






Sysadmin Essentials: Monitoring Log Files

Cybersecurity
Linux 3 Day 3



Today's Objectives

By the end of class, you will be able to:

-  Filter cron log message using `journalctl` and `rsyslog`
 -  Analyze and troubleshoot cron logs using `logwatch`
 -  Review the past three weeks of Linux lessons.
-

A Better Way to Administer Log Files

Journalctl

Amidst thousands of incoming messages, filtering is an efficient way to monitor and troubleshoot problems.



`Journalctl` and `rsyslog` administer logs via filtering.



The `journalctl` utility displays entries in the journal managed by the `journald` daemon



Sysadmins use `journalctl` to display and filter logs from various service.



Journal records are structured and indexed, allowing for output in different formats such as JSON.

Filtering Cron Logs Demo

Next, we'll demonstrate the following:

01

Filtering for the cron service.

02

Journalctl filtering options

03

Viewing cron logs using predefined Strings

04

Viewing cron logs by time.

05

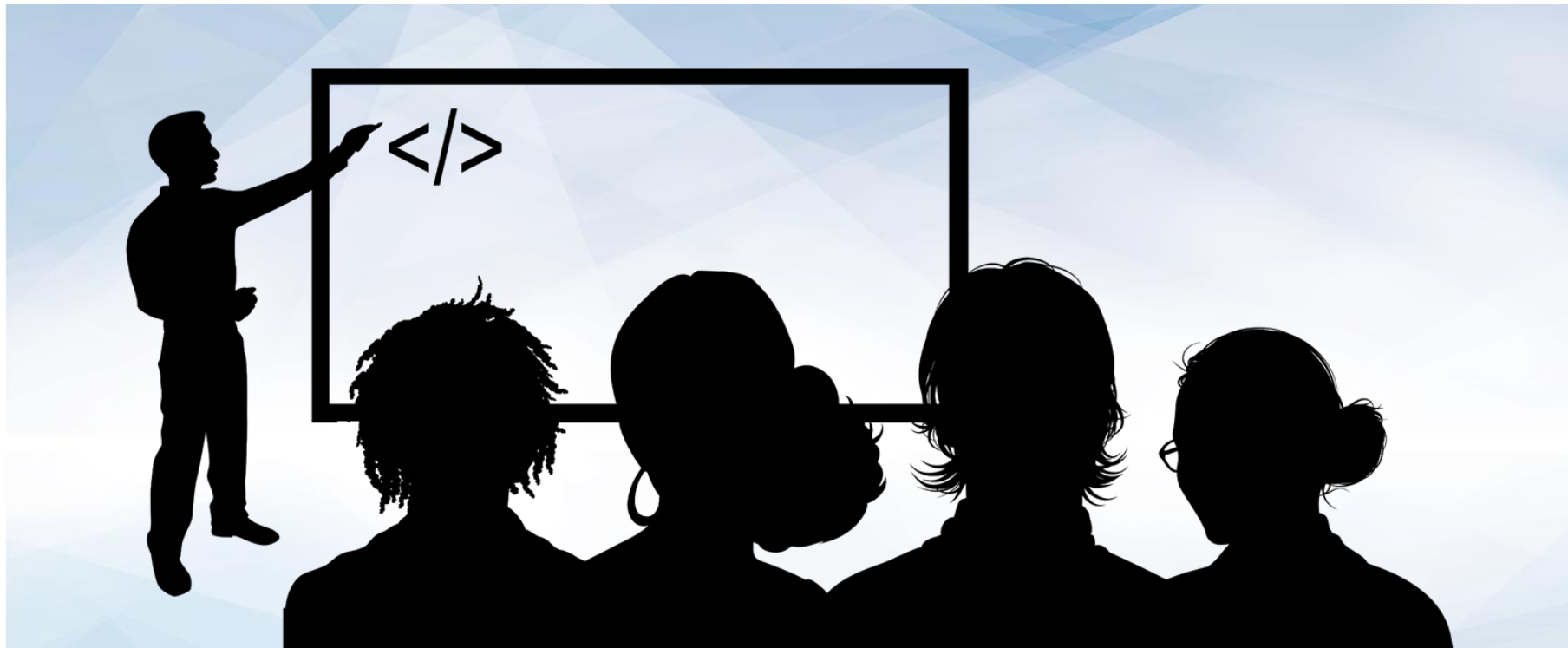
Formatting the Output with a log management system

06

Persist journalctl logs

07

Filtering cron logs with rsyslog



Instructor Demonstration

Journctl



Activity: Filtering Log Files

In this activity, you will use `journalctl` to filter cron logs.

Instructions sent via Slack.

Suggested Time:
12 Minutes





Times Up! Let's Review.

Filtering Log Files

Take a Break!



Monitoring Cron Logs with logwatch



logwatch produces reports that can be filtered by services and viewed online or sent via email.



Instructor Demonstration

logwatch



Activity: Monitoring Cron Logs with logwatch

In this activity, you will use logwatch to manually monitor cron logs and email a digest to yourself.

Instructions sent via Slack.

Suggested Time:
20 Minutes





Times Up! Let's Review.

logwatch Cron Monitor



Review Activity: **Linux**

In this activity, we will review the topics covered in the past three weeks of Linux lessons.

Instructions sent via Slack.

Suggested Time:
50 Minutes





Times Up! Let's Review.

Linux