```java
import java.time.DayOfWeek;
import java.time.LocalTime;
import java.util.EnumMap;
import java.util.Scanner;

public class ScheduleManager {
   public static class TimeInterval {
       private final LocalTime openingHour;
       private final LocalTime closingHour;

       public TimeInterval(LocalTime openingHour, LocalTime closingHour) {
           this.openingHour = openingHour;
           this.closingHour = closingHour;
       }

       public LocalTime getOpeningHour() {
           return openingHour;
       }

       public LocalTime getClosingHour() {
           return closingHour;
       }

       @Override
       public String toString() {
           return openingHour + " - " + closingHour;
       }
   }

   public enum TicketType {
       CHILD, STUDENT, ADULT, SENIOR
   }

   public static boolean isOpen(EnumMap<DayOfWeek, TimeInterval> schedule, DayOfWeek dayOfWeek,
                                LocalTime time) {
       TimeInterval interval = schedule.get(dayOfWeek);
       return time.isAfter(interval.getOpeningHour()) && time.isBefore(interval.getClosingHour());
   }

   public static double calculatePrice(LocalTime time, TicketType ticketType) {
       double basePrice = 20.0;
       if (time.isBefore(LocalTime.NOON)) {
           basePrice -= 10.0; // Morning discount
       } else if (time.isAfter(LocalTime.of(17, 0))) {
           basePrice += 10.0;
       }

       double price;
       switch (ticketType) {
           case CHILD:
               price = 0.0;
               break;
           case STUDENT:
               price = basePrice * 0.25;
               break;
           case SENIOR:
               price = basePrice * 0.50;
               break;
           default:
               price = basePrice;
               break;
       }
       return price;
   }

   // Other methods and fields
   public static void main(String[] args) {
```

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EnumMap<DayOfWeek, TimeInterval> schedule = new EnumMap<>(DayOfWeek.class);
EnumMap<DayOfWeek, Double> revenue = new EnumMap<>(DayOfWeek.class);

// Set up opening and closing hours for each day
schedule.put(DayOfWeek.MONDAY, new TimeInterval(LocalTime.of(9, 0), LocalTime.of(18, 0)));
schedule.put(DayOfWeek.TUESDAY, new TimeInterval(LocalTime.of(11, 0), LocalTime.of(19, 0)));
schedule.put(DayOfWeek.WEDNESDAY, new TimeInterval(LocalTime.of(8, 0),
                                                   LocalTime.of(17, 0)));
schedule.put(DayOfWeek.THURSDAY, new TimeInterval(LocalTime.of(9, 0), LocalTime.of(20, 0)));
schedule.put(DayOfWeek.FRIDAY, new TimeInterval(LocalTime.of(10, 0), LocalTime.of(18, 0)));

// Initialize revenue map
for (DayOfWeek day : DayOfWeek.values()) {
    revenue.put(day, 0.0);
}

Scanner scanner = new Scanner(System.in);
while (true) {
    System.out.println("Enter a command (purchase, stats, exit): ");
    String command = scanner.nextLine();

    if (command.equalsIgnoreCase("exit")) {
        break;
    } else if (command.equalsIgnoreCase("purchase")) {
        System.out.println("Enter day of week (e.g., MONDAY): ");
        DayOfWeek day = DayOfWeek.valueOf(scanner.nextLine().toUpperCase());

        System.out.println("Enter time of arrival (HH:MM): ");
        LocalTime time = LocalTime.parse(scanner.nextLine());

        System.out.println("Enter ticket type (CHILD, STUDENT, ADULT, SENIOR): ");
        TicketType ticketType = TicketType.valueOf(scanner.nextLine().toUpperCase());

        // Check if open
        if (!isOpen(schedule, day, time)) {
            System.out.println("The purchase is not valid for the chosen period.");
            continue;
        }

        // Calculate price
        double price = calculatePrice(time, ticketType);

        // Update revenue
        revenue.put(day, revenue.get(day) + price);
        System.out.println("Purchase registered: " + ticketType + " ticket for " + day +
                           " at " + time + ". Price: $" + price);
    } else if (command.equalsIgnoreCase("stats")) {
        double totalRevenue = 0.0;
        DayOfWeek highestDay = null, lowestDay = null;
        double highestSales = Double.MIN_VALUE, lowestSales = Double.MAX_VALUE;

        for (DayOfWeek day : schedule.keySet()) {
            double dailyRevenue = revenue.get(day);
            totalRevenue += dailyRevenue;

            if (dailyRevenue > highestSales) {
                highestSales = dailyRevenue;
                highestDay = day;
            }

            if (dailyRevenue < lowestSales) {
                lowestSales = dailyRevenue;
                lowestDay = day;
            }
        }
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            double averageSales = totalRevenue / schedule.keySet().size();

            System.out.println("Highest sales: " + highestDay + " ($" + highestSales + ")");
            System.out.println("Lowest sales: " + lowestDay + " ($" + lowestSales + ")");
            System.out.println("Average sales per day: $" + averageSales);
            System.out.println("Total revenue for the week: $" + totalRevenue);
        } else {
            System.out.println("Unknown command. Please try again.");
        }
    }

    scanner.close();
  }
}
```