CS210 - Term Project

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Instagram user habit anlysis

Why?

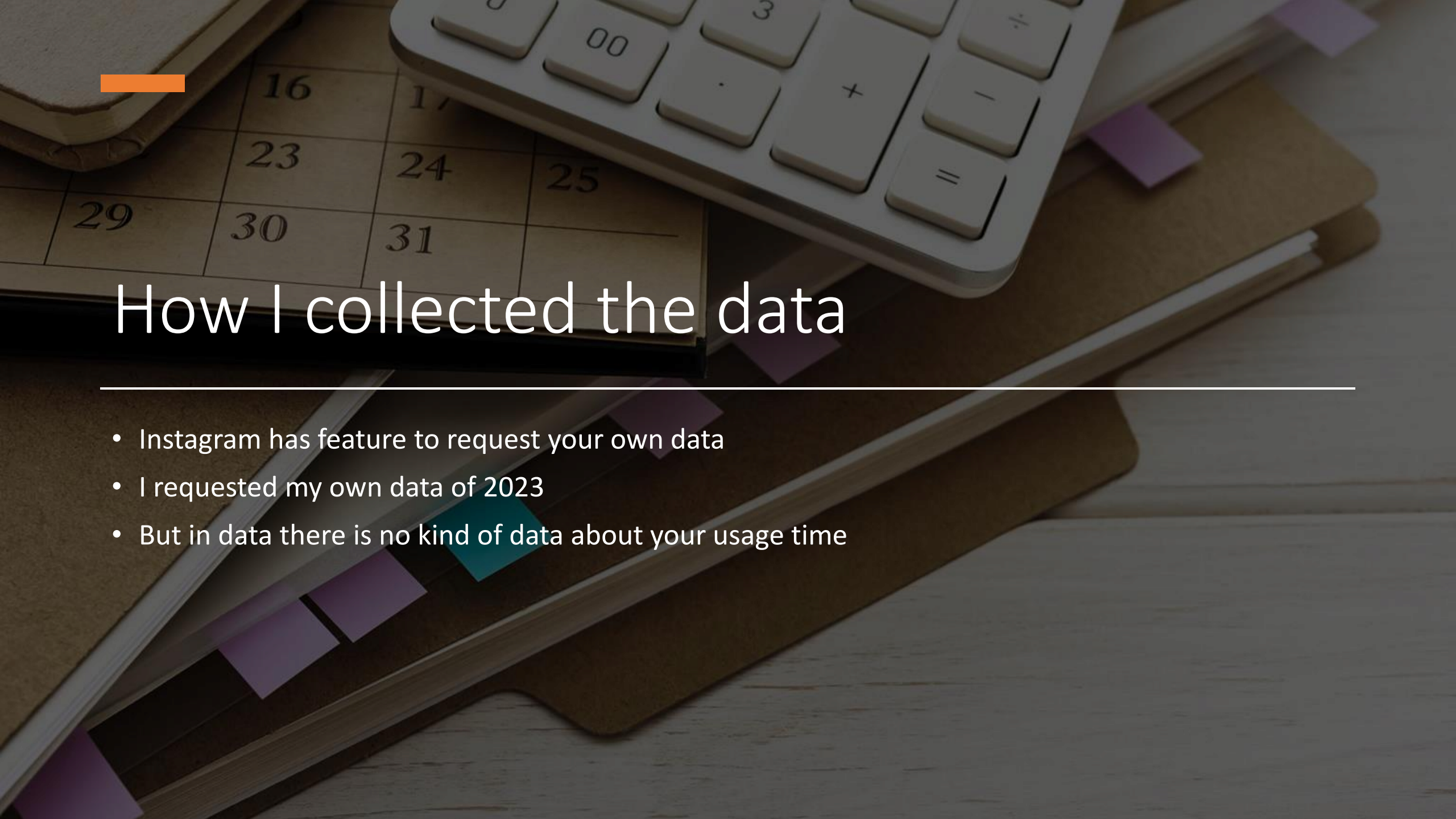
INCREASED USAGE IN SUMMER ENDED IN DELETİON OF APP FROM MOBILE PHONE

CURIOSITY TO GET INFORMATION ABOUT EFFECTS

Expectancy

Change on distrubiton of messages in daytime

Decrease in usage time



How I collected the data

- Instagram has feature to request your own data
- I requested my own data of 2023
- But in data there is no kind of data about your usage time

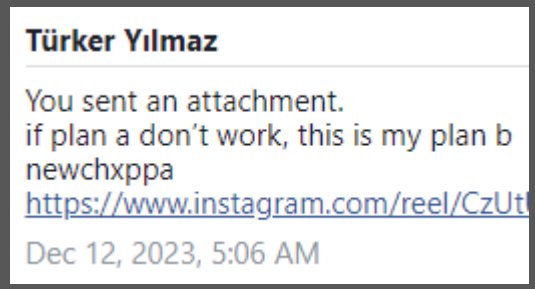
Needed to analyse my user habit and find a way to calculate usage time.

I watch reels

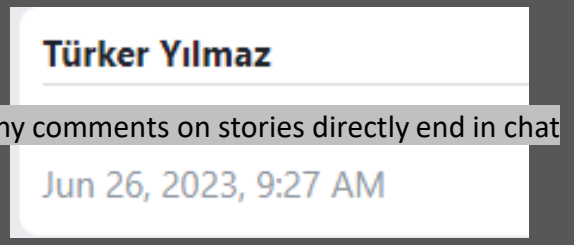
I do not look stories

Chat with my friends and react to videos they sent me

- If I watch reels, I share it with my friends



- If I look stories, I only look my close friends and react them



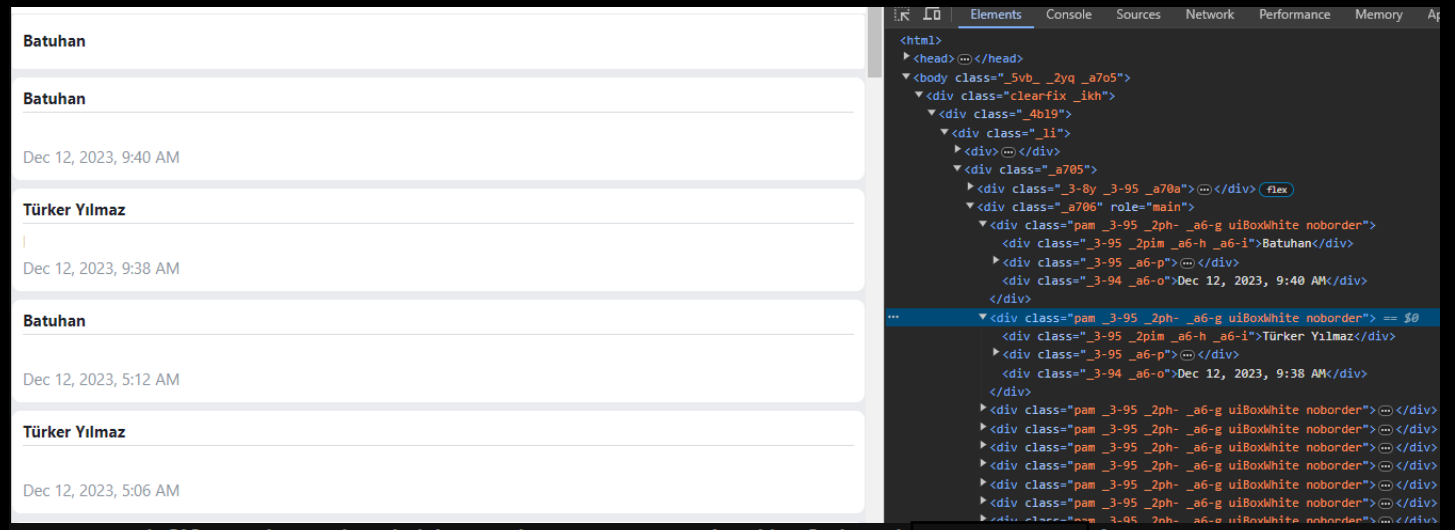
- If I get messages, I reply or text back

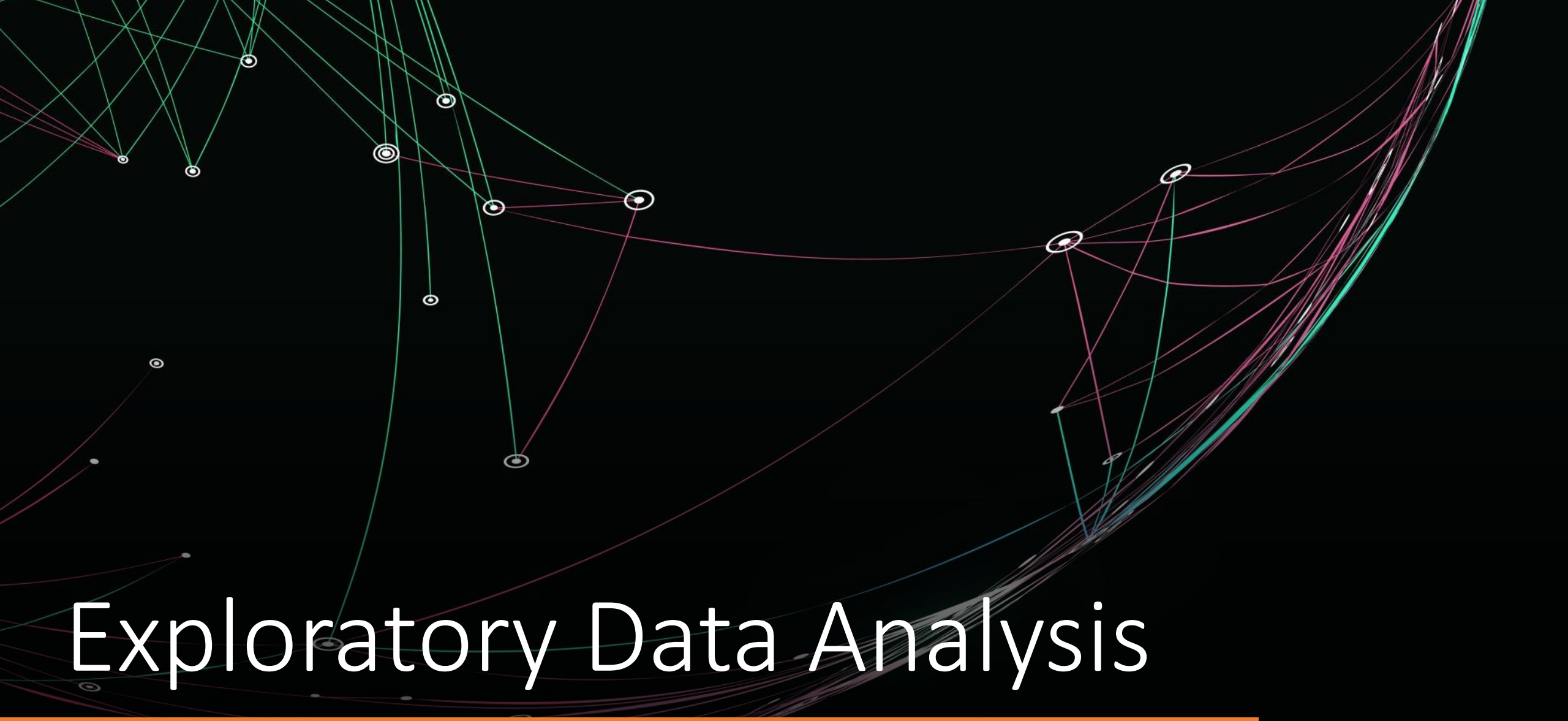
- I do not like any content
- I do not post anything

As a result all of my activities can be tracked using chat logs


Web scraping

- Instagram provide static htmls for chat logs
- As only logs by me shows my usage, I only scraped my data and for privacy I did not scrape any content of any message

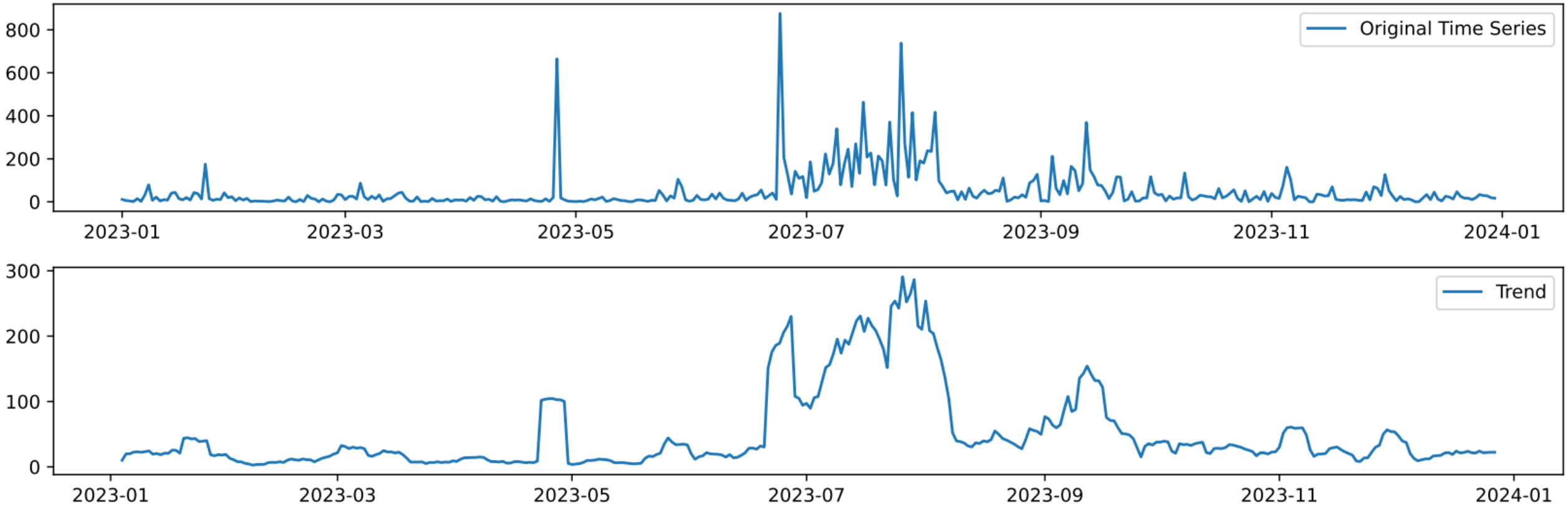


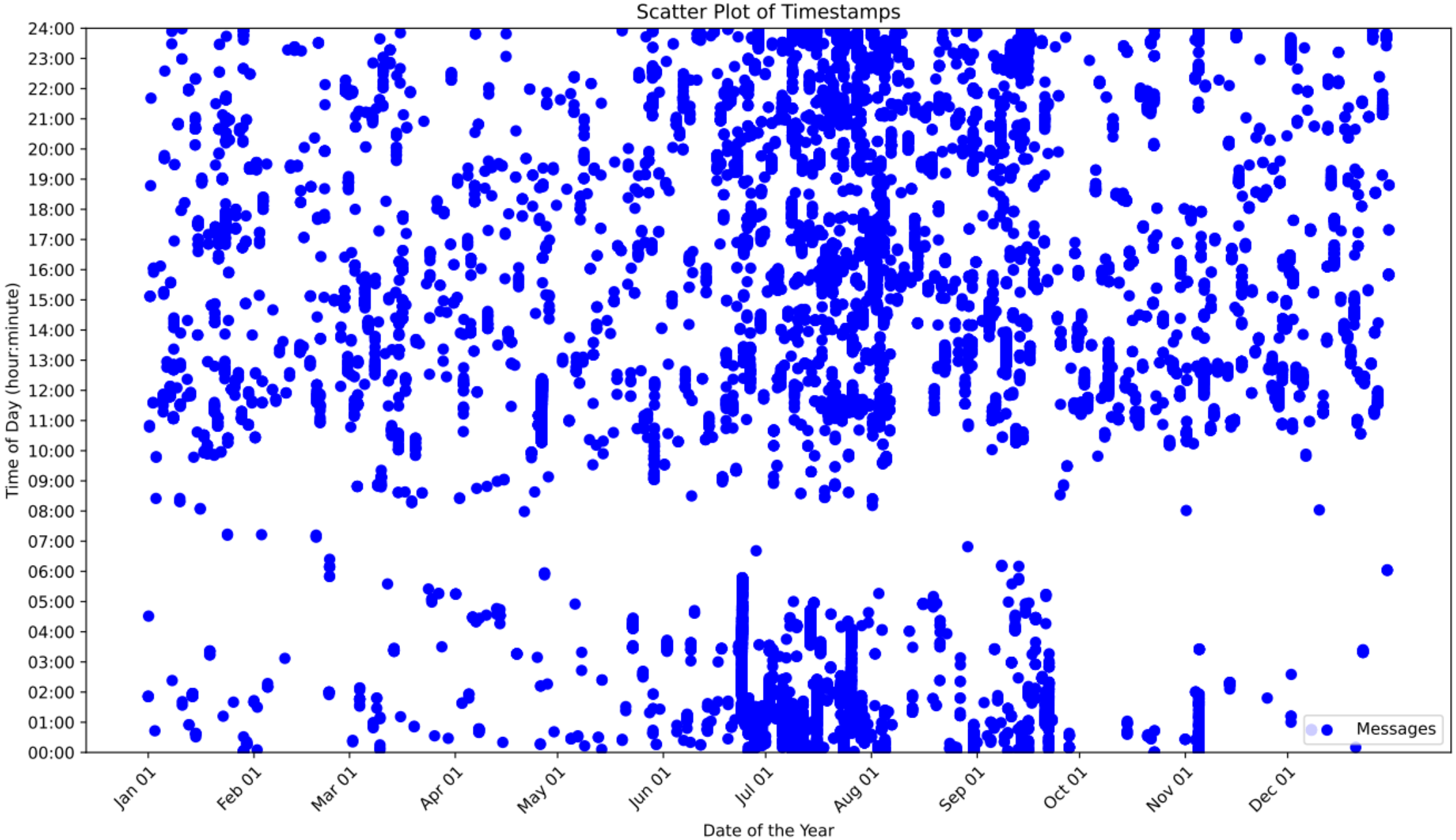


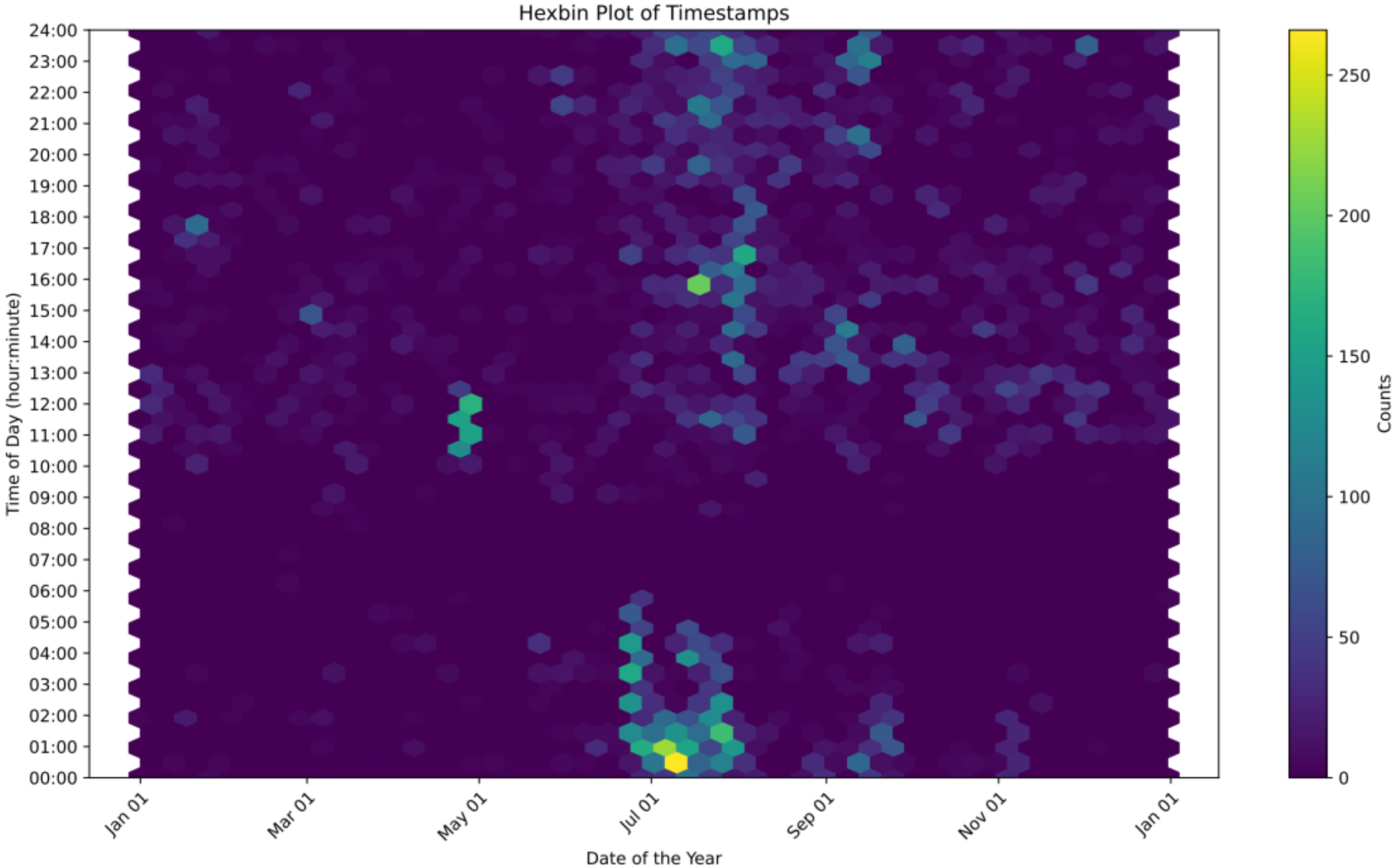
Exploratory Data Analysis

Exploring data and creating graphs

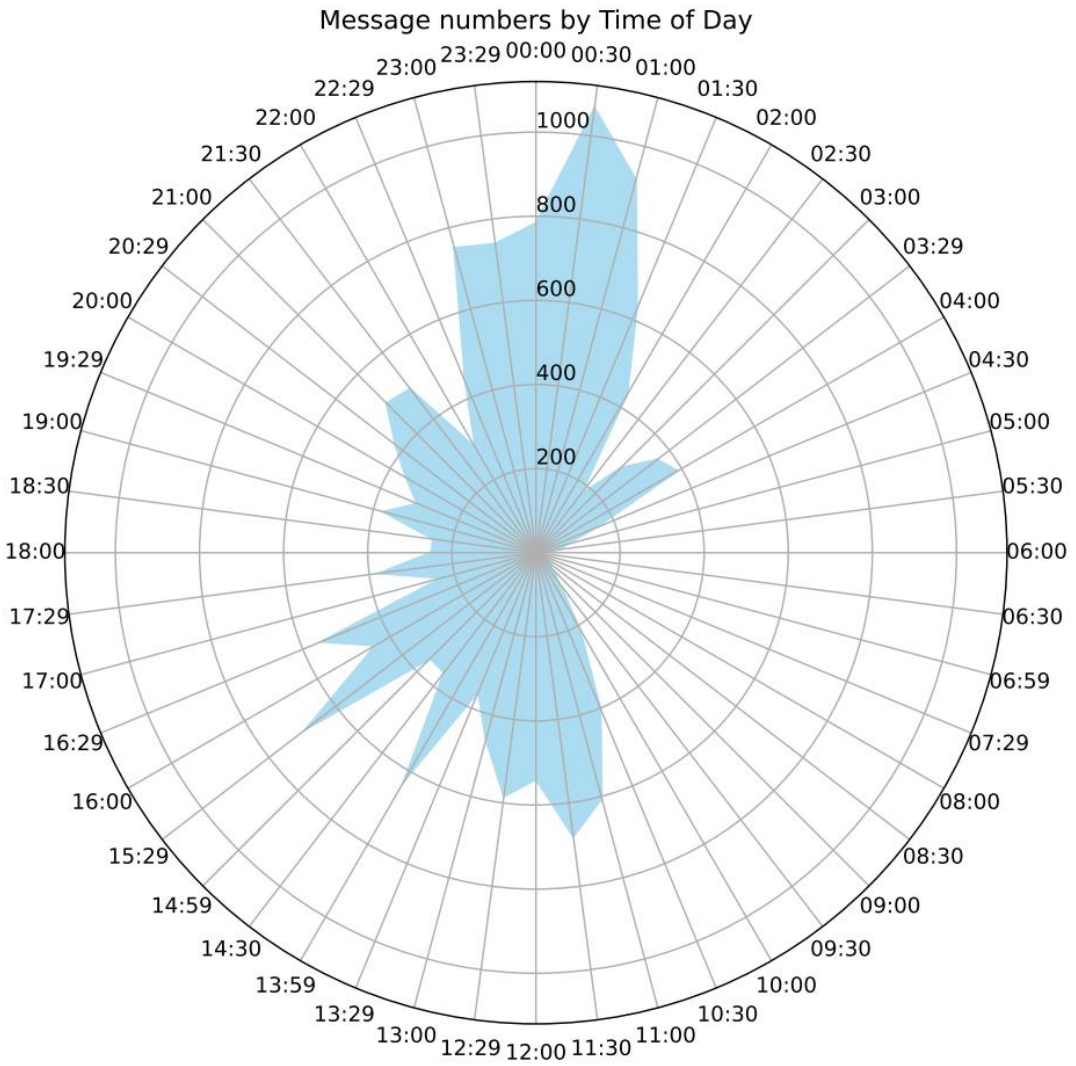
Seasonal Decompositon

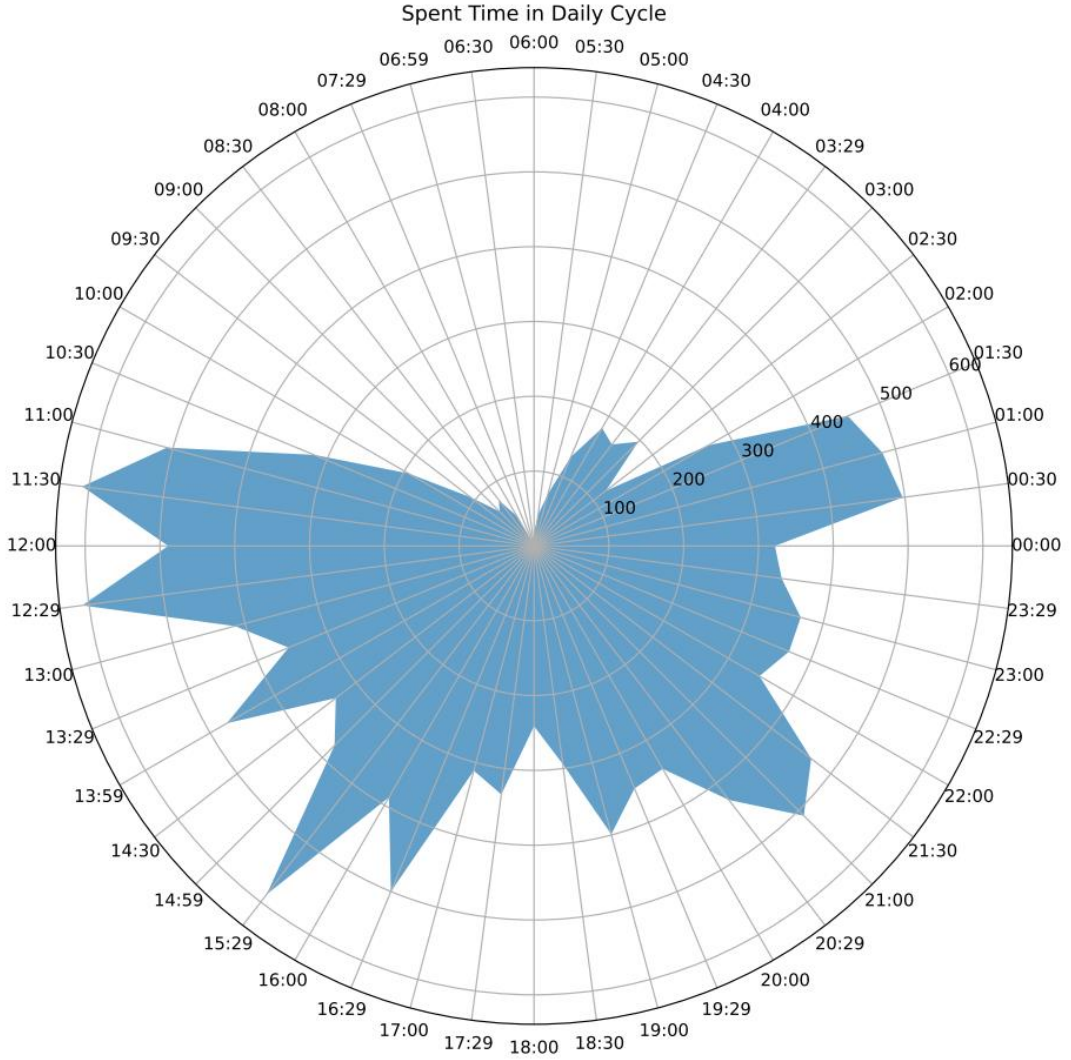



Scatter Plot of Timestamps
Time of Day (hour:minute)
24:00
23:00
22:00
21:00
20:00
19:00
18:00
17:00
16:00
15:00
14:00
13:00
12:00
11:00
10:00
09:00
08:00
07:00
06:00
05:00
04:00
03:00
02:00
01:00
00:00
Jan 01
Feb 01
Mar 01
Apr 01
May 01
Jun 01
Jul 01
Aug 01
Sep 01
Oct 01
Nov 01
Dec 01
Date of the Year
Messages

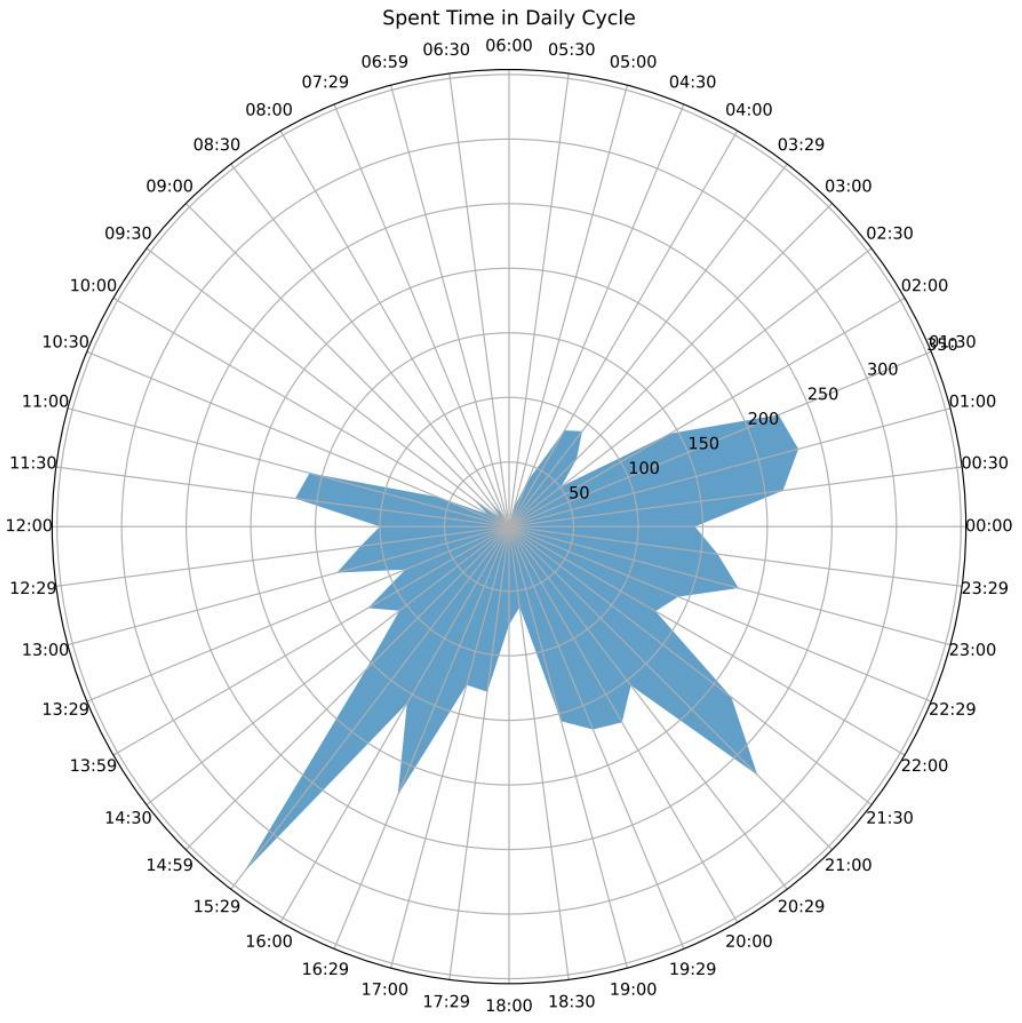

Hexbin Plot of Timestamps
Time of Day (hour:minute)
24:00
23:00
22:00
21:00
20:00
19:00
18:00
17:00
16:00
15:00
14:00
13:00
12:00
11:00
10:00
09:00
08:00
07:00
06:00
05:00
04:00
03:00
02:00
01:00
00:00
Jan 01
Mar 01
May 01
Jul 01
Sep 01
Nov 01
Jan 01
Date of the Year
Counts
250
200
150
100
50
0

Message count and time spent distribution of year

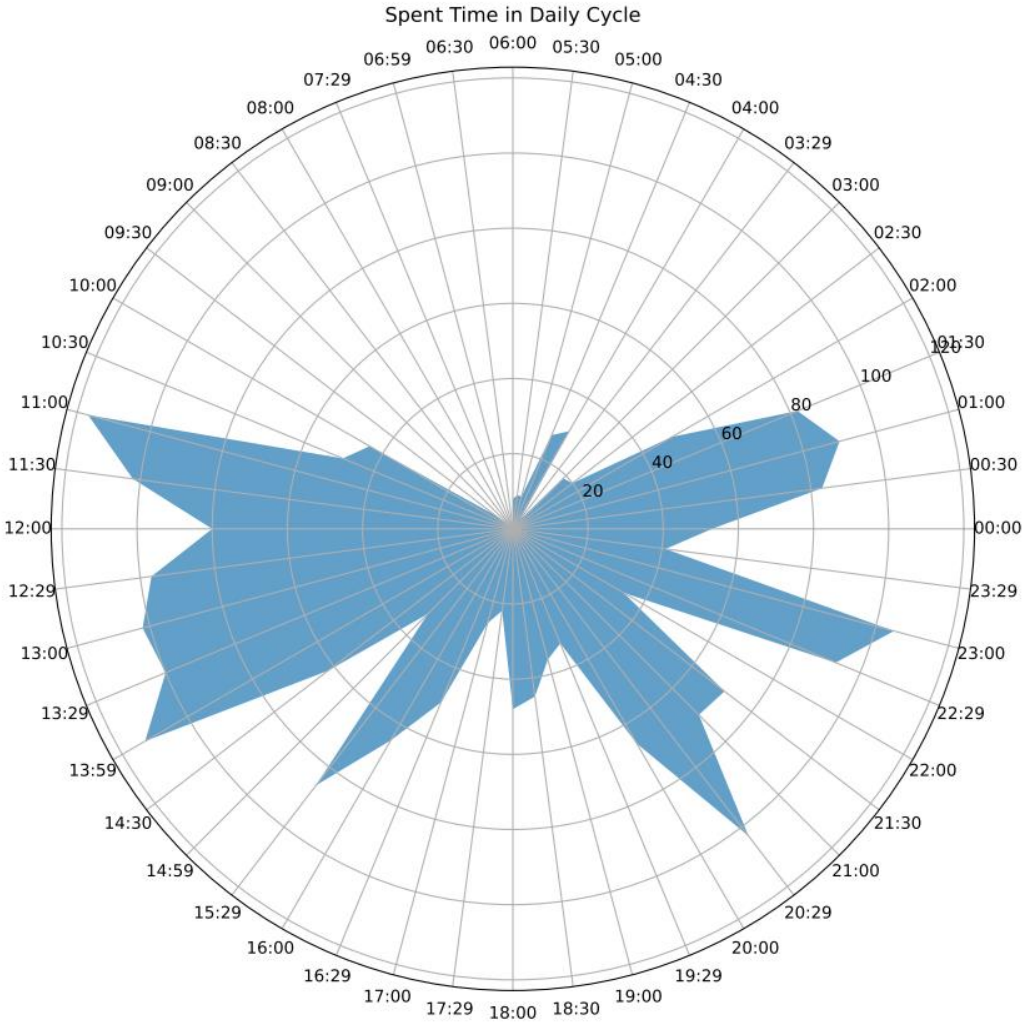




Before – After app deletion



July-August



September-October

Further suggestions:

Message density between can be observed

Received messages can be scraped

Longer time anlysis can show deeper insights and long term pattern (seasonal, school related)