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**CAREERCONNECT**

## TechConnect Industry Summit – April 26, 2016

### Breakout Sessions

Stacy Miller – CareerConnect Pathways Director

“When you go out into the world, you have to be prepared. When our kids go out there into the world, they have to have the right equipment, the right people there that are going to reach out and catch them and support them. They have to want to learn to navigate this world that we all know is slippery sometimes. We all have a responsibility to the kids of Denver.”

She then showed a few videos of students in the CareerConnect program at West, asked them what they’re learning in class, and what they enjoy.

- Eliseo Vigil wants to be a forensic scientist.
- Amy Cera talked about her class and her excitement for her upcoming internship.
- Angel Hernandez discussed how he didn’t know what he wanted to do with his future before his CareerConnect class, but after taking it, he came out with a clear goal. He is a freshman taking concurrent enrollment classes so he can get credit and spend time in high school. He thinks he’ll be using what he’s learning in class for the rest of his life. He said, “If you just pay attention and have drive, it’ll be worth it to you.”

Stacy finished her time by saying, “Let’s help students build the life of their dreams.”

### Group 2 - Exploring Computer Science - Emily Burchell

#### Project: Teaching Web design, coding, graphic design

Emily uses code.org to teach coding but realized she doesn’t love their HTML/CSS lessons and believes they’re going to slow. She teaches students about tags and inline style, they also get references - basic HTML before CSS but then when she’s converting students from HTML to CSS, it gets tricky.

Emily has found that students start being pretty intimidated but they get more confident as they start to learn but then need continued support as it gets more complicated. She has them creating a website based on their desired career field when they graduate.

Some of the ideas for Emily’s Classroom:

- Wonder if they could dive closer into the career paths specifically connected to coding/computer science (like info security, website design...)
- Help students understand different certificate programs available - Harvard and Code.org will give certificates that are good to put on a resume
- Creating real life examples of website and what’s optimized or not optimized
- Looking deeper into not just the code but the context and what makes something good and what makes something really different
- Maybe challenge students to present what they created, not just build the site but present about it too
- HTML is like cursive, it must be known by all
- At Code For Denver – the whole group will pitch a few ideas then everyone agrees to the project and builds it together
- Add the little components of soft skills to the skills they’re learning code-wise



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- Teaching students how to rework projects and not just quit when they're done
- Code Academy - might help transition

### **TechConnect - Elaine Giromini**

**Project: Programming robot to** pick up ping pong balls, move things around

Elaine creates various factors for challenges: limited resources, time frame, efficiency of task. She does rubric sharing student evaluate/ critique each other using rubric. By the end, robot teams change by challenge final challenge robotics in nuclear power plants - research plants pick up "nuclear rod".

Feedback:

- Great layout layout - includes soft skills: prob solver, group work, communicate
- What opportunities are there for students to create own challenges and would find useful in own life - design process (ex: prosthetic limb)
- Add a human element to project
- Good to keep (continue the journaling method and helping students know strengths)
- How to initially get students engaged?
- Female students: separate and make only girl group - how to include them? The girls in class tend to take the lead role
- Changing the rules of challenge is very real world - keep it
- Roles on a team that reflect what industry teams look like: ex: prog manager
- Have industry professional come in CareerCollaborate
- How do mistakes come into the learning process, graded environment to know mistakes are ok - productive struggle
- Give resources but not answers: mistakes are welcome and learn from one another and help each other

### **Wrap Up Session**

"To advocate for human conversation as a means to restore hope to the future is as simple as it can get. But I've seen that there is not more powerful was to initiate significant change than to convene a conversation. When a community

Meg Wheatley

Group broke up into different teams and answered questions:

Questions:

What are some innovative ways we can reach and engage new company / higher ed partners?

- Appealing to what is in it for the company (ROI) – time well spent
- Connect with company HR Depts to "pitch" the give back component (summits)
- Networking opportunities for companies
- Being involved in "grooming" future work candidates
- More success with start up
- Schools included in the ask/invite (teachers, PD's...)



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How do we make harder, more math-based coding more accessible to students?

- Critical thinking
- Project based in real world examples (IE budget with code lead to sale conversions / video games)
- Integrate more “original” coding, into robotics, and go for autonomous functioning
- 1:1 attention / tutoring
- Group-oriented learning, peer support
- Code translation (OPTIV - cyber security)
- Use Math fellows for lesson support
- 21<sup>st</sup> century skills

How can we align TechConnect course content with experiences offered through CareerX and the CareerConnect mentoring program?

- Involve industry (one on one?) have WBL coordinators present and get feedback from company (matched by class attending events)
- HR Department / company’s website – Entry-level job position
  - Shows needed work experience, competencies
  - What you don’t have on your resume, gain experience
- Ensure teachers attend CareerX rehearsals AND events to bring content back to class/course
- Making time in class to talk about the work being done
- Having observational feedback from someone in the industry coming and observing a class

How can we ensure our school-based teams are up to date and trained on industry innovations??

- List of possible training opportunities
  - Where?
  - How would it be updated? (Give teachers the opportunity to train so in turn can teach students)
  - Partner with HR depts. (look at role profiles – stay current)
  - Teacher shadowing / externships
- Take advantage of online learning
  - Identify what is relevant
  - Utilize teachers / curriculum sharing to learn what works
  - Think about “cohort” type relationships with companies to take advantage of LMS training
- If students cannot participate, consider additional funding to “upgrade” teacher knowledge

What are some selling points for companies to participate in summits and work-based learning? How can we engage with more companies?

- Company identifies recruiting strategies and it’s hard to fill positions
- District reaches out to companies
  - What are your needs?
- District identifies time and effort commitment desired
- Offering experience to deliver trained employees
- Emphasizing exposure to various tech experiences, lead to more diverse young talent



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What specific short-term (6-9 week) projects should our students be tackling in their classes in order to best prepare for internships and industry?

- Project based learning - 3-4 per group
  - Business plan/project
  - Biz pitch
  - Wire frame app, create task ap
  - Culminating project
  - Teamwork - CEO in group
- Soft skills / leadership development
  - CareerLaunch included - two 1-day soft skills training
  - Soft Skills SLO (Student Learning Objectives)
- Community needs
- Change up teams / rules mid-stream
- Hire away from other teams with interview process / training
- Public showcase
- Aligned to real world - too broad?
- Make it practical / relevant