tech concentrations are indicative of those having close relations with the university and/or other attributes of Davis (e.g., labor force, buyer/supplier relationships with tech forms, etc.).

***University Investment/Commitment*:** Universities can serve as important catalysts of research centers that provide direction and leadership, as well as on-site services (incubators, accelerators) that otherwise would not be provided by the private market. The investment and commitment that universities demonstrate in the planning stages of a research park help determine the future role and presence they will have.

University influence and leadership in regards to basic research and downstream commercial applications is a top factor influencing the prognosis for a given Innovation Center. According to a survey of University Research Parks, the highest rated attribute for success is commitment of university leadership, and another very important success criterion was a good match between the core competency of the university and research park tenants.[27] While UC Davis has not formally committed to having a tangible presence in the proposed Innovation Centers, the influence of UC Davis in key technology sectors has positively influenced the development of existing tech concentrations in Davis.

Regional Economy Factors

Regional Economic Health: Key regional dynamics include continued rent growth, draw down of surplus real estate in adjacent markets, and steady recovery from the recent recession.

***Regional Clusters-Innovation Match*:** The Innovation Centers should provide space and resources for, as well as market to, businesses in innovative clusters that are strong points for the regional economy, as there is substantial cross-over between regional and UC Davis strengths. Growth prospects will likely be a blend of companies focused on Davis with ties to the university or other tenants, as well as regional companies attracted by the perceived and real upside of being located in Davis because of the university presence and other positive attributes. Therefore demand likely is to stem from a subset of six regional clusters:

- Clean Energy Technology
- Agriculture & Food Production
- Life Sciences & Health Services

---

[27] "Driving Regional Innovation and Growth." Battelle Technology Partnership Practice, August 2013.

- Information & Communications Technology
- Advanced Manufacturing & Materials
- Knowledge-Intensive Services

***Regional Entrepreneurial Support / Tech Transfer*:** While certain start-up supports should be offered within center boundaries, the availability of area resources that foster collaboration and assist in the commercialization of research will be attractive to many prospective tenants.

***Regional Access to Capital*:** The growth of many innovative companies in their early stages depends on their ability to obtain sources of capital. Venture capital firms often are very reticent to fund companies outside their immediate vicinity, and consequently innovative firms move to areas where capital concentrates. Leading prospects for local venture capital funding may be strongest for Biotechnology and Clean Tech, which rank third and fourth in terms of regional investment over time, with Davis accounting for 82 percent and 100 percent of that investment, respectively. Davis also accounts for 24 percent of the regional investment in Software, another branch of Information Technology, as well as all of the regional investment in Agriculture and Medical Devices & Instruments. The scale of venture capital investment is dwarfed, however, by San Francisco and Silicon Valley, which will continue to pull innovative companies in need of funding to move through the product life cycle away from the Davis region despite real estate cost differentials.

Local Market Factors

University as a Tenant (anchor or otherwise): UC Davis is a strong historic source of real estate demand in the City. A change in policy reducing this support could be a factor limiting the amount of absorption. Overall, the relatively high assessed values associated with innovative companies and research activities in Innovation Centers partly are based on university proximity and interactions that are absent in more generic settings.

Ability to Accommodate Tech Companies and Gazelles: These fast-growing and innovative companies are a key focus area in terms of tracking near-term demand for buildings and land. Davis houses innovative companies such as Novozymes, Marrone Bio Innovations, and other firms which will demand more space if they continue their pace of rapid growth.

Ability to Accommodate Start-ups: The composition of start-ups favors medical technology, agricultural technology, clean tech, and software applications. Space needs for these companies include both flex/lab and basic multi-tenant office built on spec. Both are tenuous propositions in today's market, as discussed below.

Real Estate Feasibility: A mix of small and large firms is an important driver of innovation.

- **Office uses are likely to achieve feasibility given ongoing market improvements.** Successful office prototypes are likely at both the high and low ends of development (e.g., density, office building class).

- **Flex space oriented to technology users is likely to emerge but may face short-term challenges** because of user cost sensitivity. Market conditions may support speculative projects oriented towards established companies in the next 2 years. However, fledgling start-up firms may need assistance through specific economic development actions and policies to realize the development of flex work spaces, labs, or other space oriented toward

these new firms. Without such support, near-term absorption in this category may be more prominent among established owner-users.

- **Housing could be an effective mechanism for improving returns, as well as creating a basis for funding infrastructure.** Housing is increasingly viewed as a necessary amenity for Innovation Centers, reflected in recent plans for centers across the country, such as the 2012 Master Plan for Research Triangle Park, that include housing in order to create the kind of mixed-use environments that are attractive to younger knowledge workers.[28]

- **A competitive environment is healthy.** In addition to offsetting occupancy costs through direct intervention, it is helpful to encourage the development of multiple parks to foster competition and provide choices to prospective tenants and owner-users.

- **Nascent firms in need of incubation and acceleration may be more natural candidates for the Nishi site.** Nishi will be an early bellwether for interest among industries seeking expanded access and affiliation with UC Davis researchers.

- **Space for large and specialized users** will be necessary to attract larger firms, including manufacturers like DMG Mori and FMC Schilling Robotics. Land needs to be available in the form of shovel-ready pads with appropriate entitlements in place. A rapid response to these market opportunities is critical.

- **Quality-of-life** factors can play an important role in company site location decisions. Business executives might consider the value of living and doing business in high quality-of-life communities, which can balance out competitive cost differentials seen in markets like Davis.

- **Overall absorption in Davis, provided quality land is made available, will begin modestly and see irregular improvements over time.** Realization of one or more successful new speculative multi-tenant projects can demonstrate that risk is manageable and that market fundamentals are in place.

- **Competitive position relative to the region and the Bay Area may improve with the availability of viable supply in Davis.** Davis currently competes with communities throughout Northern California for business location and expansion projects. Depending on the industry, users interested in sites in the immediate region have several competitive options along the I-80, I-5, and U.S. Highway 50 corridors. For this reason, a major anchor located in a highly visible location near I-80 in Davis would be extremely valuable as a catalyst. The greater Bay Area attracts users in the innovation economy as a result of strong cluster agglomeration, a fully developed innovation support ecosystem, and a technical workforce.

  By substantially improving strategically located land supply, the proposed Innovation Centers offer Davis the opportunity to improve its competitive position as a leader in the innovation economy in the region, potentially mitigate some of the pull of the Bay Area, and enhance

[28] Ibid.

the region's standing in Northern California. Davis has several quality-of-life attributes (e.g., internal and external connections, exemplary schools, walkable downtown, recreation/civic/cultural assets) that are very attractive to the industries discussed in this report, providing a strong foundation for the innovation ecosystem concept in Davis.

Public-Private Approach to Improving Feasibility: The proposed Innovation Centers will require a patient approach. The development community has carefully thought through phasing of the proposed projects and is presently evaluating the extent and types and costs of infrastructure improvements. The ability to match individual phases of development to market opportunities will be important in terms of avoiding extraordinary up-front costs and keeping lease rates at competitive levels. On the public side, it will be important to maintain a competitive stance with other communities in terms of overall cost burdens.

Project Implementation Factors

***Diversity of Space/Tenants*:** Innovation Centers should have spaces that support a mix of large and small companies with both ownership and leasing opportunities, as well as a mix of industries. Every effort should be made to ensure that start-ups have options in Davis, either through new development or adaptive reuse of buildings vacated over time. To maximize the economic output over the long run, each Innovation Center should have a balance in this regard.

***Neighborhood Amenities*:** Successful innovation centers need a mix of services that activate public areas, encourage social interaction, and attract the knowledge professionals that work in cutting-edge industries. It is important to make the value proposition as powerful as possible through the provision of meaningful amenities and high-quality public spaces.

***Connectivity*:** Innovation Centers must be designed to link institutions and people together both within park boundaries and to the rest of the metropolitan area. A broadening group of companies and firms are valuing collaborative environments, including such science- and technology-heavy fields as chemicals, biotechnology, telecommunications, and semiconductors. In addition to these important internal connections between and among tenants, successful Innovation Centers must also draw physical connections to key community assets through infrastructure investments such as transit, bike and pedestrian paths, and broadband infrastructure.

The following connection types are critical in Davis:

- **Vehicular connections.** The Innovation Centers enjoy excellent proximity to regional freeways. It will be important to ensure goods movement and commute routes are not in conflict. To the extent that major capacity improvements are sought, a multi-faceted funding strategy will likely be needed to the extent the improvements have regional benefit.

- **Bike/pedestrian/transit connections.** The Innovation Centers can access a network of existing facilities for bicycles, pedestrians, and transit to connect to other areas. The connections to these networks deserve careful attention.

- **Broadband/data and other utilities.** It is critical that all Innovation Centers have state-of-the-art high bandwidth connections, including to key UC Davis collaborators. Electricity can be a major component of the cost of doing business for many of the types of large users that are envisioned as possible tenants for space in the proposed Innovation Centers. Pacific

Gas & Electric Company (PG&E) provides electricity for residential and nonresidential properties in the City, and PG&E's average retail electricity price is higher across all categories compared to the prices of other providers in the region: Sacramento Municipal Utility District (SMUD) and Roseville Electric.

- **Labor force and housing.** Employees of the new Innovations Centers will need access to appropriate housing options, both locally and regionally. Analysis provided by BAE indicates that about 4,800 units can be expected to be demanded in Davis as a direct outcome of the proposed projects.[29] Nishi's owner-occupied housing will be able to attract employees of the project, even if the renter-occupied housing is expected to be student-oriented. All of the housing under consideration for the MRIC Mixed Use alternative is designed in line with the needs of Innovation Center employees.

- **Collaborative Spaces.** Environments that encourage collaboration can take many forms, such as "hackable buildings" with open floor plans that can be reconfigured.

- **Programming for Innovation.** Scheduled and regular networking opportunities such as breakfasts and workshops can bring innovative people together, though their presence within the Innovation Centers will depend on strong, engaged leadership.

On-Site Start-up Support Infrastructure: While substantial technology transfer and entrepreneurial resources may be available in the City, the availability of an incubator and other support resources for start-ups within center boundaries serves as a key differentiator between a typical research park and an innovation center.

***Supportive Policy Environment—Entitlement and Public Finance*:** The combination of market forces, impact fees, and local regulations, both center-specific and areawide, will determine how the business community will interpret the opportunities presented by the Innovation Centers. Because elements of the user base can be cost sensitive, it is important to ensure the City maintains a comparable cost structure relative to regional competition. In this regard, any design requirements or restrictions of uses, including sustainability requirements, should be carefully vetted with the development community to ensure no unintended consequences (i.e., reduced revenue to the public and private sectors) arise out of these policies.[30]

Project Development and Management Expertise: Both Nishi and MRIC are represented by experienced property developers and managers and are highly motivated to accommodate the broadest swath of users feasible. The applicants are well versed in the design of flexible buildings and efficient use of land, but will likely benefit from additional collaboration with one or more existing or new entities to provide overall Innovation Center management services,

---

[29] Estimated employee housing demand at buildout based on a cumulative scenario that removes Davis IC, presented by BAE at a meeting of the Davis Finance and Budget Commission on July 13, 2015. The housing demand estimate assumes a total employment increase of 7,500 jobs at buildout.

[30] A comparison of the 2nd Street Corridor of Davis to key areas of regional competition indicates that combined impact fees, special taxes, and assessments are very comparable to the City of West Sacramento, but 35 percent to 100 percent higher than key areas in the cities of Folsom, Roseville, and Vacaville.

including: onsite amenities attractive to innovation-sector workers; startup and other business support services, such as access to state and other public programs, links to sources of capital, and business planning; and, potentially, access to subsidized space.[31] Further, the ability to attract desirable tenants will rely on the integration of effective innovation-focused economic development programming including the development of a branding strategy that draws from the Innovation Center concept, conveying a cutting-edge environment unlike any currently available in Davis and the surrounding region.[32] Finally, it will be important to ensure, either through strategic partnerships, specialized management, or other arrangements, that the Innovation Centers continue to adhere to the City's Guiding Principles over the planning, development, and operations phases.

Expansion of Private Development Opportunities: Davis should consider creating an economic development entity charged with attracting, retaining, and growing a network of tech industries. This type of entity could improve overall absorption rates over time through implementation of an active system of economic development featuring incubation, acceleration, and ultimately placement of industry in long-term space in Davis.

Local Leadership: Strong leadership is necessary, preferably from a variety of vital, local institutions, to provide direction and help position the projects to align with the goals outlined for the project. The Innovation Centers will benefit from the continued involvement of the City, the Davis Chamber of Commerce, and UC Davis throughout the planning and development process.

Potential Effects of EIR Alternatives

The following section provides a qualitative assessment of the proposed DEIR alternatives,[33] [34] based on the above-referenced success factors. A success factor breakdown of each alternative is presented in **Tables 3** and **4**, which show that all alternatives, with the exception of the MRIC Mixed Use Alternative, demonstrate a reduced alignment with the success factors.

DEIR alternatives (and related quantitative economic and fiscal impact analyses) evaluate the provision of housing in MRIC, as well as the possibility of including or excluding hotel uses. As a general rule, where feasible, the inclusion of both housing and hotel uses is an important

---

[31] "Driving Regional Innovation and Growth." Battelle Technology Partnership Practice, August 2013.

[32] Economic development programming can take the form of business accelerators (e.g., Davis Roots, SATIC), incubators (e.g., ETTC, H.M.CLAUSE Life Science Innovation Center), and entrepreneurship academies (e.g., CFI), as well as other initiatives discussed in Chapter 5. These programs can be provided through partnering with the City, UC Davis, or other economic development entities.

[33] The August 2015 DEIRs are available on the following Web site: http://cityofdavis.org/city-hall/community-development-and-sustainability/development-projects.

[34] Excluded from this discussion is Nishi Access Scenario 2, defined in the DEIR's analysis of the circulation network, in which Nishi is provided only a single point of access from Olive Drive. The time and complexity involved in accessing the campus without the train undercrossing likely constitutes a fatal flaw, as the project would be far less compelling as an Innovation Center without the close connectivity to the university. The physical isolation inherent in this alternative would lead it to fare poorly compared to the formal alternatives addressed in this section.

Table 3
Economic and Fiscal Impact Analysis of Proposed Innovation Centers in Davis
Success Factor Matrix of DEIR Alternatives - MRIC

Success Factor	No Project	Reduced Site Size	Reduced Project	Off-Site Alternative A	Off-Site Alternative B	Mixed Use
Description	Project is not built	Same square footage over a smaller footprint, increasing project density	Less development at a lower density; no hotel	Relocation to original Davis IC site	Relocation to intersection of Covell Blvd and Pole Line Rd	Base program mix of uses plus up to 850 housing units
University-Related	No Innovation Center concept to encourage UC investment and attract UC-related firms		Omission of hotel and conferencing space means less space for UC-related visitors and activities	Less connection to UC-related users in 2nd Street corridor	Less connection to UC-related users in 2nd Street corridor	
Regional Economy	Reduced agglomeration benefits of targeted cluster development		May not be concentrated enough to attract high value users; does less to fix lack of land supply	Would not allow for synergies with 2nd Street corridor	Good land asset for future tech-development, though would not allow for synergies with 2nd Street corridor	Housing units balance demand generated by new employees
Market	Lower amount and value of tech-driven development; hard to finance tech infrastructure; capture of economic activity eslewhere	Multi-story R&D harder to lease; less acreage may preclude campus development	Less need for offsite facilities may reduce costs; smaller project may preclude campus development	Site acquisition costs could be higher; lack of I-80 frontage reduces appeal to users	Site acquisition costs could be higher; lack of any regional exposure would result in lower absorption	Housing increases returns; multi-story R&D harder to lease
Project Implementation	Little connectivity among users	Inability to provide spaces for large tenants reduces project diversity; lacks central open space amenity for connectivity	Less space for neighborhood amenities to create a dynamic environment that can attract young professionals	Lack of I-80 frontage reduces vehicular connectivity; lacks access to high bandwith fiber optics infrastructure	Near commercial districts, recreational space, and transit; less auto connectivity and fiber optics access	Housing makes for a dynamic, live-work environment
Overall Effect	REDUCED	REDUCED	REDUCED	REDUCED	REDUCED	INCREASED

success_MRIC

Table 4
Economic and Fiscal Impact Analysis of Proposed Innovation Centers in Davis
Success Factor Matrix of DEIR Alternatives - Nishi

Success Factor	No Project	R&D Only	Alternative Land Use Mix	Off-Site Alternative
Description	Project is not built	Developed with only R&D uses, no hotel or housing	Replaces a portion of R&D uses with a hotel	Relocation to 5th Street between Pole Line Road and L Street
University-Related	Loss of direct UC-industry interaction possible due to Nishi's close proximity to UC Davis		Hotel provides space for UC-related visitors, but fewer opportunities for UC tech transfer with less R&D space	Loses close proximity to UC Davis, which is Nishi's biggest advantage
Regional Economy	Reduced agglomeration benefits of targeted cluster development	More jobs created, though reduction in supporting uses will make project less competitive	Does less to fix lack of land supply, no critical mass of tech-driven development to create agglomeration benefits	Good land asset to further tech-driven development in the future, though not as well poised as Nishi
Market	Lower amount and value of tech-driven development; hard to finance tech infrastructure; capture of economic activity eslewhere	Land values will be less, absorption period longer; hard to finance needed infrastructure improvements	Limited tech-driven development undermines Innovation Park concept, hurts marketing of project	Will be harder to gain momentum in early stages than site closer to UC Davis; displaces existing uses
Project Implementation	Little connectivity among users	Lack of mixed-use character makes environment less dynamic	Less R&D space hurts project diversity	Loses connectivity to UC Davis; reduced infrastructure challenges
Overall Effect	REDUCED	REDUCED	REDUCED	REDUCED

success_nishi

component of the Innovation Center concept in terms of providing a more economically diverse project as well as (in the case of housing) improved ability to fund infrastructure capital. Just as important, mixed-use components such as these closely align with the identified success factors in terms of activating and adding vitality to these commercial districts. Specifically, hotel/conference uses provide important meeting places available for industry events. The addition of housing helps amenitize the projects and address housing needs of the new jobs created in the community.

MRIC

No Project

Without formal Innovation Center concepts moving forward, the city would not realize the benefits of an agglomeration of development with sufficient critical mass, instead having a random patchwork of development spread out in various sites. Potential disadvantages of this model include difficulty finding a consistent way to finance infrastructure geared to tech users. Moreover, there would be fewer interactions between and among various users that would otherwise occur in the Innovation Centers. Overall tech-driven development would continue as it is presently, with modest projects developed within the City's dwindling supply of land and in underutilized infill areas (likely requiring substantial public policy and financial involvement). The overall amount and value of tech-driven development would be constrained and likely be much lower than with actively developing Innovation Centers.

Reduced Site Size

As expressed, this alternative envisions the same amount of development as currently proposed for MRIC, only with a substantially reduced development footprint. This approach toward increasing density from an FAR of .50 to nearly .80 will increase structural costs of commercial buildings and necessitate the use of structured parking. Both of these effects provide cause for concern. Once the projects are up and running, and the market continues to evolve and mature, this intensification may in fact be feasible. However, at this early stage, initial phases may need to adhere to densities similar to those found in existing Davis concentrations based on prevailing lease rates and facility costs.

Moreover, broker interviews have revealed that Project proponents may not want to build large amounts of multi-story R&D space in the short term, as the space tends to be more expensive and can offer complexities related to receiving materials, maintenance of complex plumbing systems, and other challenges not faced in less expensive low-rise R&D space.

This alternative also removes a considerable amount of open space, including a central 5-acre "Oval," as well as greenways that serve as connecting features of the project. Open spaces such as these are often valuable amenities contributing to Innovation Center vitality.

In addition, reduction of acreage can preclude the potential for campus development. To the extent that having some surplus "shovel ready" land positions Davis to receive one or more large users and/or multi-function campuses, this alternative would reduce prospective absorption rates.

Reduced Project

This alternative permits a lower amount of development at a lower average density, without inclusion of the hotel.

While the resulting FAR of 0.38 is consistent with existing development patterns in Davis, it may not provide the end-state concentration of uses contributing to a dynamic environment. The result is effectively a straight continuation of 2nd Street development patterns. While current and future users could likely work within these parameters, the projects may lack compelling visual appeal and integration of uses facilitating increased UC Davis-related high value users and development.

The omission of hotel and related conferencing uses also undermines the overall Innovation Center concept. Finally, as discussed above, a smaller project may preclude the benefits of possible large user and/or campus development.

To the extent that a smaller project may not "trigger" certain offsite facilities (e.g., sewer treatment), costs could be proportionately reduced, possibly enhancing feasibility through lower costs and resulting lower lease requirements.

Overall, any alternative that reduces the amount of commercial square footage and related job counts undermines the ability of the Innovation Centers to solve the lack of land supply in Davis. In addition, the reduction of the future size of the City's employment base potentially undermines a substantial qualitative benefit of the projects, which is the ability to retain and attract young professionals having the ability to inject spending, as well as cultural and civic support, into the City.

Off-Site Alternative A (Davis IC Location)

This alternative would maintain the features of the MRIC project, as proposed, but relocate it to the site of the Davis IC project which was recently placed on hold.

Although not typically a concern of environmental impact analysis, any realistic evaluation of a change in project location should consider economic viability. The proponents of MRIC have controlled the proposed site for an extended period of time. While details are not known, it is possible that site acquisition costs associated with alternative locations would be higher than MRIC's inherent land basis. Like other actions that may increase development costs and therefore required lease rates, a contemplated relocation to the Davis IC site could affect the feasibility outlook.

This alternative would preclude the realization of an Innovation Center with I-80 frontage in Davis. This would undermine the vehicular connectivity success factor discussed in the preceding section, as it is very likely that a certain percentage of prospective users would prefer the access and visibility to I-80 over other options.

In addition, discussions with the MRIC applicant also indicate the great potential advantage of linking into an important high bandwidth fiber optics infrastructure running along the UP right-of-way parallel to I-80. To the extent this fiber network provides advantages to users and is less expensive to access from the proposed MRIC location, relocation to the Davis IC could undermine the cost-effective delivery of critical data infrastructure.

Finally, relocation to the Davis IC site would constitute a failure to effectively extend the burgeoning 2nd Street tech district, which would otherwise enjoy excellent synergy with the newly developing MRIC site.

Off-Site Alternative B (Covell Location)

The effects discussed above would also apply in the case of a relocation of the MRIC site to the parcel located on the northwest corner of the Pole Line Road and Covell Boulevard intersection.

Unlike the above-referenced case of the Davis IC site, the Covell site lacks regional exposure, and would be highly likely to experience slower absorption and lower overall value as a result.

There would also be a reduced need for ancillary retail and amenities due to the proximity of established and developing commercial districts (Nugget-anchored Oak Tree Plaza and The Cannery, respectively). In addition, the Covell site is proximate to two older professional office space projects that could benefit from proximity to tech firms and potentially offer start-up space to cost sensitive users. Finally, adjacency to Nugget Fields may provide compelling recreational and open space to the project, and existing transit connections are strong.

This site would be unlikely to meet project objectives at this time due to its poor location relative to major regional transportation corridors. At some point in the future, if and when the proposed Innovation Centers are moving forward at their proposed locations, the Covell site might be a valuable future source of land supply once Davis has established a critical mass of tech sector development at the proposed Innovation Center locations.

Mixed-Use Alternative

This alternative would maintain the features of the MRIC project, but also include up to 850 residential units.

As discussed earlier, the Base Development Program satisfies the City's Guiding Principles for the development of Innovation Centers without the inclusion of housing, though housing does provide several key benefits within the context of Innovation Centers. Housing, in addition to opening up multiple market segments, functions as an amenity in itself, augmenting a project's sense of place by creating the kind of mixed-use character that knowledge workers and others appreciate, potentially resulting in increased lease rates and land value. The improved economics would likely allow the project to realize increased returns and/or finance needed infrastructure in MRIC.

The addition of housing within MRIC has the potential to allow the demand for housing generated by employees within the center to be met within the center itself, rather than in the surrounding region. The type of housing described in the MRIC DEIR appears to be consistent with high-quality, higher-density housing that is succeeding in attracting professionals across multiple age cohorts throughout the region. Examples of similar housing can be found in the West Sacramento Bridge District and emerging mixed use corridors in Sacramento such as R Street and Broadway. While there is a notable amount of housing in the proximate Mace Ranch area, it would not lend the intended mixed-use character to the MRIC site.

While the owner-occupied housing in Nishi may resemble the proposed MRIC housing in terms of its appeal, Nishi's renter-occupied housing, in contrast, is expected to be student-oriented, which aligns with its location near the university, carries great economic value, and will contribute vitality.

While this alternative has several housing-associated benefits which compliment non-residential land uses, it has some of the same shortcomings as the Reduced Site Size alternative, including the need for additional-story development that is more costly and may be harder to lease in the short-term, as well as decreased ability to accommodate campus development for larger users.

Nishi

No Project

The above-referenced comments for MRIC that relate to the loss of critical mass of tech uses and location choices apply here. The proposed Nishi project has the ability to market to users with strong interest in immediate university proximity. The potential for direct university/industry interaction is strongest at Nishi relative to other sites in and around Davis, and the No Project Alternative would result in a loss of opportunity for such interactions.

R&D Only

This alternative would preclude the housing and hotel uses in the Nishi site. As the Nishi site has very expensive improvements related to completing the transportation connection to campus, it is anticipated that the inclusion of housing, which is intended to be student-oriented in the Base Development Program, is an important component to creating land values that can help support extensive infrastructure improvements.

As noted above, the R&D Only Alternative would remove the mixed-use neighborhood amenities sought by the prospective user base. While the R&D component would be substantially larger with the additional jobs, the loss of housing could reduce the overall vitality of the project. This diminution in value may extend to a marginal decline in the character of ancillary retail space. For example, retail shops would potentially have shorter business hours and resulting lower sales if only supporting commercial uses during the day, in contrast to opportunities to offer a wider range of services offered over longer business hours in the base case. As a small, close-in site, the strength of the Nishi project is its ability to provide a fine-grained, mixed-use environment that is attractive to university partners. While some increase in R&D may be productive, potential reductions of supporting uses may erode its competitive stance.

Alternative Land Use Mix

In this alternative, a portion of the proposed R&D space is replaced by a 70,000-square-foot hotel. This alternative could undermine the critical mass of tech-driven development that is at the heart of the Innovation Center concept.

As discussed, hotel uses help to create a dynamic environment within the Innovation Center concept. However, the resulting reduced allocation of R&D at the Nishi location, combined with proximity to an additional hotel proposed at the entrance to Nishi on Olive Drive and the recently developed (and expanded) Hyatt Place Hotel on the UC Davis campus, may undermine the viability of this alternative.

Off-Site (5th Street)

In the Off-Site Alternative, the land use program for Nishi is left intact but relocated to 5th Street between Pole Line Road and L Street. In this case, the project would lose immediate proximity to UC Davis, undermining the most compelling aspect and essential purpose of the project, as well as losing the opportunity to spur reinvestment along West Olive Drive and the potential synergies among the Center, the downtown, and the university. Additionally, while the

development of necessary infrastructure may be less complex than at the Nishi site, there are existing users in this alternative site that would need to be displaced. The target area, similar to the Covell alternative discussed relative to MRIC, is an excellent underutilized land asset, but as discussed throughout this document, the key challenge confronting public and private decision makers in the next five years will be getting viable initial phases off the ground to demonstrate early momentum. In the longer term, it is highly recommended that sites such as 5th Street be considered as a strategic expansion to the City's innovation ecosystem land supply.

EXHIBITS:

Exhibit 1: Economic Impact Analysis

Exhibit 2: Fiscal Impact Analysis

EXHIBIT 1:

Economic Impact Analysis

EXHIBIT 1 MEMORANDUM

To: City of Davis

From: David Zehnder and Ryan Sharp

Subject: Davis Innovation Centers Economic Impact Analysis; EPS #152006

Date: September 8, 2015

This exhibit evaluates the potential one-time and ongoing economic impacts of the two active proposed Innovation Centers in Davis, Mace Ranch Innovation Center (MRIC) and Nishi Gateway Innovation District (Nishi), on a cumulative and individual basis consistent with buildout conditions. The economic impact analysis estimates the direct economic contributions of the projects, as well as the associated multiplier or "ripple" effect that could be generated through demand on suppliers of goods and services and employee spending in the economy. While the projects likely would generate regional economic impacts, the analysis focuses exclusively on the Davis and Yolo County economies.

Summary of Results

Table 1 summarizes the total estimated economic impact for the one-time and ongoing activities associated with the MRIC and Nishi projects. Results are presented for the proposed land uses in the two projects, labeled as the Base Development Program, as well as three sensitivity analyses that are intended to demonstrate the differences in economic outcomes if 850 housing units are included in the MRIC project (MRIC Housing), the 160,000-square-foot hotel component is removed from the MRIC project (No MRIC Hotel), or a 70,000-square-foot hotel is integrated into the Nishi project (Nishi Hotel). Because of differing land uses, the resulting economic impact varies under each of these scenarios.

The estimated one-time economic impact resulting from residential, nonresidential, and backbone infrastructure construction activities through buildout of the two projects equates to approximately 3,400 jobs (full- and part-time), $605 million of output (market value of goods and services), and $271 million of labor income (earnings and benefits) in the Davis economy. Expanding the analysis to the Yolo

The Economics of Land Use

Economic & Planning Systems, Inc.
2295 Gateway Oaks Drive, Suite 250
Sacramento, CA 95833-4210
916 649 8010 tel
916 649 2070 fax

Oakland
Sacramento
Denver
Los Angeles

www.epsys.com

Table 1
Davis Innovation Centers - Economic Impact
Total Economic Impact

Study Area/Measure	Base Development Program	Sensitivity Analysis		
		MRIC Housing [1]	No MRIC Hotel [2]	Nishi Hotel [3]
Davis Economy				
One-Time Activities [4]				
Employment	3,374	4,178	3,380	3,373
Output (2015$)	$605,080,147	$750,000,043	$606,111,350	$604,893,422
Labor Income (2015$)	$270,878,269	$324,819,908	$271,350,366	$270,792,785
Ongoing Activities [5]				
Employment	11,414	11,414	12,056	11,125
Output (2015$)	$2,865,781,531	$2,865,781,531	$3,042,792,854	$2,795,791,309
Labor Income (2015$)	$703,816,560	$703,816,560	$745,520,933	$685,054,049
Yolo County Economy				
One-Time Activities [4]				
Employment	5,879	7,349	5,871	5,877
Output (2015$)	$1,055,376,953	$1,317,824,388	$1,053,821,100	$1,055,054,980
Labor Income (2015$)	$462,247,906	$559,076,240	$461,551,584	$462,103,807
Ongoing Activities [5]				
Employment	12,575	12,575	13,288	12,260
Output (2015$)	$3,059,030,888	$3,059,030,888	$3,248,251,764	$2,984,665,239
Labor Income (2015$)	$765,862,948	$765,862,948	$811,324,525	$745,862,574

impact_summary

Source: IMPLAN, 2013 Data and EPS.

[1] Includes 850 housing units with no additional changes to other uses.
[2] Removes the 160,000 square foot hotel and reallocates the space among other nonresidential uses.
[3] Adds a 70,000 square foot hotel and reduces most other nonresidential uses.
[4] One-time activities include backbone infrastructure, residential, and nonresidential construction. See Table 5.
[5] Ongoing activites include household spending and establishment operations. See Table 7.

County economy increases the estimated one-time economic impact of the construction activities to roughly 5,900 jobs, $1.1 billion of output, and $462 million of labor income. These estimated economic impacts account for the direct construction activities and contribution of suppliers of goods and services, as well as the amount of construction and supplier demand the local economy can support.

Because the MRIC Housing sensitivity analysis increases the total amount of residential construction activity, while nonresidential and basic infrastructure assumptions are not changed, the greatest one-time economic impacts are generated under this scenario. The other two sensitivity analyses, No MRIC Hotel and Nishi Hotel, are fairly close to the Base Development Program because of a reallocation of land uses that support relatively similar construction activities.

The establishments operating in the nonresidential space and residents occupying the housing units in the proposed projects will generate an ongoing economic impact, which is estimated at about 11,000 jobs, $2.9 billion output, and $704 million of labor income on an annual basis in the Davis economy. In the larger Yolo County economy that is able to capture a greater amount of supplier and household spending activities, the total estimated ongoing economic impact expands to approximately 13,000 jobs, $3.1 billion of output, and $766 million of labor income. The economic impact analysis for the ongoing activities is based on buildout conditions for the two projects and includes economic activities related to establishment operations, demand on suppliers of goods and services, and household spending.

The largest estimated ongoing economic impact is generated by the No MRIC Hotel scenario because the hotel land use generally supports fewer employees and less output compared to the types of industries that could occupy the office and flex/research and development (R&D) space that are assumed to capture the reallocation of the hotel land use in the project. While the MRIC Housing sensitivity analysis supports and economic impact that is equivalent to the Base Development Program, the Nishi Hotel sensitivity analysis represents a notably lower ongoing economic impact because of the higher employment densities supported by the other nonresidential uses.

Project Framework

The economic impact analysis applies a project framework that includes a Base Development Program and three sensitivity analyses that are used to demonstrate the differences in outcomes with changes to certain key factors. **Table 2** summarizes the four elements of the project framework. The Base Development Program relies on the applicant proposals and a more detailed allocation of nonresidential space based on the 2nd Street/Interland University Research Park mix evaluated in Phase I. The three sensitivity analyses modify the Base Development Program and reflect changes associated with residential and hotel land use assumptions:

Table 2
Davis Innovation Centers - Economic Impact
Project Framework

Item	Base Development Program: 2nd Street/Interland URP Mix			Sensitivity Analysis: MRIC Housing			Sensitivity Analysis: No MRIC Hotel			Sensitivity Analysis: Nishi Hotel		
	MRIC [1]	Nishi [2]	Total	MRIC [1]	Nishi [2]	Total	MRIC [1]	Nishi [2]	Total	MRIC [1]	Nishi [2]	Total
Dwelling Units [3]												
Renter Occupied	0	440	**440**	510	440	**950**	0	440	**440**	0	440	**440**
Owner-Occupied	0	210	**210**	340	210	**550**	0	210	**210**	0	210	**210**
Total Dwelling Units	**0**	**650**	**650**	**850**	**650**	**1,500**	**0**	**650**	**650**	**0**	**650**	**650**
Nonresidential Square Feet [4]												
Office	846,468	172,387	**1,018,855**	846,468	172,387	**1,018,855**	926,468	172,387	**1,098,855**	846,468	131,781	**978,249**
Flex: R&D/Office	513,011	72,162	**585,173**	513,011	72,162	**585,173**	593,011	72,162	**665,173**	513,011	57,676	**570,687**
Manufacturing	952,169	28,221	**980,390**	952,169	28,221	**980,390**	952,169	28,221	**980,390**	952,169	28,221	**980,390**
Industrial Commercial	62,578	10,000	**72,578**	62,578	10,000	**72,578**	62,578	10,000	**72,578**	62,578	5,188	**67,766**
Ancillary Retail	62,578	37,950	**100,528**	62,578	37,950	**100,528**	62,578	37,950	**100,528**	62,578	37,950	**100,528**
Hotel	160,000	0	**160,000**	160,000	0	**160,000**	0	0	**0**	160,000	70,000	**230,000**
Public/Non-Profit	128,253	80,180	**208,433**	128,253	80,180	**208,433**	128,253	80,180	**208,433**	128,253	70,084	**198,337**
Total Square Feet	**2,725,056**	**400,900**	**3,125,956**	**2,725,056**	**400,900**	**3,125,956**	**2,725,056**	**400,900**	**3,125,956**	**2,725,056**	**400,900**	**3,125,956**
Parking Spaces [4]												
Parking Garage	0	843	**843**	0	843	**843**	0	843	**843**	0	843	**843**
Acres [5]	229	47	**276**	229	47	**276**	229	47	**276**	229	47	**276**

framework

Source: EPS.

[1] Includes Mace Triangle.
[2] Development numbers includes Nishi Gateway and West Olive Drive area. Acreage numbers only include Nishi Gateway.
[3] See Table B-1.
[4] See Table A-2.
[5] See Table A-3.

1. **MRIC Housing** includes 850 housing units with no additional changes to other uses based on increased density and a modified site design reflected in the Draft Environmental Impact Report (DEIR) Mixed-Use Alternative.

2. **No MRIC Hotel** removes the 160,000-square-foot hotel and reallocates the space equally among the Office and Flex: R&D/Office uses.

3. **Nishi Hotel** adds a 70,000-square-foot hotel and reduces most other nonresidential uses based on the DEIR Alternative Land Use Mix.

Economic Activities

Developing the two Innovation Centers through buildout will support temporary, one-time economic activities associated with on-site backbone infrastructure, nonresidential, and residential construction. The estimated construction costs over the entire period of project development are shown in **Table 3**. Total cumulative construction costs across the Base Development Program and the three sensitivity analyses range from approximately $925 million to $1.1 billion. **Appendix A** provides details on the construction cost assumptions.

The establishments and residents occupying the nonresidential and residential space developed in the two Innovation Centers will support ongoing economic activities. These ongoing activities will take two distinct forms. First, the private- and public-sector establishment operating in the Innovation Centers will support jobs to produce goods and provide services. **Table 4** shows the estimated number of jobs support by establishment operations in the Innovation Centers. Total cumulative job counts range from roughly 6,400 to 6,900 across the Base Development Program and the three sensitivity analyses. The supporting tables in **Appendix B** show the assumptions used to derive employment counts and the related industry allocation. Second, the residents living in the Innovation Centers will support household expenditures that flow to establishments throughout the community.[1] The total pool of potential household spending equates to roughly $10 million in the Base Development Program and three sensitivity analyses.[2] The assumptions regarding the amount of household spending also are summarized in **Appendix B**.

---

[1] Household expenditures of residents that are employed in the local economy are captured in the induced impacts of jobs (refer to page 8 for a description of induced impacts). To avoid double-counting, adjustments were made to account for residents that are drawn to the housing products in the Innovation Centers and are employed outside the local economy. Further conservative adjustments were made to account only for non-student renter-occupied households in the Nishi project as students are primarily drawn to the area for the university and, in the absence of the Innovation Centers, related households could be distributed elsewhere in the local economy. Because the proposed Innovation Centers are nonresidential-oriented projects, it is assumed that the bulk of the household expenditures will occur outside the project areas.

[2] The DEIR for MRIC assumes that all residents occupying the housing units considered in the Mixed Use Alternative will work in the local economy; therefore, the potential pool of household spending is not included in the economic impact analysis as a conservative measure to avoid double-counting in the induced impacts of jobs (refer to page 8 for a description of induced impacts). If the resident spending pool assumptions used for Nishi are applied to the MRIC Housing sensitivity analysis, then the cumulative household spending would be approximately $39 million.

Table 3
Davis Innovation Centers - Economic Impact
Construction Cost Summary

One-Time Construction Costs	Base Development Program: 2nd Street/Interland URP Mix			Sensitivity Analysis: MRIC Housing			Sensitivity Analysis: No MRIC Hotel			Sensitivity Analysis: Nishi Hotel		
	MRIC	Nishi	Total	MRIC	Nishi	Total	MRIC	Nishi	Total	MRIC	Nishi	Total
Residential Construction Costs [1]	$0	$139,272,000	**$139,272,000**	$203,592,000	$139,272,000	**$342,864,000**	$0	$139,272,000	**$139,272,000**	$0	$139,272,000	**$139,272,000**
Nonresidential Construction Costs [2]	$583,836,490	$105,230,870	**$689,067,360**	$583,836,490	$105,230,870	**$689,067,360**	$585,436,490	$105,230,870	**$690,667,360**	$583,836,490	$104,941,150	**$688,777,640**
Infrastructure Construction Costs [3]	$68,700,000	$28,576,000	**$97,276,000**	$68,700,000	$28,576,000	**$97,276,000**	$68,700,000	$28,576,000	**$97,276,000**	$68,700,000	$28,576,000	**$97,276,000**
Total Construction Costs	**$652,536,490**	**$273,078,870**	**$925,615,360**	**$856,128,490**	**$273,078,870**	**$1,129,207,360**	**$654,136,490**	**$273,078,870**	**$927,215,360**	**$652,536,490**	**$272,789,150**	**$925,325,640**

construct_sum

Source: EPS.

[1] See Table A-1.
[2] See Table A-2.
[3] See Table A-3.

Table 4
Davis Innovation Centers - Economic Impact
Employment and Household Income Summary

Ongoing Activities	Base Development Program: 2nd Street/Interland URP Mix			Sensitivity Analysis: MRIC Housing			Sensitivity Analysis: No MRIC Hotel			Sensitivity Analysis: Nishi Hotel		
	MRIC	Nishi	Total	MRIC	Nishi	Total	MRIC	Nishi	Total	MRIC	Nishi	Total
Aggregate Income of New Household Spending Pool [1]	$0	$10,328,229	**$10,328,229**	$0	$10,328,229	**$10,328,229**	$0	$10,328,229	**$10,328,229**	$0	$10,328,229	**$10,328,229**
Employment [2]	5,479	1,043	**6,522**	5,479	1,043	**6,522**	5,812	1,043	**6,856**	5,479	883	**6,361**

emp&income

Source: EPS.

[1] See Table B-1.
[2] See Table B-2.

Economic Impact Modeling

The economic impact analysis uses an input/output (I/O) modeling framework to estimate the full range of economic effects associated with the one-time and ongoing economic activities of the proposed Innovation Centers in Davis.[3] Economic impacts are derived through an I/O model by taking a direct activity and adding multipliers to account for the chain of spending and respending that is set in motion by the initial activity. For example, a R&D entity operating in one of the Innovation Centers will purchase goods and services to support its own economic activities. The demand for goods and services will stimulate additional economic activities at other supplier businesses. The impacts expand further when employees of these businesses spend their income and stimulate economic activities at businesses receiving the spending. These various economic effects multiply throughout the economy and, when added to the direct activity, yield the total estimated economic impact.

The I/O modeling framework is premised on the concept that industries in a geographic region are interdependent in the sense that they purchase output from and supply input to other industries. This analysis relies on the framework established through IMPLAN (Impact Analysis for Planning) software, an I/O model that draws on data collected by the IMPLAN Group, LLC, from several government sources, including the Bureau of Economic Analysis (BEA), Bureau of Labor Statistics (BLS), and the Census Bureau. The model is used widely for estimating economic impacts across a wide array of industries and economic settings.

The total gross economic impacts reflect the sum of direct, indirect, and induced effects. Indirect and induced effects are derived through multipliers that measure the impact of the direct activity as it "ripples" throughout the economy:

- The **direct** effect represents the change in output or employment attributable to the specific economic activity being analyzed. In this case, the effect captures construction reflected in estimated costs and establishment operations measured through estimated employment.
- The **indirect** effect reflects the economic activities that result from the response to demand on suppliers of goods and services from the direct economic activity. For this analysis, the effect measures the interindustry purchases from the construction activities and establishment operations.
- The **induced** effect captures household purchases of goods and services in the economy tied to employee income supported by the direct and indirect activities.[4] This effect also accounts for estimated household spending from the project housing units.[5]

---

[3] The economic impacts of each project are measured individually and aggregated to reflect the cumulative results. While there is potential for incremental economic activity to arise from the interplay between the two projects, it is not feasible to quantify those impacts using the standard approaches employed in this analysis.

[4] Induced effects are not measured for the one-time construction activities because temporary increases to economic activity are not anticipated to generate new resident employees and related induced expenditures in the local economy. IMPLAN suggests that exclusion of these induced effects

For this analysis, the three effects are estimated for both the Davis and Yolo County economies.[6] IMPLAN generates a model of the industrial structure and household profile for the defined economies for the specific data year, which, in turn, determines the extent to which spending is captured and recirculated in the economy rather than being allowed to leak outside the geographic area. Larger geographic areas generally produce greater economic impacts as spending is recirculated among a larger base of establishments and industries.

The economic impact analysis presents results using three economic measures, which are defined for an annual period:

- **Employment (Jobs)** represents the number of full- and part-time jobs supported by the affected industries.
- **Output** reflects the total market value of goods and services generated by affected industries.
- **Labor Income** accounts for total compensation (i.e., salaries/wages and benefits) associated with the employment.[7]

Two important caveats are relevant to the interpretation of the IMPLAN model estimates. First, economic impact estimates are derived based on the most recent available data sets from IMPLAN (2013 at the time of this analysis), which reflect key factors such as interindustry relationships, industry size and structure, and industry production functions. Any significant changes to these static factors could significantly alter the resulting economic impacts. Because the cumulative absorption timeframe of these projects could be as long as 30 years, it is likely these factors will change. However, these potential changes cannot be modeled based on available data.

Second, the I/O methodology is based on the assumption that new industry demand for goods and services results in a corresponding increase in supply and therefore employment. This implies that key industry suppliers can increase output rather than shift output from one set of consumers or products to another. This assumption may not hold in areas with tight labor or capital markets because companies may find it difficult to obtain these inputs or other resources necessary to expand production. In these cases, accommodating an establishment's demand for

---

prevents overestimation of economic impacts associated with temporary increases in economic activity.

[5] Consistent with the definition, IMPLAN software applies all household spending changes to induced effects. This methodology uses income-level spending patterns and adjustments for taxes and savings.

[6] The IMPLAN software uses postal ZIP codes to build models for a local economy; therefore, the proxy for the Davis economy is defined by the following postal ZIP codes: 95616, 95917, and 95618. Because the IMPLAN ZIP code models use an econometric regional purchase coefficient calibration, the same methodology was used for the Yolo County model. Based on IMPLAN guidance, EPS also adjusted the Yolo County model industry data to create appropriate alignment between the local and county models.

[7] It is important to note that labor income is a component of output and is not an additive economic impact.

labor and other inputs may come at the expense of other establishments in the same or related sectors or may need to be satisfied by increased imports from outside the study area (i.e., increased imports). This phenomenon is often referred to as "crowding out" because the sector being stimulated tends to crowd out other sectors, which can reduce the net economic gain.

Economic Impact Analysis Results

The MRIC and Nishi projects make significantly different contributions to the cumulative one-time and ongoing economic impacts because of differing sizes and proposed land uses. At 229 acres, the MRIC project is almost 5 times bigger than the Nishi project and could support larger building prototypes. In each of the projects, the different components of the one-time and ongoing activities also support a considerable variation in resulting economic impacts. Nonresidential space is the largest segment in both projects, making it the predominant contributor to overall construction activity and the resulting establishment operations housed in the built space.

One-Time Impacts

Table 5 presents the estimated economic impacts for the residential, nonresidential, and backbone infrastructure construction components of the one-time economic activities by project and for the Base Development Program and the three sensitivity analyses.[8] Additional details on the one-time impacts are provided in the supporting tables in **Appendix C**.

For the MRIC project, the one-time economic impact in the Davis economy is estimated to total between about 2,400 and 3,200 jobs, $419 million and $564 million of output, and $196 million and $250 million of labor income with the Base Development Program at the lower end and MRIC Housing sensitivity analysis at the upper end. The same scenarios produce the low and high estimates in the Yolo County economy with the one-time impact ranging from 4,100 to 5,500 jobs, $726 million to $988 million of output, and $332 million to $429 million of labor income. With the addition of residential construction in the MRIC Housing sensitivity analysis, the MRIC project's contribution to the cumulative one-time economic impact shifts from approximately 71 percent to 76 percent in both the Davis and Yolo County estimates.

Estimates of the one-time economic impact associated with the Nishi project are roughly the same in the Base Development Program and Nishi Hotel sensitivity analysis because of the reallocation of land uses that support similar construction activities. The total one-time impact in the Davis economy is estimated at 1,000 jobs, $186 million of output, and $75 million of labor income, while estimates for the Yolo County economy show 1,800 jobs, $329 million of output, and $130 million of labor income. The Nishi project accounts for about 29 percent of the total one-time economic impact in the Davis and Yolo County economies for all scenarios with the exception of the MRIC Housing sensitivity analysis. In this instance, the Nishi project share drops to just under one-quarter as overall construction activity is increased in the MRIC project.

[8] In all cases, neither the Davis nor Yolo County economy is able to supply enough construction activity to meet all of the demand generated by the two projects through buildout as reflected in the estimated project construction costs (i.e., construction activity will need to be imported into the local economy). The economic impact analysis accounts for the estimated proportion of total activity demand that can captured in the local economy (local purchasing percentages).

Table 5
Davis Innovation Centers - Economic Impact
One-Time Activities - Total Economic Impact

Study Area/Measure	Base Development Program: 2nd Street/Interland URP Mix			Sensitivity Analysis: MRIC Housing			Sensitivity Analysis: No MRIC Hotel			Sensitivity Analysis: Nishi Hotel		
	MRIC	Nishi	Total	MRIC	Nishi	Total	MRIC	Nishi	Total	MRIC	Nishi	Total
Davis Economy												
Residential Construction [1]												
Employment	0	550	550	804	550	1,354	0	550	550	0	550	550
Output (2015$)	$0	$99,135,937	$99,135,937	$144,919,896	$99,135,937	$244,055,833	$0	$99,135,937	$99,135,937	$0	$99,135,937	$99,135,937
Labor Income (2015$)	$0	$36,900,074	$36,900,074	$53,941,639	$36,900,074	$90,841,713	$0	$36,900,074	$36,900,074	$0	$36,900,074	$36,900,074
Nonresidential Construction [2]												
Employment	2,177	384	2,562	2,177	384	2,562	2,183	384	2,567	2,177	383	2,561
Output (2015$)	$374,525,116	$67,769,412	$442,294,528	$374,525,116	$67,769,412	$442,294,528	$375,556,319	$67,769,412	$443,325,731	$374,525,116	$67,582,687	$442,107,803
Labor Income (2015$)	$180,978,532	$31,307,702	$212,286,234	$180,978,532	$31,307,702	$212,286,234	$181,450,629	$31,307,702	$212,758,331	$180,978,532	$31,222,218	$212,200,750
Backbone Infrastructure Construction [3]												
Employment	185	77	262	185	77	262	185	77	262	185	77	262
Output (2015$)	$44,951,819	$18,697,863	$63,649,682	$44,951,819	$18,697,863	$63,649,682	$44,951,819	$18,697,863	$63,649,682	$44,951,819	$18,697,863	$63,649,682
Labor Income (2015$)	$15,319,685	$6,372,276	$21,691,961	$15,319,685	$6,372,276	$21,691,961	$15,319,685	$6,372,276	$21,691,961	$15,319,685	$6,372,276	$21,691,961
Total One-Time Activities												
Employment	**2,362**	**1,011**	**3,374**	**3,166**	**1,011**	**4,178**	**2,368**	**1,011**	**3,380**	**2,362**	**1,010**	**3,373**
Output (2015$)	**$419,476,935**	**$185,603,212**	**$605,080,147**	**$564,396,831**	**$185,603,212**	**$750,000,043**	**$420,508,138**	**$185,603,212**	**$606,111,350**	**$419,476,935**	**$185,416,487**	**$604,893,422**
Labor Income (2015$)	**$196,298,217**	**$74,580,052**	**$270,878,269**	**$250,239,856**	**$74,580,052**	**$324,819,908**	**$196,770,314**	**$74,580,052**	**$271,350,366**	**$196,298,217**	**$74,494,568**	**$270,792,785**
Yolo County Economy												
Residential Construction [4]												
Employment	0	1,005	1,005	1,469	1,005	2,475	0	1,005	1,005	0	1,005	1,005
Output (2015$)	$0	$179,533,475	$179,533,475	$262,447,435	$179,533,475	$441,980,910	$0	$179,533,475	$179,533,475	$0	$179,533,475	$179,533,475
Labor Income (2015$)	$0	$66,237,748	$66,237,748	$96,828,334	$66,237,748	$163,066,082	$0	$66,237,748	$66,237,748	$0	$66,237,748	$66,237,748
Nonresidential Construction [5]												
Employment	3,736	659	4,395	3,736	659	4,395	3,728	659	4,387	3,736	657	4,394
Output (2015$)	$646,552,869	$116,779,195	$763,332,064	$646,552,869	$116,779,195	$763,332,064	$644,997,016	$116,779,195	$761,776,211	$646,552,869	$116,457,222	$763,010,091
Labor Income (2015$)	$304,880,512	$52,724,460	$357,604,972	$304,880,512	$52,724,460	$357,604,972	$304,184,190	$52,724,460	$356,908,650	$304,880,512	$52,580,361	$357,460,873
Backbone Infrastructure Construction [6]												
Employment	338	141	479	338	141	479	338	141	479	338	141	479
Output (2015$)	$79,459,827	$33,051,587	$112,511,414	$79,459,827	$33,051,587	$112,511,414	$79,459,827	$33,051,587	$112,511,414	$79,459,827	$33,051,587	$112,511,414
Labor Income (2015$)	$27,123,199	$11,281,987	$38,405,186	$27,123,199	$11,281,987	$38,405,186	$27,123,199	$11,281,987	$38,405,186	$27,123,199	$11,281,987	$38,405,186
Total One-Time Activities												
Employment	**4,074**	**1,805**	**5,879**	**5,544**	**1,805**	**7,349**	**4,066**	**1,805**	**5,871**	**4,074**	**1,803**	**5,877**
Output (2015$)	**$726,012,696**	**$329,364,257**	**$1,055,376,953**	**$988,460,131**	**$329,364,257**	**$1,317,824,388**	**$724,456,843**	**$329,364,257**	**$1,053,821,100**	**$726,012,696**	**$329,042,284**	**$1,055,054,980**
Labor Income (2015$)	**$332,003,711**	**$130,244,195**	**$462,247,906**	**$428,832,045**	**$130,244,195**	**$559,076,240**	**$331,307,389**	**$130,244,195**	**$461,551,584**	**$332,003,711**	**$130,100,096**	**$462,103,807**

one-time_summary

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] See Tables C-1 through C-3.
[2] See Tables C-7 through C-9.
[3] See Tables C-13 through C-15.
[4] See Tables C-4 through C-6.
[5] See Tables C-10 through C-12.
[6] See Tables C-16 through C-18.

On average, across all measures, nonresidential construction activity accounts for roughly 76 percent of the total one-time economic impact, with MRIC contributing about 85 percent of the related impact. This is the case for the Base Development Program and the No MRIC Hotel and Nishi Hotel sensitivity analyses. In the MRIC Housing sensitivity analysis, nonresidential construction decreases to about 62 percent of the total one-time economic impact as residential construction increases from roughly 15 percent to close to one-third of the total impact. Approximately 60 percent of the residential construction impact is generated by the MRIC project in this sensitivity analysis.

Backbone infrastructure construction supports an average of between 7 and 9 percent of the total one-time impact across the Base Development Program and three sensitivity analyses.[9] Because the Nishi project includes some major incremental infrastructure investments in the Olive Drive extension and grade-separated undercrossing, this project accounts for around 29 percent of the related economic impact, despite representing only about 17 percent of the cumulative gross acreage.

DEIR Alternatives

The MRIC Housing and Nishi Hotel sensitivity analyses capture two of the alternatives evaluated in the DEIRs, specifically the Mixed-Use Alternative for MRIC and the Alternative Land Use Mix for Nishi. Several other alternatives are presented in the DEIR analysis for both projects.[10] **Table 6** shows the potential qualitative effects these alternatives could have on the one-time economic impacts associated with the two proposed projects.

Six of the alternatives identified for the MRIC and Nishi projects could result in a decreased one-time economic impact. Most apparent, the No Project alternative for both the MRIC and Nishi projects would eliminate all of the measured one-time economic activities, leading to a decreased economic impact.

The Reduced Project alternative for the MRIC project also would generate a decreased economic impact related to one-time activities as only a portion of the site would be developed with less demand for nonresidential and infrastructure construction. Compared to the proposed project, both the acreage and nonresidential square footage are reduced in the Off-Site Option A alternative (Davis Innovation Center site) for MRIC, which could require less infrastructure and nonresidential construction activity with a decreased economic impact. The MRIC Off-Site Option B alternative (Covell Property) accounts for larger acreage but a smaller amount of

---

[9] It is important to note that this analysis only accounts for on-site infrastructure in the MRIC project. The DEIR analysis identifies potential off-site infrastructure improvements as mitigation measures in the Transportation and Circulation component that could increase the infrastructure investment and related construction activity. As a general guide to understanding the economic implications for these potential mitigation measures, accounting for local purchasing percentages, every $1 million of infrastructure construction generates an estimated total impact of roughly 3 jobs, $654,000 of output, and $223,000 of labor income in the Davis economy.

[10] The August 2015 MRIC DEIR and September 2015 Nishi DEIR are available on the following Web site: http://cityofdavis.org/city-hall/community-development-and-sustainability/development-projects.

Table 6
Davis Innovation Centers - Economic Impact
DEIR Alternatives Potential Effect on One-Time Economic Impact

Project/Alternative	Nonresidential Square Feet	Dwelling Units	Gross Acres	Potential Effect
MRIC [1]				
Proposed	2,725,056	0	229	-
No Project	0	0	0	Decrease
Reduced Site Size	2,725,056	0	123	Similar or Decrease [3]
Reduced Project	611,056	0	66	Decrease
Off-Site Option A (Davis IC)	2,654,000	0	208	Decrease
Off-Site Option B (Covell)	2,654,000	0	247	Decrease
Nishi [2]				
Proposed	400,900	650	47	-
No Project	0	0	0	Decrease
R&D Only	1,275,000	0	47	Increase
Offsite Option (5th Street)	345,000	650	47	Decrease

one-time_alt

Source: Raney Planning and Management; Ascent; EPS.

[1] Because it was treated as a quantitative sensitivity analysis, the Mixed-Use alternative is not included in the table. The Infill alternative is also not included in the table because it was dismissed in the DEIR.
[2] Because it was treated as a quantitative sensitivity analysis, the Alternative Land Use Mix is not included in the table. The Recreation-Only and Reduced Intensity alternatives area also not in the table because they were dismissed in the DEIR.
[3] Effect depends on size of required parking structure.

nonresidential square feet. Because of the magnitude of the differences in acres and square feet and related backbone infrastructure and nonresidential building costs, this alternative could lead to less construction activity with a decreased one-time economic impact.

For the Nishi project, the Off-Site option (5th Street Corridor) could produce a decreased one-time economic impact as the major incremental infrastructure investments likely are not needed for the 5th Street Corridor site, resulting in a reduced demand for backbone infrastructure construction. In addition, under this alternative, the rezoning and redesignation of the West Olive Drive area would not occur, leading to a reduction in commercial development and related construction activity.

The Reduced Site Size alternative for MRIC is based on the same assumed nonresidential square footage and, while the site size is smaller, any related reductions in backbone infrastructure construction could be negated by the stated need for a parking structure. Depending on the size of the parking structure, this could result in a similar or decreased one-time economic impact.

Only one alternative likely has the potential to generate an increased one-time economic impact. Under the Research and Development Only alternative for Nishi, the one-time economic impact could be increased because the residential uses that would be eliminated tend to support slightly lower construction costs and associated economic activity.

Ongoing Impacts

The estimated gross economic impacts associated with ongoing household spending and establishment operations in the MRIC and Nishi projects are presented in **Table 7**. Additional information on the household spending and establishment operations economic impacts is provided in **Appendix D**.

The gross ongoing economic impact generated from the MRIC project in the Davis economy is estimated at between approximately 9,600 and 10,300 jobs, $2.5 billion and $2.7 billion of output, and $596 million and $638 million of labor income. When extended to the Yolo County economy, the estimated ongoing economic impact range for MRIC is between roughly 10,700 and 11,400 jobs, $2.6 billion and $2.8 billion of output, and $651 million and $697 million of labor income. Because the office and flex uses that are assumed to be developed in place of the hotel space support greater levels of employment, the No MRIC Hotel sensitivity analysis produces the largest economic impact in both the Davis and Yolo County economies. The Base Development Program, which is equivalent to the two other sensitivity analyses, represents the low end of the economic impact range for MRIC.[11] The ongoing economic

[11] Because the DEIR for MRIC assumes that all residents occupying the housing units considered in the Mixed Use Alternative will work in the local economy, the potential pool of household spending is not included in the economic impact analysis as a conservative measure to avoid double-counting in the induced impacts of jobs (refer to page 8 for a description of induced impacts). If the resident spending pool assumptions used for Nishi are applied to the MRIC Housing sensitivity analysis, then the cumulative ongoing economic impact would equate to approximately 11,500 jobs, $2.9 billion of output, and $709 million labor income for the Davis economy and 12,700 jobs, $3.1 billion of output, and $787 million of labor income for the Yolo County economy.

Table 7
Davis Innovation Centers - Economic Impact
Ongoing Activities - Total Economic Impact

Study Area / Measure	Base Development Program: 2nd Street/Interland URP Mix			Sensitivity Analysis: MRIC Housing			Sensitivity Analysis: No MRIC Hotel			Sensitivity Analysis: Nishi Hotel		
	MRIC	Nishi	Total	MRIC [5]	Nishi	Total	MRIC	Nishi	Total	MRIC	Nishi	Total
Davis Economy												
Household Spending [1]												
Employment	0	41	41	0	41	41	0	41	41	0	41	41
Output (2015$)	$0	$5,444,856	$5,444,856	$0	$5,444,856	$5,444,856	$0	$5,444,856	$5,444,856	$0	$5,444,856	$5,444,856
Labor Income (2015$)	$0	$1,682,279	$1,682,279	$0	$1,682,279	$1,682,279	$0	$1,682,279	$1,682,279	$0	$1,682,279	$1,682,279
Establishment Operations [2]												
Employment	9,644	1,729	11,373	9,644	1,729	11,373	10,286	1,729	12,015	9,644	1,440	11,084
Output (2015$)	$2,480,310,458	$380,026,217	$2,860,336,675	$2,480,310,458	$380,026,217	$2,860,336,675	$2,657,321,781	$380,026,217	$3,037,347,998	$2,480,310,458	$310,035,995	$2,790,346,453
Labor Income (2015$)	$596,346,492	$105,787,789	$702,134,281	$596,346,492	$105,787,789	$702,134,281	$638,050,865	$105,787,789	$743,838,654	$596,346,492	$87,025,278	$683,371,770
Total Ongoing Activities												
Employment	**9,644**	**1,770**	**11,414**	**9,644**	**1,770**	**11,414**	**10,286**	**1,770**	**12,056**	**9,644**	**1,481**	**11,125**
Output (2015$)	**$2,480,310,458**	**$385,471,073**	**$2,865,781,531**	**$2,480,310,458**	**$385,471,073**	**$2,865,781,531**	**$2,657,321,781**	**$385,471,073**	**$3,042,792,854**	**$2,480,310,458**	**$315,480,851**	**$2,795,791,309**
Labor Income (2015$)	**$596,346,492**	**$107,470,068**	**$703,816,560**	**$596,346,492**	**$107,470,068**	**$703,816,560**	**$638,050,865**	**$107,470,068**	**$745,520,933**	**$596,346,492**	**$88,707,557**	**$685,054,049**
Yolo County Economy												
Household Spending [3]												
Employment	0	49	49	0	49	49	0	49	49	0	49	49
Output (2015$)	$0	$6,699,489	$6,699,489	$0	$6,699,489	$6,699,489	$0	$6,699,489	$6,699,489	$0	$6,699,489	$6,699,489
Labor Income (2015$)	$0	$2,046,050	$2,046,050	$0	$2,046,050	$2,046,050	$0	$2,046,050	$2,046,050	$0	$2,046,050	$2,046,050
Establishment Operations [4]												
Employment	10,662	1,864	12,526	10,662	1,864	12,526	11,376	1,864	13,239	10,662	1,549	12,211
Output (2015$)	$2,649,621,863	$402,709,536	$3,052,331,399	$2,649,621,863	$402,709,536	$3,052,331,399	$2,838,842,739	$402,709,536	$3,241,552,275	$2,649,621,863	$328,343,887	$2,977,965,750
Labor Income (2015$)	$651,392,495	$112,424,403	$763,816,898	$651,392,495	$112,424,403	$763,816,898	$696,854,072	$112,424,403	$809,278,475	$651,392,495	$92,424,029	$743,816,524
Total Ongoing Activities												
Employment	**10,662**	**1,913**	**12,575**	**10,662**	**1,913**	**12,575**	**11,376**	**1,913**	**13,288**	**10,662**	**1,598**	**12,260**
Output (2015$)	**$2,649,621,863**	**$409,409,025**	**$3,059,030,888**	**$2,649,621,863**	**$409,409,025**	**$3,059,030,888**	**$2,838,842,739**	**$409,409,025**	**$3,248,251,764**	**$2,649,621,863**	**$335,043,376**	**$2,984,665,239**
Labor Income (2015$)	**$651,392,495**	**$114,470,453**	**$765,862,948**	**$651,392,495**	**$114,470,453**	**$765,862,948**	**$696,854,072**	**$114,470,453**	**$811,324,525**	**$651,392,495**	**$94,470,079**	**$745,862,574**

ongoing_summary

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] See Tables D-1 through D-3
[2] See Tables D-7 through D-10.
[3] See Tables D-4 through D-6.
[4] See Tables D-11 through D-13.
[5] Because the MRIC DEIR assumes all residents will work in the local economy, a conservative adjustment was made to avoid double-counting in the induced impact of jobs (see Table B-1). If the same non-student household spending pool assumptions used for Nishi are applied, then the total cumulative ongoing economic impact for the MRIC Housing Sensitivity Analysis would show approximately 11,500 jobs, $2.9 billion of output, and $709 million labor income for the Davis economy and 12,700 jobs, $3.1 billion of output, and $787 million of labor income for the Yolo County economy.

activities associated with the MRIC project are responsible for an average of about 85 percent of the cumulative economic impact for the Base Development Program. This average contribution increases slightly to 86 percent under the No MRIC Hotel sensitivity analysis.

The Nishi project is estimated to produce an ongoing economic impact in the Davis economy that totals between 1,500 and 1,800 jobs, $315 million and $385 million of output, and $89 million and $107 million of labor income. Like in the case of the MRIC project, the hotel space supports a smaller amount of jobs than the other proposed nonresidential uses, making the economic impact associated with the Nishi Hotel sensitivity analysis lower than the Base Development Program. This also holds true for the Yolo County economy, where the Base Development Program shows an ongoing economic impact of about 1,900 jobs, $409 million of output, and $114 million of labor income, and the Nishi Hotel sensitivity analysis produces an impact of approximately 1,600 jobs, $335 million of output, and $94 million of labor income. The Nishi project's share of the total ongoing economic impact in the Davis and Yolo County economies drops from an average of around 15 percent in the Base Development Program to 13 percent in the Nishi Hotel sensitivity analysis.

Household spending represents less than 1 percent of the total ongoing economic impact in Davis and Yolo County for the Base Development Program and three sensitivity analyses. Establishment operations are the primary driver of the estimated ongoing economic impact generated from the proposed Innovation Center projects. With a greater amount of nonresidential square footage to support establishment operations, the MRIC project produces about 86 percent of the related local and countywide economic impact for the Base Development Program and MRIC Housing and No MRIC Hotel sensitivity analyses. When Nishi employment-generating nonresidential space is reallocated to the hotel use in the Nishi Hotel sensitivity analysis, the MRIC project contribution to the total establishment operations impact jumps to an average of close to 88 percent.

DEIR Alternatives

Table 8 lists the potential quantitative effects of the various DEIR alternatives not analyzed in the economic impact analysis for the MRIC and Nishi projects. The ongoing economic impacts could be decreased under six of the identified alternatives. The No Project Alternative for both the MRIC and Nishi project would leave the sites under current conditions, and the ongoing economic impact could be decreased by the net of the expected economic activity in the agriculture uses and the potential uses in the proposed projects. Considering the relative magnitude of the economic contribution of the existing uses, this decrease could be significant, equating to a large share of the estimated ongoing economic impact.

With less nonresidential space for establishments to occupy to produce goods or provide services, the Reduced Project and both Off-Site Option alternatives for MRIC also could generate a decreased ongoing economic impact.[12] Similarly, the Off-Site alternative for Nishi does not include the nonresidential space associated with the rezoning and redesignation of the West

[12] In the case of the MRIC Off-Site Option alternatives, some variation could arise as the Covell Property and Davis Innovation Center sites are not directly aligned with the Interstate 80 corridor, which could lead to a somewhat different land use and industry mix with reduced emphasis on the manufacturing building type and increased orientation toward the office and flex uses.

Table 8
Davis Innovation Centers - Economic Impact
DEIR Alternatives Potential Effect on Ongoing Economic Impact

Project/Alternative	Nonresidential Square Feet	Dwelling Units	Gross Acres	Potential Effect
MRIC [1]				
Proposed	2,725,056	0	229	-
No Project	0	0	0	Decrease
Reduced Site Size	2,725,056	0	123	Similar
Reduced Project	611,056	0	66	Decrease
Off-Site Option A (Davis IC)	2,654,000	0	208	Decrease
Off-Site Option B (Covell)	2,654,000	0	247	Decrease
Nishi [2]				
Proposed	400,900	650	47	-
No Project	0	0	0	Decrease
R&D Only	1,275,000	0	47	Increase
Offsite Option (5th Street)	345,000	650	47	Decrease

ongoing_alt

Source: Raney Planning and Management; Ascent; EPS.

[1] Because it was treated as a quantitative sensitivity analysis, the Mixed-Use alternative is not included in the table. The Infill alternative is also not included in the table because it was dismissed in the DEIR.

[2] Because it was treated as a quantitative sensitivity analysis, the Alternative Land Use Mix is not included in the table. The Recreation-Only and Reduced Intensity alternatives are also not in the table because they were dismissed in the DEIR.

Olive Drive area, resulting in an overall decreased ongoing economic impact. It is important to note that, unlike the proposed MRIC off-site options, this Nishi site option is developed and contains commercial, office, light industrial, and utility facilities that are themselves generating an economic impact in the local economy. Consideration of the net ongoing economic impact could be appropriate in this case.

The Reduced Site Size alternative for MRIC is based on the same assumed buildout square footage; therefore, the ongoing economic impact could be similar to the proposed project.

The Research and Development Only alternative for Nishi could produce an increased ongoing economic impact because the residential uses that would be removed generally support less employment through household spending than establishment operations based in the nonresidential uses. The majority of the estimated ongoing impacts are generated by the establishment operations, and further orientation toward these nonresidential uses would incrementally increase these activities.

Market Absorption Considerations

Estimates developed for this analysis show the buildout conditions reflected in the proposed MRIC and Nishi projects could support close to 7,000 jobs on an ongoing basis. The economic impact analysis reveals the indirect and induced effects generated by these on-site jobs could equate to an additional 5,000 jobs in the Davis economy. As discussed in the economic impact modeling assumptions, the analysis is based on the assumption that any new demand will be met with a corresponding increase in supply, which is calibrated based on the size and structure of the local economy. Because the Innovation Centers are major projects that could stimulate significant economic activity, the indirect and induced effects represent new market demand in the local economy that will require commercial real estate. Assuming an average of 300 square feet per employee, this could translate to incremental off-site demand of roughly 1.5 million square feet. There are several key considerations related to accommodating this incremental demand over the absorption period of the Innovation Center projects:

- **Market response among existing buildings**—Although vacancy rates in Davis historically have been lower than in the rest of the region and close to market equilibrium in some segments, existing buildings can be expected to absorb a portion of the new off-site demand. Some vacancy in the Davis market is a result of underutilized properties where building improvements and tenant turnover could accommodate additional demand. A distinct segment of this demand also could be addressed through existing residential properties in the form of home-based businesses.

- **Increased density in existing development areas**—Recent development projects around the downtown area have indicated an opportunity for increased density. Gradual densification of the downtown and other key development areas in the community would introduce net new space in the market that can address a segment of the incremental demand. This is consistent with the City's adopted Dispersed Innovation Strategy objective to maximize use of existing land and building inventory.

- **New development on vacant sites**—City of Davis information shows approximately 153 net acres of undeveloped land zoned for nonresidential uses. New development on this land will provide space that can accommodate a portion of the incremental demand from the Innovation Centers, as well as other general market demand. This absorption potential could

be reduced in the case of the Off-Site DEIR alternatives that would remove some of this vacant acreage for the Innovation Centers themselves. It is important to note that many of the existing sites are held for future planned expansion or are not sufficient in size to accommodate larger users.[14]

- **Leakage to surrounding communities**—Any of the incremental off-site demand that cannot be absorbed in Davis through existing or new development likely will shift to surrounding communities. This would reduce the estimated ongoing economic impact in Davis and could increase the Yolo County impact to the extent the excess demand is absorbed in the countywide economy.

Cluster Opportunities

In the Phase I study, several cluster opportunities were identified based on alignment with regional economic development priorities, university research strengths, and local industry and labor force concentrations. These groupings of economic activities represent the types of establishments that might display a stronger fit for the local economy in general and specifically for the nonresidential space in the proposed Innovation Centers. Creating the conditions for these types of establishments to locate and succeed in the Davis economy will facilitate direct, indirect, and induced effects.

Table 9 provides examples that demonstrate the magnitude of the potential economic impact associated with each of the identified cluster opportunities. These estimated economic impacts account for the direct effects of various establishment types using an increment of 100 jobs as the basis and include the indirect effects generated in suppliers of goods and services and induced effects produced through employee spending. The types of establishments provided align with the possible concentration of economic activities in the Innovation Centers identified as part of the Phase I effort.[15] Overall, every 100 jobs in the various establishment types could support a total of between approximately 170 and 210 jobs, $27 million and $69 million of output, and $10 million and $15 million of labor income in the Davis economy. The variation in outcomes is driven by the type and value of economic activities, as well as the magnitude of interindustry relationships in the Davis economy. It is important to note that these estimates are provided for example purposes only—the operational structure of each specific establishment that locates in the proposed Innovation Centers could generate a significantly different economic impact.

---

[14] As part of the discussion related to the Infill alternative that was considered but dismissed, the MRIC DEIR states that only 82 of the 153 acres are currently available for office or industrial development with most of the available acreage configured in parcels that are four acres or less.

[15] The distribution of detailed economic activities in each cluster was estimated based on data from the Next Economy Capital Region Prosperity Plan and establishment data for innovation district case studies and the City of Davis from ESRI Business Analyst Online and Hoover's.

Table 9
Davis Innovation Centers - Economic Impact
Cluster Opportunity Examples - Total Economic Impact of Every 100 Jobs in Davis Economy

Establishment Type	Employment	Compensation	Output
Agriculture & Food Production	204	$14,491,923	$68,838,386
Advanced Manufacturing	194	$13,130,055	$61,366,773
Clean Energy Technology	186	$12,660,721	$68,137,241
Information & Communications Technology	206	$11,965,038	$62,016,803
Knowledge-Intensive Services	165	$9,496,387	$26,520,526
Life Sciences & Health Services	167	$10,221,469	$40,049,403

estab_impacts

Source: IMPLAN, 2013 Data and EPS.

APPENDICES:

Appendix A: Construction Cost Assumption Tables

Appendix B: Household Income and Employment Assumption Tables

Appendix C: One-Time Economic Impact Tables

Appendix D: Ongoing Economic Impact Tables

APPENDIX A:

Construction Cost Assumption Tables

Table A-1
Davis Innovation Centers - Economic Impact
Residential Construction Costs

Item	Assumptions	Base Development Program: 2nd Street/Interland URP Mix			Sensitivity Analysis: MRIC Housing		
		MRIC	Nishi	Total	MRIC	Nishi	Total
Renter-Occupied							
Number of Units		0	440	**440**	340	440	**780**
Unit Sale Price	$308,000	-	-	-	-	-	-
Unit Construction Cost [1]	$184,800	-	-	-	-	-	-
Total Renter-Occupied Construction Costs		**$0**	**$81,312,000**	**$81,312,000**	**$62,832,000**	**$81,312,000**	**$144,144,000**
Owner-Occupied							
Number of Units		0	210	**210**	510	210	**720**
Unit Sale Price	$460,000	-	-	-	-	-	-
Unit Construction Cost [1]	$276,000	-	-	-	-	-	-
Total Owner-Occupied Construction Costs		**$0**	**$57,960,000**	**$57,960,000**	**$140,760,000**	**$57,960,000**	**$198,720,000**
Total Residential Construction Costs		**$0**	**$139,272,000**	**$139,272,000**	**$203,592,000**	**$139,272,000**	**$342,864,000**

construct_res

Source: National Association of Home Builders; A. Plescia & Co.; Goodwin Consulting Group; EPS.

[1] According to NAHB, the cost of construction accounts for about 60 percent of the final sales price of the average home.

Table A-2
Davis Innovation Centers - Economic Impact
Nonresidential Construction Costs

Item	Cost	Base Development Program: 2nd Street/Interland URP Mix			Sensitivity Analysis: No MRIC Hotel			Sensitivity Analysis: Nishi Hotel		
		MRIC	Nishi	Total	MRIC	Nishi	Total	MRIC	Nishi	Total
Square Feet	*Per Sq. Ft. [1]*									
Office	$200	846,468	172,387	**1,018,855**	926,468	172,387	**1,098,855**	846,468	131,781	**978,249**
Flex: R&D/Office	$220	513,011	72,162	**585,173**	593,011	72,162	**665,173**	513,011	57,676	**570,687**
Manufacturing	$230	952,169	28,221	**980,390**	952,169	28,221	**980,390**	952,169	28,221	**980,390**
Industrial Commercial	$200	62,578	10,000	**72,578**	62,578	10,000	**72,578**	62,578	5,188	**67,766**
Ancillary Retail	$200	62,578	37,950	**100,528**	62,578	37,950	**100,528**	62,578	37,950	**100,528**
Hotel	$200	160,000	0	**160,000**	0	0	**0**	160,000	70,000	**230,000**
Public/Non-Profit	$200	128,253	80,180	**208,433**	128,253	80,180	**208,433**	128,253	70,084	**198,337**
Total		**2,725,056**	**400,900**	**3,125,956**	**2,725,056**	**400,900**	**3,125,956**	**2,725,056**	**400,900**	**3,125,956**
Parking Spaces	*Per Space*									
Parking Garage	$27,000	0	843	**843**	0	843	**843**	0	843	**843**
Total Construction Cost										
Office		$169,293,600	$34,477,400	**$203,771,000**	$185,293,600	$34,477,400	**$219,771,000**	$169,293,600	$26,356,200	**$195,649,800**
Flex: R&D/Office		$112,862,420	$15,875,640	**$128,738,060**	$130,462,420	$15,875,640	**$146,338,060**	$112,862,420	$12,688,720	**$125,551,140**
Manufacturing		$218,998,870	$6,490,830	**$225,489,700**	$218,998,870	$6,490,830	**$225,489,700**	$218,998,870	$6,490,830	**$225,489,700**
Industrial Commercial		$12,515,500	$2,000,000	**$14,515,500**	$12,515,500	$2,000,000	**$14,515,500**	$12,515,500	$1,037,600	**$13,553,100**
Ancillary Retail		$12,515,500	$7,590,000	**$20,105,500**	$12,515,500	$7,590,000	**$20,105,500**	$12,515,500	$7,590,000	**$20,105,500**
Hotel		$32,000,000	$0	**$32,000,000**	$0	$0	**$0**	$32,000,000	$14,000,000	**$46,000,000**
Public/Non-Profit		$25,650,600	$16,036,000	**$41,686,600**	$25,650,600	$16,036,000	**$41,686,600**	$25,650,600	$14,016,800	**$39,667,400**
Parking Garage		$0	$22,761,000	**$22,761,000**	$0	$22,761,000	**$22,761,000**	$0	$22,761,000	**$22,761,000**
Total		**$583,836,490**	**$105,230,870**	**$689,067,360**	**$585,436,490**	**$105,230,870**	**$690,667,360**	**$583,836,490**	**$104,941,150**	**$688,777,640**

construct_nonres

Source: PKF Consulting; RSMeans; Yolo County Assessor's Office; City of Davis; Smith Travel Research; A. Plescia & Co.; Goodwin Consulting Group; EPS.

[1] Based on 90% of Phase I assessed value midpoints and additional case study analysis.

Table A-3
Davis Innovation Centers - Economic Impact
Infrastructure Costs

Item	MRIC [1]	Nishi [2]	Total
Infrastructure Cost per Acre (Gross)	$300,000	$608,000	
Total Acres	229	47	**276**
Total Infrastructure Cost	**$68,700,000**	**$28,576,000**	**$97,276,000**

infra_cost

Source: A. Plescia & Co.; Goodwin Consulting Group; Buzz Oates; EPS.

[1] Includes on-site backbone infrastructure. Does not include off-site infrastructure projects expected as mitigation measures in Transportation and Circulation components of EIR.
[2] In addition to on-site backbone infrastructure, Nishi infrastructure costs also include the proposed Olive Drive extension and grade-separated undercrossing.
Acreage only include Nishi Gateway.

APPENDIX B:

Household Income and Employment Assumption Tables

Table B-1
Davis Innovation Centers - Economic Impact
Aggregate Income of New Households

Item	Assumptions	Base Development Program: 2nd Street/Interland URP Mix			Sensitivity Analysis: MRIC Housing		
		MRIC	Nishi	Total	MRIC	Nishi	Total
New Household Spending Pool [1]		-	45%	-	0%	45%	-
Residential Vacancy Rate	5%	-	-	-	-	-	-
Renter-Occupied							
Number of Units		0	440	**440**	510	440	**950**
Unit Sale Price	$308,000	-	-	-	-	-	-
New Household Spending Pool		0	188	**188**	0	188	**188**
New Non-Student Household Spending Pool [2]		0	28	**28**	0	28	**28**
Total Annual Rent Payments [3]	$27,600	-	-	-	-	-	-
Median Household Income of Renter-Occupied Spending Pool [4]	$79,000	-	-	-	-	-	-
Aggregate Income of Renter-Occupied Spending Pool		**$0**	**$2,228,985**	**$2,228,985**	**$0**	**$2,228,985**	**$2,228,985**
Owner-Occupied							
Number of Units		0	210	**210**	340	210	**550**
Unit Sale Price	$460,000	-	-	-	-	-	-
New Household Spending Pool		0	90	**90**	0	90	**90**
Total Annual Mortgage, Insurance, and Tax Payments [5]	$36,000	-	-	-	-	-	-
Median Household Income of Owner-Occupied Spending Pool [6]	$103,000	-	-	-	-	-	-
Aggregate Income of Owner-Occupied Spending Pool		**$0**	**$9,246,825**	**$9,246,825**	**$0**	**$9,246,825**	**$9,246,825**
Total Aggregate Income of New Household Spending Pool		**$0**	**$11,475,810**	**$11,475,810**	**$0**	**$11,475,810**	**$11,475,810**
Total Aggregate Income of New Household Spending Pool Outside Project [7]	**90%**	**$0**	**$10,328,229**	**$10,328,229**	**$0**	**$10,328,229**	**$10,328,229**

income

Source: U.S. Census Bureau, OnTheMap, and LEHD Origin Destination Employment Statistics, 2007-2011 Average; A. Plescia & Co.; Goodwin Consulting Group; Raney Planning & Management; Ascent Environmental; EPS.

[1] To avoid double-counting of household spending reflected in the induced impact of jobs, the household spending pool captures a conservative estimate of income only for those households working outside the local economy. The percentage has been adjusted from the five-year average OnTheMap labor force data point of 78% to 45% to align with Nishi DEIR assumptions and a greater likelihood of residents to work locally due to the housing units' proximity to the university as well as employers in the Innovation Centers and Downtown. The DEIR for MRIC assumes that all residents will work in the local economy; therefore, a conservative adjustment has been made to shift the percentage to 0%. If the adjusted Nishi percentage is applied to MRIC, the cumulative household spending pool for the MRIC Housing Sensitivity Analysis would be approximately $39 million.

[2] Because the UC Davis student population might otherwise be housed elsewhere in the community, a conservative adjustment has been applied to remove potential student spending from the household spending pool and related economic impact analysis. Assumes 15% of Nishi renter-occupied units are non-student based on DEIR information.

[3] Assumes a monthly rent payment of $2,300, based on high-level pro forma analysis.

[4] Assumes renters paying 35% of their income in rent.

[5] Based on a 6%, 30-year fixed rate mortgage with a 20% down payment and 2% for annual taxes and insurance. Values runded to the nearest thousand dollars.

[6] Assumes mortgage lending guidelines allow around 35% of income dedicated to mortgage payments, taxes and, insurance.

[7] Assumes most household spending will be outside the project, as proposed projects reflect primarily ancillary retail.

Table B-2
Davis Innovation Centers - Economic Impact
Employees by Land Use

Item	Square Feet per Employee [1]	Vacancy Rate	Base Development Program: 2nd Street/Interland URP Mix			Sensitivity Analysis: No MRIC Hotel			Sensitivity Analysis: Nishi Hotel		
			MRIC	Nishi	Total	MRIC	Nishi	Total	MRIC	Nishi	Total
Square Feet											
Office	290	8%	846,468	172,387	1,018,855	926,468	172,387	1,098,855	846,468	131,781	978,249
Flex: R&D/Office	450	10%	513,011	72,162	585,173	593,011	72,162	665,173	513,011	57,676	570,687
Manufacturing	800	9%	952,169	28,221	980,390	952,169	28,221	980,390	952,169	28,221	980,390
Industrial Commercial	500	5%	62,578	10,000	72,578	62,578	10,000	72,578	62,578	5,188	67,766
Ancillary Retail	500	5%	62,578	37,950	100,528	62,578	37,950	100,528	62,578	37,950	100,528
Hotel	2,000	-	160,000	0	160,000	0	0	0	160,000	70,000	230,000
Public/Non-Profit	350	-	128,253	80,180	208,433	128,253	80,180	208,433	128,253	70,084	198,337
Total			**2,725,056**	**400,900**	**3,125,956**	**2,725,056**	**400,900**	**3,125,956**	**2,725,056**	**400,900**	**3,125,956**
Employees											
Office			2,685	547	3,232	2,939	547	3,486	2,685	418	3,103
Flex: R&D/Office			1,026	144	1,170	1,186	144	1,330	1,026	115	1,141
Manufacturing			1,083	32	1,115	1,083	32	1,115	1,083	32	1,115
Industrial Commercial			119	19	138	119	19	138	119	10	129
Ancillary Retail			119	72	191	119	72	191	119	72	191
Hotel			80	0	80	0	0	0	80	35	115
Public/Non-Profit			366	229	596	366	229	596	366	200	567
Total			**5,479**	**1,043**	**6,522**	**5,812**	**1,043**	**6,856**	**5,479**	**883**	**6,361**

lu_jobs

Source: City of Davis; DTZ; Hoover's; BAE; Smith Travel Research; EPS.

[1] Based on Phase I employment density midpoints and additional case study analysis.

Table B-3
Davis Innovation Centers - Economic Impact
Land Use Industry Employment Mix

Major Industry (NAICS) [1]	Office	Flex: R&D/Office	Industrial: Manufacturing	Industrial Commercial	Ancillary Retail	Public/ Non-Profit	Hotel
Agriculture, Forestry, Fishing and Hunting (11)	-	5%	5%	-	-	5%	-
Mining (21)	-	-	-	-	-	-	-
Utilities (22)	-	5%	5%	-	-	5%	-
Construction (23)	-	-	-	10%	-	-	-
Manufacturing (31-33)	-	40%	75%	5%	-	-	-
Wholesale Trade (42)	-	5%	10%	-	-	-	-
Retail Trade (44-45)	-	-	-	20%	60%	-	-
Transportation and Warehousing (48-49)	-	5%	5%	-	-	-	-
Information (51)	15%	5%	-	-	-	-	-
Finance and Insurance (52)	5%	-	-	-	-	-	-
Real Estate and Rental and Leasing (53)	5%	-	-	-	-	-	-
Professional, Scientific, and Technical Services (54)	40%	30%	-	-	-	10%	-
Management of Companies & Enterprises (55)	20%	-	-	-	-	-	-
Administrative and Waste Services (56)	5%	5%	-	5%	-	-	-
Educational Services (61)	-	-	-	20%	-	-	-
Health Care and Social Assistance (62)	10%	-	-	10%	-	5%	-
Arts, Entertainment, and Recreation (71)	-	-	-	10%	-	-	-
Accommodation and Food Services (72)	-	-	-	-	20%	-	100%
Other Services (81)	-	-	-	20%	20%	5%	-
Government	-	-	-	-	-	70%	-
Total	**100%**	**100%**	**100%**	**100%**	**100%**	**100%**	**100%**

RE_NAICS

Source: Center for Strategic Economic Research; ESRI Business Analyst Online; EPS.

[1] Allocation of sectors based on review of economic activities identified in Phase I, Next Economy Capital Region Prosperity Plan clusters, and case studies.

Table B-4
Davis Innovation Centers - Economic Impact
Employment by Industry - Base Development Program: MRIC

Base Development Program: MRIC

Major Industry (NAICS)	Office	Flex: R&D/Office	Industrial: Manufacturing	Industrial Commercial	Ancillary Retail	Public/ Non-Profit	Hotel	Total
Agriculture, Forestry, Fishing and Hunting (11)	-	51	54	-	-	18	-	**124**
Mining (21)	-	-	-	-	-	-	-	**-**
Utilities (22)	-	51	54	-	-	18	-	**124**
Construction (23)	-	-	-	12	-	-	-	**12**
Manufacturing (31-33)	-	410	812	6	-	-	-	**1,229**
Wholesale Trade (42)	-	51	108	-	-	-	-	**160**
Retail Trade (44-45)	-	-	-	24	71	-	-	**95**
Transportation and Warehousing (48-49)	-	51	54	-	-	-	-	**105**
Information (51)	403	51	-	-	-	-	-	**454**
Finance and Insurance (52)	134	-	-	-	-	-	-	**134**
Real Estate and Rental and Leasing (53)	134	-	-	-	-	-	-	**134**
Professional, Scientific, and Technical Services (54)	1,074	308	-	-	-	37	-	**1,419**
Management of Companies & Enterprises (55)	537	-	-	-	-	-	-	**537**
Administrative and Waste Services (56)	134	51	-	6	-	-	-	**192**
Educational Services (61)	-	-	-	24	-	-	-	**24**
Health Care and Social Assistance (62)	269	-	-	12	-	18	-	**299**
Arts, Entertainment, and Recreation (71)	-	-	-	12	-	-	-	**12**
Accommodation and Food Services (72)	-	-	-	-	24	-	80	**104**
Other Services (81)	-	-	-	24	24	18	-	**66**
Government	-	-	-	-	-	257	-	**257**
Total	**2,685**	**1,026**	**1,083**	**119**	**119**	**366**	**80**	**5,479**

base_MRIC

Source: EPS.

Table B-5
Davis Innovation Centers - Economic Impact
Employment by Industry - Base Development Program: Nishi

Base Development Program: Nishi

Major Industry (NAICS)	Office	Flex: R&D/Office	Industrial: Manufacturing	Industrial Commercial	Ancillary Retail	Public/ Non-Profit	Hotel	Total
Agriculture, Forestry, Fishing and Hunting (11)	-	7	2	-	-	11	-	**20**
Mining (21)	-	-	-	-	-	-	-	**-**
Utilities (22)	-	7	2	-	-	11	-	**20**
Construction (23)	-	-	-	2	-	-	-	**2**
Manufacturing (31-33)	-	58	24	1	-	-	-	**83**
Wholesale Trade (42)	-	7	3	-	-	-	-	**10**
Retail Trade (44-45)	-	-	-	4	43	-	-	**47**
Transportation and Warehousing (48-49)	-	7	2	-	-	-	-	**9**
Information (51)	82	7	-	-	-	-	-	**89**
Finance and Insurance (52)	27	-	-	-	-	-	-	**27**
Real Estate and Rental and Leasing (53)	27	-	-	-	-	-	-	**27**
Professional, Scientific, and Technical Services (54)	219	43	-	-	-	23	-	**285**
Management of Companies & Enterprises (55)	109	-	-	-	-	-	-	**109**
Administrative and Waste Services (56)	27	7	-	1	-	-	-	**36**
Educational Services (61)	-	-	-	4	-	-	-	**4**
Health Care and Social Assistance (62)	55	-	-	2	-	11	-	**68**
Arts, Entertainment, and Recreation (71)	-	-	-	2	-	-	-	**2**
Accommodation and Food Services (72)	-	-	-	-	14	-	-	**14**
Other Services (81)	-	-	-	4	14	11	-	**30**
Government	-	-	-	-	-	160	-	**160**
Total	**547**	**144**	**32**	**19**	**72**	**229**	**-**	**1,043**

base_nishi

Source: EPS.

Table B-6
Davis Innovation Centers - Economic Impact
Employment by Industry - Base Development Program: Total

Base Development Program: Total

Major Industry (NAICS)	Office	Flex: R&D/Office	Industrial: Manufacturing	Industrial Commercial	Ancillary Retail	Public/ Non-Profit	Hotel	Total
Agriculture, Forestry, Fishing and Hunting (11)	-	59	56	-	-	30	-	**144**
Mining (21)	-	-	-	-	-	-	-	**-**
Utilities (22)	-	59	56	-	-	30	-	**144**
Construction (23)	-	-	-	14	-	-	-	**14**
Manufacturing (31-33)	-	468	836	7	-	-	-	**1,311**
Wholesale Trade (42)	-	59	112	-	-	-	-	**170**
Retail Trade (44-45)	-	-	-	28	115	-	-	**142**
Transportation and Warehousing (48-49)	-	59	56	-	-	-	-	**114**
Information (51)	485	59	-	-	-	-	-	**543**
Finance and Insurance (52)	162	-	-	-	-	-	-	**162**
Real Estate and Rental and Leasing (53)	162	-	-	-	-	-	-	**162**
Professional, Scientific, and Technical Services (54)	1,293	351	-	-	-	60	-	**1,704**
Management of Companies & Enterprises (55)	646	-	-	-	-	-	-	**646**
Administrative and Waste Services (56)	162	59	-	7	-	-	-	**227**
Educational Services (61)	-	-	-	28	-	-	-	**28**
Health Care and Social Assistance (62)	323	-	-	14	-	30	-	**367**
Arts, Entertainment, and Recreation (71)	-	-	-	14	-	-	-	**14**
Accommodation and Food Services (72)	-	-	-	-	38	-	80	**118**
Other Services (81)	-	-	-	28	38	30	-	**96**
Government	-	-	-	-	-	417	-	**417**
Total	**3,232**	**1,170**	**1,115**	**138**	**191**	**596**	**80**	**6,522**

base_total

Source: EPS.

Table B-7
Davis Innovation Centers - Economic Impact
Employment by Industry - No MRIC Hotel Sensitivity Analysis: MRIC

No MRIC Hotel Sensitivity Analysis: MRIC

Major Industry (NAICS)	Office	Flex: R&D/Office	Industrial: Manufacturing	Industrial Commercial	Ancillary Retail	Public/ Non-Profit	Hotel	Total
Agriculture, Forestry, Fishing and Hunting (11)	-	59	54	-	-	18	-	**132**
Mining (21)	-	-	-	-	-	-	-	**-**
Utilities (22)	-	59	54	-	-	18	-	**132**
Construction (23)	-	-	-	12	-	-	-	**12**
Manufacturing (31-33)	-	474	812	6	-	-	-	**1,293**
Wholesale Trade (42)	-	59	108	-	-	-	-	**168**
Retail Trade (44-45)	-	-	-	24	71	-	-	**95**
Transportation and Warehousing (48-49)	-	59	54	-	-	-	-	**113**
Information (51)	441	59	-	-	-	-	-	**500**
Finance and Insurance (52)	147	-	-	-	-	-	-	**147**
Real Estate and Rental and Leasing (53)	147	-	-	-	-	-	-	**147**
Professional, Scientific, and Technical Services (54)	1,176	356	-	-	-	37	-	**1,568**
Management of Companies & Enterprises (55)	588	-	-	-	-	-	-	**588**
Administrative and Waste Services (56)	147	59	-	6	-	-	-	**212**
Educational Services (61)	-	-	-	24	-	-	-	**24**
Health Care and Social Assistance (62)	294	-	-	12	-	18	-	**324**
Arts, Entertainment, and Recreation (71)	-	-	-	12	-	-	-	**12**
Accommodation and Food Services (72)	-	-	-	-	24	-	-	**24**
Other Services (81)	-	-	-	24	24	18	-	**66**
Government	-	-	-	-	-	257	-	**257**
Total	**2,939**	**1,186**	**1,083**	**119**	**119**	**366**	**-**	**5,812**

MRIC_nohotel_MRIC

Source: EPS.

Table B-8
Davis Innovation Centers - Economic Impact
Employment by Industry - No MRIC Hotel Sensitivity Analysis: Tota

No MRIC Hotel Sensitivity Analysis: Total

Major Industry (NAICS)	Office	Flex: R&D/Office	Industrial: Manufacturing	Industrial Commercial	Ancillary Retail	Public/ Non-Profit	Hotel	Total
Agriculture, Forestry, Fishing and Hunting (11)	-	67	56	-	-	30	-	**152**
Mining (21)	-	-	-	-	-	-	-	**-**
Utilities (22)	-	67	56	-	-	30	-	**152**
Construction (23)	-	-	-	14	-	-	-	**14**
Manufacturing (31-33)	-	532	836	7	-	-	-	**1,375**
Wholesale Trade (42)	-	67	112	-	-	-	-	**178**
Retail Trade (44-45)	-	-	-	28	115	-	-	**142**
Transportation and Warehousing (48-49)	-	67	56	-	-	-	-	**122**
Information (51)	523	67	-	-	-	-	-	**589**
Finance and Insurance (52)	174	-	-	-	-	-	-	**174**
Real Estate and Rental and Leasing (53)	174	-	-	-	-	-	-	**174**
Professional, Scientific, and Technical Services (54)	1,394	399	-	-	-	60	-	**1,853**
Management of Companies & Enterprises (55)	697	-	-	-	-	-	-	**697**
Administrative and Waste Services (56)	174	67	-	7	-	-	-	**248**
Educational Services (61)	-	-	-	28	-	-	-	**28**
Health Care and Social Assistance (62)	349	-	-	14	-	30	-	**392**
Arts, Entertainment, and Recreation (71)	-	-	-	14	-	-	-	**14**
Accommodation and Food Services (72)	-	-	-	-	38	-	-	**38**
Other Services (81)	-	-	-	28	38	30	-	**96**
Government	-	-	-	-	-	417	-	**417**
Total	**3,486**	**1,330**	**1,115**	**138**	**191**	**596**	**-**	**6,856**

MRIC_nohotel_total

Source: EPS.

Table B-9
Davis Innovation Centers - Economic Impact
Employment by Industry - Nishi Hotel Sensitivity Analysis: Nish

Nishi Hotel Sensitivity Analysis: Nishi

Major Industry (NAICS)	Office	Flex: R&D/Office	Industrial: Manufacturing	Industrial Commercial	Ancillary Retail	Public/ Non-Profit	Hotel	Total
Agriculture, Forestry, Fishing and Hunting (11)	-	6	2	-	-	10	-	**17**
Mining (21)	-	-	-	-	-	-	-	**-**
Utilities (22)	-	6	2	-	-	10	-	**17**
Construction (23)	-	-	-	1	-	-	-	**1**
Manufacturing (31-33)	-	46	24	0	-	-	-	**71**
Wholesale Trade (42)	-	6	3	-	-	-	-	**9**
Retail Trade (44-45)	-	-	-	2	43	-	-	**45**
Transportation and Warehousing (48-49)	-	6	2	-	-	-	-	**7**
Information (51)	63	6	-	-	-	-	-	**68**
Finance and Insurance (52)	21	-	-	-	-	-	-	**21**
Real Estate and Rental and Leasing (53)	21	-	-	-	-	-	-	**21**
Professional, Scientific, and Technical Services (54)	167	35	-	-	-	20	-	**222**
Management of Companies & Enterprises (55)	84	-	-	-	-	-	-	**84**
Administrative and Waste Services (56)	21	6	-	0	-	-	-	**27**
Educational Services (61)	-	-	-	2	-	-	-	**2**
Health Care and Social Assistance (62)	42	-	-	1	-	10	-	**53**
Arts, Entertainment, and Recreation (71)	-	-	-	1	-	-	-	**1**
Accommodation and Food Services (72)	-	-	-	-	14	-	35	**49**
Other Services (81)	-	-	-	2	14	10	-	**26**
Government	-	-	-	-	-	140	-	**140**
Total	**418**	**115**	**32**	**10**	**72**	**200**	**35**	**883**

nishi_hotel_nishi

Source: EPS.

Table B-10
Davis Innovation Centers - Economic Impact
Employment by Industry - Nishi Hotel Sensitivity Analysis: Tota

Nishi Hotel Sensitivity Analysis: Total

Major Industry (NAICS)	Office	Flex: R&D/Office	Industrial: Manufacturing	Industrial Commercial	Ancillary Retail	Public/ Non-Profit	Hotel	Total
Agriculture, Forestry, Fishing and Hunting (11)	-	57	56	-	-	28	-	**141**
Mining (21)	-	-	-	-	-	-	-	**-**
Utilities (22)	-	57	56	-	-	28	-	**141**
Construction (23)	-	-	-	13	-	-	-	**13**
Manufacturing (31-33)	-	457	836	6	-	-	-	**1,299**
Wholesale Trade (42)	-	57	112	-	-	-	-	**169**
Retail Trade (44-45)	-	-	-	26	115	-	-	**140**
Transportation and Warehousing (48-49)	-	57	56	-	-	-	-	**113**
Information (51)	466	57	-	-	-	-	-	**523**
Finance and Insurance (52)	155	-	-	-	-	-	-	**155**
Real Estate and Rental and Leasing (53)	155	-	-	-	-	-	-	**155**
Professional, Scientific, and Technical Services (54)	1,241	342	-	-	-	57	-	**1,640**
Management of Companies & Enterprises (55)	621	-	-	-	-	-	-	**621**
Administrative and Waste Services (56)	155	57	-	6	-	-	-	**219**
Educational Services (61)	-	-	-	26	-	-	-	**26**
Health Care and Social Assistance (62)	310	-	-	13	-	28	-	**352**
Arts, Entertainment, and Recreation (71)	-	-	-	13	-	-	-	**13**
Accommodation and Food Services (72)	-	-	-	-	38	-	115	**153**
Other Services (81)	-	-	-	26	38	28	-	**92**
Government	-	-	-	-	-	397	-	**397**
Total	**3,103**	**1,141**	**1,115**	**129**	**191**	**567**	**115**	**6,361**

nishi_hotel_total

Source: EPS.

APPENDIX C:

One-Time Activities Economic Impact Tables

Table C-1
Davis Innovation Centers - Economic Impact
One-Time Activities - MRIC Residential Construction, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0
MRIC Housing				
Employment	559	245	0	804
Output (2015$)	$120,119,279	$24,800,617	$0	$144,919,896
Labor Income (2015$)	$45,718,574	$8,223,065	$0	$53,941,639
No MRIC Hotel				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0
Nishi Hotel				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0

mric_davis_res

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-2
Davis Innovation Centers - Economic Impact
One-Time Activities - Nishi Residential Construction, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	383	167	0	550
Output (2015$)	$82,170,479	$16,965,458	$0	$99,135,937
Labor Income (2015$)	$31,274,889	$5,625,185	$0	$36,900,074
MRIC Housing				
Employment	383	167	0	550
Output (2015$)	$82,170,479	$16,965,458	$0	$99,135,937
Labor Income (2015$)	$31,274,889	$5,625,185	$0	$36,900,074
No MRIC Hotel				
Employment	383	167	0	550
Output (2015$)	$82,170,479	$16,965,458	$0	$99,135,937
Labor Income (2015$)	$31,274,889	$5,625,185	$0	$36,900,074
Nishi Hotel				
Employment	383	167	0	550
Output (2015$)	$82,170,479	$16,965,458	$0	$99,135,937
Labor Income (2015$)	$31,274,889	$5,625,185	$0	$36,900,074

nishi_davis_res

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-3
Davis Innovation Centers - Economic Impact
One-Time Activities - Total Residential Construction, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	383	167	0	550
Output (2015$)	$82,170,479	$16,965,458	$0	$99,135,937
Labor Income (2015$)	$31,274,889	$5,625,185	$0	$36,900,074
MRIC Housing				
Employment	942	412	0	1,354
Output (2015$)	$202,289,758	$41,766,075	$0	$244,055,833
Labor Income (2015$)	$76,993,463	$13,848,250	$0	$90,841,713
No MRIC Hotel				
Employment	383	167	0	550
Output (2015$)	$82,170,479	$16,965,458	$0	$99,135,937
Labor Income (2015$)	$31,274,889	$5,625,185	$0	$36,900,074
Nishi Hotel				
Employment	383	167	0	550
Output (2015$)	$82,170,479	$16,965,458	$0	$99,135,937
Labor Income (2015$)	$31,274,889	$5,625,185	$0	$36,900,074

total_davis_res

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-4
Davis Innovation Centers - Economic Impact
One-Time Activities - MRIC Residential Construction, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0
MRIC Housing				
Employment	924	546	0	1,469
Output (2015$)	$199,520,171	$62,927,264	$0	$262,447,435
Labor Income (2015$)	$75,939,340	$20,888,994	$0	$96,828,334
No MRIC Hotel				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0
Nishi Hotel				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0

mric_yolo_res

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-5
Davis Innovation Centers - Economic Impact
One-Time Activities - Nishi Residential Construction, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	632	373	0	1,005
Output (2015$)	$136,486,568	$43,046,907	$0	$179,533,475
Labor Income (2015$)	$51,948,130	$14,289,618	$0	$66,237,748
MRIC Housing				
Employment	632	373	0	1,005
Output (2015$)	$136,486,568	$43,046,907	$0	$179,533,475
Labor Income (2015$)	$51,948,130	$14,289,618	$0	$66,237,748
No MRIC Hotel				
Employment	632	373	0	1,005
Output (2015$)	$136,486,568	$43,046,907	$0	$179,533,475
Labor Income (2015$)	$51,948,130	$14,289,618	$0	$66,237,748
Nishi Hotel				
Employment	632	373	0	1,005
Output (2015$)	$136,486,568	$43,046,907	$0	$179,533,475
Labor Income (2015$)	$51,948,130	$14,289,618	$0	$66,237,748

nishi_yolo_res

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-6
Davis Innovation Centers - Economic Impact
One-Time Activities - Total Residential Construction, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	632	373	0	1,005
Output (2015$)	$136,486,568	$43,046,907	$0	$179,533,475
Labor Income (2015$)	$51,948,130	$14,289,618	$0	$66,237,748
MRIC Housing				
Employment	1,555	919	0	2,475
Output (2015$)	$336,006,739	$105,974,171	$0	$441,980,910
Labor Income (2015$)	$127,887,470	$35,178,612	$0	$163,066,082
No MRIC Hotel				
Employment	632	373	0	1,005
Output (2015$)	$136,486,568	$43,046,907	$0	$179,533,475
Labor Income (2015$)	$51,948,130	$14,289,618	$0	$66,237,748
Nishi Hotel				
Employment	632	373	0	1,005
Output (2015$)	$136,486,568	$43,046,907	$0	$179,533,475
Labor Income (2015$)	$51,948,130	$14,289,618	$0	$66,237,748

total_yolo_res

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-7
Davis Innovation Centers - Economic Impact
One-Time Activities - MRIC Nonresidential Construction, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	1,995	182	0	2,177
Output (2015$)	$346,610,409	$27,914,707	$0	$374,525,116
Labor Income (2015$)	$171,926,902	$9,051,630	$0	$180,978,532
MRIC Housing				
Employment	1,995	182	0	2,177
Output (2015$)	$346,610,409	$27,914,707	$0	$374,525,116
Labor Income (2015$)	$171,926,902	$9,051,630	$0	$180,978,532
No MRIC Hotel				
Employment	2,000	183	0	2,183
Output (2015$)	$347,558,988	$27,997,331	$0	$375,556,319
Labor Income (2015$)	$172,371,218	$9,079,411	$0	$181,450,629
Nishi Hotel				
Employment	1,995	182	0	2,177
Output (2015$)	$346,610,409	$27,914,707	$0	$374,525,116
Labor Income (2015$)	$171,926,902	$9,051,630	$0	$180,978,532

mric_davis_nonres

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-8
Davis Innovation Centers - Economic Impact
One-Time Activities - Nishi Nonresidential Construction, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	348	36	0	384
Output (2015$)	$62,401,483	$5,367,929	$0	$67,769,412
Labor Income (2015$)	$29,512,696	$1,795,006	$0	$31,307,702
MRIC Housing				
Employment	348	36	0	384
Output (2015$)	$62,401,483	$5,367,929	$0	$67,769,412
Labor Income (2015$)	$29,512,696	$1,795,006	$0	$31,307,702
No MRIC Hotel				
Employment	348	36	0	384
Output (2015$)	$62,401,483	$5,367,929	$0	$67,769,412
Labor Income (2015$)	$29,512,696	$1,795,006	$0	$31,307,702
Nishi Hotel				
Employment	347	36	0	383
Output (2015$)	$62,229,719	$5,352,968	$0	$67,582,687
Labor Income (2015$)	$29,432,242	$1,789,976	$0	$31,222,218

nishi_davis_nonres

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-9
Davis Innovation Centers - Economic Impact
One-Time Activities - Total Nonresidential Construction, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	2,343	219	0	2,562
Output (2015$)	$409,011,892	$33,282,636	$0	$442,294,528
Labor Income (2015$)	$201,439,598	$10,846,636	$0	$212,286,234
MRIC Housing				
Employment	2,343	219	0	2,562
Output (2015$)	$409,011,892	$33,282,636	$0	$442,294,528
Labor Income (2015$)	$201,439,598	$10,846,636	$0	$212,286,234
No MRIC Hotel				
Employment	2,348	219	0	2,567
Output (2015$)	$409,960,471	$33,365,260	$0	$443,325,731
Labor Income (2015$)	$201,883,914	$10,874,417	$0	$212,758,331
Nishi Hotel				
Employment	2,342	218	0	2,561
Output (2015$)	$408,840,128	$33,267,675	$0	$442,107,803
Labor Income (2015$)	$201,359,144	$10,841,606	$0	$212,200,750

total_davis_nonres

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-10
Davis Innovation Centers - Economic Impact
One-Time Activities - MRIC Nonresidential Construction, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	3,204	533	0	3,736
Output (2015$)	$557,494,679	$89,058,190	$0	$646,552,869
Labor Income (2015$)	$276,416,728	$28,463,784	$0	$304,880,512
MRIC Housing				
Employment	3,204	533	0	3,736
Output (2015$)	$557,494,679	$89,058,190	$0	$646,552,869
Labor Income (2015$)	$276,416,728	$28,463,784	$0	$304,880,512
No MRIC Hotel				
Employment	3,196	531	0	3,728
Output (2015$)	$556,164,679	$88,832,337	$0	$644,997,016
Labor Income (2015$)	$275,793,755	$28,390,435	$0	$304,184,190
Nishi Hotel				
Employment	3,204	533	0	3,736
Output (2015$)	$557,494,679	$89,058,190	$0	$646,552,869
Labor Income (2015$)	$276,416,728	$28,463,784	$0	$304,880,512

mric_yolo_nonres

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-11
Davis Innovation Centers - Economic Impact
One-Time Activities - Nishi Nonresidential Construction, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	557	103	0	659
Output (2015$)	$99,969,329	$16,809,866	$0	$116,779,195
Labor Income (2015$)	$47,278,802	$5,445,658	$0	$52,724,460
MRIC Housing				
Employment	557	103	0	659
Output (2015$)	$99,969,329	$16,809,866	$0	$116,779,195
Labor Income (2015$)	$47,278,802	$5,445,658	$0	$52,724,460
No MRIC Hotel				
Employment	557	103	0	659
Output (2015$)	$99,969,329	$16,809,866	$0	$116,779,195
Labor Income (2015$)	$47,278,802	$5,445,658	$0	$52,724,460
Nishi Hotel				
Employment	555	102	0	657
Output (2015$)	$99,694,095	$16,763,127	$0	$116,457,222
Labor Income (2015$)	$47,149,882	$5,430,479	$0	$52,580,361

nishi_yolo_nonres

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-12
Davis Innovation Centers - Economic Impact
One-Time Activities - Total Nonresidential Construction, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	3,760	635	0	4,395
Output (2015$)	$657,464,008	$105,868,056	$0	$763,332,064
Labor Income (2015$)	$323,695,530	$33,909,442	$0	$357,604,972
MRIC Housing				
Employment	3,760	635	0	4,395
Output (2015$)	$657,464,008	$105,868,056	$0	$763,332,064
Labor Income (2015$)	$323,695,530	$33,909,442	$0	$357,604,972
No MRIC Hotel				
Employment	3,753	634	0	4,387
Output (2015$)	$656,134,008	$105,642,203	$0	$761,776,211
Labor Income (2015$)	$323,072,557	$33,836,093	$0	$356,908,650
Nishi Hotel				
Employment	3,759	635	0	4,394
Output (2015$)	$657,188,774	$105,821,317	$0	$763,010,091
Labor Income (2015$)	$323,566,610	$33,894,263	$0	$357,460,873

total_yolo_nonres

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-13
Davis Innovation Centers - Economic Impact
One-Time Activities - MRIC Backbone Infrastructure Construction, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	151	34	0	185
Output (2015$)	$39,994,762	$4,957,057	$0	$44,951,819
Labor Income (2015$)	$13,718,050	$1,601,635	$0	$15,319,685
MRIC Housing				
Employment	151	34	0	185
Output (2015$)	$39,994,762	$4,957,057	$0	$44,951,819
Labor Income (2015$)	$13,718,050	$1,601,635	$0	$15,319,685
No MRIC Hotel				
Employment	151	34	0	185
Output (2015$)	$39,994,762	$4,957,057	$0	$44,951,819
Labor Income (2015$)	$13,718,050	$1,601,635	$0	$15,319,685
Nishi Hotel				
Employment	151	34	0	185
Output (2015$)	$39,994,762	$4,957,057	$0	$44,951,819
Labor Income (2015$)	$13,718,050	$1,601,635	$0	$15,319,685

mric_davis_infra

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages). Does not include offsite infrastructure projects expected as mitigation measures in Transportation and Circulation components of EIR. Accounting for local purchasing percentages, every $1,000,000 of infrastructure construction generates a total impact of roughly 3 jobs, $654,000 of output, and $223,000 of labor income in the Davis economy.

[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-14
Davis Innovation Centers - Economic Impact
One-Time Activities - Nishi Backbone Infrastructure Construction, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	63	14	0	77
Output (2015$)	$16,635,958	$2,061,905	$0	$18,697,863
Labor Income (2015$)	$5,706,070	$666,206	$0	$6,372,276
MRIC Housing				
Employment	63	14	0	77
Output (2015$)	$16,635,958	$2,061,905	$0	$18,697,863
Labor Income (2015$)	$5,706,070	$666,206	$0	$6,372,276
No MRIC Hotel				
Employment	63	14	0	77
Output (2015$)	$16,635,958	$2,061,905	$0	$18,697,863
Labor Income (2015$)	$5,706,070	$666,206	$0	$6,372,276
Nishi Hotel				
Employment	63	14	0	77
Output (2015$)	$16,635,958	$2,061,905	$0	$18,697,863
Labor Income (2015$)	$5,706,070	$666,206	$0	$6,372,276

nishi_davis_infra

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-15
Davis Innovation Centers - Economic Impact
One-Time Activities - Total Backbone Infrastructure Construction, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	214	48	0	262
Output (2015$)	$56,630,720	$7,018,962	$0	$63,649,682
Labor Income (2015$)	$19,424,120	$2,267,841	$0	$21,691,961
MRIC Housing				
Employment	214	48	0	262
Output (2015$)	$56,630,720	$7,018,962	$0	$63,649,682
Labor Income (2015$)	$19,424,120	$2,267,841	$0	$21,691,961
No MRIC Hotel				
Employment	214	48	0	262
Output (2015$)	$56,630,720	$7,018,962	$0	$63,649,682
Labor Income (2015$)	$19,424,120	$2,267,841	$0	$21,691,961
Nishi Hotel				
Employment	214	48	0	262
Output (2015$)	$56,630,720	$7,018,962	$0	$63,649,682
Labor Income (2015$)	$19,424,120	$2,267,841	$0	$21,691,961

total_davis_infra

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-16
Davis Innovation Centers - Economic Impact
One-Time Activities - MRIC Backbone Infrastructure Construction, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	247	91	0	338
Output (2015$)	$65,265,002	$14,194,825	$0	$79,459,827
Labor Income (2015$)	$22,385,644	$4,737,555	$0	$27,123,199
MRIC Housing				
Employment	247	91	0	338
Output (2015$)	$65,265,002	$14,194,825	$0	$79,459,827
Labor Income (2015$)	$22,385,644	$4,737,555	$0	$27,123,199
No MRIC Hotel				
Employment	247	91	0	338
Output (2015$)	$65,265,002	$14,194,825	$0	$79,459,827
Labor Income (2015$)	$22,385,644	$4,737,555	$0	$27,123,199
Nishi Hotel				
Employment	247	91	0	338
Output (2015$)	$65,265,002	$14,194,825	$0	$79,459,827
Labor Income (2015$)	$22,385,644	$4,737,555	$0	$27,123,199

mric_yolo_infra

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages). Does not include offsite infrastructure projects expected as mitigation measures in Transportation and Circulation components of EIR.

[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-17
Davis Innovation Centers - Economic Impact
One-Time Activities - Nishi Backbone Infrastructure Construction, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	103	38	0	141
Output (2015$)	$27,147,201	$5,904,386	$0	$33,051,587
Labor Income (2015$)	$9,311,385	$1,970,602	$0	$11,281,987
MRIC Housing				
Employment	103	38	0	141
Output (2015$)	$27,147,201	$5,904,386	$0	$33,051,587
Labor Income (2015$)	$9,311,385	$1,970,602	$0	$11,281,987
No MRIC Hotel				
Employment	103	38	0	141
Output (2015$)	$27,147,201	$5,904,386	$0	$33,051,587
Labor Income (2015$)	$9,311,385	$1,970,602	$0	$11,281,987
Nishi Hotel				
Employment	103	38	0	141
Output (2015$)	$27,147,201	$5,904,386	$0	$33,051,587
Labor Income (2015$)	$9,311,385	$1,970,602	$0	$11,281,987

nishi_yolo_infra

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

Table C-18
Davis Innovation Centers - Economic Impact
One-Time Activities - Total Backbone Infrastructure Construction, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct [1]	Indirect	Induced [2]	
Base Development Program				
Employment	349	129	0	479
Output (2015$)	$92,412,203	$20,099,211	$0	$112,511,414
Labor Income (2015$)	$31,697,029	$6,708,157	$0	$38,405,186
MRIC Housing				
Employment	349	129	0	479
Output (2015$)	$92,412,203	$20,099,211	$0	$112,511,414
Labor Income (2015$)	$31,697,029	$6,708,157	$0	$38,405,186
No MRIC Hotel				
Employment	349	129	0	479
Output (2015$)	$92,412,203	$20,099,211	$0	$112,511,414
Labor Income (2015$)	$31,697,029	$6,708,157	$0	$38,405,186
Nishi Hotel				
Employment	349	129	0	479
Output (2015$)	$92,412,203	$20,099,211	$0	$112,511,414
Labor Income (2015$)	$31,697,029	$6,708,157	$0	$38,405,186

total_yolo_infra

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Adjusts for estimated proportion of total activity demand that can captured within the local economy (local purchasing percentages).
[2] Excluded because activities are temporary and not expected to generate net new household expenditures in the local economy.

APPENDIX D:

Ongoing Activities Economic Impact Tables

Table D-1
Davis Innovation Centers - Economic Impact
Ongoing Activities - MRIC Household Spending, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct	Indirect	Induced [1]	
Base Development Program				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0
MRIC Housing [2]				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0
No MRIC Hotel				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0
Nishi Hotel				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0

mric_davis_hh

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] IMPLAN definition applies all household spending changes to induced effects. Adjusts for spending patterns, taxes, savings, and estimated leakage.

[2] Because the MRIC DEIR assumes all residents will work in the local economy, a conservative adjustment was made to avoid double-counting in the induced impact of jobs (see Table B-1). If the same non-student household spending pool assumptions used for Nishi are applied, then the total economic impact would show approximately 114 jobs, $15.3 million of output, and $4.7 million of labor income.

Table D-2
Davis Innovation Centers - Economic Impact
Ongoing Activities - Nishi Household Spending, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct	Indirect	Induced [1]	
Base Development Program				
Employment	0	0	41	41
Output (2015$)	$0	$0	$5,444,856	$5,444,856
Labor Income (2015$)	$0	$0	$1,682,279	$1,682,279
MRIC Housing				
Employment	0	0	41	41
Output (2015$)	$0	$0	$5,444,856	$5,444,856
Labor Income (2015$)	$0	$0	$1,682,279	$1,682,279
No MRIC Hotel				
Employment	0	0	41	41
Output (2015$)	$0	$0	$5,444,856	$5,444,856
Labor Income (2015$)	$0	$0	$1,682,279	$1,682,279
Nishi Hotel				
Employment	0	0	41	41
Output (2015$)	$0	$0	$5,444,856	$5,444,856
Labor Income (2015$)	$0	$0	$1,682,279	$1,682,279

nishi_davis_hh

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] IMPLAN definition applies all household spending changes to induced effects. Adjusts for spending patterns, taxes, savings, and estimated leakage.

Table D-3
Davis Innovation Centers - Economic Impact
Ongoing Activities - Total Household Spending, Davis Economy

Analysis/Measure	Effect			Total Impact
	Direct	Indirect	Induced [1]	
Base Development Program				
Employment	0	0	41	41
Output (2015$)	$0	$0	$5,444,856	$5,444,856
Labor Income (2015$)	$0	$0	$1,682,279	$1,682,279
MRIC Housing [2]				
Employment	0	0	41	41
Output (2015$)	$0	$0	$5,444,856	$5,444,856
Labor Income (2015$)	$0	$0	$1,682,279	$1,682,279
No MRIC Hotel				
Employment	0	0	41	41
Output (2015$)	$0	$0	$5,444,856	$5,444,856
Labor Income (2015$)	$0	$0	$1,682,279	$1,682,279
Nishi Hotel				
Employment	0	0	41	41
Output (2015$)	$0	$0	$5,444,856	$5,444,856
Labor Income (2015$)	$0	$0	$1,682,279	$1,682,279

total_davis_hh

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] IMPLAN definition applies all household spending changes to induced effects. Adjusts for spending patterns, taxes, savings, and estimated leakage.

[2] Because the MRIC DEIR assumes all residents will work in the local economy, a conservative adjustment was made to avoid double-counting in the induced impact of jobs (see Table B-1). If the same non-student household spending pool assumptions used for Nishi are applied, then the total economic impact would show approximately 154 jobs, $20.7 million of output, and $6.4 million of labor income.

Table D-4
Davis Innovation Centers - Economic Impact
Ongoing Activities - MRIC Household Spending, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct	Indirect	Induced [1]	
Base Development Program				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0
MRIC Housing [2]				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0
No MRIC Hotel				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0
Nishi Hotel				
Employment	0	0	0	0
Output (2015$)	$0	$0	$0	$0
Labor Income (2015$)	$0	$0	$0	$0

mric_yolo_hh

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] IMPLAN definition applies all household spending changes to induced effects. Adjusts for spending patterns, taxes, savings, and estimated leakage.

[2] Because the MRIC DEIR assumes all residents will work in the local economy, a conservative adjustment was made to avoid double-counting in the induced impact of jobs (see Table B-1). If the same non-student household spending pool assumptions used for Nishi are applied, then the total economic impact would show approximately 137 jobs, $18.8 million of output, and $5.7 million of labor income.

Table D-5
Davis Innovation Centers - Economic Impact
Ongoing Activities - Nishi Household Spending, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct	Indirect	Induced [1]	
Base Development Program				
Employment	0	0	49	49
Output (2015$)	$0	$0	$6,699,489	$6,699,489
Labor Income (2015$)	$0	$0	$2,046,050	$2,046,050
MRIC Housing				
Employment	0	0	49	49
Output (2015$)	$0	$0	$6,699,489	$6,699,489
Labor Income (2015$)	$0	$0	$2,046,050	$2,046,050
No MRIC Hotel				
Employment	0	0	49	49
Output (2015$)	$0	$0	$6,699,489	$6,699,489
Labor Income (2015$)	$0	$0	$2,046,050	$2,046,050
Nishi Hotel				
Employment	0	0	49	49
Output (2015$)	$0	$0	$6,699,489	$6,699,489
Labor Income (2015$)	$0	$0	$2,046,050	$2,046,050

nishi_yolo_hh

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] IMPLAN definition applies all household spending changes to induced effects. Adjusts for spending patterns, taxes, savings, and estimated leakage.

Table D-6
Davis Innovation Centers - Economic Impact
Ongoing Activities - Total Household Spending, Yolo County Economy

Analysis/Measure	Effect			Total Impact
	Direct	Indirect	Induced [1]	
Base Development Program				
Employment	0	0	49	49
Output (2015$)	$0	$0	$6,699,489	$6,699,489
Labor Income (2015$)	$0	$0	$2,046,050	$2,046,050
MRIC Housing [2]				
Employment	0	0	49	49
Output (2015$)	$0	$0	$6,699,489	$6,699,489
Labor Income (2015$)	$0	$0	$2,046,050	$2,046,050
No MRIC Hotel				
Employment	0	0	49	49
Output (2015$)	$0	$0	$6,699,489	$6,699,489
Labor Income (2015$)	$0	$0	$2,046,050	$2,046,050
Nishi Hotel				
Employment	0	0	49	49
Output (2015$)	$0	$0	$6,699,489	$6,699,489
Labor Income (2015$)	$0	$0	$2,046,050	$2,046,050

total_yolo_hh

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] IMPLAN definition applies all household spending changes to induced effects. Adjusts for spending patterns, taxes, savings, and estimated leakage.

[2] Because the MRIC DEIR assumes all residents will work in the local economy, a conservative adjustment was made to avoid double-counting in the induced impact of jobs (see Table B-1). If the same non-student household spending pool assumptions used for Nishi are applied, then the total economic impact would show approximately 186 jobs, $25.5 million of output, and $7.8 million of labor income.

Table D-7
Davis Innovation Centers - Economic Impact
Ongoing Activities - MRIC Establishment Operations, Davis Economy

Analysis/Measure	Effect			Total Impact	Multiplier Effect [1]
	Direct	Indirect	Induced		
Base Development Program					
Employment	5,479	2,240	1,925	9,644	1.8
Output (2015$)	$1,819,886,520	$419,493,110	$240,930,828	$2,480,310,458	1.4
Labor Income (2015$)	$390,408,083	$123,300,298	$82,638,111	$596,346,492	1.5
MRIC Housing					
Employment	5,479	2,240	1,925	9,644	1.8
Output (2015$)	$1,819,886,520	$419,493,110	$240,930,828	$2,480,310,458	1.4
Labor Income (2015$)	$390,408,083	$123,300,298	$82,638,111	$596,346,492	1.5
No MRIC Hotel					
Employment	5,812	2,414	2,060	10,286	1.8
Output (2015$)	$1,948,485,631	$451,062,684	$257,773,466	$2,657,321,781	1.4
Labor Income (2015$)	$416,980,962	$132,654,649	$88,415,254	$638,050,865	1.5
Nishi Hotel					
Employment	5,479	2,240	1,925	9,644	1.8
Output (2015$)	$1,819,886,520	$419,493,110	$240,930,828	$2,480,310,458	1.4
Labor Income (2015$)	$390,408,083	$123,300,298	$82,638,111	$596,346,492	1.5

mric_davis_ind

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Measures incremental change to direct effect calculated by dividing total impact by direct effect.

Table D-8
Davis Innovation Centers - Economic Impact
Ongoing Activities - Nishi Establishment Operations, Davis Economy

Analysis/Measure	Effect			Total Impact	Multiplier Effect [1]
	Direct	Indirect	Induced		
Base Development Program					
Employment	1,043	345	342	1,729	1.7
Output (2015$)	$275,636,913	$61,623,680	$42,765,624	$380,026,217	1.4
Labor Income (2015$)	$72,870,293	$18,249,891	$14,667,605	$105,787,789	1.5
MRIC Housing					
Employment	1,043	345	342	1,729	1.7
Output (2015$)	$275,636,913	$61,623,680	$42,765,624	$380,026,217	1.4
Labor Income (2015$)	$72,870,293	$18,249,891	$14,667,605	$105,787,789	1.5
No MRIC Hotel					
Employment	1,043	345	342	1,729	1.7
Output (2015$)	$275,636,913	$61,623,680	$42,765,624	$380,026,217	1.4
Labor Income (2015$)	$72,870,293	$18,249,891	$14,667,605	$105,787,789	1.5
Nishi Hotel					
Employment	883	276	281	1,440	1.6
Output (2015$)	$225,331,660	$49,521,070	$35,183,265	$310,035,995	1.4
Labor Income (2015$)	$60,311,577	$14,646,748	$12,066,953	$87,025,278	1.4

nishi_davis_ind

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Measures incremental change to direct effect calculated by dividing total impact by direct effect.

Table D-9
Davis Innovation Centers - Economic Impact
Ongoing Activities - Total Establishment Operations, Davis Economy

Analysis/Measure	Effect			Total Impact	Multiplier Effect [1]
	Direct	Indirect	Induced		
Base Development Program					
Employment	6,522	2,585	2,267	11,373	1.7
Output (2015$)	$2,095,523,433	$481,116,790	$283,696,452	$2,860,336,675	1.4
Labor Income (2015$)	$463,278,376	$141,550,189	$97,305,716	$702,134,281	1.5
MRIC Housing					
Employment	6,522	2,585	2,267	11,373	1.7
Output (2015$)	$2,095,523,433	$481,116,790	$283,696,452	$2,860,336,675	1.4
Labor Income (2015$)	$463,278,376	$141,550,189	$97,305,716	$702,134,281	1.5
No MRIC Hotel					
Employment	6,855	2,759	2,401	12,015	1.8
Output (2015$)	$2,224,122,544	$512,686,364	$300,539,090	$3,037,347,998	1.4
Labor Income (2015$)	$489,851,255	$150,904,540	$103,082,859	$743,838,654	1.5
Nishi Hotel					
Employment	6,362	2,516	2,206	11,084	1.7
Output (2015$)	$2,045,218,180	$469,014,180	$276,114,093	$2,790,346,453	1.4
Labor Income (2015$)	$450,719,660	$137,947,046	$94,705,064	$683,371,770	1.5

total_davis_ind

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Measures incremental change to direct effect calculated by dividing total impact by direct effect.

Table D-10
Davis Innovation Centers - Economic Impact
Ongoing Activities - MRIC Establishment Operations, Yolo County Economy

Analysis/Measure	Effect			Total Impact	Multiplier Effect [1]
	Direct	Indirect	Induced		
Base Development Program					
Employment	5,479	3,248	1,935	10,662	1.9
Output (2015$)	$1,819,886,520	$583,163,084	$246,572,259	$2,649,621,863	1.5
Labor Income (2015$)	$390,408,083	$175,497,174	$85,487,238	$651,392,495	1.7
MRIC Housing					
Employment	5,479	3,248	1,935	10,662	1.9
Output (2015$)	$1,819,886,520	$583,163,084	$246,572,259	$2,649,621,863	1.5
Labor Income (2015$)	$390,408,083	$175,497,174	$85,487,238	$651,392,495	1.7
No MRIC Hotel					
Employment	5,812	3,493	2,071	11,376	2.0
Output (2015$)	$1,948,485,631	$626,391,674	$263,965,433	$2,838,842,739	1.5
Labor Income (2015$)	$416,980,962	$188,410,384	$91,462,726	$696,854,072	1.7
Nishi Hotel					
Employment	5,479	3,248	1,935	10,662	1.9
Output (2015$)	$1,819,886,520	$583,163,084	$246,572,259	$2,649,621,863	1.5
Labor Income (2015$)	$390,408,083	$175,497,174	$85,487,238	$651,392,495	1.7

mric_yolo_ind

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Measures incremental change to direct effect calculated by dividing total impact by direct effect.

Table D-11
Davis Innovation Centers - Economic Impact
Ongoing Activities - Nishi Establishment Operations, Yolo County Economy

Analysis/Measure	Effect			Total Impact	Multiplier Effect [1]
	Direct	Indirect	Induced		
Base Development Program					
Employment	1,043	477	344	1,864	1.8
Output (2015$)	$275,636,913	$83,885,750	$43,186,873	$402,709,536	1.5
Labor Income (2015$)	$72,870,293	$24,847,994	$14,706,116	$112,424,403	1.5
MRIC Housing					
Employment	1,043	477	344	1,864	1.8
Output (2015$)	$275,636,913	$83,885,750	$43,186,873	$402,709,536	1.5
Labor Income (2015$)	$72,870,293	$24,847,994	$14,706,116	$112,424,403	1.5
No MRIC Hotel					
Employment	1,043	477	344	1,864	1.8
Output (2015$)	$275,636,913	$83,885,750	$43,186,873	$402,709,536	1.5
Labor Income (2015$)	$72,870,293	$24,847,994	$14,706,116	$112,424,403	1.5
Nishi Hotel					
Employment	883	383	283	1,549	1.8
Output (2015$)	$225,331,660	$67,549,639	$35,462,588	$328,343,887	1.5
Labor Income (2015$)	$60,311,577	$20,026,600	$12,085,852	$92,424,029	1.5

nishi_yolo_ind

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Measures incremental change to direct effect calculated by dividing total impact by direct effect.

Table D-12
Davis Innovation Centers - Economic Impact
Ongoing Activities - Total Establishment Operations, Yolo County Economy

Analysis/Measure	Effect			Total Impact	Multiplier Effect [1]
	Direct	Indirect	Induced		
Base Development Program					
Employment	6,522	3,725	2,279	12,526	1.9
Output (2015$)	$2,095,523,433	$667,048,834	$289,759,132	$3,052,331,399	1.5
Labor Income (2015$)	$463,278,376	$200,345,169	$100,193,354	$763,816,898	1.6
MRIC Housing					
Employment	6,522	3,725	2,279	12,526	1.9
Output (2015$)	$2,095,523,433	$667,048,834	$289,759,132	$3,052,331,399	1.5
Labor Income (2015$)	$463,278,376	$200,345,169	$100,193,354	$763,816,898	1.6
No MRIC Hotel					
Employment	6,855	3,970	2,414	13,239	1.9
Output (2015$)	$2,224,122,544	$710,277,425	$307,152,306	$3,241,552,275	1.5
Labor Income (2015$)	$489,851,255	$213,258,378	$106,168,842	$809,278,475	1.7
Nishi Hotel					
Employment	6,362	3,631	2,218	12,211	1.9
Output (2015$)	$2,045,218,180	$650,712,723	$282,034,847	$2,977,965,750	1.5
Labor Income (2015$)	$450,719,660	$195,523,774	$97,573,090	$743,816,524	1.7

total_yolo_ind

Source: IMPLAN, 2013 Data and EPS.

Note: Because the sensitivity analyses focus on changes to specific factors within an individual project, some measures and related results remain constant across projects and scenarios.

[1] Measures incremental change to direct effect calculated by dividing total impact by direct effect.

EXHIBIT 2:

Fiscal Impact Analysis

EXHIBIT 2 MEMORANDUM

To: City of Davis

From: David Zehnder and Amy Lapin

Subject: Davis Innovation Centers Fiscal Impact Analysis; EPS #152006

Date: September 8, 2015

The Economics of Land Use

Introduction

The City of Davis (City) retained Economic & Planning Systems, Inc. (EPS) to prepare a Fiscal Impact Analysis (Analysis) for the City of Davis (City) on behalf of Yolo 101 Joint Venture (JV) and R&B Delta, LLC representing the Mace Ranch Innovation Center (MRIC) project and Nishi Gateway LLC representing the Nishi Gateway Innovation District (Nishi) project. Collectively, these projects are referred to as a singular "Project" although each project is evaluated individually as well as in aggregate in this Analysis. The MRIC project is currently located in unincorporated Yolo County (County). The Nishi project is largely located in the unincorporated County and the City's adopted Sphere of Influence (SOI) with a small portion already located within the City's boundary. See **Map 1** for the MRIC and Nishi project locations.

The Analysis estimates the overall fiscal impacts to the City's General Fund, based on development of the proposed Project following annexation into the City. The objective of the Analysis is to determine whether the Project will generate adequate revenues at buildout to meet the costs of providing new development with City services (e.g., police protection, fire protection). The Analysis is based on the assumption that the unincorporated portion of the Project will be annexed into the City and municipal services will be provided by the City.

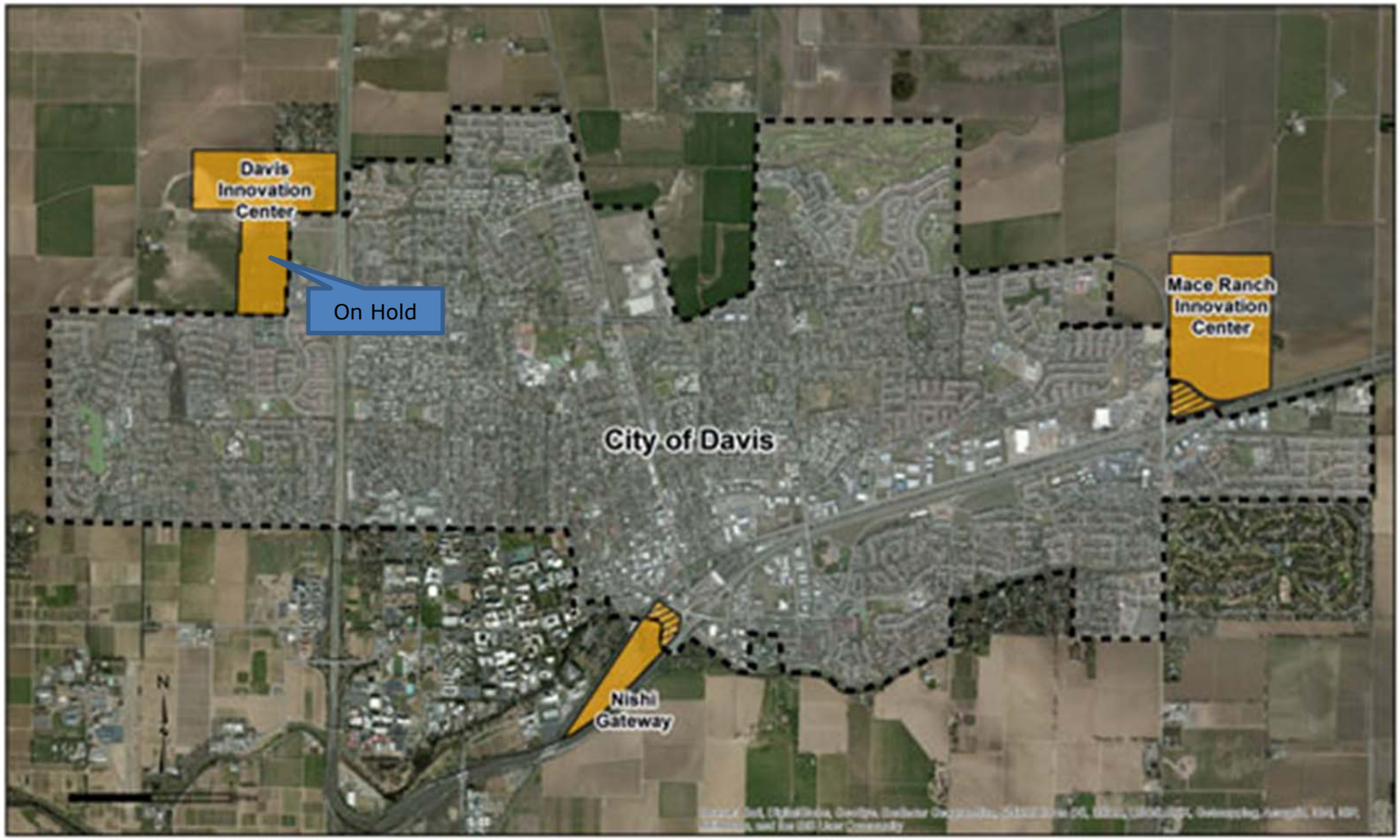
This memorandum and the attached technical appendices describe the methodology, assumptions, and results of the Analysis under a "Base Development Program," as defined later in this memorandum. This Analysis also evaluates the net fiscal impacts under several sensitivity scenarios, as described later in this memorandum, and presents the results of these scenarios in summary only.

Economic & Planning Systems, Inc.
2295 Gateway Oaks Drive, Suite 250
Sacramento, CA 95833-4210
916 649 8010 tel
916 649 2070 fax

Oakland
Sacramento
Denver
Los Angeles

www.epsys.com

Map 1
Proposed Innovation Centers in Davis



Base Development Program

The Base Development Program represents a set of land uses and key assumptions that are described in the sections of this memorandum and attached technical appendices (**Appendix A** through **Appendix E**). This Analysis also evaluates a set of sensitivity scenarios that modify the Base Development Program land uses and key assumptions. These sensitivity scenarios are described in further detail at the end of the memorandum, with fiscal impact analysis summaries for each sensitivity scenario provided in **Appendix F**.

At buildout, the Base Development Program comprises 650 residential units and 3.1 million building square feet of nonresidential uses. Specific land uses for each project used in the Analysis are described below.

- **MRIC.** The Base Development Program for MRIC includes 2.7 million building square feet of nonresidential uses and does not include any residential uses. Nonresidential uses include: nearly 1.4 million square feet of office/flex/research & development (R&D) uses; about 950,000 square feet of industrial manufacturing uses; 125,000 square feet of retail uses; one 160,000 square foot hotel; and about 128,000 square feet of public/nonprofit uses.[1] These land uses are consistent with the August 2015 MRIC Draft Environmental Impact Report (DEIR) and includes proposed development in MRIC and the Mace Triangle.[2]

- **Nishi.** The Base Development Program for Nishi includes 650 high-density residential units (approximately 30 percent are assumed to be ownership condominiums; while the remaining 70 percent are assumed to be rental apartments), and about 401,000 building square feet of nonresidential uses. Nonresidential uses include: 245,000 square feet of office/flex/R&D uses; 28,000 square feet of manufacturing uses; about 48,000 square feet of retail uses; and over 80,000 square feet of public/nonprofit uses. These land uses are consistent with the September 2015 Nishi Draft EIR and includes proposed development in the Nishi Gateway area and Olive Drive area.[3]

---

[1] This Analysis includes two sensitivity scenarios which evaluate modifications to MRIC's Base Development Program land uses. **Scenario 1** evaluates the net fiscal impacts of the addition of 850 residential dwelling units; **Scenario 2** evaluates the net fiscal impacts of the Project assuming the planned hotel is not developed. These scenarios are described in further detail at the end of this memorandum.

[2] While the MRIC DEIR evaluates the environmental impacts of proposed development in the Mace Triangle, some sections of the document may not include Mace Triangle land uses.

[3] The Nishi Gateway Area is bounded by the Union Pacific Railroad and UC Davis Campus to the northwest, Putah Creek to the northeast, and Interstate 80 (I-80) to the south. The Nishi Gateway Area is located in the unincorporated County. The Olive Drive area is bounded by Richards Blvd. to the northeast, the I-80/Richards Blvd. Interchange to the southeast, Putah Creek to the southwest, and the Union Pacific railroad to the northwest. The Olive Drive area is currently in the boundaries of the City.

Summary of Results

Base Development Program

Below is a summary table illustrating the estimated net fiscal impacts to the City's General Fund under the Base Development Program. At buildout, the Project is estimated to generate an annual net fiscal surplus of approximately $2.1 million for the City's General Fund. At buildout, the MRIC project is estimated to generate an annual net fiscal surplus of nearly $2.2 million for the City's General Fund. The Nishi project is estimated to produce an annual net General Fund deficit of approximately $78,000 at buildout. A detailed summary of Project revenues and expenditures at buildout is provided in **Table 1**.

These results assume a 50%/50% property tax sharing allocation between the City and County of the applicable property tax rate for the portion of the Project in the unincorporated County.[4] Other key assumptions used to derive this estimated net fiscal impact are described throughout this memorandum.

Estimated Annual Fiscal Impact Summary at Buildout (2015$)

Fund	Base Development Program		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = a + b*
City General Fund			
Annual Revenues	$3,786,000	$1,273,000	$5,059,000
Annual Expenditures	$1,585,000	$1,351,000	$2,936,000
Annual General Fund Surplus/(Deficit)	**$2,201,000**	**($78,000)**	**$2,123,000**

buildout

Source: EPS.

Two primary reasons that account for the annual net fiscal deficit estimated for the Nishi project include: 1) the inclusion of 650 residential units; and 2) an assumed 80,000 square feet of public/nonprofit space (20% of total nonresidential space).[5] Residential development – in particular higher-density, moderately valued residential development – is often a net fiscal burden on a city's operating budget. That is, the cost of providing municipal services can exceed General Fund revenues (e.g., property tax revenue, sales tax revenue) generated per unit. However, cities desire residential land uses to accommodate a balance of land uses, provide workforce housing, and fulfill other policy objectives. For the Nishi project in particular, the presence of housing is a positive attribute that will enhance the mixed-use character valued in innovation centers and may improve the internal economics of the project (e.g., lease rates, land

[4] This Analysis also evaluates two sensitivity scenarios that examine the net fiscal impacts of the Project assuming both a higher and lower property tax allocation split for the City. More details regarding the assumptions and methodology of estimating property tax revenue under the Base Development Program and sensitivity scenarios is provided later in the memorandum.

[5] Although the MRIC project has more public/nonprofit square footage (about 128,000 square feet), it is estimated to comprise only 5-percent of total nonresidential square footage.

Table 1
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual General Fund Revenue and Expenditure Summary at Buildout (2015$)

Base Development Program

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [1]			
Property Taxes	$381,000	$227,000	$608,000
Property Tax In-Lieu of Vehicle License Fees	$502,000	$249,000	$751,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$744,000	$185,000	$929,000
Property Tax in-Lieu of Sales Tax	$248,000	$62,000	$310,000
Transient Occupancy Tax	$714,000	$0	$714,000
Business License Tax	$398,000	$50,000	$448,000
Municipal Service Tax	$281,000	$90,000	$371,000
Franchise Fees	$43,000	$36,000	$79,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$25,000	$20,000	$45,000
Total General Fund Revenues	**$3,370,000**	**$1,104,000**	**$4,474,000**
Other Annual Non-General Fund Revenues [1] [2]			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$49,000	$40,000	$89,000
Prop. 172 Public Safety Sales Tax	$26,000	$7,000	$33,000
Public Safety Tax	$341,000	$85,000	$426,000
Total Other Non-General Fund Revenues	**$416,000**	**$169,000**	**$585,000**
Total Annual General Fund and Non-General Fund Revenues	**$3,786,000**	**$1,273,000**	**$5,059,000**
Annual General Fund Expenditures [3]			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$69,000	$57,000	$126,000
Administrative Services	$71,000	$59,000	$130,000
Community Dev. & Sustainability	$71,000	$59,000	$130,000
Community Services	$170,000	$141,000	$311,000
Parks & Open Space Management	$0	$127,000	$127,000
Fire	$376,000	$312,000	$688,000
Police	$639,000	$530,000	$1,169,000
Public Works	$174,000	$54,000	$228,000
Total General Fund Expenditures	**$1,585,000**	**$1,351,000**	**$2,936,000**
Annual General Fund Surplus/(Deficit)	**$2,201,000**	**($78,000)**	**$2,123,000**

summary

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] See Table B-1 for details on revenue estimating procedures.
[2] Reflects additional revenues used to fund General Fund expenditures.
[3] See Table C-1 for details on expenditure estimating procedures.

values). Similarly, public/nonprofit space is estimated to be a net fiscal burden on a city's General Fund because of low General Fund revenue generation (i.e., public/nonprofit uses are assumed to be exempt from paying property tax revenue and real property transfer tax revenue, and are not estimated to generate any onsite taxable sales tax revenue). However, this type of space – in particular for the Nishi project – has the potential to attract University of California at Davis (UC Davis)-related users, capitalizing on the university's research strengths, strengthening the local innovation ecosystem and local project economics.

The fiscal impact analysis is predicated on a set of assumptions that reflect current, conservative economic and demographic conditions.[6] The annual net fiscal deficit produced by the Nishi project may be lessened by actual conditions that are more favorable than those modeled in this Analysis. For example, a moderate increase in taxable sales generated by the onsite retail and other nonretail, nonresidential uses will produce additional sales tax revenue that may diminish the estimated annual deficit for the City's General Fund. In addition, a higher property tax sharing allocation for the City or the addition of a potential hotel project onsite may result in an annual net fiscal surplus for the City's General Fund. Finally, privatization of parks, open space, and public works maintenance obligations may also result in an annual net fiscal surplus for the City's General Fund. The details of these potential amendments to the Base Development Program (sensitivity scenarios) are discussed in detail throughout the memorandum.

Sensitivity Scenarios

This Analysis includes ten sensitivity scenarios which recognize that key modifications to the Base Development Program could have notable impacts on the net fiscal impacts of the Project. Specifically, the Analysis evaluates modifications to Project land uses and specific key revenue and expenditure assumptions. **Table 2** provides an overview of each sensitivity scenario, their annual fiscal impacts at Project buildout, and the total change in net fiscal impacts at buildout related to the Base Development Program. A detailed description of each scenario is provided at the end of this memorandum and a detailed summary of the net fiscal impacts for each scenario is provided in **Appendix F**.

[6] As a conservative assumption, this Analysis excludes Measure O, the City's current additional 1-percent sales tax rate to fund General Fund services, which was approved by voters and is anticipated to sunset on December 31, 2020. Additional details are provided later in this memorandum.

Table 2
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Fiscal Impacts of Sensitivity Scenarios (2015$)

	Fiscal Impact Analysis Scenario	Item	Annual Fiscal Impacts at Buildout MRIC	Nishi	Total
Base Development Program [1]			**$2,201,000**	**($78,000)**	**$2,123,000**
Sensitivity Scenarios					
1	**MRIC Housing** *Optional addition of 850 dwelling units (340 owner-occupied; 510 renter-occupied). Includes no change to planned commercial square*	**Total Annual Fiscal Impacts** Difference from Base	**$1,966,000** ($235,000)	**($78,000)** $0	**$1,888,000** ($235,000)
2	**No MRIC Hotel** *Assumes the planned hotel in MRIC is not developed. In its place, 160,000 square feet of additional R&D Flex and Offices uses are developed.*	**Total Annual Fiscal Impacts** Difference from Base	**$1,469,000** ($732,000)	**($78,000)** $0	**$1,391,000** ($732,000)
3	**Nishi Hotel** *Optional addition of 70,000 sq. ft., 125-room hotel in Nishi. Assumes displacement of 70,000 square feet of Office, Flex, Industrial Commercial, and Public/Nonprofit uses.*	**Total Annual Fiscal Impacts** Difference from Base	**$2,201,000** $0	**$416,000** $494,000	**$2,617,000** $494,000
4	**Property Tax Sharing Allocation: Alt. 1** *The Base Development Program assumes a 50%/50% split of the applicable property tax rate between the City and County. This alternative assumes a 75%/25% allocation to the City and County.*	**Total Annual Fiscal Impacts** Difference from Base	**$2,392,000** $191,000	**$24,000** $102,000	**$2,416,000** $293,000
5	**Property Tax Sharing Allocation: Alt. 2** *The Base Development Program assumes a 50%/50% split of the applicable property tax rate between the City and County. This alternative assumes a 25%/75% allocation to the City and County.*	**Total Annual Fiscal Impacts** Difference from Base	**$2,011,000** ($190,000)	**($179,000)** ($101,000)	**$1,832,000** ($291,000)

Table 2
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Fiscal Impacts of Sensitivity Scenarios (2015$)

	Fiscal Impact Analysis Scenario	Item	Annual Fiscal Impacts at Buildout MRIC	Nishi	Total
Base Development Program [1]			**$2,201,000**	**($78,000)**	**$2,123,000**
Sensitivity Scenarios					
6	**Increased Taxable Sales** *This sensitivity scenario models increased taxable sales per square foot assumptions (relative to the Base Development Program), based on data from land uses in the 2nd Street Corridor and Interland URP.*	**Total Annual Fiscal Impacts** Difference from Base	**$3,305,000** $1,104,000	**($17,000)** $61,000	**$3,288,000** $1,165,000
7	**Sales Tax Capture: Alt. 1** *The Base Development Program assumes a 50% capture rate of taxable sales generated by Project development within the City. This alternative assumes a 75% capture rate.*	**Total Annual Fiscal Impacts** Difference from Base	**$2,250,000** $49,000	**($25,000)** $53,000	**$2,225,000** $102,000
8	**Sales Tax Capture: Alt. 2** *The Base Development Program assumes a 50% capture rate of taxable sales generated by Project development within the City. This alternative assumes a 25% capture rate.*	**Total Annual Fiscal Impacts** Difference from Base	**$2,155,000** ($46,000)	**($134,000)** ($56,000)	**$2,021,000** ($102,000)
9	**Ongoing Operations & Maintenance Responsibility: Alt. 1** *The Base Development Program assumes ongoing operations and maintenance will either be publicly- or privately-funded. Refer to Table E-1 and Table E-2 for a listing of these items and the assumed responsibility for the Base and Alternative scenarios.*	**Total Annual Fiscal Impacts** Difference from Base	**$2,126,000** ($75,000)	**$55,000** $133,000	**$2,181,000** $58,000
10	**Ongoing Operations & Maintenance Responsibility: Alt. 2** *The Base Development Program assumes ongoing operations and maintenance will either be publicly- or privately-funded. Refer to Table E-1 and Table E-2 for a listing of these items and the assumed responsibility for the Base and Alternative scenarios.*	**Total Annual Fiscal Impacts** Difference from Base	**$2,375,000** $174,000	**$103,000** $181,000	**$2,478,000** $355,000

alternatives

Source: City of Davis; EPS.

[1] Represents the Base Development Program as described in the memorandum and documented in the attached technical appendices.

Memorandum Overview

This memorandum describes the Base Development Program associated with the Project, the net fiscal impacts to the City's General Fund, and concisely describes the assumptions and methodology used to estimate the net fiscal impacts of the Project.

The data, assumptions, and detailed calculations underlying the Base Development Program are shown in **Appendices A** through **E** (**Tables A-1** through **E-2**) of this memorandum:

- **Appendix A** identifies the proposed land uses and general assumptions used in this Analysis.
- **Appendix B** identifies the projected annual revenues that will be generated by the Project for the City's General Fund.
- **Appendix C** details the estimated annual expenditures for the City to provide General Fund services to the Project.
- **Appendix D** provides supporting revenue calculations. Specifically, this appendix includes details on the estimated property tax rate for the City following annexation; assessed values of future anticipated development within the Project, which serve as the basis for calculating property tax revenues; and estimated household income, which is used to derive sales tax revenue from existing and future households within the Project area.
- **Appendix E** summarizes infrastructure facility maintenance funding obligations under the Base Development Program, as well as two alternative funding scenarios (evaluated as sensitivity scenarios).
- **Appendix F** contains the net fiscal impact analysis summaries for each sensitivity scenario.

Methodology and Assumptions

This section details the underlying methodology and assumptions used to estimate the fiscal impact of the Project on the City's General Fund. Specifically, this section details the methodology used to forecast the Project's General Fund revenues and expenditures at buildout. In addition, this section describes assumptions concerning municipal service delivery, land use development, and General Fund budgeting.

Citywide Services

This Analysis examines the Project's ability to generate adequate revenues to fund the City's costs of providing public services to the proposed Project. The services analyzed in this study comprise City General Fund services (e.g., police, fire, general government).

This Analysis does not address activities budgeted in other Governmental Funds or Proprietary Funds (e.g., Water Fund, Sewer Fund, Storm Sewer Fund), nor does it include an evaluation of capital facilities or funding of capital facilities needed to serve new development. In addition, this Analysis excludes the ongoing operations and maintenance of Project facilities that are proposed to be funded through private sources (e.g., lighting and landscape district; Mello-Ross community facilities district [CFD] for services). Refer to **Appendix E** for a listing of maintenance items proposed to be privately funded under the Base Development Program and two alternative maintenance-funding scenarios, analyzed as sensitivity scenarios.

General Assumptions

The Analysis is based on the City's Fiscal Year (FY) 2015–16 City Council Adopted Budget, tax regulations and statutes current as of August 2015, and other general assumptions discussed herein. Each revenue and expenditure item is estimated based on current State of California (State) legislation and current City practices. Future changes by State legislation or City practices can affect the revenues and expenditures estimated in this Analysis. All revenues and expenditures are shown in constant 2015 dollars, and general fiscal and demographic assumptions are detailed in **Table A-1** in **Appendix A**.

EPS consulted the City's budget documents to develop forecasting methodologies for specific revenues and expenditures affected by new development in the proposed Project. In addition, EPS consulted with the City Finance Department to clarify budget data and review assumptions and Analysis results related to revenue and expenditure estimates. This Analysis also uses information from the following sources: Project applicants; Project DEIRs and supporting documents; County Assessor and Auditor-Controller; State Department of Finance (DOF); State Board of Equalization (BOE); the U.S. Bureau of Labor Statistics (BLS); and subscription-based data sources (e.g., CoStar; Smith Travel Research).

The actual fiscal impacts of new development in the Project will vary from those presented in this study if development plans or other assumptions (e.g., assessed valuations, sales tax revenue assumptions) change from those on which this Analysis is based.

Development Assumptions

The following list documents land use and other development-related assumptions used in the Analysis, as summarized in **Tables A-2** through **A-5**:

- **Total and Occupied Land Uses**. **Table A-2** provides the residential and nonresidential land uses associated with the Base Development Program at buildout. **Table A-3** summarizes occupied dwelling units and nonresidential building square feet, assuming 5-year average vacancy rates for land uses in Davis.

- **Estimated Population**. Projections of future residents are calculated using an average persons-per-household factor provided by the City of Davis. Employment density estimates are based on average square feet per employee factors based on data from existing development in the 2nd Street Corridor and Interland University Research Park (URP), Urban Land Institute (ULI), and subscription-based data (ESRI, CoStar) and EPS's experience with employment densities for suburban retail, office, industrial, and hotel land uses.[7] In estimating certain annual revenues and expenditures (service demands) related to the Project, EPS developed a "persons served" population estimate to approximate the impacts of an employee in Project nonresidential land uses as compared to a Project resident. EPS uses a factor of 0.5 employees plus all residents to derive the Project's "persons served" population. Estimated residential, employment, and persons served populations are provided in **Table A-4**.

[7] The 2nd Street Corridor and Interland University Research Park are two districts located in the City that exhibit many characteristics similar to an innovation center.

- **Analysis Assumptions**. The Analysis is based on key assumptions including average assessed value per residential unit and building square foot and property turnover rates, as shown in **Table A-5**.

  - **Assessed Values.** Andy Plescia and the Goodwin Consulting Group provided owner-occupied and renter-occupied residential assessed values per unit, current as of July 2015. Commercial assessed values per building square foot were based on myriad sources including: current FY 2014-15 assessed values for similar land uses in the City of Davis and Sacramento region; current brokerage listings for similar land uses in the City and Sacramento region; and interviews with local real estate professionals. This Analysis assumes public/nonprofit uses will be exempt from paying property tax revenue and thus have no assessed value.

  - **Property Turnover Rates.** The Analysis is based on the assumption that a for-sale residential unit would turn over once every 10 years, and nonresidential properties, including rental residential units, would turn over once every 20 years. These assumptions are based on EPS research on real property turnover rates in the Sacramento Region.

Revenue-Estimating Methods and Assumptions

EPS uses either an average-revenue approach or a marginal-revenue case study approach to estimate Project-related annual General Fund revenues and additional non-General Fund revenues that are used to fund General Fund expenditures.

- The **average-revenue approach** uses the City's FY 2015–16 budgeted revenues on a citywide per capita or per-persons-served basis to forecast revenues derived from estimated future residents and employees of the Project.[8]

- The **marginal-revenue case study approach** simulates estimated revenue generation resulting from new development. The case-study approach for estimating property tax revenues, for instance, forecasts the increase in assessed valuation of Project property as well as the share of property taxes that would be allocated to the City's General Fund. Case studies used in this Analysis are discussed in detail later in this section.

This Analysis excludes revenue sources that are *not* expected to increase because of new development. These sources of revenue are assumed to be unaffected by development because they are either one-time revenue sources not guaranteed to be available in the future or there is no direct relationship between new Project development and increased revenue.

A listing of all City General Fund and other non-General Fund revenues and the corresponding estimating procedure used to forecast future Project revenues is shown in **Table B-1**.

[8] A *per capita* basis of estimating revenues assumes that only residents have a fiscal impact on City revenues. A *per-persons-served* basis of estimating revenues is used to take into account that businesses (and their employees) have a fiscal impact on many City revenues but at a lower level than residential development's impact.

A summary of estimated annual General Fund and other non-General Fund revenues generated by the Project at buildout is provided in **Table B-2**. As shown, the Project is estimated to generate about $4.5 million in General Fund revenues and about $585,000 in other non-General Fund revenues for a total of $5.1 million in annual revenues at buildout. Of this total, the MRIC project is estimated to generate about $3.8 million and the Nishi project is estimated to generate nearly $1.3 million in annual revenues for the City. Revenues associated with the marginal-revenue case study approach are detailed in the next sections.

Property Tax

Estimated annual property tax revenue resulting from Project development is shown in **Table B-3**. The MRIC project is contained in one Tax Rate Area (TRA) currently located within the unincorporated County. The Nishi project falls within two TRAs, one within the unincorporated County (Nishi Gateway area) and one within the City (Olive Drive area).

The property taxes the City will receive from the Project are derived from the total assessed value of the Project, as shown in **Table D-2**, and the City's post-annexation, post-Educational Revenue Augmentation Fund (ERAF) share of the 1 percent ad valorem property tax in the tax rate areas (TRA) comprising the Project, as shown in **Table D-1**. Note that all proposed residential and commercial development, with the exception of estimated commercial public/nonprofit land uses, are assumed to pay property tax.

Property Tax Sharing Allocation

Table D-1 shows the property tax allocation factors before and following annexation. The Project's annexation into the City will be contingent on a negotiated exchange of property tax revenue and the City and County have not concluded discussions to determine a property tax-sharing arrangement related to the Project. Because such an agreement is not in place, this Analysis, under the Base Development Program, uses a 50%/50% property tax sharing split of the applicable property tax rate. Under a revenue-sharing agreement, it is assumed that the following taxing entities identified in the Project's TRAs would be subject to tax sharing between the City and County:

- County General Fund
- County Accumulative Capital Overlay (ACO) Fund

Property Tax Sharing Allocation Sensitivity Scenarios

EPS developed two sensitivity analyses to examine the impacts of a property tax sharing allocation for the City that was both higher and lower than the Base Development Program. These alternative property tax sharing allocation scenarios (**Scenario 4** and **Scenario 5**) are described in detail at the end of this memorandum.

Property Tax in Lieu of Vehicle License Fee

The Analysis uses a formula provided by the California State Controller's Office to forecast Property Tax in Lieu of Vehicle License Fee (PTIL VLF). PTIL VLF is calculated by taking the percentage increase in the City's assessed value resulting from the Project and applying that percentage increase to the City's current State allocation of PTIL VLF revenue, as shown in the City's FY 2015-16 budget. This calculation is shown in **Table B-3**.

Real Property Transfer Tax

Real property transfer tax is based on the assessed value of the proposed Project land uses and the anticipated turnover of residential nonresidential property over time. This Analysis is based on the assumption that the proposed Project's residential owner-occupied property will turn over 10 percent per year (or once every 10 years) and residential renter-occupied and nonresidential property will turn over 5 percent per year (or once every 20 years). As noted previously, this Analysis assumes public/nonprofit uses do not have an assessed value. As a conservative assumption, this Analysis assumes that these land uses, in the event the property turns over, would continue to be owned by public/non-profit uses, which are exempt from paying this tax pursuant to California Revenue and Tax Code §11921-11930. Real property transfer tax revenue projections are identified in **Table B-4**.

Sales Tax

The sales tax components examined in this Analysis include the Bradley-Burns local 1-percent rate and a revenue-neutral factor to estimate the State-mandated exchange of 25 percent of sales tax revenue for PTIL VLF revenue. City voters recently approved an additional 1-percent sales tax rate to fund General Fund services (Measure O). The Measure O general sales and use tax rate is authorized through December 31, 2020. As a conservative assumption, this Analysis assumes Measure O will not be renewed and, because buildout of the Project is anticipated to occur after this date, this additional sales tax rate is excluded. Estimated annual sales tax and PTIL VLF revenues to the City are summarized in **Table B-5**.

EPS uses a combination of methodologies to account for taxable sales generated by the Project.

1. **Market Support Method**. This methodology measures taxable sales generated from new Project households and employees spending money within the City's boundaries.
2. **Retail Space Method.** This methodology estimates taxable sales from new retail uses in the Project.
3. **Business-to-Business Taxable Sales.** This methodology estimates taxable sales generated by non-retail businesses in the Project.

Market Support Method

This methodology measures taxable retail expenditures by future Project residents and employees (excluding residents estimated to be employed onsite) and the portion of expenditures that would be captured in the City (i.e., sales in the City's retail establishments).

New residents are estimated to spend approximately 24 to 25 percent of their household income on taxable retail expenditures. Household income, based on estimated residential values, and associated income spent on taxable retail expenditures are detailed in **Table D-3**. The Analysis conservatively estimates the City will capture about 50 percent of Project households' taxable retail expenditures. That is, half of the taxable retail expenditures of Project households (50 percent) are estimated to occur in competing retail outlets outside of the City.

New employees (excluding residents estimated to be employed onsite) are estimated to spend an average of $20 in taxable retail expenditures per day for each of the 240 workdays annually.[9] This Analysis conservatively estimates the City will capture approximately 50 percent of taxable sales from the Project's new employees. This estimate is not based on a market analysis; rather, EPS developed the capture rate based on a qualitative appraisal of existing shopping opportunities in the City.

Of the amount estimated to be captured within the City, EPS estimates 10 percent of household expenditures and 30 percent of employee expenditures will be captured by the retail development within the Project. The remainder will be captured within the City outside of the Project.

Refer to **Table B-5A** for estimated annual taxable sales from market support at buildout of the Project.

Retail Space Method

The retail land uses in the Project will generate taxable retail sales in excess of taxable sales generated from Project residents and employees (market support). That is, other consumers outside of the Project will purchase taxable goods and services from the Project's retail development.

Annual taxable sales generated by retail businesses in the Project are calculated based on an "annual sales-per-square-foot" factor published in the Urban Land Institute's *Dollars and Cents of Shopping Centers: 2008* (escalated to 2015 dollars) and proposed retail building square feet at buildout of the Project.

Annual taxable sales generated by retail businesses are estimated net of market support captured within the Project. In addition, consistent with the findings of the MRIC DEIR, this Analysis does not assume there will be a shift from retail establishments in the City to the Project if retail development in the Project is phased appropriately.

Refer to **Table B-5B** for estimated annual taxable sales from onsite retail development at buildout of the Project.

---

[9] Project residents assumed to work onsite is derived from the project DEIRs. The MRIC DEIR indicates, under the MRIC Housing alternative (**Scenario 1**), that 100 percent of project residents are assumed to work onsite; the Base Development Program does not contain any residential units and thus, does not contain any residents. The Nishi DEIR assumes that about 48 households (136 residents or about 8 percent of total project residents) will work onsite.

For MRIC, under the MRIC Housing alternative, a lower percentage of project residents working onsite (less than 100 percent) would generate a greater amount of sales tax revenue and thus, increase the annual net fiscal revenues estimated for the City's General Fund. For Nishi, a lower percentage of project residents working onsite (less than 8 percent) would also generate a nominally greater amount of sales tax revenue and nominally decrease the estimated annual net fiscal deficit to the City's General Fund; a higher percentage of Nishi project residents working onsite (greater than 8 percent) would increase the estimated annual net fiscal deficit to the City's General Fund.

Business-to-Business Taxable Sales

In addition to taxable sales generated by retail uses in the Project, EPS recognized that the type of uses proposed for the Project (innovation-oriented office, R&D/Flex, and industrial manufacturing) have the potential to generate significant annual sales tax revenue. EPS consulted myriad sources to determine appropriate, albeit conservative, estimates of annual taxable sales per square foot generated by proposed nonretail uses in the Project. EPS reviewed actual annual taxable sales data over the five years for nonretail uses in the 2nd Street Corridor and Interland URP. In addition, EPS reviewed published taxable sales data in the City and County from the State BOE and calculated estimated taxable sales per square foot for aggregated office, R&D/Flex, and industrial uses. And, EPS consulted any publicly available, recent published reports that cited taxable sales per square foot for nonretail uses.

Under the Base Development Program, EPS identified a conservative set of taxable sales per square foot assumptions for nonretail uses. These assumptions are significantly lower than actual taxable sales data from the 2nd Street Corridor and Interland URP nonretail land uses, and consistent with the findings from other resources described above. EPS did not choose to use the actual taxable sales data in the Base Development Program because of a small sample size. The estimated annual business-to-business taxable sales from Project development at buildout are shown in **Table B-5B**.

Sales Tax Sensitivity Scenarios

This Analysis evaluates the net fiscal impacts of the Project assuming higher taxable sales for retail uses and nonretail uses consistent with actual taxable sales data from 2nd Street Corridor and Interland URP nonretail land uses. This sensitivity scenario (**Scenario 6**) is described in detail at the end of this memorandum.

This Analysis also evaluates the net fiscal impacts of the Project assuming both a higher and lower capture of annual sales tax revenue generated from market support. These sensitivity scenarios (**Scenario 7** and **Scenario 8**) are described in detail at the end of this memorandum.

Proposition 172 Public Safety Sales Tax

Public safety sales tax is collected on a countywide basis and allocated principally to the County, with a small portion of revenues allocated to incorporated cities in the County. This non-General Fund revenue source is used to fund police and fire services in the City. The Analysis estimates these tax revenues using the current FY 2015-16 relationship between total sales tax revenue and Proposition 172 public safety sales tax revenue. This relationship may vary in the future (at buildout of the Project) because actual revenues received by the City are affected by several factors in the rest of the County. Further, the relationship is based on the City's current sales tax rate of 2.0%, which may vary if the Measure O sales tax rate sunsets and no new sales taxes are approved. The estimated revenues shown in this Analysis reflect an informed estimate based on current, available information. Estimated revenues from the City's share of the County's half-cent sales tax for public safety are shown in **Table B-5**.

Transient Occupancy Tax (TOT)

This analysis uses a case-study methodology to estimate TOT revenues generated by the hotel proposed for the MRIC project. The hotel proposed in the MRIC project is envisioned as a 160,000 square foot, 186-room hotel. TOT revenue is estimated based on the number of lodging units (hotel rooms) available annually, an annual occupancy rate of 70 percent, an average daily

room rate of $150, and the City's TOT rate of 10 percent. The occupancy rate and average daily room rate assumptions are derived from current occupancy and room rates of upper midscale to upscale hotels in the City of Davis and Sacramento region. Refer to **Table B-6** for estimated TOT revenue generated by the Project.

Nishi Hotel Sensitivity Scenario

EPS conducted a sensitivity analysis based on the inclusion of a hotel in the Nishi project. The potential hotel would comprise a 70,000 square foot, 125-room hotel, and would replace 70,000 square feet of proposed other nonresidential land uses. The Nishi hotel scenario (**Scenario 3**) uses the same TOT revenue assumptions (occupancy rate, average daily room rate, City TOT rate) described above for the MRIC hotel.

Business License Tax

Annual business license taxes in the City are assessed to businesses based on a tax rate per $10,000 of annual gross receipts. Because actual gross receipts for proposed land uses are unavailable, this Analysis estimates annual business license tax revenue based on average annual business license revenue per nonresidential building square foot, as provided by the City. Public and nonprofit land uses are exempt from paying this tax. Refer to Table B-7 for the assumptions and methodology used to estimate annual business license tax revenue generated by the Project.

Municipal Service Tax

Since August 1986, the City has assessed a municipal service tax on residential units and nonresidential building square feet to fund general municipal services. The City imposes both a base residential tax rate per unit and a lot size tax rate per lot square foot for residential uses, and a base commercial tax rate per building square foot and lot size tax rate per lot square foot for commercial uses. Nonprofit land uses are subject to paying the municipal service tax, while public land uses affiliated with the University of California, Davis (UC Davis) are exempt from paying this tax. Refer to **Table B-8** for the assumptions and methodology used to estimate municipal service tax revenue generated by the Project.

Public Safety Tax

The City funds police and fire services in the City with a supplemental non-General Fund public safety tax on residential units and nonresidential building square feet. The City imposes both a base residential tax rate per unit and a lot size tax rate per lot square foot for residential uses, and a base commercial tax rate per building square foot and lot size tax rate per lot square foot for commercial uses. Nonprofit land uses are subject to paying the public safety tax, while public land uses affiliated with UC Davis are exempt from paying this tax. Refer to **Table B-9** for the assumptions and methodology used to estimate public safety tax revenue generated by the Project.

Expenditure-Estimating Methods and Assumptions

Expenditure estimates are based on the City's FY 2015–16 Adopted Budget and supplemental information from City staff. This analysis estimates General Fund expenditures related to providing municipal services to the Project. General Fund department expenditures that are expected to be affected by the Project are forecasted using an average-cost approach or a marginal-cost case study approach.

- The **average-cost approach** uses the City's FY 2015-16 budgeted expenditures on a citywide per-persons-served basis to forecast expenditures required to serve new development.
- The **marginal-cost case study approach** simulates estimated expenditures required to serve new development. Parks and Open Space Management, Fire, Police, and Public Works expenditures are estimated using a case study approach and are described later in this section.

This Analysis excludes expenditures that are *not* expected to increase because of new development. These expenditures are assumed to be unaffected by development because they are either one-time costs or there is no direct relationship between new Project development and increased expenditures.

A listing of all City General Fund expenditures and the corresponding estimating procedure used to forecast future Project expenditures is shown in **Table C-1**.

A summary of estimated annual General Fund expenditures required to serve the Project at buildout is provided in **Table C-2**. As shown, the Project is estimated to result in about $2.9 million in annual General Fund costs at buildout. Of this total, the MRIC project is estimated to result in about $1.6 million in annual costs and the Nishi project is estimated to result in nearly $1.4 million in annual costs for the City's General Fund. Expenditures associated with the average cost and marginal-expenditure case study approaches are detailed in the next sections.

Average-Cost Expenditures

Expenditures that are affected by residents and employees are projected using a *per-person-served* average cost multiplier. This Analysis applies an average citywide per-persons-served methodology to estimate general government (e.g., City Council, City Attorney), community development, and community services expenditures. The average per-persons-served multiplier for general government services equals 75% of total citywide per-persons-served multiplier to reflect the percentage of expenditures estimated to be impacted by new growth. This adjustment factor was based on input from the City. No adjustment was applied to the community development and community service expenditure multipliers.

Marginal-Cost Case Studies

Parks and Open Space Management

Annual parks and open space management expenditures are based on the number of proposed acres of parks and open space and current, annual maintenance cost estimates provided by the City. These estimates are based upon preliminary sustainability plans and land plans prepared for the Nishi DEIR and will be refined through the public review process. As documented in **Table E-1**, parks and open space in the MRIC project is proposed to be privately funded under the Base Development Program (and alternative funding scenarios). Thus, this Analysis does estimate any General Fund expenditures to fund ongoing operations and maintenance of parks and open space in the MRIC project. **Table E-2** indicates that parks and open space in the Nishi project are proposed to be publicly funded through the General Fund under the Base

Development Program.[10] Estimated annual parks and open space management expenditures are shown in **Table C-3**.

Fire Department Operations and Maintenance

Based on correspondence with the City, no increases in average citywide fire department expenditures were identified to serve Project development.[11] Thus, EPS estimated annual fire department operations and maintenance expenditures based on an amended average-cost methodology, per City input. Currently, fire department expenditures are funded through the General Fund-budgeted expenditures for the department and half of Proposition 172 Public Safety Sales Tax and Public Safety tax revenues. The sum of the expenditures and revenue sources were then used to estimate an average cost per-persons-served. This expenditure multiplier was applied to the estimated persons served population in the Project to determine total annual fire department expenditures at buildout, as shown in **Table C-4**.

Police Department Operations and Maintenance

Based on correspondence with the City, no increases in average citywide police department expenditures were identified to serve Project development. Thus, EPS estimated annual police department operations and maintenance expenditures based on an amended average-cost methodology, per City input. Currently, police department expenditures are funded through the General Fund-budgeted expenditures for the department and half of Proposition 172 Public Safety Sales Tax and Public Safety tax revenues. The sum of the expenditures and revenue sources were then used to estimate an average cost per-persons-served. This expenditure multiplier was applied to the estimated persons served population in the Project to determine total annual police department expenditures at buildout, as shown in **Table C-5**.

Public Works Operations and Maintenance

Annual public works operations and maintenance expenditures required for the Project are based on estimated annual amortized costs and unit quantities estimated for Project buildout, and estimated annual administrative and engineering expenditures associated with maintaining public works facilities. The public works case study estimates expenditures associated with the operations and maintenance of the following facilities.

- Roadways (including Class 2 bike lanes).
- Curbs, gutters, and sidewalks (including bike paths within the sidewalk network).
- Streetlights.
- Signalized intersections.
- Non-street corridor bike paths.
- Median landscaping.
- Parkway planter landscaping.

---

[10] EPS conducted a sensitivity analysis that evaluates the impact of alternative funding scenarios that envision privately-funding parks and open space. These scenarios (**Scenario 9** and **Scenario 10**) are discussed in greater detail at the end of this memorandum.

[11] However, note that actual businesses and facilities that locate in the Project may have unanticipated fire safety needs that are not reflected in this Analysis. An updated Analysis may be warranted to determine net fiscal impacts to the City's General Fund.

The City provided all estimated, annual amortized costs for maintenance items described above, current as of August 2015. Project applicants supplied all maintenance quantities, with the exception of streetlights and parkway planter acreage in the Nishi project. EPS estimated the quantity of streetlights based on the National Lighting Product Information Program's report titled "Streetlights for Collector Roads," and estimated Nishi parkway planter acreage based on a proportionately similar quantity provided for the MRIC project. **Table C-6** details the assumptions and methodology used to estimate public works expenditures for the Project at buildout.

Public Works Sensitivity Scenarios

As detailed in **Table E-1** and **Table E-2**, EPS evaluated sensitivity scenarios associated with two alternative maintenance funding obligation scenarios. These sensitivity scenarios (**Scenario 9** and **Scenario 10**) examine the net fiscal impacts modifying maintenance obligations from publicly funded to privately funded (or vice versa) for specific public works facilities. These sensitivity scenarios are described in more detail later in this memorandum.

Sensitivity Scenarios

As mentioned previously, this Analysis includes ten sensitivity scenarios which recognize that key modifications to the Base Development Program could have notable impacts on the net fiscal impacts of the Project. The results of these sensitivity scenarios are provided in **Table 2** with full revenue and expenditure summaries provided in **Appendix F**. Detailed descriptions of each sensitivity scenario are provided below.

Scenario 1: MRIC Housing

Scenario 1 evaluates the net fiscal impacts of the Project assuming the inclusion of 850 dwelling units. Of these dwelling units, 340 units (40 percent) are assumed to be owner-occupied and 510 units (60 percent) are assumed to be renter-occupied. The additional units are estimated to result in 2,285 residents. This scenario assumes no reduction in planned commercial square footage.

This scenario uses the same owner-occupied and renter-occupied housing values and household income assumptions, which are used to derive property tax and sales tax revenues respectively. The additional residents influence both average revenue and average cost estimates. This scenario also influences public works quantities, as provided by the MRIC project applicant. Specifically, roadway lane miles and sidewalk linear feet are estimated to increase and non-street corridor bike path lane miles are estimated to decrease nominally.

***Overall Impact**: The addition of 850 dwelling units reduces the net fiscal impact of the Base Development Program by approximately $235,000 annually at buildout. However, the MRIC project continues to result in a substantial net fiscal surplus of just under $2.0 million annually for the City's General Fund. The combined annual net fiscal impact of the Project is estimated to be about $1.9 million at buildout.*

Scenario 2: No MRIC Hotel

Scenario 2 evaluates the net fiscal impacts of the Project assuming the planned hotel in the MRIC project is not developed. In place of the 160,000 square foot hotel, an additional 80,000

square feet of office space and 80,000 square feet of R&D/flex space is anticipated to be developed.

Assuming the MRIC hotel is not developed results in $0 TOT revenue generated by the Project. Replacement of the hotel use with office and R&D/flex space will generate 5,805 employees (2,903 persons served), about 170 additional employees.

Overall Impact: This scenario reduces the net fiscal impacts of the Base Development Program by approximately $732,000 annually at buildout. However, the MRIC project continues to result in a substantial net fiscal surplus of approximately $1.5 million annually for the City's General Fund. The combined annual net fiscal impact of the Project is estimated to be approximately $1.4 million at buildout.

Scenario 3: Nishi Hotel

Scenario 3 includes the addition of a 70,000 square foot, 125-room hotel in the Nishi Gateway portion of the Nishi project. The 70,000 square feet of hotel is estimated to displace 70,000 square feet of proposed nonresidential land uses, including: 40,606 square feet of office space, 14,486 square feet of R&D/flex space, 4,812 square feet of industrial commercial space, and 10,096 square feet of public/nonprofit space.

This scenario uses the same TOT revenue assumptions applied to the MRIC hotel to estimate annual revenue derived from a hotel in the Nishi project. Replacement of the nonresidential land uses described above with a hotel results in 882 employees (2,188 persons served), 160 fewer employees than the Base Development Program.

Overall Impact: This scenario significantly increases the net fiscal impacts of the Project relative to the Base Development Program. At buildout, this scenario results in an annual net fiscal surplus for the Nishi project of about $416,000 and, combined with the MRIC project, about $2.6 million annually for the City's General Fund.

Scenario 4: Property Tax Sharing Allocation: Alternative 1 (Higher City Allocation)

The Base Development Program assumes a 50%/50% property tax sharing split of applicable property tax rates between the City and County for the portion of the Project in the unincorporated County. **Scenario 4** examines the net fiscal impacts of the Project assuming an alternative property tax sharing split of 75%/25% to the City and County, respectively. This scenario does not impact the Olive Drive portion of the Nishi project area as it is already located within the City boundaries.

This scenario increases the City General Fund rate of the 1-percent property tax rate from 6.17 percent and 6.93 percent in the MRIC project and Nishi Gateway portion of the Nishi project, respectively, to 9.25 percent and 10.39 percent.

Overall Impact: An increased share of the property tax for the City's General Fund increases the annual net fiscal impacts of the Project by approximately $290,000 annually. In total, the annual net fiscal impact of the Project is estimated to be about $2.4 million at buildout. It is worth noting that this scenario results in an annual net fiscal surplus of about $24,000 for the Nishi project at buildout.

Scenario 5: Property Tax Sharing Allocation: Alternative 2 (Lower City Allocation)

As discussed in the previous scenario, the Base Development Program assumes a 50%/50% property tax sharing split of applicable property tax rates between the City and County for the portion of the Project in the unincorporated County. **Scenario 5** examines the net fiscal impacts of the Project assuming an alternative property tax sharing split of 25%/75% to the City and County, respectively. This scenario does not impact the Olive Drive portion of the Nishi project area as it is already located within the City boundaries.

This scenario reduces the City General Fund rate of the 1-percent property tax rate from 6.17 percent and 6.93 percent in the MRIC project and Nishi Gateway portion of the Nishi project, respectively, to 3.08 percent and 3.46 percent.

Overall Impact: A reduced share of the property tax for the City's General Fund decreases the annual net fiscal impacts of the Project by approximately $290,000 annually. In total, the annual net fiscal impact of the Project is estimated to be about $1.8 million at buildout.

Scenario 6: Increased Taxable Sales

This scenario examines the annual net fiscal impacts of increased taxable sales revenue generated by R&D/flex, manufacturing, and retail land uses in the Project. Specifically, the Base Development program assumes these uses generate an average of $20, $50, and $185 in annual taxable sales per square foot, respectively. **Scenario 6** uses increased taxable sales per square foot assumptions of $60, $150, and $205, respectively (a 200-percent increase for R&D/flex and manufacturing, and a 10-percent increase for retail). Although the percentage increase in taxable sales for R&D/flex and manufacturing is significant, the higher taxable sales assumptions are reflective of the wide range of taxable sales determined to be generated by these types of uses. Notably, these assumptions are consistent with actual taxable sales data collected from land uses in the 2nd Street Corridor and Interland URP.

Overall Impact: This scenario results in a substantial increase of nearly $1.2 million in net fiscal impacts to the City's General Fund, relative to the Base Development Program. In total, if the Project is able to generate taxable sales similar to the few R&D/flex and industrial manufacturing companies present in the 2nd Street Corridor and Interland URP, the Project has the potential to generate nearly $3.3 million in net annual revenue for the City's General Fund at buildout. This scenario reduces the net fiscal deficit of the Nishi project by approximately $61,000 resulting in a small annual net fiscal deficit of $17,000 for the City's General Fund.

Scenario 7: Sales Tax Capture Rate: Alternative 1 (Higher City Capture)

The Base Development Program assumes the City captures 50% of taxable retail expenditures generated by Project residents and employees. **Scenario 7** examines the net fiscal impacts assuming a higher capture rate of 75%. This alternative assumption applies to the City's capture of taxable retail expenditures of new households and employees only.

Overall Impact: This scenario results in an increase of about $100,000 in net fiscal impacts relative to the Base Development Program. In total, this scenario generates an annual net fiscal surplus of approximately $2.2 million at Project buildout. This scenario reduces the net fiscal deficit of the Nishi project by approximately $53,000 resulting in a small annual net fiscal deficit of $25,000 for the City's General Fund.

Scenario 8: Sales Tax Capture Rate: Alternative 2 (Lower City Capture)

As discussed in the previous scenario, the Base Development Program assumes the City captures 50% of taxable retail expenditures generated by Project residents and employees. **Scenario 8** examines the net fiscal impacts assuming a lower capture rate of 25%. This alternative assumption applies to the City's capture of taxable retail expenditures of new households and employees only.

Overall Impact: This scenario results in a decrease of about $100,000 in net annual revenues relative to the Base Development Program. In total, this scenario generates an annual net fiscal surplus of approximately $2.0 million at Project buildout. This scenario increases the net fiscal deficit of the Nishi project by approximately $56,000 resulting in an annual net fiscal deficit of $134,000 for the City's General Fund.

Scenario 9: Ongoing Operations and Maintenance Responsibility: Alternative 1

Table E-1 and **Table E-2** provide a listing of parks and open space and public works maintenance funding obligations, for MRIC and Nishi respectively, under the Base Development Program and two alternative funding scenarios. **Scenario 9** reflects the first of two alternative funding scenarios (labeled as Alternative #1 in the **Appendix E** tables) evaluated in this Analysis. Under this scenario, the principal differences are noted below.

- **MRIC**. Median landscaping, parkway planter landscaping, and streetlights are assumed to be funded through the General Fund, instead of privately funded.
- **Nishi**. Parkway planter landscaping and all parks and open space are assumed to be funded privately, instead of through the General Fund.

Overall Impact: For the MRIC project, the additional maintenance items funded through the General Fund decrease the annual net fiscal surplus by $75,000 annually relative to the Base Development Program. For the Nishi project, the additional maintenance items funded through private sources has a sizable impact on the project's annual net fiscal deficit at buildout, resulting in an annual net fiscal surplus of $55,000 for the City's General Fund. In total, this scenario results in an annual net fiscal surplus of about $2.2 million at Project buildout.

Scenario 10: Ongoing Operations and Maintenance Responsibility: Alternative 2

As discussed in the previous scenario, **Table E-1** and **Table E-2** provide a listing of parks and open space and public works maintenance funding obligations, for MRIC and Nishi respectively, under the Base Development Program and two alternative funding scenarios. **Scenario 10** reflects the second of two alternative funding scenarios evaluated in this Analysis (labeled as Alternative #2 in the **Appendix E** tables). Under this scenario, all parks and open space and public works maintenance items are assumed to be funded through private sources.

Overall Impact: This scenario increases the annual net fiscal surplus by about $355,000 at Project buildout. In total, this scenario produces an annual net fiscal surplus of nearly $2.5 million at Project buildout, with an annual net fiscal surplus of about $2.4 million for the MRIC project and an annual net fiscal surplus of about $103,000 for the Nishi project.

DEIR Alternatives

Two sensitivity scenarios described in the previous section (Scenario 1: MRIC Housing and Scenario 3: Nishi Hotel) reflect two of the Project alternatives included in the MRIC and Nishi DEIRs. Additional Project alternatives and their respective land uses evaluated in the DEIRs are described in **Table 3**. This table also denotes the potential effects these alternatives may have on annual net fiscal impacts of the Project under the Base Development Program. The potential effects reflect a qualitative assessment of each alternative; the fiscal impacts of each DEIR alternative have not been evaluated.

MRIC

The MRIC DEIR project alternatives are estimated to result in either reduced net fiscal revenues or have similar impacts to the proposed project. Unsurprisingly, the "No Project" alternative would eliminate the project's significant annual net fiscal surplus for the City's General Fund. Similar to the "Mixed Use" alternative (MRIC Housing sensitivity scenario), the "Reduced Project" alternative, with 2.1 million fewer square feet of nonresidential development would substantially reduce key revenues (e.g., property tax revenue, sales tax revenue) thereby reducing the estimated annual net fiscal surplus.

Remaining DEIR project alternatives ("Reduced Site Size," "Off-Site Alternative A," and "Off-Site Alternative B") are estimated to have a similar impacts to the proposed project based on their location within the unincorporated County and similar land uses. The "Off-Site Alternative B" may reduce annual net fiscal impacts, based on an estimated 70,000 square foot reduction in nonresidential development, but the reduction is estimated to be nominal.

Nishi

All Nishi DEIR project alternatives are estimated to have a positive effect, relative to the net fiscal impacts estimated for the project under the Base Development Program. The "No Project" alternative would eliminate the annual net fiscal deficit to the City's General Fund. The "R&D Only" alternative includes nearly 875,000 additional square feet of R&D space and no residential units which would substantially increase estimated General Fund revenues and result in an annual net fiscal surplus to the City's General Fund. The "Off-Site Option" alternative has the potential to eliminate the estimated annual net fiscal deficit of the proposed Project (and possibly result in an annual net fiscal surplus), given its location within the City and higher City General Fund property tax share allocation. However, a combination of reduced nonresidential space and the proposed residential units in this DEIR alternative may counter any reductions in the estimated annual net fiscal deficit to the City's General Fund. It is likely that the "Off-Site Option" would have a fiscally neutral impact on the City's General Fund.

Table 3
Davis Innovation Centers
Fiscal Impact Analysis
DEIR Alternatives Potential Effect on Fiscal Impact Analysis

Project/Alternative	Nonresidential Square Feet	Dwelling Units	Gross Acres	Potential Effect Relative to Buildout of Project [1]
MRIC				
Proposed Project	2,725,056	0	229	NA
1. No Project	0	0	0	Reduced Net Revenues
2. Reduced Site Size	2,725,056	0	123	Similar Impact
3. Reduced Project	611,056	0	66	Reduced Net Revenues
4. Off-Site Alternative A (Davis IC)	2,654,000	0	208	Similar Impact
5. Off-Site Alternative B (Covell)	2,654,000	0	247	Similar Impact
6. Infill Alternative [2]	-	-	-	-
7. Mixed Use Alternative [3]	2,725,056	850	229	Reduced Net Revenues
Nishi				
Proposed Project	400,900	650	47	NA
1. No Project	0	0	0	Elim. Net Fiscal Deficit
2. R&D Only	1,275,000	0	47	Net Fiscal Surplus
3. Alternative Land Use (Hotel) [4]	400,900	650	47	Net Fiscal Surplus
4. Offsite Option (5th Street)	345,000	650	47	Reduced Net Fiscal Deficit/ Potential Net Fiscal Surplus

eir_alt

Source: Raney Planning and Management; Ascent; EPS.

[1] Reflects buildout of the Project under the Base Development Program land uses and assumptions.
[2] This alternative is considered in the MRIC DEIR, but is dismissed because it does not meet project objectives. Thus this alternative is excluded from evaluation in this analysis.
[3] Evaluated as sensitivity scenario 1.
[4] Evaluated as sensitivity scenario 3.

APPENDICES:

APPENDIX A:

Fiscal Impact Analysis Assumptions

Table A-1
Davis Innovation Centers
Fiscal Impact Analysis
General Assumptions

Item	Assumption
General Assumptions	
Base Fiscal Year [1]	FY 2015-16
City of Davis Demographic Characteristics [2]	
City of Davis Population [3]	66,757
City of Davis Employees [4]	18,952
City of Davis Persons Served [5]	**76,233**

assum

Source: California Department of Finance; ESRI Business Analyst Online; EPS.

[1] Reflects the FY 2015-16 City of Davis budget adopted by City Council. Revenues and expenditures are in 2015 dollars. This Analysis does not reflect changes in values resulting from inflation or appreciation.
[2] Used to estimate average citywide revenues and expenditures in Table B-1 and Table C-1, respectively.
[3] Based on population estimates from the California Department of Finance (DOF) data for January 1, 2015.
[4] Based on the ESRI BAO Business Summary for 2015.
[5] Defined as total City population plus half of total City employees.

Table A-2
Davis Innovation Centers
Fiscal Impact Analysis
Land Use Summary: Base Development Program [1]

Land Use	MRIC [2] Dwelling Units/ Hotel Rooms	MRIC [2] Commercial Bldg. Sq. Ft./ Acreage	Nishi [3] Dwelling Units/ Hotel Rooms	Nishi [3] Commercial Building Square Feet/Acreage: Nishi Gateway [4]	Olive Drive [5]	Total	Total Dwelling Units/ Hotel Rooms	Total Commercial Bldg. Sq. Ft/ Acreage
Residential (Units)			*Dwelling Units*				*Dwelling Units*	
Owner-Occupied	-	-	210	-	-	-	210	-
Renter-Occupied	-	-	440	-	-	-	440	-
Total Residential	**-**	**-**	**650**	**-**	**-**	**-**	**650**	**-**
Commercial (Sq. Ft.)								
Office/Flex/R&D								
Office	-	846,468	-	152,685	19,702	172,387	-	1,018,855
Flex: R&D/Office	-	513,011	-	63,914	8,248	72,162	-	585,173
Total Office/Flex/R&D	-	**1,359,479**	**-**	**216,599**	**27,950**	**244,549**	**-**	**1,604,028**
Manufacturing [6]	-	952,169	-	28,221	-	28,221	-	980,390
Retail								
Industrial Commercial	-	62,578	-	10,000	0	10,000	-	72,578
Ancillary Retail	-	62,578	-	10,000	27,950	37,950	-	100,528
Total Retail	-	**125,155**	**-**	**20,000**	**27,950**	**47,950**	**-**	**173,105**
	Hotel Rooms						*Hotel Rooms*	
Hotel/Conference [7]	186	160,000	-	-	-	-	186	160,000
Public/Nonprofit [8]								
UC Davis-Owned	-	115,428	**-**	72,162	-	72,162	-	187,590
Other Nonprofits	-	12,825	**-**	8,018	-	8,018	-	20,843
Total Public/Nonprofit	-	**128,253**	**-**	**80,180**	**-**	**80,180**	**-**	**208,433**
Total Commercial Sq. Ft.	-	**2,725,056**	**-**	**345,000**	**55,900**	**400,900**	**-**	**3,125,956**
Other Land Uses		*acres*				*acres*		
Open Space	-	75	-	-	-	9	-	84
Public Parks	-	-	-	-	-	5	-	5
Greenbelt	-	-	-	-	-	5	-	5
Private Parks	-	-	-	-	-	4	-	4
Total Other Land Uses	-	**75**	**-**	**-**	**-**	**23**	**-**	98
Total Acres	-	**229**	**-**	**-**	**-**	**47**	**-**	276

base_lu

Source: City of Davis; Yolo 101 JV and R&B Delta, LLC; Nishi Gateway LLC; EPS.

[1] The Base Development Program represents the land uses shown in this table and assumptions documented in the attached technical appendices. The analysis also tests variations in land uses and assumptions, as described in the summary of sensitivity scenarios and Table 2.
[2] Includes Mace Triangle.
[3] Includes Nishi Gateway and redevelopment opportunities on West Olive Drive.
[4] The Nishi Gateway Area is bounded by the Union Pacific Railroad and UC Davis Campus to the northwest, Putah Creek tot the northeast, and Interstate 80 (I-80) to the south. The Nishi Gateway Area is outside of current boundaries of the City of Davis.
[5] The Olive Drive area is bounded by Richards Blvd. to the northeast, the I-80/Richards Blvd. Interchange to the southeast, Putah Creek to the southwest, and the existing railroad to the northwest. The Olive Drive area is currently in the boundaries of the City of Davis.
[6] Manufacturing may encompass small to large-scale manufacturing operations in the MRIC project, and small-scale (e.g., boutique) manufacturing operations in the Nishi project.
[7] The Base Development Program include a 186-room, 160,000 sq. ft. hotel.
[8] Total Public/Nonprofit square feet is assumed to comprise 90% UC Davis-owned (public) uses and 10% non UC-Davis nonprofit uses.

Table A-3
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Occupied Land Uses: Base Development Program

Land Use	Vacancy Rate Assumption [1]	Occupied Dwelling Units and Building Square Feet				
		MRIC	Nishi Gateway	Olive Drive	Nishi Total	**Total**
Residential (Units)						
Owner-Occupied	5%	-	-	-	200	200
Renter-Occupied	5%	-	-	-	418	418
Total Residential		**-**	**-**	**-**	**618**	**618**
Commercial (Sq. Ft.)						
Office/Flex/R&D						
Office	8%	777,058	140,164	18,087	158,251	935,309
Flex: R&D/Office	10%	461,710	57,523	7,423	64,946	526,656
Total Office/Flex/R&D		**1,238,768**	**197,687**	**25,510**	**223,197**	**1,461,965**
Manufacturing	9%	865,522	25,653	-	25,653	891,175
Retail						
Industrial Commercial	5%	59,511	9,510	-	9,510	69,021
Ancillary Retail	5%	59,511	9,510	26,580	36,090	95,602
Total Retail		**119,022**	**19,020**	**26,580**	**45,600**	**164,623**
Hotel/Conference	-	160,000	-	-	-	160,000
Public/Nonprofit						
UC Davis	0%	115,428	72,162	-	72,162	187,590
Other Public/Nonprofit	0%	12,825	8,018	-	8,018	20,843
Total Public/Nonprofit		**128,253**	**80,180**	**0**	**80,180**	**208,433**
Total Commercial Sq. Ft.		**2,511,565**	322,540	52,090	**374,630**	**2,886,195**

occupied

Source: City of Davis; Yolo 101 JV and R&B Delta, LLC; Nishi Gateway LLC; EPS.

[1] Vacancy rate assumption based on a review of vacancy rates over the last 5 years (2010-2014) for land uses in the City of Davis. Data collected from CoStar as of fourth quarter, 2014.

Table A-4
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Residential and Employee Population: Base Development Program

Land Use	Assumption [1]	MRIC [2]	Nishi [3]	Total
Residential	*Persons/DU*		*Residents*	
Owner-Occupied	2.83	0	565	565
Renter-Occupied	2.83	0	1,183	1,183
Total Residential		**0**	**1,748**	**1,748**
Commercial				
Office/Flex/R&D	*Sq. Ft./Employee*		*Employees*	
Office	290	2,680	546	3,225
Flex: R&D/Office	450	1,026	144	1,170
Total Office/Flex/R&D		**3,706**	**690**	**4,396**
Manufacturing	800	1,082	32	1,114
Retail				
Industrial Commercial	500	119	19	138
Ancillary Retail	500	119	72	191
Total Retail		**238**	**91**	**329**
Hotel/Conference	2,000	80	0	80
Public/Nonprofit	350	366	229	596
Total Commercial Employment		**5,472**	**1,042**	**6,514**
			Persons Served	
Persons Served [4]		**2,736**	**2,269**	**5,005**

base_emp

Source: City of Davis; CoStar; EPS.

[1] Refer to Table A-5 for assumption sources.
[2] Includes Mace Triangle.
[3] Includes Nishi Gateway and West Olive Drive Area.
[4] Persons Served defined as total project area population plus half of total project area employees.

Table A-5
Davis Innovation Centers
Fiscal Impact Analysis
Fiscal Impact Analysis Assumptions

Land Use	Estimated Average Assessed Value [1]	Turnover Rate [2]	Average Persons Per Dwelling Unit [3]	Sq. Ft./ Employee [4]
Residential	*Per Unit*			
Owner-Occupied	$460,000	10%	2.83	-
Renter-Occupied	$308,000	5%	2.83	-
Commercial (Sq. Ft.)	*Per Sq. Ft*			
Office/Flex/R&D				
Office	$225	5%	-	290
Flex: R&D/Office	$245	5%	-	450
Total Office/Flex/R&D	-		-	
Manufacturing	$250	5%	-	800
Retail				
Industrial Commercial	$225	5%	-	500
Ancillary Retail	$225	5%	-	500
Total Retail	-		-	
Hotel/Conference	$225	5%	-	2,000
Public/Nonprofit	$0	5%	-	350

lu_assum

Source: City of Davis; Urban Land Institute (ULI); Andy Plescia/Goodwin Consulting Group; ESRI; CoStar; Loopnet; DTZ; EPS.

[1] Residential assessed value based on data prepared by Andy Plescia and Goodwin Consulting Group as of July 2015. Commercial assessed values based on research conducted utilizing current FY 2014-15 assessed values for similar land uses in the City of Davis, current brokerage listings for similar land uses in the city and broader Sacramento Region, and interviews with local real estate professionals
[2] Based on EPS research on real property turnover rates in the Sacramento Region.
[3] Average persons per dwelling unit from the City of Davis.
[4] Sq. ft. per employee based on data from existing development in the 2nd Street Corridor and Interland Urban Research Park, Urban Land Institute (ULI), and subscription-based data (ESRI, CoStar).

APPENDIX B:

Revenue-Estimating Tables

Table B-1
Davis Innovation Centers
Fiscal Impact Analysis
Revenue-Estimating Procedures (2015$)

Item	Estimating Procedure	Case Study Reference	FY 2015-16 Adopted Revenues	Service Population [1]	Adjustment Factor [2]	Revenue Multiplier
General Fund Revenues						
Property Taxes	Case Study	Table B-3	$12,313,869	NA	-	-
Property Tax In-Lieu of Vehicle License Fees	Case Study	Table B-3	$5,661,520	NA	-	-
Property Transfer Tax	Case Study	Table B-4	$225,000	NA	-	-
Sales and Use Taxes	Case Study	Table B-5	$12,394,283	NA	-	-
Property Tax in-Lieu of Sales Tax	Case Study	Table B-5	$1,408,244	NA	-	-
Transient Occupancy Tax	Case Study	Table B-6	$1,270,000	NA	-	-
Business License Tax	Case Study	Table B-7	$1,706,707	NA	-	-
Municipal Service Tax	Case Study	Table B-8	$2,842,670	NA	-	-
Franchise Fees	Per Person Served	-	$1,201,979	76,233	100%	$15.77
Intergovernmental	[3]	-	$164,634	NA	-	-
Charges for Services	Per Capita	-	$2,292,964	66,757	100%	$34.35
Community Services Revenue	Per Capita	-	$2,519,560	66,757	64%	$58.97
Fines and Forfeitures	Per Person Served	-	$686,900	76,233	100%	$9.01
Use of Money & Property	[3]	-	$4,521,041	NA	-	-
All Other Revenue	[3]	-	$2,900,000	NA	-	-
Total General Fund Revenues			**$52,109,371**			
Other Non-General Fund Revenues [4]						
Gas Tax Revenues	Per Capita	-	$1,406,033	66,757	100%	$21.06
Parks Maintenance Tax	Per Person Served	-	$1,355,000	76,233	100%	$17.77
Prop. 172 Public Safety Sales Tax	Case Study	Table B-5	$491,000	NA	-	-
Public Safety Tax	Case Study	Table B-9	$2,955,040	NA	-	-
Total Non-General Fund Other Revenues			**$6,207,073**			
Total General Fund and Other Non-General Fund Revenues			**$58,316,444**			

rev_pro

Source: City of Davis FY 2015-16 Adopted Budget; EPS.

[1] Represents Citywide residents or persons served as shown in Table A-1.
[2] Adjustment factors provided by the City of Davis. Reflects the percentage of revenue estimated to be impacted by new growth.
[3] Non-General Fund revenue categories that are affected by the introduction of new employees and residents resulting from the project used partially to fund expenditures included in the analysis.
[4] Reflects additional revenues used to fund General Fund expenditures.

Table B-2
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Project Revenues at Buildout (2015$)

Revenues	Annual Revenues at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = a + b*
General Fund Revenues [1]			
Property Taxes	$381,000	$227,000	$608,000
Property Tax In-Lieu of Vehicle License Fees	$502,000	$249,000	$751,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$744,000	$185,000	$929,000
Property Tax in-Lieu of Sales Tax	$248,000	$62,000	$310,000
Transient Occupancy Tax	$714,000	$0	$714,000
Business License Tax	$398,000	$50,000	$448,000
Municipal Service Tax	$281,000	$90,000	$371,000
Franchise Fees	$43,000	$36,000	$79,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$25,000	$20,000	$45,000
Total General Fund Revenues	**$3,370,000**	**$1,104,000**	**$4,474,000**
Other Non-General Fund Revenues			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$49,000	$40,000	$89,000
Prop. 172 Public Safety Sales Tax	$26,000	$7,000	$33,000
Public Safety Tax	$341,000	$85,000	$426,000
Total Non-General Fund Other Revenues	**$416,000**	**$169,000**	**$585,000**
Total General Fund and Other Non-General Fund Revenues	**$3,786,000**	**$1,273,000**	**$5,059,000**

revenues

Source: City of Davis FY 2015-16 Adopted Budget; EPS.

Note: Values are rounded to the nearest $1,000.

[1] Refer to Table B-1 for details regarding revenue categories. Revenue categories not included in analysis have been omitted.

Table B-3
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Property Tax Revenue (2015$)

Item	Assumptions/ Source	Formula	Annual Property Tax Revenues at Buildout				
				Nishi			
			MRIC	Nishi Gateway	Olive Drive	Total Nishi	Total
Property Tax Revenue (1% of Assessed Value)							
Assessed Value (2015$)	Table D-2	*a*	$618,345,120	$293,688,314	$12,742,451	$306,430,765	$924,775,885
Property Tax Revenue (1% of Assessed Value)	1.00%	*b = a * 1.00%*	$6,183,451	$2,936,883	$127,425	$3,064,308	$9,247,759
City General Fund Property Tax Rate [1]		***c***	6.17%	6.93%	18.81%		
Estimated Property Tax Allocation							
City General Fund		***d = b * c***	**$381,239**	**$203,453**	**$23,969**	**$227,421**	**$608,660**
Other Agencies/ERAF		*e = b * (1-c)*	$5,802,213	$2,733,431	$103,456	$2,836,887	$8,639,099
Property Tax In-Lieu of Motor Vehicle In-Lieu Fee Revenue (VLF)							
Total Citywide Assessed Value [2]		*f*	$6,978,905,700	$6,978,905,700	$6,978,905,700	$6,978,905,700	$6,978,905,700
Total Assessed Value of Project		*a*	$618,345,120	$293,688,314	$12,742,451	$306,430,765	$924,775,885
Total Assessed Value		*g = a + f*	$7,597,250,820	$7,272,594,014	$6,991,648,151	$7,285,336,465	$7,903,681,585
Percent Change in AV		*h = a / f*	8.86%	4.21%	0.18%	4.39%	13.25%
Property Tax In-Lieu of VLF [3]	**$5,661,520**	*i = h * $5,661,520*	$501,622	$238,250	$10,337	$248,587	$750,209

prop_tax

Source: City of Davis; Yolo County; EPS.

[1] For assumptions and calculation of the estimated property tax allocation, refer to Table D-1. Based on 50%/50% tax sharing split between the City of Davis and Yolo County for development in MRIC and Nishi Gateway. The Olive Drive area is currently in the city and is not subject to a tax sharing split assumption.
[2] Reflects final assessed valuation for FY 2014-15. Includes Citywide secured, unsecured, homeowner exemption, and public utility rolls.
[3] Property tax in-lieu of VLF amount taken from FY 2015-16 Approved City Budget. See Table B-1.

Table B-4
Davis Innovation Centers
Fiscal Impact Analysis
Real Property Transfer Tax Revenue (2015$)

Description	Source/ Assumption	Annual Transfer Tax Revenue at Buildout					
		MRIC		Nishi [1]		Total	
		Assessed Value [2]	Annual Transfer Tax Revenue [3]	Assessed Value [2]	Annual Transfer Tax Revenue [3]	Assessed Value [2]	Annual Transfer Tax Revenue [3]
Rate per $1,000 of AV	$1.10						
Property Turnover Rate (% per year) [4]							
Residential Owner-Occupied	10%						
Residential Renter-Occupied	5%						
Nonresidential	5%						
Annual Transfer Tax Revenue							
Residential							
Owner-Occupied		$0	$0	$96,600,000	$10,626	$96,600,000	$10,626
Renter-Occupied		$0	$0	$135,520,000	$7,454	$135,520,000	$7,454
Total Residential Land Uses		**$0**	**$0**	**$232,120,000**	**$18,080**	**$232,120,000**	**$18,080**
Nonresidential [5]		**$618,345,120**	**$34,009**	**$74,310,765**	**$4,087**	**$692,655,885**	**$38,096**
Total Annual Transfer Tax Revenue		**$618,345,120**	**$34,009**	**$306,430,765**	**$22,167**	**$924,775,885**	**$56,176**

transfer_tax

Source: City of Davis; EPS.

[1] Comprises both the Nishi Gateway and Olive Drive areas.
[2] Assessed Values (AV) derived in Table D-2. Note that assessed values are expressed in 2015$ and include no real AV growth.
[3] Formula for Transfer Tax = Assessed Value/$1,000 * Rate per $1,000 of Assessed Value * Turnover rate.
[4] Based on EPS research on real property turnover rates in the Sacramento Region.
[5] The nonresidential AV for Public/Nonprofit uses is omitted in this analysis. As a conservative assumption, this analysis assumes that these land uses would continue to be owned by public/non-profit uses, which are exempt from paying this tax pursuant to California Revenue and Tax Code§11921-11930.

Table B-5
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Taxable Sales and Use Tax Revenue (2015$)

Item	Formula	Source/ Assumptions	Annual Taxable Sales Revenue at Buildout		
			MRIC	Nishi	**Total**
Estimated Annual Taxable Sales					
Annual Taxable Sales from New HH/Employee Expenditures	*a*	**Table B-5A**	$13,132,596	$12,075,674	$25,208,270
Net Annual Taxable Sales from Onsite Nonresidential Uses	*b*	**Table B-5B**	$86,130,798	$12,539,967	$98,670,765
Annual Taxable Sales from Total Net New Development	*c = a + b*		**$99,263,394**	**$24,615,641**	**$123,879,034**
Annual Sales Tax Revenue					
Bradley Burns Sales Tax Rate		1.0000%			
Measure O Sales Tax Rate [1]		0.0000%			
Less Property Tax in Lieu of Sales Tax Rate [2]		(0.2500%)			
Total Bradley Burns Sales Tax Revenue	*d = c * 0.75%*	**0.7500%**	**$744,475**	**$184,617**	**$929,093**
Annual Property Tax in Lieu of Sales Tax Revenue [2]	*e = b * .25%*	**0.2500%**	**$248,158**	**$61,539**	**$309,698**
Gross Proposition 172 Public Safety Sales Tax Revenue [3]	*f = c * 3.56%*	**3.56%**	**$26,483**	**$6,567**	**$33,051**

sales_tax

Source: City of Davis; Yolo County; California State Board of Equalization; EPS.

[1] Measure O is a 1% general sales and use tax rate authorized through December 31, 2020. As a conservative assumption, this analysis assumes Measure O will not be renewed and because buildout of both projects is anticipated to occur after this date, this additional sales tax rate is excluded from the analysis.

[2] Based on Senate Bill 1096 as amended by Assembly Bill 2115 which states 1/4 of the 1 percent sales tax revenue (.2500 percent) will be exchanged for an equal dollar amount of property tax revenue.

[3] Calculated as the ratio of Proposition 172 Public Safety Tax revenue to total sales tax revenue based on the FY 2015-16 Budget. Current total sales tax revenue includes sales tax revenue generated through Measure O. At buildout. the percentage may be higher if Measure O is not renewed. Any variation in the relationship between Proposition 172 Public Safety Tax revenue and total sales tax revenue affecting the estimate of this revenue source is estimated to be nominal.

Table B-5A
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Taxable Sales from Proposed Development, Hybrid Market Support Method (2015$)

Annual Taxable Sales from Market Support	Assumption	Annual Taxable Sales Revenue from Market Support		
		MRIC	Nishi	**Total**
Annual Taxable Sales from New Households				
Residential Development [1]				
Owner-Occupied Residential		0	210	210
Renter-Occupied Residential		0	440	440
Total Residential Development		**0**	**650**	**650**
Retail Expenditures [2]				
Owner-Occupied Residential	$25,000	$0	$11,000,000	$11,000,000
Renter-Occupied Residential	$20,000	$0	$8,800,000	$8,800,000
Total Retail Expenditures		**$0**	**$19,800,000**	**$19,800,000**
Taxable Sales from New Households				
Est. Retail Capture Rate within the City of Davis [3]		50%	50%	50%
Total Taxable Sales from New Households		**$0**	**$9,900,000**	**$9,900,000**
Total Annual Taxable Sales from Market Support Within the City of Davis		**$0**	**$9,900,000**	**$9,900,000**
Estimated Total Annual Taxable Sales Onsite (Within the Project)	10%	$0	$990,000	$990,000
Estimated Total Annual Taxable Sales Offsite (Outside the Project)	90%	$0	$8,910,000	$8,910,000
Annual Taxable Sales from New Employees				
Taxable Sales from New Employment				
New Employees [4]		5,472	1,042	6,514
Project Residents Assumed to Work Onsite [5]		0	136	136
Net New Employees (Excluding Project Residents Assumed to Work Onsite)		5,472	907	6,378
Average Daily Taxable Sales per New Employee [6]	$20.00			
Work Days per Year	240			
Est. Retail Capture Rate within the City of Davis [3]		50%	50%	50%
Total Taxable Sales from Net New Employees		**$13,132,596**	**$2,175,674**	**$15,308,270**
Total Annual Taxable Sales from Market Support Within the City of Davis		**$13,132,596**	**$2,175,674**	**$15,308,270**
Estimated Total Annual Taxable Sales Onsite (Within the Project)	30%	$3,939,779	$652,702	$4,592,481
Estimated Total Annual Taxable Sales Offsite (Outside the Project)	70%	$9,192,817	$1,522,972	$10,715,789
Total Annual Taxable Sales from Market Support Within the City of Davis		**$13,132,596**	**$12,075,674**	**$25,208,270**
Estimated Total Annual Taxable Sales Onsite (Within the Project)		$3,939,779	$1,642,702	$5,582,481
Estimated Total Annual Taxable Sales Offsite (Outside the Project)		$9,192,817	$10,432,972	$19,625,789

sales_a

Source: U.S. Department of Labor, Bureau of Labor Statistics; Yolo 101 JV and R&B Delta, LLC; Nishi Gateway LLC; City of Davis; EPS.

Table B-5A
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Taxable Sales from Proposed Development, Hybrid Market Support Method (2015$)

[1] Refer to Table A-2.
[2] Refer to Table D-3 for assumptions related to average household retail expenditures by residential unit.
[3] Estimated retail capture rate within the City of Davis is based on EPS's qualitative appraisal of retail establishments within and outside of the City of Davis.
[4] Refer to Table A-4 for employee estimates.
[5] Project residents assumed to work onsite is derived from the project DEIRs. The MRIC DEIR assumes, under the MRIC Housing alternative (Scenario 1) that all residents are assumed to work onsite; the Base Development Program does not contain any residential units. The Nishi DEIR assumes that about 48 households (136 residents or about 8% of total project residents) will work onsite. For MRIC, under the MRIC Housing alternative, a lower percentage of project residents working onsite (less than 100 percent) would generate a greater amount of sales tax revenue and thus, increase the annual net fiscal revenues estimated for the City's General Fund. For Nishi, a lower percentage of project residents working onsite (less than 8 percent) would also generate a nominally greater amount of sales tax revenue and nominally decrease the estimated annual net fiscal deficit to the City's General Fund; a higher percentage of Nishi project residents working onsite (greater than 8 percent) would increase the estimated annual net fiscal deficit to the City's General Fund.
[6] Based on the International Council of Shopping Centers' 2012 study "Office Worker Retail Spending in the Digital Age" for suburban areas with retail opportunities and adjusted to reflect Davis' retail mix. The data in this resource was escalated to reflect 2015 dollars using the Bureau of Labor Statistics Consumer Price Index, West Region. In addition, data was adjusted to reflect spending on taxable goods and services only.

Table B-5B
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Taxable Sales from Nonresidential Development (2015$)

Item	Annual Taxable Sales per Sq. Ft. [1]	Annual Taxable Sales Revenue from Nonresidential Development					
		MRIC		Nishi		Total	
		Occupied Bldg. Sq. Ft. [2]	Total Annual Taxable Sales	Occupied Bldg. Sq. Ft. [2]	Total Annual Taxable Sales	Occupied Bldg. Sq. Ft. [2]	Total Annual Taxable Sales
Annual Taxable Sales from Onsite Nonresidential Development							
Office/Flex/R&D							
Office	$20	777,058	$15,541,152	158,251	$3,165,025	935,309	$18,706,178
Flex: R&D/Office	$20	461,710	$9,234,198	64,946	$1,298,916	526,656	$10,533,114
Total Office/Flex/R&D		**1,238,768**	**$24,775,350**	**223,197**	**$4,463,941**	**1,461,965**	**$29,239,292**
Manufacturing	$50	865,522	$43,276,081	25,653	$1,282,644	891,175	$44,558,726
Retail							
Industrial Commercial	$185	59,511	$11,009,572	9,510	$1,759,350	69,021	$12,768,922
Ancillary Retail	$185	59,511	$11,009,572	36,090	$6,676,733	95,602	$17,686,306
Total Retail		**119,022**	**$22,019,145**	**45,600**	**$8,436,083**	**164,623**	**$30,455,228**
Hotel/Conference	$0	160,000	$0	0	$0	160,000	$0
Public/Nonprofit	$0	128,253	$0	80,180	$0	208,433	$0
Total Annual Taxable Sales from Onsite Nonresidential Development		**2,511,565**	**$90,070,576**	**374,630**	**$14,182,669**	**2,886,195**	**$104,253,245**
Less Total Annual Taxable Sales from Market Support (within the Project) [3]			$3,939,779		$1,642,702		$5,582,481
Annual Taxable Sales less Market Support			**$86,130,798**		**$12,539,967**		**$98,670,765**
Less Shift of Sales from Existing Regional and Community Retail to the Project [4]	*Shift from Existing Retail* 0%		$0		$0		$0
Subtotal Nonresidential Taxable Sales			**$86,130,798**		**$12,539,967**		**$98,670,765**

sales

Source: City of Davis; California Board of Equalization (BOE); CoStar; March 2015 Mace Ranch Innovation Center Urban Decay Analysis, ALH Urban & Regional Economics; EPS.

[1] Annual taxable sales per sq. ft. based on taxable sales data collected from existing development in the 2nd Street Corridor and Interland University Research Park. Data is based on annual retail and nonretail business-to-business taxable sales by land use category over the last 5 years (2010-2014), as provided by the City of Davis. In addition, EPS consulted published taxable sales data from CA BOE (calendar year 2013), estimated occupied nonretail building square footage from CoStar, and published reports citing taxable sales per square foot for nonretail uses.
[2] For vacancy rate assumtions, refer to Table A-3.
[3] Estimated in Table B-5A.
[4] Reflects a 0% shift predicated on March 2015 Urban Decay Analysis completed by ALH Economics which concluded that development of the project's retail component is not likely to result in long-term retail sales diversions relevant to the existing retail base.

Table B-6
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Transient Occupancy Tax (TOT) Revenue (2015$)

Item	Formula	Assumption	Annual TOT Revenue at Buildout		
			MRIC	Nishi	**Total**
Hotel Rooms [1]	*a*		186	0	186
Annual Rooms Available	*b = a * 365*	365	68,039	0	68,039
Occupancy Rate [2]	*c*	70%			
Average Daily Room Rate [2]	*d*	$150			
City of Davis TOT Rate	*e*	10%			
Annual Transient Occupancy Tax (Rounded)	*f = b * c * d * e*		**$714,408**	**$0**	**$714,408**

tot

Source: Smith Travel Research; EPS.

[1] Hotel rooms based on information provided by the project applicants, as shown in Table A-2.
[2] Assumptions based on recent hotel trends in the City of Davis derived from Smith Travel Research as of July 2015.

Table B-7
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Business License Tax Revenue (2015$)

Item	Average Annual Business License Revenue per Bldg. Sq. Ft. [1]	Annual Business License Tax Revenue at Buildout					
		MRIC		Nishi		Total	
		Occupied Commercial Building Sq. Ft. [2]	Business License Tax	Occupied Commercial Building Sq. Ft. [2]	Business License Tax	Occupied Commercial Building Sq. Ft. [2]	Business License Tax
Office/Flex/R&D							
Office	$0.18	777,058	$139,870	158,251	$28,485	935,309	$168,356
Flex: R&D/Office	$0.18	461,710	$83,108	64,946	$11,690	526,656	$94,798
Total Office/Flex/R&D		**1,238,768**	**$222,978**	**$223,197**	**$40,175**	**1,461,965**	**$263,154**
Manufacturing	$0.18	865,522	$155,794	25,653	$4,618	891,175	$160,411
Retail							
Industrial Commercial	$0.12	59,511	$7,141	9,510	$1,141	69,021	$8,283
Ancillary Retail	$0.12	59,511	$7,141	36,090	$4,331	95,602	$11,472
Total Retail		**119,022**	**$14,283**	**$45,600**	**$5,472**	**164,623**	**$19,755**
Hotel/Conference	$0.03	160,000	$4,800	0	$0	160,000	$4,800
Public/Nonprofit [3]	$0.00	0	$0	0	$0	0	$0
Commercial Business License Tax Revenue		**2,383,312**	**$397,855**	**294,450**	**$50,265**	**2,677,762**	**$448,120**

license

Source: City of Davis; Yolo 101 JV and R&B Delta, LLC; Nishi Gateway LLC; EPS.

[1] Reflects average business license revenue per building square foot, as provided by the City of Davis.
[2] For vacancy rate assumtions, refer to Table A-3.
[3] Public/Nonprofit land uses are exempt from paying the business license tax.

Table B-8
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Municipal Service Tax Revenue (2015$)

Item	Assumption	Annual Municipal Service Tax Revenue at Buildout					
		MRIC		Nishi		Total	
		Building Sq. Ft. / Units	Average Lot Size	Building Sq. Ft. / Units	Average Lot Size	Building Sq. Ft. / Units	Average Lot Size
Residential Units							
Owner-Occupied		0	0	210	315,000	210	315,000
Renter-Occupied		0	0	440	660,000	440	660,000
Total Residential Units		**0**	**0**	**650**	**975,000**	**650**	**975,000**
Base Residential Tax Rate per Unit	*$83.64*						
Lot Size Tax Rate per Sq. Ft.	*$0.00058*						
Total Residential Municipal Service Tax		**$0**		**$54,928**		**$54,928**	
Commercial (Sq. Ft.)							
Office/Flex/R&D							
Office		846,468	2,418,480	172,387	492,534	1,018,855	2,911,014
Flex: R&D/Office		513,011	1,465,746	72,162	206,177	585,173	1,671,923
Total Office/Flex/R&D		**1,359,479**	**3,884,226**	**244,549**	**698,711**	**1,604,028**	**4,582,937**
Manufacturing		952,169	1,904,338	28,221	56,442	980,390	1,960,780
Retail							
Industrial Commercial		62,578	250,310	10,000	40,000	72,578	290,310
Ancillary Retail		62,578	250,310	37,950	151,800	100,528	402,110
Total Retail		**125,155**	**500,620**	**47,950**	**191,800**	**173,105**	**692,420**
Hotel/Conference		160,000	640,000	0	0	160,000	640,000
Public/Nonprofit [1]		12,825	51,301	8,018	32,072	20,843	83,373
Total Commercial Sq. Ft.		**2,609,628**	**6,980,485**	**328,738**	**979,025**	**2,938,366**	**7,959,510**
Base Commercial Tax Rate per Sq. Ft.	*$0.11*						
Lot Size Tax Rate per Sq. Ft.	*$0.00058*						
Total Commercial Municipal Service Tax		**$280,902**		**$35,443**		**$316,345**	
Total Municipal Service Tax		**$280,902**		**$90,371**		**$371,273**	

municipal

Source: City of Davis; EPS.

[1] Estimated Public/Nonprofit uses not owned by UC Davis is subject to paying municipal service tax. Estimated Public/Nonprofit uses owned by UC Davis are exempt from paying municipal service taxes and are excluded from this analysis.

Table B-9
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Public Safety Tax Revenue (2015$)

Item	Assumption	Annual Public Safety Tax Revenue at Buildout					
		MRIC		Nishi		Total	
		Units/ Bldg. Sq. Ft.	Average Lot Size	Units/ Bldg. Sq. Ft.	Average Lot Size	Units/ Bldg. Sq. Ft.	Average Lot Size
Residential Units							
Owner-Occupied		0	0	210	315,000	210	315,000
Renter-Occupied		0	0	440	660,000	440	660,000
Total Residential Units		**0**	**0**	**650**	**975,000**	**650**	**975,000**
Base Residential Tax Rate per Unit	$65.64						
Lot Size Tax Rate per Sq. Ft.	$0.00049						
Total Residential Public Safety Tax Revenue		**$0**		**$43,144**		**$43,144**	
Commercial							
Office/Flex/R&D							
Office		846,468	2,418,480	172,387	492,534	1,018,855	2,911,014
Flex: R&D/Office		513,011	1,465,746	72,162	206,177	585,173	1,671,923
Total Office/Flex/R&D		**1,359,479**	**3,884,226**	**244,549**	**698,711**	**1,604,028**	**4,582,937**
Manufacturing		952,169	1,904,338	28,221	56,442	980,390	1,960,780
Retail							
Industrial Commercial		62,578	250,310	10,000	40,000	72,578	290,310
Ancillary Retail		62,578	250,310	37,950	151,800	100,528	402,110
Total Retail		**125,155**	**500,620**	**47,950**	**191,800**	**173,105**	**692,420**
Hotel/Conference		160,000	640,000	0	0	160,000	640,000
Public/Nonprofit [1]		12,825	51,301	8,018	32,072	20,843	83,373
Total Commercial		**2,596,803**	**6,929,184**	**320,720**	**946,953**	**2,917,523**	**7,876,137**
Commercial Tax Rate per Sq. Ft.	$0.13						
Lot Size Tax Rate per Sq. Ft.	$0.00049						
Total Commercial Public Safety Tax Revenue		**$340,980**		**$42,158**		**$383,137**	
Total Public Safety Tax Revenue		**$340,980**		**$85,301**		**$426,281**	

safety

Source: City of Davis; EPS.

[1] Estimated Public/Nonprofit uses not owned by UC Davis are subject to paying municipal service taxes. Estimated Public/Nonprofit uses owned by UC Davis are exempt from paying these taxes and are excluded from this analysis.

APPENDIX C:

Expenditure-Estimating Tables

Table C-1
Davis Innovation Centers
Fiscal Impact Analysis
Expenditure-Estimating Procedures (2015$)

Expenditure Category	Estimating Procedure	Case Study Reference	FY 2015-16 City Adopted Expenditures	Service Population [1]	Adjustment Factor [2]	Expenditure Multiplier
General Fund Expenditures						
City Attorney	Per Person Served	-	$362,967	76,233	75%	$3.57
City Council	Per Person Served	-	$170,299	76,233	75%	$1.68
City Manager's Office	Per Person Served	-	$2,549,984	76,233	75%	$25.09
Administrative Services	Per Person Served	-	$2,638,435	76,233	75%	$25.96
Community Dev. & Sustainability	Per Person Served	-	$1,969,493	76,233	100%	$25.84
Community Services	Per Person Served	-	$4,737,420	76,233	100%	$62.14
Parks & Open Space Management	Case Study	Table C-3	$5,352,063	NA	NA	NA
Fire	Case Study	Table C-4	$8,745,077	NA	NA	NA
Police	Case Study	Table C-5	$16,080,902	NA	NA	NA
Public Works	Case Study	Table C-6	$1,779,363	NA	NA	NA
Capital Improvements	[3]	-	$6,574,280	NA	NA	NA
Debt Service	[3]	-	$183,453	NA	NA	NA
RDA Successor Agency	[3]	-	$0	NA	NA	NA
Nondepartmental	[3]	-	$285,979	NA	NA	NA
Total General Fund Expenditures			**$51,429,715**			
General Fund Reserve			$679,656			
Total General Fund (Incl. General Fund Reserve)			**$52,109,371**			

expend

Source: City of Davis FY 2015-16 Adopted Budget; EPS.

[1] Represents Citywide residents or persons served as shown in Table A-1.
[2] Adjustment factors provided by the City of Davis. Represents the percentage of expenditures estimated to be impacted by new growth.
[3] This expenditure category is not expected to be impacted by the project and is omitted from this analysis.

Table C-2
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Expenditures at Buildout (2015$)

Expenditures	Annual Net Expenditures at Buildout		
	MRIC	Nishi	**Total**
Formula	*a*	*b*	*c = a + b*
General Fund Expenditures			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$69,000	$57,000	$126,000
Administrative Services	$71,000	$59,000	$130,000
Community Dev. & Sustainability	$71,000	$59,000	$130,000
Community Services	$170,000	$141,000	$311,000
Parks & Open Space Management	$0	$127,000	$127,000
Fire	$376,000	$312,000	$688,000
Police	$639,000	$530,000	$1,169,000
Public Works	$174,000	$54,000	$228,000
Total General Fund Expenditures	**$1,585,000**	**$1,351,000**	**$2,936,000**

net_exp

Source: City of Davis; EPS.

Table C-3
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Parks & Open Space Management Expenditures (2015$)

Item	Annual Maintenance Cost Estimate Per Acre [1]	Annual Parks/Open Space Maintenance Costs		
		MRIC [2]	Nishi [3]	**Total**
Parks and Open Space Acreage				
Parks	$10,855	-	4.9	4.9
Greenbelts and Linear Greens	$7,961	-	5.0	5.0
Habitat/Open Space	$3,618	-	9.4	9.4
Total		**-**	**19.3**	**19.3**
Total Parks and Open Space Expenditures		**$0**	**$127,004**	**$127,004**

parks_exp

Source: City of Davis; EPS.

[1] Annual maintenance cost estimates for parks and open space provided by the City of Davis, as of July 2015.
[2] Under the Base Development Program, parks and open space expenditures for MRIC will be funded with private sources and are excluded from this analysis.
[3] Allocation of parks and open space acreage provided by the City of Davis, based on information in the Nishi DEIR.

Table C-4
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Fire Department Operating and Maintenance Expenditures (2015$)

Item	City of Davis FY 2015-16 Budget	Assumption	Adjusted City of Davis FY 2015-16 Budget	Annual Fire Expenditures MRIC	Nishi	Total
Annual City Fire Dept. Expenditures [1]		*Adj. Factor*				
General Fund Fire Dept. Expenditures	$8,745,077	100%	$8,745,077			
Prop. 172 Public Safety Sales Tax Revenues	$491,000	50%	$245,500			
Public Safety Tax Revenues	$2,955,040	50%	$1,477,520			
Total Annual Fire Department Expenditures	**$12,191,117**		**$10,468,097**			
Citywide Persons Served		76,233				
Citywide Fire Expenditures per Persons Served		$137				
Project Persons Served				2,736	2,269	5,005
Total Annual Fire Department Expenditures				$375,694	$311,533	$687,227

fire

Source: City of Davis; EPS.

[1] Assumes annual City Fire Department expenditures are funded with half of Proposition 172 Sales Tax and half of Public Safety tax revenues, in addition to other General Fund Revenues, per the City of Davis.

Table C-5
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Police Department Operating and Maintenance Expenditures (2015$)

Item	City of Davis FY 2015-16 Budget	Assumption	Adjusted City of Davis FY 2015-16 Budget	Annual Police Expenditures MRIC	Nishi	Total
Annual City Police Dept. Expenditures [1]		*Adj. Factor*				
General Fund Police Dept. Expenditures	$16,080,902	100%	$16,080,902			
Prop. 172 Public Safety Sales Tax Revenues	$491,000	50%	$245,500			
Public Safety Tax Revenues	$2,955,040	50%	$1,477,520			
Total Annual Police Department Expenditures	**$19,526,942**		**$17,803,922**			
Citywide Persons Served		76,233				
Citywide Police Expenditures per Person Served		$234				
Project Persons Served				2,736	2,269	5,005
Total Annual Police Department Expenditures				$638,972	$529,849	$1,168,821

police

Source: City of Davis; EPS.

[1] Assumes annual City Police Department expenditures are funded with half of Proposition 172 Sales Tax and half of Public Safety tax revenues, in addition to other General Fund Revenues, per the City of Davis.

Table C-6
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Public Works Expenditures (2015$)

Item	Annual Amortized Cost [1]	/Unit	Annual Public Works Expenditures MRIC [2]	Nishi	Total
Quantity Assumptions [3]					
Roadway Lane Miles [4]			5.67	0.80	6.47
Sidewalk Linear Feet [5]			23,810	3,339	27,149
Sidewalk Curb and Gutter Linear Feet			22,270	3,339	25,609
Streetlights [6]			NA	42	42
Signalized Intersections			5	2	7
Non-Street Corridor Bike Path Lane Miles			1.9	1.2	3.0
Median Landscaping Acres [7]			NA	-	-
Parkway Planter Landscaping Acres [7] [8]			NA	0.63	0.63
Public Works Expenditures [9]					
Road Maintenance					
Surface Maintenance	$8,870	Per Lane Mile	$50,316	$7,056	$57,372
Pavement Overlay Maintenance	$3,399	Per Lane Mile	$19,280	$2,704	$21,984
Total Road Maintenance	**$12,269**		**$69,596**	**$9,760**	**$79,356**
Sidewalk Maintenance					
Surface Maintenance	$0.80	Per Linear Foot	$19,048	$2,671	$21,719
Sidewalk Rehab.	$0.56	Per Linear Foot	$13,334	$1,870	$15,203
Total Sidewalk Maintenance	**$1.36**		**$32,382**	**$4,541**	**$36,923**
Other Annual Maintenance Costs					
Sidewalk Curb and Gutter Rehab.	$0.07	Per Linear Foot	$1,514	$227	$1,741
Streetlights	$159	Per Streetlight	$0	$6,682	$6,682
Signalized Intersections	$10,900	Per Signalized Int.	$54,500	$21,800	$76,300
Non-Street Corridor Bike Paths	$1,331	Per Lane Mile	$2,506	$1,538	$4,043
Median Landscaping	$7,961	Per Acre	$0	$0	$0
Parkway Planter Landscaping	$7,961	Per Acre	$0	$5,034	$5,034
Total Other Annual Maintenance Costs			**$58,520**	**$35,281**	**$93,801**
Subtotal Public Works Expenditures			**$160,498**	**$49,582**	**$210,080**
	Percentage				
Administrative Expenses [10]	1.82%	of Expenditures	$2,921	$902	$3,823
Engineering Expenses [10]	6.50%	of Expenditures	$10,432	$3,223	$13,655
Total Public Works Expenditures			**$173,851**	**$53,707**	**$227,558**

works

Source: City of Davis; Yolo 101 JV and R&B Delta, LLC; Nishi Gateway LLC; EPS.

Table C-6
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual Public Works Expenditures (2015$)

[1] Annual maintenance costs provided by the City of Davis, as of July 2015.
[2] MRIC quantity assumptions exclude quantities in the Mace Triangle because a preliminary site plan has not been completed at the time of this analysis. Updates to this analysis may be warranted when data becomes available.
[3] Quantities of items funded through the City Public Works department provided by project applicants as of July 2015, except where otherwise noted.
[4] Includes Class 2 bikeways that are envisioned as part of the roadway network.
[5] Includes 10' bikeways that are envisioned as part of the 6' sidewalk network.
[6] A placeholder of 1 streetlight per 100 linear feet was used based on the National Lighting Product Information Program's November 2010 report "Streetlights for Collector Roads" for staggered light emitting diode (LED) streetlights.
[7] Under the Base Development Program, median and parkway planter landscaping for MRIC will be funded with private sources and are excluded from this analysis.
[8] Parkway Planter Acres for the Nishi project is calculated using a ratio of MRIC parkway planter acres to total MRIC roadway lane miles applied to Nishi roadway lane miles.
[8] The Nishi project is anticipated to comprise a single bus stop to serve project development. However, the Public Works Department has estimated no significant annual expenditures to maintain bus stops.
[10] Percentage defined as the ratio of total administrative and engineering costs to the total Pubic Works budget, as provided by the City.

APPENDIX D:

Supporting Tables for Revenue Estimates

Table D-1
Davis Innovation Centers
Fiscal Impact Analysis
Preliminary Property Tax Allocations

	MRIC			Nishi			
				Nishi Gateway			Olive Drive
	Pre-Annexation Property Tax Allocation	Post-Annexation Property Tax Allocation		Pre-Annexation Property Tax Allocation	Post-Annexation Property Tax Allocation		
Fund/Agency	TRA 061-003	Yolo County	City of Davis	TRA 061-030	Yolo County	City of Davis	TRA 001-023
City/County Tax Sharing Assumption [1]		**50%**	**50%**		**50%**	**50%**	**NA**
Taxing Entities for Analysis							
County General Fund	11.0129%	5.5065%	5.5065%	12.3740%	6.1870%	6.1870%	-
County ACO Fund	1.3180%	0.6590%	0.6590%	1.4810%	0.7405%	0.7405%	-
City General Fund [2]	-	-	-	-	-	-	18.8100%
Total Taxing Entities for Analysis	**12.3309%**	**6.1655%**	**6.1655%**	**13.8550%**	**6.9275%**	**6.9275%**	**18.8100%**
Other Taxing Entities							
County Library	1.9700%	-	-	2.2140%	-	-	NA
County Road District #2	2.0998%	-	-	0.0000%	-	-	NA
Davis Cemetery District	0.3162%	-	-	0.0000%	-	-	NA
East Davis Fire District	9.6613%	-	-	0.0000%	-	-	NA
Sacto-Yolo Mosquito &Vector Control	0.9268%	-	-	0.0000%	-	-	NA
Yolo County Flood Control District	0.6757%	-	-	0.0000%	-	-	NA
Solano County Flood Control	0.0000%	-	-	4.2960%	-	-	NA
Yolo County Resources Conservation District	0.0317%	-	-	0.3130%	-	-	NA
County Schools	3.3291%	-	-	3.7410%	-	-	NA
Davis Joint Unified School District	40.1260%	-	-	45.0860%	-	-	NA
Los Rios Community College District	4.9785%	-	-	5.5930%	-	-	NA
ERAF	23.5540%	-	-	24.9020%	-	-	NA
Total Other Taxing Entities	**87.6691%**	-	-	**86.1450%**	-	-	NA
Total Property Tax Allocation	**100.0000%**	**6.1655%**	**6.1655%**	**100.0000%**	**6.9275%**	**6.9275%**	**18.8100%**

tax_alloc

Source: Goodwin Consulting Group February 13, 2015 Memorandum "Preliminary Analysis of Infrastructure Alternatives - Nishi Property Development Plan"; Yolo County; EPS.

[1] Preliminary tax sharing assumption, subject to negotiations between the City and County. Additional tax sharing assumptions evaluated in sensitivity scenarios.
[2] TRA 001-023 is currently part of Davis Successor Agency (formerly redevelopment agency) and the precise property tax breakdown by entity is not available from Yolo County. However, the County Auditor-Controller provided a reasonable estimate for the post-ERAF allocation factor for the City's General Fund for FY 2015-16. Any variation in the exact allocation factor is estimated to be nominal.

Table D-2
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Assessed Valuation at Buildout: Base Development Program (2015$)

Item	Rounded Value per Unit/Sq. Ft. [1]	Total Assessed Value (Rounded) MRIC Units/ Sq. Ft.	Total Assessed Value (Rounded) MRIC Assessed Value
Residential (Units)	*Per Unit*	*Units*	
Owner-Occupied Residential	$460,000	0	$0
Renter-Occupied Residential	$308,000	0	$0
Total Residential		**0**	**$0**
Commercial Land Use	*Per Sq. Ft.*	*Sq. Ft.*	
Office/Flex/R&D			
Office	$225	846,468	$190,455,300
Flex: R&D/Office	$245	513,011	$125,687,695
Total Office/Flex/R&D		**1,359,479**	**$316,142,995**
Manufacturing	$250	952,169	$238,042,250
Retail			
Industrial Commercial	$225	62,578	$14,079,938
Ancillary Retail	$225	62,578	$14,079,938
Total Retail		**125,155**	**$28,159,875**
Hotel/Conference	$225	160,000	$36,000,000
Public/Nonprofit	$0	128,253	$0
Total Commercial Sq. Ft.		**2,725,056**	**$618,345,120**
Total Proposed Land Uses			**$618,345,120**

Table D-2
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Assessed Valuation at Buildout: Base Development Program (2015$)

Item	Rounded Value per Unit/Sq. Ft. [1]	Total Assessed Value (Rounded)					
		Nishi					
		Nishi Gateway		Olive Drive		Total	
		Units/ Sq. Ft.	Assessed Value	Units/ Sq. Ft.	Assessed Value	Units/ Sq. Ft.	Assessed Value
Residential (Units)	*Per Unit*	*Units*		*Units*		*Units*	
Owner-Occupied Residential	$460,000	210	$96,600,000	0	$0	210	$96,600,000
Renter-Occupied Residential	$308,000	440	$135,520,000	0	$0	440	$135,520,000
Total Residential		**650**	**$232,120,000**	**0**	**$0**	**650**	**$232,120,000**
Commercial Land Use	*Per Sq. Ft.*	*Sq. Ft.*		*Sq. Ft.*		*Sq. Ft.*	
Office/Flex/R&D							
Office	$225	152,685	$34,354,022	19,702	$4,433,053	172,387	$38,787,075
Flex: R&D/Office	$245	63,914	$15,659,042	8,248	$2,020,648	72,162	$17,679,690
Total Office/Flex/R&D		**216,599**	**$50,013,064**	**27,950**	**$6,453,701**	**244,549**	**$56,466,765**
Manufacturing	$250	28,221	$7,055,250	0	$0	28,221	$7,055,250
Retail							
Industrial Commercial	$225	10,000	$2,250,000	0	$0	10,000	$2,250,000
Ancillary Retail	$225	10,000	$2,250,000	27,950	$6,288,750	37,950	$8,538,750
Total Retail		**20,000**	**$4,500,000**	**27,950**	**$6,288,750**	**47,950**	**$10,788,750**
Hotel/Conference	$225	0	$0	0	$0	0	$0
Public/Nonprofit	$0	80,180	$0	0	$0	80,180	$0
Total Commercial Sq. Ft.		**345,000**	**$61,568,314**	**55,900**	**$12,742,451**	**400,900**	**$74,310,765**
Total Proposed Land Uses			**$293,688,314**		**$12,742,451**		**$306,430,765**

Table D-2
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Assessed Valuation at Buildout: Base Development Program (2015$)

Item	Rounded Value per Unit/Sq. Ft. [1]	Total Assessed Value (Rounded)	
		Total	
		Units/ Sq. Ft.	Assessed Value
Residential (Units)	*Per Unit*	*Units*	
Owner-Occupied Residential	$460,000	210	$96,600,000
Renter-Occupied Residential	$308,000	440	$135,520,000
Total Residential		**650**	**$232,120,000**
Commercial Land Use	*Per Sq. Ft.*	*Sq. Ft.*	
Office/Flex/R&D			
Office	$225	1,018,855	$229,242,375
Flex: R&D/Office	$245	585,173	$143,367,385
Total Office/Flex/R&D		**1,604,028**	**$372,609,760**
Manufacturing	$250	980,390	$245,097,500
Retail			
Industrial Commercial	$225	72,578	$16,329,938
Ancillary Retail	$225	100,528	$22,618,688
Total Retail		**173,105**	**$38,948,625**
Hotel/Conference	$225	160,000	$36,000,000
Public/Nonprofit	$0	208,433	$0
Total Commercial Sq. Ft.		**3,125,956**	**$692,655,885**
Total Proposed Land Uses			**$924,775,885**

av_base

Source: City of Davis; EPS.

[1] See Table A-5 for assumption sources.

Table D-3
Davis Innovation Centers
Fiscal Impact Analysis
Average Income and Retail Expenditures for Nishi Residential Units (2015$)

Residential Land Use	Nishi Dwelling Units	Estimated Home Value / Monthly Rent [1]	Estimated Annual Housing Costs [2]	Estimated Household Income [3]	Taxable Expenditures as a Percent of Income [4]	Annual Taxable Expenditures per Household (Rounded) [5]
Average Household Income						
Owner-Occupied Residential	210	$460,000	$36,000	$103,000	24%	$25,000
Renter-Occupied Residential	440	$2,300	$28,000	$80,000	25%	$20,000

income

Source: City of Davis; Andy Plescia/Goodwin Consulting Group; EPS.

[1] Residential assessed value based on data prepared by Andy Plescia and Goodwin Consulting Group as of July 2015. Annual rent based on a unit size of 970 sq. ft., capitalization rate of 6% and a target value per unit of $308,000.
[2] Annual mortgage based on a 6%, 30-year fixed rate mortgage with a 20% down payment and 2% for annual taxes and insurance. Values have been rounded to the nearest thousand dollars.
[3] Assumes mortgage lending guidelines allow no more than 35% of income dedicated to mortgage payments, taxes and insurance. Assumes renters pay 35% of income in rent.
[4] Taxable expenditures as a percentage of income derived from the 2013 BLS Consumer Expenditure Survey.
[5] Average retail expenditures per household used to estimate annual sales tax revenues, as shown in Table B-5A.

APPENDIX E:

Infrastructure Facility Maintenance Responsibility: Base Development Program and Alternative Scenarios

Table E-1
Davis Innovation Centers
Fiscal Impact Analysis
MRIC Infrastructure Facility Maintenance Responsibility

MRIC

No.	Item	Maintenance Funding Scenarios			City Fund Funding [2]		
		Base [1]	Alternative #1	Alternative #2	Base	Alternative #1	Alternative #2
	Street Maintenance						
1	Street Pavement Behind Curbs	Public	Public	Private	General Fund	General Fund	NA
2	Street Sidewalk	Public	Public	Private	General Fund	General Fund	NA
3	Traffic Signals/Signalized Intersections	Public	Public	Private	General Fund	General Fund	NA
3	Bike Path	Public	Public	Private	General Fund	General Fund	NA
4	Bike Path (Non-Street Corridors)	Public	Public	Private	General Fund	General Fund	NA
	Landscaping and Lighting						
5	Median Landscaping	Private	Public	Private	NA	General Fund	NA
6	Parkway Planter Landscaping	Private	Public	Private	NA	General Fund	NA
7	Street Lights	Private	Public	Private	NA	General Fund	NA
8	Internal Areas Lights	Private	Private	Private	NA	NA	NA
	Transit Maintenance						
9	Transit Plaza	Private	Private	Private	NA	NA	NA
	Utilities Maintenance						
10	Water Distribution Mainline Piping	Public	Public	Private	Water Fund	Water Fund	NA
11	Sewer Collection Mainline Piping	Public	Public	Private	Sewer Fund	Sewer Fund	NA
12	Sewer Lift Stations	Public	Public	Private	Sewer Fund	Sewer Fund	NA
13	Irrigation Well	Private	Private	Private	NA	NA	NA
14	Irrigation Distribution Mainline Piping	Private	Private	Private	NA	NA	NA
15	Onsite Reach of Mace Channel	Public	Public	Private	Storm Sewer Fund	Storm Sewer Fund	NA
16	Offsite Reach of Mace Channel	Public	Public	Private	Storm Sewer Fund	Storm Sewer Fund	NA
17	Onsite Detention Storage	Private	Private	Private	NA	NA	NA
18	Storm Drain Pipes/Inlets	Public	Public	Private	Storm Sewer Fund	Storm Sewer Fund	NA
	Parks and Open Space						
19	Public Parks	Private	Private	Private	NA	NA	NA
20	Greenbelts and Linear Greens	Private	Private	Private	NA	NA	NA
21	Habitat/Open Space	Private	Private	Private	NA	NA	NA
22	Private Parks	Private	Private	Private	NA	NA	NA

m_maint

Source: City of Davis; Yolo 101 JV and R&B Delta, LLC; EPS.

[1] The Base Development Program is consistent with the August 2015 Draft Environmental Impact Report for the Mace Ranch Innovation Center Project, prepared by Raney Planning
[2] Non-General Fund City funds (e.g., Water Fund, Sewer Fund, Storm Sewer Fund) are enterprise funds and are not evaluated in this analysis.

Table E-2
Davis Innovation Centers
Fiscal Impact Analysis
Nishi Infrastructure Facility Maintenance Responsibility

Nishi

No.	Item	Maintenance Funding Scenarios [1]			City Fund Funding [2]		
		Base	Alternative #1	Alternative #2	Base	Alternative #1	Alternative #2
	Street Maintenance						
1	Street Pavement Behind Curbs	Public	Public	Private	General Fund	General Fund	NA
2	Street Sidewalk	Public	Public	Private	General Fund	General Fund	NA
3	Traffic Signals/Signalized Intersections	Public	Public	Private	General Fund	General Fund	NA
4	Bike Path (Non-Street Corridors)	Public	Public	Private	General Fund	General Fund	NA
	Landscaping and Lighting						
5	Parkway Planter Landscaping	Public	Private	Private	General Fund	NA	NA
6	Street Lights	Public	Public	Private	General Fund	General Fund	NA
7	Internal Areas Lights	Private	Private	Private	NA	NA	NA
	Transit Maintenance						
8	Bus Stop	Public	Private	Private	General Fund	NA	NA
	Utilities Maintenance						
9	Water Distribution Mainline Piping	Public	Public	Private	Water Fund	Water Fund	NA
10	Sewer Collection Mainline Piping	Public	Public	Private	Sewer Fund	Sewer Fund	NA
11	Sewer Lift Stations	Public	Public	Private	Sewer Fund	Sewer Fund	NA
12	Irrigation Well	Public	Private	Private	Water Fund	NA	NA
13	Irrigation Distribution Mainline Piping	Public	Private	Private	Water Fund	NA	NA
14	Onsite Detention Storage	Public	Public	Private	Storm Sewer Fund	Storm Sewer Fund	NA
15	Storm Drain Pipes/Inlets	Public	Public	Private	Storm Sewer Fund	Storm Sewer Fund	NA
	Parks and Open Space						
16	Public Parks	Public	Private	Private	General Fund	NA	NA
17	Greenbelts and Linear Greens	Public	Private	Private	General Fund	NA	NA
18	Habitat/Open Space	Public	Private	Private	General Fund	NA	NA
19	Private Parks	Private	Private	Private	NA	NA	NA
20	Putah Creek Parkway [3]	Public	Private	Private	NA	NA	NA
21	Parking Lots/Courtyards	Private	Private	Private	NA	NA	NA

n_maint

Source: City of Davis; Nishi Gateway LLC; EPS.

[1] The Base Development Program and alternative funding scenarios were provided by the City of Davis in July 2015.
[2] Non-General Fund City funds (e.g., Water Fund, Sewer Fund, Storm Sewer Fund) are enterprise funds and are not evaluated in this analysis.
[3] Putah Creek Parkway is not a new cost and is excluded from the fiscal analysis.

APPENDIX F:

Fiscal Impact Analysis Summary Tables: Sensitivity Scenarios

Table F-1
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual General Fund Revenue and Expenditure Summary: MRIC Housing (2015$) [1]

Scenario 1: MRIC Housing

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [2]			
Property Taxes	$575,000	$227,000	$802,000
Property Tax In-Lieu of Vehicle License Fees	$756,000	$249,000	$1,005,000
Property Transfer Tax	$60,000	$22,000	$82,000
Sales and Use Taxes	$744,000	$185,000	$929,000
Property Tax in-Lieu of Sales Tax	$248,000	$62,000	$310,000
Transient Occupancy Tax	$714,000	$0	$714,000
Business License Tax	$398,000	$50,000	$448,000
Municipal Service Tax	$353,000	$90,000	$443,000
Franchise Fees	$79,000	$36,000	$115,000
Charges for Services	$78,000	$60,000	$138,000
Community Services Revenue	$135,000	$103,000	$238,000
Fines and Forfeitures	$45,000	$20,000	$65,000
Total General Fund Revenues	**$4,185,000**	**$1,104,000**	**$5,289,000**
Other Annual Non-General Fund Revenues [2] [3]			
Gas Tax Revenues	$48,000	$37,000	$85,000
Parks Maintenance Tax	$89,000	$40,000	$129,000
Prop. 172 Public Safety Sales Tax	$26,000	$7,000	$33,000
Public Safety Tax	$397,000	$85,000	$482,000
Total Other Non-General Fund Revenues	**$560,000**	**$169,000**	**$729,000**
Total Annual General Fund and Non-General Fund Revenues	**$4,745,000**	**$1,273,000**	**$6,018,000**
Annual General Fund Expenditures [4]			
City Attorney	$18,000	$8,000	$26,000
City Council	$8,000	$4,000	$12,000
City Manager's Office	$126,000	$57,000	$183,000
Administrative Services	$130,000	$59,000	$189,000
Community Dev. & Sustainability	$130,000	$59,000	$189,000
Community Services	$312,000	$141,000	$453,000
Parks & Open Space Management	$0	$127,000	$127,000
Fire	$689,000	$312,000	$1,001,000
Police	$1,173,000	$530,000	$1,703,000
Public Works	$193,000	$54,000	$247,000
Total General Fund Expenditures	**$2,779,000**	**$1,351,000**	**$4,130,000**
Annual General Fund Surplus/(Deficit)	**$1,966,000**	**($78,000)**	**$1,888,000**

scen_1

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] Refer to Table 2 for a full description of this sensitivity scenario.
[2] See Table B-1 for details on revenue estimating procedures.
[3] Reflects additional revenues used to fund General Fund expenditures.
[4] See Table C-1 for details on expenditure estimating procedures.

Table F-2
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual General Fund Revenue and Expenditure Summary: No MRIC Hotel (2015$) [1]

Scenario 2: No MRIC Hotel

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [2]			
Property Taxes	$382,000	$227,000	$609,000
Property Tax In-Lieu of Vehicle License Fees	$503,000	$249,000	$752,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$770,000	$185,000	$955,000
Property Tax in-Lieu of Sales Tax	$257,000	$62,000	$319,000
Transient Occupancy Tax	$0	$0	$0
Business License Tax	$419,000	$50,000	$469,000
Municipal Service Tax	$281,000	$90,000	$371,000
Franchise Fees	$46,000	$36,000	$82,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$26,000	$20,000	$46,000
Total General Fund Revenues	**$2,718,000**	**$1,104,000**	**$3,822,000**
Other Annual Non-General Fund Revenues [2] [3]			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$52,000	$40,000	$92,000
Prop. 172 Public Safety Sales Tax	$27,000	$7,000	$34,000
Public Safety Tax	$341,000	$85,000	$426,000
Total Other Non-General Fund Revenues	**$420,000**	**$169,000**	**$589,000**
Total Annual General Fund and Non-General Fund Revenues	**$3,138,000**	**$1,273,000**	**$4,411,000**
Annual General Fund Expenditures [4]			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$73,000	$57,000	$130,000
Administrative Services	$75,000	$59,000	$134,000
Community Dev. & Sustainability	$75,000	$59,000	$134,000
Community Services	$180,000	$141,000	$321,000
Parks & Open Space Management	$0	$127,000	$127,000
Fire	$399,000	$312,000	$711,000
Police	$678,000	$530,000	$1,208,000
Public Works	$174,000	$54,000	$228,000
Total General Fund Expenditures	**$1,669,000**	**$1,351,000**	**$3,020,000**
Annual General Fund Surplus/(Deficit)	**$1,469,000**	**($78,000)**	**$1,391,000**

scen_2

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] Refer to Table 2 for a full description of this sensitivity scenario.
[2] See Table B-1 for details on revenue estimating procedures.
[3] Reflects additional revenues used to fund General Fund expenditures.
[4] See Table C-1 for details on expenditure estimating procedures.

Table F-3
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual General Fund Revenue and Expenditure Summary: Nishi Hotel (2015$) [1]

Scenario 3: Nishi Hotel

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [2]			
Property Taxes	$381,000	$229,000	$610,000
Property Tax In-Lieu of Vehicle License Fees	$502,000	$250,000	$752,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$744,000	$169,000	$913,000
Property Tax in-Lieu of Sales Tax	$248,000	$56,000	$304,000
Transient Occupancy Tax	$714,000	$479,000	$1,193,000
Business License Tax	$398,000	$43,000	$441,000
Municipal Service Tax	$281,000	$91,000	$372,000
Franchise Fees	$43,000	$35,000	$78,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$25,000	$20,000	$45,000
Total General Fund Revenues	**$3,370,000**	**$1,557,000**	**$4,927,000**
Other Annual Non-General Fund Revenues [2] [3]			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$49,000	$39,000	$88,000
Prop. 172 Public Safety Sales Tax	$26,000	$6,000	$32,000
Public Safety Tax	$341,000	$87,000	$428,000
Total Other Non-General Fund Revenues	**$416,000**	**$169,000**	**$585,000**
Total Annual General Fund and Non-General Fund Revenues	**$3,786,000**	**$1,726,000**	**$5,512,000**
Annual General Fund Expenditures [4]			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$69,000	$55,000	$124,000
Administrative Services	$71,000	$57,000	$128,000
Community Dev. & Sustainability	$71,000	$57,000	$128,000
Community Services	$170,000	$136,000	$306,000
Parks & Open Space Management	$0	$127,000	$127,000
Fire	$376,000	$301,000	$677,000
Police	$639,000	$511,000	$1,150,000
Public Works	$174,000	$54,000	$228,000
Total General Fund Expenditures	**$1,585,000**	**$1,310,000**	**$2,895,000**
Annual General Fund Surplus/(Deficit)	**$2,201,000**	**$416,000**	**$2,617,000**

scen_3

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] Refer to Table 2 for a full description of this sensitivity scenario.
[2] See Table B-1 for details on revenue estimating procedures.
[3] Reflects additional revenues used to fund General Fund expenditures.
[4] See Table C-1 for details on expenditure estimating procedures.

Table F-4
Davis Innovation Centers
Fiscal Impact Analysis

Scenario 4:
Property Tax Sharing Allocation: Alt. 1

Estimated Annual General Fund Revenue and Expenditure Summary: Property Tax Sharing Allocation: Alt. 1 (2015$) [1]

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [2]			
Property Taxes	$572,000	$329,000	$901,000
Property Tax In-Lieu of Vehicle License Fees	$502,000	$249,000	$751,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$744,000	$185,000	$929,000
Property Tax in-Lieu of Sales Tax	$248,000	$62,000	$310,000
Transient Occupancy Tax	$714,000	$0	$714,000
Business License Tax	$398,000	$50,000	$448,000
Municipal Service Tax	$281,000	$90,000	$371,000
Franchise Fees	$43,000	$36,000	$79,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$25,000	$20,000	$45,000
Total General Fund Revenues	**$3,561,000**	**$1,206,000**	**$4,767,000**
Other Annual Non-General Fund Revenues [2] [3]			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$49,000	$40,000	$89,000
Prop. 172 Public Safety Sales Tax	$26,000	$7,000	$33,000
Public Safety Tax	$341,000	$85,000	$426,000
Total Other Non-General Fund Revenues	**$416,000**	**$169,000**	**$585,000**
Total Annual General Fund and Non-General Fund Revenues	**$3,977,000**	**$1,375,000**	**$5,352,000**
Annual General Fund Expenditures [4]			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$69,000	$57,000	$126,000
Administrative Services	$71,000	$59,000	$130,000
Community Dev. & Sustainability	$71,000	$59,000	$130,000
Community Services	$170,000	$141,000	$311,000
Parks & Open Space Management	$0	$127,000	$127,000
Fire	$376,000	$312,000	$688,000
Police	$639,000	$530,000	$1,169,000
Public Works	$174,000	$54,000	$228,000
Total General Fund Expenditures	**$1,585,000**	**$1,351,000**	**$2,936,000**
Annual General Fund Surplus/(Deficit)	**$2,392,000**	**$24,000**	**$2,416,000**

scen_4

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] Refer to Table 2 for a full description of this sensitivity scenario.
[2] See Table B-1 for details on revenue estimating procedures.
[3] Reflects additional revenues used to fund General Fund expenditures.
[4] See Table C-1 for details on expenditure estimating procedures.

Table F-5
Davis Innovation Centers
Fiscal Impact Analysis

Scenario 5:
Property Tax Sharing Allocation: Alt. 2

Estimated Annual General Fund Revenue and Expenditure Summary: Property Tax Sharing Allocation: Alt. 2 (2015$) [1]

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [2]			
Property Taxes	$191,000	$126,000	$317,000
Property Tax In-Lieu of Vehicle License Fees	$502,000	$249,000	$751,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$744,000	$185,000	$929,000
Property Tax in-Lieu of Sales Tax	$248,000	$62,000	$310,000
Transient Occupancy Tax	$714,000	$0	$714,000
Business License Tax	$398,000	$50,000	$448,000
Municipal Service Tax	$281,000	$90,000	$371,000
Franchise Fees	$43,000	$36,000	$79,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$25,000	$20,000	$45,000
Total General Fund Revenues	**$3,180,000**	**$1,003,000**	**$4,183,000**
Other Annual Non-General Fund Revenues [2] [3]			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$49,000	$40,000	$89,000
Prop. 172 Public Safety Sales Tax	$26,000	$7,000	$33,000
Public Safety Tax	$341,000	$85,000	$426,000
Total Other Non-General Fund Revenues	**$416,000**	**$169,000**	**$585,000**
Total Annual General Fund and Non-General Fund Revenues	**$3,596,000**	**$1,172,000**	**$4,768,000**
Annual General Fund Expenditures [4]			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$69,000	$57,000	$126,000
Administrative Services	$71,000	$59,000	$130,000
Community Dev. & Sustainability	$71,000	$59,000	$130,000
Community Services	$170,000	$141,000	$311,000
Parks & Open Space Management	$0	$127,000	$127,000
Fire	$376,000	$312,000	$688,000
Police	$639,000	$530,000	$1,169,000
Public Works	$174,000	$54,000	$228,000
Total General Fund Expenditures	**$1,585,000**	**$1,351,000**	**$2,936,000**
Annual General Fund Surplus/(Deficit)	**$2,011,000**	**($179,000)**	**$1,832,000**

scen_5

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] Refer to Table 2 for a full description of this sensitivity scenario.
[2] See Table B-1 for details on revenue estimating procedures.
[3] Reflects additional revenues used to fund General Fund expenditures.
[4] See Table C-1 for details on expenditure estimating procedures.

Table F-6
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual General Fund Revenue and Expenditure Summary: Increased Taxable Sales (2015$) [1]

Scenario 6: Increased Taxable Sales

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [2]			
Property Taxes	$381,000	$227,000	$608,000
Property Tax In-Lieu of Vehicle License Fees	$502,000	$249,000	$751,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$1,550,000	$230,000	$1,780,000
Property Tax in-Lieu of Sales Tax	$517,000	$77,000	$594,000
Transient Occupancy Tax	$714,000	$0	$714,000
Business License Tax	$398,000	$50,000	$448,000
Municipal Service Tax	$281,000	$90,000	$371,000
Franchise Fees	$43,000	$36,000	$79,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$25,000	$20,000	$45,000
Total General Fund Revenues	**$4,445,000**	**$1,164,000**	**$5,609,000**
Other Annual Non-General Fund Revenues [2] [3]			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$49,000	$40,000	$89,000
Prop. 172 Public Safety Sales Tax	$55,000	$8,000	$63,000
Public Safety Tax	$341,000	$85,000	$426,000
Total Other Non-General Fund Revenues	**$445,000**	**$170,000**	**$615,000**
Total Annual General Fund and Non-General Fund Revenues	**$4,890,000**	**$1,334,000**	**$6,224,000**
Annual General Fund Expenditures [4]			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$69,000	$57,000	$126,000
Administrative Services	$71,000	$59,000	$130,000
Community Dev. & Sustainability	$71,000	$59,000	$130,000
Community Services	$170,000	$141,000	$311,000
Parks & Open Space Management	$0	$127,000	$127,000
Fire	$376,000	$312,000	$688,000
Police	$639,000	$530,000	$1,169,000
Public Works	$174,000	$54,000	$228,000
Total General Fund Expenditures	**$1,585,000**	**$1,351,000**	**$2,936,000**
Annual General Fund Surplus/(Deficit)	**$3,305,000**	**($17,000)**	**$3,288,000**

scen_6

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] Refer to Table 2 for a full description of this sensitivity scenario.
[2] See Table B-1 for details on revenue estimating procedures.
[3] Reflects additional revenues used to fund General Fund expenditures.
[4] See Table C-1 for details on expenditure estimating procedures.

Table F-7
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual General Fund Revenue and Expenditure Summary: Sales Tax Capture: Alt. 1 (2015$) [1]

Scenario 7:
Sales Tax Capture: Alt. 1

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [2]			
Property Taxes	$381,000	$227,000	$608,000
Property Tax In-Lieu of Vehicle License Fees	$502,000	$249,000	$751,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$779,000	$224,000	$1,003,000
Property Tax in-Lieu of Sales Tax	$260,000	$75,000	$335,000
Transient Occupancy Tax	$714,000	$0	$714,000
Business License Tax	$398,000	$50,000	$448,000
Municipal Service Tax	$281,000	$90,000	$371,000
Franchise Fees	$43,000	$36,000	$79,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$25,000	$20,000	$45,000
Total General Fund Revenues	**$3,417,000**	**$1,156,000**	**$4,573,000**
Other Annual Non-General Fund Revenues [2] [3]			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$49,000	$40,000	$89,000
Prop. 172 Public Safety Sales Tax	$28,000	$8,000	$36,000
Public Safety Tax	$341,000	$85,000	$426,000
Total Other Non-General Fund Revenues	**$418,000**	**$170,000**	**$588,000**
Total Annual General Fund and Non-General Fund Revenues	**$3,835,000**	**$1,326,000**	**$5,161,000**
Annual General Fund Expenditures [4]			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$69,000	$57,000	$126,000
Administrative Services	$71,000	$59,000	$130,000
Community Dev. & Sustainability	$71,000	$59,000	$130,000
Community Services	$170,000	$141,000	$311,000
Parks & Open Space Management	$0	$127,000	$127,000
Fire	$376,000	$312,000	$688,000
Police	$639,000	$530,000	$1,169,000
Public Works	$174,000	$54,000	$228,000
Total General Fund Expenditures	**$1,585,000**	**$1,351,000**	**$2,936,000**
Annual General Fund Surplus/(Deficit)	**$2,250,000**	**($25,000)**	**$2,225,000**

scen_7

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] Refer to Table 2 for a full description of this sensitivity scenario.
[2] See Table B-1 for details on revenue estimating procedures.
[3] Reflects additional revenues used to fund General Fund expenditures.
[4] See Table C-1 for details on expenditure estimating procedures.

Table F-8
Davis Innovation Centers
Fiscal Impact Analysis
Estimated Annual General Fund Revenue and Expenditure Summary: Sales Tax Capture: Alt. 2 (2015$) [1]

Scenario 8:
Sales Tax Capture: Alt. 2

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [2]			
Property Taxes	$381,000	$227,000	$608,000
Property Tax In-Lieu of Vehicle License Fees	$502,000	$249,000	$751,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$710,000	$145,000	$855,000
Property Tax in-Lieu of Sales Tax	$237,000	$48,000	$285,000
Transient Occupancy Tax	$714,000	$0	$714,000
Business License Tax	$398,000	$50,000	$448,000
Municipal Service Tax	$281,000	$90,000	$371,000
Franchise Fees	$43,000	$36,000	$79,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$25,000	$20,000	$45,000
Total General Fund Revenues	**$3,325,000**	**$1,050,000**	**$4,375,000**
Other Annual Non-General Fund Revenues [2] [3]			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$49,000	$40,000	$89,000
Prop. 172 Public Safety Sales Tax	$25,000	$5,000	$30,000
Public Safety Tax	$341,000	$85,000	$426,000
Total Other Non-General Fund Revenues	**$415,000**	**$167,000**	**$582,000**
Total Annual General Fund and Non-General Fund Revenues	**$3,740,000**	**$1,217,000**	**$4,957,000**
Annual General Fund Expenditures [4]			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$69,000	$57,000	$126,000
Administrative Services	$71,000	$59,000	$130,000
Community Dev. & Sustainability	$71,000	$59,000	$130,000
Community Services	$170,000	$141,000	$311,000
Parks & Open Space Management	$0	$127,000	$127,000
Fire	$376,000	$312,000	$688,000
Police	$639,000	$530,000	$1,169,000
Public Works	$174,000	$54,000	$228,000
Total General Fund Expenditures	**$1,585,000**	**$1,351,000**	**$2,936,000**
Annual General Fund Surplus/(Deficit)	**$2,155,000**	**($134,000)**	**$2,021,000**

scen_8

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] Refer to Table 2 for a full description of this sensitivity scenario.
[2] See Table B-1 for details on revenue estimating procedures.
[3] Reflects additional revenues used to fund General Fund expenditures.
[4] See Table C-1 for details on expenditure estimating procedures.

Table F-9
Davis Innovation Centers
Fiscal Impact Analysis

Scenario 9:
Ongoing Operations & Maintenance Responsibility: Alt. 1

Estimated Annual General Fund Revenue and Expenditure Summary: Ongoing Operations & Maintenance Responsibility: Alt. 1 (2015$) [1]

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [2]			
Property Taxes	$381,000	$227,000	$608,000
Property Tax In-Lieu of Vehicle License Fees	$502,000	$249,000	$751,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$744,000	$185,000	$929,000
Property Tax in-Lieu of Sales Tax	$248,000	$62,000	$310,000
Transient Occupancy Tax	$714,000	$0	$714,000
Business License Tax	$398,000	$50,000	$448,000
Municipal Service Tax	$281,000	$90,000	$371,000
Franchise Fees	$43,000	$36,000	$79,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$25,000	$20,000	$45,000
Total General Fund Revenues	**$3,370,000**	**$1,104,000**	**$4,474,000**
Other Annual Non-General Fund Revenues [2] [3]			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$49,000	$40,000	$89,000
Prop. 172 Public Safety Sales Tax	$26,000	$7,000	$33,000
Public Safety Tax	$341,000	$85,000	$426,000
Total Other Non-General Fund Revenues	**$416,000**	**$169,000**	**$585,000**
Total Annual General Fund and Non-General Fund Revenues	**$3,786,000**	**$1,273,000**	**$5,059,000**
Annual General Fund Expenditures [4]			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$69,000	$57,000	$126,000
Administrative Services	$71,000	$59,000	$130,000
Community Dev. & Sustainability	$71,000	$59,000	$130,000
Community Services	$170,000	$141,000	$311,000
Parks & Open Space Management	$0	$0	$0
Fire	$376,000	$312,000	$688,000
Police	$639,000	$530,000	$1,169,000
Public Works	$249,000	$48,000	$297,000
Total General Fund Expenditures	**$1,660,000**	**$1,218,000**	**$2,878,000**
Annual General Fund Surplus/(Deficit)	**$2,126,000**	**$55,000**	**$2,181,000**

scen_9

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] Refer to Table 2 for a full description of this sensitivity scenario.
[2] See Table B-1 for details on revenue estimating procedures.
[3] Reflects additional revenues used to fund General Fund expenditures.
[4] See Table C-1 for details on expenditure estimating procedures.

Table F-10
Davis Innovation Centers
Fiscal Impact Analysis

Scenario 10:
Ongoing Operations & Maintenance Responsibility: Alt. 2

Estimated Annual General Fund Revenue and Expenditure Summary: Ongoing Operations & Maintenance Responsibility: Alt. 2 (2015$) [1]

Item	Annual Fiscal Impacts at Buildout		
	MRIC	Nishi	Total
Formula	*a*	*b*	*c = b + a*
Annual General Fund Revenues [2]			
Property Taxes	$381,000	$227,000	$608,000
Property Tax In-Lieu of Vehicle License Fees	$502,000	$249,000	$751,000
Property Transfer Tax	$34,000	$22,000	$56,000
Sales and Use Taxes	$744,000	$185,000	$929,000
Property Tax in-Lieu of Sales Tax	$248,000	$62,000	$310,000
Transient Occupancy Tax	$714,000	$0	$714,000
Business License Tax	$398,000	$50,000	$448,000
Municipal Service Tax	$281,000	$90,000	$371,000
Franchise Fees	$43,000	$36,000	$79,000
Charges for Services	$0	$60,000	$60,000
Community Services Revenue	$0	$103,000	$103,000
Fines and Forfeitures	$25,000	$20,000	$45,000
Total General Fund Revenues	**$3,370,000**	**$1,104,000**	**$4,474,000**
Other Annual Non-General Fund Revenues [2] [3]			
Gas Tax Revenues	$0	$37,000	$37,000
Parks Maintenance Tax	$49,000	$40,000	$89,000
Prop. 172 Public Safety Sales Tax	$26,000	$7,000	$33,000
Public Safety Tax	$341,000	$85,000	$426,000
Total Other Non-General Fund Revenues	**$416,000**	**$169,000**	**$585,000**
Total Annual General Fund and Non-General Fund Revenues	**$3,786,000**	**$1,273,000**	**$5,059,000**
Annual General Fund Expenditures [4]			
City Attorney	$10,000	$8,000	$18,000
City Council	$5,000	$4,000	$9,000
City Manager's Office	$69,000	$57,000	$126,000
Administrative Services	$71,000	$59,000	$130,000
Community Dev. & Sustainability	$71,000	$59,000	$130,000
Community Services	$170,000	$141,000	$311,000
Parks & Open Space Management	$0	$0	$0
Fire	$376,000	$312,000	$688,000
Police	$639,000	$530,000	$1,169,000
Public Works	$0	$0	$0
Total General Fund Expenditures	**$1,411,000**	**$1,170,000**	**$2,581,000**
Annual General Fund Surplus/(Deficit)	**$2,375,000**	**$103,000**	**$2,478,000**

scen_10

Source: EPS.

Note: All values are rounded to the nearest $1,000.

[1] Refer to Table 2 for a full description of this sensitivity scenario.
[2] See Table B-1 for details on revenue estimating procedures.
[3] Reflects additional revenues used to fund General Fund expenditures.
[4] See Table C-1 for details on expenditure estimating procedures.