



MSU-Northern Perkins Local

Prepared by Montana State University-Northern
for Montana University System, Office of the Commissioner of Higher Education 2022-2023 Perkins Local Application

Submitted by Maura Gatch

Submitted on 06/17/2022 10:10 AM Mountain Standard Time



Opportunity Details

Opportunity Information

Title

2022-2023 Perkins Local Application

Description

The Strengthening Career and Technical Education for the 21st Century Act (Perkins V) was signed into law on July 31, 2018. This bipartisan measure reauthorized the Carl D. Perkins Career and Technical Education Act of 2006 (Perkins IV) and continued Congress' commitment in providing nearly \$1.3 billion annually for career and technical education (CTE) programs for our nation's youth and adults.

Awarding Agency Name

Montana University System, Office of the Commissioner of Higher Education

Agency Contact Name

Jacque Treaster

Agency Contact Phone

(406) 449-9135

Agency Contact Email

jtreaster@montana.edu

Public Link

<https://www.gotomygrants.com/Public/Opportunities/Details/823bc0e2-5341-4304-b160-c33200662aa5>

Funding Information

Funding Restrictions

<https://www.mus.edu/Perkins/nonallowable.html>

Award Information

Award Period

07/01/2022 - 06/30/2023

Award Announcement Date

6/20/2022

Indirect Costs Allowed

Yes

Indirect Cost Rate

5.00 %

Restrictions on Indirect Costs

Yes

Citation Governing Indirect Cost Restriction

Federal Guidelines state that no more than 5% of project funds can go to administration and indirect costs.

Matching Requirement

No

Submission Information



Submission Window

02/23/2022 12:00 PM - 06/15/2022 5:00 PM

Question Submission Information

Question Submission Email Address

jtreaster@montana.edu

Question Submission Additional Information

Please direct questions about the application to Jacque Treaster at the Montana University System, Office of the Commissioner of Higher Education.

For more information on the application and its requirements, please refer to the the 2022-2023 Perkins Local Application Guide.

Attachments

- Perkins Local Application Guide 2022-2023 Final

Additional Information

Additional Information URL

<https://www.mus.edu/Perkins/resources.html>

Additional Information URL Description

Please go to the Montana University System Perkins Resources website for more information on the Perkins Local Application, include FAQs, a list of non-allowable expenses, the Montana Perkins V State Plan, and other Perkins & CTE resources.

Award Administration Information

Administrative and National Policy Requirements

The following is a listing of regulations applicable to Perkins Programs:

Education Department General Administrative Regulations
<https://www2.ed.gov/policy/fund/reg/edgarReg/edgar.html>

- 34 CFR Part 76 (State-Administered Programs).
- 34 CFR Part 77 (Definitions that Apply to Department Regulations).
- 34 CFR Part 79 (Intergovernmental Review of Department of Education Programs and Activities).
- 34 CFR Part 80 (Uniform Administrative Requirements for Grants and Cooperative Agreements to State and Local Governments).
- 34 CFR Part 81 (General Education Provisions Act—Enforcement).
- 34 CFR Part 82 (New Restrictions on Lobbying).
- 34 CFR Part 84 [Government Requirements for Drug-Free Workplace (Financial Assistance)].
- 34 CFR Part 85 [Government wide Debarment and Suspension(Non-procurement)].
- 34 CFR Part 86 (Drug and Alcohol Abuse Prevention).
- 34 CFR Part 99 (Family Educational Rights and Privacy).

Reporting

The required postsecondary core indicators of performance for each grant cycle are established by state Perkins staff and the U.S. Department of Education. The purpose of the indicators are to assess the effectiveness of the state Perkins Program, along with its individual institutions, in achieving statewide progress in CTE, and to optimize the return on investment of federal funds in CTE activities.

Accountability Report Card.

Prior to awarding federal funds each year, the Perkins Program Manager will provide a "Report Card" showing state level performance, performance measurements for each individual college. Factors evaluated will be: Amount of award vs. expenditure (Amount of returned funds).

Meeting performance expectations:

Using the above-mentioned data, the Perkins Program Manager will also determine whether or not specific award conditions/restrictions are necessary. Additional award conditions/restrictions may include:

- Reimbursement on a quarterly basis
- Withholding authority to proceed with programmatic activities until evidence of acceptable performance is provided
- Detailed financial reports
- Requiring technical or management assistance
- Establishment of prior approval process
- Submission of time and effort reports of personnel with salary covered by Perkins funds
- Copies of minutes taken from CTE advisory board meetings

If additional award conditions/restrictions are required, the Perkins Program Manager will notify the College of:

- The reason why the additional conditions/restrictions are being imposed
- The nature of the action needed to remove the conditions/restrictions
- The time allowed for completing the actions
- The method for requesting reconsideration of conditions/restrictions

Performance Expectations:

Each institution is responsible for meeting or exceeding the negotiated performance levels. All projects/programs funded by Perkins must be related to a measurable performance outcome that demonstrates cost effectiveness and is tied directly to one of the following three indicators:

- 1P1 – Postsecondary Retention and Post-Program Placement [10]
- 2P1 – Earned Recognized Postsecondary Credential
- 3P1 – Nontraditional Program Completion

Evaluation methods should be designed to provide feedback regarding process toward attaining required performance levels. Institutions who do not meet negotiated performance levels will be required to submit a local improvement plan along with the following year's Perkins application.



Project Information

Application Information

Application Name
MSU-Northern Perkins Local

Award Requested
\$99,925.72

Cash Match Requirement
\$0.00

Cash Match Contributions
\$0.00

In-Kind Match Requirement
\$0.00

In-Kind Match Contributions
\$0.00

Total Award Budget
\$99,925.72

Primary Contact Information

Name
Maura Gatch

Email Address
maura.gatch@msun.edu

Address
PO Box 7751
Havre, Montana 59501

Phone Number
406-265-3566



Project Description

Part 1. Additional Contact Information

Overview

Perkins Local Grant Contact

Jacque Treaster

jtreaster@montana.edu

(406) 449-9135

Campus Information

Campus Name

MSU Northern

Campus Fiscal Manager

Provide the contact information for the fiscal manager who will be processing Perkins funds disbursement.

Last Name

Cavan

First Name

Lourdes

Is the Fiscal Manager's mailing address different than above?

Yes

No

Fiscal Phone Number

(406) 265-3509

Fiscal Phone Extension

Fiscal Fax Number

Fiscal Email Address

lourdes.cavan@msun.edu

Additional Perkins Contacts

Please provide email addresses, names and titles of people on your campus to be notified of grant issues.

Additional Perkins Contacts

	Name	Title	Email Address
Contact 1	Molly Parman	Student Record Coordinator and Evaluator	molly.parman@msun.edu
Contact 2			
Contact 3			
Contact 4			

	Name	Title	Email Address
Contact 5			
Contact 6			
Contact 7			
Contact 8			

When you're finished answering the questions on this page, click [Mark as Complete](#). An application cannot be submitted until all pages are marked as complete.

Not finished with this page yet? Click [Save](#) or [Save & Continue](#) to fill out the missing information at a later time.

Part 2. Background - Community and Workforce

Comprehensive Local Needs Assessment

Upload your comprehensive local needs assessment.

Montana CLNA Update Worksheets 22-23-MSUN.pdf

Background Information

1. Please provide a brief summary of the results of your Comprehensive Local Needs Assessment and what CTE course offerings and/or activities you will be targeting in this application. Be sure to include how the results of the CLNA informed the selection of the specific career and technical education programs and activities selected to be funded and a description of any new programs of study you plan to develop and submit to the State for approval based on CLNA findings.

All four of the projects proposed under this Perkins Application were driven by the results from the Comprehensive Local Needs Assessment and input from our industry partners who serve on our program advisory boards.

ASN-Nursing Project/Critical Care in Coding Patients: The ASN (Associate of Science in Nursing) currently utilizes Perkin's funding to create new and improved learning opportunities for nursing students. The CLNA discusses that programs are aligned to rigorous standards developed by a relevant third party or by the state. Currently, the ASN program has received continued accreditation by the Accreditation Commission for Education in Nursing (ACEN) until Spring 2029, the Montana Board of Nursing also reviewed the program and gave the ASN program continued approval through Spring 2029.

The ASN program uses activities within the simulation lab and the skills lab to help facilitate nursing students with current standards of practice of care throughout the lifespan (neonates through older adult). The ASN program received approval for a Lifepack 12 with paddles in 2017-2018. Since this time students have utilized this machine to practice skills of ECG monitoring, working an actual patient code scenario, and practicing other skills related to acute care throughout the lifespan. The Lifepack 12 is now obsolete in the clinical setting and student nurses need to be working with updated equipment, so they are familiar with this upon graduation.

The ASN program is asking to receive funding to purchase a Zoll R Series AED Defibrillator with Expansion Pack and other accessories to update the current equipment being utilized to teach nursing students acute care of patients throughout the lifespan. This one machine will allow students in several different nursing classes to familiarize themselves with the ACLS process of patient care, and the Zoll R series can also be utilized for monitoring patient care.

Plumbing Project/Technology Advancement in Plumbing Labs: The plumbing program at MSU-Northern is industry driven through a strong partnership with the Department of Labor that grants our graduates of the AAS in plumbing the successful completion of 7 out of 8 books for the apprenticeship and up to 3000 hours (about 4 months) of the on-the-job training that is required to sit for a journeyman's license as well as our advisory board made up of industry leaders in the plumbing and trades fields. Through these strong industry partnerships, feedback gathered through surveys and meetings, shows an incredibly high need for our graduates. This project supplies up-to-date tools and training which ensures our graduates are performing at industry standard and are entering the field ready to take part in high skill, high wage jobs that are the outcome for our graduates with 100% job placement.

Industrial Safety/NC3/3M Worker Health and Safety: Workplace safety is another skill that is a necessity for real-world workplaces, as referenced in Part B-1 of the CLNA references "maintaining strong partnerships that help connect students with real-world skills and career opportunities". Providing this industry recognized training and certification as a part of the curriculum in our IT 111 Industrial Safety/Waste Management course will ensure that all students will have access and the ability to gain this crucial knowledge that will ensure they are entering the workforce ready to go and will have a direct impact on their real-world skills and their career opportunities.

Diesel Project: Powertrains Training Material: The CLNA references the need to maintain strength in Part B2 and C, which state "Programs are aligned to projected industry demand. And Programs incorporate relevant academic, technical and employability skills at every learner level" but also shows that our non-traditional concentrator percentage is well below the state goal at 4.7%. This project request will increase the amount of hands-on learning opportunities that are available to students in the Diesel programs, including students that belong to high-risk populations (1st generation, low-income and underserved populations). As evidence shows "Active learning benefits all students but offers disproportionate benefits for individuals from underrepresented groups. Widespread implementation of high-quality active learning can help reduce or eliminate achievement gaps in STEM courses and promote equity in higher education." [1]

[1] 1 Theobald, E. J., Hill, M. J., Tran, E., & Freeman, S. (2020, March 9). *Active learning narrows achievement gaps for underrepresented ...* - PNAS. Proceedings of the National Academy of Science of the United States of America. Retrieved May 23, 2022, from <https://www.pnas.org/doi/pdf/10.1073/pnas.1916903117>

2. Please provide a brief description of how your campus will, in collaboration with local workforce development partners, provide a series of career exploration and career guidance activities including: (A) career exploration and career development coursework, activities, or services; (B) career information on employment opportunities that incorporate the most up-to-date information on high skill, high-wage, or in-demand industry sectors or occupations, as determined by the

CLNA; and (C) an organized system of career guidance and academic counseling to students before enrolling and while participating in a career and technical education programs.

ASN-Nursing Project/Critical Care in Coding Patients Currently, the ASN program collaborates with student clinical sites, as well as the College of Health Science Advisory Board to discuss opportunities for students at different health care organizations. Also, the clinical sites discuss what they see the student to be competent in before joining the current workforce. Registered nursing jobs are in high demand in the state of Montana, and especially in the rural workforce. Currently, the ASN program holds a 100% program completion rate of the program with a 90% job placement rate last year, with 100% in both categories the in 2020. Recruiting events happen at least once a month for ASN students with health care organizations coming to recruit students in all semesters of the program.

ASN students rotate through a variety of nursing settings with local clinical partners, and during the last semester of the ASN program students choose a preceptorship site to complete their clinical settings. Some clinical sites place students in the areas that the site wants students placed, while others let students choose the area, such as emergency department, critical care, medical-surgical, or other specialty unit. Students in the last semester of the ASN program usually have employment prior to graduation, as some health care organizations help pay for NCLEX-RN prep or even tuition reimbursement when a contract is signed.

Students entering the ASN program have detailed advising for the application process to enter the program. At MSU-Northern students are given specific advising information so that students could apply to multiple programs throughout the state of Montana due to the limited number of spaces available in nursing programs. Students are given information about what to expect while in nursing school and what the requirements are to be eligible to apply to the ASN program. The students have a counseling session about other career options, as well as how to improve eligibility to apply in the next application process. Once students complete the application and make it through the selection process, they are notified and walked through the registration, how to complete the necessary accounts for documents required by taking part clinical sites, as well as attendance to the required nursing student orientation prior to the start of their first semester of the ASN program.

While enrolled in the ASN program students are eligible to take part in the Unlicensed Assistant Personnel Program (UAP) during the summer between Level I and Level II years. This offers nursing students the opportunity to work with health care organizations nurses to gain skills in the workforce. This program is monitored by the Board of Nursing and is separate from the educational institution, where the responsibility falls with health care organizations. Students who participate in this program gain confidence and experience in the nursing role and have usually received an employment offer contingent on graduation from the ASN program and passing the NCLEX-RN.

Plumbing Project/Technology Advancement in Plumbing Labs: As said previously, the strong partnership with the Department of Labor for the State of Montana our AAS in Plumbing is up to date with the career skills needed to successfully have completed 7 out of the 8 books needed for apprenticeship and up to 3000 hours (about 4 months) out of the 7500 hours (about 10 and a half months) needed. MSU-Northern currently has the only plumbing program in the state where a student can graduate with an AAS in Plumbing Technology, currently, the state of Montana has a 3 to 1 ratio of retiring plumbers to new plumbers: licensed plumbers meaning journeyman or higher. Also, while completing their program at Northern, there is a Master plumber available to help understand all coursework as well as guide and instruct lab activities that help a student gain understanding in the plumbing field

Industrial Safety and Diesel Projects:

The university collaborates with local, regional and national partners through our Career Center. The Diesel Program works often with the Career Center and industry partners to provide students with access to career exploration opportunities and the most up-to-date information on high skill, high-wage, or in-demand industry sectors and occupations.

Students are given these opportunities through Cooperative Education credits that are needed for most degrees in our program. Students also have opportunities to meet with industry partners face to face at career fairs as well as on campus information sessions.

The employers that interact with our students, and ultimately hire them, expect them to have hands-on experience and knowledge of relevant technologies and equipment. The addition of the proposed components to our program will ensure that our students meet the expected program outcomes.

In addition, our workforce and industry partners have begun to get involved with career exploration with students while they are in high school. This past year, in partnership with Modern Machinery, Tractor and Equipment and RDO, 3 Industry Nights were offered across the state where high-wage, high skill industries were highlighted including the different career paths that are present once in the industry as well as what education is needed to achieve those career paths.

When you're finished answering the questions on this page, click [Mark as Complete](#). An application cannot be submitted until all pages are marked as complete.

Not finished with this page yet? Click [Save](#) or [Save & Continue](#) to fill out the missing information at a later time.

Part 3. Background - Student Populations

Background Information

3. Please provide a brief description of how your campus will improve the academic and technical skills of students participating in CTE programs.

MSU-Northern serves a population that consists of 66% TRiO eligible students, which means first generation, low income or students with disabilities and a student population of approximately 15% American Indian. MSU-Northern supports these distinct populations with two US (United States) Department of Education grants: Student Support Services and the Little River Institute (Native American Serving Non-Tribal Institutes)

MSUN (Montana State University Northern) Student Support Services goal is to provide you with the support and skills needed to remain in college and complete a degree program by creating a personalized Academic Success and Career Plan. This plan, combined with the effort of our team and your personal motivation to succeed, will help guide your first days as a TRIO SSS Scholar through graduation.

SSS provides its participants with tutoring, mentoring, advising, disability services, a private computer lab, and a quiet study area. Our center also comes fully stocked with each year's required textbooks for participants to utilize on site.

The Little River Institute is intended to improve the retention and completion rates of American Indian students in higher education.

As part of this grant, the Little River Institute was created to serve as a center of tutoring, mentoring, and support for American Indian students at MSU-Northern, as well as a source of culturally responsive professional development for MSU-Northern faculty and staff.

Tutoring Central at MSU-Northern is here to serve our student population in a supportive environment through tutoring in the high-impact areas of writing and mathematics at all skill levels. Tutoring Central at MSU-Northern, under the Office of the Provost, is a collaborative effort of TRiO/Student Support Services, the Little River Institute, the Math Lab as well as faculty to provide MSU-Northern students access to experienced tutors in a wide range of disciplines. Tutoring Central includes professional tutors and student tutors approved by faculty.

4. Please explain how your campus will provide activities to prepare special populations for high-skill, high-wage, or in-demand occupations; prepare CTE participants for non-traditional fields; provide equal access for special populations to CTE courses, programs, and programs of study; and ensure that members of special populations will not be discriminated against. Include how students, including students who are members of special populations, will learn about their school's career and technical education course offerings and whether each course is part of a career and technical education program of study.

As stated in the earlier answer both Student Support Services and the Little River Institute offer support to our students including special populations.

Through the Student Support Services, special populations who are SSS Eligible and SSS participants have SSS Advisors who monitor academic progress, assist in course selection, identify needs for additional services and make proper referrals both within and outside of the university. SSS Eligible and SSS participants develop an individual academic plan specialized to that participant's needs based on their assessment results. The SSS Program at MSUN will offer, at a minimum, four workshops per semester, and SSS participants will be encouraged to take part. Workshops will focus on academic skills, study skills and non-cognitive skills that can aid in creating positive mindsets that can lead to success in college. Examples of these workshops are Stress Management, Creating Personal Goals, Connecting College to Career Goals, Study Skills, Time Management, Preparing for Advising Sessions, Online Resources and Financial Aid/Literacy. SSS Advisors will provide guidance on career choices through assessment tools, including the Myers-Briggs Type Indicator and Montana Career Information System.

In addition, Accessibility Services at MSUN also provides support and accommodation for students including those in the CTE fields. At Montana State University-Northern, students with physical or learning disabilities are provided with a variety of services, as directed by Section 504 of the Rehabilitation Act and the Americans with Disabilities Act (ADA). To access these services, students are asked to complete an application, provide documentation of their disability, request accommodation for their courses and meet with the coordinator of disability services.

MSUN Career Center, in addition to assisting student with their co-op internship education provides workshops that provide information regarding high-skill, high-wage occupations as well as hosts info sessions where students can learn about these in demand occupations and the companies that might hire them.

5. Please provide a description of the work-based learning opportunities for students participating in CTE programs and how your campus will work with representatives from employers to develop or expand work-based learning.

Students at MSUN, especially those in the CTE fields, have the chance to participate in Co-op Internships. Co-op Internships enhance academic course work by supplying a realistic look at a chosen field and adding relevancy to classroom studies. Outcomes include professional skills development, maturity and increased motivation. A successful co-op experience also greatly increases employment opportunities upon graduation.

Benefits of taking Co-op Credits:

- Earn Credits AND a Salary: In most cases, co-op students receive paid work experience and earn credits toward a degree.

- **View Careers:** Working in the field helps to strengthen and refine career goals. Frequently, the realistic work experience will point out the usefulness of additional courses or the pursuit of a minor which could improve employability.
- **Build a Strong Resume:** In-depth work experiences are invaluable in building a strong resume and identifying references. The opportunity to meet and work with professionals is extremely helpful in job search and networking activities. Many students are offered full-time positions by the co-op employer following graduation.
- **Strengthen Interpersonal Skills:** Important aspects of any job include developing the ability to work cooperatively with others, learning when to listen and when to speak, dealing with pressure, and developing effective communication and supervisory skills. Professionalism and maturity are additional benefits.
- **Gain Insight into the Hiring Process:** Co-op students learn about hiring procedures including job openings, interviewing, networking, personnel policies, fringe benefits and employment issues.

When you're finished answering the questions on this page, click [Mark as Complete](#). An application cannot be submitted until all pages are marked as complete.

Not finished with this page yet? Click [Save](#) or [Save & Continue](#) to fill out the missing information at a later time.

Part 4. Background - Campus Performance

Background Information

6. Please outline how your campus will provide students participating in CTE the opportunity to gain postsecondary credit while still attending high school.

MSUN Northern currently offers welding as concurrent enrollment to area high schools. Welding is a foundational course for many CTE areas we offer at MSUN including Diesel, Ag Mechanics, Plumbing and Pipefitting programs. In addition to providing college credit while these students are still enrolled in high school, our welding faculty on campus who is a Certified Welding Inspector and a Certified Welding Educator, is available for support for the students but also provides educational development for the high school teachers he works with. MSUN will be working to expand welding to include WLDG 180 at Havre High School and Chinook High School, DDSN 113-Design Drafting at Havre High School, and begin to offer Agriculture courses at North Toole High School in the Fall of 2022.

7. Please identify how your campus supports the recruitment, preparation, retention, and training, including professional development, of teachers, faculty, administrators, and specialized instructional support personnel.

MSU-Northern supports the preparation, retention, and training, including professional development, of teachers, faculty, administrators, and specialized instructional support personnel through the Office of Teaching and Learning Excellence. The Office of Teaching and Learning Excellence is dedicated to the support and advancement of evidence-based teaching and learning practices and the professional development of all members of the MSU-Northern teaching community. OTLE partners with faculty, staff, and administrators to develop and sustain a culture that values and rewards teaching, respects and supports individual differences among learners, and creates learning environments in which diverse students and instructors can excel. The Office of Teaching and Learning Excellence provides training for New Instructors including how to design a syllabus and Faculty Learning Communities which is a series of monthly discussions intended to help new and first-time faculty get oriented to MSUN, improve their teaching practice, course design, and program success. Professional Development is also provided through Lecture Series and Tech Snacks which are short, focused professional development sessions covering instructional technology, pedagogical techniques, online learning, and more.

8. Please outline how your campus will address disparities or gaps in performance between groups of students in each of the plan years, and if no meaningful progress has been achieved prior to the third program year, a description of the additional actions that will be taken to eliminate these disparities or gaps.

MSUN addresses disparities or gaps in performance between groups of students through the work of Student Support Services and the Little River Institute as mentioned in earlier answers but also through an institutionalized support of the Academic Alert System. MSUN's Academic Alert System has evolved over the past three years to an extremely successful, well used (75% of faculty used), and documented system to report students in academic risk. The system is accessible to faculty and staff to report concerns about student progress. This program is ever evolving based on feedback from faculty, staff and the students.

In using this feedback, we have some improvements to this program, the main update will be closing the loop and updating the faculty and staff that have submitted these alerts. Once an alert has been made, the faculty will receive an email letting you know that we have received the early alert and are processing it as well as who or which office the student has been referred to if a referral was needed. We also ask that if the faculty continue to see the same behaviors or the same academic issues, to please submit an additional Academic Alert so we may continue to offer resources and adjust what we are offering if needed.

An Academic Alert is a prompt referral from Faculty that enables the support offices on campus (SSS, LRI, Tutoring Central, Accessibility Services, Financial Aid and others) to connect with the student. The goal is to help students be successful by identifying the challenges and obstacles they are facing and improving their academic performance.

As we work to advance student success at Montana State University Northern, you are in a quintessential position to help identify students who could benefit from additional support. We request Academic Alerts for:

- Class attendance
- Test scores (particularly C's, D's and F's)
- Homework Assignments (incomplete, missed or poorly completed)
- Poor class interaction/engagement

Referred students will be contacted by the appropriate office to ensure the correct resources for the student will be available. Staff will assist students in identifying challenges (time management, learning management, motivation, financial concerns etc.) and support them in finding solutions.

9. Please summarize levels of performance for your campus during the previous year for each of the following core indicators of performance: 1P1-Postsecondary Retention and Placement; 2P1-Credential, Certificate or Diploma; 3P1-Non-traditional Program Enrollment. You should identify your campus performance in relation to the state goal (provided

in your campus Perkins report card).

1P1-Postsecondary Retention and Placement: As a campus we are sitting with 74% of our special populations who remained enrolled in the postsecondary education program or are placed or retained in the employment, as many of our CTE fields have close to 100% job placement, the focus needs to be on retaining students in the special populations in the postsecondary education program. In reviewing the Perkins Report Card, areas of focus need to be in retaining student in the Transportation, Distribution and Logistics area where only 50% show as retained.

2P1-Credential, Certificate or Diploma: As a campus we have met the state goal of 100% of the percentage of CTE concentrators who review a recognized postsecondary credential during participation in or within 1 year of program completion. Even though this objective has been achieved it should continue to be a focus.

3P1- Non-traditional Program Enrollment: As a campus we are at 9% of the CTE concentrators in programs that fit in career and technical education programs and programs of study that lead to non-traditional fields. As stated previously the incorporation of hands-on learning provides “benefits all students but offers disproportionate benefits for individuals from underrepresented groups.”, this will be achieved by the in-classroom lab work as well as the co-op internships required by many of our programs.

	Campus	State Goal
1P1-Postsecondary Retention and Placement	74%	84%
2P1-Credential, Certificate or Diploma	100%	100%
3P1- Non-traditional Program Enrollment	9%	17%

When you're finished answering the questions on this page, click [Mark as Complete](#). An application cannot be submitted until all pages are marked as complete.

Not finished with this page yet? Click [Save](#) or [Save & Continue](#) to fill out the missing information at a later time.

Part 5. Project Narratives

Project Narrative Directions

Campuses may submit up to 50 projects for their allocation of local funds. When you're finished adding all requested projects, **SCROLL ALL THE WAY TO THE BOTTOM OF THE PAGE** and click **Mark as Complete**.

An application cannot be submitted until all pages are marked as complete.

Not finished with this page yet? Scroll to the bottom of the page and click **Save** or **Save & Continue** to fill out the missing information at a later time.

Project 1

Project 1 Title

Project 1: ASN-Nursing Project/Critical Care in Coding Patients

Project 1 Begin Quarter

Q 1

Project 1 End Quarter

Q 4

1 - Project/Program/Purchase Summary*

The ASN program is asking for Perkin's funds to facilitate the purchase of the Zoll R series ASL Defibrillator with expansion pack and Onestep Pediatric CPR electrode. The current Lifepack 12 utilized in the nursing lab is now out dated and no longer utilized in clinical practice. The Zoll R series will offer students the ability to work with equipment that is comparable to the clinical sites that ASN students currently participate in while in the ASN program. Students will use this equipment throughout the curriculum of the ASN program, as it can be utilized throughout the human lifespan (neonate through gerontology). The following is the breakdown of equipment that is included in the price of the project:

Zoll R Series ALS Defibrillator with Expansion Pack, it includes:

3/5 lead ECG

AC Power

SurePower Rechargeable Lithium Battery

SpO2

ETOC2

Pacing

NIBP

CF/USB

OneStep Pediatric CPR Electrode-Single

Nursing students will be able to monitor patient response to different acute patient care activities within the simulation and skills lab. This equipment allows for students to monitor ECG, blood pressure O2 and ETCO2 in patient care. Students can perform coding activities in all age levels within the nursing labs, as well see how well compression therapy is working in a code patient. This makes nursing muscle memory skills improve as they enter the workforce as a registered nurse.

1 - Expected Measurable Outcome(s)*

1. By the end of the ASN program, at least 95% of nursing students will be familiar and understand the different components of the Zoll R series defibrillator.
2. By the end of the ASN program, at least 95% of nursing students will be able to identify medical situations that need the utilization of the Zoll R series defibrillator.
3. By the end of the ASN program, at least 95% of nursing students will be able to identify the difference in the equipment utilized between adult and children when utilizing the Zoll R series.
4. By the end of the ASN program, at least 95% of nursing students will have the ability to facilitate a code of a patient utilizing the Zoll R Series in all different specialty areas of nursing.

1 - Please identify the results from your Comprehensive Local Needs Assessment that are addressed by this project, program or purchase: (include evidence reviewed and how this project, program or purchases addresses the identified need.)

Students who graduate from MSU-Northern's ASN program often return to their community or stay locally and work as registered nurses. The more exposure to different situations, such as acute patient care increases the efficiency and knowledge base of novice nurses entering the workforce caring for those communities. In discussions with the faculty, clinical sites and the Montana Board of Nursing meetings, it was noted that students graduating during the COVID-19 pandemic needed more hands-on training, as the students who graduated were placed in a higher work demands than prior years. It was the consensus that as nursing programs would continue to give students more hands-on training with hospital utilized equipment to facilitate a higher knowledge base. As the NCLEX-RN exam is changing the format of the test starting in 2023, nursing schools are challenged to get students critically thinking earlier, so that there is a higher percentage who pass their NCLEX-RN on the first try. This knowledge comes from students being able to fully participate with equipment that is mirroring that used within healthcare organizations

Add Projects

Would you like to add another project?

- Yes
- No

Project 2 Title

Project 2: Plumbing Project/Technology Advancement in Plumbing Labs

Project 2 Begin Quarter

Q 1

Project 2 End Quarter

Q 4

2 - Project/Program/Purchase Summary

The plumbing field has seen a lot of new technology in the past decade the main thing being the advancement of battery-powered tools, the days of dragging 100-foot extension cords around the job site to power tools are nearly behind us. MSU-Northern Plumbing Program is applying for an upgrade on some of our current corded inventory to show the student what they will most likely be seeing and using in the field when they get on the job site.

2 - Expected Measurable Outcome(s)

Northern's Plumbing technology Graduates are granted 3000 hours towards their journeyman license exam requirements (7800 total required) and completion of 14 of 15 requires courses. Throughout the 2-year program, each student is required to pass an exam that measures their knowledge of plumbing & plumbing systems. Each student must pass at an 80% or higher to successfully move on to the next assignment. Northern's students leave College at a higher skill and education rate than the OJT apprentices and that results in higher retention, wages, and employer satisfaction. Northern's Plumbing Graduates have a 100% pass rate on the Montana State Plumbing Journeyman license exam . There are rubrics in place for the Plumbing Technology programs that track and score each assignment and student that helps insure success! Employers' surveys show a high demand for our graduates, and a 100- placement rate for our graduates show that Northern is doing it right. By continuing to promote the Plumbing technology

program our graduate number will increase and continue to fill a need to Montana's Plumbing Employers.

2- Please identify the results from your Comprehensive Local Needs Assessment that are addressed by this project, program or purchase: (include evidence reviewed and how this project, program or purchases addresses the identified need.)

The CLNA references the need to maintain strength in Part B2 and C, which state "Programs are aligned to projected industry demand. And Programs incorporate relevant academic, technical and employability skills at every learner level" The surveys and responses from our industry advisory board this proposed project is being responsive for the curriculum and tools that are used by MSU-Northern students is aligned with industry standards tools and techniques.

Would you like to add another project?

- Yes
- No

Project 3 Title

Project 3: Industrial Safety :NC3/3M Worker Health and Safety

Project 3 Begin Quarter

Q 1

Project 3 End Quarter

Q 4

3 - Project/Program/Purchase Summary

The NC3/3M Worker Health and Safety Awareness Program concentrates on the correct use and testing of Personal Protective Equipment (PPE), specifically respiratory, hearing and head/eye/face hazards. IN the USA, most employers are required (under law by OSHA) to provide a safe and healthy working environment. The 3M program will enable students to receive NC3 certifications in the areas listed above and will introduce the students to the concept of a safe working environment.

3 - Expected Measurable Outcome(s)

This program and NC3 certification will be implemented into the IT 111 Industrial Safety/Waste Management course. This course has students who are enrolled in several programs-Plumbing, Electrical, Civil Engineering, Welding, Pipe Fitting and Diesel with an average enrollment of 35-40 students each semester it is offered. The students will participate both in lecture and "hands on learning" during the lab time. They students will complete the certification exams through NC3. The projected outcome will be 85% of the student class population will pass the available certifications. As MSU-Northern has two NC3 campus administrators and MSU-Northern is a NC3 school, the certification tests will be offered at no cost to the students.

3- Please identify the results from your Comprehensive Local Needs Assessment that are addressed by this project, program or purchase: (include evidence reviewed and how this project, program or purchases addresses the identified need.)

Part B-1 states, in part, "maintaining strong partnerships that help connect students with real-world skills and career opportunities." This training and certification is directly related to this statement as safety is an absolute must in the real-world, therefore this training and certification has a direct impact.

Part B-1 states that MSU-Northern offers 18 programs in the CTE, this training/certification will be offered to students in 6 of those program areas (33%), with the option of another possible 3 program areas.

From Part B-1 - several of the CTE programs have national accreditations such as NCCER (plumbing & electrical), AED (diesel). Safety is a priority in all national accreditations.

Part B-2 addresses labor market alignment - the safety training/certification directly relates to requirements of the labor market for employees who are cognizant of safe work practices.

Would you like to add another project

- Yes
- No

Project 4 Title

Project 4: Diesel Project: Powertrains Training Material

Project 4 Begin Quarter

Q 1

Project 4 End Quarter

Q 4

4 - Project/Program/Purchase Summary

CAS Diesel Technology, AAS Diesel Technology, AAS Agricultural Mechanics, BS Diesel Technology, BS Diesel Technology Equipment Management Option, and BS Diesel Technology Field Maintenance Option programs require the knowledge to diagnose and repair heavy duty powertrain components. This project looks to purchase 2 auto-shift transmissions, 2 manual transmissions and 1 Eaton Cutaway transmissions.

Implementing this project will ensure that students are able to meet the requirements of Standard 4 of our AED accreditation. Students will apply advanced diagnostic and repair procedures for power trains systems.

4 - Expected Measurable Outcome(s)

Implementing this project will ensure that students are able to meet the requirements of Standard 4 of our AED accreditation. Students will apply advanced diagnostic and repair procedures for power trains systems. This will be measured by:

Measure 1- Total Lab Grade: Students pass lab objectives with an 80% or higher.

Measure 2- Final Exam: Students pass with an 80% or higher.

The outcomes will be assessed at the end of the first full semester that the components are available for use.

4- Please identify the results from your Comprehensive Local Needs Assessment that are addressed by this project, program or purchase: (include evidence reviewed and how this project, program or purchases addresses the identified need.)

The CLNA references the need to maintain strength in Part B2 and C, which state “Programs are aligned to projected industry demand. And Programs incorporate relevant academic, technical and employability skills at every learner level” but also shows that our non-traditional concentrator percentage is well below the state goal at 4.7%. This project request will increase the amount of hands-on learning opportunities that are available to students in the Diesel programs, including students that belong to high-risk populations (1st generation, low-income and underserved populations). As evidence shows “Active learning benefits all students but offers disproportionate benefits for individuals from underrepresented groups. Widespread implementation of high-quality active learning can help reduce or eliminate achievement gaps in STEM courses and promote equity in higher education.” [1]

[1] Theobald, E. J., Hill, M. J., Tran, E., & Freeman, S. (2020, March 9). *Active learning narrows achievement gaps for underrepresented ... - PNAS*. Proceedings of the National Academy of Science of the United States of America. Retrieved May 23, 2022, from <https://www.pnas.org/doi/pdf/10.1073/pnas.1916903117>

Would you like to add another project?

- Yes
- No

When you're finished answering the questions on this page, click [Mark as Complete](#). An application cannot be submitted until all pages are marked as complete.

Not finished with this page yet? Click [Save](#) or [Save & Continue](#) to fill out the missing information at a later time.



Program Assurances

Download a copy of the 2022-2023 Carl D. Perkins Program Assurance Agreement to be reviewed and signed by the campus dean or president.

[Program Assurance Agreement Perkins V 2022-2023.docx](#)

Upload the signed copy of your campus's 2022-2023 Carl D. Perkins Program Assurance Agreement here.

[MSUN Perkins Assurance Agreement.pdf](#)

Submit your acknowledgement.

I acknowledge I have read the Carl D. Perkins Program Assurance Agreement and have uploaded a copy of the Program Assurance Agreement read and signed by the appropriate campus leadership.

Budget

Proposed Budget Summary

Expense Budget

	Grant Funded	Non-Grant Funded	Total Budgeted
00 - Administrative/Indirect Costs			
Indirect Costs	\$2,563.52	\$0.00	\$2,563.52
Subtotal	\$2,563.52	\$0.00	\$2,563.52
07 - Minor Equipment			
Project 1: ASN Project: CPR Electrode	\$187.90	\$0.00	\$187.90
Project 2: Plumbing and Crimp Jaw	\$700.00	\$0.00	\$700.00
Project 2: Plumbing Drain Cuter (6)	\$150.00	\$0.00	\$150.00
Project 2: Plumbing Fitting Trays (6)	\$360.00	\$0.00	\$360.00
Project 2: Plumbing Pex Fitting Press Tool	\$750.00	\$0.00	\$750.00
Project 2: Plumbing PEX Joining	\$2,400.00	\$0.00	\$2,400.00
Project 2: Plumbing Pipe Threader	\$1,700.00	\$0.00	\$1,700.00
Project 2: Plumbing Switching Relay (4)	\$700.00	\$0.00	\$700.00
Project 2-Plumbing Copper Press Tools (2)	\$4,200.00	\$0.00	\$4,200.00
Project 3: Industrial Safety 3M Kit	\$10,419.30	\$0.00	\$10,419.30
Project 4: Diesel-Auto Shift Tran(2)	\$6,000.00	\$0.00	\$6,000.00
Project 4: Diesel-Manual Tran (2)	\$5,000.00	\$0.00	\$5,000.00
Subtotal	\$32,567.20	\$0.00	\$32,567.20
12 - Major Equipment			
Project 1: ASN Nursing Project	\$24,595.00	\$0.00	\$24,595.00
Project 2: Plumbing Power Threader	\$5,200.00	\$0.00	\$5,200.00
Project 4: Diesel Transmission	\$35,000.00	\$0.00	\$35,000.00
Subtotal	\$64,795.00	\$0.00	\$64,795.00
Total Proposed Cost	\$99,925.72	\$0.00	\$99,925.72

Revenue Budget

	Grant Funded	Non-Grant Funded	Total Budgeted
Grant Funding			
Award Requested	\$99,925.72		\$99,925.72
Subtotal	\$99,925.72		\$99,925.72



	Grant Funded	Non-Grant Funded	Total Budgeted
Non-Grant Funding			
Cash Match		\$0.00	\$0.00
In-Kind Match		\$0.00	\$0.00
Subtotal		\$0.00	\$0.00
Total Proposed Revenue	\$99,925.72	\$0.00	\$99,925.72

Proposed Budget Detail

See attached spreadsheet.

Proposed Budget Narrative

07 - Minor Equipment

Include a line item for each program-specific equipment under \$5,000. Include "Project #" with your line item title. For example: "Project 1 - Dental Equipment".

Project 2-Plumbing Copper Press Tools (2)

2 -1/2" to 1" copper press tool @ \$2,100.00

Project 2: Plumbing Pex Fitting Press Tool

Viega PEX fitting press tool 1/2" -1" 1@ 750.00

Project 2: Plumbing Pipe Threader

1-Handheld battery-powered steel pipe threader

Project 2: Plumbing Switching Relay (4)

4-Taco Zone Switching Relay @ \$175.00

Project 2: Plumbing PEX Joining

1- Rehau PEX Joining tool

Project 2: Plumbing Drain Cutter (6)

6- Plastic Drain Pipe Cutter @ \$25.00

Project 2: Plumbing Fitting Trays (6)

6- Fitting Trays @ \$60.00

Project 1: ASN Project: CPR Electrode

2-OneStep Pediatric CPR Electrode-Single @ 93.95 each

Project 4: Diesel-Auto Shift Tran(2)

2- Eaton RoadRanger RTLO-16913L-DM3 13-speed Auto-shift transmission. @\$3000.00

Project 4: Diesel-Manual Tran (2)

2- Eaton RoadRanger RT-14613 Twin countershaft manual transmission with auxillary @2500.00

Project 3: Industrial Safety 3M Kit

Item Quantity SFTY GLSSES - FM LND VIRTUA - CLR ANTIFG 20 GOGGLE GR 500 SERIES CLEAR AF LENS 10 RATCHET FACESHIELD ASSEMBLY BLU 9X14-1/2 5 SECURE FIT CLEAR SAFETY EYEWEAR 20 HARD HAT WHITE VENTED 4-PT RATCH SUSPEN 5 HARDHAT FULL BRIM UV IND YEL 20/CASE 1 SECUREFIT HELMET WHTIE 1 EAR CLEAR EAR 319-1002 1 EA/CASE 1 PELTOR OVER THE HEAD EARMUFFS 10 EA/CASE 2 PELTOR EARMUFFS 2 PELTOR EARMUFFS FORESTRY ORANGE 10 EA/CS 1 PELTOR PROTAC III SLIM HEADSET BLACK 1 EAR SKULL SCREWS EARPLUGS 480 PAIR/CS 2 NO TOUCH FOAM PLUGS UNCORDED 100PR 2 YEL NEONS UNCORDED EARPLUGS REG SZ 200/BOX 2 EARPLUG ULTRFIT CORDED (100/PACK) 2 CLASSIC PLUG/PILLOW PACK (200/PACK) 2 PELTOR X1/X2 EARMUFF PROBED TEST CUSHION 2 EAR PLUG SOFT YELLOW NEON 2 ULTRAFIT PROBED TEST PLUGS 2 CLASSIC PROBED TEST PLUGS 2 NO TOUCH PROBED TEST PLUGS 2 PLUG EAR TEST 3M SKUL SCREWS PROBED TEST 2 EAR ROLL MODEL 1 EA/CASE 10 VERSAFLO HOOD WITH HEAD MED/LRG 5 EA CS 1 VERSAFLO HEAVY INDUSTRY PAPR KIT 1 EA/CS 1 3M HALF FACEPEICE 6100/07024(AAD) SMALL 2 3M HALF FACEPEICE 6200/07025(AAD) MEDIUM 2 3M HALF FACEPEICE 6300/07026(AAD) LARGE 2 QUICK LATCH HALF FACESHIELD REUSEABLE SML 1 QUICK LATCH HALF FACESHIELD REUSEABLE MED 1 QUICK LATCH HALF FACESHIELD REUSEABLE LRG 1 SMALL FULL FACE RESPIRATOR 1 MD FF RESPIRATOR 1 LG FF RESPIRATOR 1 FIT TEST ACCESSORIES COLLART 1 FIT TEST ACCESSORIES (2/PACK) 5 3M QUALITATIVE FIT TEST APPARATUS (BITTE) 1 CARTRIDGE/FILTR ORGANIC VAPOR/P100 (2/PK) 6 MULTI GAS/VAPOR CARTRIDGE 6006 (2/pack) 6 PARTICULATE FILTER 2097/07184 (AAD) P100 20 R95 PARTICULATE RESPIRATOR (20/PACK) 1 N95 PARTICULATE RESPIRATOR (20/BOX) 1 N95 PARTIC RESPIRATOR W/VALVE 10PK 2 AURA FLAT-FOLD RESPIRATOR N95 2 3M BRAND RESPIRATOR CLEANING WIPE 1 7100062125 EAR FIT DUAL VAL SYS 1

Project 2: Plumbing and Crimp Jaw

2- PE X ring crimp jaw 1/2" and 3/4" for press tool @350.00 each

12 - Major Equipment

Include a line item for each major equipment over \$5,000. Include "Project #" with your line item title. For example: "Project 1 - Dental Equipment".

Project 1: ASN Nursing Project

Zolle R Series ALS Defibrilator with Expansion Pack

Project 4: Diesel Transmission

Daktic EC-1108_053155 Cutaway Eaton Transmission Trainer.

Project 2: Plumbing Power Threader

Power Threader for Pipe Threading