



Indraprastha College for Women

University of Delhi

Course Name:	B.A. (P)
Paper Title:	Software Tools and Techniques
Unique Paper Code:	234167680001
Semester:	VIIIth
Faculty(s):	Dr. Shikha Agarwal
Year:	2026-2027

Work Plan			
Period	Unit No.	Learning Objective	Topics to be Covered
28 th July -31 st July	1	To have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Foundations of Shell and Command-line Environment:
1 st Aug -3 rd Aug	1	have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Foundations of Shell and Command-line Environment:
5 th Aug-10 th Aug	1	have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Foundations of Shell and Command-line Environment:
12 th Aug-17 th Aug	1	have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Foundations of Shell and Command-line Environment:
19 th Aug-24 th Aug	1	have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Foundations of Shell and Command-line Environment:

26 th Aug-31 st Aug	1	have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Foundations of Shell and Command-line Environment:
2 nd Sep-7 th Sep	1	have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Shell Tools and Scripting, Editors (Vim),

9 th Sep-14 th Sep	1	have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Shell Tools and Scripting, Editors (Vim),
16 th Sep-21 st Sep	1	have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Command-line Environment, Debugging and Profiling,
23 rd Sep-28 th Sep	1	have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Common command-line flags/patterns,
30 th Sep-5 th Oct	1	have knowledge of the fundamental shell tools and scripting techniques used in Linux or Unix-like environments.	Common command-line flags/patterns,
7 th Oct-12 th Oct	1	2. understand the process of booting systems, using live USBs, and understanding their role in system recovery and troubleshooting.	Bootimg + Live USBs,
14 th Oct-19 th Oct	1	2. understand the process of booting systems, using live USBs, and understanding their role in system recovery and troubleshooting.	Metaprogramming: Working with Daemons, FUSE,
21 st Oct-26 th Oct	1	2. understand the process of booting systems, using live USBs, and understanding their role in system recovery and troubleshooting.	Metaprogramming: Working with Daemons, FUSE,
4 th Nov-9 th Nov	1	3. apply Markdown for documentation, including its syntax and its applications in writing clear, readable documents.	Markdown

11 th Nov-16 th Nov	1	3. apply Markdown for documentation, including its syntax and its applications in writing clear, readable documents.	Markdown
17 th Nov-20 th Nov	1	3. apply Markdown for documentation, including its syntax and its applications in writing clear, readable documents.	Markdown

Unit	TOPICS
I	Foundations of Shell and Command-line Environment: Shell Tools and Scripting, Editors (Vim), Command-line Environment, Debugging and Profiling, Common command-line flags/patterns, Booting + Live USBs, Metaprogramming: Working with Daemons, FUSE, Markdown
S. No.	Name of Authors/Books/Publishers

1.	Newham C., Learning the bash shell: Unix shell programming. O'Reilly Media, Inc., 2005
2.	Shotts W. The Linux command line: a complete introduction. No Starch Press. 2019.
3.	https://git-scm.com/book/en/v2 https://www.techtarget.com/searchdatabackup/feature/Full-incremental-or-differentialHow-to-choose-the-correct-backup-type https://developer.hashicorp.com/vagrant/docs https://docs.docker.com/get-started/ https://docs.openstack.org/2025.1/

Paper Components			
Credits	Lecture (L)	Tutorial (T)	Practical (P)
2	0	0	2
Assessment Scheme			
S.No.	Component	Marking Scheme	Total Marks

1	Internal Assessment		
		• Assignment/Quiz/Project / Presentation	
		• Class Test	
		• Attendance	
2.	Continuous Assessment (Tutorial)		80
		• Activity 1 + Activity 2	
		• Activity 3 + Activity 4	
		• Attendance	
3.	Practical		
		• Continuous Assessment	
		• End Term Written/Practical Exam	
		• Viva	
4.	End Semester Examination		