

The Economic Impact of the New Britain Museum of American Art Expansion

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The New Britain Museum of American Art Expansion: Executive Summary

The New Britain Museum of American Art (NBMAA) contracted with the Connecticut Center for Economic Analysis (CCEA) at the University of Connecticut to assess the economic impact of its proposed expansion on the regional and State economy. This expansion consists of enlarged exhibit areas, controlled-environment art storage areas, a café, and a meeting/performing area. Plans include additional parking areas as well. The cost projections are between \$15 and \$20 million. These enhancements to an already prominent collection of American Art will attract many more visitors and members, as well as provide increased educational opportunities for K-12 children. There are several additional benefits to the region and the State that are difficult to quantify. These include the significant quality of life or amenity values of the Museum and externalities or spillover effects that the Museum generates for the community in which the Museum is located, the surrounding region, and the State as a whole. Some of the significant amenity functions (some would say essential functions) of museums are: preserving cultural heritage; defining cultural and/or national and regional identity; education; stimulating creative, innovative and success-oriented students and adult workers; enriching civic culture; improving the image of a city or region; providing social cohesion. These broad, positive externalities are difficult to quantify in pecuniary terms, but we make a conservative estimate as the debt service required to support the bond issue for the publicly funded portion of the expansion project. We assume that this is the minimum willingness to pay for the value derived from the expansion.

The literature review establishes that cultural tourism is a fast-growing and especially valuable segment of tourism because these tourists stay longer and spend more money than recreational tourists. As our population ages and the wealth of the 45-60 year old cohort increases, we can expect cultural tourism to grow. Connecticut's investment in the arts (improvements to the Hartford Atheneum, the Griswold Museum, Gillette Castle, the Bushnell, and, the proposed NBMAA expansion), testifies to its vision of participating boldly in this more rewarding form of tourism. But more than tourism, museums act to improve social well-being and intergroup tolerance and understanding



through their displays of art that depicts our common humanity and the beauty and spiritual power of our natural environment. Museums educate our young in the arts, a function many towns have reduced or eliminated from their regular curriculum. Museums create an atmosphere and ambiance that attracts and retains businesses and (educated) residents to a region. Museums contribute to urban areas' image as livable places.

The NBMAA is at a critical juncture in its history. It currently lacks sufficient gallery space; in its current facilities, it can display only 7% of its magnificent collection at one time. There is no space for borrowed collections. Its limited storage and poor quality of storage reduce its ability to attract significant exhibitions. Its space for education and meetings is severely constrained, as is its gift shop, entrance, and administrative area. There is no café, forcing potential daylong visitors to curtail their visit. Its endowment needs rebuilding as well to help meet operational expenses.

The proposed \$9 million expansion is described in some detail in the following table. An additional \$6 million will be used to bolster the Museum's endowment. Of the \$15 million total, the State of Connecticut is asked to contribute \$7 million with the remainder coming from the private sector.



Table 3. Breakdown of Capital and N	Noncapita	l Expendi	tures
•	2001	2002	Total
Total Salaries/Fringe Benefits/Payroll			
Taxes	\$181,500	\$181,500	\$363,000
Planning & Marketing Studies, Campaign			
and Travel Expenses, Half of Contingency			
(Unforseen Expenses)	\$435,500	\$435,500	\$871,000
Engineering/Architectural, Remaining of			
Contingency	\$601,500	\$601,500	\$1,203,000
Environmental/Feasibility (Asbestos Study)	\$2,000	\$2,000	\$4,000
Land/Building Acquisition	\$100,000		\$100,000
14000sq ft Addition	\$1,000,000	\$1,000,000	\$2,000,000
New Parking	\$1,000,000	\$525,000	\$1,525,000
Renovation	\$1,178,000	\$1,100,000	\$2,278,000
Construction Manager	\$150,000	\$150,000	\$300,000
Attorney Fees	\$13,000		\$13,000
Computer Equipment and Software, Other			
Office Equipments		\$67,000	\$67,000
Furniture	\$100,000	\$176,000	\$276,000
Total	\$4,761,500	\$4,238,500	\$9,000,000

In general terms, the expansion increases the floor area 70%, providing significantly more exhibition space and a community gathering area that may be used for meetings, ceremonies, small ensemble concerts, and performing arts presentations. In addition, the expansion creates the NBMAA American Art Education Center that includes a creative learning center, lecture hall/performance spaces, a new entrance and orientation center, an expanded library, and on-line access to resources. The new area will also house a café and larger shop.

CCEA assessed the economic impact of the expansion using two scenarios. In each we assume attendance will double to 80,000 visitors annually. However, in the first scenario, doubling takes about 14 years at the current annual growth rate of 5%, while in the second, doubling takes only 10 years (7% annual growth). We assume the maximum capacity of the expansion is 80,000 visitors per year and, once attained, attendance remains at that level. We also assume that in the first scenario 30% of visitors are net new to the State. That is, these visitors are Connecticut residents spending money in the State they would have spent outside the State (recaptured dollars) or, that they are out-of-state visitors spending money in Connecticut they may have spent outside our State. In the second scenario, we assume 50% of the visitors are net new. Connecticut residents



who substitute NBMAA visits for other in-state expenditures do not represent net new dollars to Connecticut.

The table below summarizes the expansion's impact. Total employment in Hartford County increases on average annually by 51 jobs above the status quo or baseline forecast and by 54 statewide in the first scenario. The total employment numbers for the second scenario are 74 and 78. Gross regional product (the dollar value of all goods and services produced in the region in one year) increases by \$2.7 million in annual average terms in the first scenario and by \$3.86 million in the second in Hartford County. The corresponding numbers for personal income are \$2.53 million and \$3.56 million. These numbers are small but not insignificant. They represent the increased economic activity that results from visitors' and employees' spending in Hartford County and from purchases made by the Museum. The most meaningful approach to assessing the net benefit to the State is to examine the ratio of the change in gross state product to the change in induced government spending including debt service for each scenario. Another success measure is the ratio of the change in aggregate personal income to the government incentive, that is, the debt service assumed by the State, for each scenario. Each measure produces a benefit/cost ratio of 4 for the 30% net new scenario. For the second (50% net new) scenario, the first ratio is 5 and the second is 6. These ratios use present values of the above variable streams over the bond maturation period (20 years). At the local level, area municipalities clearly benefit, with new tax revenues of \$4.08 million. The table does show negative net new state tax revenue, a result of the increase in induced government spending, including the debt service reduction in direct government spending, that new state tax receipts do not cover. We make these fiscal projections with the assumption that the cost of municipal and state services increases as a function of the increase in population and the economic activity the Museum expansion generates. However, it is likely that there is in fact either excess capacity in local educational systems, police forces, and other public services, or, no linkage to broad areas of State functions, so that the relatively small impact on population, spread across several towns, would generate no new government expenditures. In that event, the fiscal impact may be beneficial at both the local and state level.



Table 5: New Br	itain N	/luseur	n of A	meric	an Art	: Resu	ults	
	Thirty	Percent N	let New \	/isitors	Fifty F	ercent N	et New \	/isitors
	Har	tford	Conn	ecticut	Har	tford	Conn	ecticut
		Present		Present		Present		Present
Variable	Average	Value	Average	Value	Average	Value	Average	Value
Private Non-Farm Employment	51	-	54	-	74	-	78	-
Gross State Product (\$ Mil)	\$2.70	\$26.66	\$2.74	\$26.75	\$3.86	\$37.33	\$4.08	\$39.15
Personal Income (\$ Mil)	\$2.53	\$25.00	\$3.18	\$31.44	\$3.56	\$34.22	\$4.66	\$44.86
Disposable Income (\$ Mil)	\$2.02	\$19.83	\$2.53	\$24.84	\$2.83	\$27.07	\$3.70	\$35.34
Population	57	-	65	-	75	-	90	-
Total New State Tax Revenue (\$ Mil)	\$0.15	\$1.51	\$0.17	\$1.69	\$0.22	\$2.09	\$0.25	\$2.45
Total New Local Tax Revenue (\$ Mil)	\$0.48	\$4.69	\$0.50	\$4.85	\$0.52	\$5.00	\$0.55	\$5.28
Incentives and Induced Gov't Spending (\$ Mil)	\$0.40	\$3.76	\$0.66	\$7.01	\$0.53	\$4.78	\$0.79	\$7.97
Net New State Tax Revenue (\$ Mil)	(\$0.17)	(\$1.62)	(\$0.47)	(\$5.21)	(\$0.18)	(\$1.66)	(\$0.46)	(\$5.04)
Net New Local Tax Revenue (\$ Mil)	\$0.40	\$4.05	\$0.48	\$4.74	\$0.39	\$3.97	\$0.48	\$4.80

These benefit/cost metrics, taken singly or in aggregate, clearly show the win-win nature of the NBMAA expansion project for the State of Connecticut. Coupled with an aggressive regional marketing campaign, the NBMAA expansion project will likely achieve its goals and enhance its role as one of Connecticut's cultural gems.



THE IMPACT OF ART MUSEUMS ON THEIR COMMUNITIES: A SURVEY

Art museums are remarkably rich in art collections and remarkably poor in financial resources.

Martin Feldstein, 1991, Chicago

What are art museums? What functions do they perform? What impact do the arts and art museums have on the local community? What are the problems these museums face? How should we evaluate the New Britain Museum of American Art's expansion plan? What economic impact does this expansion have on the community and state? The purpose of this analysis is to answer these questions in light of previous studies and our own analysis.

Before proceeding further, it is important to note that in recent days, "the cultural consumer represents the fastest growing richest market of the postmodern economy" (Hillman-Chartrand, 1990, p.19). In terms of size, tourism is the third largest growing industry nationally, and "cultural tourism" constitutes an important part of it (Penne and Shanahan, 1990, p. 150). In terms of economic impact, cultural tourists have more than average tourists do on the communities they visit. According to the American Travel Industry Association Survey, cultural tourists spend more, stay longer and are more likely to stay in a hotel/motel than average tourists. Moreover, more people are participating in the arts in America than ever before. The National Endowment of Arts' 1997 survey reveals that 50% of adults participated in the arts, of which art museums are a significant part. People who attend art museums are generally in the upper educational occupational and income groups (Hendon, 1990) as well as young people (Zill and Robinson, 1995). Considering these trends, some argue that art is an "export industry," attracting people and their spending from outside into the local economy. An analysis of art museums should take into account these trends at the outset.

Art museums are nonprofit quasi-public institutions. Gassler and Grace (1980) argue that "nonprofit enterprises participate in setting the conditions under which market transactions take place" (p.20). Art museums are considered a public good because they provide organized information, which is nonexclusive and nonrivalrous. Moreover, they

¹ See the Alliance for the Arts, "The Economic Impact of the Arts on New York City and New York State at http://www.hellskithchen.net/develop/news/alliance.html.



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are treated as "merit goods" because these institutions preserve "existing, endangered, and extinct species" (Smolensky, 1986, p. 760). Because of these features, and others mentioned later when we discuss the impact of the arts, and especially since the 1930s, arts have been treated as part of "national wealth" (Hillman-Chartrand, 1990, pp. 5-6).

Before we survey the impact of art museums on their communities, we highlight the functions of art museums in society:

- Art museums have "recreation and entertainment functions" that attract people from other communities. In turn, people coming to the area spend money during their stay, thereby creating economic impact in the community.
- > Art museums preserve "cultural heritage."
- Art museums enhance "aesthetic quality."
- > Art museums are "sources of amenities."
- ➤ Art museums are "part of national wealth."
- Art museums help define "cultural and/or national identity."
- Art museums "educate people" about the national cultural history.
- Art museums help school age children be "creative," "innovative," and "successful" in their exams.
- Art museums help "revitalize" downtown.
- ➤ Art museums promote "mental health" making people more productive and innovative.
- Art museums improve the "image of city."
- > Art museums serve as "ethnic and cultural glue."
- Art museums enrich "civic culture" in their communities.
- Art museums expand the "tax base."
- Art museums increase "property values."
- Art museums are the "social fabric" or "social infrastructure" of their communities.
- Art museums have direct "economic impact" on their communities.

Considering these functions, it is hard to quantify the total impact of art museums on communities. In this context, any analysis of art museums must take into account (a) the positive externalities they create, and (b) the quality of life they improve, as well as



their direct economic impact. In this section, we first highlight a few economic impact studies of the *cultural industry* in general, then look at the impact of the arts in communities in light of the aforementioned functions, and finally highlight the challenges art museums face and ways to address those challenges.

Our survey of an increasing number of impact studies, which focus on the economic impact of cultural industries on the local economy, highlights the important contributions of these nonprofit institutions to the local economy.² The methodology of these studies is similar in that many of them base their analyses on survey results sent to organizations that are part of the cultural sector. Moreover, in order to calculate the total economic impact of these non-profit organizations, these studies utilize input/output models and standard "regional multipliers" (Radich and Foss, 1990). According to these studies, at the national level, the arts industry generates 1.3 million full-time jobs and \$1.990 billion state and local revenues.³ In Connecticut, according to the Connecticut Commission on the Arts' study in 1998 (based on a survey of arts and cultural organizations), the cultural industry generated 30,546 jobs, and had \$1.36 billion total economic impact in 1996. In Connecticut, out of 24.5 million attendees to arts and cultural activities, 25.5% (6.2 million) came from out of state, signifying the importance of "cultural tourists" for the local economy. Other impact studies of cultural institutions have estimated a significant economic impact of cultural institutions on the local economy. The following table gives an idea of how much the arts add directly and indirectly to the local economy.

http://www.li.net/~visual/economics.html.



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² Example studies are: American Arts Alliance, "Economic Impact of Arts and Cultural Institutions in Their Communities" at http://www.artswire.org, "Economic Impact of the Cultural Industry on South Carolina" at http://www.state.sc.us/arts/economic.html, "An Economic Impact Assessment of the Canadian Fine Arts" at http://www.artsusa.org, "An Economic Impact Survey of Vancouver's Non-Profit Cultural Industry" at http://www.artsusa.org, Alliance for the Arts, "The Economic Impact of the Arts on New York City" at http://www.hellskitchen.net/develop/news/alliance.html, and a summary of the impact of arts industry on the national economy can be found at http://www.li.net/~visual/economics.html.

³ National Assembly of Local Arts Agencies, "Arts in the Local economy," 1994 at

Table 1

Economic Impacts of the Arts on Local Economy, Selected Studies' Calculations in 1994

State	Direct and Indirect Impact of the Arts	City or County	Direct and Indirect Impact of the Arts
		Orange County, California	\$269 million
		Cincinnati, Ohio	\$102 million
Colorado	\$97 million		
Connecticut	\$353.8 million		
Florida	\$1 billion		
Kentucky	\$66 million		
Maryland	\$167 million		
Massachusetts	\$1.2 billion	Boston,	\$100 million
North Carolina	\$1 billion		
Oregon	\$42 million		
Texas	\$510 million		
Vermont	\$96.2 million		
Wisconsin	\$91.8 million		
New York State			
Capital District	\$100 million	Chautaqua County	\$5.3 million
Dutchess County	\$5.3 million	Nassau County	\$40 million
New York City	\$9.2 billion	Onondaga County	\$33 million
Rochester	\$100 million		

Reference: New York State Art Teachers Association at http://www.li.net/~visual/economics.html. Compiled from various sources by this association.

The table above demonstrates that the arts industry has become one of the important revenue-generating sectors for state, county, and/or city economies. Besides these calculated impacts of the arts on the local economy, impact studies also focus on non-quantifiable positive aspects of the arts industry. Hillman-Chartrand (1990) argues that many of the most important economic impacts of the arts cannot be quantifiable (p.



2). These positive qualities are called "social externalities," "amenity values," and/or "quality of life."

Specific art museums studies are generally based on visitor behavior (Frey and Pommerrehne, 1980). Institutional financial surveys, visitor surveys and subsequent input/output model analysis along with standard regional multipliers are one form of the impact analysis of art museums (Hendon, 1990). Another less frequently used impact analysis method for museums is cost/benefit analysis based on "willingness to pay" to participate in cultural activities (Hendon, 1990). In particular, art exhibition studies focus on the input/output model analysis to measure the economic impact of an exhibition to the local economy. Critics argue that input/output models cannot capture the total impact of art museums on the local community because of the difficulties to quantify their most significant impacts (i.e., externalities) on local economies (Seaman, 1990, p. 46; Radich and Foss, 1990, p.90). Following are highlights about the impacts of the arts on the local community:

Arts and Community: Social and Cultural Impact:

> Arts improve the "quality of life" in the community, and attract businesses and people to the region. The Tampa Bay Business Committee for the Arts reports that "companies seeking to relocate consistently rank availability of the arts among their top three criteria." Another survey reveals that 99 % of the Chief Executive Officers of companies cite that the availability of cultural activities in an area is an important consideration for choosing a new location. Hillman-Chartrand (1990) approaches the issue from a different perspective and argues that communities increased the number of cultural amenities [i.e., art museums] to compete for the relocation of new companies. The relocation-quality of life connection for businesses started after the 1960s (pp. 8-9). An Inc. Magazine article (1995) by Garreau advises businesses by saying that "for a nice place to live and relocate, look for places that have made

⁶ Economic Impact of the Cultural Industries on South Carolina at http://www.state.sc.us/arts.



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⁴ For example, Wadsworth Atheneum's *Peter de Hooch, 1629-1684* exhibition and its economic impact analysis.

⁵ Tampa Bay Business Committee for the Arts at http://www.co.pinellas.fl.us/BCC/art/Economic.htm.

- significant civic investment in art museums, street scrapes, public transportation and parks" (pp. 51-54). This impact of the arts is well established in the literature.⁷
- Arts improve the quality of life and retain businesses and young and educated people in the region. As Penne and Shanahan (1990) point out, the arts help retain the rich human resource mix of a community (p. 139). Arts improve social infrastructure and enhance the civic quality of a community. As Penne and Shanahan (1990) succinctly put it, in major cities, principal export industries come and go, what remains is human capital and social infrastructure. Only by giving proper attention to arts-related organizations and activities can this be done.
- For some long time, the education function of the arts has been highlighted by many studies. Gassler and Grace (1980) argue that art museums might be regarded as educational institutions that socialize young people into their culture (p.27). Smolensky (1986) highlights the educational role of art museums in a way that they originally emerged to provide education for people cut off from their European cultural institutions (pp. 762-64). If this is the case, currently art museums are a primary venue, besides schools, through which the young generation is socialized into the mainstream culture and, thus, cultural heritage is transmitted from one generation to the next. Art museums develop educational programs and allocate their scarce resources for educational activities. The studies have shown that the arts help students achieve educational goals. Moreover, early exposure to the arts results in later participation (Gray, 1998, p.87). In 1995, SAT scores for students indicate that those who studied arts scored higher than those who did not. Furthermore, arts education contributes to creative thinking, problem solving, and communication skills.⁸
- Art museums are important and necessary for the health of a community. In this sense, they should be taken as part of human wellbeing rather than something that

⁷ Penne and Shanahan (1990) approach this issue from a local economic development perspective and argue that arts improve the quality of life and this is a major factor in business relocation decision (p. 133-135). Seaman (1990) criticizes the traditional economic impact analyses of the arts on grounds that they do not take into account the influence of the arts on "location decisions of either firms or households" (p. 57). ⁸ In 1995, SAT scores for students who studied the arts more than four years were 59 points higher on the verbal and 44 points higher on the math portion than students with no coursework or experience in the arts (Economic Impact of the Cultural Industry on South Carolina at http://www.state.sc.us/arts/economic.html)



simply generates economic impact. Art museums help sustain the emotional wellbeing of people and thereby make them more productive and innovative (Seaman, 1990, p.46). Moreover, art museums bind the community together by promoting tolerance and respect among various ethnic groups. A draft policy statement of the International Council of Museums emphasizes that museums are a forum that brings diverse communities together.

Finally, art museums promote the image of cities as livable places. A vigorous advertising campaign of art museums improves the image of cities in which they are located. In this context, it is important to note that art museums' advertising campaign and cities' developmental goals converge. Close cooperation in this area between art museums and regional development agencies will have significant spillovers to other sectors of the local economy (Penne and Shanahan, 1990, pp. 139-45).

Even though art museums assume greater functions in society, small ones have difficulty meeting these challenging functions due to the lack of endowment and space (Frey, 1994). For many art museums, physical expansion and increases in endowment are necessary as they operate at their maximum capacity. In a 1992 Bureau of Economic Research (BER) conference on art museums, many of the museums' directors and scholars identified three important problem areas that they face today: (1) physical space constraints to exhibit museums' holdings and host so-called "block-buster" exhibitions, (2) inadequate environmental conditions to preserve their collections properly, and (3) insufficient capital stock. Gassler and Grace (1980) argue that in order to preserve cultural history properly, art museums should not be subject to fluctuations in revenue and their incomes should be based on endowments rather than attendee fees and donations (pp. 25-27). In particular, considering the federal budget cuts for arts (39% in 1995), art museums are looking for alternative sources of revenue. One way to do that is to open a cafe to serve attendees and organize special events. Food service and special events are together seen as a new profit center for art museums enabling them to expand their collections and services (Walkup, 1996, p. 7).

⁹ The papers and discussions in the conference are collected in a book edited by Feldstein (1991).



Feldstein's (1991) observation at the beginning of this analysis about art museums aptly describes the current situation of the New Britain Museum of American Art (NBMAA). Being among a few art museums across the nation devoted exclusively to American art, NBMAA is a unique national treasure and a museum of national identity. Hosting about 5,000 works spanning more than 250 years of American art and the nation's first museum-based collection of "Sanford B. D. Low Collection of American Illustration," which covers the history of American illustration from the 19th century to the present, NBMAA has a great potential to have major impact on the local community if properly utilized. In order to protect, preserve, restore, display, educate and serve the community, NBMAA needs a major expansion and endowment. Moreover, it must be noted that for NBMAA to have a major impact in the region, a comprehensive marketing program must be designed along with the expansion plan. The following table highlights major constraints and the vision of NBMAA to function properly.



Table 2 NBMAA:

Major Constraints and Solutions

>	Space Limitations (7% of the works on view)	Increase Gallery Space (50% on view)
>	No Space for Important Borrowed Exhibitions	Increase Space and Improve Air Conditioning System
>	Unable to Accommodate Beyond Certain	Increase Space to Increase School and Community
	Number of School and Public Tours	Outreach.
>	Unable to Properly Preserve World Class	Install Highest Environmental Standards/Upgrade
	Collection due to Documented HVAC	HVAC and Lighting Systems
	Inadequacies	
>	Lack of Storage Space (Limit is Attained)	Increase Capacity and Quality of Storage
>	Limited Space for Education	Establish the NBMAA American Art Education
		Center—Create Learning Center, cafe,
		Lecture Hall/Performance Space, and New Entrance
		and Orientation Center
>	Limited Community Gathering Space	Increase the size so that high demand is met
>	Limited Entrance/Coat Room/Group	Expand the Existing Ones
	Orientation Area	
>	Shop is too Small/No Retail Food Service	Expand Existing Shop/Construct a cafe for Food
		Service
>	Limited Administrative and Service Area	Expand the Existing Area/Hire New Permanent Staff
>	Limited Revenue Sources	Rebuild Endowment to Meet Operational Expenses

Considering the impact of art museums on their communities, the expansion plans of NBMAA are likely to significantly and positively benefit Hartford County and the State of Connecticut. The following economic impact analysis of the expansion proposal should be taken into account in light of the discussions presented so far.



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The following web-sites present a sample of economic impact analysis of arts industry:

- ➤ Orange County, http://www.ocbuscomm4arts.org/pg1.htm
- Colorado, http://www.cbca.org/
- Connecticut,
 http://www.cslnet.ctstateu.edu/cca/industry.htm#engines_of_economic_growth
- ➤ Broward County, FL, http://www.co.broward.fl.us/cui00209.htm
- Tampa Bay, FL, http://www.co.pinellas.fl.us/BCC/art/Economic.htm
- Maryland, http://www.msac.org/ecoimp98.htm
- ➤ New England, http://www.nefa.org/
- Monroe County, NY, http://www.artsrochester.org/artscouncil/research.htm
- New York City and NY State, http://hellskitchen.net/develop/news/alliance.html
- ➤ Tennessee, http://www.arts.state.tn.us/
- Lubbock County, TX, http://www.lubbockarts.org/laat007.htm
- New York Arts Teachers Association, http://www.li.net/~visual/economics.html
- The District of Columbia, http://www.capaccess.org/ane/dccah/study.htm
- > Spokane City, Washington, http://www.spokanecity.org/arts/economic.htm
- West Virginia, http://www.caswv.org/economic-research.htm
- ➤ American Arts Alliance, http://www.artswire.org
- > South Carolina, http://www.state.sc.us/arts/economic.htm
- For a Variety of Studies, http://www.artsusa.org
- ➤ Virginia Museum's *Faberge* Exhibition, http://www.vmfa.state.va.us
- ➤ International Council of Museums, http://www.nic.icom.org
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 Differe from Non-Visitors, but Not as Markedly as Case Studies have Indicated."

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Economic Impact Analysis

The New Britain Museum of American Art (NBMAA) seeks State support for part of the funding required to expand its current operations in New Britain, Connecticut. The Board of Trustees endorsed a \$15 million Centennial Capital and Endowment Expansion Project that would increase by seventy percent the square footage of the Museum, and substantially increase its endowment. Nine million dollars of this \$15 million project will be used to expand the available exhibition space, which will increase the number of works on view, and, create the NBMAA American Art Education Center. The latter includes a creative learning center, lecture hall/performance spaces, a new entrance and orientation center, an expanded library, and on-line provision of resources. Additionally, this expansion will include a new community gathering space, ample parking, expanded shop, and a new cafe to accommodate 30-40 people for lunch or dinner. The remaining \$6 million will be used to increase the operating endowment to support expanded programs and secure long-term stability.

These improvements are expected to make the Museum even more attractive, increasing attendance, attracting visitors from all around the world. This study attempts to evaluate the economic significance of the concomitant increase in economic activity to the State and Hartford County and compare these with the contributions sought from the State, providing a measure of the relationship of the benefits to costs. The State of Connecticut is asked to contribute \$7 million to the total budget of \$15 million. The remaining costs of project will be provided by the private sector.

Methodology and Assumptions

The Connecticut Center for Economic Analysis (CCEA) houses the State Economic Model, the REMI model, a sophisticated 53-sector replication of the State's economic structure that can project economic impacts out to the year 2035. The analysis presented here looks at the proposed expansion's impact over a twenty-year period starting in the year 2001. The objective is to determine the net benefits of the project to the State, in terms of increased employment, gross state product (GSP), personal income, benefit/cost ratios and tax revenues.



In this study, we consider two possible scenarios depending on the different sets of assumptions. The first set of assumptions is about the growth rate of the number of visitors after the expansion. The Museum's vision is to double the current attendance number with this expansion (for 1998-1999 period the attendance is 41,302). We consider that there is a limit to the maximum number of visitors that the Museum can accommodate even after expanding current capacity. Considering the Museum's vision, we take about 80,000 visitors annually as museum's capacity limit. Based on this, we define two cases. In the first, we assume that the number of visitors will continue to increase steadily at the previous five-year average growth rate (about 5% per year and doubling in about 14 years) after the expansion until it reaches capacity, and remain there. In the second case, we assume that the Museum will double the annual number of visitors in just 17 years, and will remain at its maximum throughout the study period.

The second set of assumptions is about the number of net new visitors. Based on the guestbook data provided by the Museum, currently about 25% of its visitors are from out of state. However, of this 25%, not all is net new to the State. Some of these out-of-state visitors would have come to Connecticut anyway, so their dollars are not new to Connecticut economy. Similarly, residents of the State may attend the Museum instead of other activities within the State (substitution again). Another possibility is that State residents may attend the Museum instead of going to other states. These latest expenditures are net new to the State and they represent recaptured expenditures because of the Museum's expansion. We cannot know the degree of substitution with certainty. Therefore, we attempt to bracket this economic response.

Depending on the rate of substitution and the assumptions about the growth rate of the number of visitors, we estimate the economic impact of the proposed changes for two meaningful scenarios against a "status quo" or "baseline" forecast. In the first scenario, we are assuming that the Museum will continue to increase its number of visitors at the current rate (5% per year). It will reach the capacity limit in about 14 years, and the annual number of visitors remains at that level after that. We also assume that, in this first scenario, 30% of the increased number of visitors are net new to the State. In the second scenario, we assume that the number of visitors will double in the first ten years of the study, and 50% of these new visitors are net new to the State. In this



scenario, we consider that NBMAA will increase the number of out of state visitors with a superior marketing and advertising strategy.

In both scenarios, there is a two-year construction period. The Museum intends to begin the new expansion project in 2001 and complete it in time to celebrate the Museum's 100th anniversary in 2003. The detailed expenses are given in Table 3 below. These numbers represent all the expenditures made during the expansion of the Museum presented in its detailed budget.

Table 3. Breakdown of Capital and N	loncapital	Expendit	tures
	2001	2002	Total
Total Salaries/Fringe Benefits/Payroll			
Taxes	\$181,500	\$181,500	\$363,000
Planning & Marketing Studies, Campaign			
and Travel Expenses, Half of Contingency			
(Unforseen Expenses)	\$435,500	\$435,500	\$871,000
Engineering/Architectural, Remaining of			
Contingency	\$601,500	\$601,500	\$1,203,000
Environmental/Feasibility (Asbestos Study)	\$2,000	\$2,000	
Land/Building Acquisition	\$100,000		\$100,000
14000sq ft Addition	\$1,000,000	\$1,000,000	\$2,000,000
New Parking	\$1,000,000	\$525,000	\$1,525,000
Renovation	\$1,178,000	\$1,100,000	\$2,278,000
Construction Manager	\$150,000	\$150,000	\$300,000
Attorney Fees	\$13,000		\$13,000
Computer Equipment and Software, Other			
Office Equipments		\$67,000	\$67,000
Furniture	\$100,000	\$176,000	\$276,000
Total	\$4,761,500	\$4,238,500	\$9,000,000

The total cost of the project is \$15 million, and \$8 million of this will be funded privately. The remaining \$7 million will be provided by the State. In our analysis, we are assuming that the State will fund these costs by issuing 20-year bonds. These are our fundamental cost and funding assumptions based on data from NBMAA.

We assume that government spending decreases each year by the amount of the debt service the bond issuance generates. The State bonds are 20-year bonds with an annual yield of 6%, which translates into annual fixed mortgage interest payments of \$0.61 million beginning in 2001 and ending in 2020. Therefore, there is a reduction in



state government spending every year of \$0.61 million. The analysis computes the aggregate economic impact (benefit) to the State's and Hartford County's economy and compares the present value of the resulting increases in state and local tax revenues with the present value of the expenditures associated with the debt service and induced new government spending. The latter arises primarily because of increased government services provided to a more attractive and populous County and State.

In the section that follows, the results of the Center's analysis are presented. We analyzed each scenario for the County of Hartford in isolation, and, for the State of Connecticut including Hartford County. Therefore, each scenario takes into account the impact of the proposed expansion of the New Britain Museum of American Art on Hartford County and the State of Connecticut separately. The results presented under Hartford reflect the economic impact of the expansion project on the county in which the museum is located. Moreover, the results presented under Connecticut reflect the economic impact of the expansion on the State as a whole including Hartford County. Each scenario is presented and contrasted with the others.

Results and Conclusions

This analysis identified the impact of the proposed project on a variety of economic variables, of which the most significant are employment, GSP, personal income, and population.

We quantified the amenity value of the Museum expansion as the decrease in total net new state taxes (the calculation of net new state taxes considers the induced government spending after the expansion). This \$7 million government investment will improve the quality of life in the region and attract more people.

Chart 1 shows the impact of the Museum's expansion on private non-farm employment and population over the period 2001-2020. According to the chart, the average increases in employment in the County are 51 and 74 jobs per year in 30% and 50% net new visitors scenarios, respectively. The average increases in Connecticut employment are 54 jobs for 30% net new visitors, and, 78 jobs per year for 50% net new visitors scenarios. This means that we expect private non-farm employment to increase by these amounts each year over the status quo or baseline forecast. These increases do



<u>not</u> accumulate. The State figures reflect net new jobs to Connecticut, whereas Hartford County figures reflect new jobs to Hartford County from spending of people from inside and outside the County, and from other states.

The increased economic activity in Hartford attracts new residents to the State and to the County. The annual average population increases in Hartford County are 57; and, 75 under the 30% net new, and the 50% net new visitors scenarios, respectively. The population of Connecticut increases by an annual average amount of 65 under the 30% new visitors, and, 90 under the 50% net new visitors scenarios. Recall these increases do not accumulate.

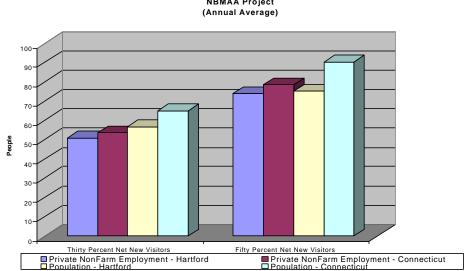


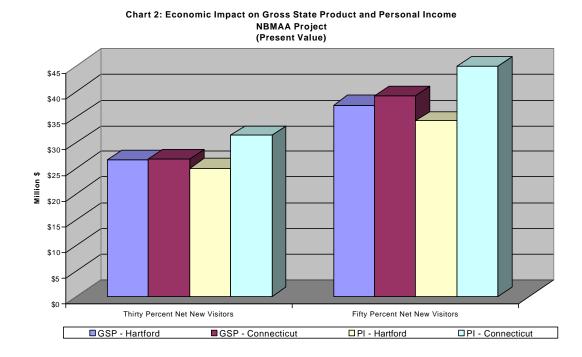
Chart 1: Impact on Employment and Population
NBMAA Project
(Appulation Approach)

In addition to the new jobs, the expansion project increases gross regional product (GRP). The largest impact on Hartford County's gross regional product is under the 50% net new visitors scenario with an increase of \$37.33 million in present value terms. This corresponds to an annual average increase in GRP of \$3.86 million over the study period, 2001-2020, in Hartford County. Again these numbers represent expected increases over the baseline forecast each year with no accumulation implied. The 30% net new sales scenario generates a \$26.66 million increase in Hartford County's GRP in present value terms. The annual average increase in Hartford County's GRP under this scenario is \$2.70 million. The increase in the State of Connecticut's GSP is \$39.15 million under the



50% net new visitors, and, \$26.75 million under the 30% net new visitors scenarios in present value terms. The annual average increases in the State's GRP under these scenarios are \$4.08 million, and \$2.74 million, respectively.

Personal income, the aggregate earnings of Hartford County's and Connecticut's citizens, grows under both scenarios. On the basis of annual averages, personal income is \$3.56 million greater under the 50% net new visitors, and, \$2.53 million greater under the 30% net new visitors scenarios in Hartford County. These figures translate into increases in present value terms of \$34.22 million, and, \$25.00 million in personal income, respectively. The annual average increases in personal income in Connecticut are \$4.66 million, and, \$3.18 million; and in present value terms the increases in the State's personal income are \$44.86 million, and, \$31.44 million under the 50% net new, and, the 30% net new visitors scenarios, respectively. Chart 2 presents these results graphically.

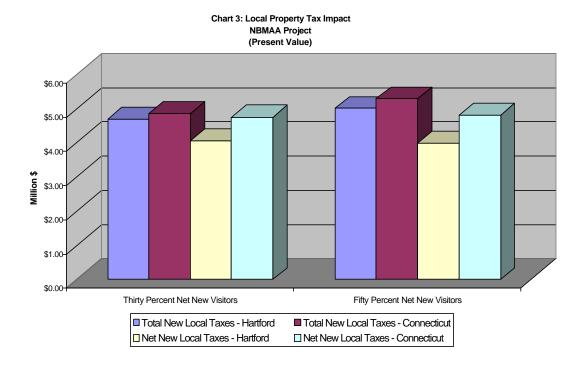


Under both scenarios, state and local taxes grow in both Hartford County and in the State. Net new local tax revenues also grow, although the net new state tax revenues are decreasing for Hartford County and Connecticut in both scenarios. Hartford County



experiences an annual average increase in gross local tax revenue of \$0.48 million and \$0.52 million under the 30% net new visitors and 50% net new visitors scenarios, respectively. The State of Connecticut has an annual average increase in gross local tax revenues of \$0.50 million and \$0.55 million, under these scenarios respectively.

After the incentives and induced government new spending are subtracted, the City of New Britain and the towns that surround it in Hartford County have a net gain in local tax revenues, whereas net new state tax revenues generated in Hartford County and in the State as a whole show annual average decreases. This is due to the excess of induced government spending and debt service over tax revenues. The net new local tax revenues in Hartford County increase \$0.40 million under the 30% net new visitors, and, \$0.39 million, under the 50% net new visitors scenarios in annual average terms. Connecticut as a whole will experience an annual average increase in net new local tax revenues of \$0.48 million, and \$0.48 million under these scenarios, respectively. Chart 3 shows these gross and net new local tax revenues in the State and Hartford County.





The proposed expansion will generate an annual average increase of \$0.15 million under the 30% net new visitors, and, \$0.22 million under the 50% net new visitors scenarios in total new state tax revenues from Hartford County. The annual average increases in total new state taxes in the State as a whole will be \$0.17 million, and, \$0.25 million, respectively.

Net new state tax revenues generated in Hartford County will have an annual average decrease of \$0.17 million under the 30% net new visitors, and, \$0.18 million under the 50% net new visitors scenarios. The net new state tax revenues in Connecticut will also have annual average decreases of \$0.47 million, and, \$0.46 million under these scenarios, respectively. Chart 4 shows these gross and net state tax revenue figures for Connecticut and Hartford County in present value terms.

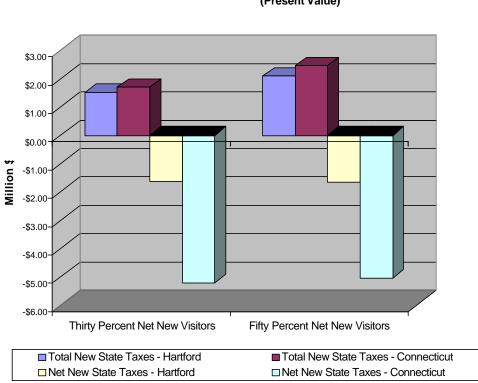


Chart 4: State Tax Impact NBMAA Project (Present Value)



Summary

Overall, the State of Connecticut and City and County of Hartford will gain from the investment associated with the expansion proposal. Almost every major economic indicator shows a gain because of this project. Crucial to policy makers is the return of the \$7 million investment to the State. Table 4 provides two measures of benefit/cost ratios: (1) GSP/IIGS measures how much a \$1 incentive and induced government spending will increase Gross State Product over the study period, and (2) PI/TI measures how much \$1 of state spending (excluding induced spending) for the project will increase personal income over the study period. Both measures are in present value terms.

Table 4: New Britain Museum Of Americ Expa	an Art Expansion Proposal Insion for Connecticut	Benefit/Cost Analysis of the
Cost/Benefit Metrics	Thirty Percent New	Fifty Percent New
Gross State Product (\$ Mil)/ Incentives &		
Induced Gov't Spending (\$ Mil) (GSP/IIGS)	4	5
Personal Income (\$ Mil)/Total Incentives (\$		
Mil) (PI/TI)	4	6

When one compares the increase in present value terms of new personal income to the present value of the State and local incentives, one gets a benefit-cost ratio of 4 for the 30% net new visitors scenario and 6 for the 50% net new sales scenario. Similarly, when one compares the increase in present value terms of Gross State Product to the present value of the State and local incentives and induced Government spending, one gets a benefit-cost ratio of 4 under the 30% net new and 5 under the 50% net new visitors scenarios, respectively. These are very respectable paybacks per dollar invested.

Employment, income and population in the State and Hartford County grow under both scenarios. For an investment of \$7 million of State and local tax dollars, the State of Connecticut will gain back in present value terms a gross increase in state tax revenues of \$1.69 million under the 30% net new visitors, and, \$2.45 million under the 50% net new visitors scenarios. After deducting the incentives and induced new State spending, the



State of Connecticut will have in present value terms a net loss of \$5.21 million and \$5.04 million under these scenarios, respectively.

Hartford County will have in present value terms a gross increase in state tax revenues of \$1.51 million under the 30% new visitors, and, \$2.09 million under the 50% new visitors scenarios. Net new state tax revenues generated in Hartford will have in present value terms a net decrease of \$1.62 million, and, \$1.66 under the 30% new visitors, and 50% net new visitors scenarios, respectively. New local tax revenues in Hartford County will increase in present value terms by \$4.69 million under the 30% net new visitors, and, \$5.00 million under the 50% net new visitors scenarios. After deducting the incentives and induced government spending, these figures translate into net local tax revenue increases in present value terms of \$4.05 million, and \$3.97 million under these scenarios, respectively, in Hartford County. Net new local taxes in Connecticut in present value terms will increase \$4.74 million, and \$4.80 million under 30% net, and 50% net new visitors scenarios, respectively. Table 5 below presents a summary of the Center's findings with respect to the expansion of NBMAA.

These results must be regarded as conservative. We have not included the true enhancement to Connecticut's quality of life and the benefits to education and business relocation that will follow from the expansion. Further, the alternative uses of the new spaces for meeting, concerts, theater productions and their multiple impacts have not been included. Though peripheral to the primary vision and mission of NBMAA, they are important amenities to the community, County, and, our State.



itain N	/luseur	n of A	meric	an Ar	t: Res	ults						
Thirty	Percent N	let New '	Fifty F	Fifty Percent Net New Visitors								
Har	tford	Conn	ecticut	Har	tford	Conn	ecticut					
	Present		Present		Present		Present					
Average	Value	Average	Value	Average	Value	Average	Value					
51	-	54	-	74	-	78	-					
\$2.70	\$26.66	\$2.74	\$26.75	\$3.86	\$37.33	\$4.08	\$39.15					
\$2.53	\$25.00	\$3.18	\$31.44	\$3.56	\$34.22	\$4.66	\$44.86					
\$2.02	\$19.83	\$2.53	\$24.84	\$2.83	\$27.07	\$3.70	\$35.34					
57	-	65	-	75	-	90	-					
\$0.15	\$1.51	\$0.17	\$1.69	\$0.22	\$2.09	\$0.25	\$2.45					
\$0.48	\$4.69	\$0.50	\$4.85	\$0.52	\$5.00	\$0.55	\$5.28					
\$0.40	\$3.76	\$0.66	\$7.01	\$0.53	\$4.78	\$0.79	\$7.97					
(\$0.17)	(\$1.62)	(\$0.47)	(\$5.21)	(\$0.18)	(\$1.66)	(\$0.46)	(\$5.04)					
\$0.40	\$4.05	\$0.48	\$4.74	\$0.39	\$3.97	\$0.48	\$4.80					
	Thirty Har Average 51 \$2.70 \$2.53 \$2.02 57 \$0.15 \$0.48 \$0.40 (\$0.17)	Thirty Percent N Hartford Present Value 51 - \$2.70 \$26.66 \$2.53 \$25.00 \$2.02 \$19.83 57 - \$0.15 \$1.51 \$0.48 \$4.69 \$0.40 \$3.76 (\$0.17) (\$1.62)	Thirty Percent Net New Yersent Average Value Average 51 - 54 \$2.70 \$26.66 \$2.74 \$2.53 \$25.00 \$3.18 \$2.02 \$19.83 \$2.53 \$2.53 \$7 - 65 \$0.15 \$1.51 \$0.17 \$0.48 \$4.69 \$0.50 \$0.40 \$3.76 \$0.66 (\$0.17) (\$1.62) (\$0.47)	Thirty Percent Net New Visitors Hartford Connecticut Present Present Average Value 51 - \$2.70 \$26.66 \$2.74 \$26.75 \$2.53 \$25.00 \$3.18 \$31.44 \$2.02 \$19.83 \$2.53 \$24.84 57 - \$0.15 \$1.51 \$0.48 \$4.69 \$0.40 \$3.76 \$0.66 \$7.01 (\$0.17) (\$1.62) (\$0.47) (\$5.21)	Thirty Percent Net New Visitors Fifty F Hartford Connecticut Hartford Present Present Value Average 51 - 54 - 74 \$2.70 \$26.66 \$2.74 \$26.75 \$3.86 \$2.53 \$25.00 \$3.18 \$31.44 \$3.56 \$2.02 \$19.83 \$2.53 \$24.84 \$2.83 57 - 65 - 75 \$0.15 \$1.51 \$0.17 \$1.69 \$0.22 \$0.48 \$4.69 \$0.50 \$4.85 \$0.52 \$0.40 \$3.76 \$0.66 \$7.01 \$0.53 (\$0.17) (\$1.62) (\$0.47) (\$5.21) (\$0.18)	Thirty Percent Net New Visitors Fifty Percent Net New Visitors Hartford Connecticut Hartford Present Present Present Average Value Average Value 51 - 54 - 74 - \$2.70 \$26.66 \$2.74 \$26.75 \$3.86 \$37.33 \$2.53 \$25.00 \$3.18 \$31.44 \$3.56 \$34.22 \$2.02 \$19.83 \$2.53 \$24.84 \$2.83 \$27.07 57 - 65 - 75 - \$0.15 \$1.51 \$0.17 \$1.69 \$0.22 \$2.09 \$0.48 \$4.69 \$0.50 \$4.85 \$0.52 \$5.00 \$0.40 \$3.76 \$0.66 \$7.01 \$0.53 \$4.78 (\$0.17) (\$1.62) (\$0.47) (\$5.21) (\$0.18) (\$1.66)	Hartford Connecticut Hartford Connecticut Average Present Present Present Average Value Average Value Average 51 - 54 - 74 - 78 \$2.70 \$26.66 \$2.74 \$26.75 \$3.86 \$37.33 \$4.08 \$2.53 \$25.00 \$3.18 \$31.44 \$3.56 \$34.22 \$4.66 \$2.02 \$19.83 \$2.53 \$24.84 \$2.83 \$27.07 \$3.70 57 - 65 - 75 - 90 \$0.15 \$1.51 \$0.17 \$1.69 \$0.22 \$2.09 \$0.25 \$0.48 \$4.69 \$0.50 \$4.85 \$0.52 \$5.00 \$0.55 \$0.40 \$3.76 \$0.66 \$7.01 \$0.53 \$4.78 \$0.79 (\$0.17) (\$1.62) (\$0.47) (\$5.21) (\$0.18) (\$1.66) (\$0.46)					



New Britain Museum of American Art Capital Expansion Project

Appendix A:

Tax Tables



NBMAA - 30% Net New - Hart	for	d																				
(Millions of Dollars, Except Populati																						
(minitions of Boniard, Except reparati	,		2004	2002	2003	2004	2005	2006	2007	2008	2000	2010	2011	2012	2042	2014	2045	2016	2017	2040	2019	2020
-	Н		2001	2002	2003	2004	2003	2000	2007	2008	2009	2010	2011	2012	2013	2014	2013	2010	2017	2018	2019	2020
Income Taxes	Н									_												_
New Personal Income	Ш		2.71	3.04	1.02	1.03	1.13	1.28	1.45	1.64	1.86	2.08	2.31	2.54	2.79	3.03	3.27	3.54	3.79	3.91	4.04	4.17
Income Tax	Ш		0.08	0.09	0.03	0.03	0.03	0.04	0.04	0.05	0.05	0.06	0.07	0.07	0.08	0.09	0.09	0.10	0.11	0.11	0.12	0.12
Sales and Use Taxes																						
New Gross State Product			3.74	3 . 6 2	0.53	0.68	0.89	1.14	1.37	1.64	1.92	2.18	2.47	2.74	3.02	3.27	3.58	3.87	4.18	4.27	4.39	4 . 5 2
New Sales and UseTaxes			0.10	0.09	0.01	0.02	0.02	0.03	0.04	0.04	0.05	0.06	0.06	0.07	0.08	0.09	0.09	0.10	0.11	0.11	0.11	0.12
Corporate Profits Taxes																						
New Gross State Product			3 . 7 4	3 . 6 2	0.53	0.68	0.89	1.14	1.37	1.64	1.92	2.18	2.47	2.74	3.02	3 . 2 7	3.58	3.87	4.18	4 . 2 7	4.39	4 . 5 2
Profits tax			0.01	0.01	0.00	0.00	0.00	0.00	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02
New Local Property Taxes	Н																					
Project Directly			0.00	0.00	0.34	0.35	0.35	0.36	0.37	0.38	0.39	0.40	0.40	0.41	0.42	0.43	0.44	0.45	0.46	0.47	0.48	0.49
New Population			1 2	2 6	3 2	3 3	3 7	4 0	4 3	4 7	5 1	5 5	5 9	6 3	6 7	7 1	7 5	7 9	8 2	8 5	8 7	8 9
Total New Property Taxes			0.02	0.04	0.39	0.40	0 . 4 2	0.43	0 . 4 5	0.46	0.48	0.50	0.52	0.54	0.56	0.58	0.60	0 . 6 2	0 . 6 4	0.66	0.68	0.70
TOTAL TAXES			0 . 2 1	0 . 2 4	0.44	0.45	0.48	0.50	0.53	0.56	0.59	0.62	0.66	0.69	0.73	0.76	0.80	0.84	0.87	0.90	0.93	0.95
TAX CREDITS/STATE CONTRIBUTIONS			0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19
TAX CREDITS/LOCAL CONTRIBUTIONS			0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
INDUCED NEW GOVERNMENT SPENDING			0.00	0.00	0.00	0.00	0.02	0.04	0.07	0.10	0.13	0.16	0.20	0.23	0.27	0.31	0.35	0.39	0.43	0.47	0.51	0.54
NETTAXES			0.02	0.04	0.24	0.26	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.26	0.26	0.26	0.25	0.25	0.24	0.23	0.22
PRESENT VALUE OF TOTAL NEW TAXES		6.20																				
PRESENT VALUE OF TOTAL NEW STATE TAXES		1.51																				
PRESENT VALUE OF TOTAL NEW LOCAL TAXES	П	4.69																				
PRESENT VALUE OF TAX	Н																					
CREDITS/INDUCED SPENDING		3.76																				
PRESENT VALUE OF NET NEW TAXES*		2.43																				
PRESENT VALUE OF NET NEW STATE TAXES*	П	-1.62																				
PRESENT VALUE OF NET NEW LOCAL TAXES		4.05																				
*Induced spending allocated accordi	ng to	relativ	e share	s of spe	nding.																	



NBMAA- 30% Net New - Conr	n e c	cticut																				
(Millions of Dollars, Except Populati	ion)																					
			2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Income Taxes																						
New Personal Income			3.80	4.23	1.14	1.08	1.19	1.42	1.66	1.94	2.24	2.55	2.85	3.17	3.49	3.83	4.15	4.55	4.85	4.94	5.16	5.34
Income Tax			0.11	0.12	0.03	0.03	0.03	0.04	0.05	0.06	0.06	0.07	0.08	0.09	0.10	0.11	0.12	0.13	0.14	0.14	0.15	0.15
Sales and Use Taxes																						
New Gross State Product			4.06	3.95	0.23	0.38	0.63	0.91	1.20	1.53	1.88	2.14	2.46	2.84	3.11	3.43	3.72	4.06	4.38	4.50	4.66	4.70
New Sales and UseTaxes			0.11	0.10	0.01	0.01	0.02	0.02	0.03	0.04	0.05	0.06	0.06	0.07	0.08	0.09	0.10	0.11	0.11	0.12	0.12	0.12
Corporate Profits Taxes																						
New Gross State Product			4.06	3.95	0.23	0.38	0.63	0.91	1.20	1.53	1.88	2.14	2.46	2.84	3.11	3.43	3.72	4.06	4.38	4.50	4.66	4.70
Profits tax			0.02	0.02	0.00	0.00	0.00	0.00	0.00	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02
New Local Property Taxes																						
Project Directly			0.00	0.00	0.34	0.35	0.35	0.36	0.37	0.38	0.39	0.40	0.40	0.41	0.42	0.43	0.44	0.45	0.46	0.47	0.48	0.49
New Population			18	38	42	41	42	46	49	53	57	61	66	71	76	80	85	89	93	96	99	101
Total New Property Taxes			0.03	0.06	0.41	0.42	0.43	0.44	0.46	0.47	0.49	0.51	0.53	0.55	0.57	0.60	0.62	0.64	0.66	0.68	0.71	0.73
TOTAL TAXES			0.26	0.30	0.45	0.46	0.48	0.51	0.54	0.58	0.61	0.65	0.69	0.73	0.77	0.81	0.85	0.89	0.93	0.96	0.99	1.02
TAX CREDITS/STATE CONTRIBUTIONS			0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61
TAX CREDITS/LOCAL CONTRIBUTIONS			0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
INDUCED NEW GOVERNMENT			0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
SPENDING			0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.04	0.09	0.13	0.17	0.22	0.26
NETTAXES			-0.35	-0.31	-0.16	-0.15	-0.13	-0.10	-0.07	-0.04	0.00	0.04	0.07	0.12	0.16	0.20	0.20	0.19	0.19	0.18	0.16	0.15
PRESENT VALUE OF TOTAL NEW TAXES		6.55																				
PRESENT VALUE OF TOTAL NEW STATE TAXES		1.69																				
PRESENT VALUE OF TOTAL NEW	_	1.09																				
LOCALTAXES		4.85																				
PRESENT VALUE OF TAX																						
CREDITS/INDUCED SPENDING		7.01																				
PRESENT VALUE OF NET NEW TAXES*		-0.47																				
PRESENT VALUE OF NET NEW STATE TAXES*		-5.21																				
PRESENT VALUE OF NET NEW LOCAL TAXES		4.74																				
*Induced spending allocated accordi	ing	to relati	ve shar	es of sp	ending																	



NBMAA-50% Net New - Hart	for	d																				
(Millions of Dollars, Except Populati	on)																					
			2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Income Taxes																						
New Personal Income			2.71	3.04	1.10	1.22	1.46	1.78	2.15	2.57	3.06	3.57	4.17	4.34	4.49	4.63	4.76	4.90	5.05	5.21	5.39	5.59
Income Tax			0.08	0.09	0.03	0.03	0.04	0.05	0.06	0.07	0.09	0.10	0.12	0.12	0.13	0.13	0.14	0.14	0.14	0.15	0.15	0.16
Sales and Use Taxes																						
New Gross State Product			3.74	3 . 6 2	0.65	0.96	1.37	1.80	2.30	2.82	3 . 4 2	4.06	4.74	4.79	4.88	4.95	5.07	5 . 2 1	5.39	5.59	5 . 8 2	6.07
New Sales and UseTaxes			0.10	0.09	0.02	0.03	0.04	0.05	0.06	0.07	0.09	0.11	0.12	0.12	0.13	0.13	0.13	0.14	0.14	0.15	0.15	0.16
Corporate Profits Taxes																						
New Gross State Product			3.74	3 . 6 2	0.65	0.96	1.37	1.80	2.30	2.82	3 . 4 2	4.06	4.74	4.79	4.88	4.95	5.07	5 . 2 1	5.39	5.59	5 . 8 2	6.07
Profits tax			0.01	0.01	0.00	0.00	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02
New Local Property Taxes																						
Project Directly			0.00	0.00	0.34	0.35	0.35	0.36	0.37	0.38	0.39	0.40	0.40	0 . 4 1	0.42	0.43	0.44	0.45	0.46	0.47	0.48	0.49
New Population			1 2	2 6	3 2	3 5	3 9	4 4	5 0	5 7	6 4	7 2	8 1	9 0	9 7	103	108	113	1 1 7	1 2 0	1 2 3	1 2 6
Total New Property Taxes			0.02	0.04	0.39	0.40	0.42	0.44	0.46	0.48	0.51	0.53	0.56	0.59	0.62	0.64	0.67	0.69	0.72	0.74	0.76	0.79
TOTAL TAXES			0.21	0.24	0.44	0.47	0.50	0.54	0.59	0.64	0.69	0.75	0.82	0.86	0.89	0.92	0.96	0.99	1.02	1.05	1.09	1.13
TAX CREDITS/STATE CONTRIBUTIONS			0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19	0.19
TAX CREDITS/LOCAL CONTRIBUTIONS			0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
INDUCED NEW GOVERNMENT SPENDING			0.00	0.00	0.00	0.00	0.03	0.07	0.10	0.15	0.21	0.27	0.33	0.40	0.47	0.52	0.58	0.64	0.69	0.73	0.78	0.82
NETTAXES			0.02	0.04	0.25	0.27	0.28	0.29	0.29	0.29	0.30	0.30	0.30	0.26	0.23	0.21	0.18	0.16	0.14	0.13	0.12	0.11
PRESENT VALUE OF TOTAL NEW TAXES		7.09																				
PRESENT VALUE OF TOTAL NEW STATE TAXES		2.09																				
PRESENT VALUE OF TOTAL NEW LOCAL TAXES		5.00																				
PRESENT VALUE OF TAX	Н																					
CREDITS/INDUCED SPENDING		4.78																				
PRESENT VALUE OF NET NEW TAXES*		2.31																				
PRESENT VALUE OF NET NEW STATE																						
PRESENT VALUE OF NET NEW LOCAL	\vdash	-1.66						-	-												-	
TAXES		3.97																				



New Britain Museum of American Art Capital Expansion Project

																					-
(Millions of Dollars, Except Populati	on)																				
		2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Income Taxes																					
New Personal Income		3.80	4.23	1.27	1.39	1.72	2.20	2.72	3.33	4.03	4.76	5.60	5.80	5.95	6.12	6.23	6.42	6.59	6.78	7.02	7.36
Income Tax		0.11	0.12	0.04	0.04	0.05	0.06	0.08	0.09	0.11	0.14	0.16	0.17	0.17	0.17	0.18	0.18	0.19	0.19	0.20	0.21
Sales and Use Taxes																					
New Gross State Product		4.06	3.95	0.39	0.73	1.19	1.70	2.32	2.92	3.61	4.36	5.13	5.17	5.21	5.31	5.45	5.52	5.74	6.00	6.32	6.55
New Sales and UseTaxes		0.11	0.10	0.01	0.02	0.03	0.04	0.06	0.08	0.09	0.11	0.13	0.13	0.14	0.14	0.14	0.14	0.15	0.16	0.16	0.17
Corporate Profits Taxes																					
New Gross State Product		4.06	3.95	0.39	0.73	1.19	1.70	2.32	2.92	3.61	4.36	5.13	5.17	5.21	5.31	5.45	5.52	5.74	6.00	6.32	6.55
Profits tax		0.02	0.02	0.00	0.00	0.00	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.03
New Local Property Taxes																					
Project Directly		0.00	0.00	0.34	0.35	0.35	0.36	0.37	0.38	0.39	0.40	0.40	0.41	0.42	0.43	0.44	0.45	0.46	0.47	0.48	0.49
New Population		18	3 8	4 3	4 3	4 7	5 2	5 9	6 8	7 6	8 6	9 7	108	116	1 2 4	129	134	137	141	144	1 4 6
Total New Property Taxes		0.03	0.06	0.41	0.42	0.43	0.45	0.47	0.50	0.53	0.56	0.59	0.63	0.66	0.69	0.71	0.74	0.76	0.79	0.81	0.83
TOTAL TAXES		0.26	0.30	0.46	0.48	0.52	0.57	0.62	0.68	0.75	0.82	0.90	0.94	0.98	1.02	1.05	1.09	1.12	1.16	1.20	1.24
TAX CREDITS/STATE CONTRIBUTIONS		0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61	0.61
TAX CREDITS/LOCAL																					
CONTRIBUTIONS		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
INDUCED NEW GOVERNMENT SPENDING		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.06	0.14	0.21	0.28	0.34	0.40	0.46	0.51	0.56	0.61
NET TAXES	+	-0.35	-0.31	-0.15	-0.13	-0.09	-0.04	0.00	0.00	0.14	0.00	0.00	0.14	0.16	0.28	0.10	0.40	0.46	0.04	0.03	
PRESENT VALUE OF TOTAL NEW		0.00	0.01	0.10	0.10	0.00	0.04	0.01	0.07	0.11	0.2.	0.24	0.20	0.10	0.10	0.10	0.07	0.00	0.04	0.00	0.02
TAXES	7.72																				
PRESENT VALUE OF TOTAL NEW																					
STATE TAXES	2.45																				
PRESENT VALUE OF TOTAL NEW LOCAL TAXES	5.28																				
PRESENT VALUE OF TAX																					
CREDITS/INDUCED SPENDING	7.97																				
PRESENT VALUE OF NET NEW TAXES*	- 0 . 2 4																				
PRESENT VALUE OF NET NEW STATE TAXES*	-5.04																				
PRESENT VALUE OF NET NEW LOCAL TAXES	4.80																				
•																					



New Britain Museum of American Art Capital Expansion Project

Appendix B:

REMI OUTPUT



30%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Primary:Super Summary Table - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Total Emp (Thous)	0.07501	0.07465	0.0177	0.02155	0.02588	0.04773	0.06622	0.07275
Total Emp As % of US	0.00004497	0.00004417	0.00001034	0.00001249	0.00001481	0.00002623	0.00003532	0.00003809
Priv Non-Farm Emp (Thous)	0.07648	0.07501	0.01758	0.02124	0.02527	0.04547	0.06232	0.06775
Priv Non-Farm Emp As % of US	0.00005415	0.00005236	0.00001219	0.00001439	0.00001708	0.00002933	0.00003904	0.00004163
GRP (Bil 92\$)	0.003166	0.002998	0.0004311	0.0005379	0.0006905	0.001514	0.002224	0.002514
Pers Inc (Bil Nom \$)	0.002708	0.003036	0.001015	0.001026	0.001129	0.002075	0.003273	0.004173
Pers Inc As % of US	0.00003371	0.00003618	0.00001162	0.0000113	0.00001195	0.00001809	0.00002378	0.00002557
Disp Pers Inc (Bil Nom \$)	0.002048	0.002321	0.0008068	0.0008163	0.0008984	0.001656	0.002632	0.003384
PCE-Price Index 92\$	0.002106	0.002899	0.001724	0.001389	0.001282	0.00145	0.001892	0.001953
Real Disp Pers Inc (Bil 92\$)	0.001245	0.001297	0.0003319	0.0003757	0.0004368	0.0008259	0.001209	0.001434
Real Disp Pers Inc Per Cap (Thous 92\$)	0.001163	0.0007973	-0.0005398	-0.000555	-0.0005932	-0.000803	-0.00106	-0.001318
Population (Thous)	0.01202	0.02637	0.03162	0.03339	0.03656	0.0553	0.07489	0.08948
Pop As % of US	0.00000435	0.00000944	0.00001121	0.00001174	0.00001279	0.00001857	0.00002411	0.00002766



30%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Primary:Summary Table for Private Non-Farm Sectors - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Priv Non-Farm Emp (Thous)	0.07648	0.07501	0.01758	0.02124	0.02527	0.04547	0.06232	0.06775
Int Dem Emp (Thous)	0.01656	0.01492	0.001106	0.00145	0.002014	0.004974	0.007034	0.007462
Loc Consump Dem Emp (Thous)	0.008224	0.007492	0.0002594	0.000412	0.0007324	0.002274	0.00354	0.00444
Govt Dem Emp (Thous)	-0.00000333	-0.00002027	-0.00004244	-0.00005627	-0.00006533	-0.00008261	-0.000118	-0.0001737
Inv Act Emp (Thous)	0.003544	0.003128	-0.00001335	0.0001373	0.0003834	0.001587	0.002314	0.002125
Exp to US/ROW Emp (Thous)	-0.0006866	-0.001526	-0.001846	-0.001938	-0.001953	-0.001617	-0.00174	-0.001724
Exp - Multiregions Emp (Thous)	0.0003548	0.0001755	-0.0003624	-0.0003929	-0.00037	-0.0002937	-0.0003433	-0.0003891
Exog Emp (Thous)	0.0485	0.05086	0.01851	0.02152	0.02453	0.03871	0.05162	0.05603
Rel Selling Prices	0.00001729	0.00002444	0.00001454	0.00001132	0.00000977	0.000009	0.00001121	0.00001037
Rel Fact Input Costs	0.00002789	0.0000385	0.0000217	0.00001585	0.00001252	0.00000977	0.0000118	0.00000953
Rel Labor Costs	0.00003719	0.00005031	0.00002682	0.00001836	0.00001407	0.00001085	0.00001299	0.00000882
Rel Fuel Costs	0	0	0	0	0	0	0	0
Rel Capital Costs	0.00001574	0.00002313	0.00001562	0.00001287	0.00001085	0.00000882	0.00001049	0.00001073
Rel Int Input Costs	0.00001454	0.00002098	0.00001287	0.00000977	0.00000822	0.0000075	0.00000941	0.00000894
Rel Prod Manuf	0	0	0	0	0	0	0	0
Rel Prof Manuf	-0.00001293	-0.00001824	-0.00001001	-0.00000673	-0.00000476	-0.0000025	-0.00000268	-0.00000101
Labor Intensity	-0.00000011	-0.0000006	-0.00000077	-0.00000089	-0.00000089	-0.00000107	-0.00000119	-0.00000143
Mult Adjust	0	0	0	0	0	0	0	0
Priv Non-Farm Emp As % of US	0.00005415	0.00005236	0.00001219	0.00001439	0.00001708	0.00002933	0.00003904	0.00004163
Reg Pur Coeff (SS/Dem)	-0.00000309	-0.00000381	-0.00000113	-0.00000196	-0.00000166	-0.00000268	-0.0000029	-0.00000336
Ave Ann Wage Rate (Thous Nom \$)	0.0008469	0.001202	0.000473	0.0001373	-0.00009155	-0.000721	-0.001263	-0.001846
Indust Mix Index	-0.00005329	-0.00004506	0.00000047	0.00000071	0.0000006	0.00000023	-0.00000071	-0.00000143
Demand (Bil 92\$)	0.004555	0.004322	0.0004997	0.0007095	0.0008888	0.002232	0.003292	0.003784
Imports (Bil 92\$)	0.002388	0.002316	0.0003052	0.0004425	0.0005207	0.001278	0.001846	0.002167
SIf Suppl (Bil 92\$)	0.002169	0.002007	0.0001965	0.0002594	0.0003662	0.0009632	0.00144	0.001617
Exp to US/ROW (Bil 92\$)	-0.00009537	-0.0002213	-0.000267	-0.0002842	-0.0002899	-0.0002556	-0.0002823	-0.0003014
Exp - Multiregions (Bil 92\$)	0.00003052	0.00001001	-0.00005102	-0.00005436	-0.00005245	-0.00003481	-0.00003242	-0.00003529
Exog Prod (Bil 92\$)	0.003923	0.003781	0.0007831	0.0009129	0.001042	0.001682	0.002289	0.002531
Output (Bil 92\$)	0.006023	0.005585	0.0006599	0.0008316	0.001064	0.00235	0.003426	0.003815
Val-Add (Bil 92\$)	0.003227	0.003014	0.0004272	0.0005226	0.0006638	0.001423	0.002056	0.002296
Wag & Sal Disb (Bil Nom \$)	0.003351	0.003588	0.0009747	0.0009499	0.001019	0.001791	0.002766	0.003338



30%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Primary:Employment Table (Thous) - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Manufacturing	0.001923	0.002052	-0.0007782	-0.0007553	-0.0006409	0.0001068	0.0004807	0.0007019
Manuf As % of US	0.00001028	0.00001103	-0.00000423	-0.00000408	-0.00000348	0.00000056	0.00000259	0.0000039
Durables	0.001255	0.001347	-0.00108	-0.001064	-0.0009727	-0.0003662	-0.00006104	0.0001526
Non-Durables	0.0006704	0.000701	0.0003014	0.0003099	0.0003347	0.0004711	0.0005465	0.0005484
Non-Manufact	0.07455	0.073	0.0184	0.02188	0.02594	0.04535	0.06189	0.06714
Non-Manuf As % of US	0.00006089	0.00005856	0.00001457	0.00001711	0.00001997	0.00003326	0.00004378	0.00004634
Mining	0.0000073	0.00000591	-0.00000125	-0.00000107	-0.00000068	0.00000174	0.00000347	0.00000403
Construction	0.0273	0.02289	-0.0001221	-0.00001526	0.0001736	0.001133	0.001719	0.001699
Trans/Pub Util	0.001022	0.0009003	0.000103	0.0002766	0.0004845	0.001499	0.002365	0.002674
Fin/Ins/Real Est	0.001434	0.001007	-0.0001831	-0.000145	-0.00006104	0.0003357	0.0005112	0.0005264
Retail Trade	0.007965	0.007362	0.001434	0.002541	0.003784	0.009682	0.01483	0.01643
Wholesale Trade	0.001648	0.001488	-0.00008011	-0.00001907	0.00008392	0.0006523	0.001003	0.0009918
Services	0.03496	0.03911	0.01721	0.01924	0.02142	0.03198	0.04129	0.04462
Agri/For/Fish Serv	0.0002279	0.0001941	0.00000762	0.00001192	0.0000205	0.00007534	0.0001135	0.0001254
Total Government	-0.001495	-0.0003815	0.00008392	0.0002899	0.0005951	0.002251	0.003853	0.004982
Total Govt As % of US	-0.00000655	-0.00000166	0.00000035	0.00000122	0.00000253	0.0000091	0.00001526	0.00001937
State & Local	-0.001499	-0.0003777	0.00008392	0.0002899	0.0005951	0.002251	0.003849	0.004982
Federal Civilian	0	0	0	0	0	0	0	0
Federal Mil	0	0	0	0	0	0	0	0
Farm	0	0	0	0	0	0	0	0
Farm As % of US	0	0	0	0	0	0	0	0
Total Employment	0.07501	0.07465	0.0177	0.02155	0.02588	0.04773	0.06622	0.07275
Total Emp As % of US	0.00004497	0.00004417	0.00001034	0.00001249	0.00001481	0.00002623	0.00003532	0.00003809
Population	0.01202	0.02637	0.03162	0.03339	0.03656	0.0553	0.07489	0.08948
Pop As % of US	0.00000435	0.00000944	0.00001121	0.00001174	0.00001279	0.00001857	0.00002411	0.00002766



30%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Primary:Personal Income Table (Bil Nom \$) - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Wag & Sal Disbur	0.003391	0.00371	0.00106	0.00103	0.001108	0.001984	0.003098	0.003792
Propr & Other Lab Inc	0.0007725	0.0007582	0.0001349	0.0001664	0.0002074	0.000452	0.0007372	0.0009537
Tot Lab & Propr Inc	0.004162	0.004469	0.001196	0.001198	0.001316	0.002434	0.003838	0.004745
Tot Lab & Propr Inc As % of US	0.00007111	0.00007331	0.00001886	0.00001815	0.00001919	0.00002933	0.00003868	0.00004038
Soc Ins Contrib	0.0002613	0.0002862	0.0000819	0.00007963	0.00008583	0.0001543	0.0002413	0.0002961
Net Resid Adj	-0.001087	-0.001161	-0.0003252	-0.0003314	-0.0003653	-0.0006547	-0.00102	-0.001257
Div/Int/Rent	0.00004721	0.0001063	0.0001335	0.0001459	0.0001664	0.000299	0.0004606	0.0006189
Transf Paym	-0.0001512	-0.00009346	0.00009441	0.00009346	0.00009966	0.0001521	0.0002365	0.0003576
Personal Income	0.002708	0.003036	0.001015	0.001026	0.001129	0.002075	0.003273	0.004173
Pers Inc As % of US	0.00003371	0.00003618	0.00001162	0.0000113	0.00001195	0.00001809	0.00002378	0.00002557
Taxes	0.0006599	0.0007153	0.0002089	0.0002098	0.0002303	0.0004177	0.0006428	0.0007915
Dispos Pers Inc	0.002048	0.002321	0.0008068	0.0008163	0.0008984	0.001656	0.002632	0.003384
PCE-Price Index 92\$	0.002106	0.002899	0.001724	0.001389	0.001282	0.00145	0.001892	0.001953
Real Disp Pers Inc (Bil 92\$)	0.001245	0.001297	0.0003319	0.0003757	0.0004368	0.0008259	0.001209	0.001434
Real Disp Pers Inc As % of US	0.00002193	0.00002232	0.0000056	0.00000619	0.00000706	0.00001222	0.00001657	0.00001845
Real Disp Pers Inc Per Cap (Thous 92\$)	0.001163	0.0007973	-0.0005398	-0.000555	-0.0005932	-0.000803	-0.00106	-0.001318
Manuf Labor & Prop Inc	0.0002131	0.0002613	0.00003433	0.00000572	-0.00000429	0.00004196	0.0001054	0.0001268
Dur Lab & Prop Inc	0.0001657	0.0002046	0.00000667	-0.00001812	-0.00002718	0.00000953	0.0000596	0.00007725
Non-Dur Lab & Prop Inc	0.00004733	0.0000571	0.00002789	0.00002366	0.00002289	0.00003278	0.0000459	0.00004935
Non-Manuf Lab & Prop Inc	0.003923	0.004087	0.001072	0.00111	0.001223	0.002176	0.003345	0.004086
Mining Lab & Prop Inc	0.00000032	0.00000031	0.0000001	0	0	0.00000009	0.0000002	0.00000025
Const Lab & Prop Inc	0.001346	0.001198	0.0000509	0.00004447	0.00004625	0.00009298	0.0001502	0.0001693
Trans/Pub Util Lab & Prop Inc	0.00008082	0.00008965	0.00002825	0.00002766	0.00003302	0.00008655	0.0001533	0.0001912
Fin/Ins/Real Est Lab & Prop Inc	0.0001678	0.0001988	0.00007057	0.00004101	0.00002909	0.00004721	0.00008202	0.00007248
Ret Trade Lab & Prop Inc	0.000212	0.0002239	0.0000658	0.00007606	0.00009751	0.0002499	0.0004385	0.00055
Wholes Trade Lab & Prop Inc	0.0001285	0.0001423	0.00003076	0.00002193	0.00002193	0.00006127	0.0001075	0.0001137
Servic Lab & Prop Inc	0.001982	0.002228	0.0008259	0.0008965	0.0009966	0.001635	0.002411	0.002987
Agri/For/Fish Serv Lab & Prop Inc	0.00000631	0.00000654	0.0000016	0.0000012	0.00000114	0.00000263	0.0000046	0.00000542
Total Govt Lab & Prop Inc	0.00002718	0.0001202	0.00008965	0.00008202	0.00009775	0.0002155	0.0003829	0.0005331
State & Local Lab & Prop Inc	0.00001621	0.0001028	0.00007868	0.00008011	0.00009322	0.0002136	0.0003767	0.0005245
Fed Civil Lab & Prop Inc	0.00001204	0.0000152	0.00000679	0.00000512	0.00000423	0.00000476	0.00000727	0.00000661
Fed Mil Lab & Prop Inc	0	0	0	0	0	0	0	0
Farm Lab & Prop Inc	0	0	0	0	0	0	0	0



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30%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Primary:GRP By Final Demand Table (Bil 92\$) - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Total GRP	0.003166	0.002998	0.0004311	0.0005379	0.0006905	0.001514	0.002224	0.002514
Total Consump	0.001009	0.001015	0.0002041	0.0002365	0.000288	0.0005684	0.0008469	0.001024
Vehicles and Parts	0.00006169	0.00005883	0.00000733	0.00000816	0.00001007	0.00001967	0.00002795	0.00003046
Furn & Hsehld Eq	0.0001116	0.0001209	0.00001788	0.0000217	0.00002849	0.00007319	0.0001235	0.0001512
Other Durables	0.00004205	0.00003985	0.00000408	0.000005	0.0000064	0.00001353	0.00001925	0.0000217
Food & Beverages	0.0002143	0.0002027	0.00002193	0.00002599	0.00003314	0.00006843	0.00009847	0.0001085
Clothing & Shoes	0.00009596	0.00009167	0.00001073	0.0000124	0.00001526	0.00003231	0.00004733	0.00005352
Gasoline & Oil	0.00002676	0.0000245	0.00000119	0.00000235	0.0000036	0.00000885	0.00001302	0.00001457
Fuel Oil & Coal	0.0000063	0.00000563	0.0000003	0.00000049	0.00000075	0.00000153	0.0000019	0.00000191
Oth Non-Durbls	0.00003695	0.00005376	0.00004101	0.00004292	0.00004721	0.00007153	0.00009656	0.0001146
Housing	0.00007439	0.0001061	0.00008249	0.00008845	0.0001016	0.0001638	0.0002246	0.0002658
Hsehld Operat	0.00007945	0.00007325	0.00000387	0.00000643	0.00001073	0.00002825	0.00004315	0.00004935
Transportation	0.00005609	0.00005096	0.00000262	0.00000494	0.00000739	0.00001717	0.00002444	0.000027
Medical Care	0.00001192	0.00001645	0.00000882	0.00001025	0.00001264	0.0000267	0.00005507	0.0001023
Other Services	0.0001898	0.0001695	0.00000166	0.00000739	0.00001287	0.00004411	0.00006962	0.00007987
Total Fixed Invest	0.0008669	0.0008006	0.00004816	0.00008965	0.0001712	0.0006471	0.001039	0.001064
Residential	0.0003106	0.0002813	0.00000792	0.000018	0.00003111	0.00009251	0.0001239	0.0001143
Non-Residential	0.00009811	0.00008893	0.00000667	0.00001174	0.00002229	0.00007915	0.0001195	0.0001162
Produc Dur Equip	0.0004582	0.0004306	0.00003338	0.00006032	0.000118	0.0004756	0.0007954	0.000834
CBI net IVA+MISC	0.00000348	0.00000287	-0.00000202	-0.00000175	-0.00000119	-0.00000061	-0.00000066	-0.00000093
GRPVA-GRPFD	0	0	0	0	0	0	0	0
Total Government	-0.0001006	-0.00004101	-0.00001574	-0.00000309	0.00001431	0.0001159	0.0002222	0.0003061
Federal Mil	0	0	0	0	0	0	0	0
Federal Civilian	0	0	0	0	0	0	0	0
State & Local	-0.0001006	-0.00004101	-0.00001574	-0.00000309	0.00001454	0.0001159	0.0002222	0.0003061
Total Exports + Exogenous	0.003788	0.003548	0.0005264	0.0006332	0.0007553	0.001446	0.002029	0.002235
Exogenous	0.003923	0.003781	0.0007831	0.0009129	0.001042	0.001682	0.002289	0.002531
Endogenous Exports	-0.0001335	-0.0002327	-0.0002556	-0.0002785	-0.0002861	-0.0002365	-0.0002594	-0.0002975
Total Imports	0.002401	0.002327	0.00033	0.0004158	0.0005379	0.001261	0.001911	0.002117
Tot GRP by Val-Add	0.003166	0.002998	0.0004311	0.0005379	0.0006905	0.001514	0.002224	0.002514
Tot Priv Non-Farm Val-Add	0.003227	0.003014	0.0004272	0.0005264	0.0006676	0.001423	0.00206	0.002293
Tot Govt Compens	-0.00005937	-0.00001502	0.00000357	0.00001168	0.00002384	0.00009346	0.0001652	0.0002215
Tot Farm Val-Add	0	0	0	0	0	0	0	0



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30%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Total:Population Model Summary - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Last Year POP (w/o Mil,Dep,Spec)	0	0.01208	0.02625	0.03162	0.03351	0.05151	0.07166	0.08777
Total Deaths	0	0.00001526	0.00003338	0.00004244	0.00004673	0.0000782	0.0001225	0.0001688
Male Deaths	0	0.00001025	0.0000236	0.00002956	0.00003242	0.00005436	0.00008202	0.0001109
Female Deaths	0	0.000005	0.00000977	0.00001287	0.00001383	0.00002408	0.00004053	0.00005817
Total Births	0	0.0002584	0.0005598	0.0006638	0.0006838	0.0009079	0.00113	0.001342
Male Births	0	0.0001316	0.0002851	0.0003381	0.000349	0.000463	0.000576	0.0006847
Female Births	0	0.0001264	0.0002747	0.0003247	0.0003343	0.0004449	0.0005536	0.0006576
This Year Population B4 MIGS	0	0.01227	0.02679	0.03223	0.03418	0.05249	0.07263	0.08868
Male Pop B4 MIGS	0	0.006287	0.01373	0.01654	0.01755	0.02686	0.03711	0.04526
Fem Pop B4 MIGS	0	0.005951	0.01309	0.01566	0.01663	0.02567	0.03552	0.04343
Pop und 65 B4 MIGS	0	0.01215	0.02679	0.03217	0.03381	0.0517	0.07098	0.08606
Pop 65 & Over B4 MIGS	0	0.00003052	0.00007629	0.0001678	0.0002441	0.0008087	0.001678	0.002823
Total Migrants	0.01188	0.01389	0.004779	0.001249	0.002527	0.003229	0.002659	0.0008683
Under 65	0.01188	0.01389	0.00478	0.00125	0.002528	0.003235	0.002671	0.0008893
Econ Migrants	0.01188	0.01389	0.004782	0.001252	0.002529	0.003238	0.002672	0.0008893
Int'l Migrants	0	0	0	0	0	0	0	0
Chng in Mil & Deps	0	-0.00000139	-0.00000232	-0.00000193	-0.00000106	-0.00000276	-0.00000128	0.00000019
Male Migrants	0.006117	0.007149	0.002461	0.0006436	0.001301	0.001665	0.001375	0.000458
Female Migrants	0.005765	0.006738	0.002319	0.0006062	0.001227	0.00157	0.001296	0.0004315
65 & Over	0	-0.00000011	-0.0000006	-0.00000107	-0.00000166	-0.00000572	-0.0000124	-0.0000211
Ret Male Migs	0	-0.0000011	-0.00000035	-0.00000053	-0.00000089	-0.00000274	-0.0000061	-0.00001067
Ret Fem Migs	0	-0	-0.00000023	-0.00000053	-0.00000083	-0.0000029	-0.00000613	-0.00001049
Total Mig Dths	0.00000895	0.00001044	0.00000357	0.00000091	0.00000186	0.00000223	0.00000165	0.0000003
Male Mig Dths	0.00000616	0.0000072	0.00000247	0.00000064	0.0000013	0.0000015	0.00000117	0.00000025
Female Mig Dths	0.00000279	0.00000323	0.00000109	0.00000027	0.00000056	0.0000006	0.00000047	0.00000005
Total Mig Brths	0.0001231	0.0001442	0.00004975	0.00001307	0.00002642	0.00003406	0.00002829	0.00000939
Male Mig Brths	0.00006279	0.00007352	0.00002537	0.00000666	0.00001347	0.00001737	0.00001443	0.00000479
Female Mig Brths	0.00006032	0.00007064	0.00002438	0.0000064	0.00001294	0.00001669	0.00001387	0.0000046
Census Undercnt	0	0	0	0	0	0	0	0
Under 65	0	0	0	0	0	0	0	0
65 & Over	0	0	0	0	0	0	0	0
POP (w/o Mil,Dep,Spec) B4 Mult	0.01202	0.02625	0.03162	0.03339	0.03674	0.05573	0.07544	0.0899
Mult Adjust	0	0	-0	0.00000011	0	0.00000017	0	0
POP (w/o Mil,Dep,Spec) With Mult	0.01202	0.02625	0.03156	0.03345	0.03674	0.05585	0.07544	0.0899
Total Mil & Deps	0	0	0	0	0	0	0	0
Total Spec Pop	0	0.00008106	-0.00001335	-0.00004292	-0.00008965	-0.0004997	-0.0005455	-0.0002975
Total Population	0.01208	0.02637	0.03156	0.03345	0.03668	0.05536	0.07477	0.08972



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30%net new with amenities - [Top] - Differences as Compared to REMI Standard Reg Control
Connecticut

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Employment (Thous)	0.08057	0.07983	0.01221	0.01636	0.02124	0.04614	0.06641	0.07324
GRP (Bil 92\$)	0.003403	0.003242	0.0001831	0.0002975	0.0004807	0.00148	0.002304	0.002609
Pers Inc (Bil Nom \$)	0.003799	0.004227	0.001144	0.001083	0.00119	0.002548	0.00415	0.005341
PCE-Price Index 92\$	0.0006866	0.000885	0.0004578	0.0003357	0.0002594	0.000351	0.0004883	0.0005035
Real Disp Pers Inc (Bil 92\$)	0.001808	0.001907	0.0003815	0.0004349	0.0005264	0.00106	0.001617	0.001915
Population (Thous)	0.01758	0.03809	0.04224	0.04126	0.04224	0.06128	0.08496	0.1013
Econ Migrants	0.01721	0.02012	0.003323	-0.001853	0.001246	0.003727	0.003168	0.001074
Total Migrants	0.01722	0.02012	0.003319	-0.001858	0.001242	0.003718	0.003156	0.001052
Labor Force	0.01709	0.03113	0.0282	0.0249	0.02478	0.03357	0.04834	0.05859
Demand (Bil 92\$)	0.005463	0.005157	-0.001404	0.0006409	0.0001678	0.003006	0.002991	0.004059
Output (Bil 92\$)	0.006775	0.006287	0.0004883	0.0006714	0.0009918	0.002548	0.003754	0.004211
Rel Prod Manuf	0	0	0	0	0	0	0	0
Rel Prof Manuf	-0.00000494	-0.00000691	-0.00000327	-0.00000202	-0.00000137	-0.00000089	-0.00000101	-0.00000065
Labor Intensity	-0	-0.00000023	-0.00000023	-0.0000003	-0.00000035	-0.00000035	-0.00000035	-0.00000041
Mult Adjustment	0	0	0	0	0	0	0	0
Indust Mix Index	-0.00000762	-0.00000667	0.00002575	0.00002575	0.0000248	0.00002384	0.00002003	0.00001526
Reg Pur Coeff (SS/Dem)	-0	-0.0000003	0.00000494	-0.00000101	0.00000125	-0.00000184	0.0000014	0
Imports (Bil 92\$)	0.002441	0.002335	-0.00148	0.0004425	-0.0001831	0.00174	0.001007	0.001808
Self Supply (Bil 92\$)	0.003059	0.002831	0.00009918	0.0001755	0.0003357	0.001266	0.001976	0.002213
Exports US/ROW (Bil 92\$)	-0.0001144	-0.0002594	-0.0003357	-0.0003433	-0.0003128	-0.0002365	-0.0003052	-0.000351
Exports - MR (Bil 92\$)	0	0	0	0	0	0	0	0
Exog Prod (Bil 92\$)	0.003874	0.003732	0.0007236	0.0008425	0.0009604	0.00155	0.002109	0.002335
Wage Rate (Thous Nom\$)	0.0003242	0.0004501	0.0001526	0.00003433	-0.00004578	-0.0002289	-0.0003853	-0.0005569



50%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Primary:Super Summary Table - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Total Emp (Thous)	0.07501	0.07465	0.02087	0.0285	0.03699	0.08801	0.09729	0.09924
Total Emp As % of US	0.00004497	0.00004417	0.00001222	0.00001651	0.00002119	0.00004834	0.00005189	0.00005198
Priv Non-Farm Emp (Thous)	0.07648	0.07501	0.02075	0.02814	0.03619	0.08453	0.091	0.09174
Priv Non-Farm Emp As % of US	0.00005415	0.00005236	0.00001433	0.0000191	0.00002444	0.00005454	0.00005695	0.00005636
GRP (Bil 92\$)	0.003166	0.002998	0.0005302	0.0007629	0.001057	0.002819	0.003151	0.003376
Pers Inc (Bil Nom \$)	0.002708	0.003036	0.001099	0.001221	0.001461	0.003574	0.004761	0.005585
Pers Inc As % of US	0.00003371	0.00003618	0.00001258	0.00001344	0.00001547	0.00003117	0.0000346	0.00003418
Disp Pers Inc (Bil Nom \$)	0.002048	0.002321	0.0008698	0.0009632	0.00115	0.002815	0.003822	0.004532
PCE-Price Index 92\$	0.002106	0.002899	0.001801	0.001587	0.001633	0.002991	0.003189	0.002594
Real Disp Pers Inc (Bil 92\$)	0.001245	0.001297	0.0003662	0.000452	0.0005608	0.001328	0.001696	0.001925
Real Disp Pers Inc Per Cap (Thous 92\$)	0.001163	0.0007973	-0.0005112	-0.0004978	-0.0005207	-0.000761	-0.001595	-0.001945
Population (Thous)	0.01202	0.02637	0.03204	0.03455	0.03906	0.07239	0.1083	0.1255
Pop As % of US	0.00000435	0.00000944	0.00001135	0.00001216	0.00001365	0.00002429	0.00003484	0.0000388



50%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Primary:Summary Table for Private Non-Farm Sectors - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Priv Non-Farm Emp (Thous)	0.07648	0.07501	0.02075	0.02814	0.03619	0.08453	0.091	0.09174
Int Dem Emp (Thous)	0.01656	0.01492	0.001541	0.002365	0.003418	0.009338	0.00914	0.009354
Loc Consump Dem Emp (Thous)	0.008224	0.007492	0.000473	0.000824	0.001358	0.003998	0.004044	0.00531
Govt Dem Emp (Thous)	-0.00000333	-0.00002027	-0.0000391	-0.00005579	-0.00006461	-0.0001073	-0.000196	-0.0002673
Inv Act Emp (Thous)	0.003544	0.003128	0.0002041	0.0006065	0.001123	0.003901	0.003359	0.002708
Exp to US/ROW Emp (Thous)	-0.0006866	-0.001526	-0.001846	-0.001999	-0.002121	-0.002869	-0.003784	-0.003036
Exp - Multiregions Emp (Thous)	0.0003548	0.0001755	-0.000351	-0.0003738	-0.0003586	-0.0004463	-0.0007324	-0.0006104
Exog Emp (Thous)	0.0485	0.05086	0.02084	0.02661	0.03287	0.07072	0.07919	0.07832
Rel Selling Prices	0.00001729	0.00002444	0.00001526	0.00001299	0.00001252	0.00002003	0.00001991	0.00001442
Rel Fact Input Costs	0.00002789	0.0000385	0.00002265	0.00001836	0.00001645	0.00002551	0.00002265	0.00001276
Rel Labor Costs	0.00003719	0.00005031	0.00002813	0.0000217	0.00002003	0.0000329	0.00002718	0.00001121
Rel Fuel Costs	0	0	0	0	0	0	0	0
Rel Capital Costs	0.00001574	0.00002313	0.00001597	0.00001383	0.00001264	0.00001645	0.00001788	0.00001514
Rel Int Input Costs	0.00001454	0.00002098	0.00001347	0.00001121	0.00001061	0.00001705	0.00001717	0.00001252
Rel Prod Manuf	0	0	0	0	0	0	0	0
Rel Prof Manuf	-0.00001293	-0.00001824	-0.00001037	-0.00000762	-0.00000637	-0.00000882	-0.00000679	-0.00000125
Labor Intensity	-0.00000011	-0.0000006	-0.00000083	-0.00000095	-0.00000101	-0.00000208	-0.00000339	-0.00000321
Mult Adjust	0	0	0	0	0	0	0	0
Priv Non-Farm Emp As % of US	0.00005415	0.00005236	0.00001433	0.0000191	0.00002444	0.00005454	0.00005695	0.00005636
Reg Pur Coeff (SS/Dem)	-0.00000309	-0.00000381	-0.00000137	-0.00000238	-0.00000292	-0.00000667	-0.00000619	-0.0000045
Ave Ann Wage Rate (Thous Nom \$)	0.0008469	0.001202	0.0004387	0.00006866	-0.0002022	-0.001133	-0.001865	-0.002808
Indust Mix Index	-0.00005329	-0.00004506	0.00000119	0.0000015	0.0000019	0.00000286	-0.0000015	-0.00000262
Demand (Bil 92\$)	0.004555	0.004322	0.000679	0.001076	0.001511	0.004417	0.0047	0.004875
Imports (Bil 92\$)	0.002388	0.002316	0.0004082	0.0006561	0.0008965	0.002596	0.002766	0.002815
SIf Suppl (Bil 92\$)	0.002169	0.002007	0.0002766	0.0004215	0.0006199	0.001833	0.001926	0.002064
Exp to US/ROW (Bil 92\$)	-0.00009537	-0.0002213	-0.0002689	-0.0002975	-0.0003147	-0.0004539	-0.0006371	-0.0005226
Exp - Multiregions (Bil 92\$)	0.00003052	0.00001001	-0.00004911	-0.0000515	-0.00004959	-0.00004911	-0.00008249	-0.00006294
Exog Prod (Bil 92\$)	0.003923	0.003781	0.0008853	0.001135	0.001403	0.003078	0.003504	0.003523
Output (Bil 92\$)	0.006023	0.005585	0.0008354	0.001205	0.001656	0.004395	0.004715	0.005005
Val-Add (Bil 92\$)	0.003227	0.003014	0.0005302	0.0007439	0.001019	0.002666	0.002884	0.003044
Wag & Sal Disb (Bil Nom \$)	0.003351	0.003588	0.001081	0.001194	0.001417	0.003456	0.004021	0.004314



50%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Primary:Employment Table (Thous) - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Manufacturing	0.001923	0.002052	-0.0007477	-0.0006943	-0.0005569	0.00005341	-0.00009155	0.0005798
Manuf As % of US	0.00001028	0.00001103	-0.00000405	-0.00000375	-0.000003	0.0000003	-0.0000005	0.00000321
Durables	0.001255	0.001347	-0.00106	-0.001045	-0.0009537	-0.0005646	-0.0006409	0.00000762
Non-Durables	0.0006704	0.000701	0.0003185	0.000351	0.0003948	0.000618	0.0005493	0.0005722
Non-Manufact	0.07455	0.073	0.02151	0.02869	0.0368	0.08447	0.09113	0.09125
Non-Manuf As % of US	0.00006089	0.00005856	0.00001702	0.00002241	0.00002831	0.00006193	0.00006446	0.00006297
Mining	0.0000073	0.00000591	-0.00000102	-0.00000065	0.00000007	0.00000438	0.00000593	0.00000633
Construction	0.0273	0.02289	0.00001717	0.0002823	0.0006351	0.002592	0.002447	0.002216
Trans/Pub Util	0.001022	0.0009003	0.000248	0.0005856	0.0009861	0.003334	0.003763	0.003839
Fin/Ins/Real Est	0.001434	0.001007	-0.0001297	-0.00004578	0.00007629	0.0005722	0.0002518	0.0003662
Retail Trade	0.007965	0.007362	0.002411	0.004654	0.007172	0.02206	0.02451	0.02422
Wholesale Trade	0.001648	0.001488	0.00000381	0.000164	0.0003662	0.001507	0.001308	0.001213
Services	0.03496	0.03911	0.01895	0.02303	0.02751	0.05428	0.05865	0.05914
Agri/For/Fish Serv	0.0002279	0.0001941	0.00001335	0.00002527	0.00004101	0.0001402	0.0001421	0.0001559
Total Government	-0.001495	-0.0003815	0.0001144	0.0003738	0.0007782	0.003494	0.006256	0.007523
Total Govt As % of US	-0.00000655	-0.00000166	0.00000047	0.0000015	0.0000033	0.00001419	0.00002477	0.00002924
State & Local	-0.001499	-0.0003777	0.0001144	0.0003738	0.0007782	0.003494	0.006252	0.007526
Federal Civilian	0	0	0	0	0	0	0	0
Federal Mil	0	0	0	0	0	0	0	0
Farm	0	0	0	0	0	0	0	0
Farm As % of US	0	0	0	0	0	0	0	0
Total Employment	0.07501	0.07465	0.02087	0.0285	0.03699	0.08801	0.09729	0.09924
Total Emp As % of US	0.00004497	0.00004417	0.00001222	0.00001651	0.00002119	0.00004834	0.00005189	0.00005198
Population	0.01202	0.02637	0.03204	0.03455	0.03906	0.07239	0.1083	0.1255
Pop As % of US	0.00000435	0.00000944	0.00001135	0.00001216	0.00001365	0.00002429	0.00003484	0.0000388



50%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Primary:Personal Income Table (Bil Nom \$) - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Wag & Sal Disbur	0.003391	0.00371	0.001173	0.001289	0.001534	0.003784	0.004547	0.004967
Propr & Other Lab Inc	0.0007725	0.0007582	0.0001578	0.0002189	0.0002928	0.0008202	0.00107	0.001292
Tot Lab & Propr Inc	0.004162	0.004469	0.001329	0.001507	0.001827	0.004601	0.005619	0.00626
Tot Lab & Propr Inc As % of US	0.00007111	0.00007331	0.00002098	0.00002283	0.00002664	0.00005546	0.00005665	0.00005323
Soc Ins Contrib	0.0002613	0.0002862	0.0000906	0.00009966	0.0001187	0.0002942	0.0003543	0.0003879
Net Resid Adj	-0.001087	-0.001161	-0.00036	-0.0004115	-0.0004964	-0.001214	-0.001482	-0.001652
Div/Int/Rent	0.00004721	0.0001063	0.0001354	0.0001512	0.0001779	0.0003877	0.000658	0.0008602
Transf Paym	-0.0001512	-0.00009346	0.00008631	0.00007629	0.00007439	0.00009537	0.0003209	0.0004988
Personal Income	0.002708	0.003036	0.001099	0.001221	0.001461	0.003574	0.004761	0.005585
Pers Inc As % of US	0.00003371	0.00003618	0.00001258	0.00001344	0.00001547	0.00003117	0.0000346	0.00003418
Taxes	0.0006599	0.0007153	0.0002294	0.0002575	0.0003104	0.0007563	0.0009394	0.001054
Dispos Pers Inc	0.002048	0.002321	0.0008698	0.0009632	0.00115	0.002815	0.003822	0.004532
PCE-Price Index 92\$	0.002106	0.002899	0.001801	0.001587	0.001633	0.002991	0.003189	0.002594
Real Disp Pers Inc (Bil 92\$)	0.001245	0.001297	0.0003662	0.000452	0.0005608	0.001328	0.001696	0.001925
Real Disp Pers Inc As % of US	0.00002193	0.00002232	0.00000616	0.00000742	0.000009	0.00001967	0.00002325	0.00002468
Real Disp Pers Inc Per Cap (Thous 92\$)	0.001163	0.0007973	-0.0005112	-0.0004978	-0.0005207	-0.000761	-0.001595	-0.001945
Manuf Labor & Prop Inc	0.0002131	0.0002613	0.00004292	0.00002384	0.00002527	0.0001454	0.0001373	0.0001421
Dur Lab & Prop Inc	0.0001657	0.0002046	0.00001335	-0.00000381	-0.00000429	0.00008917	0.00008059	0.00008965
Non-Dur Lab & Prop Inc	0.00004733	0.0000571	0.00002956	0.00002789	0.00002944	0.00005662	0.00005674	0.00005269
Non-Manuf Lab & Prop Inc	0.003923	0.004087	0.001194	0.001385	0.00168	0.004091	0.004868	0.005344
Mining Lab & Prop Inc	0.00000032	0.00000031	0.00000002	0.00000002	0	0.00000026	0.00000035	0.00000039
Const Lab & Prop Inc	0.001346	0.001198	0.00005949	0.00006354	0.00007677	0.0002104	0.0002253	0.0002236
Trans/Pub Util Lab & Prop Inc	0.00008082	0.00008965	0.00003564	0.00004411	0.0000608	0.0002036	0.0002511	0.0002706
Fin/Ins/Real Est Lab & Prop Inc	0.0001678	0.0001988	0.00007868	0.00005913	0.00005913	0.0001655	0.0001402	0.00007439
Ret Trade Lab & Prop Inc	0.000212	0.0002239	0.00008702	0.0001245	0.0001774	0.0005901	0.0007391	0.0008056
Wholes Trade Lab & Prop Inc	0.0001285	0.0001423	0.00003767	0.00003839	0.00004864	0.0001676	0.00017	0.0001435
Servic Lab & Prop Inc	0.001982	0.002228	0.0008955	0.001055	0.001256	0.002746	0.003336	0.00382
Agri/For/Fish Serv Lab & Prop Inc	0.00000631	0.00000654	0.00000181	0.00000172	0.00000201	0.00000624	0.00000709	0.00000694
Total Govt Lab & Prop Inc	0.00002718	0.0001202	0.00009251	0.0001001	0.0001216	0.0003676	0.0006104	0.0007696
State & Local Lab & Prop Inc	0.00001621	0.0001028	0.00008392	0.00009298	0.0001178	0.000355	0.0005994	0.0007586
Fed Civil Lab & Prop Inc	0.00001204	0.0000152	0.00000733	0.00000631	0.00000631	0.00001377	0.00001335	0.00000864
Fed Mil Lab & Prop Inc	0	0	0	0	0	0	0	0
Farm Lab & Prop Inc	0	0	0	0	0	0	0	0



NBMAA

50%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Primary:GRP By Final Demand Table (Bil 92\$) - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Total GRP	0.003166	0.002998	0.0005302	0.0007629	0.001057	0.002819	0.003151	0.003376
Total Consump	0.001009	0.001015	0.0002346	0.0003014	0.0003891	0.0009556	0.001163	0.001341
Vehicles and Parts	0.00006169	0.00005883	0.000009	0.00001192	0.00001562	0.00003862	0.00003815	0.00003862
Furn & Hsehld Eq	0.0001116	0.0001209	0.00002193	0.00003123	0.00004387	0.0001447	0.0001712	0.0001912
Other Durables	0.00004205	0.00003985	0.0000053	0.000007	0.00001016	0.00002623	0.00002593	0.00002712
Food & Beverages	0.0002143	0.0002027	0.00002813	0.0000391	0.00005221	0.0001323	0.0001318	0.0001364
Clothing & Shoes	0.00009596	0.00009167	0.00001347	0.00001824	0.00002432	0.0000633	0.00006425	0.00006711
Gasoline & Oil	0.00002676	0.0000245	0.00000196	0.00000399	0.0000059	0.00001669	0.00001672	0.00001821
Fuel Oil & Coal	0.0000063	0.00000563	0.00000045	0.00000083	0.00000123	0.0000029	0.00000249	0.0000024
Oth Non-Durbls	0.00003695	0.00005376	0.00004232	0.00004554	0.00005221	0.00009882	0.0001394	0.0001588
Housing	0.00007439	0.0001061	0.00008535	0.00009489	0.0001125	0.0002258	0.0003211	0.0003672
Hsehld Operat	0.00007945	0.00007325	0.00000613	0.00001132	0.00001824	0.00005436	0.00005686	0.00006223
Transportation	0.00005609	0.00005096	0.00000417	0.00000816	0.00001222	0.00003242	0.00003165	0.00003397
Medical Care	0.00001192	0.00001645	0.00000977	0.000009	0.00001097	0.00002599	0.00006866	0.0001333
Other Services	0.0001898	0.0001695	0.00000619	0.00001764	0.00002885	0.00009465	0.00009298	0.0001023
Total Fixed Invest	0.0008669	0.0008006	0.0001187	0.0002584	0.0004334	0.001622	0.001577	0.001387
Residential	0.0003106	0.0002813	0.00001645	0.00003523	0.00005788	0.0001793	0.0001624	0.0001421
Non-Residential	0.00009811	0.00008893	0.00001705	0.00003636	0.00005972	0.0002059	0.0001848	0.0001523
Produc Dur Equip	0.0004582	0.0004306	0.00008535	0.0001872	0.0003159	0.001237	0.00123	0.001093
CBI net IVA+MISC	0.00000348	0.00000287	-0.00000172	-0.00000104	-0	-0.00000109	-0.00000225	-0.00000213
GRPVA-GRPFD	0	0	0	0	0	0	0	0
Total Government	-0.0001006	-0.00004101	-0.00001407	0.00000143	0.0000248	0.0001884	0.0003695	0.0004687
Federal Mil	0	0	0	0	0	0	0	0
Federal Civilian	0	0	0	0	0	0	0	0
State & Local	-0.0001006	-0.00004101	-0.00001407	0.00000143	0.0000248	0.0001884	0.0003693	0.0004687
Total Exports + Exogenous	0.003788	0.003548	0.0006256	0.0008392	0.001102	0.002617	0.002846	0.00301
Exogenous	0.003923	0.003781	0.0008853	0.001135	0.001403	0.003078	0.003504	0.003523
Endogenous Exports	-0.0001335	-0.0002327	-0.0002594	-0.0002975	-0.0003014	-0.0004616	-0.0006561	-0.0005112
Total Imports	0.002401	0.002327	0.0004311	0.0006332	0.0008926	0.002562	0.0028	0.002827
Tot GRP by Val-Add	0.003166	0.002998	0.0005302	0.0007629	0.001057	0.002819	0.003151	0.003376
Tot Priv Non-Farm Val-Add	0.003227	0.003014	0.0005264	0.0007477	0.001026	0.002674	0.002884	0.00304
Tot Govt Compens	-0.00005937	-0.00001502	0.0000045	0.00001478	0.00003147	0.000145	0.0002687	0.000335
Tot Farm Val-Add	0	0	0	0	0	0	0	0



NBMAA 50%net new with amenities - Differences as Compared to REMI Standard Reg Control Hartford County

Total:Population Model Summary - REMI Standard Reg Control

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Last Year POP (w/o Mil,Dep,Spec)	0	0.01208	0.02625	0.03204	0.03467	0.06476	0.1036	0.1235
Total Deaths	0	0.00001526	0.00003338	0.00004292	0.00004864	0.00009537	0.0001659	0.000227
Male Deaths	0	0.00001025	0.0000236	0.00003004	0.00003362	0.00006604	0.0001123	0.0001497
Female Deaths	0	0.000005	0.00000977	0.00001287	0.00001454	0.00002933	0.00005388	0.00007749
Total Births	0	0.0002584	0.0005598	0.0006695	0.0007067	0.001177	0.001729	0.001886
Male Births	0	0.0001316	0.0002851	0.0003414	0.0003605	0.0005999	0.0008812	0.0009618
Female Births	0	0.0001264	0.0002747	0.0003276	0.0003462	0.000576	0.0008473	0.0009246
This Year Population B4 MIGS	0	0.01227	0.02679	0.03259	0.03528	0.06592	0.1051	0.1251
Male Pop B4 MIGS	0	0.006287	0.01373	0.01678	0.01813	0.03366	0.05374	0.06384
Fem Pop B4 MIGS	0	0.005951	0.01309	0.01581	0.01715	0.03226	0.05136	0.06128
Pop und 65 B4 MIGS	0	0.01215	0.02679	0.03253	0.03497	0.065	0.1031	0.1213
Pop 65 & Over B4 MIGS	0	0.00003052	0.00007629	0.0001678	0.0002518	0.0009003	0.00206	0.003693
Total Migrants	0.01188	0.01389	0.005081	0.002067	0.003715	0.007065	0.00369	0.0008361
Under 65	0.01188	0.01389	0.005082	0.002068	0.003717	0.007071	0.003705	0.000864
Econ Migrants	0.01188	0.01389	0.005084	0.00207	0.003718	0.007074	0.003707	0.0008643
Int'l Migrants	0	0	0	0	0	0	0	0
Chng in Mil & Deps	0	-0.00000139	-0.00000232	-0.00000195	-0.00000111	-0.00000336	-0.0000018	0.00000028
Male Migrants	0.006117	0.007149	0.002616	0.001065	0.001914	0.00364	0.001908	0.0004449
Female Migrants	0.005765	0.006738	0.002466	0.001003	0.001803	0.003431	0.001798	0.0004191
65 & Over	0	-0.0000011	-0.0000006	-0.00000107	-0.00000166	-0.00000637	-0.00001538	-0.00002778
Ret Male Migs	0	-0.0000011	-0.00000035	-0.00000056	-0.00000089	-0.000003	-0.000007	-0.00001389
Ret Fem Migs	0	-0	-0.00000023	-0.00000053	-0.00000083	-0.00000327	-0.00000768	-0.00001401
Total Mig Dths	0.00000895	0.00001044	0.000003	0.00000152	0.00000275	0.00000495	0.00000232	0.00000022
Male Mig Dths	0.00000616	0.0000072	0.00000263	0.00000106	0.00000192	0.00000346	0.00000164	0.0000002
Female Mig Dths	0.00000279	0.00000323	0.00000116	0.00000046	0.0000083	0.00000148	0.00000067	0.0000001
Total Mig Brths	0.0001231	0.0001442	0.00005289	0.00002159	0.00003882	0.00007439	0.00003926	0.0000091
Male Mig Brths	0.00006279	0.00007352	0.00002698	0.00001101	0.0000198	0.00003794	0.00002002	0.0000046
Female Mig Brths	0.00006032	0.00007064	0.00002592	0.00001058	0.00001902	0.00003645	0.00001924	0.00000445
Census Undercnt	0	0	0	0	0	0	0	0
Under 65	0	0	0	0	0	0	0	0
65 & Over	0	0	0	0	0	0	0	0
POP (w/o Mil,Dep,Spec) B4 Mult	0.01202	0.02625	0.03198	0.03467	0.03918	0.07288	0.109	0.126
Mult Adjust	0	0	0	0	0	0	0	0
POP (w/o Mil,Dep,Spec) With Mult	0.01202	0.02625	0.03198	0.03467	0.03918	0.07294	0.109	0.126
Total Mil & Deps	0	0	0	0	0	0	0	0
Total Spec Pop	0	0.00008106	-0.00001526	-0.00004196	-0.00008488	-0.0005665	-0.0007515	-0.000433
Total Population	0.01208	0.02637	0.03198	0.03448	0.03912	0.07251	0.1082	0.1257



NBMAA 50%net new with amenities - [Top] - Differences as Compared to REMI Standard Reg Control Connecticut

Variable	2001	2002	2003	2004	2005	2010	2015	2020
Employment (Thous)	0.08057	0.07983	0.01563	0.02441	0.03394	0.09058	0.1001	0.1028
GRP (Bil 92\$)	0.003403	0.003242	0.0003128	0.0005722	0.0009155	0.003006	0.003372	0.003632
Pers Inc (Bil Nom \$)	0.003799	0.004227	0.001266	0.001389	0.001724	0.004761	0.006226	0.007355
PCE-Price Index 92\$	0.0006866	0.000885	0.000473	0.0003967	0.0003815	0.0008698	0.0008698	0.0007172
Real Disp Pers Inc (Bil 92\$)	0.001808	0.001907	0.0004501	0.0005646	0.0007248	0.001869	0.002357	0.002625
Population (Thous)	0.01758	0.03809	0.04297	0.04346	0.04663	0.08643	0.1292	0.1462
Econ Migrants	0.01721	0.02012	0.00385	-0.0004821	0.003203	0.008965	0.003791	0.0007687
Total Migrants	0.01722	0.02012	0.003847	-0.0004871	0.003199	0.008955	0.003774	0.0007391
Labor Force	0.01709	0.03113	0.02856	0.02686	0.02832	0.05273	0.07544	0.08228
Demand (Bil 92\$)	0.005463	0.005157	-0.000885	0.001678	0.000824	0.005524	0.005707	0.005676
Output (Bil 92\$)	0.006775	0.006287	0.0006866	0.001114	0.001709	0.004959	0.005234	0.005585
Rel Prod Manuf	0	0	0	0	0	0	0	0
Rel Prof Manuf	-0.00000494	-0.00000691	-0.00000339	-0.00000244	-0.00000202	-0.00000339	-0.0000025	-0.00000065
Labor Intensity	-0	-0.00000023	-0.00000023	-0.0000003	-0.00000041	-0.00000071	-0.00000119	-0.00000107
Mult Adjustment	0	0	0	0	0	0	0	0
Indust Mix Index	-0.00000762	-0.00000667	0.00002575	0.0000267	0.0000267	0.0000267	0.00001431	0.00001049
Reg Pur Coeff (SS/Dem)	-0	-0.0000003	0.00000393	-0.00000274	0.00000143	-0.00000226	-0.00000202	-0.00000077
Imports (Bil 92\$)	0.002441	0.002335	-0.001068	0.001266	0.0001144	0.002953	0.003036	0.0028
Self Supply (Bil 92\$)	0.003059	0.002831	0.0002136	0.0004349	0.0007401	0.002579	0.002655	0.002884
Exports US/ROW (Bil 92\$)	-0.0001144	-0.0002594	-0.0003357	-0.0003586	-0.000351	-0.0005035	-0.0007401	-0.0006256
Exports - MR (Bil 92\$)	0	0	0	0	0	0	0	0
Exog Prod (Bil 92\$)	0.003874	0.003732	0.0008235	0.001059	0.001312	0.002893	0.003299	0.003322
Wage Rate (Thous Nom\$)	0.0003242	0.0004501	0.0001411	0.00001907	-0.00007629	-0.0003281	-0.0005684	-0.0008774

