

Option C

Network Engineering – Information Assurance/Network Security (AAS)

This program prepares students to perform tasks associated with addressing the security need of computer and network systems, recommending safe-guard solutions, and managing the implementation and maintenance of security devices, systems, and procedures.

FRESHMAN YEAR	Fall	Spring	SOPHOMORE YEAR	Fall	Spring
CIS 145 Fund of Network Security	3		CIS 162 Operating Systems Windows	3	
CIS 160 Operating Systems	3		CIS 220 Operating Systems Unix	3	
CIS Elective	3		CIS 255 Design Windows 2003		
CIS 265 Cisco Networking	4		Security	3	
Math Elective	3-4		CIS 267 Cisco Switching	3	
CIS 147 Principles of Information			CSCI 127 Beginning Java	3	
Security		3	Art/Humanities/Social Science		
CIS 222 Novell Netware Admin		3	Elective	3	
CIS 244 Windows 2003 Server		3	Wellness Elective	1	
CIS 266 Cisco Routing, Config, Trouble		4	CIS 248 Operating Systems Linux		3
CSCI 185 Javascript		3	CIS 256 Computer Forensics		3
CIS Elective		3	CIS 268 Cisco Switch & Project Mgmt		4
			Art/Humanities/Social Science		
			Elective		3
			Communication Elective		3
			CIS Elective		3

INFORMATION TECHNOLOGY

Network Engineering (AAS)

Option A - Computer Systems Technology

Option B - Database Technology

Option C - Information Assurance/Network Security

Option D - Operating Systems Technology

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WHAT WOULD I DO? EMPLOYMENT OPPORTUNITIES

Network Engineer – Maintain network hardware and software, analyze problems, monitor the network, and implement network security measures.

Computer Systems Technology – Maintain, analyze, troubleshoot, and repair computer systems, hardware, and peripherals in both networked and stand-alone environments.

Database Technology – Manage and organize database resources by modification, installation, configuration, monitoring, and troubleshooting systems such as Access and Oracle.

Information Assurance/Network Security – Address the security needs of computer and network systems, recommend safeguard solutions, and manage the implantation and maintainance of security devices.

Operating Systems Technology – Manage and control the system configurations from a specific site or network hub including Windows 2000/2003 Server, Windows XP, Unix/Solaris, Novell, and Linux.

HOW MUCH WOULD I EARN? EMPLOYMENT INCOME

Earnings vary widely depending on position and experience, ranging anywhere from minimum wage to more than \$20.00 an hour. Nationwide, annual salary is about \$59,140; in North Dakota, around \$43,800.

HOW MANY JOBS ARE THERE? EMPLOYMENT OUTLOOK

Employment of network engineers is expected to grow faster than any other profession through the year 2008 in response to increasing technology.

Information Technology Network Engineering (AAS)

	Fall	Spring
<i>FRESHMAN</i>		
CIS 265 Cisco Networking	4	
CIS 220 Operating Systems/UNIX	3	
CIS 219 Microcomputer Hardware	3	
CIS Elective	3	
Math elective	3	
CIS 266 Cisco Routing, Config, Trouble		4
CIS 245 Solaris System Admin I		3
CIS 244 Windows 2003 Server		3
CIS 275 Advanced Hardware		3
Art/Humanities/Social Science elective		3
Wellness elective		1
<i>SOPHOMORE YEAR</i>		
CIS 267 Cisco Switching/LAN Topol	3	
CIS 246 Solaris System Admin II	3	
Computer electives	6	
Communication elective	3	
CIS 268 Cisco Switching/Proj Mgmt		4
CIS 248 Operating Systems Linux		3
CIS 162 Operating Systems/Windows XP		3
CIS 222 Netware Administration 5.x		3
Computer elective		3