

# Data and Evidence Analysis Summary – 2016

## Radiography

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### WTCS Comparative Data:

<https://facultyresources.westernnc.edu/wp-content/uploads/2015/11/2015-10-5261-Radiography-QRP-Associate-Degree-Evidence-Analysis-Report.pdf>

#### Course Completion

- Western's C or Better for the Radiography program ranged from 70.8% (2012) to 77.1% (2014). When compared to the other five colleges selected as a comparison group, Western ranks the lowest. Chippewa Valley Technical College consistently outranked Western and has the highest completion rate of the six colleges with an average of 95.7% (2011-2015). Northeast Wisconsin Technical College and Moraine Park tied for second with an average completion rate of 88.1% from 2011-2015.
- Western has the highest number of students reported with 219 in 2012. Northcentral had 127 in 2015 compared to Western's 168. Chippewa Valley had an increase of 46 (2011) to 67 (2012) and has remained between 61 (2015) to 66 (2013) students.
- Western has noted a decrease of 51 students from 2012 to 2015. Northcentral has increased the number of students by 51 (2011-2015) and Moraine Park increased 42 students (2012 – 2015).

#### Second Year Retention

- Western's second year retention rate ranged from 36.7% (2014) to 53.6% in 2012.
- When compared to the other five colleges, Western's has the lowest second year retention average over the six years of measurement (2011-2015). Western's average of 47.4% is -21.1% points lower than second ranked college average of 68.5% (Moraine Park). Chippewa Valley leads the colleges with 86% but reports only five years of data (2011-2015).

#### Western's Third Year Graduation

- Western's third year graduation decreased to 2.7% in 2013 compared to 11.7% in 2011.
- In comparison to the other five colleges, Western's third-year graduation rate (average) of 5.1% is 6<sup>th</sup> out of six. A discussion with other colleges when they graduate students may give insight of why Western's 3<sup>rd</sup> year rate is so low. Northeast Wisconsin Technical College demonstrates a 63.9% average for the years 2011-2015. Chippewa Valley has 81.7% average with a 2012-2015 reporting period.

It is noted that Western's numbers are significantly higher than the comparison with the exception of Moraine Park and Northcentral for course completion data.

## Labor Market Analysis October 2015

<https://facultyresources.westernct.edu/wp-content/uploads/2015/11/2015-OCT-Radiography-Program-Trends.pdf>

In an analysis of the Western District and occupations associated with the field of Radiography, the following points are noted:

- Occupations related to the Radiography Program are expected to grow by 6.8% which is comparable to a national growth rate of 6.7%. District trends are anticipated to be stronger than the state trend of 6.0%.
- Job distribution in the district by the year 2020 indicates a high concentration in La Crosse County (196 jobs). Surrounding counties are significantly lower with Monroe County anticipating 36 jobs and Vernon County 20 jobs.
- This program's employment pattern has a solid even age distribution. The 45-54 age group leads the employment field with 25.8%. The 25-34 and 35-44 age groups both indicate 24.7% and 24.2% respectively for 2015 jobs. The 55-64 and above represents 20.2% of the employees. The smallest segment of workers is the 19-24 year old population with 4.9%. The high school population of students may benefit from greater exposure to the occupation and benefits of working in this health related field.
- The majority of jobs in 2015 were housed within general medical and surgical hospitals (71.7%) Positions within the offices of physicians is at 18.4%.
- An analysis of the district's Classification of Instructional Programs (CIP) shows that there are two educational program tagged to deliver graduates into the radiography field: Medical Radiologic Technology/Science – Radiation Therapist and Radiologic Technology/Science – Radiographer. In 2014, there were 32 completers for 12 openings. The Radiographer program did not indicate any graduates in 2014. At a cursory glance, it appears that the field is oversaturated with graduates. It would be beneficial for the program to do a deeper analysis of the employment rates in the district.
- Earnings for graduates of this program range from \$21.17 per hour to \$27.05 per hour with the median hourly wage of \$24.14. This is below the national median wage of \$26.86.

## Student Satisfaction Trends

The Noel Levitz Student Satisfaction Inventory was conducted in the fall of 2015. The instrument asks students to rate the importance AND the satisfaction with 95 items (1-7 with 7 as highest) related to the following "scales":

- Instructional effectiveness
- Academic advising/counseling
- Concern for the individual
- Registration effectiveness
- Admissions and financial aid
- Student centeredness
- Campus climate

- Academic services
- Service excellence
- Safety and security
- Campus support services and responsiveness to diverse populations

In the program self-study process (data and evidence analysis work), programs are asked to identify gaps between importance and satisfaction. Gaps are calculated as the difference between the importance of an item and the satisfaction level. Gaps that are close to a “1” should be discussed and explored – particularly if they are tied to items that are rated as high in importance for students.

This survey had twelve students respond. A cursory glance at the “scale” level did not reveal any gaps in the various categories of the survey. The overall satisfaction with the experience at Western for the Radiography program was 6.42 as compared to 5.68 for all students responding to the survey. The Radiography students indicated that the experience thus far was better than expected (5.50), whereas all students responding to this survey scored this at an average of 4.93.

A more detailed analysis was conducted at the “item” level. Items are associated with one or more “scales” and provide additional insight into specific areas.

Items rated **highest in importance** for Radiography students include several items that scored a 7 (scale of 1-7 with 7 as very important):

- Item #3 – Quality of instruction in the program is excellent. 6.91
- Item #18 – Quality of instruction I receive in most of my classes is excellent. 6.90
- Item #29 – Faculty are fair and unbiased in their treatment of individual students. 6.90
- Item #32 – My academic advisor is knowledgeable about program requirements. 6.91
- Item #34 – Computer labs are adequate and accessible. 6.89
- Item #55 – Academic support services adequately meet the needs of students. 6.88
- Item #78 – Help is readily available to student whose grades fall below average. 6.89

Note that the students in this program seemed to associate a higher level of importance to many items as compared to students in other programs. The survey indicated 18 items with an importance level of 6.80 and above. There were 29 items that there was a 0 or higher (indicated with a – sign) between importance and satisfaction. This indicates the students are satisfied with the education and services at Western. There was only one item that indicated a gap of 1.00 and above which may be a topic of discussion for this program:

- Item #78 – Help is readily available to students whose grades fall below average. (1.12)

## Student Learning Outcomes Assessment Trends

There were four responses to this survey.

- Likes were the rotations to many different clinical sites, the instructors, the hands-on experiences and that it was a 2-year program.
- Dislikes included the program wasn’t full time so financial aid didn’t cover it unless they took filler classes. One student felt that they should be told upfront “everything about it and what it

takes. Then maybe there wouldn't be so many dropouts. Like not enough patient interaction...".

- One suggestion was to provide more information about post graduate applications, state licenses, etc.
- Another student suggested assigning a 2<sup>nd</sup>-year student with a 1<sup>st</sup>-year student as a mentor.

## Graduate Follow-Up Trends

Year	2012-13
Types of jobs obtained	Radiographer/MRI Tech Aide Radiographer Radiography Technologist Radiologic/CT Technologist
Companies hiring Western graduates	Mayo Clinic Health System, La Crosse, WI Mile Bluff Medical Center, Mauston, WI Hirsch Clinic-Vernon Memorial Hospital, Viroqua, WI Children's Hospital of Wisconsin, Milwaukee, WI Gundersen Health System, La Crosse, WI Gundersen Tri-County Hospital & Clinics, Whitehall, WI Krohn Clinic, Black River Falls, WI Tomah Memorial Hospital, Tomah, WI

Year	2013-14
Types of jobs obtained	CT Technologist Radiologic Technologist RT Surgery Staff Radiologic Technologist
Companies hiring Western graduates	St. Vincent Hospital, Green Bay, WI Aspirus Grand View Hospital, Ironwood, MI Black Hills Orthopedic & Spine Center, Rapid City, SD Community Health Network, Berlin, WI Gundersen St. Joseph's Hospital and Clinics, Hillsboro, WI Krohn Clinic, Black River Falls, WI St. Cloud Hospital-CentraCare, St. Cloud, MN Tomah VA Medical Center, Tomah, WI

Year	2014-15
Types of jobs obtained	CT Technician CT/X-ray Technologist Radiologic Technologist X-ray Technician

Companies hiring Western graduates	Winona Health, Winona, MN Mayo Clinic Health System, La Crosse, WI / Rochester, MN Heartland Orthopedic Specialists, Willmar, MN Regional Health Services, Cresco, IA Mile Bluff Medical Center, Mauston, WI
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## Career Pathways Assessment

- Your program had five responses to the survey. Two were full-time faculty and one was adjunct faculty.
- You also had two deans or associate deans complete.
- Items that may be topics of discussion for this program include:
  - There appears to be some disagreement around the course sequencing area so this might be a possible discussion area. Topics such as embedded and laddering credentials, multiple entry points and reentry points, and flexible delivery formats are included in this area.
  - Another area of possible discussion would be student options as there seems to be several “unknown” responses. This includes Business and Industry Services course work for program credit, transfer options for students, and articulation agreements with area high schools.