## **Cosumnes River College**

**CISN 301** 

# **Network Client Systems Administration (Linux)**

A Hybrid-Online Course Spring 2011

**Instructor**: Buddy Spisak

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The turnaround time for responding to most E-mails is about one to two days. Be sure to include your name and the course number in each E-mail so I can identify who you are and what the E-mail is about.

Course Web page: http://d2l.losrios.edu/

**Prerequisites**: none

**Advisory**: CISC 302, 308 or 310

Lecture: Online

Lab: T 6:00 to 9:10 p.m. Accepted for Credit: CSU Class Credits: 3 units

#### **Required Textbooks:**

**Title:** <u>SUSE Linux Enterprise Desktop Administration</u>

**Author:** Jason Eckert

**Publishing Info:** Thompson Course Technology, 2008

**ISBN10:** 1-4283-2227-2 **ISBN13:** 978-1-4283-2227-1

**Optional Materials:** 

3-1/2" floppies, a flash drive, or RW-DVD's to store your work for the

class

#### **Course Description:**

This course covers the administration of a client in a client/server network. Topics include designing a basic network, installing and configuring a client network operating system, managing network security with user and group accounts, creating directory structures and network shares, setting up and managing network printers, backing up servers, monitoring and troubleshooting network resources, and establishing policies and procedures for network operations. Students may receive three-units of credit for each new version of an operating system offered or for a different operating system offered. Consult the class schedule for specific operating system offered. This course may be taken four times for credit.

### **Student Learning Outcomes and Course Objectives:**

As a result of completing this course, you will be able to:

 SLO #01: DEDUCE THE DIFFERENCE BETWEEN A NETWORK CLIENT OPERATING SYSTEM AND A NETWORK SERVER OPERATING SYSTEM

Evaluate client operating system support features

Identify the role of a network client operating system in the enterprise

#### SLO #02: DISTINGUISH BETWEEN THE VARIOUS INSTALLATION METHODS

Assess the needs to upgrade from a previous operating system version

Measure ways to migrate existing user environments to a new installation

Inspect post-installation updates and product activation

Reason the cause for failed installations

# • SLO #03: EVALUATE METHODS TO MANAGE DISKS, FILE SYSTEMS, AND PERIPHERALS DEVICES

Investigate, configure, and troubleshoot volumes and disks

Design and configure removable media, such as tape devices, DVD and CD-ROM devices

Manage, configure, and troubleshoot input and output (I/O) devices

Manage printers and fax devices

Manage print jobs

### • SLO #04: MANAGE AND CONFIGURE THE USER'S EXPERIENCE

Choose accessibility settings

Manage desktop components

Manage display options

Choose regional and language settings

Manage users' profiles and data

• SLO #05: MANAGE APPLICATIONS

Manage distribution of applications

Investigate, and troubleshoot application compatibility with the network client operating system Manage and configure a web browser

## SLO #06: DISCOVER HOW TO CONNECT A NETWORK CLIENT OPERATING SYSTEM TO A NETWORK

Investigate how to configure a wireless network

Assess how to connect to a virtual private network (VPN)

Manage and configure Remote Desktop and Remote Assistance

Configure and troubleshoot the TCP/IP protocol

• SLO #07: MANAGE USERS AND GROUPS

Manage user account properties

Manage and troubleshoot cached credentials

Manage user and group rights

#### SLO #08: PLAN FOR COMPUTER SECURITY, RECOVERY AND PERFORMANCE

Manage security configuration with templates

Discover how to back up and restore systems and data

Establish, implement, and monitor a security audit policy

Monitor system performance

Manage scheduled tasks

# **Methods of Measuring Student Learning Outcomes:**

You will demonstrate knowledge of network and Internet security applications and standards through class discussions and achievement on quizzes and final examination.

You will demonstrate competence in the coursework by completing lab work and participating in the discussion board during the semester.

## **Student Obligations:**

**Attendance**: Since this course is online, only attendance at the On-Campus Orientation on Jan. 18, 2011 and the Final on Mar. 8, 2011 is necessary. There will be weekly lab time on campus, and it is up to you to complete the lab assignments during the lab time or at home.

**Late Work**: Unless noted all assignments are due on Monday by midnight each week. Late work will be accepted ONLY if you have contacted me prior to the due date either by E-mail or voice mail. In general, late work is due the next week, and no late assignments may be turned in after one week from the original due date regardless of the reason. For every day an assignment is late, you will lose 10% of its grade.

**Due Dates**: Unless noted all assignments will be submitted in Desire2Learn under the "Weekly Assignments" link. If, for any reason, you cannot access Desire2Learn or are unable to submit the assignment on time, please E-mail it to me instead so that you are not penalized for being late. Quizzes and the discussion board items cannot be taken past their due date. If you miss a quiz and you want to make up points you can take advantage of the extra credit assignments posted in Desire2Learn. Everyone is welcome to work on the extra credit assignments. Typically, they are five to ten points each, depending on the difficulty of the assignment.

**Labs**: There will be six labs credited for homework for the class. The due dates are located in the **SCHEDULE** portion of this handout. We will spend a lot of time working on lab activities. Each lab has a set of review questions that you will need to answer in Desire2Learn in order to receive points for that assignment. If you do the lab work at the college during the regularly scheduled lab time, you will not have to submit your results in Desire2Learn. Instead, I will visually confirm your work and assign your points in class.

**Discussions**: I want everyone to take a pro-active approach to learning this material. This includes using the discussion board to ask questions and also answer other students' questions. I will also post questions each week that you can answer to further your understanding of the material. I expect two postings each week unless otherwise noted.

**Final Exam**: The final exam will consist of two parts. One part of the exam will be a hands-on practical demonstration of assigned tasks and the other part will be an exam taken in Desire2Learn.

**Plagiarism Policy**: It is inappropriate, and a violation of academic policy, to copy information from any source (including, but not limited to, textbooks, magazine articles, newspaper articles and Internet articles) without giving proper credit to the author by using standard quotation procedures such as in-line quotes, footnotes, endnotes, etc. Quotes may not exceed 25% of the assignment's total length. You will receive no credit (0 points) for any assignment that copies any material from any other source without giving proper credit to the author(s). Repeat offenders of this policy are subject to academic discipline as outlined in the policies published by the college.

**Cheating**: Students who cheat will receive a failing grade for the course. See the Students Rights and Responsibilities page of the college website (http://www.crc.losrios.edu/College\_Catalog/General\_Information/Students\_Rights\_and\_Responsibilities. htm) for additional information.

**E-mail**: Every student will be required to have an E-mail account.

**E-mail etiquette**: I will not tolerate rude and demeaning comments or e-mails to anyone in this class. Please keep your comments and e-mails topic-related. If I determine that a comment or e-mail to anyone else in the class is rude or demeaning, I will warn you once. If your behavior continues to be unacceptable, I will refer you to the administration of the college for disciplinary action.

**Personal belongings**: No food or drinks are allowed in the classroom. All cell phones, beepers, pagers, etc. should be turned off or set to vibrate.

**Disabilities:** If you have a documented disability and wish to discuss academic accommodations, please contact me after class or contact the Office of Disabled Student Programs and Services at 691-7275 as soon as possible.

**Campus Police:** You can call 691-7777 to request a safety escort.

**Desire2Learn:** This class utilizes a product called "Desire2Learn." It is highly recommended that you check the website frequently for scheduling updates and homework assignments. Most of the homework assignments and guizzes will be done on Desire2Learn.

**Online Course Responsibilities:** This course requires significant self-motivation. You must not get behind. Labs and weekly assignments can take up to eight hours to finish. Please don't try to finish them in one day. Not all activities are created equal. Some may take a bit longer than others. You would normally spend 4 hours per week in class for this course: total of 54 hours. Allow yourself at least 8 hours per week to complete the activities online, including the time spent writing for the postings to the class discussion board. You should plan additional time to read the textbook and study for the quizzes. Some people believe this is a much easier way to study this subject than an on-campus framework because they love to read and avoid the parking problems. Others feel very intimidated at first. Be patient as you work your way through the activities.

### **Grading:**

Course Topic	Points	Total	Approximate % the of Grade	
Labs (7)	50	350	46	
Orientation Quiz (1)	10	10	1	
Quizzes (4)	30	120	16	
Discussions (4)	20	80	11	
Final Exam (1)	200	200	26	

# **Point System:**

There are 760 total assigned points.

**Grade Ranges:** A= 684-760, B=608-683, C=532-607, D=456-531, F=0-455

**Schedule**: It is tentative and can change during the course of the term. All changes will be located under the "News" section in Desire2Learn for the course.

	Day:		Lecture/Lab Schedule:	Assignment Due:	Due Date (By Midnight):
				Orientation Discussion	
Week 1	Tue.	1/18	Orientation and Introductions	Orientation Quiz	Mon., Jan. 24
			Ch 1: Install SLED 10	View the Online	
			Ch 2: Use the Linux Desktop	Orientation	
			Lab #1:		
				51 1 (4/6) 1 1	
Week 2	Tue.	1/25	Ch 3: Locate and Use Resources	Discussion #1(Ch 1-4)	Mon., Jan. 31
		, -	Ch 4: Administer Linux with YAST	Quiz#1 (Ch 1-4)	,
			Lab #2:	Lab #1	
			Ch 5: Manage the Network Configuration	Lab #2	
Week 3 Tue.		2/1	Ch 6: Manage Software	Lub #2	Mon., Feb. 7
WEEK 5 THE.	ruc.	<i>2</i> / ±	Lab #3:		11011, 1 CD. 7
			Lab #3.		
		Ch 7: Manage Directories and Files	Discussion #2(Ch 5-8)		
Week 4 Tue.	2/8	Ch 8: Work with the Linux Shell and CLI	,	Mon., Feb. 14	
		,	Lab #4:	Quiz#2 (Ch 5-8)	,
				Lab #3	
			Ch 9: Manage Users, Groups, and	Lab #4	
			Permissions		
			Ch 10: Monitor the Linux System and		
Week 5 Tue	Tue.	2/15	Control Processes		Mon., Feb. 21
			Lab #5:		·
	_		Ch 11: Manage System Initialization	Discussion #3 (Ch 9-11)	
Week 6	Tue.	2/22	Ch 12: Administer Printing		Mon., Feb. 28
			Lab #6:	Quiz#3 (Ch 9-11)	
				Lab #5	
			Ch 13: Intograto CLED 10 into Eviating	Lab #C	
			Ch 13: Integrate SLED 10 into Existing	Lab #6	
Mod. 7	Tue	2/1	Environments		Man Mar 7
Week 7	Tue.	3/1	Ch 14: Customize the GUI on SLED 10		Mon., Mar. 7
			Lab #7:		
				Discussion #4 (Ch 12-	
				14)	All work needs
Week 8	Tue.	3/8	Final Exam	Quiz#4 (Ch 12-14)	to be turned in.
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