Week 9 Homework

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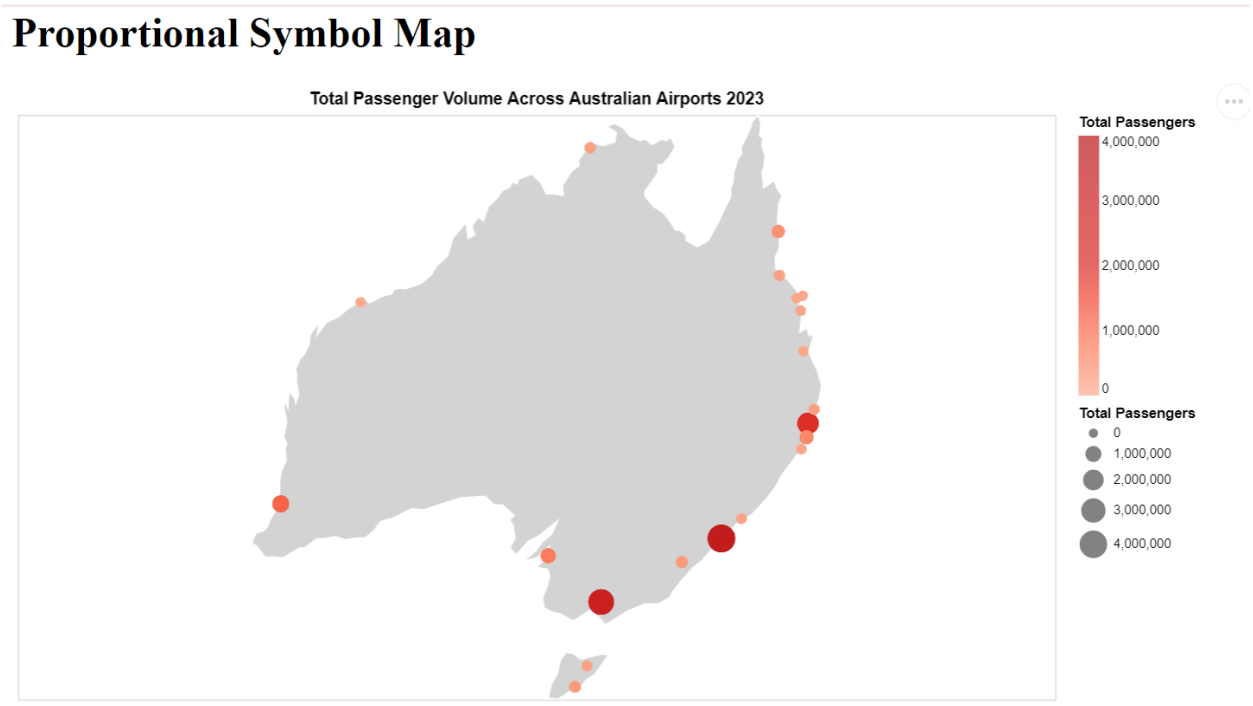
Github url: https://github.com/aidanchuayh/week9homework/blob/main/week9homework.html

Visualization url: http://127.0.0.1:5500/week9homework.html



- **Domain.**

Air travel transportation.

- **The visualized dataset.**

Attribute types.

```
> str(df_clean)
'data.frame':   1180 obs. of  15 variables:
 $ AIRPORT      : chr  "ADELAIDE" "ADELAIDE" "ADELAIDE" "ADELAIDE" ...
 $ X_id         : int  409 410 411 412 413 414 415 416 417 418 ...
 $ Year         : int  2019 2019 2019 2019 2019 2019 2019 2019 2019 2019 ...
 $ Month        : int  1 2 3 4 5 6 7 8 9 10 ...
 $ Dom_Pax_In   : int  293965 278620 314477 315393 294271 279068 321154 310165 308230 345636 ...
 $ Dom_Pax_Out  : int  298986 272735 318070 315365 296479 275957 325056 307344 308039 343411 ...
 $ Dom_Pax_Total: int  592951 551355 632547 630758 590750 555025 646210 617509 616269 689047 ...
 $ Int_Pax_In   : int  58221 44990 38857 40996 38454 40583 55934 49885 53080 55867 ...
 $ Int_Pax_Out  : int  49255 35260 39981 46294 43024 47455 49299 49320 51858 43338 ...
 $ Int_Pax_Total: int  107476 80250 78838 87290 81478 88038 105233 99205 104938 99205 ...
 $ Pax_In       : int  352186 323610 353334 356389 332725 319651 377088 360050 361310 401503 ...
 $ Pax_Out      : int  348241 307995 358051 361659 339503 323412 374355 356664 359897 386749 ...
 $ Pax_Total    : num  700427 631605 711385 718048 672228 ...
 $ Latitude     : num  -34.9 -34.9 -34.9 -34.9 -34.9 ...
 $ Longitude    : num  139 139 139 139 139 ...
```

Sources and author:

Link: https://www.data.gov.au/data/dataset/airport-traffic-data/resource/38bdc971-cb22-4894-b19a-814afc4e8164

Public dataset released by the Australian Government under the Department of Infrastructure, Transport, Regional Development and Communications.

- **Data Transformation.**

  None.

- **Justification of Map Idiom.**

  I used a proportional map symbol because it effectively visualizes the total amount of visitors per Airport by using both the size channel and the area mark. This leads to a clear and interpretable visualization as it leaves no room for error as usually darker colors and larger areas are associated with higher values.

  I didn't pick a choropleth map as it isn't used for point locations, they are instead better at representing data associated with areas. I also didn't pick a dot map as the size channel won't be utilized making the visualization harder to read.