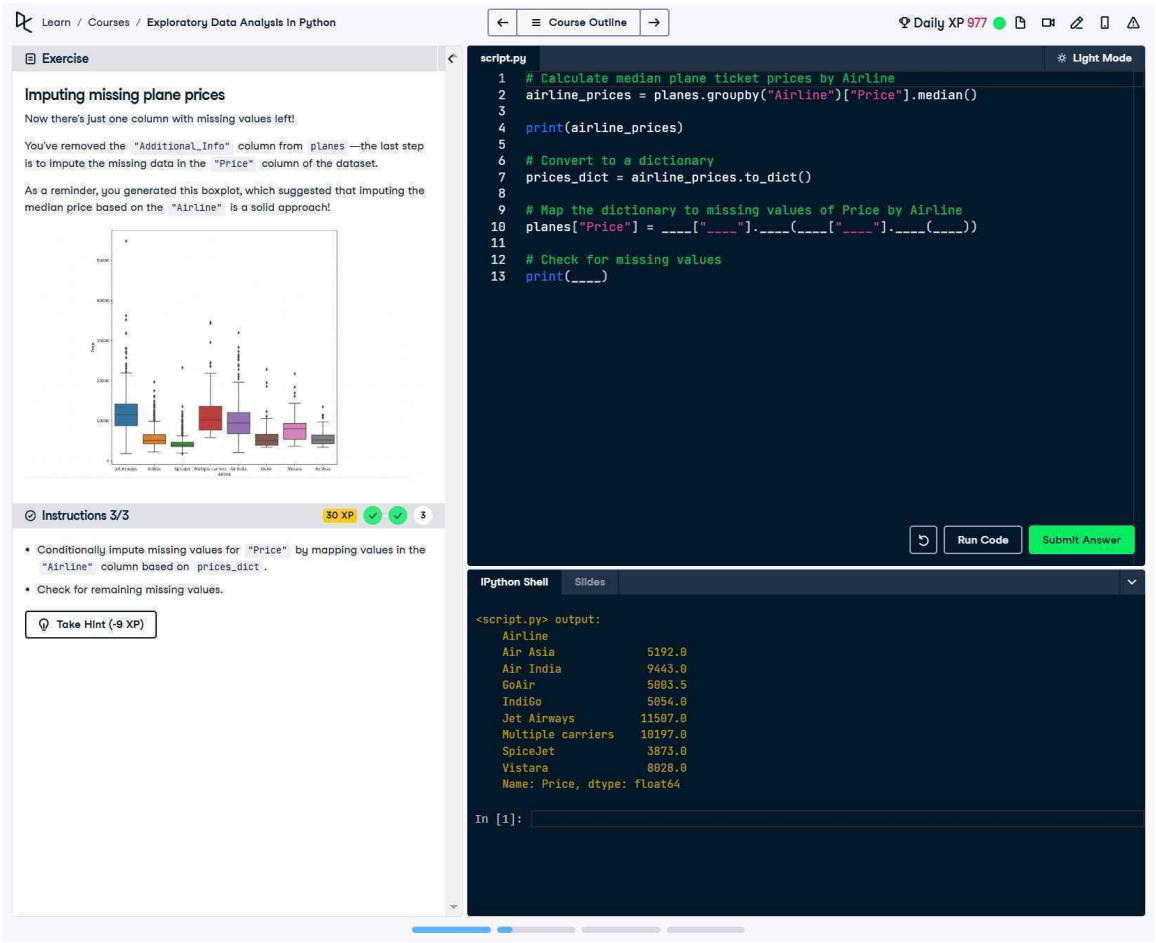
Imputing Missing Prices - Complete Solution

Question and Screenshot:



Question Explanation:

This task involves calculating the median ticket prices for each 'Airline', converting the results to a dictionary, and mapping the dictionary to the 'Price' column to impute missing values. Finally, it verifies if any missing values remain.

Code Solution:

```
# Calculate median plane ticket prices by Airline
airline_prices = planes.groupby("Airline")["Price"].median()

print(airline_prices)

# Convert to a dictionary
```

```
prices_dict = airline_prices.to_dict()

# Map the dictionary to the missing values
planes["Price"] = planes["Price"].fillna(planes["Airline"].map(prices_dict))

# Check for missing values
print(planes.isna().sum())
```

Solution Explanation:

1. The `groupby()` method groups the data by 'Airline', and the `median()` function calculates the median ticket price for each airline.
2. The resulting Series is converted into a dictionary (`prices_dict`) for easier mapping.
3. The `fillna()` method imputes missing values in the 'Price' column by mapping the `prices_dict` to the 'Airline' column.
4. The `isna().sum()` function checks if any missing values remain in the DataFrame, confirming successful imputation.