To learn more about the county’s current economic situation and to explore opportunities for economic development, leaders from Pennington County participated in the University of Minnesota Extension’s Economic Futures Workshop on Monday, July 13, 2015, in Thief River Falls, Minnesota. This report, summarizing the workshop, is presented in partnership with the EDA Center at the University of Minnesota-Crookston (http://www.edacenter.org/).

**WHAT IS AN ECONOMIC FUTURES WORKSHOP?**

The Economic Futures Workshop is designed to help community leaders look objectively at the state of their local economy. The workshop examines the interactions within an economy – among businesses and between businesses and consumers. Using information about how these linkages function, leaders can begin to understand the full implications of change on the local economy. The Futures Workshop can also help communities understand how economic development activities can affect the economy.

The three-hour Futures Workshop provided a profile of the Pennington County economy, an analysis of how ten selected industries interact, and a facilitated exploration and discussion of the ten industries.

**PROFILE OF THE CURRENT ECONOMY**

In 2014, there were 10,284 jobs in Pennington County.¹ The number of jobs grew steadily between 2000 and 2014, posting an overall 28 percent increase in the period. The number of jobs in Pennington County declined in two time periods (between 2001 and 2002 and between 2008 and 2009), both of which are consistent with national recessions. However, the rate of job losses in Pennington County during both of those time periods was far lower than the rate across Minnesota. Further, the number of jobs in Pennington County has grown, post-recession, at rates that far exceed state growth rates. Growth in the number of jobs in Pennington County has also exceeded national and industry trends.²

Chart 1 illustrates employment by industry in Pennington County.³ The largest industry is trade (including both retail and wholesale trade), employing 32 percent of the workforce in the county. The trade industry includes the major employer of DigiKey. Fourteen percent of jobs in the county are in the government industry. Government, from this data source, includes federal, state, local, and tribal employment. Thus, employment at the Seven Clans Casino would be included in the government industry.

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² Source: Shift-share analysis from ESMI (Economic Modeling System).
³ Source: IMPLAN (MIG, Inc.)
Employment by industry as compared to the average Minnesota county is shown in chart 2. Pennington County has a higher percentage of its employment in the trade, agriculture, and public administration industries. Pennington County has a comparatively similar-sized manufacturing industry, as compared to the average county. While Pennington County is lower than the average in some of the business and professional service industries, these industries were among the fastest growing in the county. The county added 383 professional and business services jobs between 2003 and 2013.4

Wages in Pennington County are lower than the Minnesota average. Pennington County’s average weekly wage in 2014 was $782. Minnesota’s average weekly wage was $992.5

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1 Source: EMSI (Economic Modeling System)
ANALYSIS OF INDUSTRIES

Ten industries were selected to be analyzed in Pennington County. The input-output model, IMPLAN, was used to conduct the analysis. The industries studied and discussed at the July 13th meeting were:

- Support Activities for Agriculture
- Poultry Processing
- Nursing and Residential Care
- Banks
- Accounting, Tax Preparation, & Bookkeeping
- Transportation Equipment Manufacturing
- Machine Shops
- Wholesale Trade
- Retail Trade – General Merchandise
- Amusement and Recreation

EXPLORATION AND DISCUSSION OF INDUSTRIES

After reviewing the current structure of the Pennington County economy, attendees were divided into groups to explore the economic interdependencies of the selected industries. Each group was assigned two industries and asked to address the following four questions:
1. What surprises you about this information?
2. What information favors this industry in the region?
3. What information works against this industry in the region?
4. What could be done to support this industry in Pennington County?

The small groups reported out to the full group their summary thoughts and considerations. (Notes from each industry discussion are provided in appendix one).

**KEY CONCLUSIONS**

Following the group discussion of each industry, the Pennington County workshop attendees took a straw vote on actions they could take to support industries in Pennington County. The actions selected for consideration were taken from the small group responses to question four above.

A common theme across all discussions was the need for workforce housing. All small groups mentioned increasing housing as a way to support industries in Pennington County. This is a known issue and the city council and county board are taking steps to address this need. Therefore, the selection of actions to support did not include housing.

Each attendee was invited to vote for up to two local action steps that could be taken to support local industries. The potential actions receiving the most votes were:

- Develop amenities to improve quality of life and attract new residents (14 votes)
  - Revitalize downtown (7 votes)
  - Build/develop a community center (6 votes)
  - Build/develop trails (1 vote)
- Increase the number of and support locally-owned and operated businesses (8 votes)
- Attract industries that support current industries (5 votes)
- Explore need for additional child care options for working parents (4 votes)

**ACTION STEPS**

At the conclusion of the workshop, attendees completed a workshop evaluation that included identifying potential future actions based on the information presented. Action items included:

- Support housing. Support recreation improvement.
- Push transportation. Amenities.
- Be more involved in community issues/problems.
- Stay involved. Explore additional business options for me. Use connected data for my current business.
- Engage other industries in discussion of how we can support each other - growth toward the future of TRF.
- Work with EDA to address issue and how to support ideas.
EXTENSION STAFF
The following University of Minnesota Extension staff participated in the planning, preparation, and presentation of the Economic Futures Workshop in Pennington County.

Brigid Tuck, Senior Economic Impact Analyst, Presenter
Rani Bhattacharyya, Extension Educator, Presenter
Gabriel Appiah, Community Economics Intern
Liz Templin, Extension Educator, Program Manager

APPENDIX ONE: SUMMARY OF INDUSTRY EXPLORATION AND DISCUSSION
During small group discussions, the participants answered the following questions about ten selected industries. The responses, shared with the large group, are summarized below. Following a large group discussion, participants could select ideas in a “straw vote” as potential items to explore further as related to economic development efforts. Items receiving votes are in bold. The number of votes is also listed. The straw vote was non-binding, just to get a sense of the group’s feelings at the end of the meeting.

Questions for Discussion
1. What surprises you about this information?
2. What information favors this industry in the region?
3. What information works against this industry in the region?
4. What could be done to support this industry in Pennington County?

Wholesale Trade
1. Surprises?
   a. Ripple effects seemed low, especially given the considerable amount of wages paid
2. Favors industry
   a. Wages and benefits are relatively high/good which supports the long-term stability of employees
   b. Pennington County is a strong agricultural community, which supports the agriculture-related wholesale trade businesses
   c. Airport is key to transportation needs
3. Against industry
   a. Transportation – need to be improved to handle more volume/freight
   b. Workforce needs
   c. Housing
4. Support?
   a. Attract supporting industries (for example boxing and packaging) (5 votes)
   b. Increase road capacity to move both people and freight (1 vote)
   c. Increase availability of rail transportation (1 vote)
   d. Explore opportunities for increased child care for working parents (4 votes)
Banking
1. Surprises?
   a. Wages were lower than most people expected
   b. Ripple effects were relatively high
   c. Legal services was one of the major expenditures by banks, but wasn’t showing up in the ripple effects, being supplied outside of county?
2. Favors industry
   a. Agriculture has been strong
   b. Thief River Falls has a diverse business sector, so banks can hold diverse portfolios and weather changes in one industry
3. Against industry
   a. Concerns about changes in one industry in the county
4. Support?
   a. No ideas were advanced

Machine Shops
1. Surprises?
   a. How small the industry is in the county
   b. Probably doesn’t reflect the individual person working in their shop
2. Favors industry
   a. Regional center
   b. Major manufacturing industries located nearby
   c. Creative people in the region
   d. More than just metal working, includes plastics, foam, etc.
3. Against industry
   a. Transportation
   b. Housing
   c. Industry may have an “image” problem
   d. Initial machinery investment is high
   e. Strong competitive forces – people with these skills are in high demand at DigiKey or Artic Cat
   f. Several machine shops located just outside of the county
4. Support?
   a. Explore financing options/incentives (3 votes)
   b. Promote image of industry
   c. Expand community college programs

Retail – General Merchandise
1. Surprises?
   a. The positive competitive share was pretty high
   b. We don’t talk about retail trade much here
2. Favors industry
   a. Local economy = jobs = new families = new workers
   b. Baby boomers may want to come in as employees to supplement retirement income
3. Against industry
a. Housing, already a housing shortage, and these are relatively low wage earners, which makes housing even more difficult
b. Workforce competition – so many open positions, workers can easily move, less incentive to excel in current position
c. Higher turnover means higher training costs
d. Online competition

4. Support?
   a. Continue to attract new residents
   b. Affordable housing
   c. Work to address work ethic issues, encourage workers to say in 1 place (1 vote)

Nursing and Residential Care
1. Surprises?
   a. Output versus wages
   b. Relatively low wages
   c. Relatively low ripple effects
2. Favors industry
   a. Sandford is a regional health care hub in Thief River Falls
   b. EMS is excellent
   c. Northland is providing training and education
3. Against industry
   a. Wages relatively low
   b. Job turnover
   c. Housing to attract and retain workers
   d. Shortage of beds, especially with baby boomers
4. Support?
   a. Housing availability
   b. Services to support employees (1 vote)
   c. Need for updates in funding from the legislature

Accounting, Bookkeeping, Payroll
1. Surprises?
   a. Only private firms, doesn’t include in-house employees
   b. Only 16 additional jobs, relatively low ripple effects
   c. Most benefits in restaurants and hospitals
2. Favors industry
3. Against industry
   a. Increase in employment, but not a matching increase in population
4. Support?
   a. Increase population employed and living here – especially through housing
   b. Increase the number of locally-owned and operated businesses (8 votes)

Transportation Equipment
1. Surprises?
   a. Lack of the number employees, seems the data is too low, not showing all the jobs
2. Favors industry
a. Short-commute  
b. Good schools  
c. Amenities  
d. Family quality of life

3. Against industry  
a. Handicapped workforce – not enough population  
b. Location

4. Support?  
a. Housing  
b. **Community Center, for example, Detroit Lakes as a model** (6 votes)  
c. **Connecting with trails** (1 vote)  
d. Recreational opportunities – use the great outdoors  
e. Infrastructure to move people  
f. Amenities for work – millennials for workforce, enjoy life here  
g. **Revitalize downtown – new downtown “vibe”, hotel, coffee shops, etc.** (7 votes)

**Support Activities for Agriculture**

1. Surprises?  
a. Number of establishment and employees

2. Favors industry  
a. History in agriculture and precision agriculture  
b. Commodity prices have been strong in recent years  
c. New fertilizer plant in North Dakota

3. Against industry  
a. No packaging plant  
b. Global competition  
c. Sourcing fertilizer  
d. Transportation of chemicals  
e. Input costs  
f. Agricultural climate and the pressures on the agriculture from outside forces

4. Support?  
a. **Learn more about the industry, what are the gaps?** (1 vote)

**Poultry Processing**

1. Surprises?  
a. Low number of employees – missing some?  
b. Low wages

2. Favors industry  
a. Northern Pride has purchased housing for its employees in the area  
b. Strong poultry production to the north of Pennington County  
c. Land is relatively cheap  
d. Competitive utility rates

3. Against industry  
a. Labor shortage  
b. Avian influenza  
c. Seasonal/transient employees

4. Support?
a. Encourage local growers to expand in Pennington County

Amusement and Recreation
1. Surprises?
   a. Number of employees was high
   b. Shift-share was negative
2. Favors industry
   a. Ties into need for amenities and recreation
3. Against industry
   a. Weather
   b. Limited ability to rent winter gear (skis, snowmobiles, etc)
4. Support?
   a. Advertising
   b. Rental opportunities for recreation
   c. Opportunities for families, kids, spouses
   d. Scheduled transportation routes for busing
APPENDIX TWO: INDUSTRY ANALYSIS SLIDES

SUPPORT ACTIVITIES FOR AGRICULTURE: PENNINGTON COUNTY

- 60 employees
- 4 establishments (QCEW)
- $12.3 million in output generated
- 23% of expenditures are for inputs
  - phosphate fertilizer, pesticides and other agricultural chemicals, nitrogenous fertilizer
- 77% for labor
  - Average weekly wage: ~ $650 (QCEW)
- This U.S. industry comprises establishments that primarily provide support services that are essential part of agricultural and forestry production
- Carlson Harvesting, RTD Spraying, Ose Airspray

### SHIFT-SHARE ANALYSIS

<table>
<thead>
<tr>
<th>SHIFT-SHARE PENNINGTON COUNTY</th>
<th>Employment Change 2003-2013</th>
<th>National Growth</th>
<th>Industrial Mix</th>
<th>Competitive Share</th>
<th>Competitive Share Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Support activities for agriculture</td>
<td>31</td>
<td>1</td>
<td>3</td>
<td>26</td>
<td>84%</td>
</tr>
</tbody>
</table>

*Source: EMSI, based on QCEW data*
SUPPORT ACTIVITIES FOR AG: PENNINGTON COUNTY

SUPPORT ACTIVITIES FOR AG: TOP INDUSTRIES AFFECTED
TRANSPORTATION EQUIPMENT MANUFACTURING: PENNINGTON COUNTY

- 982 employees
- $708.9 million in output generated
- 5 establishments (QCEW, 2011)
- 69% of expenditure are for inputs
  - Other engine equipment, iron and steel and ferroalloy products, other motor vehicle parts
- 31% are for labor
  - Average weekly wage: $1,026 (QCEW, 2011); manufacturing: $784 (QCEW, 2014)
- This industry provides equipment for transportation of people and goods
- Arctic Cat, Janish Enterprises, North American Quadracycle

SHIFT-SHARE ANALYSIS

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<th>Competitive Share Percent</th>
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</thead>
<tbody>
<tr>
<td>Transportation equipment manufacturing</td>
<td>-82</td>
<td>51</td>
<td>-220</td>
<td>86</td>
<td>104%</td>
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</tbody>
</table>
TRANSPORTATION EQUIPMENT MANUF.: PENNINGTON COUNTY

TRANSPORTATION EQUIPMENT MANUF.: TOP INDUSTRIES AFFECTED
POULTRY PROCESSING: PENNINGTON COUNTY

- 31 employees (EMSI, 2013)
- $4.9 million in output generated
- 75% of expenditures are for inputs
  - poultry and egg production, processed poultry meat products, truck transportation services
- 25% are for labor
  - Average weekly wage: $337
- This U.S. industry comprises establishments primarily engaged in slaughtering poultry and processing poultry and poultry byproducts
- Northern Pride, Amundgaard Sausage (not poultry processing)

SHIFT-SHARE ANALYSIS

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<td></td>
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<tr>
<td>Poultry processing</td>
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</table>
POULTRY PROCESSING: PENNINGTON COUNTY

POULTRY PROCESSING: TOP INDUSTRIES AFFECTED
MACHINE SHOPS: PENNINGTON COUNTY

- 5 employees (IMPLAN)
- $589,817 in output generated
- 68% expenditures are for inputs
  - plates, iron and steel and ferroalloy products, machined products
- 32% are for labor
  - Average weekly wage: $926 (QCEW, 2014, machinery manufacturing)
- This industry comprises establishments known as machine shops primarily engaged in machining metal and plastic parts and parts of other composite materials

SHIFT-SHARE ANALYSIS

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<th>SHIFT-SHARE PENNINGTON COUNTY</th>
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<tr>
<td></td>
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<tr>
<td>Machine Shops</td>
</tr>
</tbody>
</table>
NURSING AND RESIDENTIAL CARE FACILITIES: PENNINGTON COUNTY

- 328 employees
- 12 establishments (QCEW)
- $13.7 million in output generated
- 41% of expenditures for inputs
  - Real estate, management consulting services, insurance
- 59% of expenditures for labor
  - Average weekly wage: $422 (QCEW)
- Includes nursing care, residential intellectual and development disability care, & assisting living facilities
- Pennington County, Pennington Health Services, Valley Home Society, Sunwood Home

SHIFT-SHARE ANALYSIS

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<tbody>
<tr>
<td>Employment Change 2003-2013</td>
</tr>
<tr>
<td>Nursing and residential care facilities</td>
</tr>
</tbody>
</table>

Source: EMBI, based on CEW data
NURSING AND COMMUNITY CARE FACILITIES: PENNINGTON COUNTY

- Direct: 100
- Indirect: 8
- Induced: 9
- Total: 117

NURSING AND COMMUNITY CARE FACILITIES: TOP INDUSTRIES AFFECTED

- Real estate
- Full-service restaurants
- Wholesale trade
- Employment services
- Other local government enterprises
- Dray-cleaning and laundry services
- Securities and commodity contracts
- Accounting, tax preparation

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WHOLESALE TRADE: PENNINGTON CO.

- 3,401 employees
- $628.5 million in output generated
- 30 establishments (QCEW)
- 39% of expenditures are for inputs
  - Real estate, advertising, management of companies & enterprises
- 61% for labor
  - Average weekly wage: $976
- This U.S. industry comprises establishments engaged in wholesaling merchandise, generally without transformation, and rendering services incidental to the sale of merchandise.
- DigiKey, Farmer's Union Oil Company, Farmer's Co-Op Grain & Seed, St. Hilaire Supply Company, Northwest Beverage

### SHIFT-SHARE ANALYSIS

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<tr>
<th>SHIFT-SHARE PENNINGTON COUNTY</th>
<th>Employment Change 2003-2013</th>
<th>National Growth</th>
<th>Industrial Mix</th>
<th>Competitive Share</th>
<th>Competitive Share Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wholesale trade</td>
<td>1,379</td>
<td>82</td>
<td>-37</td>
<td>1,333</td>
<td>97</td>
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</table>

(Source: EMSI, based on CED data)
WHOLESALE TRADE: PENNINGTON COUNTY

<table>
<thead>
<tr>
<th>Type</th>
<th>Direct</th>
<th>Indirect</th>
<th>Induced</th>
<th>Total</th>
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<tr>
<td></td>
<td>100</td>
<td>27</td>
<td>22</td>
<td>149</td>
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WHOLESALE TRADE: TOP INDUSTRIES AFFECTED

- Couriers and messengers
- Full service restaurants
- Real estate
- Limited-service restaurants
- Other local government
- Hospitals
- Employment services
- Accounting, tax preparation
- Investigation and security
- Retail - General

Employment

- Induced
- Indirect
BANKING: PENNINGTON COUNTY

- 99 employees (QCEW)
- 7 establishments (QCEW)
- $17.2 million of output generated
- 45% of expenditures for inputs
  - Management of companies and enterprises, legal services, & commercial and industrial machinery and equipment
- 55% for labor
  - Average weekly wage: $833 (QCEW)
- This industry group comprises establishments primarily engaged in accepting deposits (or share deposits) and in lending funds from these deposits.

SHIFT-SHARE ANALYSIS

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<tr>
<td><strong>Employment Change 2003-2013</strong></td>
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<tr>
<td>Banking</td>
</tr>
</tbody>
</table>

Source: EMS, based on QCEW data
BANKING: PENNINGTON COUNTY

<table>
<thead>
<tr>
<th>Direct</th>
<th>Indirect</th>
<th>Induced</th>
<th>Total</th>
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<tbody>
<tr>
<td>100</td>
<td>36</td>
<td>18</td>
<td>154</td>
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</table>

BANKING: TOP INDUSTRIES AFFECTED
GENERAL MERCHANDISE: PENNINGTON COUNTY

- 263 employees
- 6 establishments (QCEW)
- $18.8 million in output
- 42% of expenditures for inputs
  - Management of companies and enterprises, real estate, warehousing and storage services
- 58% for labor
  - Average weekly wage: $407 (QCEW)
- These U.S industries retail new general merchandise from fixed point-of-sale locations
- Knutson & Evenson, DollarTree, Wal-Mart

SHIFT-SHARE ANALYSIS

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<th>SHIFT-SHARE PENNINGTON COUNTY</th>
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<tbody>
<tr>
<td>Employment Change 2003-2013</td>
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<tr>
<td>General Merchandise</td>
</tr>
</tbody>
</table>

Source: EMSI, based on QCEW data
GENERAL MERCHANDISE: PENNINGTON COUNTY

![Bar graph showing direct, indirect, induced, and total values for general merchandise in Pennington County.]

GENERAL MERCHANDISE: TOP INDUSTRIES AFFECTED

![Bar graph showing employment levels for various industries, with categories labeled as 'Induced' and 'Indirect'.]

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ACCOUNTING, TAX PREPARATION & BOOKKEEPING & PAYROLL: PENNINGTON

- 41 employees (QCEW)
- $4.9 million in output generated
- 6 establishments (QCEW)
- 30% of expenditures are for inputs
  - Real estate, management of companies and enterprises, accounting, tax preparation, bookkeeping and payroll ser.
- 70% are for labor
  - Average weekly wage: $948
- This industry comprises establishments primarily engaged in providing services, such as auditing of accounting records, designing accounting systems, preparing financial and other activities
- Kays, Benton, Safranski Co., Brady Martz and Associates

SHIFT-SHARE ANALYSIS

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<thead>
<tr>
<th>SHIFT-SHARE PENNINGTON COUNTY</th>
<th>Employment Change 2003-2013</th>
<th>National Growth</th>
<th>Industrial Mix</th>
<th>Competitive Share</th>
<th>Competitive Share Percent</th>
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</thead>
<tbody>
<tr>
<td>Accounting, tax preparation and bookkeeping &amp; payroll services</td>
<td>7</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>43%</td>
</tr>
</tbody>
</table>

Source: EMSU, based on CEW data.
ACCOUNTING, TAX PREPARATION & BOOKKEEPING & PAYROLL: PENNINGTON

ACCOUNTING, TAX PREPARATION & BOOKKEEPING & PAYROLL: TOP INDUSTRIES AFFECTED
AMUSEMENT AND RECREATION:
PENNINGTON COUNTY

- 590 employees (QCEW, amusement, gambling & recreation)
- 6 establishments (QCEW, amusement, gambling & recreation)
- $1.2 million in output generated (other amusement & recreation)
- 49% of expenditures are for inputs
  - Real estate, advertising, and insurance
- 51% for labor
  - Average weekly wage: $330 (QCEW, amusement, gambling & recreation)
- Includes a wide range of establishments that operate facilities or provide services to meet varied cultural, entertainment, & recreational interests of their patrons. Does not include charter fishing.
- Seven Clans Casino, Thief River Golf Club, Family Bowl, Anytime Fitness, Thief River Trap Club

SHIFT-SHARE ANALYSIS

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<th>SHIFT-SHARE PENNINGTON COUNTY</th>
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<tr>
<td>Employment Change 2001-2012</td>
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<tr>
<td>Amusement gambling and recreation industries</td>
</tr>
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</table>

Source: EMSI, based on OEV 08/13
APPENDIX THREE: DEFINITION OF TERMS

Ten of Pennington County’s industries were analyzed to measure their economic linkages for the workshop. To allow for comparison, the analysis considers the economic impact of 100 jobs in each industry. This allows one to compare and contrast the types of impacts each industry has in Pennington County. The IMPLAN model used in this analysis is linear; therefore, if a person wanted to consider the economic linkages of 10 jobs, it could be done by dividing the results for 100 job by 10.

Interpreting the results requires knowing several definitions. Those are included here.

**Output**
Output is measured in dollars and is equivalent to total sales.

**Employment**
Employment includes full- and part-time workers and is measured in annual average jobs. Total wage and salaried employees, as well as the self-employed, are included in employment estimates in IMPLAN. Because employment is measured in jobs and not in dollar values, it tends to be a very stable metric.

**Direct Impact**
The direct impact is equivalent to the initial change in the economy. For this workshop, the direct impact is 100 jobs.

**Indirect Impact**
The indirect impact is the summation of changes in the local economy that occur due to spending for inputs (goods and services) by the industry or industries directly impacted. For instance, if employment in a manufacturing plant increases by 100 jobs, this implies a corresponding increase in output by the plant. As the plant increases output, it must also purchase more of its inputs, such as electricity, steel, and equipment. As it increases its purchase of these items, its suppliers must also increase their production, and so forth. As these ripples move through the economy, they can be captured and measured. Ripples related to the purchase of goods and services are indirect impacts.

**Induced Impact**
The induced impact is the summation of changes in the local economy that occur due to spending by labor – by the employees in the industry or industries directly impacted. For instance, if employment in a manufacturing plant increases by 100 jobs, the new employees will have money to spend to purchase housing, buy groceries, and go out to dinner. As they spend their new income, more activity occurs in the local economy. This can be quantified and is called the induced impact.

**Total Impact**
The total impact is the summation of the direct, indirect and induced impacts.