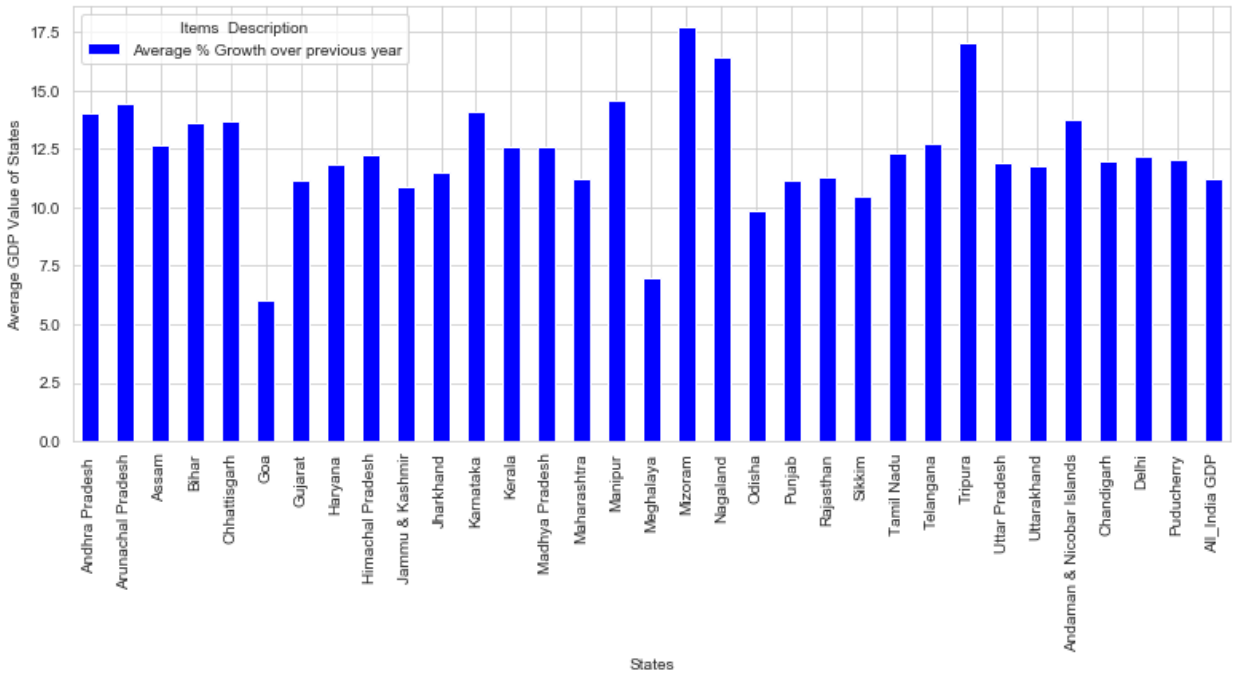
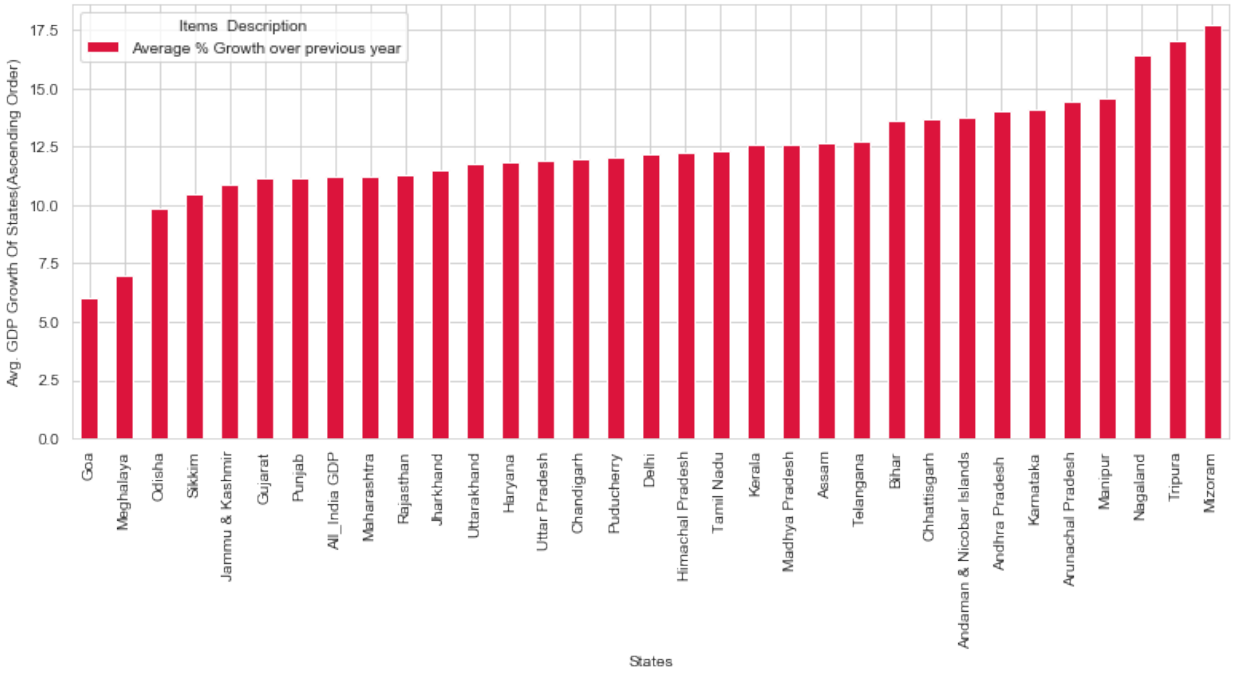
NAME : Tony Jose **ASSIGNMENT : GDP ANALYSIS**

Compare the calculated values and plot them for the states. Make appropriate transformations, if necessary, to plot the data. Report the average growth rates of the various states:



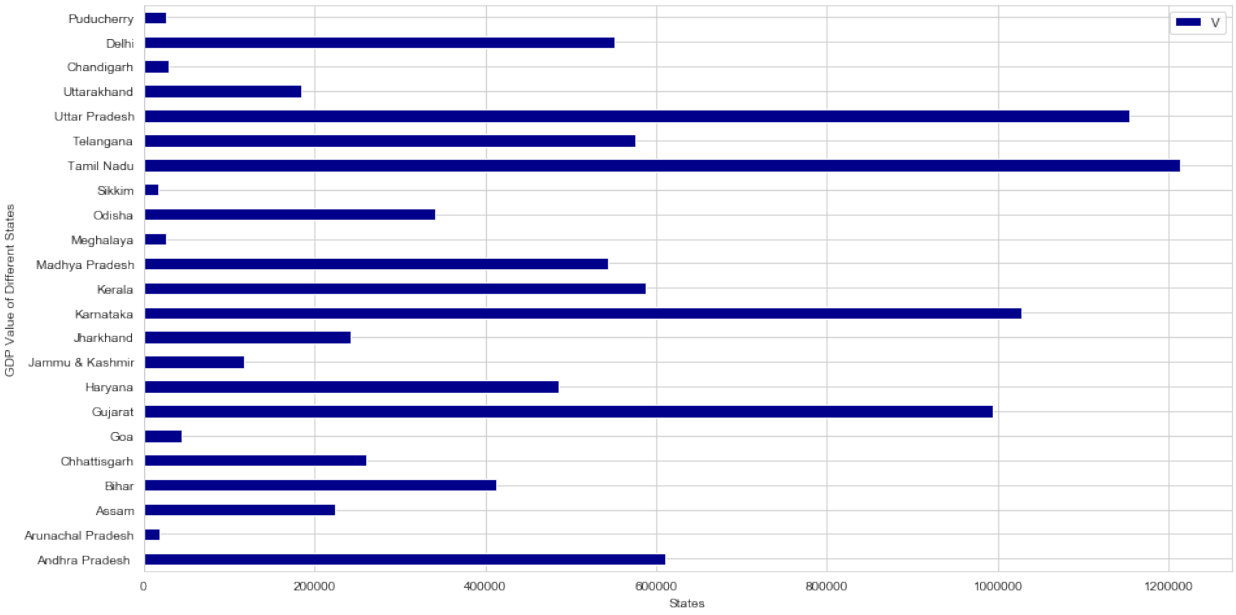
The above graph shows the distribution of the GDP among different states.

Which states have been growing consistently fast, and which ones have been struggling?



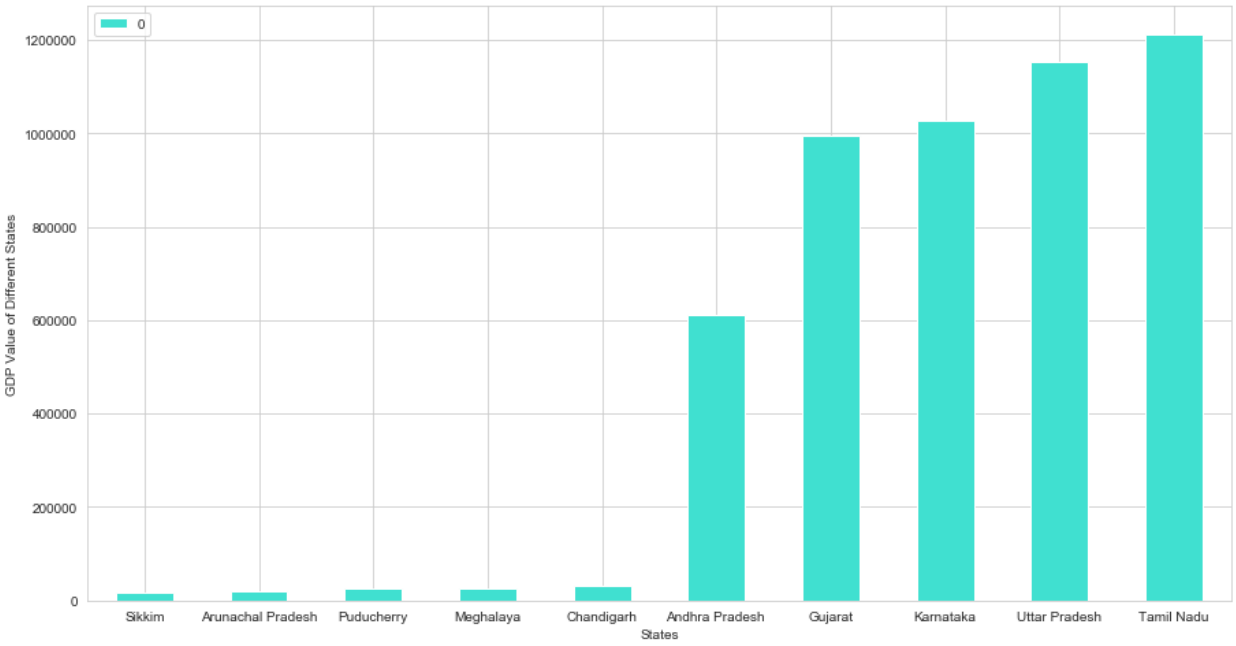
- The above graph shows the Average GDP of the states contributing to GDP.
- Eastern states of India have performed extremely well and their contribution to GDP has been remarkable.

Plot the total GDP of the states for the year 2015-16:



- This plot is displaying the statewise GDP of different states.
- States like U.P, TamilNadu,Karnataka and Maharashtra are the states generating higher GDP.
- Government could plan for subsidies to setup factories and industries in the least performing states so that the GDP generating from these states can be improved.

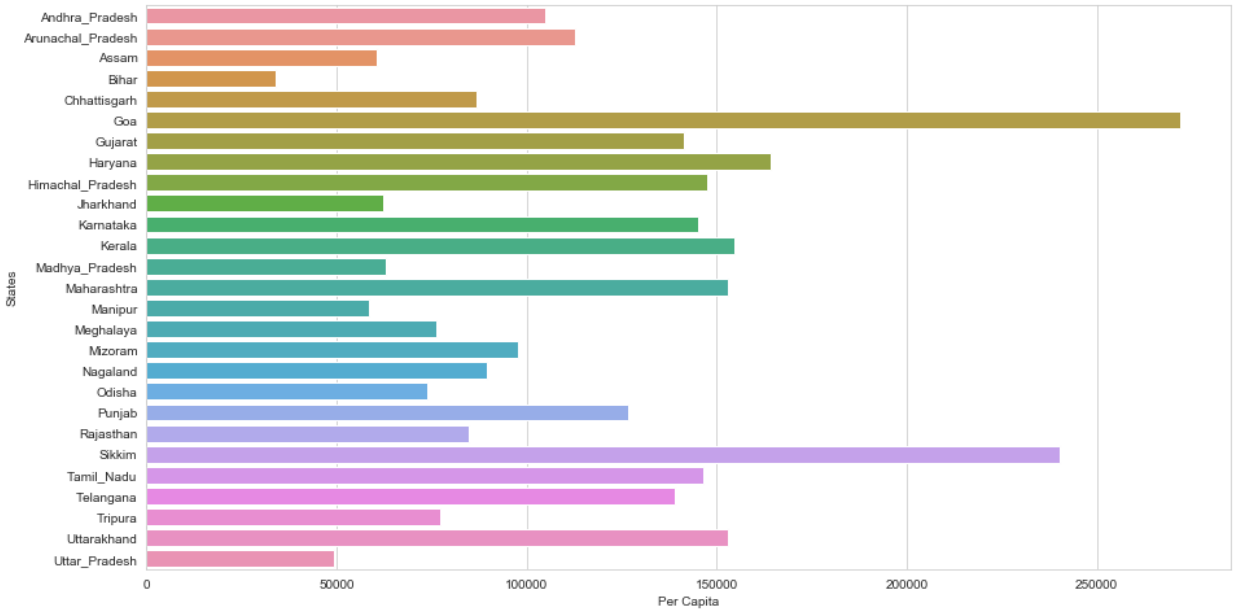
Identify the top 5 and the bottom 5 states based on total GDP. Identified Top 5 States and Lowest 5 States and Plotting it on the Graph.



- The above graph depicts the Top 5 states and the bottom 5 states contributing to the Indian GDP.
- We could see industrial states are the ones which are generating Maximum GDP for the country and thus the government should start focusing on industrialisation.
- States which are least performing are those which are heavily dependent on the Primary sector.
- Training and awareness camps can be arranged and people in these least performing states so that they are aware of different emplyment options and thus gaining more income and improving their standard of living.
- Government can launch a scheme of free education which will make state population well educated which could help the state in generating good amount of GDP in future.

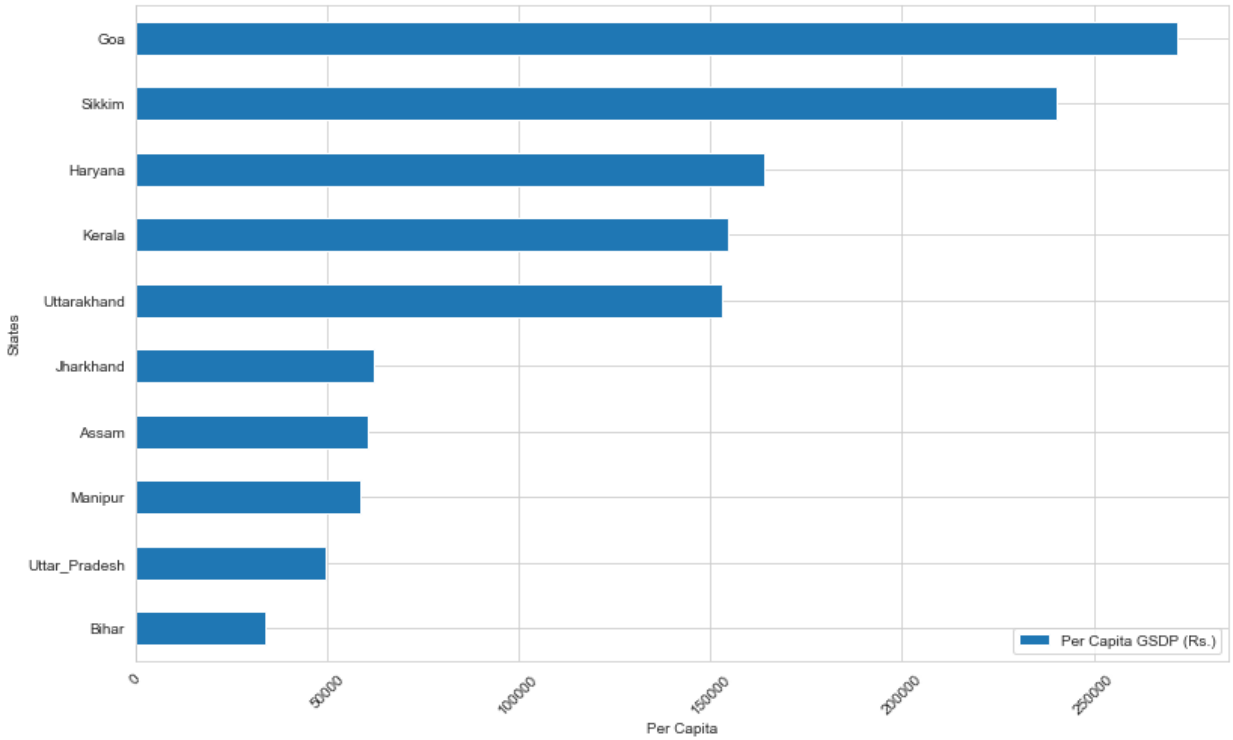
Filter out the union territories (Delhi, Chandigarh, Andaman and Nicobar Islands, etc.) for further analysis, as they are governed directly by the centre, not state governments.

Plot the GDP per capita for all the states.



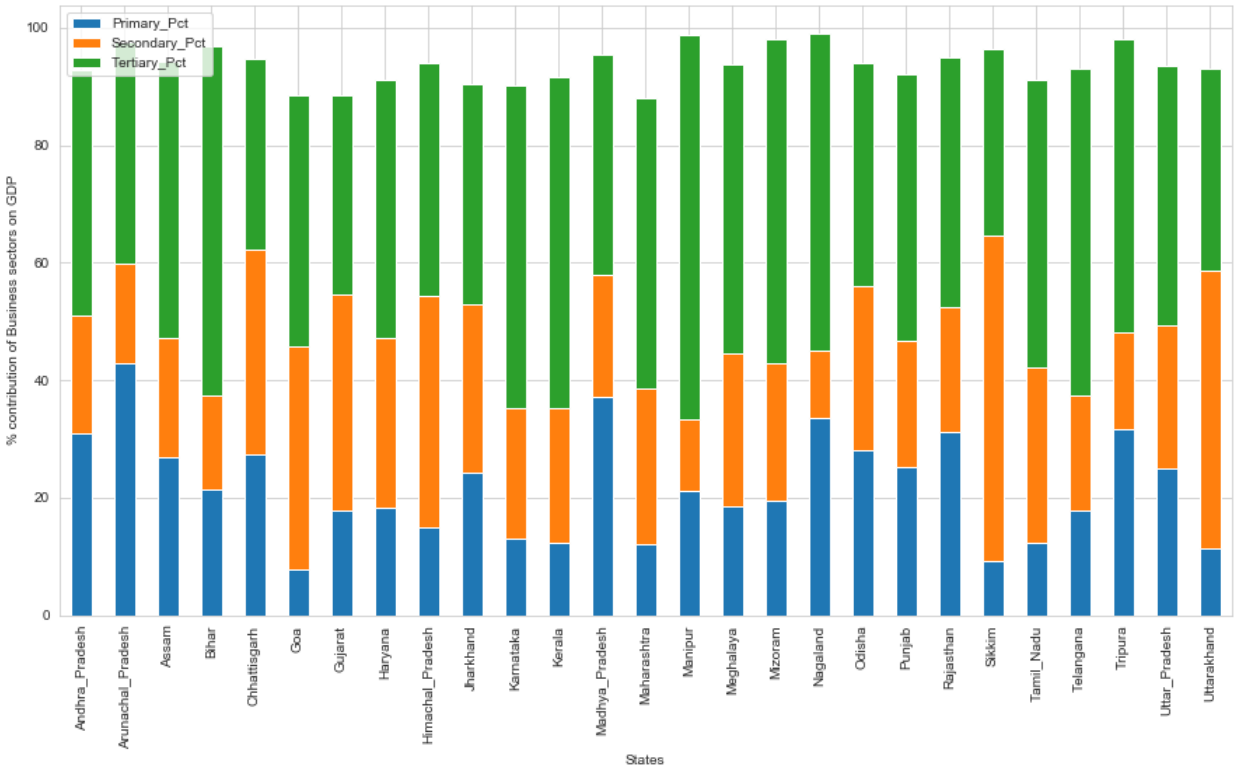
- The graph displays the statewise GDP Per Capita distribution in the country.
- We could observe how different states are performing. States like Goa and Sikkim which are the smallest states in the country have pipped the huge industrial states like Maharashtra and TamilNadu in GDP generation.
- Government of different states could set GSDP value to achieve the next year and thus they could see the performance of their state.
- Based on the observed GDP Per Capita the state government could also plan the budget and collect taxes.

Identify the top 5 and the bottom 5 states based on the GDP per capita.



- This graph is a display of the Top 5 states contributing for the GDP per capita and the Lowest 5 States in their contribution to GDP.
- Goa,Sikkim,Uttarakhand and Kerala are among the top 5 GDP generating states and we could see that these are the popular tourist destinations in India.
- Government could improve the tourism in these states so that the GDP per capita genration can be expanded.
- While least performing states like Bihar, U.P,Manipur etc. can start investing into tertiary and secondary sector thus creating better employment opportunities.
- Government could help them by providing subsidies to diversify business in these states which could generate income from various sectors rather than concentrating on Agriculture.
- Govt. could arrange vocational training institutes in these states so that people in these states could develop their skills.

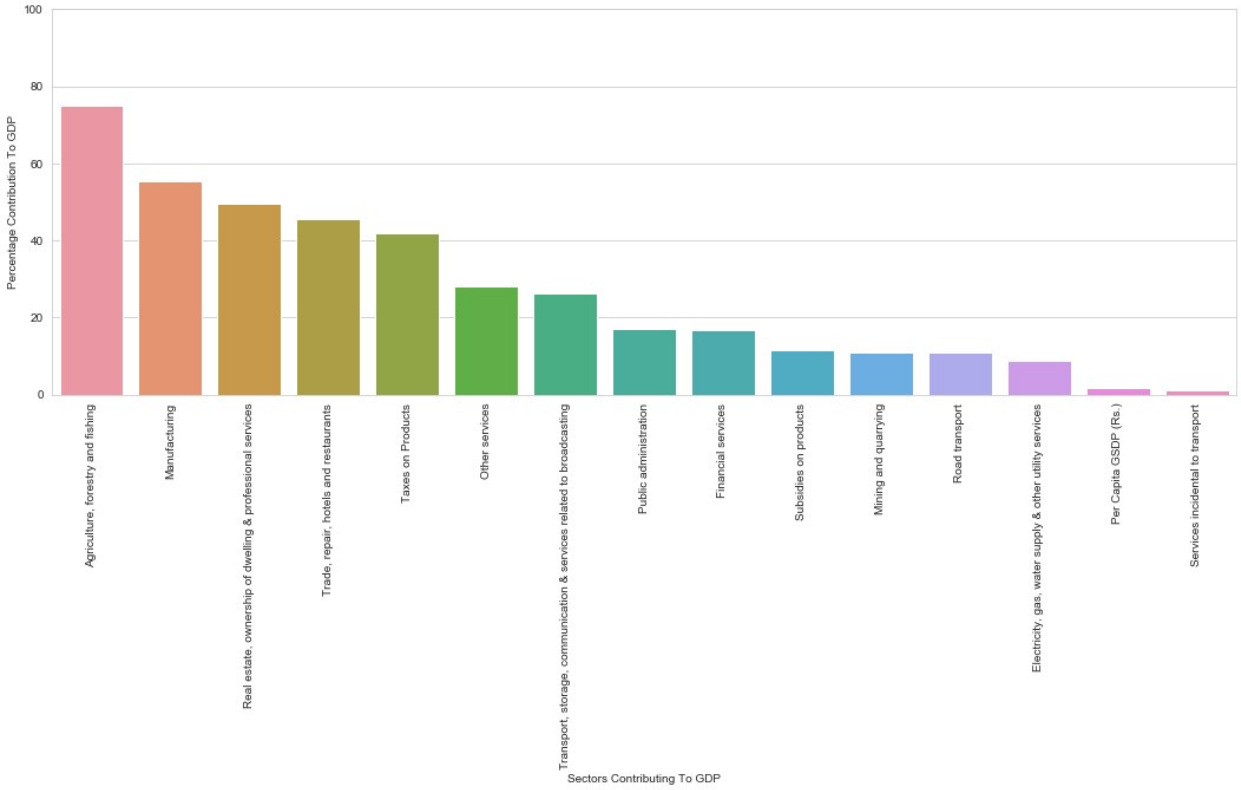
Plot the percentage contribution of the primary, secondary and tertiary sectors as a percentage of the total GDP for all the states.



- The above graph shows the statewise distribution of the sectors contributing to the GDP of the country.
- We can find out the states that are heavily dependent on particular sector. They could also start focusing on the other sectors of business which can be more reliable and helpful for GDP.

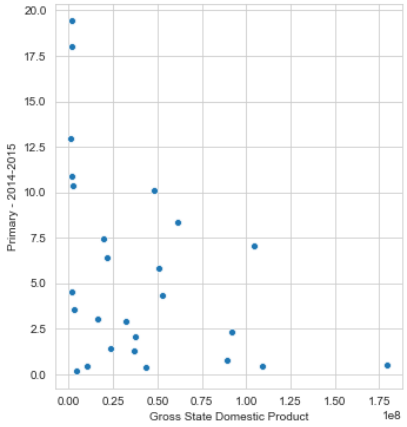
Categorise the states into four groups based on the GDP per capita (C1, C2, C3, C4, where C1 would have the highest per capita GDP and C4, the lowest). The quantile values are

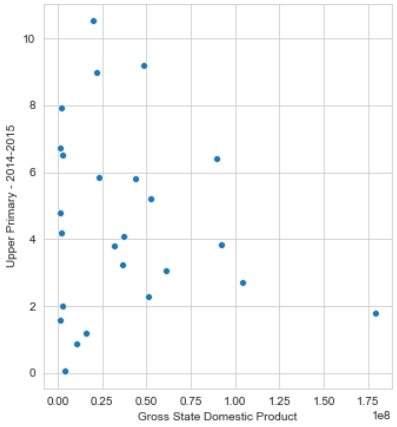
(0.20,0.5, 0.85, 1), i.e., the states lying between the 85th and the 100th percentile are in C1; those between the 50th and the 85th percentiles are in C2, and so on.

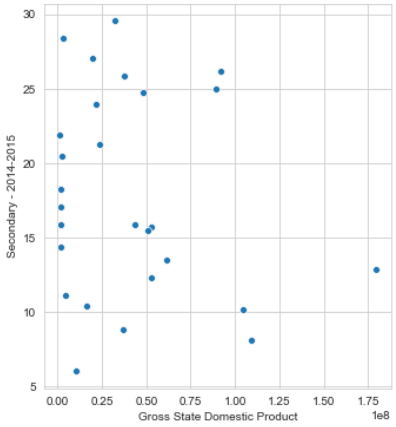


- After performing analysis on the above mentioned scenario we can observe that the sub-sector that is contributing the highest is **Agriculture, forestry and fishing sector** while **Services incidental to transport** is the lowest performing sub-sector.
- First of all the governing authorities can investigate as to why some sectors are performing very poorly and how they can be used to generate more income for the state/country.
- They could provide special schemes, offers and well planned roadmap for the least performing sub-sectors so that these sectors can improve their performance and contribute more to the GSDP.

Part-II: GDP and Education







Primary – 2014-2015

- As we can see from the above graph for the Primary-2014-15 we can observe that the low GSDP rate and the sector does affect the dropout rate.
- Here a low GSDP with Primary sector has shown the dropout rate to be high. An increase in the GSDP has reduced the dropout rate drastically.

Upper Primary – 2014-2015

- Here the dropout rate is higher compared to the primary 2014-15.
- An increase in GSDP has not significantly helped in reducing the dropout rates.

Secondary – 2014-2015

- Here also the dropout rate is higher compared to the primary 2014-15.
- Rather an increase in GSDP has also resulted into higher dropout rates when compared with other two sectors.