**Assignment 4: Implementing Control Structures**

Shrisan Kapali

Advanced Programming Languages (MSCS 632 M20)

Ulrich Vouama  
June 29, 2025

**GitHub Link**

[**https://github.com/ShrisanKapali-Cumberlands/MSCS\_632\_Assignment\_4**](https://github.com/ShrisanKapali-Cumberlands/MSCS_632_Assignment_4)

**Python Employee Shifts Scheduler Program**

Different datasets, named dataset, dataset1, dataset2, dataset3 were taken to illustrate the scheduler functionality.

**Case 1: Empty Data Set – No Employees**

A white text with black text

AI-generated content may be incorrect.A screenshot of a computer program

AI-generated content may be incorrect.

A screenshot of a calendar

AI-generated content may be incorrect.

**Case 2: Employees without any day’s preferences – Random assignment**

**A screenshot of a computer code

AI-generated content may be incorrect.**

**A screenshot of a computer

AI-generated content may be incorrect.A white paper with black text

AI-generated content may be incorrect.**

**A screenshot of a calendar

AI-generated content may be incorrect.**

**A table of names

AI-generated content may be incorrect.**

**Case 3: Employees with day’s preferences + Random assignment**

**A screenshot of a computer program

AI-generated content may be incorrect.** **A screenshot of a computer program

AI-generated content may be incorrect.** A screenshot of a computer program

AI-generated content may be incorrect.

**A screenshot of a computer

AI-generated content may be incorrect.** **A list of days with text

AI-generated content may be incorrect.**

**A screenshot of a calendar

AI-generated content may be incorrect.**

**A table of names with black text

AI-generated content may be incorrect.**

**Case 3: Less Employees with day’s preferences + Random assignment**

**A screenshot of a computer program

AI-generated content may be incorrect.**

**A screenshot of a computer program

AI-generated content may be incorrect.** **A white background with black text

AI-generated content may be incorrect.**

**A screenshot of a computer

AI-generated content may be incorrect.**

**A screenshot of a computer

AI-generated content may be incorrect.**

**Java Employee Shifts Scheduler Program**

**Case 1: No Employees**

**A screenshot of a computer program

AI-generated content may be incorrect.**

**Case 2: Employees without any preferences**

**A screenshot of a computer program

AI-generated content may be incorrect.**

**A screenshot of a computer

AI-generated content may be incorrect.** **A white background with black text

AI-generated content may be incorrect.**

**Case 2: Employees with preferences**

**A screenshot of a computer program

AI-generated content may be incorrect.**

**A screenshot of a computer

AI-generated content may be incorrect.** **A white background with black text

AI-generated content may be incorrect.**