dayton development coalition

2012

# DAYTON REGION COMPREHENSIVE ECONOMIC DEVELOPMENT STRATEGY



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# DECEMBER, 2012

Private and public stakeholders in the Dayton Region, the 14-county area anchored by the Cities of Dayton and Springfield, Ohio, have developed this Regional Comprehensive Economic Development Strategy (CEDS) to provide a framework for collective efforts for economic transformation and job creation throughout the region.

The Dayton Region, as defined by the Dayton Development Coalition, includes all or part of 14 counties in Southwest Ohio: Auglaize, Butler, Champaign, Clark, Clinton, Darke, Fayette, Greene, Mercer, Miami, Montgomery, Preble, Shelby, and Warren. Butler and Warren are divided between Dayton and Cincinnati along state highway 63. Central to the Dayton Region is the Dayton MSA consisting of Montgomery, Greene, Miami and Preble Counties.

The Dayton Region has experienced a continuous economic downturn for more than a decade, losing jobs each year during the period 2001 to 2011. In particular, employment levels in manufacturing have fallen dramatically throughout this period with job losses accounting for 32% of the manufacturing workforce. The automobile sector was particularly impacted by the closing of Delphi Automotive and the General Motors Co. operations in the Dayton Region. On an aggregate basis, more than 50,000 jobs have been lost during this period, a 6% reduction in total employment in the Region.

While the trends of the past decade have been difficult for the Dayton Region, there is wide-spread optimism in the community about the Region's future. The Defense and Aerospace Sector is robust, with immediate opportunities to evolve its historical R&D strengths into job creation in the aerospace technology market, particularly in the emerging unmanned aircraft systems (UAS) industry. The Region is united in a common vision about its future direction and regional strategies are in place to spur transformation and cluster development.

This Comprehensive Economic Development Strategy is based on wide agreement among Regional partners that strategies address a comprehensive list of desired outcomes:

- Expanding the awareness of our aerospace and defense initiatives to attract high technology innovators and capture emerging industry clusters;
- Supporting commercialization and job creation efforts in leading industries;
- Maximizing the effectiveness of business recruitment efforts in the Region with an emphasis on technology growth sectors;
- Protecting and retaining the competitive strengths of the Region's manufacturing sector;
- Supporting efforts to ensure that our core urban areas are exciting and attractive showcases for the vitality of the Region; and
- Supporting the development of new markets, customers, technology, and labor skills.

These desired outcomes have resulted in focused strategies to spur investment in four industry clusters in which the Dayton Region has the greatest immediate potential for substantial job growth and a return to a robust and expanding regional economy. These four "technology generator" industries underpin the Dayton Region Comprehensive Economic Development Strategy and implementation plan:

- Aerospace Systems
- Advanced Materials & Advanced Manufacturing
- Information Technology & Advanced Data Management
- Human Sciences and Healthcare

The Goals and Objectives within the Comprehensive Economic Development Strategy have been developed to leverage the Region's leadership, assets and resources in order to transform our legacy industries, increase opportunities throughout the Region for growth, develop world class talent and make the Dayton Region a destination known for its heritage, vitality and job creation.

Private and public stakeholders in the Dayton Region, the 14-county area anchored by the Cities of Dayton and Springfield, Ohio, have developed this Regional Comprehensive Economic Development Strategy (CEDS) to provide a framework for collective efforts for economic transformation and job creation throughout the region.

The Dayton Development Coalition ("DDC" or "Coalition") along with Development Projects, Inc., sister organization and public contracting affiliate of the Coalition, serve as the CEDS Planning Organization. The Coalition is the regional economic development organization whose mission is to support job creation and prosperity for the citizens of the 14-county Dayton, Ohio region. Working as a public/private partnership, recognition of the Coalition's leadership role is evidenced by the wide support of its members in the 14 counties of the Region, including 30 municipalities, counties, and other units of government, more than 250 private corporations and community non-profit organizations, and 14 universities and colleges.

The 2012 Board of Trustees of the Coalition and its Executive Committee are identified below. The administration of the CEDS is detailed in later sections of this document.

#### Executive Committee:

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### 1.1 POPULATION

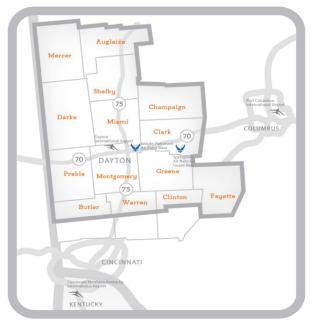


Figure 1. Map of Dayton Region

The greater Dayton Region is largely identified by the media market and the location perceptions of its residents. Within these 14 counties, the residents read the Dayton newspaper, listen to Dayton TV and radio broadcasts, commute to the major employment areas and identify and participate with the arts and cultural offerings of the more-populated Dayton MSA core. Each of these counties is affiliated with the Dayton Development Coalition and engaged as a partner and collaborator in its economic development initiatives.

These counties represent a cross section of urban-core, urban, suburban and rural jurisdictions. The total population in the 14-county region is 1.8 million with the following demographics.<sup>1</sup>

The Dayton Region, as defined by the Coalition, includes all or part of 14 counties in Southwest Ohio: Auglaize, Butler, Champaign, Clark, Clinton, Darke, Fayette, Greene, Mercer, Miami, Montgomery, Preble, Shelby, and Warren. Butler and Warren are divided between Dayton and Cincinnati along state highway 63. Central to the Dayton Region is the Dayton MSA consisting of Montgomery, Greene, Miami and Preble Counties.

### **Figure 2. Regional Population**

	County & Cities >25K Pop	Population
	Montgomery	535,153
	Dayton	141,527
	Kettering	56,163
-	Huber Heights	38,101
SA	Riverside	25,201
Dayton MSA	Greene	161,573
yto	Beavercreek	45,193
Da	Fairborn	32,352
	Xenia	25,719
	Miami	102,506
	Troy	25,058
	Preble	42,270
	Auglaize	45,949
_	Butler	368,130
١SA	Middletown	51,605
le N	Champaign	40,097
e th	Clark	138,333
sid	Springfield	60,608
Out	Clinton	42,040
es (	Darke	52,959
nti	Fayette	29,030
Counties Outside the MSA	Mercer	40,814
Ŭ	Shelby	49,423
	Warren	212,693

Source: US Census Bureau Census 2010

<sup>&</sup>lt;sup>1</sup> US Census Bureau Census 2010

	Total Population	White	Black or African American	Asian	Some Other Race	American Indian or Alaska Native	Hawaiian/ Pacific Islander	Two or More races	Hispanic or Latino	Not Hispanic or Latino
Population	1,860,970	1,590,002	175,671	4,063	34,778	898	17,453	38,105	44,464	1,816,506
		85.4%	9.4%	1.9%	0.9%	0.2%	<0.1%	2.0%	2.4%	97.6%
Source: LIS Co	Source: US Consus Burgau Consus 2010									

#### **Figure 3. Dayton Region Demographics**

Source: US Census Bureau Census 2010

#### Figure 4. Dayton Region Distress Indicators SOURCE

	2010 Per	24 Month			Educational Atta	ainment (Ages 25+)		
	Capita Income <sup>1</sup>	Unemploy. Rate <sup>2</sup>	No HS Diploma	HS Diploma or GED	College, No Degree	Associate's Degree	Bachelor's Degree	Graduate Degree
Dayton Region	35,626	9.83%	11.70%	34.10%	22.10%	7.90%	14.90%	9.40%
USA	39,937	9.29%	14.70%	28.40%	21.30%	7.60%	17.60%	10.40%

Source: <sup>1</sup> Bureau of Economic Analysis; generated by STATS America

<sup>2</sup> Ohio Labor Market Information (Not Seasonally Adjusted data)

<sup>3</sup> US Census Bureau, 2008-2010, American Community Survey

Similar to general trends in the densely populated Midwest, the population in the Dayton Region is shifting from counties with urban centers to areas that are more suburban. While the 14-county region grew by 4.51% from 2000 to 2010, Montgomery County, the largest county in the Dayton Region, and anchored by the City of Dayton, lost nearly 25,000 residents between the 2000 and 2010 Censuses. Clark County, home to the City of Springfield, lost approximately 6,000 residents. Four rural counties also experienced population declines: Mercer, Darke, Auglaize, and Preble counties.

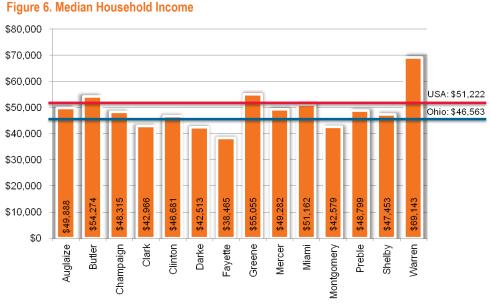
County	2000 U.S.	2010 U.S.
	Census	Census
Auglaize	46,611	45,949
Butler	332,807	368,130
Champaign	38,890	40,097
Clark	144,742	138,333
Clinton	40,543	42,040
Darke	53,309	52,959
Fayette	28,433	29,030
Greene	147,886	161,573
Mercer	40,924	40,814
Miami	98,868	102,506
Montgomery	559,062	535,153
Preble	42,337	42,270
Shelby	47,910	49,423
Warren	158,383	212,693
14 County Region	1,739,781	1,860,970

#### Figure 5. Dayton Region Population, 2000-2010

Source: US Census Bureau Census

# 1.2 DEMOGRAPHICS, INCOME, AND POVERTY

The population in the Dayton Region is predominantly older than the nation as a whole. The median age in eleven of fourteen Dayton Region counties exceeds 36.5, the national median age, and range from 36.7 years in Greene County to 40.6 years in Preble County. Only Butler County has a slightly lower median age (35.4 years old) than the U.S. average.<sup>2</sup>



Source: Bureau of Economic Analysis ; generated by STATS America

Median household income in the Dayton Region also lags below national statistics. Figure 6 shows the median household income levels for each of the counties in the Region in contrast to Ohio and U.S. statistics.

Eleven of fourteen counties have median household income below the national median. Montgomery County and Clark County, the two urban counties with the highest population loss over the previous decade, have the lowest median income, below both the U.S. and Ohio medians. Rural counties also lagged national levels, particularly Darke and Fayette Counties. Only Warren County, the county experiencing the greatest growth trends, significantly exceeds national median income levels.

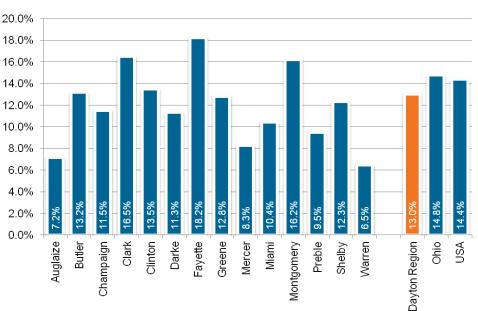
<sup>&</sup>lt;sup>2</sup> 2005-2009 American Community Survey

Other income measurements further illustrate the level of economic distress in the Dayton Region. Per capita income in the Dayton Region is only 89.21% of U.S. per capita income (Figure 7) and poverty is highly concentrated in the two urban

### Figure 7. Per Capita Income, Dayton Region vs. U.S

	Dayton Region	USA
2010 PCI	\$35,626	\$39,937
% of National	89.21%	100.00%

Source: US Census Bureau, 2008-2010, American Community Survey



### Figure 8. Poverty Rates in the Dayton Region

counties of Montgomery and Clark and rural Fayette County. These three counties, in which the poverty rate greatly exceeds both the State of Ohio and U.S. rates, represent more than 38% of the total population of the Dayton Region (Figure 8).

The Dayton Region has a higher percentage of the population who own their own homes. Compared to U.S. statistics, 69.1% of Dayton Region households own their home vs. 65.1% nationally (U.S. Census 2010). While this would usually be a positive and stabilizing influence, the current housing market crisis and job losses in the Region have resulted in extraordinarily high housing foreclosure rates. Butler, Montgomery and Preble counties are among the top 10 in Ohio for the most foreclosures per 1,000 residents according to Policy Matters Ohio, an Ohio-based nonprofit, nonpartisan policy research organization. <sup>3</sup> Property values in urban Greene County are down 5.63 percent from 2008. Montgomery County values have dropped about 7 percent overall, or \$1.96 billion across the county. Similar value reductions are occurring throughout the Region and Ohio.<sup>4</sup>

Source: US Census Bureau, 2008-2010, American Community Survey

<sup>&</sup>lt;sup>3</sup> Dayton Daily News, "Foreclosure Crisis Persists in Ohio", April 6, 2012

<sup>&</sup>lt;sup>4</sup> Dayton Daily News, "Greene County Home Values Fall 5.6%, September 5, 2011

The high foreclosure and associated vacancy rates have exacerbated economic conditions in the Dayton Region. Households have seen their net worth erode, mortgages are under water, which tends to escalate foreclosure and vacancy rates, and county and municipal revenues have been seriously impacted. There has been a corresponding impact on retail and commercial districts as neighborhoods have deteriorated.

# 1.3 DAYTON REGION ECONOMY AND EMPLOYMENT TRENDS

The Dayton Region has experienced a continuous economic downturn for more than a decade, losing jobs each year during the period 2001 to 2011. Employment levels in manufacturing have fallen dramatically throughout this period with job losses accounting for 32% of the manufacturing workforce. The automobile sector was particularly impacted by the closing of Delphi Automotive and the General Motors Co. operations in the Dayton Region. On an aggregate basis, more than 50,000 jobs have been lost during this period, a 6% reduction in total employment in the Region. Figure 9 provides a breakdown of the change in employment by industry sector within the 14-county Dayton Region.

NAICS Code	Description		2001 Jobs	2011 Jobs	Change	% Change
11	Agriculture, Forestry, Fishing and Hunting		3,651	3,047	(604)	(17%)
21	Mining, Quarrying, and Oil and Gas Extraction		682	514	(168)	(25%)
22	Utilities		2,415	1,778	(637)	(26%)
23	Construction		33,701	25,140	(8,561)	(25%)
31-33	Manufacturing		158,755	108,384	(50,371)	(32%)
42	Wholesale Trade		38,194	36,029	(2,165)	(6%)
44-45	Retail Trade		94,594	83,185	(11,409)	(12%)
48-49	Transportation and Warehousing		36,804	30,816	(5,988)	(16%)
51	Information		15,373	14,577	(796)	(5%)
52	Finance and Insurance		26,793	29,541	2,748	10%
53	Real Estate and Rental and Leasing		9,278	7,804	(1,474)	(16%)
54	Professional, Scientific, and Technical Services		30,801	31,445	644	2%
55	Management of Companies and Enterprises		6,676	9,426	2,750	41%
56	Administrative and Support and Waste Management and Remediation Services		44,028	39,188	(4,840)	(11%)
61	Educational Services		10,051	12,932	2,881	29%
62	Health Care and Social Assistance		82,175	102,789	20,614	25%
71	Arts, Entertainment, and Recreation		9,240	9,771	531	6%
72	Accommodation and Food Services		60,063	65,589	5,526	9%
81	Other Services (except Public Administration)		24,142	22,634	(1,508)	(6%)
90	Government		125,124	127,181	2,057	2%
		Total	812,540	761,768	-50772	-6%

Figure 9 Aggregate Employment and Percentage Change, 2007 to 2011, 14 county Dayton Region

Source: EMSI 2011.4 Covered Employment

In addition to job losses, the situation has been compounded by the relocation of major headquarter operations to other regions of the U.S. including Mead-Westvaco's move to Richmond, Virginia and NCR Corporation's relocation to Atlanta, Georgia. Both of these major employers were located in the City of Dayton. Their relocations have severely impacted the central downtown area of the City and have exacerbated commercial vacancy rates and employment in the regional core. According to research recently published by Reis Inc., a New York-based commercial real estate research company, metropolitan Dayton, which includes Greene, Miami, Montgomery and Preble counties, has the highest office vacancy

rate among the nation's metropolitan areas at 27.3%.<sup>5</sup> Bizjournals.com reports that Dayton also lost 1,800 financial sector jobs during the recession, down 9.6% and predominantly located in Dayton's central business district.<sup>6</sup> The City of Wilmington, within the Dayton Region, lost about 7,500 jobs with the 2009 closing of a facility of the package-delivery company DHL.<sup>7</sup>

The negative job growth has naturally resulted in significant unemployment rates across the region. The region's overall unemployment rate consistently ran about 1 percent above the national average<sup>8</sup> from 2007 through 2011. Some counties have been more affected than others. Montgomery County in particular, the home of Dayton and the urban core for the region, has been particularly heavily impacted. Other areas of high unemployment include Clark County, anchored by the City of Springfield, and Clinton County, impacted heavily by the 2009 shutdown of the DHL operation at Wilmington Air Park.

While first quarter 2011 unemployment statistics reflect some elements of recovery with the overall 14 county Dayton Region approaching the U.S.

Figure	10. U	nemplo	yment	Rate
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	2010	2011
	Unemployment	Unemployment
Dayton Region	10.20%	8.80%
	9.60%	8.90%
USA	9.00%	0.90%
County Breakdown		
Auglaize	9.1	7.4
Butler	9.3	8.6
Champaign	11.2	9.2
Clark	10.4	8.9
Clinton	16.3	13.1
Darke	10.6	8.7
Fayette	11.5	9.3
Greene	9.8	8.4
Mercer	7.3	5.9
Miami	10.5	8.7
Montgomery	11.1	9.4
Preble	10.8	9.9
Shelby	11.8	9.2
Warren	8.7	7.6
Source: Ohio I MI		

Source: Ohio LMI

rate, the results are not uniform in all counties and some decrease in the unemployment rate can be attributed to discouraged workers dropping out of the labor force, particularly in the urban core.

<sup>&</sup>lt;sup>5</sup> Dayton Daily News, "Dayton Leads U.S. in Vacant Offices, Report Says", April 16, 2012

<sup>&</sup>lt;sup>6</sup> Bizjournals.com, "Dayton Ranks No. 50 for Financial Job Losses", April 25, 2012.

<sup>&</sup>lt;sup>7</sup> "Thousands of layoffs by DHL, ABX Air hit Wilmington, Ohio: USA Today, December 19, 2008

<sup>&</sup>lt;sup>8</sup> Sources: U.S. Bureaus of Census, Labor Statistics, and Economic Analysis; generated by STATS America

### 1.4 DAYTON REGION WORKFORCE

Despite the negative trends in the last decade, the Dayton Region continues to be competitive in manufacturing, having a concentration 20% higher than the national average in manufacturing employment and even higher concentrations in growing sectors such as aerospace parts manufacturing.

Although overall the Dayton Region lost jobs, it gained some high-skilled jobs while losing low-skilled ones. A study conducted by the Dayton Development Coalition and Wright State University, "Technology Generators in the Dayton Region, Leveraging Regional Assets for Economic Recovery," indicates that this trend is expected to continue, and that occupational projections for the Region show an increasing percentage of the future workforce will require some kind of postsecondary education. Innovations in technology have made the manufacturing industry much less dependent on low and semi-skilled workers as processes become automated, remotely controlled, and robotically assembled. While productivity in the industry remains high and fewer jobs are available for low-skilled workers, high-skilled workers are in demand.

Most of the Dayton Region's workforce can no longer earn a high wage without postsecondary education and training. The primary recommendation from the study is the need to transform the Region's workforce. Transforming the culture into one that values higher education is imperative for secondary students as well as the adult workforce.

# 1.5 EDUCATION

Transforming the workforce will require an understanding of the job growth potential of the Region and alignment of academic programs to employers' needs. The Dayton Region is home to more than 27 higher education institutions producing graduates with associate degrees and above. In 2010, 16,548 students in the Dayton Region completed a program of study ranging from an associate's degree to a doctoral degree as detailed in Figure 11 below.

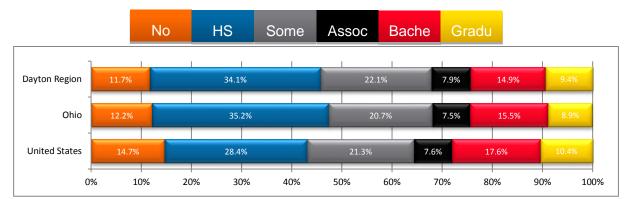
#### Figure 11. Dayton Region Institutions of Higher Learning, Enrollment and Graduates

	County	Fall 2010 Enrollment	Associate's Degrees	Bachelor's Degrees	Advanced Degrees
Air Force Institute of Technology	Greene	812	0	0	312
Antioch College*	Greene	_	_	_	—
Antioch University PhD Program in Leadership and Change	Greene	145	0	0	13
Cedarville University	Greene	3,205	0	629	8
Central State University	Greene	2,288	0	212	2
Clark State Community College	Clark	4,798	288	0	0
Edison State Community College	Miami	3,559	275	0	0
International College of Broadcasting	Montgomery	98	52	0	0
ITT Technical Institute-Dayton	Montgomery	534	135	0	0
Kaplan College	Montgomery	757	159	0	0
Kettering College of Medical Arts	Montgomery	917	152	47	19
Miami University-Oxford	Butler	17,472	333	3,709	579
Miami-Jacobs Career College	Montgomery	451	61	0	0
Miami-Jacobs Career College- Springboro Branch	Warren	300	68	0	0
Miami-Jacobs Career College-Troy	Miami	550	108	0	0
National College-Dayton	Montgomery	371	111	0	0
Payne Theological Seminary	Greene	142	0	0	16
Sinclair Community College	Montgomery	21,994	1,683	0	0
Southwestern College	Montgomery	413	43	0	0
United Theological Seminary	Montgomery	360	0	0	65
University of Dayton	Montgomery	11,199	0	1,613	978
Urbana University	Champaign	1,359	40	202	48
Wilberforce University	Greene	689	0	173	6
Wilmington College	Clinton	1,416	0	288	13
Wittenberg University	Clark	1,909	0	434	1
Wright State University– Lake Campus	Mercer	1490	45	45	0
Wright State University-Main Campus	Greene	18,447	0	2,180	1,403

Source: State of Ohio Board of Regents, Integrated Postsecondary Education Data System

### 1.0 INTRODUCTION AND DAYTON REGION BACKGROUND

Figure 12 shows the educational attainment of the Dayton Region. Regionally, a higher proportion of residents have completed high school and attained some college experience through an associate's degree compared to the U.S. The Dayton Region, however, lags the nation in the concentration of bachelor and graduate degree holders. The traditional manufacturing sector that has dominated the Region over the past century allowed multiple generations to gain high-wage employment without advanced educational attainment. That will not be the situation going forward. Transformation of the Dayton Region to a technology-driven economy will require a workforce that has the requisite knowledge and skills to respond to new opportunities in the workforce, particularly in STEM disciplines. Educational attainment must be the cornerstone for transformation.<sup>9</sup>



#### Figure 12. Educational Attainment, Dayton Region, State of Ohio and U.S.

Source: US Census Bureau, 2008-2010, American Community Survey

<sup>&</sup>lt;sup>9</sup> Dayton Development Coalition and Wright State University, "*Technology Generators in the Dayton Region*", 2012.

### 1.6 **REGIONAL TRANSPORTATION AND INFRASTRUCTURE**

The Dayton Region sits at the intersection of Interstate Highways I-70 and I-75, giving it access to one of the most highly traveled highway intersections in the United States. Within 600 miles of this intersection is 53% of the U.S. population (164 million people), 27 metropolitan areas with over 1 million people, and 323 of the Fortune 500 headquarters. In addition, 2 of Canada's four largest metropolitan areas (Toronto and Ottawa) are within this 600 mile radius.

Dayton International Airport (DAY) is served by 14 commercial airlines, FedEx®, and Aviation Sales, a full service Fixed Base Operator (FBO). DAY provides easy, direct access to markets and customers across North America. It serves the Region as the gateway to the United States' top 90-minute air market for passenger and freight.

Two U.S. Class I rail companies (CSX Transportation and Norfolk Southern) operate in the area. CSXT owns and operates a north-south line while Norfolk Southern owns and operates a northeast-southwest line within the Region. In addition, two regional carriers, R.J. Corman and Rail America provide rail service within the Region. These rail lines reach all fourteen counties with over 500 miles of track throughout the Region. The closest rail intermodal terminal is located 50 miles from the Dayton Region in Queensgate, Cincinnati.

The Dayton Region hosts over 150 truck freight terminals and supporting infrastructure with over 106,000 daily truck movements. In the Dayton Region, areas with significant trucking, warehouses and distribution enterprises are found generally along the freeway corridors, specifically along the entire length of the I-75 corridor through the Region, which has the greatest concentration of industrial zoning. The other major corridors with significant freight-related establishments include I-70, I-675 in Montgomery County, SR 4 and US 35 in Greene County, and I-71 through Clinton and Fayette Counties.

These regional transportation assets have increased the competitiveness of the Dayton Region as the location of choice for large distribution centers. More than 1,800 jobs have been created in the last four years including major distribution operations by 31 Gifts, Abbott Labs, Carter Logistics, Caterpillar Logistics, Fed Ex, Payless Shoes, Syncreon, and White Castle. The potential for additional warehouse and distribution growth has prompted the Cities of Dayton, Vandalia, Tipp City, and Montgomery and Miami Counties to begin discussion about banding together to establish a Transportation Improvement District for the I-70 and I-75 area to spur additional development.

As the economy improves and construction increases, the supply of "shovel ready" sites may constrain development opportunities and will require additional public and private infrastructure investment along the highway corridor to maintain momentum.

### 1.7 AEROSPACE AND DEFENSE SECTOR

While the trends of the past decade have been particularly difficult for the Dayton Region, an analysis of current conditions must also recognize the robustness of the aerospace and defense sectors and the transformational role it is playing in Dayton's future.

The Dayton Region plays a dominant role in the aerospace industry and is at the center of new aerospace technology development, commercialization and manufacturing scale up for volume production of new materials. Central to the Region's future is the presence of Wright-Patterson Air Force Base (WPAFB), the largest single site employer in the State of Ohio with more than 27,000 direct employees and an additional 32,000 indirect jobs supporting its missions<sup>10</sup>. The annual payroll for these jobs is estimated at \$3.4 billion a year with an additional \$1.1 billion in annual expenditures for services, materials, equipment and supplies and \$600,000 in retiree disbursements. The 2010 WPAFB Economic Impact Analysis indicates a total economic impact in the Dayton Region of \$4.5 billion annually.

The Air Force Research Laboratory (AFRL) headquarters is located at WPAFB, as are five of its research directorates: Propulsion, Human Effectiveness, Sensors, Air Vehicles, and Materials. More than \$1.6 billion in R&D research is led from WPAFB by AFRL. All of these directorates are critical to the advancement of the aerospace industry, and drive the focus and the dollars required for new technology development. The Lifecycle Management Complex (LCMC) located at WPAFB designs, develops and delivers dominant aerospace weapon systems and capabilities for the U.S. Air Force, other U.S. military, and allied and coalition-partner war fighters, in support of Air Force leadership priorities, including the procurement of unmanned aerial vehicles (UAV). LCMC manages more than 400 Air Force, joint and international aircraft acquisition programs and related projects and executes an annual budget of \$23 billion.

The National Air and Space Intelligence Center (NASIC) is also located at WPAFB. NASIC's mission is to create predictive intelligence to ensure the nation is at the cutting edge of understanding foreign threats to U.S. air and space operations. NASIC is the national expert on threats that span air, space and cyberspace domains and is a recognized innovator in information and data exploitation. The Center's world-class connectivity ensures analysts have physical access to key mission data and partnerships throughout the intelligence community. NASIC is a primary recipient and analyst of UAS Intelligence, Surveillance and Reconnaissance (ISR) data.

Despite the challenges that the community has faced over the past decade, there is wide-spread optimism in the community about the Region's future:

 The Defense and Aerospace Sector is robust, with immediate opportunities to evolve its historical R&D strengths into job creation in the aerospace technology market, particularly in the emerging unmanned aircraft systems industry; and

<sup>&</sup>lt;sup>10</sup> Wright-Patterson Air Force Base 88<sup>th</sup> Air Base Wing, *Economic Impact Analysis, 2010* 

• The Region is united in a common vision about its future direction and regional strategies are in place to spur transformation and cluster development.

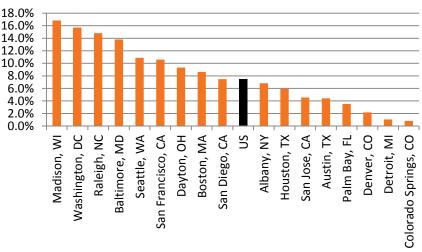
The institutional infrastructure is in place and highly functioning, with academia, government, the non-profit sector and private industry leadership focused on transformational efforts toward a rebirth of innovation and job creation in the Dayton Region. The foundation for the Dayton Region Comprehensive Economic Development Strategy is a recognition of substantial opportunities for growth. The Region's strengths in manufacturing and aerospace technology lead to focused regional economic development strategies aimed at cluster development in emerging technology markets, revitalization of the urban core, and increased employment opportunities and quality of life throughout the Region.

The last decade has been a difficult one for the Region as employment in mature industries declined and new technologies replaced familiar products and services. Nevertheless, the decade also brought to the Dayton Region great opportunities for technological innovation, emerging industry growth and job creation. Success requires that the Region leverage its assets and leadership to drive the regional economy and that it align its culture, workforce, and investment priorities to ensure future growth and prosperity. To this end, the Coalition and its regional partners are collaboratively executing a number of strategies to accomplish these goals:

- Expanding the awareness of our aerospace and defense initiatives to attract high technology innovators and capture emerging industry clusters;
- Supporting commercialization and job creation efforts in leading industries;
- Maximizing the effectiveness of business recruitment efforts in the Region with an emphasis on technology growth sectors;
- Protecting and retaining the competitive strengths of the Region's manufacturing sector and Supporting efforts to ensure that our core urban areas are exciting and attractive showcases for the vitality of the Region; and
- Supporting the development of new markets, customers, technology, and labor skills.

### 2.1 TECHNOLOGY GENERATORS AND THE DAYTON REGION

The recent study by the Dayton Development and Wright State University "*Technology Generators and the Dayton Region*"<sup>11</sup>, provides a clear indication of the Dayton Region's potential for economic transformation and job creation in technology dominant industries. Applying criteria developed by the State Science and Technology Institute for identification of technology generating<sup>12</sup> industries ( the percentage of workforce within the industry that is made up of scientists and engineers and the percentage of corporate investment that is spent on research and development) and adding the R&D industry, 17 regions in the U.S. were found to have strong technology generator industries, evidenced by location quotients (LQ) of 1.25 or higher and statistical forecasts of economic growth within the next five years. (The LQ measures industry concentration with 1.0 being the national average and 1.25 meaning that a region has a 25% higher industry concentration than the national average.)



#### Figure 14. Projected Growth. Technology Generator Industries

Projected % Change in Technology Generator Industries, 2011-2016

Source: EMSI Covered Employment, 2011-2016

The study further provides a Dayton projected growth rate from 2011 to 2016 at 9 percent for a total of 9,000 high-skill, high-wage jobs. Figure 13 reflects the Dayton Region's competitive position compared to the other 17 identified growth regions. Only nine regions, including the Dayton Region, are projected to grow at a rate greater than the U.S. projection (Figure 13), and only two, Dayton and Madison, Wisconsin, are Midwestern "rust belt" regions.

<sup>&</sup>lt;sup>11</sup> Dayton Development Coalition and Wright State University, "Technology Generators in the Dayton Region", 2012. <sup>12</sup> http://www.ssti.org/Publications/Onlinepubs/NAICS\_Tech 1.pdf

Figure 13. Technology Generator Growth Regions									
MSA	2011 Jobs	2016 Jobs	Change	% Change	2011 LQ	2016 LQ			
Madison, WI	19,351	22,605	3,254	17%	1.45	1.62			
Washington, DC	303,012	350,462	47,450	16%	2.56	2.70			
Raleigh, NC	37,791	43,383	5,592	15%	1.86	1.90			
Baltimore, MD	80,996	92,177	11,181	14%	1.58	1.67			
Seattle, WA	137,145	152,067	14,922	11%	2.02	2.11			
San Francisco, CA	176,425	195,132	18,707	11%	2.11	2.20			
Dayton, OH	18,139	19,831	1,692	9%	1.26	1.35			
Boston, MA	213,857	232,321	18,464	9%	2.22	2.28			
San Diego, CA	114,426	122,976	8,550	7%	2.01	2.03			
Albany, NY	24,298	25,952	1,654	7%	1.48	1.51			
Houston, TX	148,203	157,011	8,808	6%	1.38	1.31			
San Jose, CA	215,233	224,993	9,760	5%	5.96	5.90			
Austin, TX	69,823	72,913	3,090	4%	2.11	1.96			
Palm Bay, FL	21,040	21,781	741	4%	2.63	2.50			
Denver, CO	72,053	73,626	1,573	2%	1.43	1.36			
Detroit, MI	103,524	104,620	1,096	1%	1.50	1.47			
Colorado Springs, CO	22,203	22,386	183	1%	1.89	1.78			
US	4,673,254	5,022,084	348,830	7%					
	1 0044 4								

### Figure 13. Technology Generator Growth Regions

Source: EMSI Covered Employment - 2011.4

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# 2.2 Dayton Region Targeted Growth Clusters

These and other analyses of the Dayton Region's competitive strengths in technology generator industries have been further refined to identify four industry clusters in which the Dayton Region has the greatest immediate potential for substantial job growth and a return to a robust and expanding regional economy. These four "technology generator" industries underpin the Dayton Region Comprehensive Economic Development Strategy and implementation plan:

- Aerospace Systems
- Advanced Materials & Advanced Manufacturing
- Information Technology & Advanced Data Management
- Human Sciences and Healthcare

Figure 15 below provides a clear illustration of the opportunities which these targeted technology clusters offer to Dayton Region job growth:

Figure 15. 2011 - 2016 Projected Employment Growth, Dayton Region Technology Growth Clusters				
	Aerospace Systems	Adv. Materials & Adv. Mfg	IT & Advanced Data Management	Human Sciences & Healthcare
2011 Jobs	18,940	37,566	23,041	18,199
2016 Projected Jobs	21,570	34,589	26,903	21,158
Change	2,630	-2977	3,862	2,959
% Change	13.90%	-7.90%	16.8%	16.3%
Nation % Change	10.30%	-5.30%	8.3%	13.4%
Average Wage	\$73,922	\$55,511	\$73,559	\$45,832
2012 Location Quotient	1.24	1.24	1.02	1.02

Source EMSI; 13-County Region and Dayton Development Coalition (LQ)

Each of the technology growth sectors project strong growth except for the advanced manufacturing industry; however, the dominance of manufacturing expertise in the Region and current efforts to transform to new technologies such as unmanned area vehicles are the basis for a continuing focus.

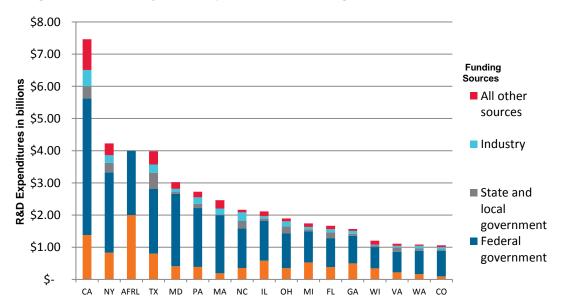
### 2.2.1 Aerospace Systems

The anchor to the Aerospace Systems cluster is Wright-Patterson Air Force Base and its \$4.5 billion contribution to the Dayton regional economy. It employes more than 27,000 direct employees and an additional 32,000 indirect jobs supporting its missions, including a robust defense contractor population in the surrounding Dayton area. It is a major contributor and catalyst not only to Aerospace Systems but to the vitality of each of the other regional clusters of Advanced Materials and Advanced Manufacturing, IT and Data Management, and Human Services and Healthcare.

The Air Force Research Laboratory (AFRL)manages over \$3 billion annually in science and technology funding. Of the ten directorates of AFRL, five of them are headquartered at WPAFB:

- Materials and manufacturing
- Power and propulsion
- Sensors
- Human Performance
- Air Vehicles

AFRL's research and development budget alone is nearly twice the R&D investment made by all Ohio Academic and public institutions. In fact, if AFRL's R&D expenditures were compared to all the other state's university (public and private) R&D expenditures, AFRL ranks #3. Only California and New York universities are spending more on R&D (Figure 16).

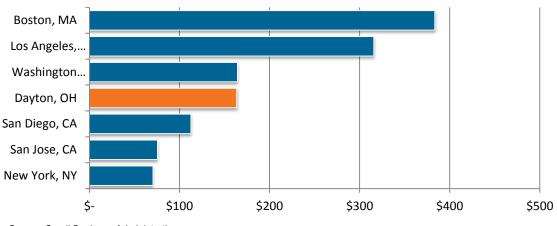


#### Figure 16. Public R&D by State Compared to AFRL R&D Budget

Source: AFRL FY09; State expenditures reported to National Science Foundation

AFRL has a substantial impact on the small business sector of the Dayton Region. Unlike other communities that manufacture aircraft, such as Seattle or Wichita, the Dayton Region leads aerospace research and development. The Region houses R&D contractors and small businesses that focus on the technological needs of the Air Force and the aerospace industry.

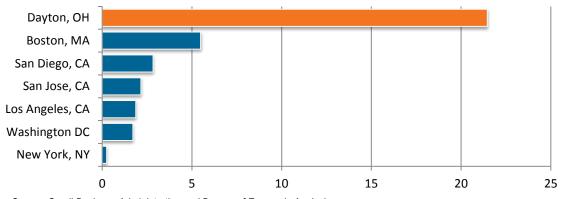
Of the Small Business Innovation Research (SBIR) and Small Business Technology Transfer (STTR) contracts awarded by the Air Force, the Dayton Region ranks fourth in the nation for dollars awarded, behind Boston, Los Angeles, and Washington, D.C. However, Dayton leads the nation in the percentage of Air Force SBIR/STTR as a percent of the Region's Gross Domestic Product (GDP). See figures 17 and 18.





Source: Small Business Administration

Figure 18. Intensity of SBIR Research Per GDP Compared To National Average (# Of Times Concentration of National Average)



Source: Small Business Administration and Bureau of Economic Analysis

The Life Cycle Management Complex (LCMC) at WPAFB designs, develops and delivers aerospace weapon systems and capabilities, managing more than 400 Air Force, joint and international aircraft acuisition programs and responsible for an annual budget of \$23 billion. Although no aircraft are currently being manufactured in Southwest Ohio, the Region is a national leader in the aircraft manufacturing supply

chain. The combined strengths of both Dayton and Cincinnati create a nearly complete supply chain within just a 50 mile radius.

Figure 18 on the following page shows the top 30 manufacturing industries that the aircraft manufacturing industry requires for aircraft production. Using location quotient (LQ) analysis again, the Southwest Ohio Region has a higher concentration in almost all of the related support industries. In instances where the industry does not exist, other Ohio cities offer the manufacturing needed to support the aircraft industry.

		Amount Spent in	MSA with		
NAICS	Industry Description	US Aircraft	Greatest	2012	2012
INAICS	industry Description	Manufacturing	Industry	Jobs	LQ
		Supply Chain	Concentration		
336413	Other Aircraft Parts and Auxiliary Equipment	\$8,627,160,000	Dayton	1,127	4.15
	Manufacturing		<b>•</b> •••••		
336412	Aircraft Engine and Engine Parts Manufacturing	\$7,910,580,000	Cincinnati	8,060	14.29
334511	Search, Detection, Navigation, Guidance, Aeronautical,	\$5,294,450,000	Dayton	621	1.53
220444	and Nautical System and Instrument Manufacturing	¢0.014.100.000			
336411 334413	Aircraft Manufacturing	\$2,214,130,000	n/a Toledo	n/a	n/a
334413	Semiconductor and Related Device Manufacturing Radio and Television Broadcasting and Wireless	\$1,423,170,000 \$986,767,000	Cincinnati	1,407 829	3.45 1.67
JJ4ZZU	Communications Equipment Manufacturing	\$900,707,000	Cincinnati	029	1.07
331111	Iron and Steel Mills	\$917,831,000	Cincinnati	2,526	4.01
334519	Other Measuring and Controlling Device Manufacturing	\$456,320,000	Dayton	336	4.08
332912	Fluid Power Valve and Hose Fitting Manufacturing	\$317,501,000	Dayton	781	8.86
332710	Machine Shops	\$301,638,000	Dayton	1,720	2.44
326199	All Other Plastics Product Manufacturing	\$274,713,000	Dayton	1,425	2.10
332911	Industrial Valve Manufacturing	\$232,374,000	Cincinnati	380	2.09
333996	Fluid Power Pump and Motor Manufacturing	\$219,771,000	Akron	239	5.71
333995	Fluid Power Cylinder and Actuator Manufacturing	\$155,706,000	Dayton	212	4.92
332510	Hardware Manufacturing	\$148,740,000	Cincinnati	248	1.46
332919	Other Metal Valve and Pipe Fitting Manufacturing	\$141,527,000	Cincinnati	120	1.03
331210	Iron and Steel Pipe and Tube Manufacturing from	\$135,248,000	Cincinnati	452	2.39
	Purchased Steel				
331221	Rolled Steel Shape Manufacturing	\$128,051,000	Cincinnati	852	5.67
335931	Current-Carrying Wiring Device Manufacturing	\$127,200,000	Cincinnati	816	3.75
334418	Printed Circuit Assembly (Electronic Assembly)	\$123,634,000	Dayton	327	2.31
	Manufacturing	<u> </u>	0	007	0.00
332722	Bolt, Nut, Screw, Rivet, and Washer Manufacturing	\$122,405,000	Cincinnati	627	2.38
336399	All Other Motor Vehicle Parts Manufacturing	\$121,538,000	Dayton	946	3.09
331315	Aluminum Sheet, Plate, and Foil Manufacturing	\$116,782,000	Canton	123	7.11
332991	Ball and Roller Bearing Manufacturing	\$111,498,000	Canton	4,001	126.32
332721 331316	Precision Turned Product Manufacturing	\$106,102,000	Dayton Cincinnati	235 450	2.37 3.34
331316	Aluminum Extruded Product Manufacturing Guided Missile and Space Vehicle Manufacturing	\$104,226,000 \$103,895,000	n/a	450 n/a	3.34 n/a
336414	Instrument Manufacturing for Measuring and Testing	\$103,895,000	Cincinnati	405	n/a 1.44
554515	Electricity and Electrical Signals	φ93,072,700	Gincinnati	405	1.44
322211	Corrugated and Solid Fiber Box Manufacturing	\$90,885,200	Cincinnati	1,709	2.55
332111	Iron and Steel Forging	\$89,654,700	Dayton	67	1.12
002111	non and otoor rorging	φ00,00-,100	Dujton	01	1.12

#### Figure 19. Aircraft and Manufacturing Supply Chain

Source: EMSI Covered Employment

In these same 30 industries in the aircraft manufacturing supply chain, Ohio ranks third in the number of jobs, with only California and Texas leading. Yet the difference in average annual wages between the other states and Ohio is significant, as shown in the table below.

Figure 20. State Ranking of Aerospace Manufacturing Jobs and Annual Wages			
State	2011 Jobs	2011 Average Annual Wages	
California	301,391	\$113,529	
Texas	173,556	\$96,556	
Ohio	134,903	\$73,187	
Washington	105,998	\$111,645	
Illinois	102,629	\$74,162	
Pennsylvania	101,157	\$75,119	
Michigan	95,500	\$71,800	
Indiana	92,602	\$76,515	
New York	78,188	\$80,869	
Arizona	68,133	\$112,789	

Source: EMSI Complete Employment

Of particular importance to the Dayton Region is the focus of Air Force research and development and acquisition on unmanned aircraft systems (UAS), a major component of the Dayton Region's economic development strategy. According to the Teal Group, an aerospace and defense market analysis firm based in Fairfax, Virginia, UAS spending is projected to double over the next decade from current worldwide expenditures of \$6.6 billion annually to \$11.4 billion, totaling just over \$89 billion in the next ten years. Teal indicates the U.S. will account for 62% of the worldwide investment in UAS development and 55% of the procurement.<sup>13</sup>

<sup>&</sup>lt;sup>13</sup> PR Newswire, http://www.prnewswire.com/news-releases/, "Teal Group Predicts Worldwide UAV Market Will Total \$89 Billion in its 2012 UAV Market Profile and Forecast," April 22, 2012.

### 2.2.2 Advanced Materials and Advanced Manufacturing

The Dayton Region has a long tradition of manufacturing excellence and innovation and has the scale and supply diversity to transform to new manufacturing opportunities, replacing its auto sector dependence. Despite the declines of the last decade, the Dayton Region continues to be competitive in manufacturing with an industry cluster 20% higher than the national average.

With the downsizing of traditional manufacturing demands, defining growth areas in advanced manufacturing has been challenging and recruiting a workforce willing to enter high-skilled manufacturing positions has been difficult.

Ohio's employers report the need to up-skill workers across all production industries – aerospace, chemicals, polymers, plastics, food, energy, pharmaceuticals, medical devices, and many other industries. Unemployed manufacturing workers have skills that are out-of-date in a manufacturing environment; most have an educational foundation with skills required for postsecondary education.

However, community colleges in Ohio do not have a mechanism to consistently assess workers, document their skills, or provide credit for experiential learning that would help them be prepared for accelerated programs or short-term technical training that could help them fill high-demand manufacturing positions.

Figure 21 shows high-wage manufacturing fields that demonstrated growth after the departure of GM and are projected to continue to grow over the next five years. According to the Ohio Department of Jobs and Family services, the majority of manufacturing jobs open in the first quarter of 2011 require a bachelor degree to qualify.

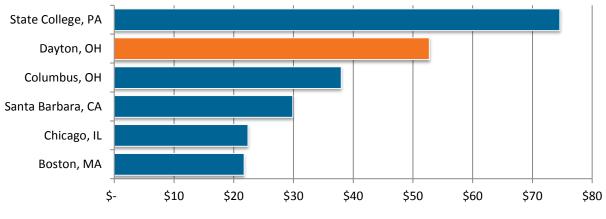
NAICS Code	Description	Growth 01-07	Growth 08-10	Growth 11-16	2010 Total EPW
336992	Military Armored Vehicle, Tank & Component Manufacturing	507	409	1,377	\$75,272
334511	Search, Detection, Navigation, Guidance, Aeronautical, and Nautical System and Instrument Manufacturing	615	259	1,284	\$83,439
325412	Pharmaceutical Preparation Manufacturing	213	52	951	\$112,320
331491	Nonferrous Metal (except Copper and Aluminum) Rolling, Drawing, and Extruding	383	48	738	\$58,194
336412	Aircraft Engine and Engine Parts Manufacturing	50	346	405	\$91,789
339112	Surgical and Medical Instrument Manufacturing	160	5	373	\$83,948
325211	Plastics Material and Resin Manufacturing	66	66	365	\$83,399
333993	Packaging Machinery Manufacturing	99	21	274	\$85,874

#### Figure 21. Growth in Manufacturing Fields in the Dayton Region, 2001-2016

Source: EMSI, Covered Employment

In addition to future demand, a recent Staub Manufacturing<sup>14</sup> survey of 100 Dayton Region companies found that most positions available are for CNC machinists (including CNC lathe operators), assembly positions, welders and engineers. It noted that 52 percent of the respondents have been looking for over two months with some looking for up to a year. This is one area that will require additional research.

The Region is a national leader in advanced materials research and development—an industry that is important to aerospace manufacturing as composites replace traditional materials, offering improved strength performance and often reducing costs. Dayton is second in the nation for investments in R&D for materials research, while Columbus, Ohio is third. Together they account for the largest percentage of R&D in materials in the United States.





A major effort of regional strategy is fostering entrepreneurship to bring new advanced materials to the market. While materials R&D has been a strength of the Dayton Region economy for the last two decades, the aerospace industry is now heavily investing in advanced aerospace systems that rely on these materials for increased strength and reduced weight. Producing in volume and at a competitive price represents a transformation of skills and entrepreneurial risk-taking not usually identified with scientific invention and discovery in the laboratory.

The Dayton Region has a well-established infrastructure of commercialization support to meet this challenge. It includes technology commercialization accelerators such as the National Composite Center, and the University of Dayton's Institute for Development and Commercialization of Advanced Sensor Technology (IDCAST), incubator infrastructure including The Entrepreneurs Center and the City of Dayton's TechTown campus for housing start up emerging technology companies, coordinated with entrepreneurial

Source: National Science Foundation

<sup>&</sup>lt;sup>14</sup> http://www.madeindaytonblog.com/2012/06/proof-huge-opportunity-in-local.html

education and assistance, venture capital resources and angel investment networks managed by the Dayton Development Coalition through its Entrepreneurial Signature Program (ESP).

This ecosystem would not have been realized without the support of the State of Ohio and the U.S. Economic Development Administration (EDA). The State of Ohio Third Frontier Program, a \$2.3 billion initiative providing funding for technology commercialization efforts, has been a major catalyst of increased entrepreneurship. Tech Town is at the forefront of the Region's efforts to encourage and house technology startups, receiving major support from EDA to make it a reality.

There is convincing evidence that a successful transition from materials research to advanced manufacturing production is occurring including the following highlights:

- Aerospace manufacturing in the Dayton Region grew by 32% during the decade even while the automobile manufacturing industry fell by 78%;
- The Dayton Region is actively engaged in the UAS industry, is aggressively seeking designation from the Federal Aviation Administration (FAA) as a UAS test site, and is in negotiation with a number of large UAS manufacturers who desire to locate in the Dayton Region if access to national airspace for UAS testing and evaluation is secured; and
- In the past five years, GE Aviation has added 400 jobs at its three Dayton manufacturing sites.

### 2.2.3 INFORMATION TECHNOLOGY AND ADVANCED DATA MANAGEMENT

The Dayton Region is a global leader in the use of data for advanced management, analysis and visualization. The Region has a robust IT cluster, including such global industry leaders as LexisNexis, Teradata, Reynolds & Reynolds and Standard Register. The cluster is bolstered by the presence of numerous defense-related IT and cyber missions, including the Air Force 554th Electronic Systems Group, the AFRL Sensors Directorate, and the National Air and Space Intelligence Center.

Figure 23. Major IT Employers in the Dayton Region		
Dayton Region IT Employer	Employment	
General Dynamics	225	
Reed Elsevier Inc.	3000	
Reynolds and Reynolds	1000	
Serco	365	
Standard Register	539	
WorkflowOne LLC	764	
Teradata Operations	420	
SAIC	304	
Federal Government Industries	1,000	

The 2010 move from Dayton of the corporate headquarters of NCR Corporation was a setback to the IT cluster, with the loss of 1200 high paying corporate jobs and more than \$2.5 million in income taxes to the City of Dayton. However, many of the employees remained in the Dayton Region and the workforce has been enhanced by the increased supply of seasoned, highly skilled IT workers. The IT sector has increased 13.3% during the past three years compared to a U.S. growth rate of 2.8%.

Source: Hoovers, Company Direct, EMSI 2012.1 Covered Employment

The strengths of the IT and Advanced Data Management sector include the following:

- The Dayton Region has the highest concentration of trained information technology professionals in Ohio and support companies that generate over \$10 billion in annual sales of information systems and advanced data management technologies;
- Over 50 information degree program are offered within a one hour drive of the Dayton Region. programs range from producing associate to doctoral levels in information systems, computer science and engineering;
- The Dayton Region enjoys the largest enrollment in Ohio in high school to post secondary education with over 1,000 students pursuing an information technology career path;
- The Dayton Region has a strong support IT support systems, including daytaOhio, a \$44.5 million investment by the State of Ohio, industry, government and academia to establish it as a Center of Excellence for a focus on improving human performance through innovative visualization computing technology; and

 Physical infrastructure to encourage IT expansion includes two incubator facilities in the City of Dayton's Tech Town to foster technology start up investment, particularly in sensor and RFID technologies. In Springfield, Ohio, the NextEdge Applied Research and Technology Park is specifically designed to serve as the location of choice for technology companies, data centers and research organizations and includes the Central State University NET Incubator providing services to start up entrepreneurial companies.

### 2.2.4. HUMAN SCIENCES AND HEALTHCARE

The Human Sciences and Healthcare cluster consists of two distinct but supportive sub-sections: Healthcare and Human Sciences/Human Effectiveness. While these are related and supportive, each has distinct characteristics and requires different strategic approaches.

1) The **Traditional Healthcare** sector is of critical importance to the central cities of Dayton and Springfield because it is a major employer of urban residents and a primary revenue source to the cities. The Healthcare industry accounts for a \$6.77 billion economic impact and more than 31,000 employed workers in the Region. Hospitals in the City of Dayton include Miami Valley, Good Samaritan, Grandview, the Veterans Affair Medical Center and The Children's Medical Center. This industry is the largest industry cluster within the City of Dayton. A major strategic emphasis of the Dayton Region CEDS is the retention of the major hospital headquarters and their associated employment levels within the urban core. To do so requires economic development strategies that address commercial and economic needs as well as the environment within which the hospitals operate. The ability to provide a safe and aesthetic environment for the employee and the patient and the land required to grow and modernize are most likely the major factors for retention. Several initiatives related to the hospitals' campus environments reflect this focus on retention and environment of traditional healthcare facilities: The City of Dayton has implemented a comprehensive and proactive master plan and real estate strategy to insure space around these centers for expansion and peripheral development.

- The City of Dayton has partnered with anchor hospitals to launch three hospital related neighborhood revitalization projects: Renaissance Redevelopment, the Phoenix Revitalization and the Stewart & Patterson Redevelopment Projects to enhance the surrounding residential and commercial areas around Grandview, Miami Valley and Good Samaritan, all of which are major projects outlined in the City of Dayton CEDS; and
- The City of Springfield has just completed a 50-acre center city renewal project that included a new \$250 million hospital complex for Community Mercy Health Partners. Community Mercy Health Partners - in collaboration with the City of Springfield and Wittenberg University – are planning the remediation, site preparation, and demolition of structures of the former hospital complex.

2) **Human Sciences and Human Effectiveness** which include scientific areas related to the integration of biological and cognitive technologies to maximize the effectiveness of the human interface and the productivity of the human's output. This subset is influenced by the presence of the Human Effectiveness Directorate of AFRL and the United States Air Force School of Aerospace Medicine, both headquartered at WPAFB. It is an increasing area of interest for governments and private industry as the human and technology interface becomes more critical in a technology driven environment. Human Science areas of interest and investment in the Dayton Region include bio-science applications, disaster

readiness and response, manufacturing productivity, and training among others. The Human Sciences cluster employs 8,500 highly paid scientists, medical practitioners and educators, and skilled workers.

Highlights of the Human Sciences cluster include the following key contributors:

- Wright State University Boonshoft School of Medicine enrolls over 400 medical students, provides residency training in 13 medical specialities and fellowship training in 10 subspecialties, and offers masters degree programs in aerospace medicine, pharmacology/toxicology and public health;
- Wright State University has the longest running civilian training program for doctors specializing in air and space travel;
- The recently established Wright State University & Premier Health Partners Neuroscience Institute is a public-private partnership that unites the Dayton Region's most advanced biomedical research insitution with the clinical resources of its largest hospital system, and has led to the establishment of a new clinical Department of Neurology within the Boonshoft School of Medicine;
- In 2009, the WSU Medical School broke ground for the National Center for Medical Readiness Tactical Laboratory, a major inititaive to provide training for large-scale emergencies such as a weather disaster, terrorist attack or hazmat situations;
- \$270 million in human effectiveness research is directed through the Air Force Research Laboratory headquarters at WPAFB;
- The 711<sup>th</sup> Human Performance Wing at WPAFB supports three laboratories focused on aerospace medicine and human performance including a life sciences equipment lab, an aeromedical lab, and a materials lab;
- The United States Air Force School of Aerospace Medicine located at WPAFB trains more than 6,000 students annually; and
- The Center of Excellence for Human Performance at WPAFB partners with 21 existing regional hospitals, medical schools, training facilities and human science-focused businesses in the Dayton Region.

2012

While not specific to a particular industry cluster, there are four other areas of emphasis which must be included as important elements of the Dayton Region CEDS due to the unique locational advantage of the Region and/or their strategic importance to regional partners:

- 1) Logistics and Distribution: More than 2,500 jobs have been added in recent years as a result of substantial warehousing and distribution center investment in the Dayton Region. These jobs are important to expand the opportunities for semi-skilled workers and those displaced from the manufacturing sector. Current regional intergovernmental efforts include discussion of the establishment of a multi-jurisdictional Transportation Improvement District to spur distribution investment. Other key interstate-adjacent developments, such as the Austin Road area in southern Montgomery County, have utilized multi-jurisdictional development and taxing authorities to accelerate development. These regional cooperative mechanisms are indicative of the Region's strategic partnerships and support for a focused and coordinated economic development approach.
- 2) Water Resources: The Dayton Region offers a sustainable source for the world's most important resource—water. Dayton Region is located on an aquifer system that contains 1.5 trillion gallons of groundwater with that can yield as much as 13,900 gallons per minute with individual wells pumping as much as 3,000 gallons per minute. The Region has in place U.S. Environmental Protection Agency (EPA) award-winning and interregional water protection programs. The groundwater maintains a constant 56<sup>0</sup> and is a valuable source of geothermal energy. Attraction of industries with water requirements is ongoing, and a collaboration with EPA, Cincinnati and Northern Kentucky has been established and designated by EPA as the Water Technology Innovation Cluser of Southwest Ohio. Research and Development and the commercialization of water technology devices and technologies is the objective for the partners in this initiative.
- 3) Commercial and Downtown Redevelopments: A critical need of both urban and rural cities and villages is the need to address deterioration of commercial areas that anchor downtowns as well as residential neighborhoods. Suburban development and large retail trends have impacted these smaller strip, mall and downtown locations and the many small, privately-held businesses that have traditionally anchored them.
- 4) Agbioscience: The tools, expertise and facilities needed to advance the development of value-added agricultural products are important to the Dayton Region. The Agbioscience sector is made up of food, agricultural, environmental, and bio-based products industrieis. Traditionally a strength in the Dayton Region and Ohio. One in sevent Ohioans are employed in this sector accounting for over \$100 billion in economic impact to the state. In the Dayton Region there are over 11,600 jobs in the agriculture and

food production industry. These industries are projected to grow by 1.9% and 7.2% respectively over the next ten years.

Wilmington College, in Clinton County, has one of only two bachelor of agriculture granting institutions in Ohio. Wilmington College along with Southern State Community College, the Center for Innovative Food Technology, and other stakeholders are exploring options for a physical incubator to encourage the production of higher value added agricultural products like fresh produce, additives, special grains and other products which command greater margins and/or can supply local needs and markets more efficiently.

### 3.0 GOALS AND OBJECTIVES

Since the mid-1990's, as it became evident that the Dayton Region economy was highly dependent on mature industries unlikely to sustain growth through the next decade, the 14-county Dayton Region has been engaged with the Coalition in strategic planning to diversify the economic base and capture growth opportunities being driven by technological innovation.

Because of this collective effort, the Region has reached wide consensus and a unanimity of public policy supporting the emphasis on the four technology clusters (Aerospace Systems, Advanced Materials & Advanced Manufacturing, Information Technology & Advanced Data Management, and Human Sciences and Healthcare) and a regional commitment to the Region's urban core, recognizing the importance of central city vitality to the quality of life in the Region.

Five regional goals have been identified to guide implementation of the CEDS and the Region's investment in strategic projects, programs and activities:

- Leverage the Region's Leadership, Assets, and Resources
- Transform our Legacy Industries
- Increase Opportunities for Growth
- Develop and Retain World Class Talent
- Make the Dayton Region a Destination and Promote It

These strategic goals are closely aligned with existing Comprehensive Economic Development Strategies (CEDS) of regional stakeholders who also have engaged in CEDS planning and implementation over the past decade, including the Cities of Dayton, Moraine and Trotwood and the Counties of Clark, Preble and Clinton. Their CEDS are considered subsets of this Regional Strategy. Figure 24, following the Regional Goals, is a matrix of the Dayton Region CEDS goals and the alignment of these to existing CEDS of regional partners.

# GOAL ONE: LEVERAGE THE REGION'S LEADERSHIP, ASSETS, AND RESOURCES

Objectives	Strategic Projects, Programs and Activities
Develop synergies between regional entities, governments and academia	<ul> <li>Develop a collaborative and diverse regional CEDS strategy committee with links to the regional Priority Development and Advocacy Committee process (PDAC)</li> </ul>
	<ul> <li>Encourage collaboration among governments, academia, technology centers of excellence, technology accelerators and private and public funding sources to increase investment</li> </ul>
	• Support the use of multi-government economic development tools (TIF, JEDD, etc.) to spur investment opportunity
	<ul> <li>Work closely with WPAFB to identify opportunities to spin out, transfer in, or scale needed new technologies</li> </ul>
	<ul> <li>Increase job opportunities through existing regional strength in health, medical, and human factors sectors, particularly related to defense, emergency preparedness, and research and development</li> </ul>
Ensure a coordinated and collaborative regional business recruitment effort to capture cluster opportunities	<ul> <li>Work collaboratively to advance the JobsOhio mission of regional leadership and coordination of job attraction and retention efforts</li> </ul>
Leverage regional economic development efforts with State and Federal assistance	Secure State of Ohio and Federal funding for new technology initiatives and cluster development
	Expand the level of Federal research and development assistance awarded regionally for technology initiatives, R&D and support for Centers of Excellence
Support current and new government missions as a source of economic	<ul> <li>Expand quality, diversity of service, and usage of the health and veterans services provided at the Dayton Veterans Affairs Medical Center campus</li> </ul>
source of economic development and job creation building on existing regional strengths	Construct facilities or initiate programs that would support new missions of state or federal government agencies

#### Objectives Strategic Projects, Programs, and Activities Attract and build strategic Advance an integrated supply chain for Aerospace and technology manufacturing. technology clusters: i.e., advanced materials (composites, tooling, sensors, optoelectronics) and advanced manufacturing; systems integration R&D; test and evaluation services, etc. **Aerospace Systems** Facilitate linkages between small technology innovators and major cluster anchors $\triangleright$ **Advanced Materials &** Advanced Manufacturing Position the Dayton Region to be a testing and manufacturing hub for water technologies and water-intensive manufacturing $\triangleright$ Information Technology & **Advanced Data** Management Human Sciences & $\geq$ Healthcare Make Ohio and the Dayton Secure an enduring relationship with FAA, NASA, and the Department of Defense to Region the destination of advance RDT&E in the Dayton Region for integration of UAS in national airspace choice for all Unmanned (NAS); Aircraft System developers, testers, researchers, Achieve designation as a UAS test bed or approval of special use airspace for UAS manufacturers suppliers, flight testing training and education Advance the use of the Springfield Air National Guard Base and the Wilmington Air Park for UAS activity and job creation Protect and retain core In addition to the cluster industries, special efforts should focus on growth submanufacturing industries in sectors including search, detection, navigation, aeronautical and nautical systems growth industries and instrument manufacturing, plastic material and resin manufacturing, relay and industrial control manufacturing and other basic organic chemical manufacturing, all of which are projected to grow and which have favorable location quotients in the Dayton Region Assist core industry in the Support the growth of the Health Services industry, particularly in the urban core and transition to new products and in the neighborhoods which surround central city hospital locations services Support an adoption of new processes, materials, and value-added services in the Dayton Region's historically strong tooling and machining industry to foster transition to new markets and new technologies Ensure revolving loan funds sufficiently capitalized to support capital investment and retooling for new technologies and markets

#### GOAL TWO: TRANSFORM OUR LEGACY INDUSTRIES

# GOAL THREE: INCREASE OPPORTUNITIES FOR GROWTH

Objectives	Strategic Projects, Programs and Activities
Develop the entrepreneurial ecosystem	<ul> <li>Secure State of Ohio Third Frontier refunding of the Dayton Region Entrepreneurial Signature Program (ESP) and regional technology intermediaries and accelerator partners (incubators, Centers of Excellence, etc.)</li> </ul>
	<ul> <li>Identify high value technology transfer and commercialization opportunities and advance entrepreneurial ventures through coaching and mentoring and early stage angel and venture capital investment</li> </ul>
	<ul> <li>Undertake efforts through the ESP program and its collaborators to increase the entrepreneurial talent pool through recruitment and training</li> </ul>
	<ul> <li>Foster start up formation of platform technologies that present significant scale-up opportunity in the key technology clusters</li> </ul>
Support an infrastructure conducive to new investment	<ul> <li>Advance remediation and redevelopment efforts in brown field areas and vacant industrial facilities</li> </ul>
	Maintain Wilmington Air Park's existing Part 139 classification by the FAA
	Support green energy and bio-science applications and job creation opportunities
	<ul> <li>Plan, develop and construct appropriate transportation including transit, highways, aviation, bicycle, pedestrian and related infrastructure facilities</li> </ul>
	<ul> <li>Support modern communication and data links serving businesses, organizations, and individuals</li> </ul>
Exploit the location advantages of the Dayton Region	Ensure an adequate supply of shovel ready sites and aggressively recruit high employment distribution and warehousing investment
	<ul> <li>Support strategic development of core downtown reinvestment areas, including CEDS priorities in Springfield, Dayton and urban and rural commercial strips</li> </ul>
Increase the Dayton Region's market share of defense contracting awards	<ul> <li>Develop a database of potential defense service providers and match with identified needs within the Air Force</li> </ul>
	<ul> <li>Establish training and technical assistance to increase understanding of defense contracting, business development, and proposal writing to increase the regional win rate and market share</li> </ul>

OAL FOUR: DEVELOP A	OAL FOUR: DEVELOP AND RETAIN WORLD-CLASS TALENT			
Objectives	Strategic Projects, Programs and Activities			
Develop a talent pipeline based on industry demand	<ul> <li>Develop a process that can validate and prioritize business demand</li> <li>Develop regional mechanisms to align secondary education and workforce training curricula to business demand and to the forecasts of workforce needs in emerging industries, such as UAS, green energy, intelligence, surveillance and reconnaissance, etc.</li> <li>Support an enhanced focus on STEM education at all academic levels</li> </ul>			
Increase opportunities for internships in the technology clusters	<ul> <li>Support local, State and Federal efforts to increase the focus on STEM workforce efforts</li> <li>Secure internship funding from the State of Ohio and the Department of Defense</li> <li>Align STEM internships with early stage technology start up companies to assure trained workforce as entrepreneurial companies scale production and increase employment, particularly in the aerospace cluster</li> </ul>			
Align higher education programs and research to industry need and aerospace opportunities	<ul> <li>Establish workforce training delivery systems which focus on filling the higher education pipeline with dislocated workers</li> <li>Increase the quantity of security clearable students</li> <li>Develop a community-wide process to align Job Centers and One-Stops governmental programs training to unmet needs in the technology clusters' workforce</li> </ul>			

Objectives	Strategic Projects, Programs and Activities
Promote the cultural, artistic, recreational, and historical assets of the Region	<ul> <li>Promote the Dayton Region as "UAS Active" and the leader in the UAS industry for research and development, test and evaluation, system integration and manufacturing</li> </ul>
	<ul> <li>Brand and promote the Dayton Region's aviation heritage assets as the premier destination for aviation history</li> </ul>
	<ul> <li>Increase and leverage funding support of the Dayton Aviation Heritage National Historical Park and aviation heritage assets in the Region</li> </ul>
	<ul> <li>Celebrate Dayton's historical links to the development of innovation, technology, manufacturing, and national defense</li> </ul>
	<ul> <li>Enhance facilities and promotion of the Dayton region for professional, amateur, and youth sports</li> </ul>
	<ul> <li>Maximize opportunities to capitalize on the natural landscape, including integrated waterfront development spanning the Region, to create unique recreational destinations for outdoor adventurists and families.</li> </ul>
	<ul> <li>Build on and expand cultural and artistic programming, including performance, music, dance, and visual arts and related art-related educational opportunities</li> </ul>
Attract technology-related conferences to showcase regional assets	<ul> <li>Showcase the Dayton Region as the location of choice for emerging technology clusters through the attraction and sponsorship of subject matter conferences such as the Annual Ohio UAS Symposium, the U.S. Water Conference, and technology showcases for aerospace materials, nano-materials, etc.</li> </ul>
Support the urban core areas to generate vitality and create	Improve transportation opportunities for motorists, bicyclists, and pedestrians
exciting, attractive urban showcases	Develop vibrant streetscapes
51104104303	Renovate buildings that support the urban experience
	Preserve and enhance the quality of the Region's downtowns as places to live, play and work
	Enhance safety, law enforcement, and emergency preparedness

## 3.1 EXISTING CEDS ALIGNMENT

Regional goals are closely aligned with existing Comprehensive Economic Development Strategies (CEDS) of regional stakeholders who also have engaged in CEDS planning and implementation over the past decade.

Eiguro 24	Alignment of Da	yton Region CEDS to	a Evicting Dogional	Dartnar CEDS
Figure 24.	Anymment of Da	VIUN REGIUN GEDS II	U EXISTING REGIONAL	

GOAL ONE: LEVERAGE THE REGION'S LEADERSHIP, ASSETS, AND RESOURCES	City of Dayton	City of Moraine	City of Trotwood	Clark County	Preble County	Clinton County
<ul> <li>Develop synergies between regional entities, government and academia</li> </ul>	~			~	~	~
<ul> <li>Ensure a coordinated and collaborative regional business recruitment effort to capture cluster opportunities</li> </ul>	~	~	~	~	~	~
Leverage regional economic development efforts with State and Federal assistance	~	~	~	~	~	~
<ul> <li>Support current and new government missions as a source of economic development and job creation building on existing regional strengths</li> </ul>	~			~		~
GOAL TWO: TRANSFORM OUR LEGACY INDUSTRIES						
<ul> <li>Attract and build strategic technology clusters:</li> <li>Aerospace Systems</li> <li>Advanced Materials &amp; Advanced Manufacturing</li> <li>Information Technology &amp; Advanced Data Management</li> <li>Human Sciences &amp; Healthcare</li> </ul>	~	~	~	~		~
<ul> <li>Make Ohio and the Dayton Region the destination of choice for all Unmanned Aerial System developers, manufacturers suppliers, training and education</li> </ul>	~			~		~
• Protect and retain core manufacturing industries in growth industries	~	~	~	~	~	~
Assist core industry in the transition to new products and services	~	~	~	~	~	
GOAL THREE: INCREASE OPPORTUNITIES FOR GROWTH						
Develop the entrepreneurial ecosystem	~	✓				
Support an infrastructure conducive to new investment	✓	✓	~	~	~	~
Exploit the location advantages of the Dayton Region	✓	✓	~	~		~
<ul> <li>Increase the Dayton Region's market share of defense contracting awards</li> </ul>	~			~		
GOAL FOUR: DEVELOP AND RETAIN WORLD-CLASS TALENT						
Develop a talent pipeline based on industry demand	√	~	~	~		~
Increase opportunities for internships in the technology clusters	✓	~	~			~
Align higher education programs and research to industry need and aerospace opportunities	$\checkmark$	~	~	~		~
GOAL FIVE: MAKE THE DAYTON REGION A DESTINATION AND PROMOTE IT						
<ul> <li>Promote the cultural, artistic, recreational and historical assets of the Region</li> </ul>	√			~	~	
Attract technology-related conferences to showcase regional assets	$\checkmark$					
<ul> <li>Support the urban core areas to generate vitality and create exciting, attractive urban showcases</li> </ul>				~		

The Dayton Region Priority Development and Advocacy Committee (PDAC) serves as the CEDS Strategy Committee, reporting its outcomes to the Coalition's Board of Trustees. This committee, established in 2003, consists of about 30 business, education and government leaders from throughout the Dayton Region and is staffed by the Dayton Development Coalition. The role of the PDAC is to annually evaluate projects, help establish regional priorities, and recommend projects that aid the community in speaking with one voice. The committee develops lists of projects with the greatest level of priority and consensus when pursuing funding opportunities by various private and State and Federal government sources.

Current members of the Dayton Region Priority and Advocacy/CEDS Strategy Committee are identified below.

*Chair:* Mr. Mark Thompson, President LJB Inc.

Bryan Bucklew, President and CEO Greater Dayton Area Hospital Association

Ron Budzik Dayton Business Committee

Dr. Daniel J. Curran, President University of Dayton

John Detrick, County Commissioner Clark County Board of Commissioners

Judy Dodge, County Commissioner Montgomery County Board of Commissioners

Jack Evans, County Commissioner Miami County Board of Commissioners

William L. Gillispie, Parity, Inc.

Sandy Gudorf, President Downtown Dayton Partnership

Jeff Hoagland, President and CEO Dayton Development Coalition

Dr. David R. Hopkins, President Wright State University

Charles Jones, Dayton Foundation

Chris Kershner, Vice President of Public Policy and Economic Development, Dayton Area Chamber of Commerce John T. Landess, Executive Director The Turner Foundation

Bill Lukens, President Stillwater Technologies

Michael McDorman, President Greater Springfield Chamber of Commerce

Phil Parker, President and CEO Dayton Area Chamber of Commerce

Bruce E. Pearson, Executive Director Miami Valley Research Park

Howard Poston, County Administrator Greene County

Mike Ratcliff, Executive Director Greater Dayton Mayors & Managers Association

Marilyn Reid, County Commissioner Greene County Board of Commissioners

Tim Riordan, City Manager City of Dayton

Michael T. Schueler, President Henkle-Schueler & Associates

Donald Spang, Executive Director Miami Valley Regional Planning Commission

Joe Tuss, Acting County Administrator Montgomery County

Joe Wright, President Twist, Inc.

#### 4.1 THE PDAC PROCESS IN THE DAYTON REGION

Participation in the annual PDAC Process is open to any organization with a program or project which benefits the people of the Dayton Region. Project sponsors are generally local government partners, college and universities, and non-profit organizations throughout the Region. Projects are grouped by type, reviewed and prioritized within five subject matter areas: Defense, Economic Development, Hospitals & Healthcare, Quality of Life, Transportation & Government Services. A Review Panel made of volunteer local subject experts reviews projects for each of the five subject matter areas.

Projects are evaluated by the PDAC Review Panel based on a number of factors such as economic growth potential, regional character, cost effectiveness, maturity, feasibility, impact, and level of support and commitments. After a public review and comment period, projects are identified by the review panels as Priority, Recommended or Reviewed:

- A small number of projects are selected as a "Priority Project." Priority Projects are the top
  projects that will make the most significant impact in the Dayton region among the projects that
  were submitted. These projects are the region's top priorities for funding because they strongly
  meet the evaluation criteria and are expected to have the greatest regional impact.
- "Recommended Projects" are projects that meet the needs of the region as determined by the review process. These projects meet the established criteria and would provide benefit to the Dayton Region if funded.
- "Reviewed Projects" are projects that have gone through the community process and may have merit, but either do not fully meet regional goals or may not be ready for funding.

Following the project categorization, the PDAC reviews and approves the review panel recommendations and makes the list public – sharing it on the Dayton Development Coalition website and providing copies of the list to federal and state elected officials from the Dayton Region. Project sponsors are responsible for advocating for their own projects and filling out any forms or applications for potential funding sources.

#### 4.2 PDAC AND THE CEDS PROCESS

PDAC, serving as the CEDS Strategy Committee, will approve the submission of the CEDS to EDA, after ensuring that the CEDS has been available for the required 30-day period for public review and comment. It will also approve any subsequent revisions to the CEDS and will monitor CEDS implementation and annual reporting.

The PDAC will review and consider endorsement of projects for EDA for funding consideration if the project meets the following critera:

1. The Project is consistent with the goals and objectives of the Dayton Region CEDS;

and

The Project has been reviewed by the PDAC and has been evaluated as a "Priority" or "Recommended " Project.

or

2. The Project is included in an EDA-approved CEDS of a Regional partner .

PDAC endorsements of proposed EDA projects are strictly advisory. Lack of endorsement by PDAC will not prevent a Regional partner from submitting a project to EDA for funding, but may indicate to EDA that the project is not aligned with Regional CEDS goals, or, while of merit, may not be considered ready for funding or may not yet have wide-based community support as a regional priority. Dayton Region key performance indicators are measured quarterly, reported to the community annually at the Coalition's Annual Meeting, and posted on the DDC regional website.

Key performance indicators that will be tracked, monitored and reported include the following:

Performance Measure	Goal	Data Source
Number of jobs created after implementation of the CEDS	5,000 jobs created over 5 years in the four key industries	Source of data is EMSI
	15,000 total jobs created over 5 years through RR&E efforts	Source of data is internal/JobsOhio
Number and types of investments undertaken in the region	200 projects won over 5 years through RR&E efforts	Source of data is internal/JobsOhio
Number of jobs retained in the region	95% of jobs in top 100 companies identify as "at risk"	Source of data is measured by JobsOhio West criteria
Amount of private sector investment in the region after implementation of the CEDS	\$2B in investment from RR&E investments over 5 years	Source of data is internal/JobsOhio
GEDS	For every \$1 invested in startup companies, \$10 in outside market validation will be realized	ESP reporting
Changes in the economic environment of the region	Unemployment rates down to 7%	Source of the data is Ohio LMI
	10% increase in STEM Occupations	Source of the data is EMSI



## Dayton Region Priority Development and Advocacy Committee 2011-2012 Project Recommendations

Project	Sponsor	Jobs Created	Requested Amount		
Defense					
	Priority Project				
Unmanned Aerial System Exploitation	University of Dayton Research Institute	25	\$3,500,000		
R	ecommended Projects				
Cyber Pros: Cybersecurity Protection System	Avetec	30	\$285,000		
Large Composite Structures Automated Manufacturing	UDRI	100	\$3,000,000		
LCMC Decision Support System (LDSS)	The Greentree Group	5	\$5,000,000		
Micro Air Vehicle	Mound Laser & Photonics Center	25	\$4,000,000		
E	conomic Development				
	Priority Projects				
Dayton Aviation Heritage National Historical Park: Stabilize and Maintain Wright Company Factory Site	National Aviation Heritage Alliance	200	\$1,000,000		
Expanding the Legacy of the National Museum of the US Air Force	Air Force Museum Foundation, Inc.	N/A	\$2,500,000		
R	ecommended Projects				
Airport Adjacent Logistics and Distribution Corridor - North Dixie Drive/CR 25A Sanitary Sewer Extension Project	City of Vandalia	500	\$2,300,000		
Building Energy Efficiency and Improvement Center	University of Dayton	36	\$256,000		
Catalyzing Entrepreneurial Development*	Wittenberg University	25	\$500,000		
Center for Advanced Automation and Industrial Controls	University of Dayton	N/A	\$500,000		
Center of Energy Education	Sinclair Community College	10	\$2,000,000		

DAYTON REGION COMPREHENSIVE ECONOMIC DEVELOPMENT STRATEGY

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Dayton Aviation Heritage National Historical Park: Restore and Enhance Hawthorn Hill	National Aviation Heritage Alliance	50	\$1,000,000			
Dayton VAMC Putnam Library	Department of Veteran's Affairs Medical Center	440	\$4,936,000			
Direct Digital Manufacturing Industrial Capabilities	University of Dayton	N/A	\$1,000,000			
Extension of sanitary sewer & water lines to the Greene County Lewis A. Jackson Airport	Greene County Board of Commissioners	100	\$2,500,000			
First Street, Springfield Street, and Warren Street Transportation Improvements	City of Dayton, OH	2,000	\$14,993,000			
High Speed Imaging Camera Technology for LADAR Vibrometry	University of Dayton	80	\$1,500,000			
Hollow Park Bridge	City of Piqua	200	\$5,000,000			
Kettering Business Park Site Preparation Project	City of Kettering	200	\$1,332,638			
Land Use Development*	Community Mercy Health Partners	40	\$4,500,000			
Mound Technical and Research Complex Expansion Project	Mound Development Corporation	70	\$2,268,605			
Neuroscience Innovation Research Building	Wright State University	150	\$5,000,000			
NMUSAF Entry way	City of Riverside	100	\$2,500,000			
Regional Emergency Operations Training Center*	Clark State Community College	5	\$600,000			
Renewable and Energy Efficiency Educational Initiative	University of Dayton	50	\$960,000			
South Piqua Water Improvements	City of Piqua	200	\$490,000			
Southwest Regional Waste Water Treatment Expansion*	Clark County Commission	400	\$2,701,000			
Statler Farm Infrastructure Improvements	Miami County Commissioners	600	\$2,200,000			
TechConnection Infrastructure	City of Trotwood	700	\$750,000			
Urban Revitalization & Economic Development*	Community Mercy Health Partners	40	\$3,000,000			
Wright Dunbar Neighborhood Project	Wright Dunbar, Inc.	50	\$500,000			
* Projects were submitted late and did not go through the Public Input period.						
Government Services						
	Priority Project					
Holes Creek Local Flood Protection Project	The Miami Conservancy District	N/A	\$2,000,000			
International Site Redevelopment	City of Springfield, Ohio	300	\$2,800,000			
Rob's Rescue	Green County Transit Board	0	\$265,000			

R	ecommended Projects		
City of Fairborn Emergency Preemption Project	City of Fairborn	0	\$619,570
Dayton Police - Communication Equipment Upgrade	Dayton Police Department	N/A	\$3,141,240
Greene County First Responder Communications Project	Greene County Emergency Management Agency	0	\$3,000,000
Hc	ospitals and Healthcare		
	Priority Project		
Kettering Health Network Proton Therapy Center	Kettering Health Network	700	\$7,000,000
R	ecommended Projects		
Bioengineering Conversion Program	University of Dayton	100	\$4,000,000
Relocation & Rural Health Clinic Designation for the Mercy Well Child Clinic in Urbana, Ohio	Community Mercy Health Partners	1	\$562,500
	Quality of Life		
	Priority Projects		
Riverfront Master Plan	Montgomery County	500	\$300,000
RiverScape River Run	Five Rivers MetroParks	75	\$1,000,000
R	ecommended Projects		
Fairborn Performing Arts & Cultural Center Renovation	Fairborn Performing Arts and Cultural Association	6	\$700,000
Fairgrounds Recreation Center Sporting Facilities Development	Greene County Parks & Trails	15	\$20,000
Health Science Center	Sinclair Community College	50	\$5,000,000
Hobson Freedom Park - Phase 2	Greene County Parks & Trails	10	\$1,532,600
Miami County - Heritage Tourism Miami-Erie Canal Corridor Project	City of Tipp City	50	\$400,000
Miamisburg Riverfront Park	City of Miamisburg	85	\$4,000,000
NeighborCare	Rebuilding Together Dayton	10	\$500,000
Russ Reserve Development Project	Greene County Parks & Trails	10	\$2,227,000
South Montgomery Low Dam Recreation	City of West Carrollton	50	\$2,968,000
STEM Education Applied Learning Laboratory	Dayton Regional STEM School	10	\$250,000
The 1913 Great Dayton Flood Exhibit & Exhibit Area	Dayton History	2	\$250,000
The Eichelberger Amphitheater at the Heights	City of Huber Heights	10	\$350,000
Treasure Island River Corridor Improvement Project	City of Troy, Ohio	45	\$2990000

### APPENDIX

Twin Towers Equine Center Renovation	Greene County Parks & Trails	10	\$559,500
Warrior Complex Development	Warrior Soccer Club	16	\$213,015
University of Dayton Arena - Geothermal Project	University of Dayton	0	\$2,000,000
University of Dayton Arena Dewatering Lift Station Project	University of Dayton	0	\$500,000
	Transportation		
	Priority Projects		
Central Avenue – Xenia Drive Bikeway Connector	City of Fairborn	0	\$464,050
I-675/Wilmington Pike Interchange	City of Centerville	500	\$29,000,000
US 35 Interchanges, Greene County/Beavercreek, OH	City of Beavercreek	10	\$10,100,000
R	ecommended Projects		
Greene County Recreational Trails Rehabilitation and Resurfacing	Greene County Parks & Trails	10	\$1,865,225
I-675/Grange Hall Road Interchange Project	City of Beavercreek	10	\$500,000
North Fountain Avenue Phase II	City of Springfield, Ohio	0	\$1,105,000
SR741 Springboro Pk. and Industrial Estates Dr. Improvements	City of Moraine	25	\$5,000,000
	<b>Reviewed Projects</b>		
Cardington Rd Phase IV	City of Moraine	100	\$5,600,000
Colonel Glenn Highways Improvements	City of Fairborn	2	\$1,026,650
Snyder Park "Green" Bridge	City of Springfield, Ohio	0	\$4,000,000