June 8, 2021

### NEW UNITS OF INSTRUCTION AT PUBLIC COMMUNITY COLLEGES

**Submitted for:**    Action.

**Summary:**    This item requests approval of three new associate degree programs to be offered at two community colleges.

**Action Requested:**    That the Illinois Board of Higher Education approves the following programs at the colleges indicated:

Black Hawk College
- Associate of Applied Science in Cybersecurity

Frontier Community College
- Associate of Applied Science in Certified Medical Assistant
- Associate of Applied Science in Electrical Distribution

STATE OF ILLINOIS
BOARD OF HIGHER EDUCATION

## NEW UNITS OF INSTRUCTION AT PUBLIC COMMUNITY COLLEGES

By statute, the Illinois Board of Higher Education (IBHE) is responsible for approving new associate degree programs proposed by public community colleges. The Board's approval criteria, defined in administrative rules, address relevance to college mission, academic control, faculty and staff, support services, financial resources, student demand, employer demand, curriculum, and congruence with IBHE policies and priorities. Before a recommendation for approval of an associate degree program is submitted to the IBHE for approval, staff of the IBHE and the Illinois Community College Board review the proposal. Once agreement is reached on a proposal having met the approval criteria, a recommendation for approval is presented to each board.

**Executive Summary**

<u>Black Hawk College</u>

- Associate of Applied Science in Cybersecurity

Black Hawk College (Black Hawk or the College) is seeking approval for a 60-credit hour Associate of Applied Science in Cybersecurity. The degree program requires 15 credit hours of general education coursework and 45 credit hours of required career and technical education coursework. This degree program was designed to provide knowledge and skills needed for entry-level employment in cybersecurity. Graduates will be prepared to assess the security needs of computer and network system, make recommendations for system safeguarding solutions, and manage the implementation, auditing and maintenance of security devices, systems, and procedures for all levels of business/industry. Students who complete the program will have served an internship to enhance classroom training with real-world experience and the opportunity to earn several industry certifications, including CompTIA A+, Linux+, Network+ and Security+ and Cisco CCNA. There are policies in place to ensure faculty members possess the training, credentials, and qualifications to provide instruction in the proposed program. The College has sufficient library, technology, staff, and financial resources in place to support the proposed program.

Approval request summary, including staff conclusion, follows in Attachment A.

<u>Frontier Community College</u>

- Associate of Applied Science in Certified Medical Assistant

Frontier Community College (Frontier or the College) is seeking approval for a 71-credit hour Associate of Applied Science in Certified Medical Assistant. The degree program requires 16 credit hours of general education coursework and 55 credit hours of required career and technical education coursework. This degree program was designed to provide knowledge and skills needed for entry-level employment as medical assistants. Graduates of the program will be eligible to sit for the National Healthcareer Association's Certified Medical Assistant (CMA) and the Certified

Clinical Medical Assistant (CCMA) exams, providing a recognized industry credential as a Certified Medical Assistant. Students are also eligible to sit for the Certified Phlebotomy Technician and Certified EKG Technician tests. There are policies in place to ensure faculty members possess the training, credentials, and qualifications to provide instruction in the proposed program. The College has sufficient library, technology, staff, and financial resources in place to support the proposed program.

- Associate of Applied Science in Electrical Distribution

Frontier Community College is seeking approval for a 65-credit hour Associate of Applied Science in Electrical Distribution. The degree program requires 17 credit hours of general education coursework and 48 credit hours of required career and technical education coursework. This degree program was designed to provide knowledge and skills needed for entry-level employment for employment as electrical distribution technicians for both above and below ground systems. Program completers will also graduate with a Class-A Commercial Driver's License (CDL) and Chemical Application and Flagger Certifications. There are policies in place to ensure faculty members possess the training, credentials, and qualifications to provide instruction in the proposed program. The College has sufficient library, technology, staff, and financial resources in place to support the proposed program.

Approval request summary, including staff conclusion, follows in Attachment C.

The staff recommends adoption of the following resolutions:

*The Illinois Board of Higher Education hereby grants authority to Black Hawk College to offer the Associate of Applied Science in Cybersecurity subject to the institution's implementation and maintenance of the conditions that were presented in its application and that form the basis upon which this authorization is granted.*

*The Illinois Board of Higher Education hereby grants authority to the Frontier Community College to offer the Associate of Applied Science in Certified Medical Assistant and the Associate of Applied Science in Electrical Distribution subject to the institution's implementation and maintenance of the conditions that were presented in its application and that form the basis upon which this authorization is granted.*

**Black Hawk College**
**6600 34th Avenue**
**Moline, Illinois 61265**
**President: Mr. Tim Wynes**

**Proposed Program Title:** Associate of Applied Science in Cybersecurity (60 credit hours)

## Program Purpose

The program will prepare individuals for entry-level employment in cybersecurity, assessing the security needs of computer and network system, making recommendations for system safeguarding solutions, and managing the implementation, auditing and maintenance of security devices, systems and procedures for all levels of business/industry.

## Catalog Description

Cybersecurity is a vital component of best practices for businesses, industry, and government, and the demand for trained professionals in the field will continue to grow. The Associate of Applied Science (AAS) in Cybersecurity prepares individuals with the knowledge and skills for a successful career in cybersecurity. Cybersecurity professionals are tasked with protecting information confidentiality, integrity, and availability by configuring and maintaining network routers, firewalls and intrusion-detection systems, detecting and minimizing security vulnerabilities, maintaining secure remote communication, and implementing corporate security policy. Students in the program will gain hands-on experience in these skills, as well as broad background training that includes computer hardware, networking, operating systems, and programming and scripting courses. Course content is shaped by an advisory board made up of local Information Technology (IT) and business professionals, who regularly review the curriculum and offer input, to ensure the program maintains relevance with industry trends. Students who complete the AAS in Cybersecurity will have served an internship to enhance classroom training with real-world experience and the opportunity to earn several industry certifications, including CompTIA A+ hardware, CompTIA Linux+, CompTIA Network+, CompTIA Security+ and CISCO Certified Network Administrator. Interested students are encouraged to contact an advisor or faculty member for more information.

## Curricular Information

The AAS in Cybersecurity requires 15 credit hours of general education coursework and 45 credit hours of required career and technical education coursework. The career and technical coursework includes instruction in introductory information security, computer hardware, Windows server, C Programming, scripting for system administrators, Linux I, Cisco 1 and 2, shell programming, network defense, ethical hacking and security, IT professional skills, and a required internship in network security.

The curriculum was developed according to National Security Administration Center for Academic Excellence standards and will prepare individuals for achieving such industry certification as a CISCO Certified Network Administrator, CompTIA A+ hardware, CompTIA Security+, CompTIA Network+, and CompTIA Linux+. Assessment of student learning will be achieved through evaluation of the student's performance during the work-based learning experience by program faculty and work-site supervisor, in addition to comprehensive assessment of skills.

**Supporting Labor Market Data (including employer partners)**

Labor market information provided by the college supports the interest in and the need for a two-year degree program in this field of study. According to the Illinois Department of Employment Security (IDES), employment in cybersecurity related occupations is expected to increase by about 23 percent statewide through 2026.

*Table 1: Employer Partners*

| Employers | Location |
|---|---|
| Martin Engineering | Neponset, IL |
| Sedona Group | Moline, IL |
| CIPAfilter | East Moline, IL |
| Modern Woodmen of America | Rock Island, IL |
| Shared IT | Bettendorf, IA |
| RSM | Davenport, IA |
| Stefanini | Davenport, IA |

*Table 2: Projected Enrollments*

| Cybersecurity AAS | First Year | Second Year | Third Year |
|---|---|---|---|
| Full-Time Enrollments: | 10 | 20 | 20 |
| Part-Time Enrollments: | 5 | 10 | 10 |
| Completions: | - | 10 | 20 |

**Financial / Budgetary Information**

Two (2) existing full-time, one (1) new part-time, and four (4) existing part-time faculty will be required to implement the program. Qualified teaching faculty will hold at least a bachelor's degree in Computer Technology or a closely related area, currently industry certifications in CompTIA Network+, Security+, and Linux+; as well as in related CISCO and Microsoft areas, have at least two years occupational experience in the field, and one year of teaching experience preferred. The program will utilize all existing facilities during the first three years of operation with some purchases of new equipment and upgrades planned during year three. The program will be fiscally supported through student tuition and fees.

*Table 3: Financial Information*

| | First Year | Second Year | Third Year |
|---|---|---|---|
| Faculty Costs | $14,112 | $14,400 | $74,700 |
| Administrator Costs | - | - | - |
| Other Personnel Costs | - | - | - |
| Equipment Costs | - | - | $15,000 |
| Library/LRC Costs | - | - | - |
| Facility Costs* | - | - | - |
| Other (software maintenance agreements) | $3,000 | $3,500 | $4,000 |
| **TOTAL NEW COSTS** | **$17,112** | **$17,900** | **$93,000** |

*Table 4: Faculty Requirements*

|  | First Year | | Second Year | | Third Year | |
| --- | --- | --- | --- | --- | --- | --- |
|  | Full-Time | Part-time | Full-Time | Part-time | Full-Time | Part-time |
| New Faculty | 0 | 1 | 0 | 1 | 1 | 2 |
| Existing Faculty | 2 | 4 | 2 | 5 | 2 | 6 |

**Staff Conclusion**

Black Hawk College and its proposed program meet the criteria to implement the Board of Higher Education Act (110 ILCS 205) as set forth in 23 Ill. Adm. Code 1050. 30 and the Illinois Board of Higher Education policies pertaining to assessment and accreditation for licensure.

**Frontier Community College**
**2 Frontier Drive**
**Fairfield, Illinois  62837**
**President:  Dr. Gerald Edgren**

**Proposed Program Title:**  Associate of Applied Science in Certified Medical Assistant (71 credit hours)

## Program Purpose

The program will prepare individuals for entry-level employment as medical assistants in a variety of allied healthcare settings.

## Catalog Description

The Associate of Applied Science (AAS) in Certified Medical Assistant prepares students to perform clerical duties and to assist in clinical situations normally associated with medical offices, clinics, dental offices, hospitals, and other health-related settings. Responsibilities may include scheduling appointments, preparing and maintaining permanent records, arranging hospital admissions, typing reports, processing health insurance forms, ordering supplies, keeping financial records, preparing patients for examinations, taking vital signs, assisting with first aid, and collecting and processing specimens, among others. The program provides depth and breadth in conceptual, professional, and medical skills. Upon completion of the degree, students are eligible to sit for the CMA and the CCMA examinations through the National Healthcareer Association to become a Certified Medical Assistant, an industry recognized credential. Students are also eligible to sit for the Certified Phlebotomy Technician and Certified EKG Technician tests. The program offers both certificate and degree options.

## Curricular Information

The AAS in Certified Medical Assistant requires 16 credit hours of general education coursework and 55 credit hours of career and technical education coursework. The career and technical coursework includes instruction in medical front office, medical terminology, clinical procedures, anatomy for medical assisting, pharmacology for medical assisting, human pathophysiology, introductory International Classification of Diseases, Tenth Revision, Clinical Modification (ICD-10-CM), ICD-10-CM for Medical Office, ICD-10-CM for Health Agencies, medical data management, medical funding applications, applied legal/medical concepts, Health Insurance Portability and Accountability Act of 1996 (HIPAA) for allied health, ethics in the medical community, and a required work-based learning experience in medical assisting. Students will also be given practice credentialing exams for assessment purposes. Graduates of the program will be prepared to sit for industry credentialing as a Certified Medical Assistant (CMA) and the Certified Clinical Medical Assistant (CCMA) through the National Healthcareer Association. Assessment of student learning for both programs will be achieved through evaluation of the student's performance during the work-based learning component by program faculty and workplace supervisor.

**Accrediting Information**

Frontier Community College (Frontier or the College) is accredited by the Higher Learning Commission. The curriculum was developed according to industry standards under the guidelines of the Commission on Accreditation of Allied Health Education Programs (CAAHEP) upon recommendation of the Medical Assistant Education Review Board (MAERB), and competencies set forth by the National Healthcareer Association for medical assistants. To sit for the National Healthcareer Association's CCMA or CMAA exam, students do not need to be a graduate of an accredited program. To be eligible, students must have graduated from a program that provides the appropriate knowledge and skills for the exam(s). The proposed AAS in Certified Medical Assistant provides this training.

**Justification for Credit Hours Required**

The curriculum was designed to meet the competencies required to sit for the CMA/CCMA credentialing exams. General education requirements and the required internship were developed according to competencies and local employer/program advisory committee input.

**Supporting Labor Market Data (including employer partners)**

Labor market information provided by the College supports the interest in and the need for a program in this field of study. According to the Illinois Department of Employment Security (IDES), growth of 13.4 percent for "medical assistants" is expected statewide through the year 2026. Lincoln Trail College, another Illinois Eastern Community College, currently also offers the AAS in Certified Medical Assistant and a Medical Assistant Certificate. The proposed program at Frontier Community College will offer students of the district who are not geographically close to Lincoln Trail College with additional options in allied health career programs.

*Table 1: Employer Partners*

| Employer | Location |
| --- | --- |
| Fairfield Memorial Hospital | Fairfield, IL |
| Hamilton Memorial Hospital | McLeansboro, IL |
| Wabash General Hospital | Mt. Carmel, IL |
| Clay County Hospital | Flora, IL |
| Aperion Care | Fairfield, IL |
| Fairfield Community Health Center | Fairfield, IL |
| Horizon Healthcare | Fairfield, IL |
| Good Samaritan Hospital | Mt. Vernon, IL |
| Albion Community Health Center | Albion, IL |

*Table 2: Projected Enrollments*

| Certified Medical Assistant AAS | First Year | Second Year | Third Year |
| --- | --- | --- | --- |
| Full-Time Enrollments: | 7 | 10 | 14 |
| Part-Time Enrollments: | 3 | 5 | 6 |
| Completions: | - | 8 | 12 |

**Financial / Budgetary Information**

The program will require one (1) existing full-time faculty the first year with one (1) additional new part-time faculty in the second year. Qualified faculty will hold at least an associate in Medical Assisting or Nursing, a current CMAA credential (or Registered Nurse license), five years related work experience, and one year teaching experience preferred. All facilities are adequately in place to support the program. These programs will otherwise be supported fiscally through student tuition and fees.

*Table 3: Financial Information*

|  | First Year | Second Year | Third Year |
|---|---|---|---|
| Faculty Costs | $0 | $0 | $0 |
| Administrator Costs | 0 | 0 | 0 |
| Other Personnel costs (adjunct) | 0 | $5,000 | $5,000 |
| Equipment Costs | 0 | 0 | 0 |
| Library/LRC Costs | 0 | 0 | 0 |
| Facility Costs* | 0 | 0 | 0 |
| Other | 0 | 0 | 0 |
| **TOTAL NEW COSTS** | **$0** | **$5,000** | **$5,000** |

*Table 4: Faculty Requirements*

|  | First Year | | Second Year | | Third Year | |
|---|---|---|---|---|---|---|
|  | Full-time | Part-time | Full-Time | Part-time | Full-Time | Part-time |
| New Faculty | 0 | 0 | 0 | 1 | 0 | 0 |
| Existing Faculty | 1 | 0 | 1 | 0 | 1 | 1 |

**Proposed Program Title:** Associate of Applied Science in Electrical Distribution Systems (65 credit hours)

**Program Purpose**

The program will prepare individuals for employment as electrical distribution technicians for both above and below ground systems.

**Catalog Description**

The Associates of Applied Science (AAS) in Electrical Distribution Systems prepares individuals to build, repair, and maintain both overhead and underground electrical distribution systems, all while emphasizing safe work practices and critical thinking. Students will learn to climb wooden pole structures, operate equipment, and perform pole-top rescues. Program completers will also graduate with a Class-A CDL and Chemical Application and Flagger Certifications. The program offers both certificate and degree options.

**Curricular Information**

The AAS in Electrical Distribution Systems requires 17 credit hours of general education coursework and 48 credit hours of career and technical education coursework. The career and

technical coursework includes instruction in electrical distribution systems, residential and commercial wiring, climbing skills, pole framing and construction specifications, setting and replacing poles, equipment operation, flagging and traffic control, transformer theory and installation, conductor installation, service and metering, rubber glove and underground distribution, fusing, substation and voltage regulation, distribution systems maintenance, ag chemical application, truck driver training, and a required work-based learning experience in electrical distribution technology. Assessment of student learning will be achieved through evaluation of the student's performance during the work-based learning component by program faculty and workplace supervisor.

**Justification for Credit Hours Required:**

The curriculum was designed based on the requirements to complete the existing Electrical Distribution System Certificate plus additional content and skills the advisory committee felt critical to function as an electrical line technician. General education requirements and the required internship were developed according to local employer/program advisory committee input.

**Supporting Labor Market Data (including employer partners)**

Labor market information provided by the College supports the interest in and the need for a degree program in this field of study. According to the Illinois Department of Employment Security (IDES), growth of 11 percent for "electrical line installers/repairers" is expected statewide through the year 2026. Frontier Community College also currently offers an Electrical Distribution Systems Certificate. The proposed degree program will provide an educational ladder opportunity for the certificate completers.

*Table 1: Employer Partners*

| Employer | Location |
|---|---|
| City of Fairfield Electric Distribution Department | Fairfield, IL |
| Wayne White Electric Cooperative | Fairfield, IL |
| Mt. Carmel Public Utility | Mt. Carmel, IL |
| Tri-County Electric Cooperative | Salem, IL |
| Ameren | Mt. Vernon, IL |
| Brownstown Electric Supply | Brownstown, IN |
| Norris Electric Cooperative | Newton, IL |
| KS Smith Electric Inc. | Mt. Carmel, IL |
| Fairfield Community High School | Fairfield, IL |
| Vectren | Evansville, IN |

*Table 2: Projected Enrollments*

| Electrical Distribution Systems AAS | First Year | Second Year | Third Year |
|---|---|---|---|
| Full-Time Enrollments: | 18 | 20 | 22 |
| Part-Time Enrollments: | 5 | 6 | 6 |
| Completions: | - | 17 | 20 |

**Financial / Budgetary Information**

The program will require one (1) existing full-time faculty the first year with one (1) additional new part-time faculty in the second year. Qualified faculty will hold at least an associate in Electrical Distribution Systems or closely related field, have at least six years related work experience, and one year teaching experience preferred. All facilities are adequately in place to support the program. These programs will otherwise be supported fiscally through student tuition and fees.

*Table 3: Financial Information*

|  | First Year | Second Year | Third Year |
|---|---|---|---|
| Faculty Costs | $0 | $3,500 | $3,500 |
| Administrator Costs | 0 | 0 | 0 |
| Other Personnel costs | 0 | 0 | 0 |
| Equipment Costs | 0 | 0 | 0 |
| Library/LRC Costs | 0 | 0 | 0 |
| Facility Costs* | 0 | 0 | 0 |
| Other | 0 | 0 | 0 |
| **TOTAL NEW COSTS** | **$0** | **$3,500** | **$3,500** |

*Table 4: Faculty Requirements*

|  | First Year | | Second Year | | Third Year | |
|---|---|---|---|---|---|---|
|  | Full-time | Part-time | Full-Time | Part-time | Full-Time | Part-time |
| New Faculty | 0 | 0 | 0 | 1 | 0 | 0 |
| Existing Faculty | 1 | 0 | 1 | 0 | 1 | 1 |

**Staff Conclusion**

Frontier Community College and its proposed programs meet the criteria to implement the Board of Higher Education Act (110 ILCS 205) as set forth in 23 Ill. Adm. Code 1050. 30 and the Illinois Board of Higher Education policies pertaining to assessment and accreditation for licensure.