



## **Roughrider Area Career & Technical Center Directors Report September 2018**

### **Meetings/Activities**

September 30 - October 1, 2018 - Healthcare Explorers trip

October 2 – CTE Director meeting in Bismarck

October 3 – RACTC Board Meeting

### **High Technology Equipment**

The first rotation schedule has been completed. The next rotation is scheduled for October 9<sup>th</sup>. Global Technology held their first training of the year. The RACTC had 2 teachers present at the embroidery workshop. The new laser engraver is in and Global Technology is configuring computers for future delivery of this module to schools.

**The CNC router training for next week September 24 and 25 has been postponed, not enough signed up. GTI hopes to reschedule.**

The next trainings are:

3D printing - October 19 and 20

Mastercam Art - October 29 and 30

If interested please contact Michele at the address below, include me in your email

[Michele@gtind.net](mailto:Michele@gtind.net) - 701-663-2968

For new board members/teachers/administrators here is a description of the equipment that is rotated through our member schools. The cost for member schools is \$2500.00. This gives our schools access to the equipment plus another \$49,500.00/year to purchase new equipment and update units.

Eleven RACTC schools participate in the Emerging Technologies program that introduces students to high tech equipment. The ten member schools are Beach, Belfield, Glen Ullin, Hebron, Hettinger, Killdeer, Mott/Regent, New England, New Salem, Scranton and South Heart. The RACTC currently rotates this equipment to member schools for a six week period of time. At this time we are rotating around \$260,000 worth of equipment to member schools. A major component of this project is the ongoing training of instructors and keeping the equipment in good working condition. The equipment that is currently being rotated is:

### Hydraulic/ Pneumatic/ Mechanical

This module is intended to teach the core concepts of mechanical/industrial technology. The trainers include all parts necessary to learn the basic principles of mechanic, pneumatics and hydraulics.

### Biotechnology

This unit utilizes a series of experiments in DNA extraction and plant growth cycles. The unit contains all the equipment and perishable supplies needed to extract and analyze DNA and to observe the plant life cycle.

### Global Positioning/ Global Information Systems

The unit introduces students to the complete study of GPS functions and operations. It also introduces GSI data base with hands-on activities.

### CNC Router

The module is intended to teach computer numerical control and machining concepts. Students experience the design, programming and production of a finished part. The unit uses industry standard CAD and CAM software to teach students about today's automated manufacturing systems.

### Laser Engraver

This module is designed to take students from manipulating graphics to production of a final product. The module is ideally suited for preparing students for the rapidly increasing demand for workers in the graphics and production career area.

### Portable Welder

The module is designed to provide students with access to different types of portable welders. The students are introduced to SMAW and GMAW equipment.

### Embroidery

The commercial embroidery module is intended to continue CNC principals based on the Universal Coordinate System and plotting points. It utilizes computers with embroidery digitizing and editing software. Students are exposed to cost and time of manufacturing.

### 3-D Printer

The 3-D printer unit is designed to teach students the principles of 3-D drafting using SolidWorks. The students are able to design and manufacture parts using the Uprint 3-D printer. In manufacturing the 3-D printer is used to design prototype parts before production.

### Vinyl Printer/ Cutter

This unit gives students the ability to design and print vinyl products using the Roland BN-20 Printer. The unit makes use of the CoralDraw program for design purposes.

## **DHS Health Science Program**

The RACTC purchased 21 chrome books for student use at Dickinson High School. Mrs. Bobbie Johnson is using these computers for Google classroom. Google Classroom is a free web service developed by Google for schools that aim to simplify creating, distributing and grading assignments in a paperless way. The primary purpose of Google Classroom is to streamline the process of sharing files between teachers and students.

I want to thank all of our RACTC teachers for teaching in a very innovative way. ITV and online instruction is not easy.

A big thanks to...

Bobbi Schneider - Health Science Hebron

Bobbie Johnson - Health Science Dickinson

Riston Zielke – Agriculture Hebron

Misty Steeke – Agriculture Scranton

Paula Lengowski – Information Technology South Heart

Shelly Christensen – Business Education Glen Ullin, also RACTC Webpage maintenance

## **Healthcare Explorers Trip Itinerary**

**The following is the schedule for the RACTC Health Science students that are going on the field trip to the UND school of Medicine and NDSU tour. The RACTC contracted a bus through Dickinson Public schools and can carry 30 students.**

**12:00 Mountain Time Sunday, Sept 30 Leave DHS parking lot.**

Arrive at Hotel **CENTRAL TIME – all following times CST.**

7:30pm Buffet supper at Italian Moon – pizza, chicken, pasta, etc. (They close at 9:00)

Monday, October 1 Leave hotel at 8:30am. UND School of Medicine:

9:00 am Medical Lab Sciences

9:30 Anatomy presentation

10:00 Occupational Therapy

10:30 Physical Therapy

11:00 Athletic Training

11:30 Simulation Center

12:00 Lunch at Wilkerson Hall (stop in at the Gorecki Alumni Center- 3501 University Avenue- for the meal passes that will be provided for your group to eat at Wilkerson).

1:00 Kim Ruit, the pre-health advisor will visit with your group at the Gorecki Alumni Center

1:30 Admissions presentation

2:00 Walking campus tour.

Lunch at the NDSU dining center.

1:00 NDSU admissions, health careers, campus tour.

Cost/student: You bring money for snacks, etc.

Hotel – 4 students/room/2 nights \$ 16.00 (\$62/room 12 dbl's) Includes breakfast Quality Inn  
Columbia Mall 701-775-7503

Italian Noon Sunday buffet supper \$ 13.00 701-772-7277

NDSU or UND lunch \$ 3.75

Pizza Ranch, Jamestown Monday \$ 12.99 701-952-2000 confirm time and number

Chaperone expense \$ 4.26

**Cost \$ 50.00** Make check payable to Post 9052 and attach to your  
UND/NDSU trip application. That fee does NOT include the Boy Scout Explorer Post renewal  
fee of \$32. which is also required for anyone who joined prior to October 2016.

## **RACTC Classes**

RACTC classes are off to a good start. Blackboard and PowerSchool are set for all of our students. This is not possible without the partnerships that have been formed. I want to thank Bill Strasser, Director of the Great Western Network, for his work programming the ITV studios, Alissa Thiele, the Western NDCTC PowerSchool Specialist from the Bismarck Center and Anthony Willer, DSU, for setting up Blackboard for our students.

RACTC student numbers are up 45 students from last year, with a total this year of 252.

Health Science ITV - 110

Health Science Dickinson – 101

Agriculture – 31

Information Technology – 10

## **RACTC Reporting**

All reports due to the Department of Public Instruction through stars have been submitted. The past two weeks I have had the opportunity to sit with Superintendents to review the annual plans for their teachers and career counselors before they were submitted to NDCTE.

Some good news this morning. I was talking to Kelly Pierce, State Supervisor of career counseling at NDCTE, about a career counselors annual plans. I asked since we hold the plans for four career counselors from member schools in the RACTC, how about the career counselor

being shared by two member schools, Glen Ullin and Hebron. She called back and said that they will move her plan to the RACTC.

Thanks for the work that career counselors are doing in their schools.

Maxine Hauck – Dickinson

Krista Olson – Hettinger

Leanne Bennes – Beach

Kari Mayer and Deb Bohn – Mott/Regent

Kayla Knoll – Hebron and Glen Ullin