



VEGE RESTAURANT IN PERTH

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LOCATION LOCATION LOCATION

- Location is essential for a new specialty restaurant.
- Need to avoid existing competition due to risks of over-saturation.
- Recognition of potential client segment.
 - Affluent people are more likely to be vegetarians.
- Look for areas with high concentration of complimentary businesses.

DATA SOURCE

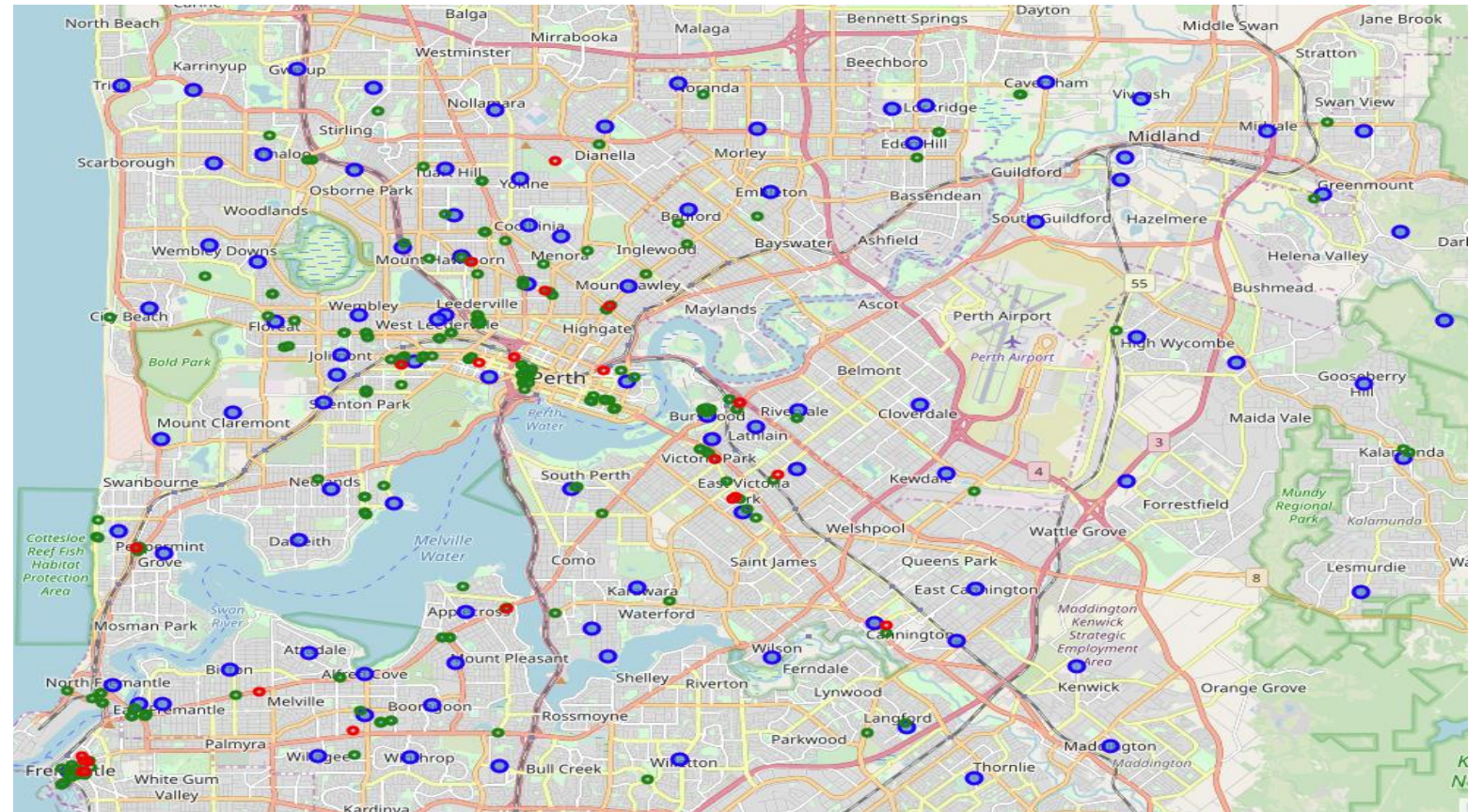
- Location data from Western Australian Government: <https://catalogue.data.wa.gov.au/dataset/geographic-names-geonoma>
- Data on income for each suburbs: <https://www.microburbs.com.au/heat-map/average-income#115.89421648019166:-31.97605525547553:11>
- Location data on complimentary businesses and competition: Foursquare API
- Drop all duplicate data and data unrelated to Metropolitan Perth



METHODOLOGY

- Locate suburbs with no existing vegetarian restaurants based on Foursquare search.
- Find suburbs with higher than median income.
- Locate suburbs with the highest concentration of entertainment venues.
- Compare data on suburbs based on highest income and highest concentration of entertainment venues to see if there is an overlap.

- The is a map of the Metropolitan Perth where each suburbs have been marked with a blue dot, the entertainment venues as described in the previous section has been marked with green and vegetarian restaurants have been marked with red.



COMPARISON OF TWO MATRICES

Rank remaining Suburb according to number of entertainment venues

```
[38]: finaldf.sort_values(by=['Venues Counts'], inplace=False, ascending=False)
```

[38]:		longitude	latitude	Income per week	Venues Counts	Vege Counts
	WEST LEEDERVILLE	115.832310	-31.937390	1329	10.0	NaN
	LEEDERVILLE	115.833889	-31.936111	1279	10.0	NaN
	NORTH FREMANTLE	115.755930	-32.033500	1272	6.0	NaN
	FLOREAT	115.794260	-31.937950	1558	5.0	NaN
	ROSSMOYNE	115.762320	-32.038230	1300	4.0	NaN

	FORRESTFIELD	115.993700	-31.979890	877	NaN	NaN
	HAZELMERE	115.992310	-31.900450	759	NaN	NaN
	SALTER POINT	115.872040	-32.025720	1415	NaN	NaN
	KIARA	115.938700	-31.881830	914	NaN	NaN
	TRIGG	115.758150	-31.875720	1372	NaN	NaN

Rank remaining Suburb according to income

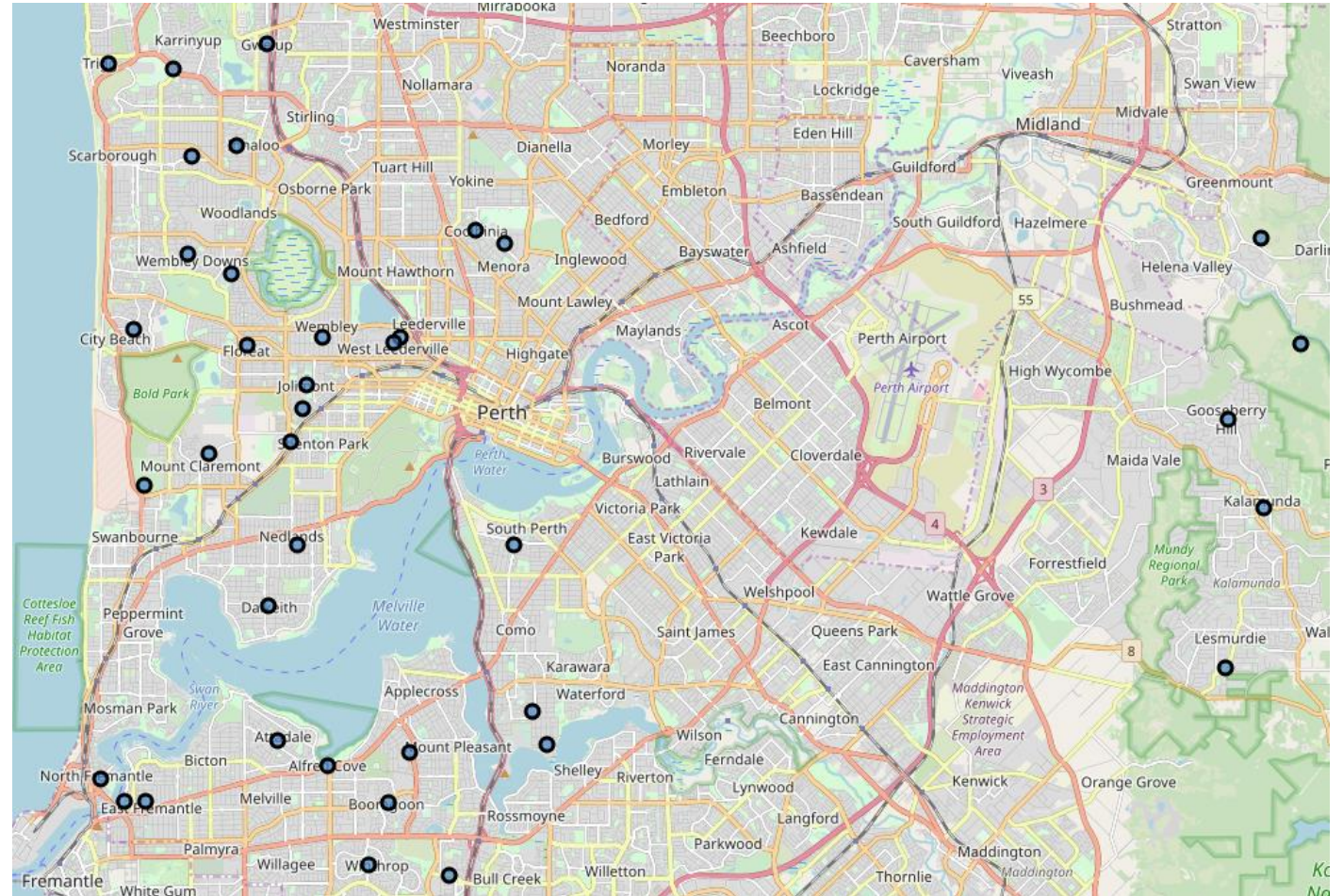
```
[39]: finaldf.sort_values(by=['Income per week'], inplace=False, ascending=False)
```

[39]:		longitude	latitude	Income per week	Venues Counts	Vege Counts
	CITY BEACH	115.76454	-31.93434	1632	1.0	NaN
	DALKEITH	115.79982	-31.99517	1592	NaN	NaN
	FLOREAT	115.79426	-31.93795	1558	5.0	NaN
	SWANBOURNE	115.76732	-31.96878	1490	NaN	NaN
	NEDLANDS	115.80732	-31.98184	1484	2.0	NaN

	MIDDLE SWAN	116.02037	-31.85267	716	3.0	NaN
	LANGFORD	115.94204	-32.04434	707	2.0	NaN
	MADDINGTON	115.98982	-32.04934	701	NaN	NaN
	LOCKRIDGE	115.94676	-31.88100	685	1.0	NaN
	MIDVALE	116.02648	-31.88767	654	NaN	NaN

SUBURBS FOR CONSIDERATION

This map marks all the suburbs where the income is higher than the median of \$1,083 per week that do not already have an existing competitor in the area.





OBSERVATIONS

- High income suburbs are predominantly west of the city center.
- Whilst there is a high concentration of entertainment venues in established areas such as downtown Perth City and Fremantle, there are also a large number of competitors in the area.
- Affluent western suburbs do not usually have a high number of entertainment venues. Opening restaurant in location based on income alone is unlikely sustainable due to low traffic.



CONCLUSION

- Floreat is the only suburb that appears on the top 5 of both tables, the chance that patrons will have high spending power and sufficient traffic to sustain business. Based on the visualized map, it is close to a large number of entertainment venues and is also close to the suburb with the highest income.
- Furthermore, there are no direct competition in the immediate areas surrounding Floreat.
- Floreat is the most sensible choice based on data.