



Report to Oregon STEM Investment Council

November 30, 2018

Mission: To support and provide inspiring, engaging authentic STEAM learning experiences for youth in Douglas County preparing them for future careers and a meaningful future.

Improve the quality of STEAM learning experiences PreK-12 both in- and out-of school. (SEP Goal 1 and 3)

- **140 unduplicated educators representing all districts and 86% of all buildings** have participated in a variety of professional development experiences including NGSS, Project-based/place based learning, Oregon Connections, and our week long STEAM summer institute. Follow-up support is provided through regular visits to buildings and professional learning communities meeting throughout the year. Educators are provided ongoing support to be STEAM champions in their various learning environments.
- **16 elementary and middle school champions representing 8 of 13 districts** are being supported through a Professional Learning Community model to develop shared resources for delivery of quality STEAM education in rural environments.
- **120 educators are registered users of the Resource Lending Library** providing tools to support quality STEAM learning. Lesson and unit plans using library equipment are being written by STEAM champions to be available through Oregon Ed Net. Quality lesson attributes have been adopted and are used to evaluate quality.
- **Brightworks Clubs** are being initiated in high school school environments as a launching pad for exploring STEAM careers, developing future plans and platform for expressing youth voice. A summer camp will focus on growing leadership skills. Topics include a focus on Healthcare, Manufacturing, Engineering, Natural Resources and the Trades (local priority sectors).
- Primary **out-of-school partners delivering STEAM learning opportunities** throughout the year with regular partnership from Hub staff include the YMCA of Roseburg and South County, the Boys & Girls Club of the Umpqua Valley, Alder Creek Community Forest, Umpqua Community College, FIRST Robotics teams (17 FTC and 11 FLL teams), and the 10 libraries of our county (newest venture).

Expand opportunities for family and community engagement in STEAM learning experiences. (SEP Goals 1 and 3)

- The **2018 STEAM Extravaganza brought over 500 participants of all ages and 45 community partners** together to experience a variety STEAM activities from building a pipe organ, designing and creating various structures, experimenting with drones, robotics and GIS technology and exploring various CTE and STEAM courses of study at UCC.
- **Family Engineering Nights and Science Exhibitions have occurred in over 50% of our elementary schools** supported by resources in the Resource Lending Library.
- Activities of the Hub and its partners have a regular media presence.

Increase number of students engaged in STEAM career connected learning experiences through awareness, exploration and preparation with support for future planning including post secondary education. (SEP Goals 1,2 and 3)

- **Five school districts and one non-profit** are engaged in the initiative **BRIGHT FUTURES UMPQUA** to build stronger connections to local business and industry through industry tours and mentorships, career fairs, job shadows and internships. Current focus is at middle and high school with potential impact on 2700 students.
- **35 educators (including 6 out-of-school and home-school co-op partners) currently hold virtual licenses for Oregon Connections** with 15 sessions completed to date and several scheduled through December. All districts are represented. 1 school district with more pending are engaging as a cohort for PD and support. Two local industry chats are in development and virtual field trips are being planned. Oregon WOW week is being promoted.
- **144 middle school youth from across Douglas County participated in the week long Expanding Horizons CTE summer camps** for manufacturing and technology, drafting and production, business entrepreneurship, the Trades and Natural Resources. 8 total camp weeks were offered. A total of 266 participated in the previous two summers. 60% represent underserved populations.
- **Industry tours** are planned for our regions key business sectors including manufacturing, healthcare, natural resources/forestry, engineering/technology and the trades. Some will be direct visits and others will be virtual.
- **Consistent practice and procedures** are being developed by participants in **BRIGHT FUTURES UMPQUA** to be scaled across the county for industry tours, job shadows and internships.
- **Two AmeriCorps members are serving as mentors to promote career and college planning.** Last year, 50 underserved youth received a least 5 hours of direct mentoring and 166 received support in small group mentoring. This year, mentoring is directly linked to BRIGHT FUTURES UMPQUA and will include the expansion of trained mentors to work with students using locally developed career and college planning toolkits.