

Panelist Q &A:

Bridgemont Community Technical College & the West Virginia DEP



Vision Shared: How was the need for your program/partnership identified?

Jim Ratcliff: Matt Earnest at Bridgemont was involved with Greg Adolfson from WV DEP, on an unrelated project. An inquiry was made to Adolfson about possible training or program needs with WVDEP. Adolfson contacted the Office of Explosives and Blasting (OEB) about the training or educational needs that Earnest had asked about. OEB is responsible for training and certification of hundreds of blasters per year, conducts Inspection and Enforcement activities, and works very closely with the explosives industry on a daily basis. OEB has long recognized the need for better technical and mathematical skill sets within the blasting community.

Dr. Jo Harris: The need was identified through connections and networking with another client, the Department of Environmental Protection, with whom Bridgemont had worked on sustainability training. The Office of Explosives and Blasting, an agency within the DEP, had expressed the need for employees with not only technical credentials and certifications but also with critical thinking, problem-solving, and higher level mathematics skills (general education). Bridgemont was introduced to agency officials through the DEP connection and communication began with industry leaders from the state and region.

Vision Shared: What obstacles did you encounter when developing the partnership/program?

Jim Ratcliff: Following preliminary meetings, the needs were confirmed with the industry and regulatory agency. Following these preliminary meeting's on needs, the focus was on developing a curriculum for an A.S. degree in Drilling and Blasting. Several of the basic skills were already in place for other programs. The first obstacles were getting through the administrative processes to get the program moving forward. There was no other A.S. program of this type in the U.S. therefore there was no template to follow. The curriculum came very quickly but the need to attract a coordinator and teaching staff was a major hurdle. In a specialty program it is difficult to attract expert staff.

Dr. Jo Harris: Because there are no other Blasting Technology associate degree programs within the United States, communication with the agency, vendors who have typically trained individuals on-site with their products, the Canadian-based associate-degree program at Fleming College and the baccalaureate and master's programs in blasting engineering at the University of Kentucky was critical in determining the course content for the technician-level employee. With this particular partnership, because of its uniqueness, multiple courses had to be designed and implemented and industry partnerships were cultivated for appropriate field experiences and internships.

Vision Shared: What, in your view, is key in developing a successful collaboration?

Jim Ratcliff: The key to successful collaboration is educating the industry that the training resource exist at the community college level for these two year technical degree programs. The ultimate measure of success will be in placement of graduates in the industry and the industry experiencing the contributions that graduates make to individual operations. Therefore, the initial candidates need to have goals and drive to make individual successes.

Dr. Jo Harris: Collaboration with internal and external partners is key. Internally, the workforce unit charged with connecting with industry and determining education and training needs, must work closely with the academic side of the institution. At Bridgemont, we host Learner Resource Teams when new initiatives such as arise, convening workforce, academic departments that are affected, the business office, and the marketing team to understand the project, its needs, and the resulting implications for these areas. External partners, the agencies and employers, must be approached with a positive “can-do” attitude by the college (the workforce motto here is the “answer is yes”), must be involved in the curriculum design, and must be aware of activity and follow-through constantly. After implementation, continuous improvement to the program and on-going connections with industry occur through regular advisory committee meetings (at least two per year). This continual communication results in industry engagement, not only with curriculum, but in providing scholarship funding, employment opportunities for students, and equipment or in-kind donations.

Vision Shared: In your opinion what is the biggest challenge or organization faces in workforce development?

Jim Ratcliff: You need to have a good handle on the industry needs, are they technical or are there basic skill sets not being attained in secondary education system. Identify these and get a team (industry, academia, and regulatory) approach to developing a workable solution. A co-op work program with the industry would be beneficial. Most people do not have any idea of the work environment for most blasting professionals.

Dr. Jo Harris: Being responsive to industry needs in a timely fashion is sometimes difficult as time commitments are required from industry representatives, workforce staff, and academic departments. Setting up meetings and discussions can be challenging for the industry and college cross-functional teams due to regular workloads, which can slow down the response time of getting courses and/or programs developed. Identification of course and program outcomes must also be well-defined.

Dr. Jo Harris – President, Bridgemont Community and Technical College

Dr. Jo Harris was appointed President of the Bridgemont Community and Technical College (formerly the Community and Technical College at WVU Tech) on April 7, 2004, after serving as Provost of the college since 1999. During her tenure as chair of the department, the program received the “Program of Excellence” designation from the Board of Trustees and she was named Business Educator of the Year. Dr. Harris was co-chair of the North Central Association Steering Committee for WVU Tech in 1998, and led the community college in attaining independent accreditation from the North Central Association in 2004. Dr. Harris received her bachelor’s degree in Business Education from Concord College, her master’s degree from Marshall University, and her doctoral degree in Educational Administration from West Virginia University.

Jim Ratcliff - Program Manager, Office of Explosives & Blasting, WV Dept. of Environmental Protection

Jim Ratcliff is the Program Manager for the West Virginia Office of Explosives and Blasting (WVOEB), joining the newly established office in January 2002. He is also the manager and instructor over the WV Surface Mine Blaster Certification program. Jim serves as an instructor for the U.S., Office of Surface Mining Reclamation and Enforcement’s, Blasting Inspection classes and U.S. Mine Safety Health Administration (MSHA). He has a B.S. degree in Mining Engineering from West Virginia Institute of Technology and has 25 years of experience involving operations and engineering aspects of the construction and mining industry.