



Third Period Technical Training

- Industrial Mechanic (Millwright) -

(8 Weeks @ 30 Hours per Week = 240 hours)

Third Period Technical Training – Industrial Mechanic (Millwright)

Darren Stacey

Chair, Metal Trades & Industrial Mechanic (Millwright)

780-792-2675

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Instructor(s):

Tom MacLellan – Instructor

780-792-5075

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Terry Seaward – Instructor

Terry.Seaward@keyano.ca

780-791-4909

Peter Eckhold - Instructor

Peter.Eckhold@keyano.ca

780-792-5734

Office Hours:

Monday through Friday: 8:00 am to 4:00 pm

Required Textbooks: (available at Keyano College Bookstore approximately 2 weeks prior to start date)

Third Period Millwright Apprenticeship ILMs w/supplemental texts

Alberta Learning

Edmonton: Author, 1998–, SKU 2001313

Industrial Mechanic (Millwright) Program Supplies (Required for all periods):

- 3-ring binders, dividers, and lined paper
- 6 or 12 inch ruler
- Pens, pencils, highlighters, erasers
- Calculator (with no programmable memory; Casio FX 260 is recommended)
- Coveralls or smock
- CSA approved safety boots
- Safety Goggles with side shields
- Work gloves
- Although classes are scheduled in person, we ask that all students are prepared with the technology required for virtual classes (online) should it become necessary; Computer/laptop, microphone, camera and internet access.

Course Description:

In the Third Period Technical Training you will learn about:

1. Compressors
2. Fluid Power
3. Fans, Heat Exchangers, Industrial Refrigeration and Dryers
4. Levelling, Alignment and Pipe Strain

Learning Outcomes

Upon successful completion of Section One – Compressors - you will be able to

1. Apply compressor fundamentals.
2. Use compressor components.
3. Service compressor systems.

Upon successful completion of Section Two – Fluid Power - you will be able to

1. Apply fluid power fundamentals.
2. Service hydraulic components.
3. Service hydraulic systems.
4. Service pneumatic components.
5. Service pneumatic systems.

Upon successful completion of Section Three – Fans, Heat Exchangers, Industrial Refrigeration and Dryers - you will be able to

1. Service fans.
2. Service heat exchangers.
3. Service Industrial refrigeration components.
4. Service gas and air dryer systems.

Upon successful completion of Section Four – Levelling, Alignment and Pipe Strain - you will be able to

1. Perform levelling procedures.
2. Perform laser shaft alignments.
3. Perform bore alignments.
4. Perform pipe strain corrections.

Schedule

A detailed daily class / shop schedule will be handed out on the first day of each intake.

Grading

Apprentices must successfully meet three criteria to pass technical training.

1. Minimum 65% Theory Component (cumulative weighted average)
2. Minimum 65% on each Practical Component
3. Minimum 50% on every section of study.

Compressors	38%
Fluid Power	37%
Fans, Heat Exchangers, Industrial Refrigeration and Dryers	13%
Levelling, Alignment and Pipe Strain	12%
Total Theory Component	100%
Lab/Shop	100%
Total Practical Component	100%

E-Learning

Technology and internet will impact your online learning experience. It's important that you are able to watch an online video and other course materials, take online quizzes, and participant in a live class with your instructor and other students.

Keyano College operates in a Windows based environment and having the correct tools for online learning is important. Here's a list of recommended system requirements:

Internet Speed

Minimum Internet speeds of 5 Mbps.

Recommended Internet speeds of 25 Mbps (especially if you are sharing your internet at home). Check your internet speed with Fast.com.

System requirements:

Microsoft Windows	Apple
Minimum Requirements: - A Windows 10 computer/laptop - Minimum 4GB of RAM. 10GB+ available hard drive storage. - Enough available hard drive space to install the Microsoft Office suite (approximately 3GB). Microsoft Office software is free to all Keyano students and employees. - Microphone, webcam and speakers. A headset with a microphone is recommended. - System updates must be regularly installed. - Anti-Virus / Anti-Malware software	Minimum Requirements: - A Macintosh (V10.14 and above) computer/laptop - Minimum 4GB of RAM. 10GB+ available hard drive storage. - Enough available hard drive space to install the Microsoft Office suite (approximately 3GB). Microsoft Office software is free to all Keyano students and employees. - Microphone, webcam and speakers. A headset with a microphone is recommended. - System updates must be regularly installed. - Anti-Virus / Anti-Malware software.
Recommended Requirements 8GB of RAM - A method of backing up/synchronizing to local or cloud-based storage such as OneDrive is highly recommended. This is included if you complete the setup of KeyanoMail and download MS Office using your Keyano email for free.	Recommended Requirements 8GB of RAM - A method of backing up/synchronizing to local or cloud-based storage such as OneDrive is highly recommended. This is included if you complete the setup of KeyanoMail and download MS Office using your Keyano email for free.
Chromebooks are not recommended as they are not compatible with testing lockdown browsers. A Microsoft Surface or iPad or iPad Pro may be possible alternatives in some program areas.	

Specific department requirements:

Business and OA programs require Windows 10.

Other programs may utilize Windows based tools as well.

Computer Software

Students will be able to get access to Microsoft Office 365 for Free using Keyano Credentials by [clicking here](#).

Recording of lectures and Intellectual Property

Students may only record a lecture if explicit permission is provided by the instructor or by Accessibility Services. Even if students have permission to record a lecture or lecture materials, students may not publish any of the lectures or lecture materials, this includes any recordings, slides, instructor notes, etc. on any platform. Thus no student is allowed to publish or sell instructor notes without formal written permission. It is important to recognize that the Canadian Copyright Act contains provisions for intellectual property.

ITS Helpdesk

If you are having issues with your student account, you can contact the ITS Helpdesk by emailing its.helpdesk@keyano.ca or calling 780-791-4965.

Important Phone Numbers

- **Nancy Nicholle, Administrative Assistant** **780-791-4881**
Call Nancy if you are going to be absent from class or have any general questions or concerns.
- **Darren Stacey, Metal Trades and Industrial Mechanic (Millwright) Chair** **780-715-3902**
Call Darren if you have any concerns with class work, instructors, or if you require any type of academic accommodations.

Call your instructor if you need information about class work, schedules or if you need extra help to learn the material.
- **Mark Power, Alberta AIT** **780-743-7181**
Call Mark if you have questions about attendance, apprenticeship, or your employer.
- **Security** **780-791-7911**
Call security if you feel threatened while on campus, to report a fire, if you need a door unlocked, or for parking issues.
- **Office of the Registrar**
 - **Registration Assistants** **780-791-4801**
Call this office if you have questions about fees/tuition or class availability.
- **Student Life Calendar** <https://calendar.keyano.ca/student/>
Refer to the Student Life calendar for events and important dates for students.

IMPORTANT NOTICE

Information Regarding Fees and Procedures

If the address listed on your fee assessment sheets is different from your current address, or if your address changes anytime during the duration of your program, please go to the Student Services Centre and fill out the “Change of Address” form as Keyano College requires a current address for you at all times.

Your Student ID cards are available for pick up in the Office of the Registrar. Please have your Student ID # and photo identification available. Apprentices are required to pick up a new Student ID card every Academic Year.

For information on Awards/Bursaries, please contact the Student Services Center either in person or by phone at (780) 791-4894.

Keyano College is a paid parking facility. Parking passes can be purchased through the **Honk Mobile App**. Current rates can be found at: <https://www.keyano.ca/en/about-us/parking.aspx>

When parking, please be mindful of designated areas (“Reserved”, “Metered”, etc.) Unreserved, General Parking is available in lots A, B, E and F. Lots C and D are reserved staff parking. If you park in a reserved spot, you can be ticketed even if you have a hang tag or daily pass. Please see the campus map for locations of the parking lots.

Please Note:

- It is now your responsibility to submit your E.I. forms on your own time. (HRDC no longer comes to the college)
- You can submit your registration on-line
<http://www100.hrdcdrhc.gc.ca/ae-ei/dem-app/english/home2.html>
- Or link from <http://www.servicecanada.gov.ca>

CLEARWATER CAMPUS MAP

The map illustrates the layout of Keyano College, divided into the Main Floor and the 2nd Floor. The Main Floor is a large complex with various rooms and facilities. The 2nd Floor is a smaller, more linear structure. The map is oriented with King Street to the east and Franklin Avenue to the south.

MAIN FLOOR

- AC122 Recital Theatre**
- Arts Centre (Room prefix AC)**
- Arts Centre Classrooms**
- Keyano Theatre**
- Elements Dining**
- Elements Meeting Room**
- Health Services**
- Facilities**
- Process Operations**
- Carpentry**
- Trades Office**
- LINC**
- Bookstore**
- Finance**
- Library**
- Accessibility Services**
- Office of the Registrar**
- Human Resources**
- King's Lounge**
- Purple Palace**
- General Parking**
- King Street**
- Franklin Avenue**
- Syncrude Sport & Wellness Centre SSWC**
- Bob Lamb Building**
 - Testing Services
 - Power
 - Engineering
 - Continuing Education
- Syncrude Technology Centre (Room prefix S)**
- Environmental Laboratory**
- Classrooms**
- Instructor Offices**
- Study Lounge**
- Information Computer**
- Nursing**
- Skill Centre**

2ND FLOOR

- Classrooms**
- Science Labs**
- Instructor Offices**
- Wellness Services**
- SAWC**
- Academic Office**
- Director's Office**
- Lecture Theatre**
- Classrooms**
- Instructor Offices**

Keyano COLLEGE