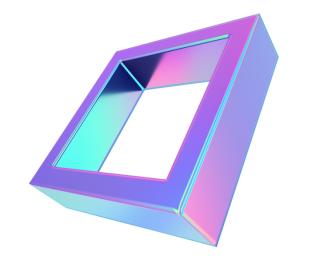
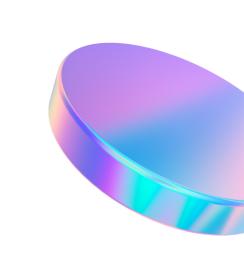
# EXPLORATION DE DONNÉES

Team: Vincent Parra, Anthony Michel, Antoine Ducoudré, Vitaly Skvortsov

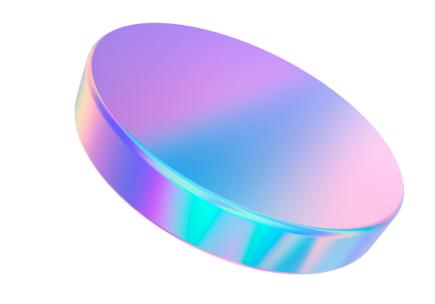


### La problématique :

Est-ce que les types de restaurants des pays d'Europe influent-ils sur l'IMC ?

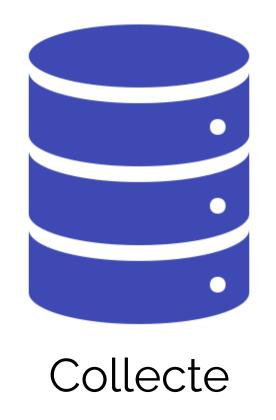


### Les bibliothèques utilisées



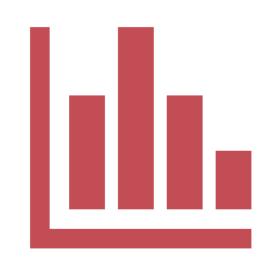
```
warnings
DYCOUNTY
 DLO
matplotlib
```

### Sommaire









Strucutration



#### **Datasets**



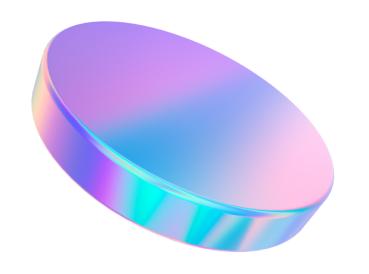
#### **TripAdvisor European restaurants**

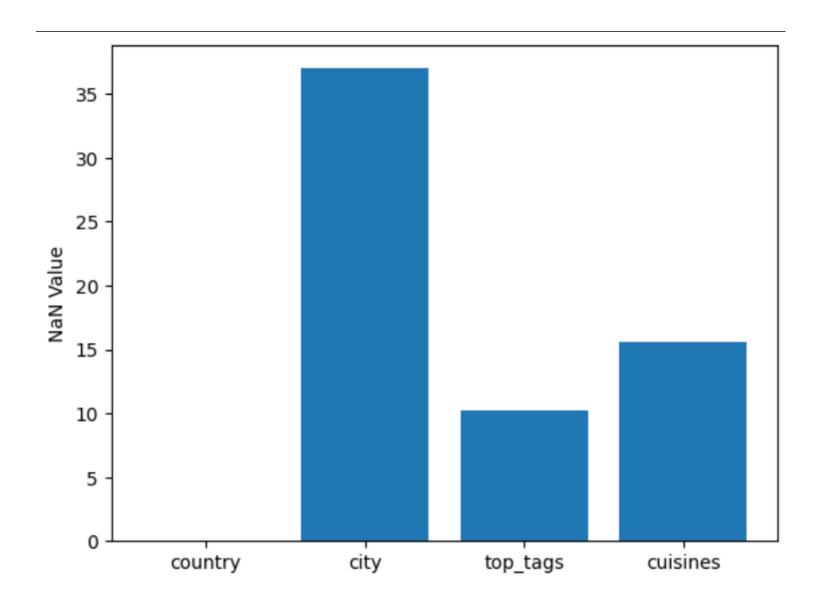
1M+ restaurants scraped from TripAdvisor

## ripady



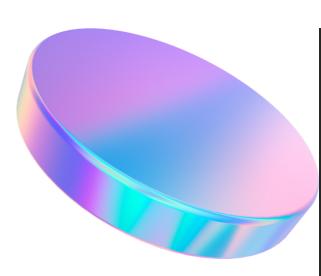
### Nettoyage





Les erreurs présentent





#### United Kingdom 21833 France 8654 7215 Italy Spain 5829 Germany 4217 Greece 1574 Netherlands 1081 Belgium 965 Portugal 913 Ireland 888 Poland 842 Sweden 756 Czechia 660 Austria 484 Denmark 473 Finland 465 Croatia 436 Hungary 428 Romania 386 Bulgaria 196 Slovakia 184 Name: country, dtype: int64

### Nettoyage

Nombre de fast-food présent dans chaque pays





	country	city	top_tags	cuisines	code	occurence
11	France	Rocbaron	Cheap Eats, French, Fast food	French, Fast food	FRA	8654
68	France	Espaly-Saint-Marcel	Mid-range, Pizza, Fast food	Pizza, Fast food	FRA	8654
101	France	Conflans Sainte Honorine	French, Fast food, Street Food	French, Fast food, Street Food	FRA	8654
126	France	Conflans Sainte Honorine	Cheap Eats, Fast food	Fast food	FRA	8654
135	France	Conflans Sainte Honorine	Cheap Eats, Fast food, Turkish	Turkish, Fast food	FRA	8654
1083279	Romania	NaN	Cheap Eats, Italian, Fast food, European	Italian, Fast food, European, Romanian	ROU	386
1083289	Romania	NaN	Mid-range, Pizza, Fast food, European	Pizza, Fast food, European, Pub, Gastropub, Ro	ROU	386
1083294	Romania	Beclean	Pizza, Fast food, European, Romanian	Pizza, Fast food, European, Romanian	ROU	386
1083379	Romania	Rasnov	Cheap Eats, Fast food	Fast food	ROU	386
1083389	Romania	Rasnov	Mid-range, Fast food, European	Fast food, European	ROU	386

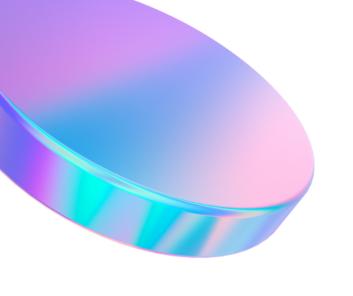


### IMC de tous les pays européens

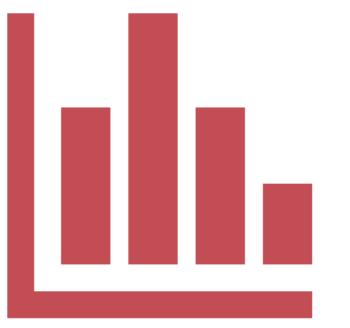
Men Women

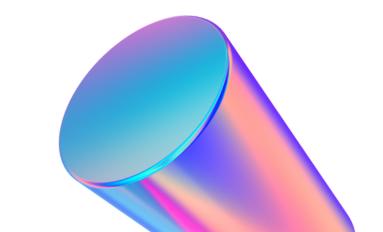
	Country	Sex	Mean BMI
461	Austria	Men	26.672887
755	Belgium	Men	26.801340
1175	Bulgaria	Men	27.322269
1931	Croatia	Men	28.197628
2099	Denmark	Men	26.278623
2645	Finland	Men	26.545815
2687	France	Men	26.072347
2897	Germany	Men	27.484492
2981	Greece	Men	27.656249
3359	Hungary	Men	28.395202
3611	Ireland	Men	28.094501
5291	Netherlands	Men	26.142758
6005	Poland	Men	27.639550
6047	Portugal	Men	26.272388
6173	Romania	Men	27.327767
6761	Slovakia	Men	27.549006
7013	Spain	Men	27.162678
7223	Sweden	Men	26.864051
8021	United Kingdom	Men	27.475058

8861	Austria	Women	24.749240
9155	Belgium	Women	25.749714
9575	Bulgaria	Women	25.930155
10331	Croatia	Women	27.033334
10499	Denmark	Women	24.557699
11045	Finland	Women	25.681182
11087	France	Women	24.312289
11297	Germany	Women	26.009947
11381	Greece	Women	26.915742
11759	Hungary	Women	26.654304
12011	Ireland	Women	27.203440
13691	Netherlands	Women	25.255831
14405	Poland	Women	26.150037
14447	Portugal	Women	25.301960
14573	Romania	Women	27.027511
15161	Slovakia	Women	25.725901
15413	Spain	Women	24.929999
15623	Sweden	Women	25.459960
16421	United Kingdom	Women	27.151905

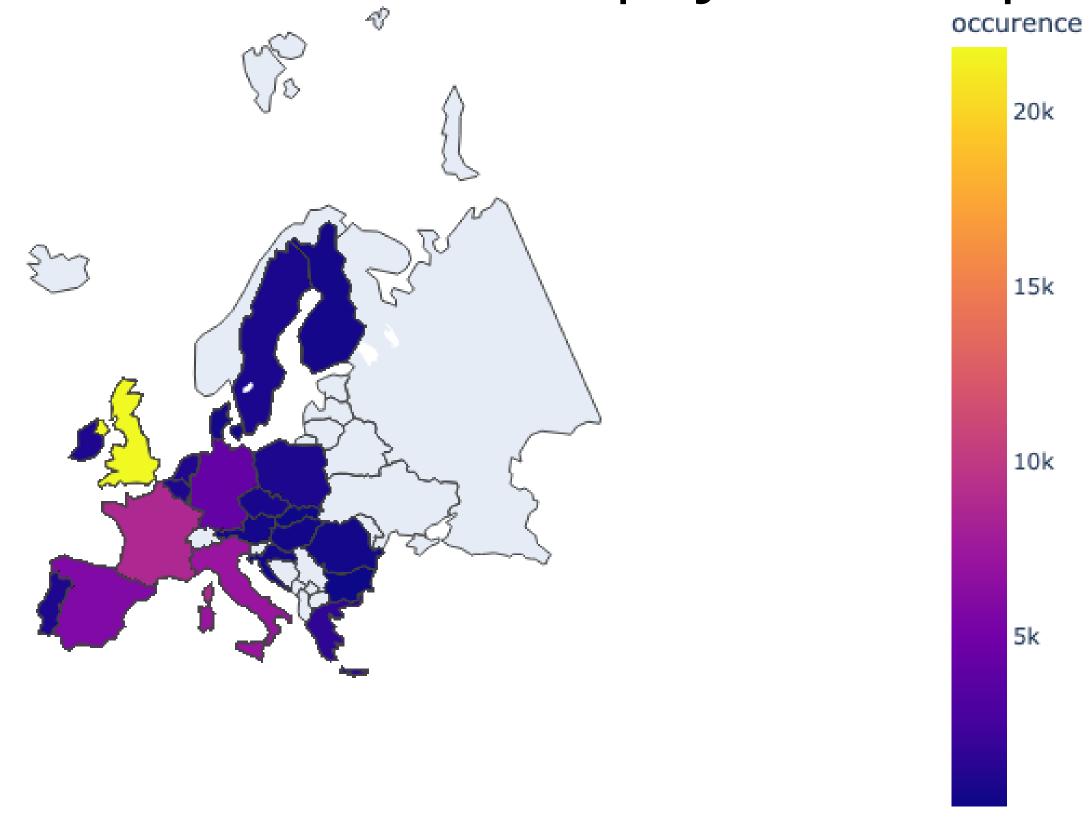


### Structuration

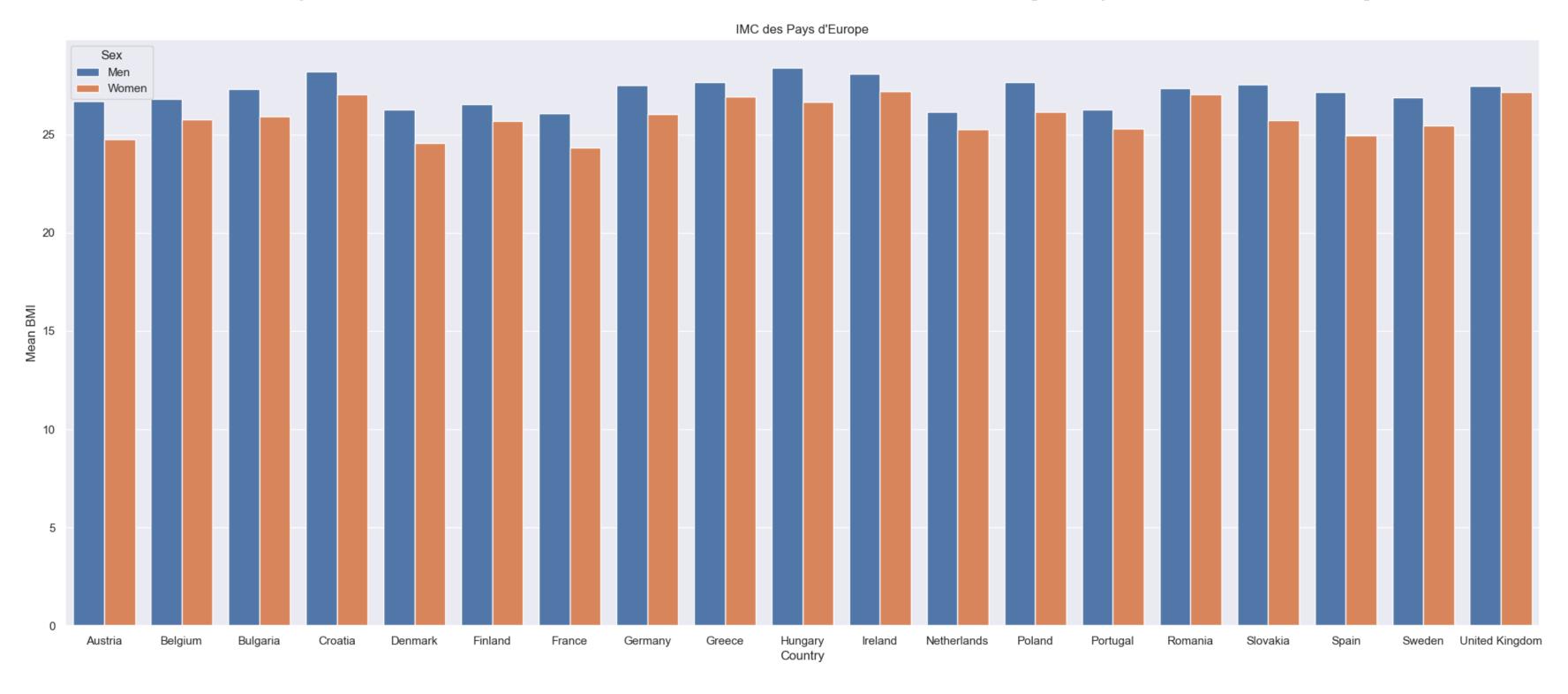




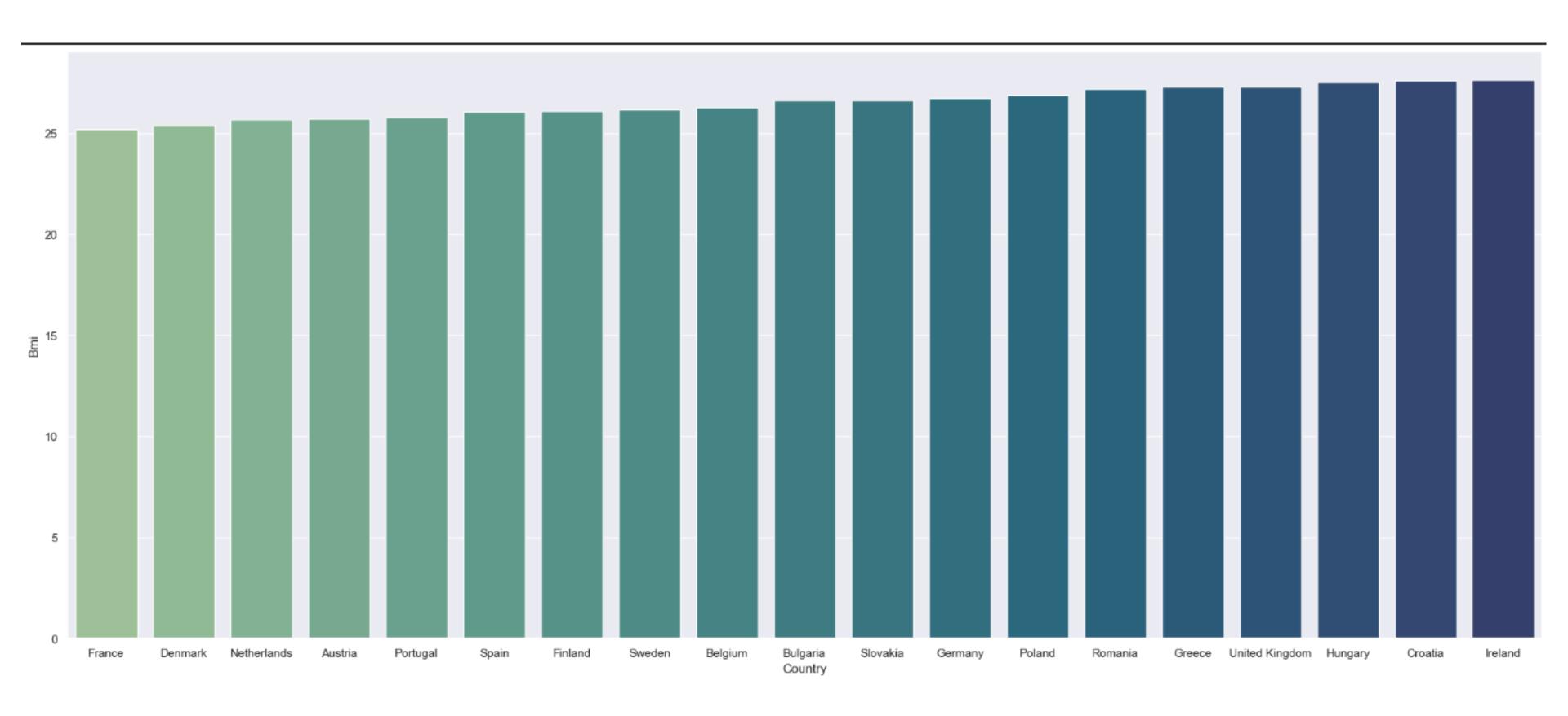
### Nombre de Fast-food dans les pays D'europe

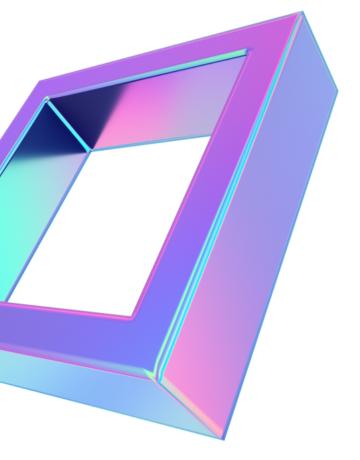


### la moyenne de BMI de tous les pays d'Europe



### la moyenne de BMI de tous les pays d'Europe



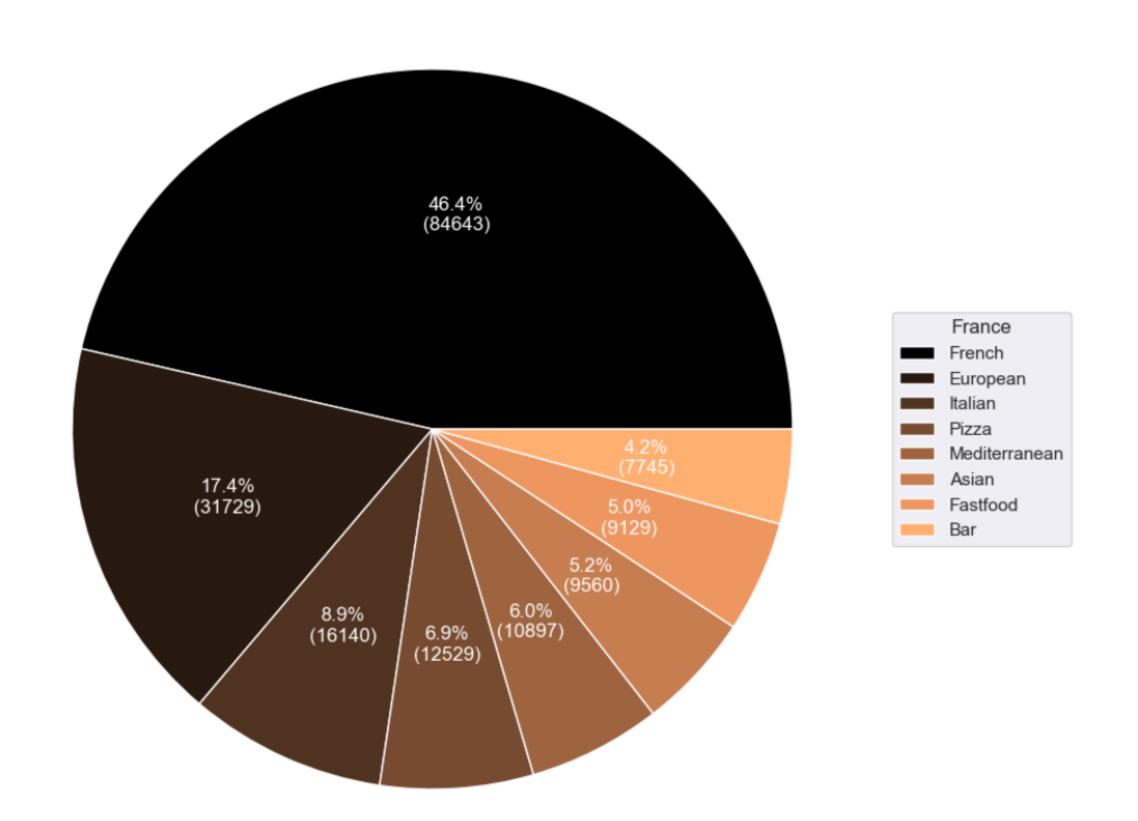


### Les cuisines les plus populaires

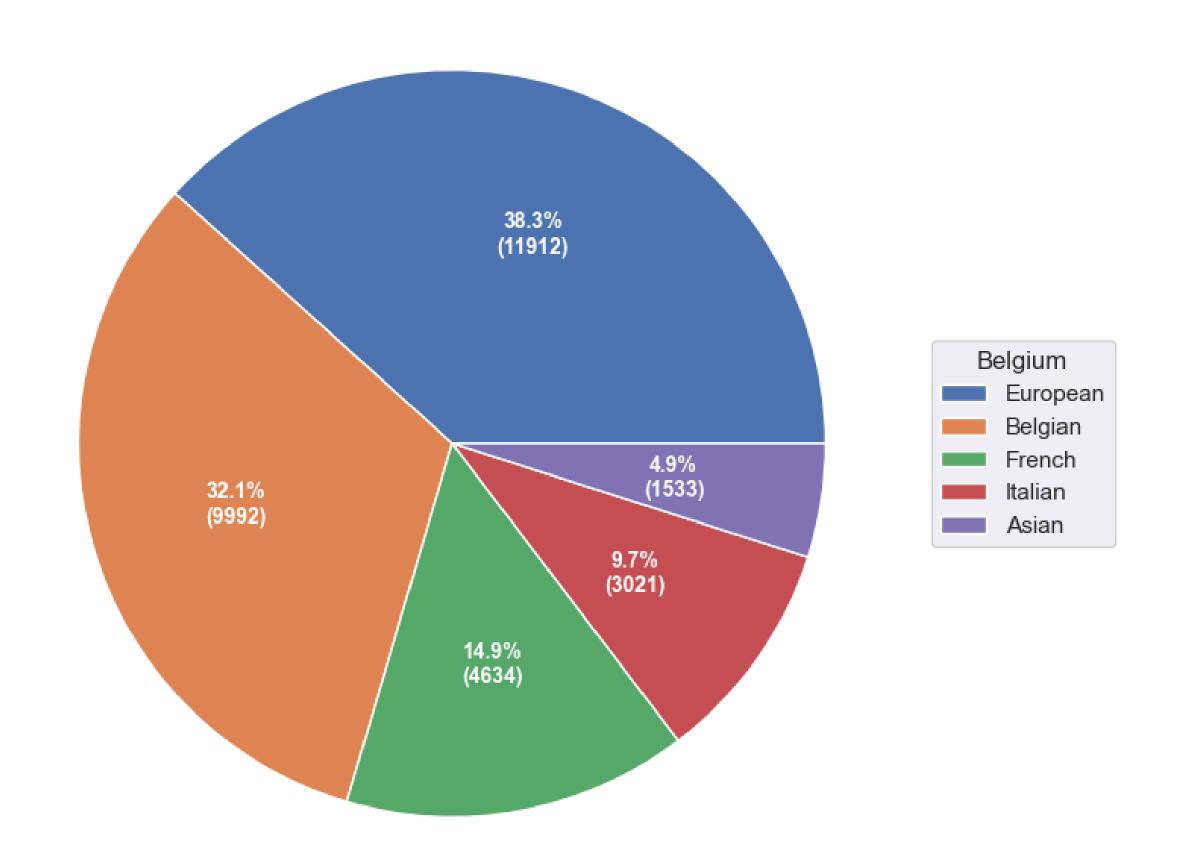


#### France



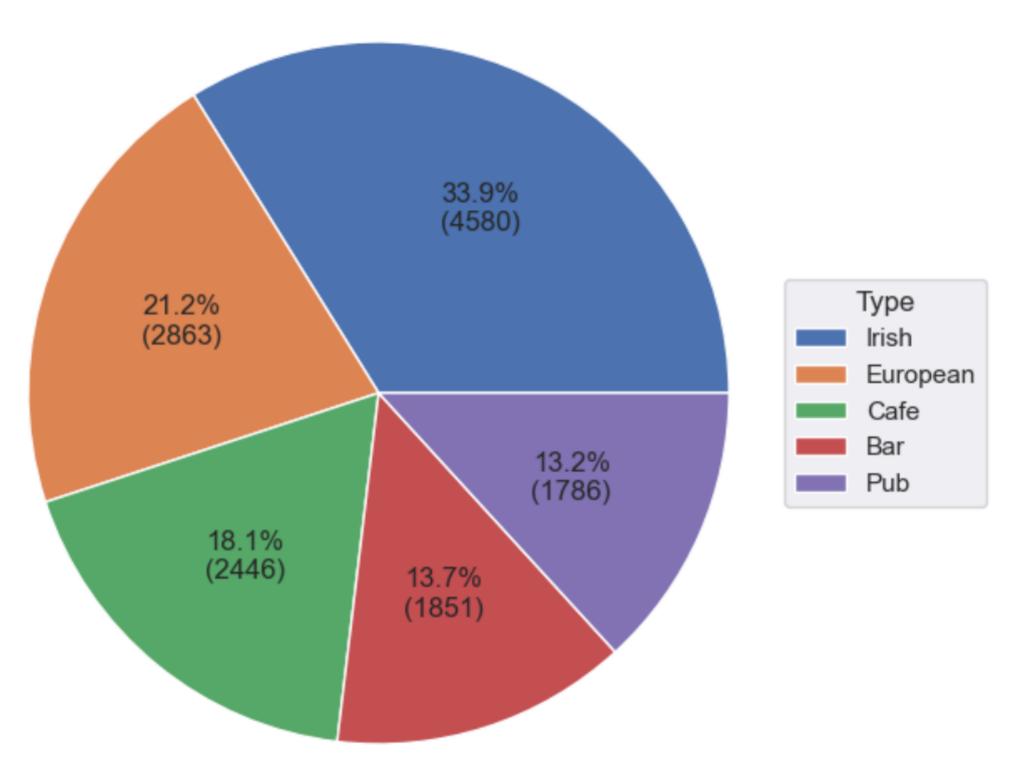


### Belgique



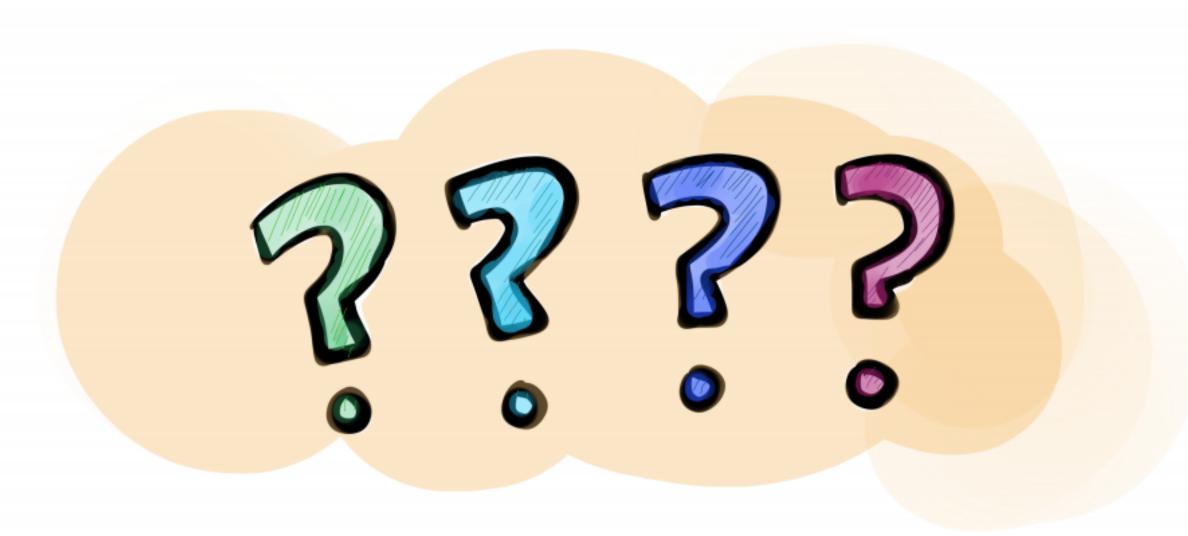
### Irlande





### Conclusion





Des questions?

#### Sources

Dataset IMC:

https://ncdrisc.org/data-downloads-adiposity.html

Dataset Trip Advisor:

https://www.kaggle.com/datasets/stefanoleone992/tripadvisor-european-restaurants