



INVESTMENT ANALYSIS ASSIGNMENT SUBMISSION

Name: POONAM DEVENDRA NAKHAVA





Abstract

The main goal of this analysis is to find the best companies to invest in for the company Spark Funds for its constraints.

The constraints being, to find the most invested company in top english speaking countries for the most invested fund type. The investment range which is planned to invest ranging from 5-15 million USD.

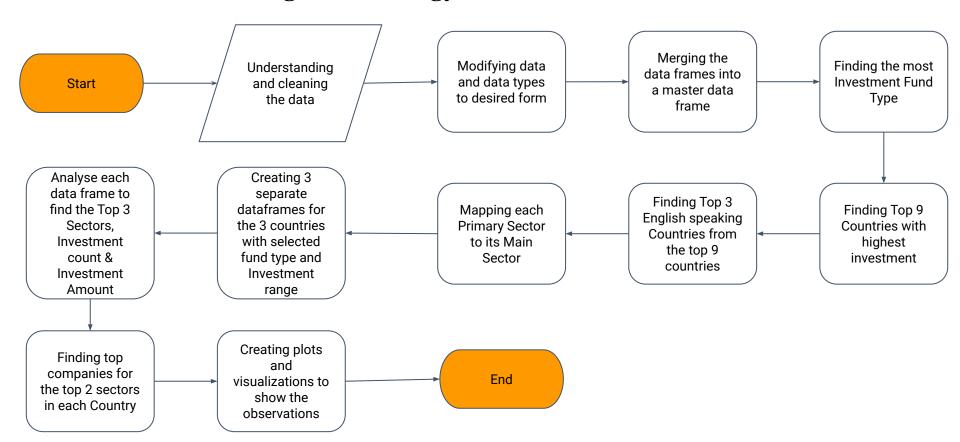
Spark Funds wants to invest where most other investors are investing and that would imply to investing in :

- Top Companies
- Top Sectors
- Top English Speaking Countries
- Investment range 5-15 million USD
- Best Investment Fund Type





Problem solving methodology







Analysis: Part-I

To start with, we first load the data into data frames and find the number of unique companies and the unique companies who attended the rounds for investment. Where we clearly find 66368 unique companies in both the data frames. Then, we perform data cleaning and manipulations on the data frames to keep only the acceptable and required data.

After cleaning and merging the two data frames, we get 89108 rows in the new master frame, which is quite adequate to perform the analysis on.

Next using this master frame we find the representative value for each of the fund types we would like to invest in. And we come to the conclusion that private equity has the highest raised amount, but it falls out of our investment range. So we opt for the next highest raised fund which would be the venture funds which satisfies all our investment constraints.



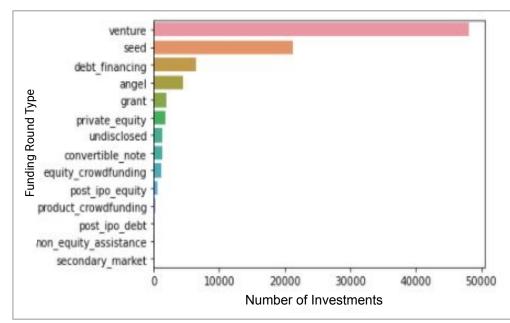


Analysis: Part-II

From the shown plot, we can clearly see that Venture funds is also the highest invested fund among others.

Next we find the top english speaking countries that have invested the most. USA, UK and India qualify the top invested english speaking countries as per the analysis.

Next we map each primary sector from the master frame to its corresponding main sector in the mappings data frame



main sector in the mappings data frame by merging the master frame with the mappings data frame.





Analysis: Part-III

Using this new master frame, we find the top 3 sectors for each of the 3 countries with the constraints of funding type and the investment range amount.

Shown are the top 3 main sectors for each countries along with their investment counts. For USA, the sectors being 'Others', 'Cleantech/Semiconductors' and 'Social,

Finance, Analytics, Advertising' with the top companies 1stdibs and Sunverge Energy, Inc

For GBR, the sectors being 'Others', 'Cleantech/Semiconductors' and 'Social, Finance, Analytics, Advertising' with the top companies Tribold and Elixent

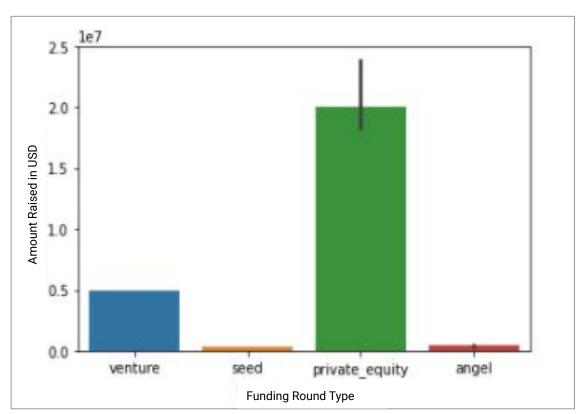
For IND, the sectors being 'Others', 'News, Search and Messaging' and 'Entertainment' with the top companies ItzCash Card Ltd. and Mobile2Win India

	main_sector	investment_count	Country
0	Others	2923	USA
1	Cleantech / Semiconductors	2297	USA
2	Social, Finance, Analytics, Advertising	1912	USA
3	Others	143	GBR
4	Cleantech / Semiconductors	127	GBR
5	Social, Finance, Analytics, Advertising	98	GBR
6	Others	109	IND
7	News, Search and Messaging	52	IND
8	Entertainment	33	IND





Results: Plot 1 - Best investment fund type



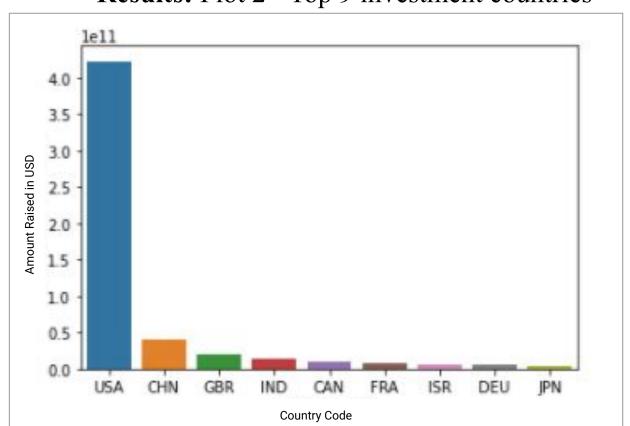
In the figure, we can clearly see that most investments are made for the fund type private equity. But the representative value for this type is around 20 million USD.

Considering the constraint we have, which is 5-15 million USD, the best fund type to opt for would be the venture type, as it has a representative value of 5 million USD.





Results: Plot 2 - Top 9 investment countries

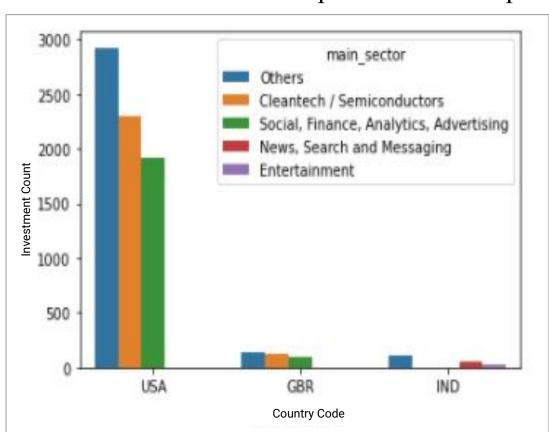


The plot shown displays the top 9 investment countries. These are the countries that have the highest amount of funding for the venture funding investment type. To pick the top 3 English speaking countries, we should opt for the countries USA, GBR and IND as these have their official language as English and also have the top investments.





Results: Plot 3 - Top 3 sectors for top 3 investment countries



The bar plot shows the top 3 sectors in each of the 3 top english speaking countries in which investments can be made

For America(USA) and United Kingdom(GBR), we have 'Others', 'Cleantech/Semiconductors' and 'Social, Finance, Analytics, Advertising' as the top 3 sectors. Whereas for India(IND), we have 'Others', 'News, Search and Messaging' and 'Entertainment' as the top 3 sectors.





Analysis Conclusions:

From the Analysis made so far, based on the constraints offered by Sparks Fund, it is clearly evident that the top three English speaking countries to invest in would be <u>United States</u>-USA, <u>United Kingdom</u>-GBR and <u>India</u>-IND with the top investment sectors for the countries being 'Others', 'Cleantech/Semiconductors' and 'Social, Finance, Analytics, Advertising' for USA and GBR, and 'Others', 'News, Search and Messaging' and 'Entertainment' for IND.

Also the best fund type here would be the venture funds which definitely falls in our investment constraint of 5-15 million USD with its representative value of 5 million USD.

And for each country we got the top company for the top 2 sectors as below:

USA - 1stdibs, Sunverge Energy Inc

GBR - Tribold, Elixent

IND - ItzCash Card Ltd., Mobile2Win India