# eMind Technologies Web Scraping Project Data mining, Data Analyzing & Data Visualization

Submitted by: Niranjan Kumar G S

Ph no:+91 7019832930

# INTRODUCTION

Web Scraping using Python

Website address: <a href="http://www.thrillophilia.com">http://www.thrillophilia.com</a>

Data mining, Data Analyzing & Data Visualization of the collected Data

#### Aim:

To find the URL for each and every category of Activities being listed on the entire website.

For every place, fetching the data following info into a csv file:

Category name

Number of places on each category

Total Bought on each category

In addition to above mentioned attributes, I have also fetching Activity vs Location vs User Demographics information for each and every Activities.

### **Description:**

The python script is written to fetch all the individual categories from the website (<a href="http://www.Thrillophilia.com">http://www.Thrillophilia.com</a> ), The code is written for fetching the data from the first page and it iterates to each and every pages of website (activities, categories, count of bought), and I used statistical techniques for mathematically analysis and presenting the data into visualization .

## Some packages:

- bs4 (BeautifulSoup4)
- > Requests
- Pandas
- ➤ Re (regular expression)
- Matplotlib

#### Each city url ends with thing to do, total 80 cities urls

```
https://www.thrillophilia.com/cities/ho-chi-minh/things-to-do
https://www.thrillophilia.com/cities/hoi-an/things-to-do
https://www.thrillophilia.com/cities/ubud/things-to-do
https://www.thrillophilia.com/cities/south-kuta-bali/things-to-do
https://www.thrillophilia.com/cities/nusa-dua/things-to-do
https://www.thrillophilia.com/cities/kintamani/things-to-do
https://www.thrillophilia.com/cities/langkawi/things-to-do
https://www.thrillophilia.com/cities/penang/things-to-do
https://www.thrillophilia.com/cities/bangkok/things-to-do
https://www.thrillophilia.com/cities/pattaya/things-to-do
https://www.thrillophilia.com/cities/phi-phi/things-to-do
https://www.thrillophilia.com/cities/krabi/things-to-do
https://www.thrillophilia.com/cities/phnom-penh/things-to-do
https://www.thrillophilia.com/cities/luang-prabang/things-to-do
https://www.thrillophilia.com/cities/dubai/things-to-do
https://www.thrillophilia.com/cities/leh/things-to-do
```

## **LINKS OF EACH CATEGORY**

```
tags each place https://www.thrillophilia.com/cities/hue-city/tags/sightseeing?tour_type=Activity
tags each place https://www.thrillophilia.com/cities/hue-city/tags/day-outs?tour_type=Activity
tags each place https://www.thrillophilla.com/cities/hue-city/tags/biking?tour type=Activity
    each place https://www.thrillophilia.com/cities/hue-city/tags/adventure-special--2?tour type=Activity
    each place https://www.thrillophilia.com/cities/hue-city/tags/boating?tour type=Activity
    each place https://www.thrillophilia.com/cities/hue-city/tags/trekking?tour_type=Activity
tags each place https://www.thrillophilia.com/cities/hue-city/tags/aerial-activities?tour type=Activity
    each place https://www.thrillophilia.com/cities/hue-city/tags/walking?tour_type=Activity
    each place https://www.thrillophilia.com/cities/hue-city/tags/family-fun--27tour type=Activity
    each place https://www.thrillophilia.com/cities/hue-city/tags/walking-biking?tour type=Activity
tags each place https://www.thrillophilia.com/cities/hue-city/tags/caving?tour type=Activity
    each place https://www.thrillophilia.com/cities/hue-city/tags/arts-culture?tour_type=Activity
    each place https://www.thrillophilia.com/cities/hue-city/tags/cruises-sailing--27tour type=Activity
               https://www.thrillophilia.com/cities/hue-city/tags/sports-games?tour_type=Activity
    each place https://www.thrillophilia.com/cities/hue-city/tags/transfers?tour_type=Activity
tags each place https://www.thrillophilia.com/cities/hue-city/tags/wildlife?tour_type=Activity
```

# **USING PANDAS DATAFRAME**

	Activities	Total_Count	Total_Bought	efficieny	
0	Sightseeing	26	196	86.734694	
1	Day Outs	17	163	89.570552	
2	Biking	13	133	90.225564	
3	Attraction Visit	8	47	82.978723	
4	Adventure Special	8	67	88.059701	
5	Boating	6	15	60.000000	
6	Cycling	4	5	20.000000	
7	Trekking	3	38	92.105263	
8	Nature and Wildlife	3	26	88.461538	
9	Aerial Activities	3	32	90.625000	
10	Walking	2	1	-100.000000	
11	Family Fun	2	1	-100.000000	
12	Nightlife	2	31	93.548387	
13	Walking & Biking	2	1	-100.000000	
14	Caving	2	14	85.714286	
15	Arts & Culture	1	1	0.000000	
16	Cruises & Sailing	1	15	93.333333	
17	Village Safari	1	1	0.000000	
18	Sports & Games	1	7	85.714286	
19	Food & Drinks	1	14	92.857143	
20	Transfers	1	10	90.000000	
21	Wildlife	1	12	91.666667	

## **CSV** Output

Below is mentioned csv file that generated after execution of the python script. Like this Total 80 cities datasheets and graphes

1		Activities	Total_Count	Total_Bought	efficieny	
2	0	Sightseeing	26	194	86.59793814	
3	1	Day Outs	17	163	89.57055215	
4	2	Biking	13	133	90.22556391	
5	3	Attraction Visit	8	47	82.9787234	
6	4	Adventure Special	8	67	88.05970149	
7	5	Boating	6	15	60	
8	6	Cycling	4	5	20	
9	7	Trekking	3	38	92.10526316	
10	8	Nature and Wildlife	3	26	88.46153846	
11	9	Aerial Activities	3	32	90.625	
12	10	Walking	2	1	-100	
13	11	Family Fun	2	1	-100	
14	12	Nightlife	2	31	93.5483871	
15	13	Walking & Biking	2	1	-100	
16	14	Caving	2	14	85.71428571	
17	15	Arts & Culture	1	1	0	
18	16	Cruises & Sailing	1	15	93.33333333	
19	17	Village Safari	1	1	0	
20	18	Sports & Games	1	7	85.71428571	
21	19	Food & Drinks	1	14	92.85714286	
22	20	Transfers	1	10	90	
23	21	Wildlife	1	12	91.66666667	
24						
25						

#### Data visualization:

