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Java Assignment: Explanation of Classes

This document provides an explanation of the classes implemented in a Java program. The program involves message handling and date/time management. Below is a detailed description of each class and its functionality.

# 1. Date Class

The Date class is responsible for managing and displaying date information. It includes private variables to store the day, month, and year, and methods to set and display the date.

Main Features:

* • setDate(): Allows the user to input the day, month, and year.
* • displayDate(String user): Displays the date in the format dd/mm/yyyy for a given user.

# 2. MessageData Class

The MessageData class is designed to handle messages between different users. It stores the sender, message, and message ID in arrays and provides methods to send, see, read, and delete messages.

Main Features:

* • sendMessage(int userId): Sends a message from a sender to a receiver.
* • seeMessage(int userId): Allows the user to check received messages from a specific sender.
* • readAllMessages(int userId): Reads all the messages for a specific user.
* • readSpecificMessage(int userId): Reads a specific message based on its ID.
* • deleteMessage(int userId): Deletes a message based on its ID.

# 3. MessageTest Class

The MessageTest class serves as the main class that runs the program. It interacts with the user through a menu, allowing them to send, view, read, and delete messages. The user can choose from various operations by selecting a number corresponding to a specific function.

# 4. Time Class

The Time class is responsible for managing and displaying time information. It includes private variables to store hours, minutes, and seconds, and provides methods to set and display the time.

Main Features:

* • setTime(): Allows the user to input the hours, minutes, and seconds.
* • displayTime(String user): Displays the time in the format hh:mm:ss for a given user.

# Conclusion

This program provides basic message handling functionality with date and time management. The classes are designed to handle specific tasks like managing date, time, and messages, ensuring modular and organized code.