



Project-1

Exploratory Data Analysis

Analysis of Domestic Flights *Timing* in US

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Introduction

The most valuable resource is ***Time***.

So,

No time to wait even to fly!

Let's see

Airlines in US

are more punctual

by climates...



Methodology

- **Dataset : *2015 Flight Delays and Cancellations (csv)***
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New col.: IATA codes → Airline names, climates.
Counting as **on time**, **delayed&cancelled**:

-caused by only Airline or Aircraft.

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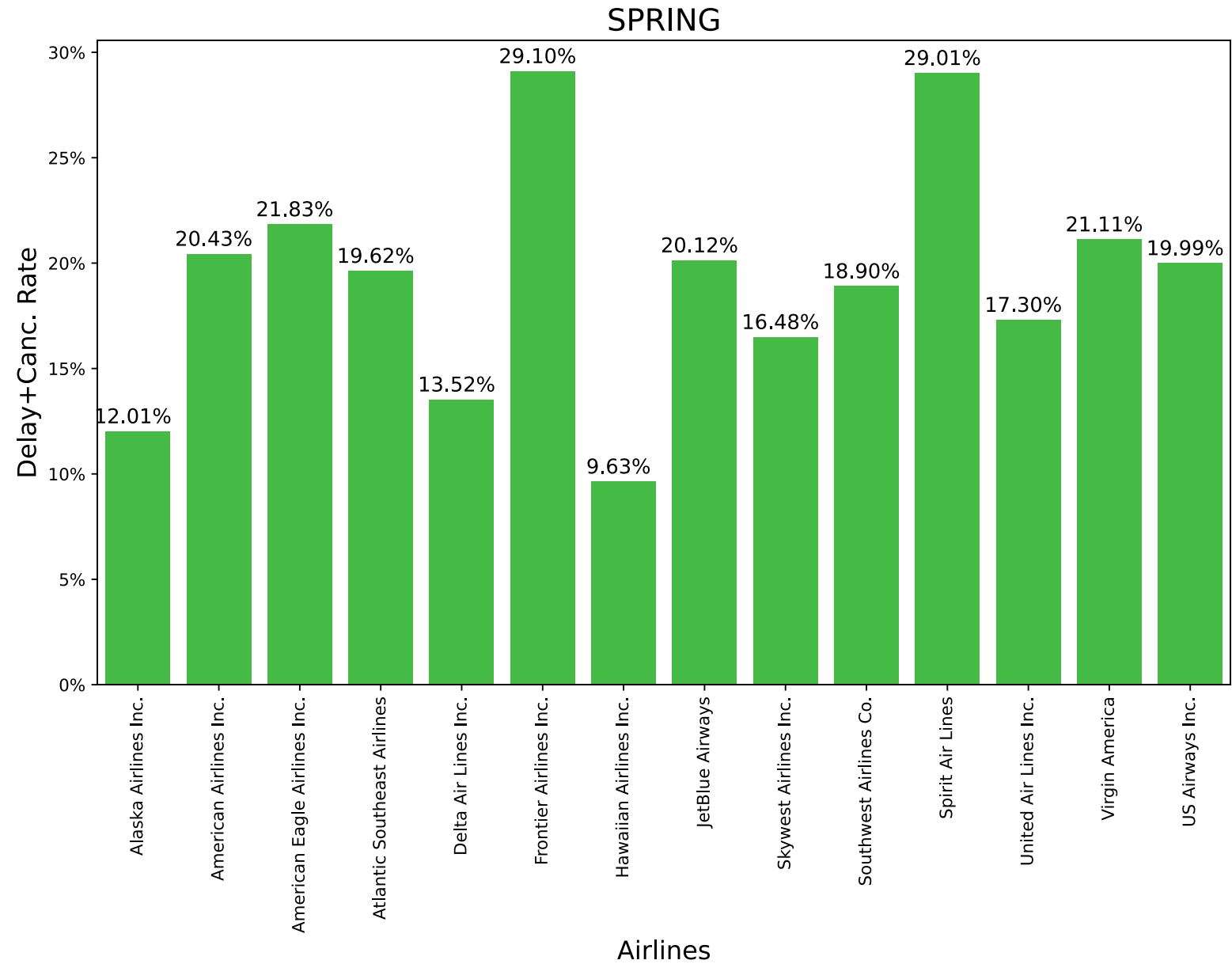
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- **Data Visualisation :**

Barchart: Airlines vs. d&c ratio by climates.

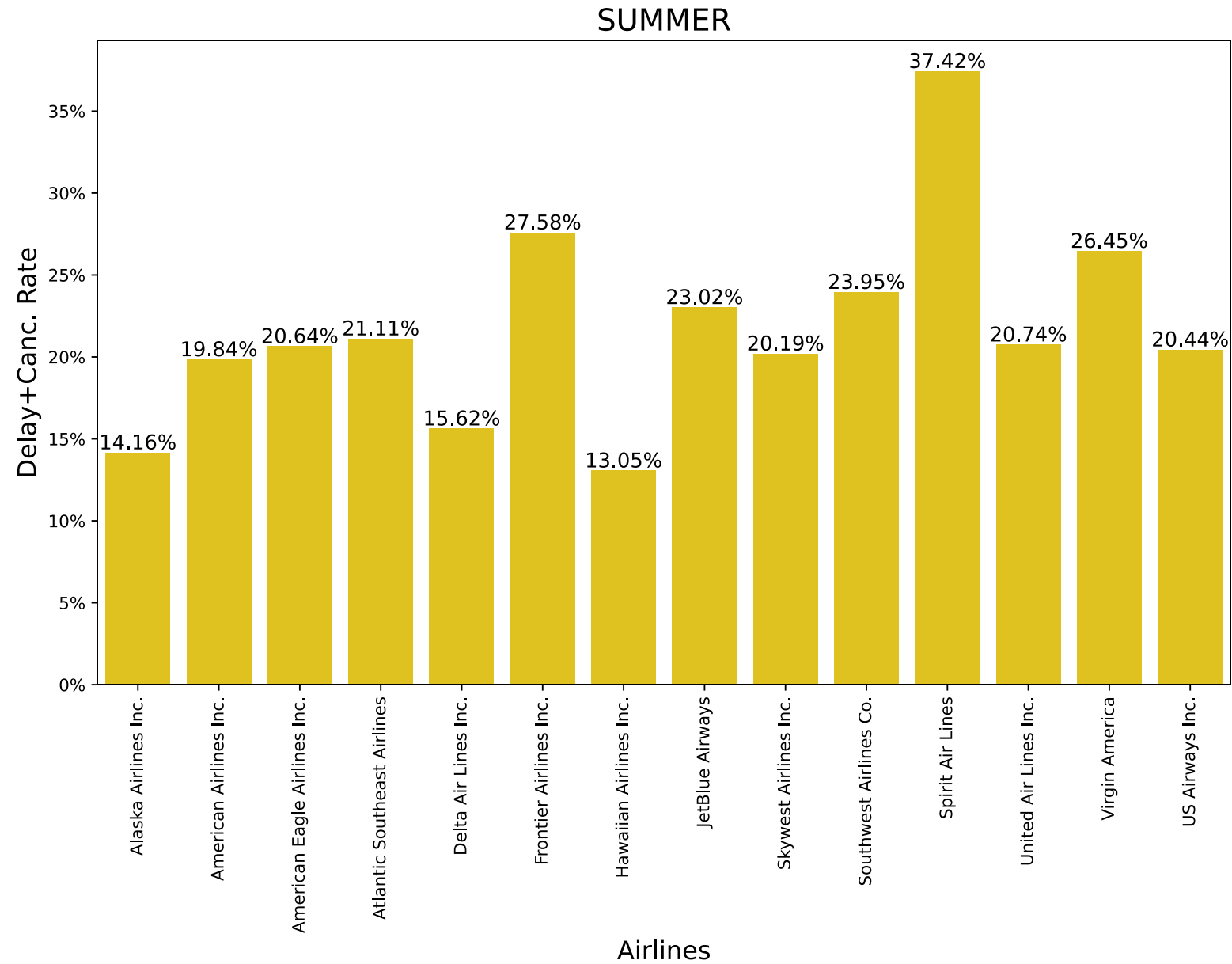


Results



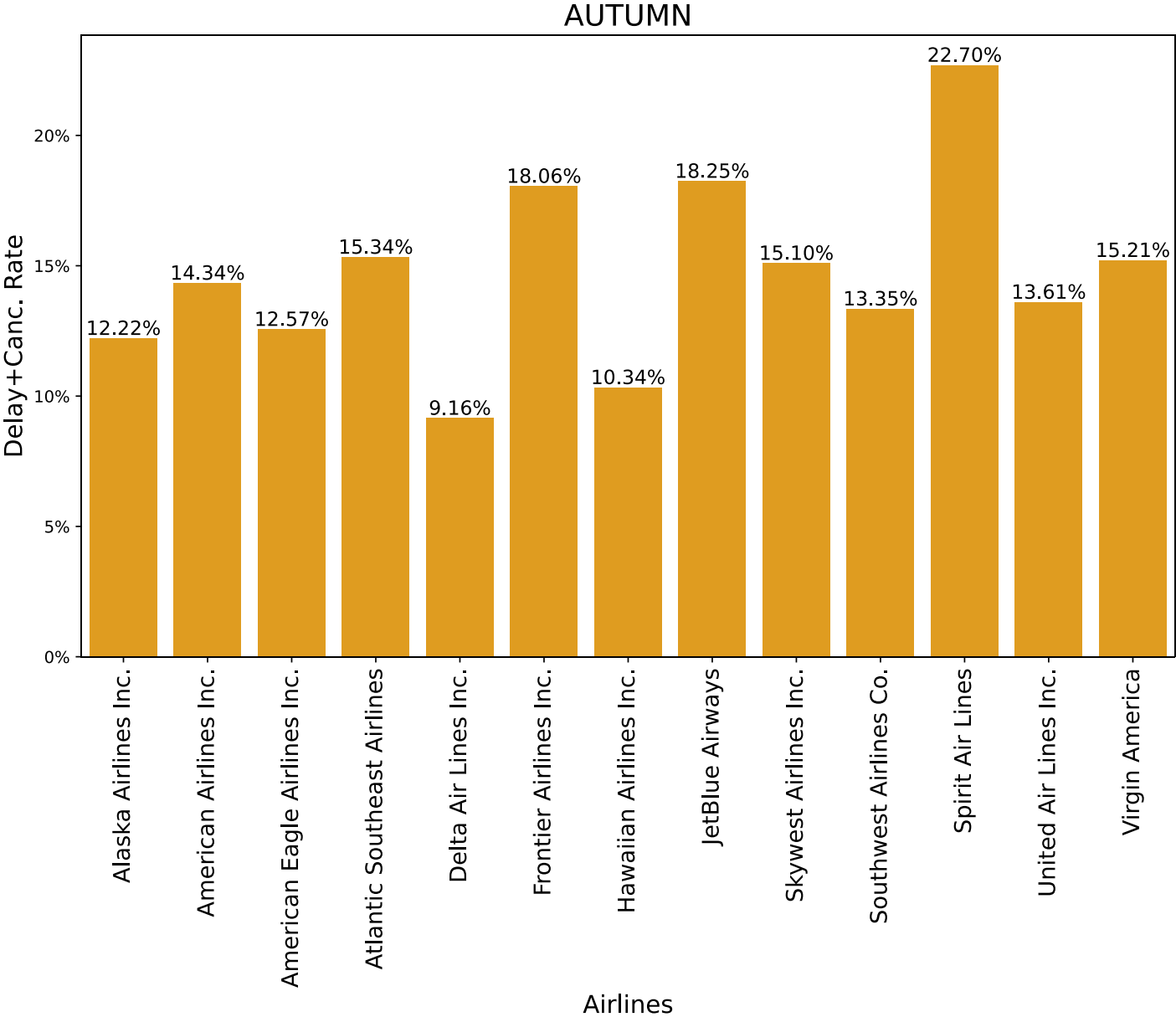
Most Punctual Airlines in Spring	
1	Hawaiian Airlines Inc.
2	Alaska Airlines Inc.
3	Delta Air Lines Inc.

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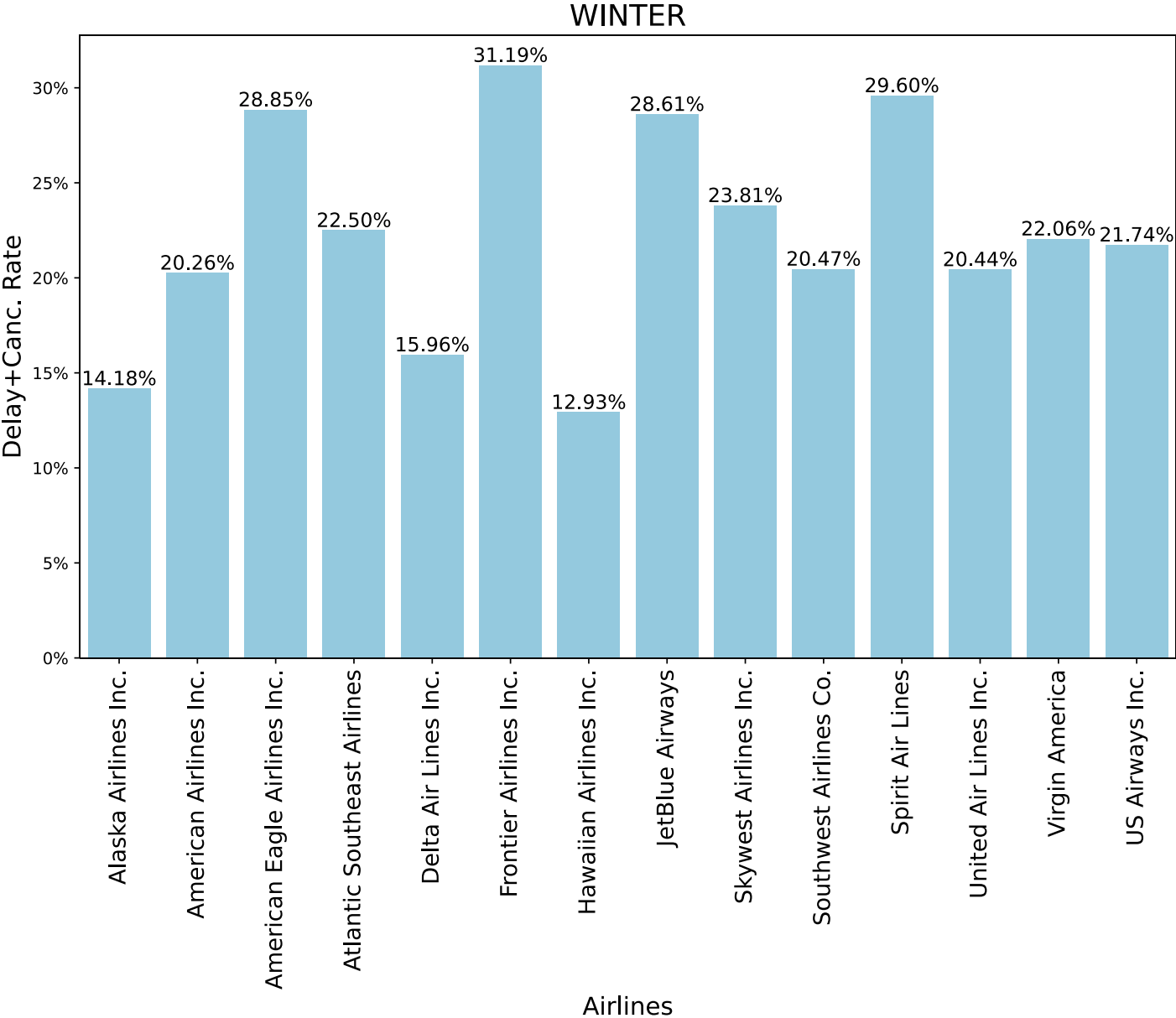
- Most Punctual Airlines
in Summer
- 1 Hawaiian Airlines Inc.
- 2 Alaska Airlines Inc.
- 3 Delta Air Lines Inc.

Results



Most Punctual Airlines in Autumn	
1	Delta Air Lines Inc.
2	Hawaiian Airlines Inc.
3	Alaska Airlines Inc.

Results



Most Punctual Airlines in Winter	
1	Hawaiian Airlines Inc.
2	Alaska Airlines Inc.
3	Delta Air Lines Inc.

Conclusions

Most Punctual Airlines # in Spring		Most Punctual Airlines # in Summer	
1	Hawaiian Airlines Inc.	1	Hawaiian Airlines Inc.
2	Alaska Airlines Inc.	2	Alaska Airlines Inc.
3	Delta Air Lines Inc.	3	Delta Air Lines Inc.

Most Punctual Airlines # in Autumn		Most Punctual Airlines # in Winter	
1	Delta Air Lines Inc.	1	Hawaiian Airlines Inc.
2	Hawaiian Airlines Inc.	2	Alaska Airlines Inc.
3	Alaska Airlines Inc.	3	Delta Air Lines Inc.

Most Punctual Airlines # Total	
1	Hawaiian Airlines Inc.
2	Alaska Airlines Inc.
3	Delta Air Lines Inc.

Future Works

❑ More detailed analysis of delays&cancellation separately by;

- Delay minutes of Airlines,
- Airports delays caused by air traffic,
- Weather factor of flight delay or cancellation by months,

❑ Recommendation app. with more data of next years;

- to most appropriate flight time, day, airline, airport.

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Thank You!