

Career and Technical Education Advisory Council
Fairbanks North Star Borough School District

Monday, February 12, 2018
5:30 – 7:00 p.m.

520 Fifth Avenue
School District Administrative Center
Boardroom

AGENDA

A. PRELIMINARIES

1. Call to Order
2. Roll Call / Introductions
3. Approval of Agenda
4. Approval of November 29, 2017 Minutes

B. PUBLIC COMMENT ON NON-AGENDA ITEMS

C. REPORTS

1. CTE Survey Report: <https://www.k12northstar.org/cte>

D. OLD BUSINESS

1. FY18 Perkins Re-Allocation

E. NEW BUSINESS

1. Re-Envisioning CTE Introduction & Process Overview
2. Current State: Review of Needs Assessment Data / Key Learnings Thus Far
 - i. CTE Student / Parent / District Employee Survey Results
 - ii. CTE Employer / HR / Hiring Manager Survey Results
 - iii. Industry Interviews
3. Increasing CTE Opportunities for Students District-Wide
 - i. Program Alignment & Offerings
4. Promoting CTE

F. INFORMATION

1. Introduction to the Trades & Pre-Apprenticeship Summary
2. Online CTE course updates

G. CLOSING COMMENTS FROM COMMITTEE MEMBERS

H. ADJOURNMENT

Career and Technical Education (CTE) Advisory Council
Fairbanks North Star Borough School District

Wednesday, November 29, 2017
5:30 – 7:00 p.m.

520 Fifth Avenue
School District Administrative Center
Boardroom

MINUTES

Daniel Domke-FNSBSD CTE Director	Joel Scurr – CTE Teacher
Heather Christian-FNSBSD CTE Program Secretary	Mariah Sexton – ESSA Rep
Andrea Gelvin-Business & Industry Healthcare	Joni Simpson – CTE College & Career Coordinator
Sara Laughlin – Student Representative	Keith Swarner - UAF
Clarice Mingo – Principal NPHS	Andrea Wade – Counselor NPHS

PRELIMINARIES

CTE Director Daniel Domke called the meeting to order at 5:30 pm. Introductions made around the table, and the sign-in sheet passed.

The agenda approved as presented after a motion made by Keith Swarner. Second by Andrea Wade to approve the agenda. After a review of the September 20, 2017 minutes, a motion made by Joni Simpson to approve the minutes, which was seconded by Andrea Wade. The minutes of September 20, 2017 were approved.

PUBLIC COMMENT ON NON-AGENDA ITEMS

1. Joni Simpson: Alaska ACTE Conference – Andrea Gelvin received state CTE leadership award. Comments by Andrea Gelvin.

INTRODUCTIONS

1. Joni Simpson – College and Career Coordinator: Update on CTE
2. Andrea Wade – NPHS Counselor: Starting CTE Advisory Committee
3. Andrea Gelvin – Health Science Curriculum Consultant
4. Sara Laughlin – HHS Student Rep: Health Science Student
5. Joel Scurr – WVHS CTE Teacher: Computer Programming, Autodesk
6. Keith Swarner – UAF / CTC: Celebrating Community Partners on Friday from 4:30 to 6:30 pm
7. Mariah Sexton – System Support Specialist with Teaching and Learning
8. Tim Doran – School Board Member
9. Clarice Mingo – NPHS Principal

REPORTS

1. Comprehensive CTE plan discussed.
 - a. Surveys discussed: Parent / Student / Staff and Employer / HR Manager.
 - i. Preliminary results highlighted – statistically valid parameters have been reached for student participation.
 - ii. Distribution process noted.
 - b. Interviews of business and industry agencies noted.
 - c. The goal is to align CTE in the district with business and industry needs.
 - d. Deadline for Student Survey is December 8, 2017 / Employer is December 15, 2017.

OLD BUSINESS

1. Carl Perkins Reallocation update – reminder that it is not a competitive grant.
 - a. Money not spent from the previous year is reallocated out to the districts.
 - b. Change in application process noted; likely no change in formula.
 - c. Fund allocation discussed:
 - i. Online CTE courses
 - ii. Drafting Computer
 - iii. Architecture and Construction equipment
 - d. Keith Swarner – Do schools have an avenue to request reallocation funding?
 - i. Yes, there is a formal purchasing process for requests for Perkins funding.
 - ii. Process reviewed with CTEAC members.
 - e. Joel Scurr – CTE Instructor discussed addition of Autodesk Inventor to the curriculum.
 - i. Tech Prep has been approved by UAF CTC.
 - ii. WVHS has been approved as a testing center so that certification can be earned.
 - iii. Computer programming discussed.
 - iv. Pre-Engineering program is still in the building phase and continues to grow:
 1. Main focus is the engineer design process:
 - a. How to build and analyze structures.
 - b. Exploration in Electrical Engineering.

NEW BUSINESS

1. What are the critical issues for your organization right now?
 - a. Keith Swarner – UAF/CTC: Critical Issues for CTC is the budget which is out of their control.
 - i. Structural challenges: location, growth, processes.
 - ii. Keeping up with health, safety and risk management discussed.
 - iii. Facilities & Capacity / Enrollment continues to increase and is functioning well.
 - b. Joni Simpson – Education: Shrinking pool of teachers and reiterated the same issues with diminishing resources noted by Mr. Swarner that put stress on the organizations.
 - c. Andrea Gelvin – Health Science: Recruit coordinator for Fire Department.
 - i. Struggle with people coming in with realistic vision of what that career field looks like and having people understand what each career involves.
 - ii. Wants to increase career exploration curriculum across the district.
 - d. Sara Laughlin – HHS Student: HHS has diverse CTE courses, and it has all five (5) clusters.
 - i. Noted shortage of materials and teachers.

- e. Joel Scurr – Engineering (STEM) – Lacks capacity in the classroom for taking a digital prototype to real world design due to lack of space / labs.
 - i. 3D printing – replicator X
 - 1. Makerbot has changed ownership and has issues with tech support due to new programming.
2. Are you facing challenges meeting your organizations workforce needs?
 - a. Mariah Sexton: IT – It is really hard finding people who can do the job when they start.
 - i. Six (6) months to a year is spent doing on the job training and helping employees earn appropriate certifications.
 - ii. Competing with high IT demand locally which creates a very competitive environment.
 - b. Andrea Wade: Education: Challenging to maintain staffing due to turnover.
 - i. Connection to community needed – more than just monetary.
 - ii. Difficult to replace lost personal.
 - iii. CTE programs may be dependent on a single teacher = loss of the teacher can result in loss of program.
 3. What will your workforce needs be in the terms of skills and experience in the near term (12 months) and the longer term (1-3 years)?
 - a. The Borough has been the only organization that is not starving for employees as the business climate in the state has shifted.
 - b. All other organization had extreme concerns about future workforce needs:
 - i. Legacy job concerns – Public Utilities, Aviation, Doyon
 - ii. UA Director pulled statewide data and provided an overview.
 1. How do you create a pathway for such varied needs?
 2. How to connect students with job pathways?
 - iii. Bassett Army Community Hospital
 - iv. UAF CTC contribution and programs noted:
 1. Keith Swarner discussed pathway from FNSBSD to UAF CTC.
 2. Tech Prep pathways and alignment to UAF CTC discussed.
 - a. Health Science pathway discussed with advisory committee.
 4. Looking toward the future, how do you envision the School District improving your workforces' preparation? Specifically, what training and programs should we provide for students?
 5. What type of professional development would you suggest for CTE teachers in this field?
 - a. GCI expansion and work on workforce development.
 - i. GCI is essentially an IT company and needs highly skilled workers.
 1. Created teacher externship program to support their industry needs.
 - a. Joel Scurr participated in the externship and gained valuable insights as to how many more opportunities are actually available that we are not currently able to adequately transfer to students.
 6. What are some ways the School District could provide experience to students in this field?
 - a. Student Internships discussed.
 7. Are there any materials or resources that you would suggest we explore as we review and update our curriculum?
 8. Different surveys and research going on which will be considered in the CTE review process.
 - a. McDowell group research noted
 9. Career Exploration Discussed:
 - a. Sara Laughlin - HHS used to have a course that went over all of the career clusters which gave a broader view of opportunities rather than having to pick a cluster right away.
 - i. Students found that to be very useful and were disappointed to see it go.
 - b. Career Explorations course discussed.

- c. Andrea Wade – As a parent, so impressed with career exploration that is coming from Midnight Sun at the early grades.
 - d. Joni Simpson – Intentional career guidance at the schools need to be expanded.
10. CTE Advisory Committee – New policies discussed.
- a. All CTEAC meetings are open to the public.
 - b. Perkins compliance noted.
 - c. New members introduced.

INFORMATION

- 1. Introduction to the Trades courses discussed.
 - a. Added Heavy Equipment Maintenance.
 - b. Status of applications discussed.
- 2. Possible expansion of Intro to the Trades model to other programs.
 - a. Health Science
- 3. Tech Prep status update.
- 4. Online CTE course offerings status offerings.
 - a. Processes discussed as pertains to academic online offerings which has allowed for smooth transition to CTE.
 - b. Pilot courses discussed:
 - i. Public Health: Discovering the Big Picture in Health Science
 - ii. Law, Public Safety, and Corrections
 - c. Noted capacity issues for offering all 16 clusters which may be alleviated by online offerings.

CLOSING COMMENTS FROM COMMITTEE MEMBERS

Andrea Wade – Thank you for having this committee and providing a highlight for CTE.

Daniel Domke – Discussed CTE department and addition of Joni Simpson.

Clarice Mingo – Thank you for this meeting and a thank you to Joni for providing an opportunity for students to do a site visit to see construction in progress. Provided real world view to academic applications.

ADJOURNMENT at 6:58 PM.



Re-Envisioning CTE: *Creating Future Ready Students*

Re-Envisioning CTE is a strategic initiative tied to the Personalized Learning Goal in FNSBSD’s Strategic Plan.

Strategic Goal #1: Personalized Learning: Provide all students with options to meet their needs and achieve academic success. As part of the District’s vision to personalize learning for all students, we are embarking on a process to define the future of Career Readiness and the CTE system for our students and community.

Purpose:

- Defining the future of ‘Career Readiness’ and CTE programming as part of personalized learning for all students.
- Creating a global workforce for economic vitality and student success.
- Creating an educational environment that integrates core academics with real world relevance.
- Matching the needs of business and industry with students who are prepared to meet the needs of the future workforce.

Outcomes:

- Current State Summary of CTE in FNSBSD
- Comprehensive Needs Assessment/View of CTE
- 5-Year Vision/Future State and Model for CTE in the District
- Defined strategic direction for Hutchison, built by the community

Process/Major Milestones:

Timeframe	Planning Milestone
Aug 2017	Current State Analysis: Summary report of where we are now; current state of CTE in the FNSBSD
Sep 2017	Communication Launch/Kick-Off Community Input Process: Community-wide communication efforts to introduce the initiative and invite participation and input into the process.
Jan-Feb 2018	Comprehensive Needs Assessment: Summary report compiling themes from research, stakeholder surveys and community meetings.
March 2018	Build the Plan: CTE Model, Priorities & Recommendations
May 2018	Finalize the Plan: 5 Year Plan for Re-Envisioning CTE in FNSBSD

How to get Involved: We invite you to be part of the process, here is how...

- Take the survey <<link on District website>>
- Participate in one of the community meetings and/or work group sessions

RE-ENVISIONING CTE: PROCESS OVERVIEW

Updated as of 1/23/2018

	Phase 1: Current State of CTE <i>July-Aug 2017</i>	Phase 2: Community Launch <i>Sept-Oct 2017</i>	Phase 3: Comprehensive Needs Assessment <i>Oct 2017-Jan 2018</i>	Phase 4: CTE Model, Priorities & Recommendations <i>Feb-March 2018</i>	Phase 5: Complete 5-Year Plan <i>April-May 2018</i>
Process	Data Gathering <ul style="list-style-type: none"> Gather 5-year historical data regarding CTE programs Labor forecasts from AK Dept. of Labor Findings from the McDowell Study Direction from the AK CTE Plan 	Communication & Rollout <ul style="list-style-type: none"> Teacher/Staff Prof Dev Day, 8/14 Principals Meeting, 9/5 North Pole City Council Meeting, 9/5 Education and Workforce Development Chamber of Commerce, 9/6 CTEAC Quarterly Meeting, 9/20 Chamber Presentation; State of the Schools, 9/29 Chamber Presentation; CTE Workforce Development, 10/10 Rotary Presentations Community Newspapers Weekly District Digest Quarterly Newsletters 	Community Input <ul style="list-style-type: none"> Key Industry Leader 1:1 Interviews Employers Survey Parent/Staff/Student Survey Community Meeting Jan 18th <ul style="list-style-type: none"> Brief out the themes from community input Establish the current state of the District and the Community Needs Identify issues and opportunities for future CTE programming 	Working Group Sessions Feb 12-13 <ul style="list-style-type: none"> Additional insight around foundational questions Recommendations to further define CTE Goals Identify shifts – What needs to change? What can stay the same? District Leadership Team March 5th <ul style="list-style-type: none"> Agree on the Strategic Direction – Mission, Vision, CTE Goals Establish recommendations & potential pathways for CTE district-wide Establish recommendations for Hutchison Board Work Session March 5th <ul style="list-style-type: none"> Gather input and direction from the Board 	Develop the Plan <ul style="list-style-type: none"> Development of plan for CTE inclusive of Hutchison Build the implementation plan supporting initiatives & roadmap Review session with CTEAC Committee Presentation to the Board Community Brief
Outcome/Deliverables	<ul style="list-style-type: none"> Current State Analysis 	<ul style="list-style-type: none"> Informed Stakeholder Groups 	<ul style="list-style-type: none"> Community Needs Assessment Report 	<ul style="list-style-type: none"> Workgroup Session Notes/Recommendations District CTE Model Hutchison CTE Model 	<ul style="list-style-type: none"> 5-Year Plan for CTE, Implementation Plan for Hutch, Board Presentation, Community Brief

**Items in Blue Font indicate areas for Staff and/or Community participation and input. All community meetings are open invite.*

RE-ENVISIONING CTE: PROCESS UPDATE

Comprehensive Needs Assessment – Update as of January 23, 2018

SUMMARY OF FINDINGS – WHAT HAVE WE LEARNED THUS FAR?

Key Insights

- Parents/staff/students think more education is needed than employers are requiring for entry-level jobs.
- Student interests don't exactly line up with parents and staff or with Alaska growth areas.
- Students do indeed want to look outside of Alaska for work.
- Employers are looking for more than just hard skills - they need soft skills.
- Students are OK with online learning (more so than parents and staff).
- Great opportunities to change the perception and awareness around degrees and job opportunities.

Industries

Students' industries of interest closely align with several of the industries projected to grow in Alaska. There may be an opportunity to guide students' specific job interests to the jobs that Alaska industries and employers are projected to need to fill (see below). However, given that a significant percentage of students expressed an interest in pursuing jobs/careers somewhere in the U.S. or the world (63% and 20%, respectively), limiting students' focus to industries and jobs projected to grow in Alaska may not be necessary.

FNSBSD Top Industries of Career Interest

CHOICE	STUDENTS	PARENTS	STAFF
#1 most selected	Health / Medical	STEM	Health / Medical
#2 most selected	STEM	Health / Medical	STEM
#3 most selected	Arts, A/V Tech & Communications	Architecture & Construction	Information Technology
#4 most selected	Military	Information Technology	Architecture & Construction
#5 most selected	Law, Public Safety, Corrections & Security	Arts, A/V Tech & Communications	Arts, A/V Tech & Communications

Neither parents nor staff selected careers in the Military or Law, Public Safety, Corrections & Security, while these industries are among the top five industries of interest to FNSBSD students. Both FNSBSD parents and staff perceive that students are more interested in careers in Information Technology than perhaps they actually are.

Jobs

While there is some alignment between students' job interests, jobs where the Alaska Department of Labor & Workforce Development projects meaningful growth and good wages, and employers' near-term needs, **there is significant opportunity to broaden students' interests to include more of the jobs that are anticipated to be available and pay well in Alaska.**

Given that a majority of students are at least considering seeking jobs in the United States after graduation, **further research on which industries and jobs are projected to grow nationally will further ensure that the FNSBSD CTE program is aligning with both students' interests and potential job openings in the United States.**

Education Requirements

Regardless of industry or job, **students', parents' and FNSBSD staff's perceptions of education required is significantly higher than indicated by employers.** Across industries and jobs, considerable percentages of FNSBSD parents, students and staff perceive that post-secondary and particularly, graduate degrees are required, when in fact, they may not be.

Employers' perceptions of whether the FNSBSD high school students are graduating as "workforce ready" are equally distributed among those who agree that graduates are workforce ready (notably, 12 of the 66 who responded to this question, answered that they were "not sure" if FNSBSD graduates are "workforce ready.") Given employers' emphasis on skills like interpersonal and verbal and written communications, indications are that there are either potential gaps in employers' perceptions and the skills with which

FNSBSD students are graduating with, or there is a need for FNSBSD to put more emphasis on the skills that employers find most important or non-negotiable for entry-level employees.

Skills Requirements

Among employers, there are several skills that are considered important and even non-negotiable for entry-level candidates; the top required skills were:

Foundational Skills

- Verbal communication
- Locating information
- Reading for information

Occupational Skills

- Real-world problem solving
- Workplace safety awareness
- Task management

Interpersonal Skills

- Motivation / work ethic
- Ability to work with others
- Honesty / integrity
- Dependability

Method of Delivering CTE Courses

Across all segments surveyed, **offering CTE courses at each high school** was the method most selected to best serve students. **Students show a great deal of support for offering CTE courses online.** While a meaningful number of students selected a Comprehensive CTE high school (a school offering multiple CTE career pathways and academics) as a method that would best serve students; parents and staff were more likely to consider a Comprehensive CTE high school to be a method that would serve students well. Students were significantly more likely than parents or staff to indicate that Career Academies (schools focused on one or two specific career pathways) would best serve students.

OUTSTANDING QUESTIONS – WHERE DO WE NEED TO DIG DEEPER?

FOUNDATIONAL QUESTIONS	WORKING GROUPS: <i>Who will help inform these questions?</i>
1. Career Clusters/CTE Offerings – Where should the focus be over the next 5 years? What is the roadmap?	<ul style="list-style-type: none"> • Students/Parents (Survey) • CTE Teachers (Worksheet; Work Session) • Counselors (Worksheet; Work Session) • CTEAC (Work Session) • Business & Industry (Survey, Interviews, CTEAC) • District Leadership Team
2. CTE Model & Delivery – What does the model of CTE delivery look like?	(All)
3. Hutchison – What is the vision & evolution of Hutchison High School in conjunction with the comprehensive District CTE plan?	<ul style="list-style-type: none"> • Students/Parents (Survey) • Hutchison Staff (Worksheet; Work Session/s) • District Leadership Team
4. Incorporation of Professional Skills – How can we incorporate soft skills within and outside of CTE curriculum?	<ul style="list-style-type: none"> • CTE Teachers • Counselors • District Leadership Team
5. CTE Awareness & Promotion (Perception Shifting) - How can we shift the perception of CTE, further communicating the value and relevance of skills-based, hands-on learning?	(All)