

1. create script to list all files in /var/log every 5 seconds and append the list to /tmp/list.log file

```
sara@sara-VirtualBox:/var/lab3$ vi script.sh

[1]+  Stopped                  vi script.sh
sara@sara-VirtualBox:/var/lab3$ chmod +x script.sh
chmod: changing permissions of 'script.sh': Operation not permitted
sara@sara-VirtualBox:/var/lab3$ sudo chmod +x script.sh
sara@sara-VirtualBox:/var/lab3$ sudo ./script.sh

#!/bin/bash

while true; do
ls /var/log >> /tmp/list.log
sleep 5;
done

~
```

2. copy the script to /usr/local/bin directory and set the execution attribute to it

```
sara@sara-VirtualBox:/var/lab3$ sudo cp script.sh /usr/local/bin/script.sh
sara@sara-VirtualBox:/var/lab3$ sudo chmod +x /usr/local/bin/script.sh
```

3. create systemd service file to execute the the script as background service

```
sara@sara-VirtualBox:/etc/systemd/system$ systemctl start bg_process.service
sara@sara-VirtualBox:/etc/systemd/system$ systemctl status bg_process.service
● bg_process.service - bg_process
   Loaded: loaded (/etc/systemd/system/bg_process.service; disabled; vendor >
   Active: active (running) since Wed 2023-02-22 15:38:21 EET; 24s ago
     Main PID: 180647 (script.sh)
        Tasks: 2 (limit: 2288)
      Memory: 552.0K
         CPU: 33ms
    CGroup: /system.slice/bg_process.service
            └─180647 /bin/bash /usr/local/bin/script.sh
              └─180658 sleep 5

15:38:21 22 فبراير sara-VirtualBox systemd[1]: Started bg_process.
lines 1-12/12 (END)

GNU nano 6.2                  bg_process.service
[Unit]
Description=bg_process
After=syslog.target network.target

[Service]
Type=simple
User=root
Group=root
TimeoutStartSec=0
Restart=on-failure
RestartSec=30s
#ExecStartPre=
ExecStart=/usr/local/bin/script.sh
#ExecStop=
[Install]
WantedBy=multi-user.target
```

4. using cron, schedule a job every 5 minutes to copy /tmp/list.log file to /tmp/list.log.1 and compress the file using zip command

**crontab -e then:**

```
# M T W T F S S day-of-week Command
*/5 * * * * zip -r /tmp/list.log.1.zip /tmp/list.log
```