TRIAD TOMORROW

STRATEGIES FOR A SUSTAINABLE REGIONAL ECONOMY

2014-2018

Piedmont Triad CEDS EXECUTIVE SUMMARY

PIEDMONT TRIAD REGIONAL COUNCIL

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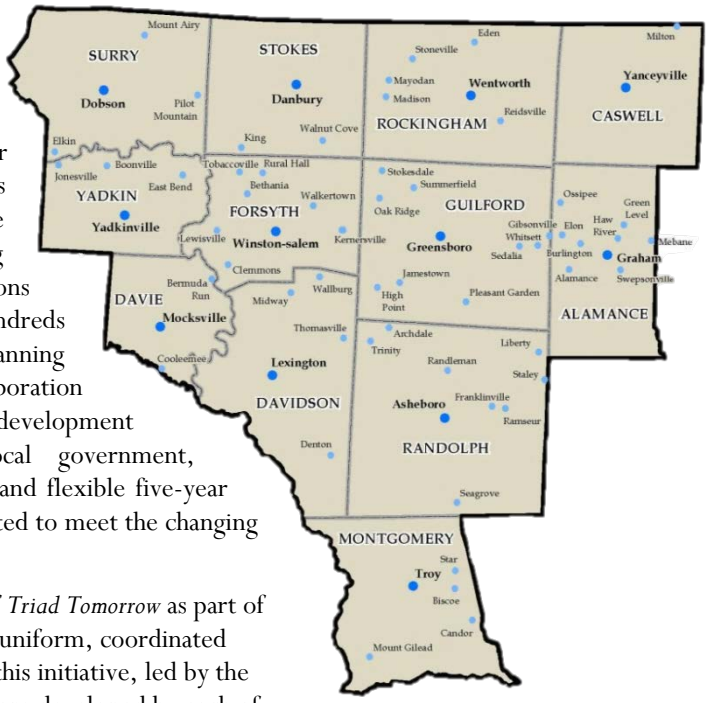
TRIAD TOMORROW
The Comprehensive Economic Development Strategy for the Piedmont Triad Region was unanimously approved by the Piedmont Triad Regional Council Board of Delegates on February 19, 2014.

PIEDMONT TRIAD
REGIONAL COUNCIL

EXECUTIVE SUMMARY



Triad Tomorrow, the Piedmont Triad Comprehensive Economic Development Strategy (CEDS), serves as the foundational guide for coordinating economic development activities throughout our 12-county region. The CEDS is designed to help stakeholders form partnerships to leverage existing resources to help revitalize communities throughout our region. Building on existing regional and local economic development plans, the expert opinions of nearly 80 CEDS Advisory Group members, and input from hundreds of citizens across the region through sustainable community planning efforts, *Triad Tomorrow* strategies focus on supporting collaboration among local and regional stakeholders within the economic development community, private industry, educational institutions, local government, foundations and the private sector. The CEDS is a responsive and flexible five-year strategic economic development plan, designed to be easily adjusted to meet the changing needs of communities throughout the region.

The Piedmont Triad Regional Council undertook development of *Triad Tomorrow* as part of the statewide *NC Tomorrow Initiative*, which aims to create a more uniform, coordinated approach to economic development planning across our state. In this initiative, led by the North Carolina Association of Regional Councils, regional CEDS are developed by each of the 16 regional councils across the state, with the ultimate goal of combining them to create a statewide strategic plan. This CEDS will benefit communities in our region in three important ways:

- The CEDS highlights key priorities on which the region can work together to achieve significant results. By marshaling resources and fostering collaboration, local communities and regional organizations can make measurable progress in these critical areas.
- The CEDS identifies important regional interests. Communities seeking to advance projects in these identified areas can use the CEDS to demonstrate that their projects are not just of local concern, but support broader regional interests.
- The CEDS is to be combined with those of the other regional councils across the state, and then submitted to the Economic Development Administration (EDA) for approval. Upon approval, organizations in our region will be eligible to compete for assistance under EDA's public works program, economic adjustment program, and many of its planning programs.

Competitive Advantage & Leverage – Sectors of the Piedmont Triad's regional economy vital to our economic mix which are growing or emerging, and/or unique to the region. These include market clusters, entrepreneurship support systems and our quality of life. The primary goal related to competitive advantage and leverage is to build on and improve the economic sectors that are authentic to the Piedmont Triad region.

Regional Infrastructure – Fixed assets of the region including transportation, utilities, support systems, broadband and the natural environment. The primary goal related to infrastructure is to build on and improve the fixed assets of the region.

Vibrant Communities – Characteristics of communities with a high quality of life include local leadership, housing stock, and community amenities. The key goal of vibrant communities is to provide resources that support a high quality of life in the region.

Talent – The human assets of the region, including our workforce, education and healthcare systems and access to capital. The primary goal related to talent is to invest in the region's human assets and support systems.

The Piedmont Triad Regional Council has taken the lead role in developing the Piedmont Triad CEDS, however, it will take the concentrated energy, resources and knowledge of many strategic partners to accomplish the goals and complete the objectives and strategies outlined in the plan. The CEDS contemplates a five-year horizon (2014-2018), while recognizing that achieving the plan's goals will, in most cases, be more long term. The plan will require updates and renewal as its five-year term ends. This CEDS is a starting point, which takes the good work already being done in our region and moves it forward, bringing the public and private sectors together to continue to achieve great things. As the plan is implemented, it will be reworked, retooled and refined, to better reflect the economic development goals and aspirations of our region, now and in the future.

Summary of Triad Tomorrow Goals & Objectives

Competitive Advantage & Leverage

GOAL: Build on and improve sectors of the Piedmont Triad's regional economy which are vital to our economic mix, are growing or emerging, or are unique to our region.

- ☐ **Objective 1: Assess and affirm the most promising urban and rural industrial clusters of the region.**
- ☐ **Objective 2: Develop select low location-quotient areas of opportunity in the region.**
- ☐ **Objective 3: Develop "Talent Clusters" through education, mentoring and internship programs.**
- ☐ **Objective 4: Develop collaborative economic development processes.**
- ☐ **Objective 5: Establish a strong focus on entrepreneurship & self-sustaining economic development efforts.**

Regional Infrastructure

GOAL: Build on and improve the fixed assets of the region – transportation, utilities, connectivity, healthcare, support systems and the natural environment.

- ☐ **Objective 1: Expand the reach and increase the upload/download speeds of broadband internet service throughout the region.**
- ☐ **Objective 2: Enhance transportation options.**
- ☐ **Objective 3: Maximize the efficiency of public utilities and solid waste management efforts.**
- ☐ **Objective 4: Encourage reduced energy use.**
- ☐ **Objective 5: Prepare industrial land for development.**
- ☐ **Objective 6: Encourage increased healthcare facility access.**

Vibrant Communities

GOAL: Provide opportunities for a high quality of life in communities throughout the region.

- ☐ **Objective 1: Enhance the vitality of the region's downtowns.**
- ☐ **Objective 2: Promote greater connectivity among local farms and with the urban core.**
- ☐ **Objective 3: Promote greater community connectivity.**
- ☐ **Objective 4: Develop connections in and among communities for cultural & recreational facilities & programming.**
- ☐ **Objective 5: Foster the efficient and sustainable use of land resources to increase the benefits and reduce the costs of future growth.**

Talent Strategies

GOAL: Invest in and develop the human capital of the region – the youth, workforce, disenfranchised, and those with underdeveloped capacity.

- ☐ **Objective 1: Promote excellent baseline education.**
- ☐ **Objective 2: Provide accessible and affordable supplemental education for workplace engagement.**
- ☐ **Objective 3: Develop greater levels of economic capacity through greater educational attainment, more knowledge, and networked relationships.**
- ☐ **Objective 4: Promote increased civic engagement.**
- ☐ **Objective 5: Encourage the Inclusion of Prosperity-Enhancing Components Beyond Wages in Economic Development Recruitment and Local ED Contracts**

COMPETITIVE ADVANTAGE & LEVERAGE STRATEGIES

GOAL: Build on and improve sectors of the Piedmont Triad's regional economy which are vital to our economic mix, are growing or emerging, or are unique to our region.

☐ **Objective 1: Assess and affirm the most promising urban and rural industrial clusters of the region.**

Urban Industry Clusters

- The Aviation Cluster – Takes advantage of numerous manufacturing, maintenance and service growth opportunities in a variety of airplane-related industries. HondaJet (design and construction), TIMCO and Cessna (airplane maintenance), and the logistics strength of FedEx provides an excellent area of focus.
- The Warehouse/Distribution/Logistics Cluster – Though diminished, the Piedmont Triad still has a very strong manufacturing component, has significant interstate and four-lane highway capacity, and is geographically well-positioned. This cluster development will be largely dependent on the relative strength of manufacturing and continued access to well-developed shipping modes.
- The Hospitality/Tourism Cluster – One of the greatest economic strengths of our region's urban core areas. Though often given little notice, this cluster is a powerful economic generator. Guilford County is the third largest tourist county in North Carolina, built largely on the strength of the High Point Furniture Market, the Koury Center/Sheraton Four Seasons, and events at the Greensboro Coliseum Complex. This cluster still has ample room for future growth.
- The Bio/Nano Sciences Cluster – The Joint School of Nanoscience and Nanotechnology (NC A&T/UNCG) in Greensboro and the Wake Forest Innovation Quarter in Winston-Salem will provide the Piedmont Triad with both education and industry access to two areas of science that will be huge areas of growth in the future. Though their current economic impact is relatively small, prospects for each are excellent.
- The Finance and Insurance Cluster – With a large presence in the Piedmont Triad, the biggest area of jobs is in call center operations, where CitiCard, BB&T, Bank of America and others have regional operations sites.
- The Healthcare Cluster – The Piedmont Triad's wealth of hospitals and healthcare facilities (supported by an aging demographic) will provide a real source of direct jobs and related services.
- The Advanced Manufacturing Cluster – Highly technical machines and processes (e.g. 3-D printing, robotics)

Strategies

1. Affirm the land use, road reconfiguration and airport business plans and projections with the PTI Airport Authority and all adjacent jurisdictions. Focus on:
   a) Just-in-time manufacturing
   b) Warehousing/Distribution/Logistics
   c) Aviation design and manufacturing
   d) Aviation maintenance and repair
2. Explore opportunities for community college, university and private sector engagement and technology transfer
   a) Wake Forest Innovation Quarter (formerly called the Piedmont Triad Research Park)
   b) Joint School of Nanoscience and Nanotechnology
3. Engage local hospitals, college nursing and public health programs, community colleges, K-12 and other relevant parties to begin a comprehensive healthcare training program for the region.
4. Initiate a Disney-style world-class customer service training program at select area high schools. Provide training in superior ways to handle public interaction applicable to success in event management, facility management, restaurant operations and management, and call center operations.

Rural Industry Clusters

- The Agriculture/Tourism Cluster – Though our rural communities still feel the diminished income effects from significant decreases in traditional tobacco farming, **agriculture continues to be the most prominent source of private sector income for rural counties in the Piedmont Triad**. Agriculture – in its many forms – is a universal cluster for the rural counties of the Piedmont Triad. The emphasis on local, healthy food choices among many residents – urban and rural – is providing opportunities for farmers, growers and ranchers. New and revived efforts to promote farmers' markets, collectives and co-ops are finding success. Agri-tourism is producing an alternate revenue stream for some farmers. And viticulture and micro-breweries are finding their stride across the rural landscape of the region.

Strategies

1. Create Food Policy Councils in each county in the Piedmont Triad. Assess the marketplace for growth opportunities in food production. Principal areas to investigate:
   a) Farmers' Market opportunities.
   b) Farmer/grower/rancher co-ops and collectives of same-product producers, principally for food processing or unique product marketing (e.g. Purple Sweet Potatoes).
   c) Co-ops and collectives for multi-line production, largely serving restaurants and farm-to-home delivery.
   d) Access supply chain expertise to develop distribution networks for all product/processes.
2. Assess the market for rural tourism demand. Determine demand for bed and breakfast, rural "dude ranch" equivalents, and NC wine country day trips and overnight stays.
3. Develop a partnership with NC Cooperative Extension and home food processing experts to mentor willing and able home cooks to develop more local food products for the market. (e.g. Jenny's Pickles).
4. Assess the viability of developing fish hatchery and processing facilities.
5. Explore opportunities to develop alternative energy technologies (e.g. biomass, solar).

☐ **Objective 2: Develop select low location-quotient areas of opportunity in the region. $$$**

Related to the concept of cluster economic development is the practice of measuring the Location Quotient (LQ) of an industry to gauge the level job activity compared to other industries. The LQ reflects the percentage of a region's individual industry cluster employment compared with the cluster's total employment nationally. A value over 1.0 indicates a concentration higher than the national average. The intent is to identify and measure areas of growing cluster strength. Industrial clusters included in local and regional economic development plans in the Piedmont Triad reflect the areas of advantage cited for expansion and leveraging. Some sectors with low LQ scores have enough critical mass or perceived potential for growth that they are still deemed worthy of development.

- The Arts Cluster – The Arts Cluster provides both economic activity and community vitality to all areas of the region – urban and rural. Largely operated as non-profit organizations, arts groups still provide some level of employment for thousands of Piedmont Triad residents.

  Strategies
  1. Access current arts and performance studies to determine opportunities for artistic business opportunities.
  2. Create a database and map of performance and gallery venues.
- The Advanced Manufacturing Cluster – The Piedmont Triad has a proud heritage of manufacturing – was once a dominant manufacturing power – and to this day still carries a large manufacturing level of output. From four of the largest tobacco companies in the U.S., to the largest denim and textile manufacturers in the world, to one city (High Point) once being simultaneously the furniture and hosiery capitals of the world, to every town in the region having a mill as a central formative ingredient, manufacturing has been at the core of the region's development. However, advanced manufacturing is a different animal. It doesn't rely on a ready supply of semi-skilled, inexpensive labor. Instead, it largely relies on highly technical machines and processes that take a substantial amount of education and training to operate. Assembly jobs that call themselves "advanced" manufacturing because the item being made has a microchip in it does not meet the definition. Where truly advanced manufacturing can be put into place, it is a positive economic development strategy.

  Strategies
  1. Focus manufacturing efforts on targeting processes and products that use techniques that are new and different from generations earlier or those commonly used in low-cost foreign operations. Migrate away from products and processes that are simple and labor intensive and can easily be displaced by cheaper competition.
  2. Incorporate technological advances such as 3-D printing and robotics into the mix of producing capacity.
- Green Industries Cluster – Green industries provide the opportunity for multiple benefits for the Piedmont Triad region. One advantage is employment for those working in the arena – from research to installations to manufacturing – green industry can provide benefit. Fuels produced locally support local businesses; green fuels aid in air quality efforts. Recycling takes pressure off of landfill capacity stresses. A more focused green industry (e.g. energy) will help develop this talent cluster.

  Strategies
  1. Develop energy/fuel training and processing capacities.
     a) Assess the viability of co-operative biofuel processing. Develop training curricula at local community colleges and NC Cooperative Extension offices for biodiesel (e.g. algae) and other renewable energy (e.g. solar energy).
     b) Apply for grant assistance to establish and develop the program (e.g. Bio-Refinery Assistance Program).

2. Expand the business opportunities behind recycled waste and recycled products.
   a) Assess the viability of recapturing value from the waste streams of recycled products.
   b) Initiate discussions for relocation or expansion of companies repurposing recycled waste into commercial products.
3. Evaluate the potential for geothermal energy use in the region. Because of moderate (nearly constant) year-round shallow ground temperatures, geothermal heat pumps might be widely suitable for both cooling and heating.
4. Retool current and former manufacturing operations to become green industry component manufacturers for wind, solar and biomass technologies (see "*Renewable Energy in North Carolina: The Potential Supply Chain*", Debbage, August 2008).

☐ **Objective 3: Develop "Talent Clusters" through education, mentoring and internship programs.**

One of the keys to success for communities in our region is their ability to develop intense core bases of knowledge and the practical skills necessary to apply this knowledge to new and expanding growth sectors. Developing such talent clusters will provide potential opportunities for creation of true industry clusters in each area of expertise. This strategy will also create the talent base necessary to attract industries to the region to take advantage of such a remarkable asset. Aviation, Hospitality & Tourism, and Bio- & Nano-Sciences are good examples of industrial clusters that would greatly benefit from focused education, knowledge development and training efforts. These industries have the distinction of also being recognized as talent clusters, where increased individual capacity would likely lead to greater industrial cluster capacity.

Strategies

1. Develop or expand curricula in selected industrial clusters that benefit from industry-specific education or training.
   a) Provide increased access to Aviation maintenance training.
   b) Create greater access for high school students to engage a wide swath of Hospitality/Tourism education and training.
   c) Develop greater educational capacity in Bio and Nano Science higher education. Create a pathway for high school students to access the field.
2. Develop or expand curricula in 3-D Printing.
   a) Develop and expand training at community colleges followed by high schools and universities
   b) Incorporate existing industry and entrepreneurial exposure into the 3-D printing mix.
   c) Promote talent cluster capacity in relevant industry channels.
3. Develop or expand curricula in Robotics.
   a) Begin robotics training at community colleges and within university engineering programs.
   b) Introduce high school students to the process.
   c) Promote talent cluster capacity in relevant industry channels.
4. Develop or expand curricula in Solar Energy.
   a) Expand solar instruction at community colleges to dramatically increase the number of individuals licensed to install and maintain solar panels and projects.
   b) Provide introductory education in solar power at the K-12 level and encourage the addition of solar power within college and university curricula.
   c) Establish a leadership position in solar power implementation by encouraging local governments, school boards, non-profits and the business sector to install solar arrays on rooftops.
5. Develop or expand curricula in Application Development (Coding).
   a) Explore K-12 options with organizations like Code.org to expand computer science and coding education.
   b) Create curricula in community colleges and higher education for application development.
   c) Encourage mentor-led "hackerspace" type of coding education.
6. Foster development of Talent Clusters around Local Expertise.
   a) Promote the business opportunities in unique handmade products (e.g. furniture, quilts, musical instruments).
   b) Support business development and business expansion around local food products (ex. Ms. Jenny's Pickles, Moravian Cookies and Sugar Cake, Lexington-style BBQ).

☐ **Objective 4: Develop collaborative economic development processes.**

Strategies

1. Assess the current legal and legislative status of inter-jurisdictional agreements and legislation

a) Review current legislation and affirm the extent of collaborative opportunities that are available for projects like jointly-developed business parks.
b) Educate local elected officials on the legal opportunities current legislation allows for jurisdictions to partner with others for economic development purposes.

2. Evaluate the interest in and the opportunity for inter-jurisdictional business parks.
   a) Open discussion for infrastructure needs
   b) Facilitate development of inter-jurisdictional plans and documents among committed parties.
3. Maximize the economic development potential of the Piedmont Triad International Airport.
4. Establish rural partnerships to provide for scale-appropriate business parks.
5. Investigate urban/rural partnerships using less expensive rural land and urban amenities as a means for collaboration.

☐ **Objective 5: Establish a strong focus on entrepreneurship & self-sustaining economic development efforts.**

Strategies

1. Assess our region's current practices and capacity for entrepreneurial mentorship and internship opportunities.
   a) Identify the overall supply of, and demand for mentorship and internship opportunities, and placing special emphasis on the needs of traditionally underserved populations and newer immigrant populations.
   b) Develop an asset map and matrix of active entrepreneurial initiatives, programs and resources throughout the region (e.g. Federal, State, regional, university, county and municipal resources).
2. Promote and support direct entrepreneurial **education, mentorship and internship** efforts.
   a) Pursue joint projects (e.g. startup competitions, business students assistance to small business owners) with Triad universities with strong entrepreneurship education programs (e.g. Wake Forest University, High Point University, Elon University, UNC Greensboro, N.C. A&T State University). One robust model for student teams assisting businesses is the Small Business Institute at East Carolina University, established in 1975.
   b) Increase the capacity and connectivity with youth-related entrepreneurship organizations (e.g. Junior Achievement, NC REAL Entrepreneurship, 4H, and Future Farmers of America) to build entrepreneurship capacity (e.g. Alamance County Schools twice-yearly student team participation in the *Hop on the Bus!* statewide high school business plan competition, and *Valley Academy* – a Yadkin Valley Regional Career Academy campus providing entrepreneurial programs for youth.
   c) Develop education, mentorship and internship programs in communities throughout the region, building on existing capacity, expanding talents and opportunities, establishing a mentorship and internship pool, and pairing entrepreneurs with mentors (e.g. Piedmont Triad SCORE Chapter) and internship opportunities.
   d) Provide for entrepreneurial education, mentorship and internship opportunities among traditionally underserved and immigrant populations.
3. Promote and support direct entrepreneurial **technical assistance** efforts.
   a) Develop plans to more fully utilize current assets and resources including: Small Business Centers at each community college, UNC-affiliated Small Business and Technology Development Centers, cooperative extension and rural development services, business incubators (e.g. *The Nussbaum Center for Entrepreneurship*), the state's Business Link (BLNC) on-line and 1-800 information and referral service and local SCOPE Chapters to increase entrepreneurial knowledge and capacity.
4. Promote and support the development of entrepreneurial-friendly **work spaces and facilities.**
   a) Explore the formation of new "Business Incubators" starting with best practices of successful incubators (e.g. *Nussbaum Center* in Greensboro, *STARWorks* in Star, *American Underground* in Durham, NC)
      i. Begin by forming the relationships and building the social capital and business support necessary to adequately coordinate resources before considering the need for and location of a physical facility.
      ii. Help selected entrepreneurs test their ideas and get expert guidance before they take their next step, whether getting first round funding, gaining admission to an accelerator, or bootstrapping their company to revenue.
      iii. Provide flex-space, co-working space and shared resources for start-up ventures.
      iv. Encourage the co-location of multiple resource agencies to provide on-site expertise (e.g. community college-affiliated small business centers, regional career academies, university-affiliated small business technology development centers, cooperative extension and rural development services).

v. Seek multiple revenue streams beyond tenant rents (e.g. The Triangle South Enterprise Center in Harnett County NC became a USDA Intermediary Lender for rural start-up companies).

vi. Set space occupation and program limits (e.g. 2 to 3 years) to encourage entrepreneurs to "graduate" and provide space for new start-up participants.

b) Explore with UNCG and other university partners the formation of a "Regional Business Accelerator" (e.g. The *American Underground* in Durham and Raleigh, NC, *Accelerating Appalachia* in Asheville, NC) to provide competitively selected entrepreneurs with intensive, expert counseling in the identification and formation of potential high-growth businesses, and provide connections with venture capital and angel investor groups.

c) Pursue development of affordable co-working spaces for individuals from a wider range of work engagement who could benefit by being in a creative environment with like-minded entrepreneurs

5. Promote and support entrepreneurial **business capital formation.**

a) Promote available NC business lending programs including U.S. Small Business Administration and U.S. Treasury programs administered through SBTDC and the N.C. Rural Center in partnership with NC banks.

b) Create more awareness of local venture capital and angel investment groups for entrepreneurs (e.g. *Inception Micro Angel Fund*, *Piedmont Angel Network*, Greensboro Chamber of Commerce "*Capital Connects*").

c) Create more awareness of crowd-sourced finance opportunities (e.g. *Kickstarter*, *Indiegogo*).

6. Explore development of, and support for a **regional resource wizard** to access entrepreneurship assistance.

a) Study and assess the Guilford County Resource Wizard as a model for the creation of a regional database of business assistance tools (e.g. federal, state, local) applicable to local businesses – providing data in one place and helping entrepreneurs avoid cluttered google searches.

b) Develop a similar Resource Wizard that identifies all the regulatory entities entrepreneurs may have to engage to start or expand a business in the region (e.g. NC Secretary of State; county health departments; planning departments).

REGIONAL INFRASTRUCTURE STRATEGIES

GOAL: Build on and improve the fixed assets of the region – transportation, utilities, connectivity, healthcare, support systems and the natural environment.

☐ **Objective 1: Expand the reach and increase the upload/download speeds of broadband internet service throughout the region.**

Strategies

1. Pursue rapid development of local implementation of the NC Next Generation Network (NCNGN). (Currently, Winston-Salem is engaged.)
2. Make other urban areas of the region aware of the program and encourage their engagement.
3. Build upon NC Broadband programs (BIP, Middle Mile, others) to bring high speed broadband to rural areas of the Piedmont Triad.
4. Establish local Wi-Fi in downtowns and heavily trafficked areas in each community (e.g. Lexington).

☐ **Objective 2: Enhance transportation options.**

Strategies

1. Complete the urban beltways around Greensboro and Winston-Salem.
   a) Winston-Salem Beltway (32.4 miles).
   b) Greensboro Urban Loop (39.3 miles).
2. Complete the planned Interstate and NC highway improvements.
   a) I-73 through Rockingham, Guilford, Randolph and Montgomery counties.
   b) I-74 through Surry, Stokes, Forsyth, Guilford, Randolph and Montgomery counties.
   c) NC Hwy 68 and 220 in Rockingham and Guilford counties.
3. Expand regional (PART) and local mass transit system and funding options.
   a) Provide easier connectivity between local mass transit options (including consideration of more shared-use park and ride sites like shopping centers and other places with overbuilt parking) and PART routes.
   b) In the urban core, provide more mass transit (i.e. bus) options for others who are not using the buses for job-dependent reasons (ex. Trips that provide mobility and remove cars from the streets).
   c) Encourage the facilitation of new local mass transit system & funding options.
4. Encourage the use of car-sharing and ride-sharing services.
   a) Explore car sharing services to allow drivers to rent from each other or rent on a short term basis (as little as an hour). This reduces the need for expensive car ownership, reduces the number of cars on the road and provides greater utility of cars that are in service. Existing companies include Getaround, car2go and Zipcar.
   b) Explore peer-to-peer ride sharing service opportunities with existing drivers such as crowd-sourced, smartphone-generated taxi service to a smartphone enhanced fast-paced rider board. Existing companies include Lyft and Sidecar.
5. Increase lower-cost air transportation options.
   a) Continue the existing efforts to pursue discount airline contracts with PTIA.
   b) Revisit the Skybus business model with local investors and those who represented other hub cities.
   c)

☐ **Objective 3: Maximize the efficiency of public utilities and solid waste management efforts.**

In some municipalities, up to 30% of the town's budget is spent on treating and pumping water and wastewater. Landfill development is extremely expensive and takes up to a decade to get through environmental and other permitting processes. Trucking trash to distant sites is not only a violation of optimal sustainability practices, it is expensive and leaves the municipality with few affordable solid waste disposal options. Addressing these issues proactively cuts municipal costs both today and in the long term.

Strategies

1. Optimize existing landfill space to maximize its lifespan.
   a) Increase recycling efforts.
      i. Make free recycling a standard part of solid waste collection plans with private trash haulers.
      ii. Invest in roll-out recycling cans to make recycling easier.
      iii. Pursue aggressive contracts with recycling sorters to maximize the types of containers and products recycled.
      iv. Provide educational programs for the communities about recyclable items and recruit corporate partners to support marketing campaigns and to explore waste for profit opportunities (e.g. waste to energy technology).
      v. Add clearly marked, easy to use recycling containers in public spaces, buildings, schools and universities.
      vi. Introduce recycling contests in local schools and community centers.
      vii. Engage initiatives like Freecycle to reuse local assets and reduce waste.
2. Begin the process of studying long-term solid waste disposal options.
   a) Explore new technological solutions to solid waste landfill options (e.g. anaerobic digestion, gasification, plasma).
   b) Pursue the retrieval and development of landfill-sourced biofuels.
   c) Identify regional collaborative solutions to solid waste management.
3. Pursue water and wastewater reduction and efficiency programs.
   a) Explore options for business programs (e.g. plumber certification) and citizen programs (e.g. replacement of spigots, showerheads and toilets with low-flow options).
   b) Investigate a tiered water use metering system to reduce water use (e.g. promote use of the UNC School of Government Environmental Finance Center "NC Water and Wastewater Rates Dashboard" - http://www.efc.sog.unc.edu/reslib/item/north-carolina-water-and-wastewater-rates-dashboard).
   c) Establish audit systems to reduce leaks in water and wastewater systems in the Piedmont Triad.
   d) Study the possibilities of water reuse programs.
      i. Gray water collection and reuse for both utility providers and end-users, especially larger private sector industries.
      ii. Roof runoff collection systems.
      iii. Rainwater barrel collection programs for home lawn and garden use.
4. Conduct a region wide water and wastewater system assessment to identify existing and potential future service areas, treatment and delivery capacities, and system demands and maintenance requirements.
5. Pursue a region wide water and wastewater system funding initiative to identify top-priority needs and assist local governments to apply for and administer grant funds (e.g. Community Development Block Grant, Clean Water Management Trust Fund, DENR Water Infrastructure Fund, Appalachian Regional Council) and implement projects.

☐ **Objective 4: Encourage reduced energy use.**

Options for alternate energy sources, diverging from traditional sources, have grown immensely in the last ten years. Taking pressure off the power grid reduces the need for additional electric infrastructure construction and costs, reducing the need for rate hikes. Cleaner air and more dollars kept local are nice side-benefits.

Strategies

1. Adopt programs to promote reduced household energy use to retain more dollars in the community.
   a. Provide for weatherization, CFL replacement bulbs and other energy reduction measures.
   b. Support legislation to provide for net metering of solar power.
   c. Engage in programs that provide for auto plug-in recharging sites.
   d. Support additional biking and walking options to reduce vehicle trips and improve public health.
2. Encourage local governments and school boards to adopt sustainability policies and conduct audits covering water, energy and vehicle use.

☐ **Objective 5: Prepare industrial land for development.**

Though diminishing in number, large industrial projects still materialize at times. Having construction-ready sites available to meet this demand has merit. However, new sites are only a part of the picture. The Piedmont Triad is a twelve county region whose communities were almost universally started around the development of a local mill. As the mill towns grew, other economic activities developed. But nearly every community still has significant vestiges of its former manufacturing buildings and footprints which serve as valuable assets to be redeployed and repurposed.

Strategies

1. Seek local government accommodation for the development of shovel ready industrial sites.
   a) Develop an inventory of potential industrial sites.
   b) Insure that proper zoning, special use permits, watershed regulations, permitting requirements and any other potential obstacles are preempted so that the site development can move quickly when needed.
   c) Create a regional, on-line geographic information system identifying shovel ready industrial sites.
2. Seek local government accommodation for the redevelopment of existing shuttered or underutilized industrial sites.
   a) Build on and refine the existing PTRC regional brownfield inventory to identify shuttered or underutilized industrials sites and buildings throughout the region.
   b) Perform a baseline assessment to identify the sites and buildings with the greatest potential and capacity for redevelopment (e.g. >5,000 square feet building space, >2 acres of reclaimable land)
   c) Build on the existing PTRC regional brownfields assessment program to identify top-priority brownfields sites in each community to be assessed, cleaned up and redeveloped.
3. Seek inter-jurisdictional collaboration on site development.
   a) Identify the infrastructure needs of potential sites and whether these needs can best be met by a neighboring jurisdiction.
   b) Discuss cost sharing/tax (and utility) revenue sharing possibilities with these potential partners.
   c) Identify the mutual benefits necessary to enter into an inter-jurisdictional joint development agreement.
4. Assess the desirability, necessity and feasibility of public/private partnerships for business/industrial park development.
   a) Enter into discussions with private developers of potential industrial sites to better understand the needs of each individual site to make it construction-ready.
   b) Where legal, advisable and crucial to the successful development of a site, consider options for public investment (preferably from a loan pool) like grading and utilities to ready the site.
   c) For more densely planned development sites, consider the use of Tax Increment Financing (TIF) as a public infrastructure financing assistance tool.
   d) For redevelopment in lower income areas, consider the use of New Market Tax Credits to assist with the financing.
   e) Investigate other special financing options (e.g. historic preservation tax credits, mill rehab credits, tax increment financing) to provide assistance.

☐ **Objective 6: Encourage increased healthcare facility access. $$$**

Treatment services are expanding beyond the traditional hospital/emergency room/private doctor office paradigm. Providing services in closer proximity to where people live and work in a speedier fashion is a better course of action.

Strategies

1. Support increased use of clinics to provide accessible healthcare assistance. Clinics tend to provide quicker and more accessible treatment services as opposed to major medical centers, especially in less densely populated areas.
2. Create public/private/healthcare/non-profit coalitions to deliver additional healthcare services. Community coalitions that include hospitals, county governments, county health and social services departments, county schools, doctors, dentists, nutritionists, psychologists, drug stores (and any other entity that provides or funds any level of healthcare services) are encouraged to join in an initiative that will offer maximum preventative health and treatment services while avoiding expensive duplication and lost opportunities.

VIBRANT COMMUNITIES STRATEGIES

GOAL: Provide opportunities for a high quality of life in communities throughout the region.

☐ **Objective 1: Enhance the vitality of the region's downtowns.**

Downtowns are the windows to the soul of our region's communities. The appearance of healthy commercial and social activity is central to making a town feel positive about itself and strongly impacts how outsiders view the community.

Strategies

1. Initiate façade and beautification programs for downtown buildings, sidewalks and streetscapes.
   a) Establish façade and awning loan or grant programs.
   b) Pursue budgeted town streetscape improvements (e.g. light posts, hanging plants/flowers, benches).
   c) Consider a downtown service district fee to provide specific additional services (e.g. street cleaning, trash collection, repair, security).
2. Promote engaging community activities and cultural offerings.
   a) Create or expand downtown arts or food festivals highlighting offerings from local businesses.
   b) Establish regularly scheduled downtown "days" or "nights" with music, food, business bargains and festivities.
3. Support private sector activities and investments.
   a) Consider permit fee reductions for downtown up-fits and infill development.
   b) Encourage efforts to promote downtown businesses (e.g. downtown directories, maps, online advertising).
   c) Work with non-profit organizations to fill long-term unleased space to keep unfilled space at a minimum.
   d) Encourage local business shopping promotions.
4. Access outside assistance (e.g. NC STEP & NC Main Street Programs for small towns).

☐ **Objective 2: Promote the agricultural economy with greater connectivity among local farms & urban centers.**

Strategies

1. Create Food Policy Councils in each county of the Piedmont Triad.
   a) Ensure broad levels of participation, including not only the sectors listed above, but organizations that address issues of food sustenance and hunger (local schools, social service organizations, etc.).
   b) Facilitate cooperation among councils to maximize their impact.
2. Develop local Farmers' Markets.
   a) Initiate a process (e.g. led by the local Food Policy Council) designed to build or expand a market using public and private resources.
   b) Contact potential agricultural participants to gauge interest and a preferred scope of operations (e.g. days, hours).
3. Develop a Region-wide Local Food Network.
   Piedmont Grown, a local food network based in Rockingham County, provides a template for successful operation, bringing fresh produce from rural areas to the urban core.
   a) Perform an assessment of market supply/demand and opportunities.
      i. Identify sources of agricultural products for which there is household or restaurant demand.
      ii. Identify potential customers and establish means of contact.
      iii. Identify places and method of delivery.
   b) Explore the possibility of forming a region-wide distribution system that systematically brings fresh produce and farm products from the farthest reaches of the Piedmont Triad (Caswell, Surry, Montgomery counties), distributes some product on its route, and picks up additional product on its way to its final destination at the centrally located Piedmont Triad Farmers Market in Colfax (at the Guilford/Forsyth county line on I-40) and other urban markets.
4. Establish Regional & Local Food Processing and Distribution Co-ops and Collectives.
   One current example that is working and provides a model to emulate is Pilot Mountain Pride, which provides central warehousing and distribution for a variety of products at one convenient site.

a) Identify the production capacity of existing or potential agricultural products (e.g. grape production for wine, purple sweet potatoes, hops for beer).
b) Work with current processors to expand capacity – or create a new processing facility as necessary – to provide a local bulk market for agricultural products (e.g. a former grist mill or grain elevator, grape processing or winery; Biofuels processing; Inland fish processing.)

☐ **Objective 3: Promote greater community connectivity.**

Connectivity includes both physical access to resources and services and building relationships among people within a community. By focusing on making their community more welcoming to newcomers, areas with more static populations and less lifestyle mobility (e.g. smaller towns and rural communities) can successfully assimilate new residents, maintaining their population and adding new ideas and richness into their community.

Strategies

1. Enhance pedestrian, biking and trail options.
   a) Add connective pieces to existing infrastructure (e.g. sidewalks, trails, bike lanes) to provide safe and convenient pedestrian and bicycle transportation options between residential areas and work, school and commercial centers in communities.
   b) Pursue opportunities (e.g. PARTF, PART) to access funding for pedestrian and bike system expansion.
   c) Create community bike-share programs that provide a healthy transit option, reduce automotive traffic and add a sense of vibrancy to communities.
2. Pursue greater public transit options for dependent and non-dependent riders (especially in and among urban centers).
   a) Increase access, connectivity, reliability and timeliness to enhance public transit for dependent riders and to encourage non-dependent riders to elect using public transit systems.
   b) Explore electric or bus trolley systems for downtown mobility in urban centers to provide an attractive transit option and enhance economic development opportunities in downtowns.
   c) Pursue alternative public transit funding opportunities (e.g. PART).
3. Increase social connectivity, including engaging diverse communities, newcomers and young and elderly adults.
   a) Encourage communities to provide inclusive community outreach and engagement efforts in all neighborhoods that build relationships, help to identify and affirm a diversity of interests, and encourage everyone to contribute to the good of the community.
   b) Establish community-wide events to engage and celebrate the diversity of the entire community.

☐ **Objective 4: Develop connections in & among communities, cultural & recreational facilities & programming.**

Strategies

1. Pursue development of after-school shared-use libraries.
   a) Determine local community demand for library services.
   b) If demand warrants, form a partnership between the public school system, the local library system and the community desiring library service to develop the plan for any construction addition or modification; additional library books and resources (computers, etc.); and operational costs (utilities, librarians).
2. Pursue the development of shared-use parks and athletic fields.
   a) Determine local community demand for athletic field, pool, athletic court and park space.
   b) If demand is sufficient, form a partnership between the public school system, recreational leagues, neighborhood groups, other interested parties and the community desiring athletic fields and parks to develop the plan that includes land acquisition, facility construction and facility operation.
3. Pursue the development of Public/Private/Non-profit partnerships for community centers, arts and performance facilities, youth, teen and elderly centers.
   a) Gather community input to identify facility wants and needs.
   b) Establish working committees to find paths of least resistance to procure potential funding sources to meet the goals brought forth by the community assessment.
   c) Create beneficial coalitions among parties to address the funding and usage of each facility.

☐ **Objective 5: Promote the efficient and sustainable use of land and resources.**

Community sustainability is multi-faceted and comprehensive, ranging from how the community is built to day-to-day individual life choices. It is a key ingredient to community vibrancy.

Strategies

1. Foster the efficient and sustainable use of land resources to increase the benefits and reduce the costs of future growth.
   a) Focus most new development and infrastructure investments in existing communities where services and infrastructure already exist.
   b) Pursue growth policies and regulations to support the efficient use of existing water, sewer and transportation infrastructure.
   c) Identify and protect environmentally sensitive conservation areas and habitats and farm and forest lands.
   d) Encourage infill, reuse and redevelop of existing urban areas before developing rural farm and forest lands.
   e) Encourage new development to be designed to accommodate future re-use and redevelopment.
   f) Encourage new development that balances economic, social and environmental community interests.
   g) Foster the assessment, clean-up and redevelopment of old commercial and industrial sites (i.e. brownfields).
   h) Encourage transportation, water & sewer infrastructure plans that support and incorporate sustainable community development patterns and principals.
   i) Encourage land development plans and ordinances that support proposed road functions and incorporate sustainable community patterns & principles.
   j) Incentivize and streamline the approval process for the kind of sustainable development patterns communities decide they want in the future.
2. Build vibrant, lively and attractive neighborhood & town centers with a mix of higher-density uses in areas communities identify as most appropriate.
   a) Foster functional, efficient and aesthetically-pleasing design that supports economic, environmental and social interests.
   b) Identify top-priority opportunity areas for redevelopment of under-utilized sites into mixed-use reinvestment areas and corridors which are accessible by multiple modes of transportation.
   c) Support site planning for redevelopment areas in our region's communities to serve as sustainable reinvestment pilot projects.
   d) Pursue flexible land use policies and regulations allowing higher densities and a wider mixture of uses in redevelopment areas and town centers.
3. Provide more housing choices with greater access to jobs and services.
   a) Incentivize affordable housing options, especially along major transit corridors.
   b) Foster collaborative partnerships between public & private sectors in the provision of affordable housing
   c) Encourage development of housing, jobs and services in close proximity to one another.
4. Pursue Farmland and Open Space Protection.
   a) Support the Voluntary Agricultural District program.
   b) Support land conservation and open space protection efforts.
   c) Identify programs that protect land and water quality in rural areas (e.g. WHIP, EQIP, NC-WRP) and insure they are in place in the region.
5. Promote LEED and green construction support.
   a) Consider LEED-affirmed permit fee rebates.
   b) Allow reduced permit fees for green energy installations (e.g. solar, geo-thermal).
   c) Provide information, resources and best practice advice.
6. Provide connectivity planning and support.
   a) Connect sidewalks, trails and bike paths to provide a more complete network of transportation choices – especially among major residential areas, employment and commercial areas, and community landmarks and gathering areas.
7. Promote sustainable practices among citizens, local businesses and governmental organizations.
   a) Pursue programs to promote reduced household, office and industrial energy use by providing weatherization, CFL replacement bulbs and other energy reduction measures.
   b) Support additional biking and walking options to reduce vehicle trips and improve public health.
   c) Engage in programs that provide for auto plug-in recharging sites.

d) Pursue water and wastewater reduction and efficiency programs.
   i. Provide low-flow replacement spigots, showerheads and toilets.
   ii. Investigate a tiered water use metering system to reduce water use.
e) Study water reuse programs.
   i. Gray water collection and reuse.
   ii. Roof runoff collection systems.
   iii. Rainwater barrel collection programs for home lawn and garden use.
f) Encourage local governments and school boards to adopt sustainability water, energy and vehicle use policies.
g) Enhance and encourage local recycling efforts.
   i. Make free recycling a standard part of solid waste collection plans with private trash haulers.
   ii. Invest in roll-out recycling cans to make recycling easier.
   iii. Pursue aggressive contracts with recycling sorters to maximize allowable recycling container and product types.
   iv. Provide community education program concerning allowable recyclable items.
   v. Add clearly marked, easy to use recycling containers in public spaces and buildings.
   vi. Introduce recycling contests in local schools and community centers.
   vii. Engage initiatives like Freecycle to reuse local assets and reduce waste.

TALENT STRATEGIES

GOAL: Invest in and develop the human capital of the region – the youth, workforce, disenfranchised, and those with underdeveloped capacity.

☐ **Objective 1: Promote excellent baseline education.**

Early childhood education has been proven to provide more benefit to educational achievement than any other measure. Children that are poor readers at the end of the 3rd grade rarely make up the gap later in school. Remedial education is expensive and less effective than early childhood education. Inclusion of technology into the learning process reduces the gap in educational achievement and introduces many students to mainstream technology that they might otherwise not experience. School budgets are overwhelmed with more demand for services and capital needs than can be met through traditional sources of revenue. Schools must find other ways to impart education that is something more than some derivation of the same methods little different than a century ago. Technology and greater utilization of buildings that already exist are two potential options to consider.

Strategies

1. Support greater 4-star and 5-star childcare opportunities.
   a) Develop a consortium of foundation, education and community organizations to develop greater high quality childcare access.
   b) Introduce quality childcare bonus stipulations in economic development incentive contracts. (Bonus incentive for providing quality childcare, especially for lower-waged employees.)
2. Seek K-12 enhancements that provide more real world connectivity and uses limited resources more wisely.
   a) Migrate the educational methodology to include more technological components.
   b) Introduce different operational concepts that lower costs and reduce the achievement gap (e.g. consider year-round multi-track schools).
   c) Provide greater industry/high school connectivity for internship and post-high school opportunities.
3. Promote greater use of inclusion programs (e.g. ESL).
   a) Create a coalition of educators and adults with foreign language skills to provide greater English language adoption among school children.
   b) Develop an organized process for adults to attain a working ability to communicate in English.

☐ **Objective 2: Provide accessible and affordable supplemental education for workplace engagement.**

Strategies

1. Seek more internships and On-the-Job Training for greater education/industry connectivity.
2. Develop more mentoring programs.
3. Promote increased training-to-work efforts for the long-term unemployed with increased focus on individual situations and additional attention to current efforts.
   a) Identify individuals who have been unemployed for an extended period of time.
   b) Identify their talents and capacities.
   c) Identify the companies who have needs and identify the accompanying skill set required.
   d) Train to meet those needs.

Objective 3: Develop greater levels of economic capacity through greater educational attainment, more knowledge, and networked relationships.

Strategies

1. Focus efforts to develop individual capacity in two top-priority identified industrial clusters to achieve widely applicable talent cluster capacity.
   a) Healthcare: Engage local hospitals, college nursing and public health programs, community colleges, K-12 and other relevant parties to begin a comprehensive healthcare training program for the region.
   b) Tourism/Hospitality: Initiate a Disney-style world-class customer service training program at select area high schools. Provide training in superior ways to handle public interaction applicable to success in event management, facility management, restaurant operations and management, and call center operations.
2. Promote greater citizen achievement of a bachelor degree.

a) Expand the awareness and access to online degree completion.
b) Continue to emphasize "Degrees Matter" and other pro-degree initiatives.

3. Promote increased online/MOOC course involvement.
   a) Identify companies who need skill sets and knowledge that is well (or best) accessed through MOOC or other outside online education.
   b) Once collaboratively identified, suggest coursework to individuals who have the ability and proclivity to engage in such online education for employment or other workplace engagement.
   c) Promote free (or inexpensive) MOOC education as a viable educational alternative.
4. Create a culture of education throughout the region.
   a) To challenge and reverse generations of limiting formal education due to the desire and need to work in the region's mills and factories, create a consortium of foundation, non-profit, business and education representation to develop local plans for engaging each community to stress the importance of education.
   b) By using the same (or similar) structure, work through the local school systems to make home visits to affirm to parents and guardians the importance of children getting a solid education and to stress the critical necessity of their involvement in the process.
5. Create greater access to personal network and global connectivity.
   a) Provide speakers, demonstrations, movies, events and other means to open the eyes of local residents and children to both different domestic and foreign cultures and opportunities.
   b) Introduce Skype and similar technologies to residents and (supervised) children to develop friendships and connectivity.
   c) Take advantage of the connectivity and knowledge of newer members of the community.

Objective 4: Promote increased civic engagement.

Strategies

1. Encourage the re-formation and growth of participatory civic leadership organizations.
   a) Develop local initiatives pairing community members who have led civic and leadership development groups (e.g. Rotary, Lions, Ruritans, Jaycees) with young, rising leaders in the community to infuse these groups with newer ways of communicating and engaging in community transformation toward civic activism for the common good. Emphasize the inclusion of new and diverse members of the community.
   b) Identify top-priority community improvement projects for civic and leadership development groups.
2. Build more civic participation in K-12 education.
   a) Develop local processes for classroom assistance.
   b) Generate a process for pairing mentors in typically out-of-school arenas with interested students to introduce outside topics and develop non-curriculum subject knowledge.
3. Introduce community transformational processes and practices into communities.
   a) Explore the Communities of the Future "*Master Capacity Builder*" model.

Objective 5: Encourage the Inclusion of Prosperity-Enhancing Components Beyond Wages in Economic Development Recruitment and Local ED Contracts

Strategies

1. Expand the inclusion of explicit health care dollar amounts (or hourly contributions) in local economic development incentive contracts to provide for basic healthcare insurance coverage for employees and their families.
2. Include an allowance in local economic development incentive contracts (e.g. 10%) for incentivized companies to receive a match for their tax-deductible provision of transportation alternatives to help their employees get to and from work (e.g. bus, rail, vanpool, ride-sharing, etc.).
3. Include the provision in local economic development contracts for companies to receive a match (e.g. 50%) for providing 4-star and 5-star child care for their employees.

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