

Transcript: [Episode 15 / December 28, 2009](#)

Coming up next on ATETV:

Engineering technology.

With our technology programs any opportunity to actually use the equipment that they'll be using out in industry with equipment, software all those things we try to integrate in the classroom.

Process technology.

We can look at a piece of equipment like this and we know what that is and we know what it does.

And information security.

We tried to simulate protecting your company from internet threats. These students really got a feeling for the hands on, setting up the router, setting up the server, setting up the firewall and all the little problems that go along with it.

Now on ATETV.

From across the country to your own backyard ATETV shows you the many advanced technological education opportunities available at your local community college.

Water purification and air quality operations require highly skilled well educated technicians. If a career in engineering technology with an environmental focus interests you take a look at this.

BCC much like many community colleges essentially has an open door policy so if a student comes to us and they say they want to join our engineering technology program or our engineering transfer program we will let them in.

This one should be powered up if there's any juice left.

Technical schools and community colleges we're working towards a career program to help the people to get right into this work force and give them the skills that they need.

Environmental technology is essentially any type of technology designed to protect or enhance our environment. We have a number of different areas where you could go into. Anything from waste water and freshwater, our water supply is extremely important and how we handle our water after we're done using it.

What we're trying to do is recreate what's going on in the treatment plant. We also do a great deal of work with GIS because if you're going out to check things in the environment to monitor what's going on you need to know exactly where it is and position and location often plays a big role on things like water flow and digiography is an essential part of that.

In addition to your technical courses you also have a series of general education courses and so they're gonna be taking math, English, history and then they'll take their main courses. Intro to the environment

This is a flowing artesian well

waste water technology 1, they're required also to take CAD and the introductory course in computer skills for engineers cause this is part of an engineering technology program.

With our technology programs any opportunity to actually use the equipment that they'll be using out in the industry whether equipment, software all those things we try to integrate in the classroom.

I take the students out to the field. We go to waste water plants, we go to drinking water plants, we work out on the reservation with the water supply, it's just invaluable for the students to have that hands on experience.

Jobs in engineering technology are in high demand and your local community college offers engineering technology programs that can help you begin a rewarding and lucrative career.

Are you interested in on the job training while also earning academic credit? How about getting a secure high paying technical job after just 2 years in school.

Community colleges are working closely with employers to make opportunities like these a reality.

Remember this cause it's gonna be on a quiz somewhere: grease is an oil with an additive.

This is the same type of equipment that you see in refineries and chemical plants.

Process technology is taking material and turning it into something useful. For instance oil into gasoline, petrochemicals into fibers for rugs, pharmaceuticals, even taking barley and malt and turn it into beer.

My name is Zachary Bundy I'm from Casper Wyoming. I'm attending College of the Mainland for the Process Technology Program.

So what we're seeing here is a distillation column.

The internship is a very great experience. Its 300 hours of work experience and they're actually looking to hire you at the end of this. I think of it as you know a 1 or 2 month maybe 3 month long interview for them to get a better look at you and as long as you do a good job you'll be hired out there.

At first you know when you first get around this equipment you don't know what it does it could seem a little intimidating. The Process Technology Program has really given me a great opportunity to get some hands on experience. We can look at a piece of equipment like this and we know what that is, we know what it does.

Making 30, 32 dollars an hour at 23 is definitely a good thing so I'll definitely be able to get started off on the right track. I've already started my 401K and everything like that so it's definitely a

good start and I plan on learning as much as I can and you know moving up maybe even become a supervisor someday, maybe even higher than that you never know what it's going to bring but I just want to challenge myself and learn as much about that plant as I can.

Wow 300 hours of work experience while still in college and then to be hired by your internship employer when you graduate. Your local community college can help you get an internship and start your career in process technology.

Internet security, cyber security it all boils down to keeping information safe.

If you love computers and are interested in learning how to keep information safe be sure to check out security related programs like this one.

Here's your router. It'll go to the firewall.

I'm Andrew Maynard I'm a CIT professor here at Springfield Technical Community College.

You're the web one.

See protection... IP address range. So we connect everything to the hub and something off the router.

We have 4 degrees in our department. We're preparing programmers for programming jobs, we're preparing web programmers for web programming jobs and then we also have a microcomputer specialist degree and a information security degree and there's an awful lot of that stuff that even if outsourcing does become a big problem that a lot of this stuff has to stay in the country or will stay in the country. Especially security is growing extremely strong and there's a strong demand for it.

There's a lot of sensitive information that's out there and we have to try and keep it secure so that the wrong people don't get a hold of it.

So obviously from a corporate level they're actually creating more and more just specific security jobs.

So now you're gonna want to put what router here? You tell me what router you put in there.

The internet 407.

A lot of the businesses are now paying attention to information security through regulatory compliance. You're seeing a lot of the states come out with a new information security program that all businesses are gonna have to comply with so the need for security professionals is increasing.

You know you might end up as a junior network person so you're building firewalls, your protecting work stations with antivirus software, you're figuring out where the threats are coming from, your eradicating viruses.

There's the router it'll go to the firewall.

We try to simulate protecting your company from internet threats.

Are you booting it? So now make sure you can ping all the way through.

There's a lot of problems out there right now you know people stealing we just want to prevent any attacks on companies in general.

These students really got a feeling for the hands on, setting up the router, setting up the server, setting up the firewall and all the little problems that go along with it.

Like you don't see any routes for the STCC network.

Ok

Today I'm working on ISO server. I'm working on actual Juniper routers. I'm dealing with actual real world items and that's just been you know invaluable.

7, 2. Just put 0

Not only do we try to give you the necessary theory to be good but we also really try to promote the hands on aspect. So if after 2 years you need a job you can pretty much hit the ground running.

The router itself can configure the routes to go back and forth right?

Highly skilled technicians who can set up systems to protect electronic data are vital to our national security, are in very high demand and make really good money.

Check out your local community college to see how you can get started in the field of information security.

For more information on anything you've seen today explore our website at ATETV.org. Thanks for watching.