Minnesota Dual-Training Pipeline
Competency Model for Information Technology
IT Support Career Cluster Pathway

Employer-Specific Requirements

Occupation-Specific Competencies*

Customer Service Procedures
Troubleshooting Protocol
Communication Skills
IT Help Ticket Tracking Software
Company Specific Software

*Other on-the-job training associated with a specific occupation

Cross-Occupational Technical Competencies*

- Help Desk / Troubleshooting/ Repair
- Maintenance / User Training
- Hardware & Software Installation/ Deployment
- High Availability Design & Support
- Incident Management

Industry-Wide Technical Competencies

- Principles of Information Technology
- Databases and Applications
- Networks, Telecom, Wireless & Mobility
- Software Development and Management
- User and Customer Support
- Digital Media and Visualization
- Compliance
- Risk Mgmt., Security and Information Assurance

IT Pillars: Infrastructure | Development | Security | Data

Workplace Competencies

- Business Fundamentals
- Teamwork
- Innovative Thinking
- Planning and Organizing
- Problem Solving and Decision Making
- Working With Tools and Technology

Academic Competencies

- Reading
- Writing
- Mathematics
- Science
- Communication
- Critical and Analytic Thinking
- Fundamental IT User Skills

Personal Effectiveness Competencies

- Interpersonal Skills and Teamwork
- Integrity
- Professionalism
- Initiative
- Dependability and Reliability
- Adaptability and Flexibility
- Lifelong Learning

Based on: Information Technology Competency Model Employment and Training Administration, U.S Dept. of Labor, September 2012.

*Pipeline recommends the Industry-Sector Technical Competencies as formal training opportunities (provided through related instruction) and the Occupation-Specific Competencies as on-the-job training opportunities.

Competency Model for IT Support Career Cluster Pathway Occupations

Possible IT Support Career Cluster Pathway Occupations

- Application Support Lead/Manager/Technician
- Applications: Analyst/Developer/Engineer/Production Support/Specialist
- Business Analyst
- Client Support Technician
- Computer Help Desk Specialist
- Computer Repair Technician
- Computer Service Technician
- Computer Support: Analyst/Specialist/ Technician
- Computer Technician
- Configuration Technician
- Customer Engagement Leader/Representative
- Customer Engineer Representative
- Customer Service Representative
- Customer Success Engineer
- Customer Support Engineer/Technician
- Computer User Support Specialist
- Database Administrators
- Data Warehousing Specialist
- Deployment Technician
- Deskside Support: Representative/Specialist/Technician
- Desktop: Administrator/Analyst/Support Analyst/Support Specialist/Technician
- Document Management Specialist
- End User: Support/Specialist/Technician
- Entry Level Help Desk
- Field Support: Specialist/Technician
- Hardware Technician
- Help Desk: Administrator/Agent/Analyst/Technician/ Associate/Coordinator/Engineer/Representative/Speciali st/ Support/Team Lead
- Inbound Technical Support - Call Center
- Information Systems: Analyst/Specialist/Technician
- Information Technology: Administrator/Analyst/Assistant/ Consultant/Manager/Recruiter/Specialist
- Information Technology Support: Analyst/Specialist/ Technician
- Infrastructure Support Engineer
- It Help Desk: Associate/Representative
- IT Support: Assistant/Associate/Coordinator/Engineer
- IT Systems Analyst
- IT Technical Support
- Network: Administrator/Analyst/ Consultant/Engineer/
- Manager/Operations Analyst/Specialist/Support/Technician
- Operations: Specialist/Technician PC Analyst
- PC Support: Specialist/Technician
- Product Support: Specialist/Analyst
- Production Support Analyst
- Project Manager - Customer Engagement
- Repair Technician
- Sales Specialist
- Security Administrator
- Service Desk: Analyst/Specialist/Technician
- Service Desk Specialist
- Service Technician
- Software Development Engineer
- Software Manager
- Software Support: Analyst/Representative/ Specialist/Technician
- Supervisor, Technical Support
- Support: Analyst/Specialist

- Systems: Administrator/Analyst/Engineer/ Software
- Support
- Systems Support:

  Administrator/Representative/Specialist
  - Technical Support Specialist
  - Technical Help Desk
  - Technical Services:

  Coordinator/Engineer/Representative/

  Specialist/Technician
  - Technical Support: Advisor/Agent/Analyst/Assistant/

  Associate/Coordinator/Lead/Professional/Supervisor

  Technician
  - Technical Writer
  - Training Specialist
  - User Support: Analyst/Specialist
  - VoIP Technician
  - Workstation Technician

This list is intended to be a guide of potential occupations available within the Information Management & Analytics Pathway. Other position titles may be used based on an employer's organizational structure.

Cross-Occupational Technical Competencies

Help Desk – Learn to assist with problems and provide guidance about products such as computers, electronic equipment and software.
Troubleshooting/Repair – Knowledge how to use trouble ticket tracking systems and how to connect remotely to users computers.
Maintenance – Modification of a system to correct faults, to improve performance, or to adapt the system to a changed environment or changed requirements.
User Training – deliver end user training to support the development of the team.
Hardware & Software Installation/Deployment – Understanding of procedures to install, configure, operate and repair individual workstations and software applications.
High Availability Design & Support – Knowledge of an agreed level of operational performance and support for a higher than normal period.
Incident Management – Learn to identify, analyze and correct hazards to prevent a future IT re-occurrence.

Occupation-Specific Competencies, typically addressed in on-the-job training

Customer Service Procedures – Practice good customer service skills by using professional communication techniques and technical expertise.
Troubleshooting Protocol – Ability to apply logic over technical components, including computers, software or hardware, to identify faults.
Communication Skills – effectively communicate with internal and external customers to gather information regarding system function and maintenance.
IT Help Ticket Tracking Software – Use of software to create, update and resolve reported customer issues.
Company Specific Software – Demonstrate ability to locate, fix or bypass errors in company specific software.

Possible IT Support Career Cluster Pathway Certifications

- CompTIA A+
- ComTIA Network+
- CompTIA Server+
- ITIL Foundations
- CCNA or CCNP
- MCSA or MCSE
- HCI – SCA
- HCI – TSP
- Apple ACSP
- VCP

IT Support Career Cluster Pathway Training Plan

	List Course/Training Name and Title	Description of Courses and/or Training Program	List Responsible Provider: Company, College, Trainer, or other	Anticipated Completion Date
Related Instruction Competencies				
Help Desk				
Troubleshooting/Repair				
Maintenance				
User Training				
Hardware & Software Installation/Deployment				
High Availability Design & Support				
Incident Management				
On-The-Job Training Competencies				
Customer Service Procedures				
Troubleshooting Protocol				
Communication Skills				
IT Help Ticket Tracking Software				
Company Specific Software				