About Job 01 :Penetration Map

What is penetration rate? The definition of penetration rate I used at work is the numbers of member divides households’ number given specific area and period.

For example:

Penetration rate have some functions. First, we could easy to use four-quadrant diagram whose x and y are households’ number and penetration rate to set our developing strategies.

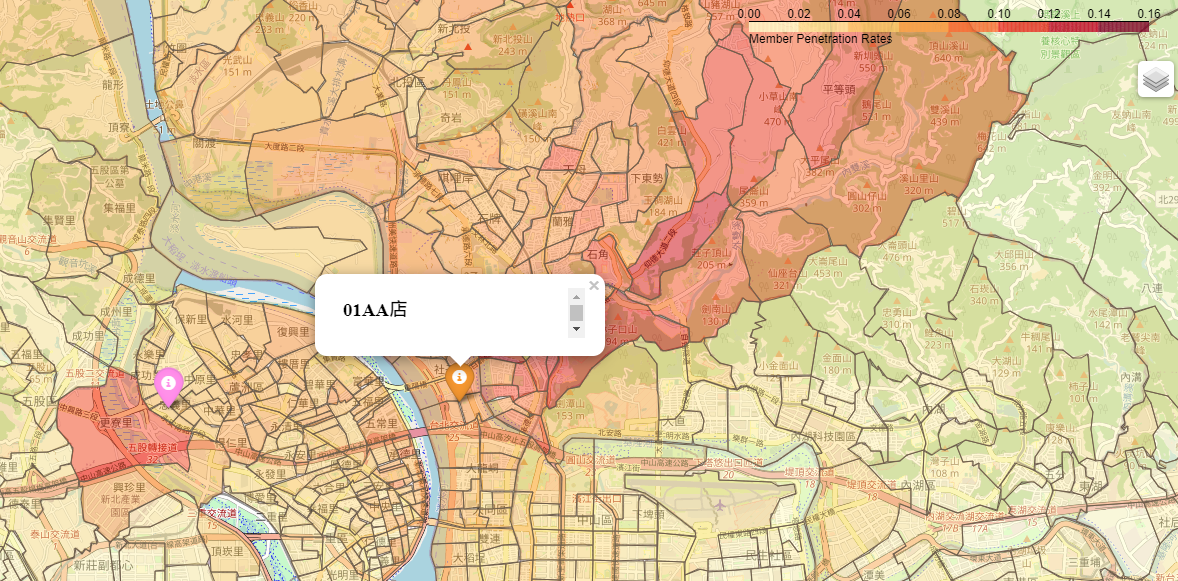
High households – High penetration: it is mean that our products are very competitive in this area and the residents love our brand. Our target is keeping them from switching to other brands.

High households – Low penetration: we could put more resource to develop it. It could bring high growth for our company.

Low households – High penetration: it is very similar with High households – High penetration. We still to need to put some resource but not the most. Maybe we could choose some specific marketing way to do some test.

Low households – Low penetration: the ROI in this area is not high. Unless we have special target, maybe we could spend less time and money in this place.

Second, penetration rate contains households’ number, members’ number, geography information, etc. It make us very easy to virtualize these data and let strategic business immediately understand the total environment.



Look at the above picture. By the penetration map, we could find that most of the customers of 01AA-shop are come from north area. Maybe because if the rivers and high-speed roads, even the distance are less, the people of south places do not like to go there. The distribution is very uneven and we could make different strategies in different places.

Finally, through the penetration map, we could easy to find potential business places. If we do not have any shop there, we could begin to discuss and open a new one. Besides, we could mark rival brands’ shops in the map. Combined with delta map, strategic business staffs could quickly get the effects of new shops or rival shops.

It’s just an article that I want to record my works and practice my English writing. Maybe there are something wrong, please don't hesitate to give me any comment. I also upload python code and sample data to github. Website: <https://github.com/GallonShih/Projects/tree/main/AboutJob/PenetrationMap>