

FY16 Competitive Education

Summaries and Staff Recommendations –May 2016

The Commission received fifteen proposals for FY16 Competitive Education grants by the announced due date of March 15th. The requests seek \$2.6 million dollars. The Education Committee will meet on May 5th in Danville to consider these proposals and make funding recommendations to be acted on by the Commission on May 24.

Req #	Organization	Project Title	Requested Amount	Staff Rec Amt
3160	Bluefield College	Science Center Third Floor Addition	\$400,000	table
3162	Central Virginia Community College Educational Foundation, Inc.	Advanced Multipurpose Patient Simulator for Respiratory Therapy Program	\$30,331	\$30,311
3167	Cumberland County	ACT Work Ready Community Initiative	\$30,000	\$0
3163	Emory & Henry College	Interprofessional Clinical Simulation Lab (ICSL)	\$300,310	\$300,310 (as loan)
3166	Medical Solutions Academy	Practical Nursing Program at Medical Solutions Academy	\$15,000	\$6,814
3161	Mountain Empire Community College	Healthcare Simulation Access - Phase 2	\$72,309	\$72,309
3156	Patrick Henry Community College Foundation	Introduction of Physical Therapist Assistant Program	\$99,977	\$94,350
3153	Radford University	School of Nursing RN to BSN program	\$300,000	\$0
3164	Southern Virginia Higher Education Center	Combatting the Regional Nursing Shortage: Building the Pipeline By Recruiting Students to Regional Nursing Education Programs	\$350,708	\$100,000
3158	Southside Virginia Community College Foundation	Lake Country IT Academy	\$104,943	\$104,943
3154	Southwest Virginia Higher Education Center Foundation	Clinical Laboratory Scientist - Phase II	\$175,599	\$43,106
3159	Virginia Advanced Study Strategies, Inc.	VASS Rural Math Innovation Network	\$250,000	\$250,000
3157	Virginia Technical Institute	Modernization of the VTI Welding Program	\$181,824	\$181,824
3155	Virginia Western Community College	BioLink II: Anatomy and Physiology in Franklin County	\$49,652	\$49,652

3165	Wytheville Community College	The Innovative Advanced Manufacturing Center at WCC	\$250,000	\$250,000
Total (15 requests/10 funding recommendations)			\$2,610,653	\$1,483,619
Balance available before/after recommendations			\$1,579,796	\$96,177

Bluefield College

Bluefield College Science Center Third Floor Addition (#3160)

\$400,0000 Requested

Executive Summary Provided by Applicant: Bluefield College is working to answer the workforce demands of more STEM-H degrees and educational opportunities that will help train our area's workforce. The Science Center, the largest academic building at the College is home to all of its STEM-H programs. To expand and receive accreditation for new STEM-H programs such as the College's proposed College's new Masters of Nursing Program this third floor addition must be constructed for the Science Center. The projected construction cost of the third floor is approximately \$2,000,000. A total of \$600,000 has been committed. The College is seeking assistance from the Commission to reach \$1,000,000 in commitments to be able to leverage for matching funds for other regional funders.

Staff Comments and Recommendation: This request for funding to construct a third floor addition to the College's Science Center will help the applicant reach the half way point of the estimated \$2 million fundraising goal necessary to complete the project. In FY15 the Commission provided \$37,500 for this project to fund architectural design and construction documents. While the full balance of the grant remains, the work has been completed and is the basis for the \$2 million construction cost. Currently the College has raised \$600,000 and has a pending request with a local foundation for \$500,000. A decision from that foundation was expected in late April/early May. The addition is necessary to house a Masters of Family Nurse Practitioners program that will begin enrolling students in January, 2017. While the program can initially operate in a hybrid format using equipment at local hospitals or community colleges for one year before its on-site accreditation visit, the College will need a facility and equipment on its campus dedicated to the FNP program. To have the space operational by accreditation in 2018, construction must be underway by January 2017. The Commission has previously supported the creation of a BSN program for Bluefield and the application indicates that the program currently has 87 students enrolled and 258 graduates to date. It is assumed that many of those graduates would be interested in continuing their education in the FNP program. The pro-forma shows significant revenue and is cash flow positive by the second year of operation indicating an ability to use loan funds for a portion of the construction cost.

Staff recommends tabling this request for future consideration of referral to the VRA loan program once additional fundraising for the project is complete.

Central Virginia Community College Educational Foundation, Inc.
Advanced Multipurpose Patient Simulator for Respiratory Therapy Program
(#3162)
\$30,331 Requested

Executive Summary Provided by Applicant: CVCC requests funding for the purchase and installation of a patient simulator manikin for its Respiratory Therapy Technology Program. The program prepares students for employment as Respiratory Care Practitioners and for Registry by the National Board for Respiratory Care. The simulator provides an array of physical and physiological features that simulate lifelike cases in nearly all clinical settings, and is essential in educating students in bedside procedures, emergency response, and mechanical ventilator maneuvers. Simulation provides an environment that is risk-free which gives the opportunity for students to rehearse skills repetitively in a structured environment as well as receive immediate assessment and feedback. Having the advanced simulator will assist the program in our ability to train additional respiratory therapy students.

Staff Comments and Recommendation: Grant funds are requested to support enhancements to the Associates of Applied Science degree in Respiratory Therapy Technology at CVCC through the purchase of a patient simulator manikin. The applicant indicates that support of the project will result in an increase of 20 students served (increasing from 20 to 40) and 9 additional credentials awarded annually (increasing from 11 to 20). The simulator is expected to result in increased credentials awarded annually through the reduction in overall hours necessary for completing the 52 competencies related to patient conditions, which otherwise require time during the less predictable and increasingly limited options for clinical rotations. TRRC previously supported this program with an \$85,050 grant in 2011 that was used for equipment purchases for start-up of the program. As noted in the application CVCC is the only community college in the Southside region that offers a respiratory care therapy program and therefore the program is available to serve students from across the tobacco region. Starting salaries are identified as ranging from \$40K - \$52K and there are currently 145 job openings in Virginia. Clinical rotations are primarily at Centra Health-owned locations in Lynchburg, Bedford County, Prince Edward County, and Pittsylvania County. The letters of support from Centra Southside Community Hospital in Farmville and Sentara Halifax Regional Hospital in South Boston give further indication of the value of this program beyond just the CVCC service area. CVCC makes a commitment to identify private funding to meet the Match requirement and they are familiar with this requirement on the grants. The program is well-aligned with Education objectives in STEM-H careers, and this modest request is consistent with TRRC support for healthcare simulation equipment at several community colleges and universities.

Staff recommends award of \$30,331.

Cumberland County

Cumberland County ACT Work Ready Community Initiative (#3167)

\$30,000 Requested

Executive Summary Provided by Applicant: Project Overview: Cumberland County seeks to enhance workforce readiness through the innovative national initiative ACT Work Ready Communities. The initiative focuses on closing the “gaps” between education supply and occupational demand by linking, aligning, and matching our workforce to the needs of industry. This community-based framework for workforce and economic development certifies counties as “work ready” when established goals have been met. Through this process individuals can understand what skills employers require and how to prepare for career success and educators can close skill gaps via tools integrated into career pathways with stackable, industry-recognized credentials.

Staff Comments and Recommendation: This is a well-intended project that proposes to utilize the National Career Readiness Certification, a nationally recognized credential for validation of soft skills and core skills of the County’s workforce as an economic development tool for attracting companies to the County. The Commission has previously supported NCRC testing as a small component of an Education grant with Patrick Henry Community College, which served four localities; and through a larger targeted SOVA Work Ready Community initiative of the Dan River Regional Collaborative, benefiting residents and businesses in four counties and two cities. The goals of the DRRC’s project is to establish a Work Ready Community region in Southern Virginia and this regional model is one that makes sense for the Commission and for economic development purposes, given the disperse population of our rural region and the need for regional employment credentialing numbers for attracting significant prospects to the region. Staff suggests the interests of Cumberland County may be more appropriate for consideration as a regional initiative of the Virginia’s Growth Alliance or of Southside Virginia Community College.

Out of concern for setting a precedent for supporting a single county for a credentialing program, and in recognizing the preferred model for Commission’s support is a regional program, staff recommends no award.

Emory & Henry College

Interprofessional Clinical Simulation Lab (ICSL) (#3163)

\$300,310 Requested

Executive Summary Provided by Applicant: The Interprofessional Clinical Simulation Lab (ICSL) will provide training for allied health and advanced practice students with both standardized patient (SP) and high-fidelity patient simulator (HFPS) rooms. The ICSL will include seven simulation rooms set up similar to clinical exam rooms and three set up as hospital rooms. Simulated patient scenarios will provide a safe and controlled learning environment for students to improve their communication, patient care, and clinical decision-making skills. The HFPS manikins will be particularly effective for presenting medical emergency scenarios involving dangerous changes in vital signs (e.g., cardiac arrest, diabetic emergencies, asthma, trauma). The ICSL is unique in that it will provide training in both SP and HFPS environments using both discipline specific and collaborative, multidisciplinary patient scenarios. Collaborative, team-based healthcare delivery has

been shown to improve patient outcomes. Students trained in the team-based healthcare model will be more effective team members in their clinical practice.

Staff Comments and Recommendation: Funds are requested to assist with outfitting the Interprofessional Clinical Simulation Lab (ICSL) to be located in the School of Health Sciences. The total cost for furnishing and equipping the lab, consisting of 7 standardized patient (SP) rooms, 3 high fidelity patient simulator (HFPS) rooms, a control room, a student debriefing room and a SP meeting room is estimated to be \$653,492. The Commission has provided previous support for the School of Health Sciences. In FY12 a \$620,000 award assisted with renovations and equipment purchases for the DPT program. In FY13 TRRC approved \$300,000 to support three years of the Dean's salary and to renovate office space for the Dean and staff. This grant will reach its third anniversary in May 2016 with a balance of \$196,000 remaining (TRRC funds would pay the Dean's salary through June 2016, totaling \$245,258). The College has indicated that they will request an extension for the project. A detailed equipment list was provided with the application showing TRRC funds to be used for these purchases. Matching funds of \$353,182 are committed from the College using a portion of the \$2 million award received from the Smyth County Community Foundation for the School of Health Sciences renovation of the former Smyth County Hospital. The renovation is scheduled for completion by July 5, 2016. Matching funds will be used for equipment, furniture and software for the ICSL with the application stating that, without TRRC assistance, only 1 of the proposed 3 HFPS rooms (1 manikin each) and 4 of the 7 SP rooms can be completed. This is not thought to be sufficient to adequately serve students enrolled in the Doctor of Physical Therapy (DPT), Master of Occupational Therapy (MOT), and Master of Physician Assistant Studies (MPAS) programs that will be housed in the building. The 3 year DPT program admitted its first cohort of 32 students in August, 2015. The 27 month MOT program will admit its first cohort of 25 in August 2016 and the 27 month MPAS program will admit a cohort of 30 in May 2017. The tuition revenues generated when all programs are operational are significant with the 2015-2022 projected budget submitted in the application showing net revenues in 2017-2018 of \$610,238 and \$1,904,526 in 2018-2019 when the three programs are operating multiple cohorts. Based on the fact that the request shows significant credentialing outcomes for high wage jobs in the Commission's target area of STEM-H, as well as committed matching funds and a well-detailed operating budget, this request scored as one of the top five proposals in this grant cycle. Staff believes that this project is a viable candidate for financing through the VRA loan program, assuming a loan can be made through an eligible entity such as the County IDA.

Staff recommends referral to the VRA loan program for credit analysis and that \$300,310 be reserved for transfer to VRA to fund a potential loan.

Medical Solutions Academy

Practical Nursing Program at Medical Solutions Academy (#3166)

\$15,000 Requested

Executive Summary Provided by Applicant: Medical Solutions Academy is seeking start-up funds for a practical nursing program. The Va Board of Nursing has a specific list of equipment that has to be purchased in order for a program to be successful. We at Medical Solutions will utilize this grant money to purchase some of the equipment.

Staff Comments and Recommendation: A modest amount of grant funds is requested toward start-up equipment costs for establishing a new Licensed Practical Nursing program at a nonprofit academy based in Danville. While other LPN training programs are available in the area, the distinction is that this program will be offered to participants in the evenings and on weekends. Medical Solutions Academy is certified through SCHEV and the Virginia Board of Nursing and Pharmacy; and students sit for nationally recognized certifications. The Academy launched their Nurse Aide, Pharmacy Tech, and Medication Aide programs in 2011; and Phlebotomy, Medical Office Assistance, and Medical Assistant were introduced in 2012. The Academy reports in aggregate they are graduating approximately 150 students annually. Staff has verified that the Academy has had an established relationship with Danville Community College since 2014 that includes offering training courses to DCC students at the Academy's Danville location in the areas of Nurse Aid, Nurse Aide Refresher, and Medication Aide. The Academy provided an update on the status of their application submission to the Virginia Board of Nursing for the proposed LPN program; and where this application to VBN had been submitted previously, due to regulatory changes affecting the nurse education training programs, VBN required attendance at a mandatory orientation meeting prior to application submissions. The Academy's president/founder and program director attended the mandatory meeting this April, and will be re-submitting their application for approval of the LPN program in May. During discussions with staff during the review process, the applicant reduced their funding request to \$6,813.90 for essential long-lived supplies and small equipment purchases that will be necessary for the program to receive approval from VBN. The applicant also indicated they have already made some equipment purchases to satisfy the program requirements. The Academy's business model utilizes contracts with adjunct faculty who are professionals in fields of study for program delivery, and these contract payments will provide funding commitments that exceed the required 1:1 Match for this project. This modest request from a first-time applicant could provide significant return on investment with in-demand LPN graduates needed by area healthcare employers.

Staff recommends award of \$6,814.

Mountain Empire Community College
MECC Healthcare Simulation Access - Phase 2 (#3161)
\$72,309.00 Requested

Executive Summary Provided by Applicant: Mountain Empire Community College (MECC) requests grant funds to continue the development of a healthcare simulation laboratory to benefit students in its Registered Nursing, Licensed Practical Nursing, Respiratory Therapy, and other allied health programs.

Staff Comments and Recommendation: Funds are requested to continue the establishment of a healthcare simulation laboratory on the campus of Mountain Empire Community College. This lab, which will serve students in the RN, LPN, and Respiratory Therapy, and other allied health programs is consistent with similar projects funded at several other community colleges and universities across the Tobacco Region. In FY15 MECC requested \$428,141 for this project and received an award of \$370,000 based on the amount of match that was available at that time (a balance of \$167,319 remains in that grant, with progress continuing to establish the simulation

facility). Documentation for \$213,886.64 of matching funds (paid through a combination of the college's Title III and Perkins grants) has been submitted for the Phase 1 project. This Phase 2 application was expected to complete the lab with the purchase of additional simulation mannequins once additional match had been secured, and an ARC grant of \$100,000 for this project was announced in April 2016 that will serve as match for this second phase. After receiving a complete project budget showing the use of TRRC funds and all matching funds for Phase 1 and Phase 2, staff is confident of the availability of sufficient matching funds for both phases. Because this lab will serve existing programs there does not appear to be any net increase in enrollment numbers or in the number of credentials awarded annually. The application listed outcomes of 165 enrollees annually with 80 receiving credentials. The primary benefit of the project is reduced travel time for students who currently must drive an hour or more each way to the sim lab at VHCC in Abingdon, so presumably the establishment of this facility will allow greater retention and completion by MECC healthcare students. Despite the lack of increase in credentials, there is a strong argument that simulation laboratories such as this one at MECC are a critical resource for nursing programs, and for students who are in demand by regional healthcare employers.

Staff recommends award of \$72,309.

Patrick Henry Community College Foundation
Introduction of Physical Therapist Assistant Program (#3156)
\$99,977 Requested

Executive Summary Provided by Applicant: In keeping with Patrick Henry Community College's (PHCC) mission, the college seeks to meet the immediate and future workforce demands of the service area by requesting funding for start-up costs associated with introducing a Physical Therapist Assistant (PTA) program. PTA is a growing field in PHCC's service region, with high demand predicted through 2024. Additionally, a high number of potential students report interest in PTA annually. PHCC requests two years of funding to assist the start-up phase of the program, including obtaining licensure and accreditation, development of the curriculum, creation and approval of the degree, and development of recruitment and communication activities around the new educational opportunity. PHCC anticipates that the program will be self-sustaining through student enrollment after the development period.

Staff Comments and Recommendation: PHCC provided a very strong application for start-up costs for a new Physical Therapy Assistant program. As discussed in the application, Virginia Employment Commission data indicates a strong need for this program, with the demand for physical therapy assistants in the Martinsville area projected to increase from 112 existing positions to 166 positions by 2022, an increase of 54 new positions. VEC data indicates that current average annual salaries for PTAs for the Martinsville area is \$58,471, and PHCC confirmed salaries ranging from \$58K to \$72K with their clinical partners. A detailed equipment list for items requested from TRRC funds was provided, as well as details on equipment purchases to be made from Match and also In-Kind equipment and technology contributions (the Staff-recommended amount is reduced slightly due to in-kind match coming from existing equipment that is not recognized as valid match). TRRC funds are also requested for a portion of the costs for the PTA Program Coordinator, during the first year, which will be necessary for receiving program accreditation. Letters of support were

provided from five companies who are expected to be prospective employers of graduates from this program. The proposal initiates a program not previously available in the PHCC service area, and aligns directly with Education objectives for well-paying STEM-H employment in the region. As such it was one of the top-scoring proposals in Staff review.

Staff recommends award of \$94,350.

Radford University

Radford University School of Nursing RN to BSN program (#3153)

\$300,000 Requested

Executive Summary Provided by Applicant: The Radford University School of Nursing would like to partner with the Tobacco Commission to expand our RN to BSN nursing program in the Tobacco region to increase the number of nurses with bachelor degrees and improve access to healthcare. The post-licensure track of the undergraduate nursing program, or “RN-to-BSN,” provides flexible online learning opportunities for students who are graduates of community colleges or diploma schools and are licensed Registered Nurses (RN). This curriculum is designed to accommodate RNs who are employed and/or involved with family, community, and other responsibilities. Students complete 26 credits, but are awarded 51 credits for prior learning and work experience through successful completion of the transition courses. Up to 60 transfer credits are awarded towards the Core Curriculum requirements for a BSN, thus completing a total of 123 semester hours at the baccalaureate level. Students are admitted each fall or spring, and part-time enrollment is possible.

Staff Comments and Recommendation: Commission funds are requested for 3 years of support for a full time faculty coordinator (\$276,000) for the University's online RN to BSN program. This position will be based at the Southwest Virginia Higher Education Center (SWHEC) to market the program to students across the entire TRRC region and to advise and support region students enrolled in the program. A small amount of the request will be used for travel (\$15,000) and for marketing materials (\$9,000). Matching funds are provided by the University for rent at the SWHEC (\$174,813) and for a portion of the on-site Administrative Assistant position (\$5,873.40). Additional matching funds (\$330,000) will be provided by RU with funding received from the Lettie Pate Whitehead Foundation and the Bedford Community Health Foundation for scholarships for TRRC region students (although the Whitehead award letter does not state that scholarships are limited to tobacco region residents). During review of this proposal, Staff confirmed that Radford has been a tenant of the HEC for many years which questions the eligibility of the use of rent payments as match. Additionally Staff clarified that RU funded a full time on-site coordinator at the SWHEC until that person's retirement last year. No replacement has been hired and Radford currently does not offer any programs at the HEC. Furthermore, the Radford site coordinator for nursing at New College Institute in Martinsville is no longer being funded by the University. The proposed position appears to replace the Faculty Coordinator which the applicant historically funded as part of their long standing relationship with the SWHEC. While the application states that this staff member would be dedicated to the RN to BSN program, the lack of additional programming in Abingdon adds further speculation that this is the intent of the proposal. Several competing programs are available to TRRC region students including two (Old Dominion University and King University) at

the SWHEC. Basing a position tasked with serving the entire TRRC region in Abingdon seems impractical when Radford's main campus, though not located in the TRRC region, is a more central location. The application shows a projected enrollment increase from 5 students to 25 students however no operating budget was provided showing the ability of tuition revenues generated from this online program to cover these expenses, and RU is not contributing to the salary costs until TRRC funding ends after three years, and the proposal states the University would then pick up future funding. While this focus on increasing nursing degree attainment aligns well with Education program objectives, the construction of the proposal, with TRRC fully funding the position for three years, and with no evidence of the University contributing tuition revenue to the salary and travel expenses, scored poorly in the Staff review, and would establish a precedent for the Commission fully supporting other universities' requests for program coordinators, with no assurance the institution(s) would continue funding after TRRC support expires.

Staff recommends no award.

Southern Virginia Higher Education Center

Combatting the Regional Nursing Shortage: Building the Pipeline By Recruiting Students to Regional Nursing Education Programs (#3164) **\$350,708 Requested**

Executive Summary Provided by Applicant: The Southern Virginia Area Health Education Center (Southern Virginia AHEC) at the Southern Virginia Higher Education Center is one of eight Area Health Education Centers across the Commonwealth funded through the Virginia Health Workforce Development Authority, which in turn is funded by the federal AHEC program (see Appendix A). The AHEC program's mission is to recruit, train, and foster retention of healthcare professionals in medically underserved regions. The Southern Virginia AHEC focuses on recruiting middle and high school students and adults to health professions education programs, and works closely with regional educational partners offering those programs. The SoVA AHEC proposes to develop and implement additional, intensive recruitment strategies to attract students from the region to the Southside Virginia Community College's Associates Degree Nursing, Practical Nursing, and Nurse Aide programs (at all sites where those programs are offered), as well as Danville Community College's Nurse Aide program at the SVHEC.

Staff Comments and Recommendation: The request primarily consists of personnel and contractual marketing costs (along with ipads and travel) to extend outreach for a three year period to local school district students and adults in order to recruit them to enroll in SVCC nursing programs. The proposal cites a lack of properly prepared applicants for these nursing programs, more than 180 unfilled nursing positions in the project area, and aims to increase enrollment by 140 annually and credentialed graduates by 70 annually at SVHEC's Center for Nursing Excellence, Danville CC and Southside CC by the third year to address those issues. SVCC has confirmed that capacity can be expanded to serve additional students, assuming additional clinical faculty and sites can be secured. All personnel costs are for existing positions, with funds requested for two current staff to devote 5-15% of their time to the project, and with a current part-time outreach coordinator (now working approx 24 hours/week) to be increased to full time with TRRC funds for three years. The AHEC reports the outreach coordinator makes approximately 100 outreach trips per year, and

met with 400 students and adults in 2015. The position also entails significant follow-up with prospective nursing students to help them prepare properly for college coursework. Staff suggests that funding support should be focused on making this outreach position full-time for a two year period to assess progress toward increasing program enrollment, and the AHEC estimates that increasing the coordinator to full-time employment will allow an additional 50 visits per year to an additional 300+ students and adults. Nearly a third of the requested amount (\$120k) would be to contract for eight billboards for three years, and staff questions whether that is an effective use of marketing funds in the thirteen county service area of the AHEC. A support letter from the SVCC president cites collaboration between the AHEC and the College's health careers counselor. The compelling value-added aspect of this proposal is to allow the outreach coordinator, who effectively works three days per week, to move to full-time employment in order to better serve a large service area, with accompanying support for travel and more cost-effective marketing strategies. Staff proposes supporting these reduced costs for a two-year period, after which the effectiveness of the expanded outreach can be examined.

Staff recommends award of \$100,000 to support full-time salary and benefits for the current part-time outreach coordinator, and to support travel and marketing costs for the expanded outreach to prospective tobacco region students for a two-year period.

Southside Virginia Community College Foundation
Lake Country IT Academy (#3158)
\$104,943.33 Requested

Executive Summary Provided by Applicant: Southside Virginia Community College's Lake Country IT Academy provides education and training within the STEM-H-aligned academic discipline of Information Technology. The curriculum is based on a proven program that targets a documented gap between education supply and occupational demand. The IT Academy will initially serve postsecondary students in a lab and classroom seating up to 20 students. Plans include expanding the program to dually enrolled secondary students. In addition, the space is ideally suited for use by training programs designed to enhance workforce readiness. All students completing programs of study will receive industry-recognized credentials. By enriching the education and skill levels of the region's labor pool, the IT Academy will assist in the process of attracting, retaining, and providing job candidates for employers such as ATOS, the contractor for the Microsoft Data Center in Mecklenburg County, thus increasing the ability of local citizens to participate in the global economy.

Staff Comments and Recommendation: The majority of grant funds are requested for renovations and infrastructure build-out for start-up of a second IT Academy in a currently underutilized 2,185 square foot space at the Lake County Advanced Knowledge Center in South Hill. The Commission provided a \$440K grant to the Southern Virginia Higher Education Center in 2015 to support establishing the IT Academy at its 1st location in South Boston. The program will initially serve 20 adult students and will be expanded to include dual enrollment. Once fully operational, the IT Academy in South Hill is expected to support 45 students per semester with an estimated 75 credentials resulting annually. SVCC indicates that future development of this program may include an Associates of Applied Science in Information Systems. The proposed use of TRRC

funding is supported by three contractor quotes for \$63,943.33; plus \$30,000 estimated for the power update and \$1,000 for carpeting. The project is well leveraged with identified Match contributions that are nearly 2:1 on the TRRC investment. An employer letter from Atos, a contractor for Microsoft, provides solid numbers for hiring needs at the data center in Boydton. The project builds on successes already being achieved at the initial Academy (which has graduated its first cohort and begun a second and larger cohort), and replicates that model at a location 50 miles east that will be accessible to students from counties within a reasonable commute to the two data centers in Boydton. This proposal received one of the top five scores in this grant cycle.

Staff recommends award of \$104,943.

Southwest Virginia Higher Education Center Foundation
Clinical Laboratory Scientist - Phase II (#3154)
\$175,599 Requested

Executive Summary Provided by Applicant: To address the critical shortage of STEM-H clinical laboratory scientists and meet the growing staffing needs of rural hospitals in Southwest Virginia, the Southwest Virginia Higher Education Center (SVHEC) in collaboration with Virginia Commonwealth University (VCU) established a Bachelor of Science degree in Clinical Laboratory Sciences. Students receive their instruction via 2-way synchronous education and clinical training in the local hospitals. Graduates of this program are eligible to sit for the certification as a Clinical Laboratory Scientist (CLS). The program began in 2013 by equipping a lab, hiring an instructor and recruiting students. Due to a lack of Chemistry and Biology prerequisites many of the applicants had to return to the community college to obtain the necessary prerequisites, which caused a delayed start and the sustainability of the program.

Staff Comments and Recommendation: Funding is requested for three years of additional support for the Program Director (\$160,000) and supplies and materials (\$15,000) for the Clinical Laboratory Scientist program. TRRC assisted with start up of this program through a \$500,000 Competitive Education grant award in September 2013 for three years of salary support and equipment and materials. A \$147,000 balance remains in that grant. The current proposal requests support on a sliding scale with TRRC funds providing 75% support in year one, 50% support in year two, and 25% support in year three. Matching funds for each year will be provided from VCU and total \$178,793. Additional in-kind support valued at \$60,000 will be provided by the applicant (SWHEC) for Information technology support, room rental, and administrative support for the program in Abingdon. The 2013 application estimated enrollment of 20 students per cohort (junior and senior level cohorts each year) however that estimate has proven to be unrealistic. Additional conversations with the applicant revealed that 5-6 students per cohort is a more realistic expectation given space limitations of the lab and available clinical sites. Currently there are 5 full time (1 senior and 4 juniors) and 3 part time students enrolled in the program. Total enrollment for the 2016-2017 school year is estimated at 13-15. Initial recruitment for the program proved difficult due to lack of knowledge about pre-requisites and prevented the program from reaching sustainability within the first three years. Enrollment is growing and a mix of 13-15 full and part time students are expected for the 2016-2017 school year. While the application presents a weaning approach, with tuition revenues providing increasing support over the three year period, it appears that the program could

be self sustaining much sooner. With the current grant providing funding through March 2017, a better approach may be to consider additional funding, subject to the 1:1 match requirement, to assist the program through the end of the 2017 calendar year. Commission Staff estimated this to be \$86,212.50 with half (\$43,106.25) supported by TRRC. By the end of the 2017 calendar year the program will have a second year operating with 2 cohorts and will be better able to predict future sustainability.

Staff recommends an award of \$43,106 to support half the cost to fund the program for the remainder of the 2017 calendar year.

**Virginia Advanced Study Strategies, Inc.
VASS Rural Math Innovation Network (#3159)
\$250,000 Requested**

Executive Summary Provided by Applicant: Virginia Advanced Study Strategies, Inc.(VASS) requests a \$250,000 grant from the Virginia Tobacco Region Revitalization Commission (TRRC) as a portion of the required 15% match for a \$3 million grant from the US Department of Education (USED) Investing in Innovation (i3) fund to develop and implement the Rural Math Innovation Network (RMIN) in 26 school divisions in Southern and Southwest Virginia. The current i3 project administered by VASS has revealed the need for a networked learning community that will motivate and support math teachers in rural communities to innovate solutions that will increase student preparedness for high-demand STEM-H careers. Specifically, the RMIN will focus on identifying math competencies used by technicians in the TRRC region and adapting curriculum and teaching strategies to help students perform well on math assessments such as the community college placement test and the National Career Readiness Certificate assessment and continue on to attain credentials.

Staff Comments and Recommendation: This request is an expansion of the Rural Math Excel Partnership Project that was supported with \$1 million of TRRC funding approved under a repurpose request in 2013, and \$2.7 million of federal funding through the US Department of Education's Investing in Innovation Program (i3). That project area was focused on six school systems in Southern VA. This expanded phase of this program will target math teachers in twenty-six school systems in the Southwest and Southside areas of the tobacco region. VASS cites a gap analysis in math competencies for technician-level jobs in Southern VA as a justification for this project, and that the targeted math skills are a core component of testing for the National Career Readiness Certificate. The project presents a budget where program operating costs will be covered from \$3 million of federal funding through another US DOE Investing in Innovation grant that will be requested in 2016. For simplicity in grant administration, particularly as related to submission and review of expense documentation, the proposal requests \$250,000 of TRRC funding to be used toward a single \$450,000 evaluation contract which is an essential element of the proposed federal funding. Given that the proposal reflects a project period that would require a 5-year grant agreement, staff confirmed with VASS that the TRRC share of this contract would be spent during the Commission's standard three-year project period. Where the proposal indicates one measure for success to be increases in math scores on the National Career Readiness Certificate testing, which is a nationally-recognized credential that TRRC has supported under other grants, staff asked VASS to

consider adjusting the project budget to cover NCRC testing fees during the standard 3-year grant period as a way to guarantee these outcome numbers. VASS agreed to this adjustment and budgeting of \$12,000 to pay for NCRC fees for approximately 400 students, which was estimated to be a realistic number and primarily seniors based on students who are expected to participate in student learning sessions. This request would provide a significant portion of required matching funds for the i3 grant (VASS is also contributing \$200k to match), By creating a professional development network among math teachers, the proposal estimates it will benefit more than 12,000 students during the project period. With the NCRC-related revisions, the Commission will also see significant expansion of completers with that nationally-recognized workforce credential. Overall, the proposal aligns well with program objectives for STEM-H by targeting the development of K-12 teachers rather than the direct delivery of K-12 instruction, which has long been a low priority for Education funding. This proposal received one of the top five scores in this grant cycle.

Staff recommends grant award of \$250,000 to support the evaluation contract and NCRC testing fees, contingent on a federal Investing in Innovation grant award.

Virginia Technical Institute

Modernization of the VTI Welding Program Project (#3157)

\$181,823.50 Requested

Executive Summary Provided by Applicant: The demand for more welding instruction in south central Virginia has being expressed by our students and from area employers. The Virginia Technical Institute is ready to meet the need through our existing state-of-the-art welding lab and nationally recognized curriculum. Our current welding lab was established in 2011 with 20 welding booths. Our craft instructors have worked diligently with our current equipment to provide quality lab experiences to our students earning NCCER credentials. We are now operating our labs both day and night to meet the demands of customized training and collaborative courses in addition to our evening schedule. The “Modernization of the VTI Welding Program Project” would allow VTI to provide more welding opportunities and student access to the most up to date equipment currently used by local industries.

Staff Comments and Recommendation: Grant funds are requested to support enhancements to the existing welding program at VTI to improve student success and to further meet the needs of area employers. The twenty existing welding booths will be updated with new equipment; and equipment from existing booths will be used to create 10 additional welding booths bringing total instructional welding spaces to a total of 30. The applicant has clarified that enrollment in welding for 2015-2016 school year is 52 students in NCCER Level 1, 2, 3 or 4, and VTI projects that enrollment will increase 10% annually, or + 5 students, as a result of this project. Additional details including two equipment and construction quotes were provided to support the project budget, which identified \$221,843 total Match contribution with the majority being in Phases 2 & 3 of the project and including \$211,843 of cash Match contributions and \$10,000 of In-Kind construction labor. Full reimbursement of grant funds for Phase 1 costs may not occur until Phase 2 and 3 of the project are completed and the Match requirement is satisfied.

Staff recommends award of \$181,824.

Virginia Western Community College

BioLink II: Anatomy and Physiology in Franklin County (#3155)

\$49,652 Requested

Executive Summary Provided by Applicant: Virginia Western Community College is building a Southside gateway to the health professions — a fast-growing job sector that pays high wages and serves our aging communities. The BioLink II: Anatomy and Physiology in Franklin County education grant expands on the success of last year's BioLink grant, which created a laboratory classroom at the Franklin Center and introductory Biology 101 and 102 courses for Franklin County students. BioLink II will further equip the lab to offer the next courses in the Biology sequence: Human Anatomy and Physiology (Biology 141 and 142), which are required to pursue any programs in the health professions, including nursing. In March 2016, there were more than 1,000 online job listings for Registered Nurses in the VWCC service area.

Staff Comments and Recommendation: The BioLink lab received a Phase 1 grant of just under \$100,000 from the Competitive Education program in May 2015 to equip the lab to teach Biology 101 and 102. The requested amount for additional equipment would allow the teaching of two courses not currently taught at the Franklin Center, but which are essential for students pursuing multiple health career pathways including nursing, therapy, radiology, pharmacy, lab technician etc.. While the proposal indicates modest annual enrollment numbers (18), a reference to possible use by dual enrollment high school students in the future could significantly expand the number of students served annually. While the overall operating budget is incomplete (tuition revenue is not provided), the matching funds requirement would be met through VWCC's operating expenses to teach the classes over a three year project period. The applicant provides evidence of strong employer demand for nursing graduates (1,000 positions advertised in a recent month in the VWCC service). Although outcomes are conservative in terms of students credentialed as a direct result of the two additional classes, and these courses could be obtained at two other sites within 30 miles, this request provides an affordable and accessible option for students in the Commission's target area of STEM-H training, with strong employment demand in the region.

Staff recommends award of \$49,652 for the requested equipment.

Wytheville Community College

The Innovative Advanced Manufacturing Center at Wytheville Community College (#3165)

\$250,000 Requested

Executive Summary Provided by Applicant: WCC seeks to create the Innovative Advanced Manufacturing (IAM) Center at WCC. The IAM Center will transform the current machine shop at the college into an advanced precision machining center that comprises advanced manufacturing teaching technology and includes precision and automated machining, welding, and mechatronics. Driven by current and emerging industry needs, WCC will purchase additional state-of-the-art equipment currently being used by those business and industry in the community and surrounding regions to best meet employer needs and influence student employability.

Staff Comments and Recommendation: WCC is requesting \$250,000 to purchase necessary equipment to update and expand the existing Machine Technology/ Precision Machining and Welding Programs and to create a Mechatronics program. Matching funds are committed from the College's VCCS Equipment Trust Fund allocation for 2016-2017 and a VCCS grant (Tuition Differential) for the equipment purchases. WCC also commits to providing classroom/lab, as well as annual operating funds that will support operational funding for the programs, teaching faculty salaries, maintenance on all equipment, necessary supplies for teaching purposes, and any needed updates to the existing lab to ensure its suitability for the equipment. Students will be able to earn the following workforce credentials through these programs: MT 1, Siemens Levels 1 and 2, NIMS Levels 1 and 2, AWS D1.1, AAS Machine Technology, Machine Tool Operation Certificate, and Machining Career Studies Certificate. WCC anticipates 40 students in Machine Technology earning 88 credentials, 60 students in Welding earning 40 credentials, and 40 students in Mechatronics earning 45 credentials annually. In FY14 the Commission provided \$110,150 for the purchase of updated equipment for the Machine Technology program. Additional equipment has been purchased for the College (\$118,000) through Commission grants for the Southwest Virginia Advanced Manufacturing Center of Excellence project. The application documented strong demand for graduates of these programs from both local employers and several outside of the College's service area. This request aligns with and provides essential foundational level training in support of the Commission's Advanced Manufacturing mid-skill level training and certification initiative. As a result of that CoE alignment, the demonstrated demand from employers, the committed matching funds and the outcome numbers, this is the highest scoring proposal in this grant cycle.

Staff recommends an award for \$250,000 for the requested equipment purchases.