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Computer Programming Specialist Associate in Applied Science

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Business, Management, Marketing & Technology Career Pathway

COMPUTER PROGRAMMING SPECIALIST – ASSOCIATE IN APPLIED SCIENCE (CPSP.AAS)

Programmers write the detailed sets of instructions computers understand and act on. Emphasis is placed on computer information systems, programming language, concepts and designs, logic and theory. Job opportunities may include applications programmer, computer operator, information office systems manager, operations scheduler, systems analyst or programmer.

Table with 2 columns: Requirement, Value. Rows include Minimum credits (67), Minimum cumulative GPA (2.0), Minimum grade in all courses (2.0), Minimum JCC credits (12), MACRAO agreement (No).

GENERAL EDUCATION REQUIREMENTS - (21 credits)

ADO 1: Write clearly, concisely and intelligibly (3 credits)

Take the following:

ENG 131 Writing Experience

ADO 2: Speak clearly, concisely and intelligibly (3 credits)

Choose one of the following:

- SPH 231 Communication Fundamentals
SPH 240 Interpersonal Communication

ADO 3: Demonstrate computational skills and mathematical reasoning (3-5 credits)

Take the following:

MTH 131 Intermediate Algebra or higher

ADO 4: Demonstrate scientific reasoning (4-5 credits)

Choose one of the following:

- BIO 110 Introductory Biology
BIO 131 General Biology
BIO 132 Human Biology
BIO 155 Anatomy & Physiology
BIO 220 Microbiology
BIO 253 Human Anatomy & Physiology I
CEM 131 Fundamentals of Chemistry
CEM 141 General Chemistry I
GEL 160 Introduction to Geology
NSC 131 Contemporary Science
PHY 131 Conceptual Physics
PHY 151 Astronomy
PHY 231 College Physics I
PHY 251 Modern University Physics

ADO 5: Understand human behavior and social systems, the principles which govern them, and their implications for the present and future (3-4 credits)

Choose one of the following:

- ECN 231 Macroeconomics
ECN 232 Microeconomics
HIS 131 Western Civilization to 1555
HIS 132 Western Civilization 1555 to Present
HIS 231 Development of the US through the Civil War
HIS 232 Development of the US from the Civil War
HIS 235 20th Century History
PLS 141 American National Government
PSY 140 Introduction to Psychology
SOC 231 Principles of Sociology

ADO 6: Understand aesthetic experience and artistic creativity (3 credits)

Choose one of the following:

- ART 111 Art History: Prehistoric to 1400
ART 112 Art History: Renaissance to Present
ENG 210 Introduction to Film
ENG 246 Short Story & Novel
ENG 247 Poetry & Drama
ENG 252 Shakespeare
ENG 254 Children's Literature
ENG 255 American Literature – 19th Century
ENG 256 American Literature – 20th Century
HUM 131 Cultural Connections
MUS 131 Understanding Music
THR 116 Introduction to Theatre

ADO 7: Think critically

Program courses meet this requirement

ADO 8: Make responsible decisions in personal and professional contexts (1-3 credits)

Choose one of the following:

- HPF 160 Wellness
HPF 277 Stress Management
HPF 283 Managing Stress & Holistic Health
PHL 236 Ethics

ADO 9: Work productively with others, recognizing individual contributions to group success

Program courses meet this requirement

ADO 10: Understand and respect the diversity and interdependence of the world's peoples and cultures

Program courses meet this requirement

COMPUTER PROGRAMMING SPECIALIST RELATED REQUIREMENTS - (10 credits)

Take the following:

- ACC 216 Financial Accounting Concepts
BUA 100 Contemporary Business
BUA 120 Human Relations in Business



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COMPUTER PROGRAMMING SPECIALIST CORE REQUIREMENTS - (36 credits)

Take the following:

- CIS 012 Microsoft® Windows® Workshop
- CIS 013 Operating Systems: UNIX
- CIS 016 Microsoft® DOS® Workshop
- CIS 101 Introduction to Computer Systems
- CIS 122 Microsoft® Access® Comprehensive
- CIS 143 HTML
- CIS 158 Programming Logic
- CIS 160 Programming in Visual Basic.NET
- CIS 165 JAVA Programming
- CIS 170 Programming in C++
- CIS 174 PC Repair/A+ Hardware Component
or CIS 177 Network+/Networking Fundamentals
- CIS 244 Web Programming
- CIS 260 Advanced Visual Basic.NET
- CIS 273 Systems Concepts and Design