



Implement business strategies from Youtube Analysis.

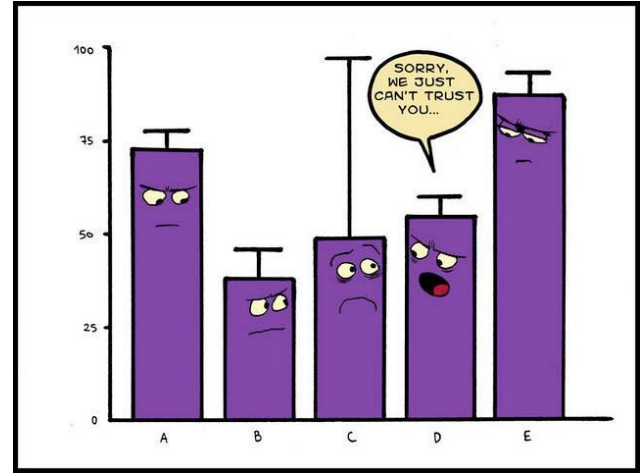
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NYCDSA 11/25



First things first: Why Youtube?

Social Media is profitable to both content producers and viewers.

Use technical data to develop action items for product marketing.



About the data:

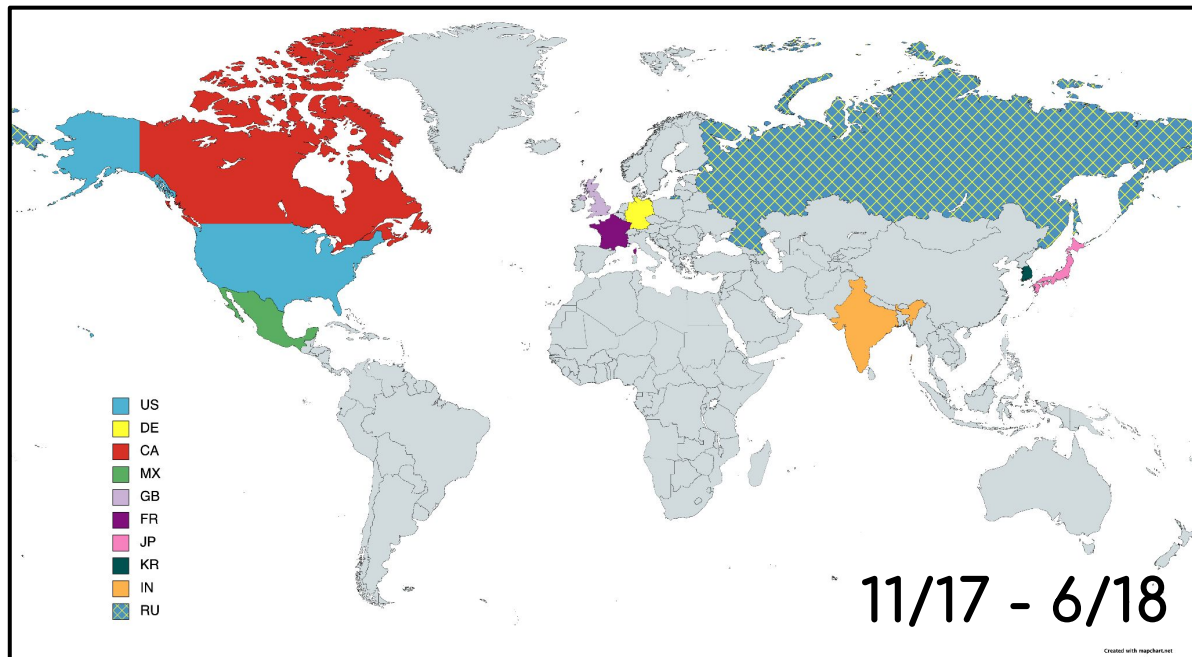
11 datasets.

10 countries.

8 months.

~400K observations.

What's trending on Youtube? (by [Kaggle](#))



Key Objectives

Effective Marketing

Which region will provide the highest ROI for online advertisements?

What marketing tactic is most effective for consumers with different interests?

Energy Consumption

When are consumers more likely to shop online for products they don't need?

What infrastructure requisites are necessary for data center upkeep?

Exploratory Analysis

How do we use viral data to predict consumer buying trends?

Which products are consumers are likely to buy based on their interests?

One last thing...

I'll be using the word *consumer* a lot.

Viewers are consumers.

Content is the product.

Digital currency is ~~bitcoin~~ time.

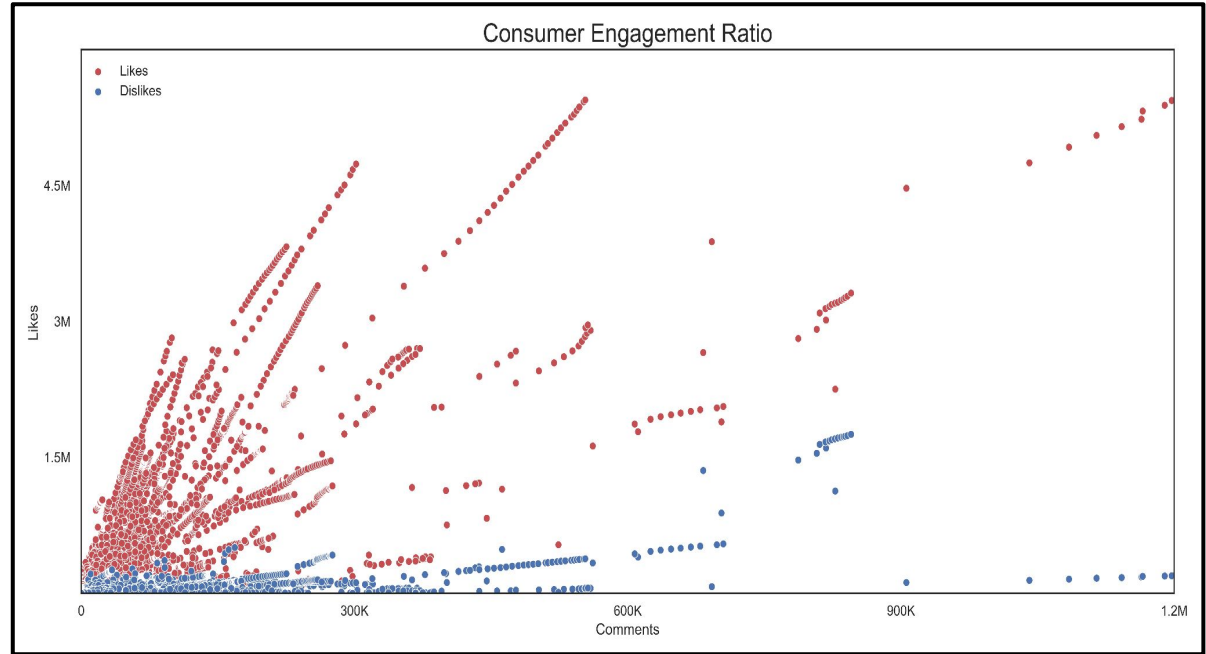


Effective Marketing:

The opinions of the few.

We can see how often consumers will interact with the products.

Consumers are 20x more vocal for products they like vs. dislike. (*median*)

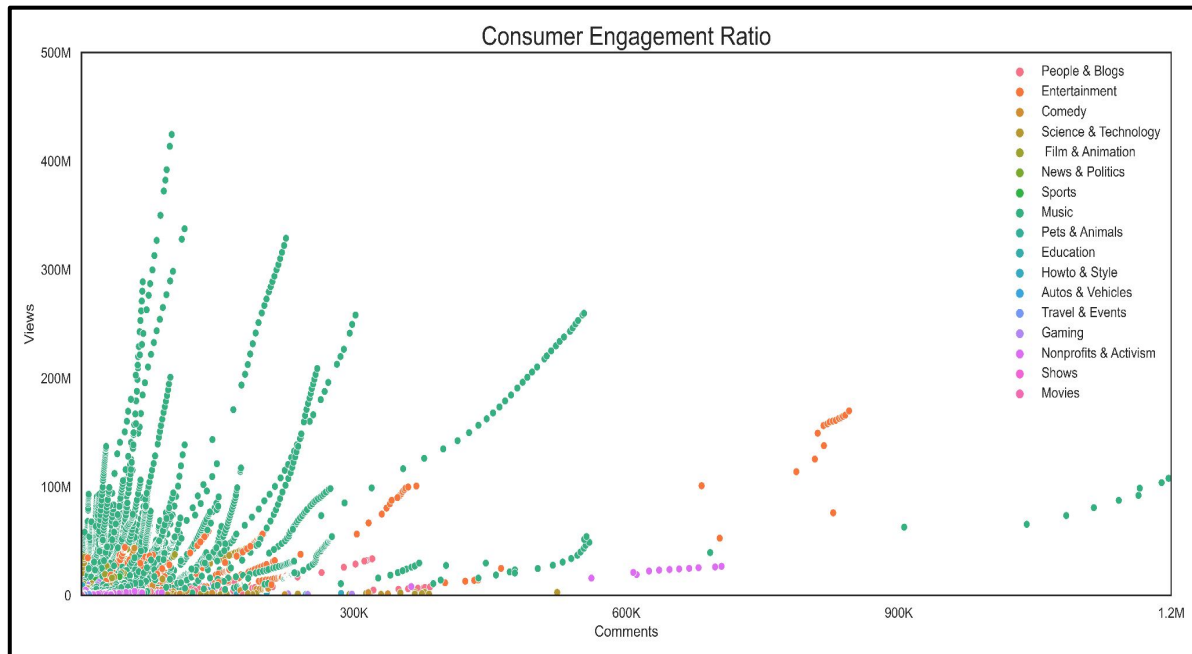


Effective Marketing:

The voices that power the product.

The ratio here differ as it quantifies the engagement views and categories.

The engagement-product ratio is around 0.05% - 5% of which are dislikes -



Fun fact:

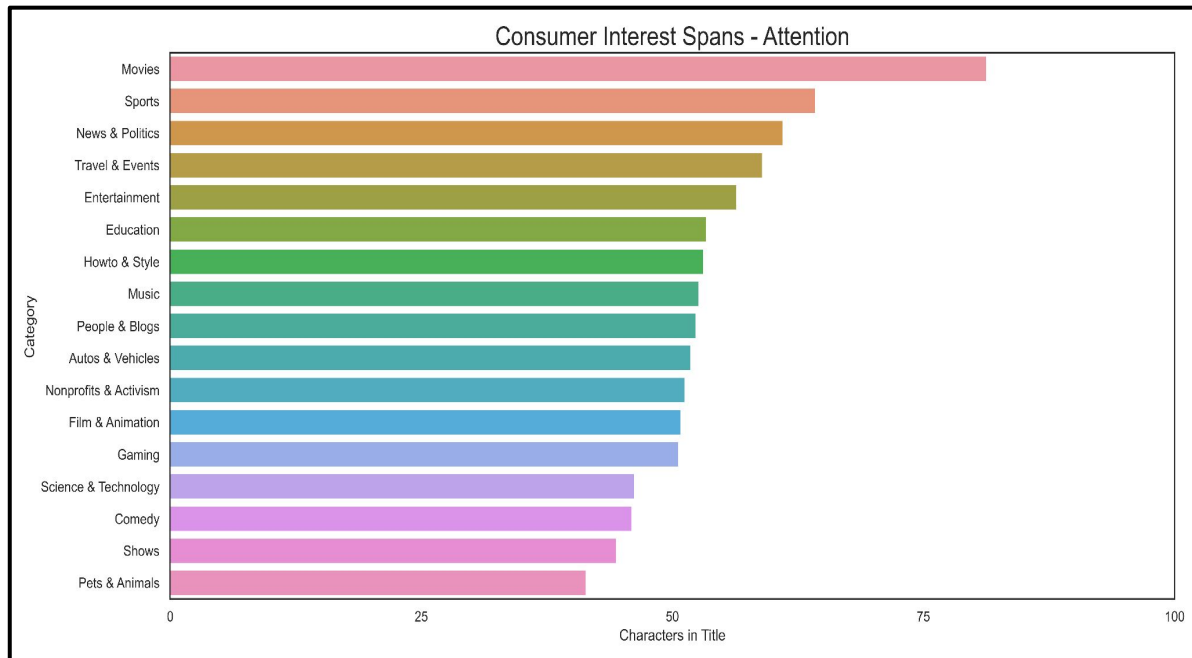
Good product engagement rates vary between 0.04-16%, depending on the platform/product.

Effective Marketing:

The instant gratification dilemma.

Steal the consumer's
attention by analyzing
their interest spans.

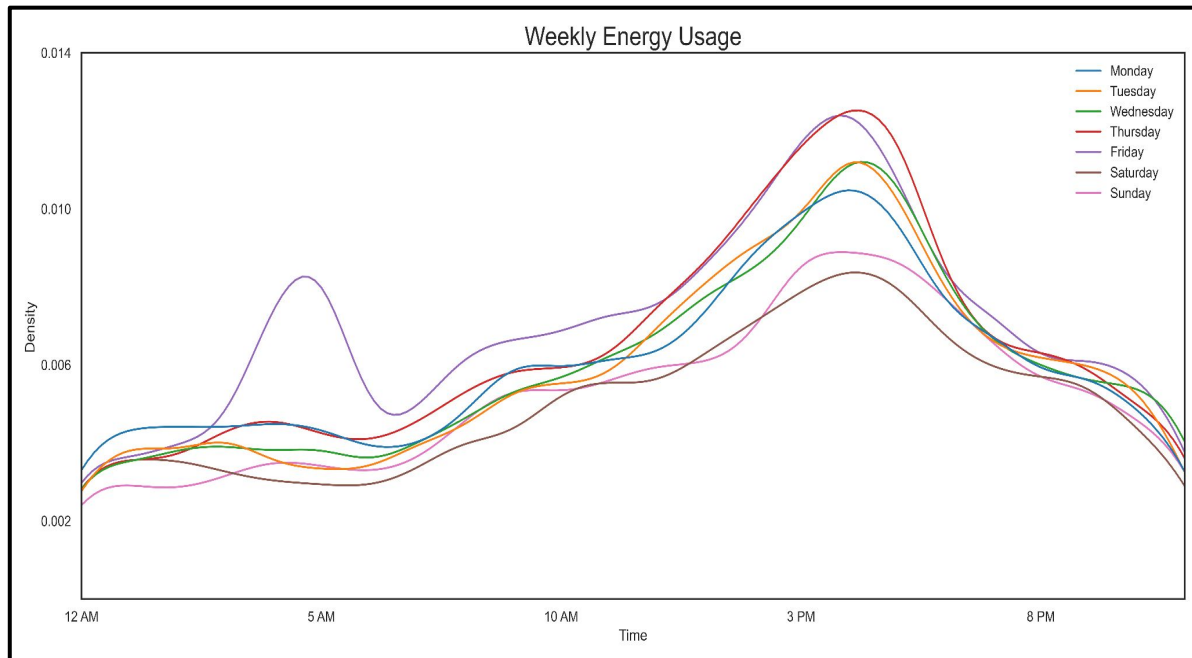
Consumers have varying
levels of attentiveness
based on their interests.



Energy Consumption: Keep calm and carry on.

Ads are only as effective as its impact. Calm the consumer to boost.

Target consumers when they are more likely to be in a *relaxed* state.



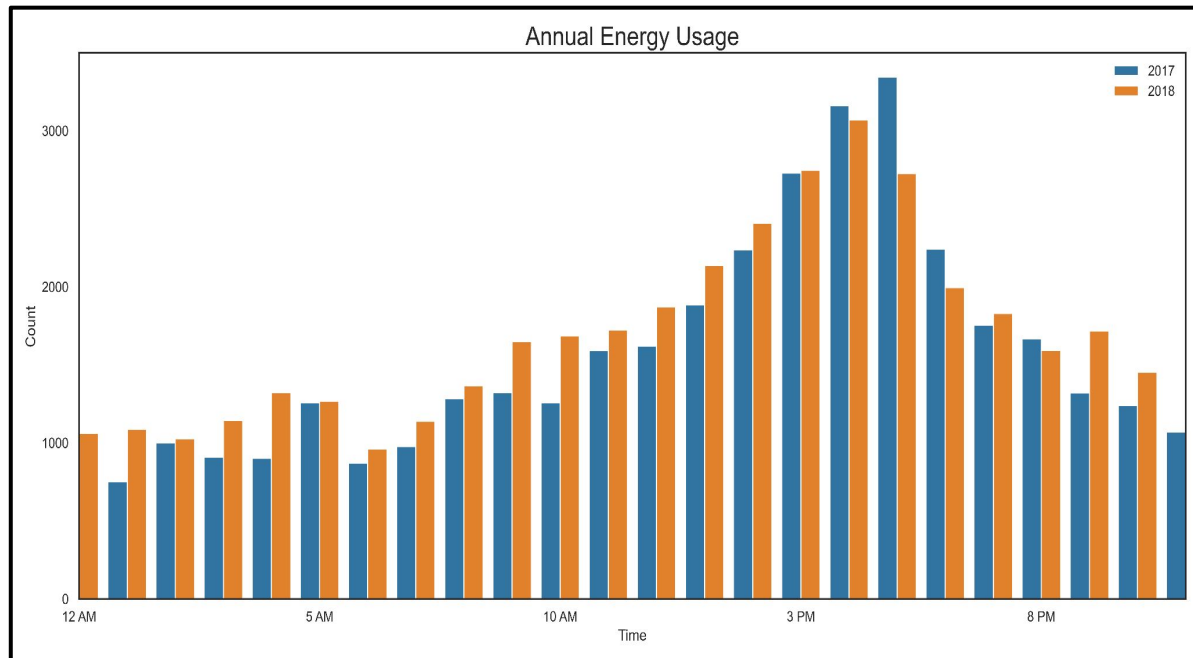
Fun fact:

Relaxed consumers are 12% more likely to spend money on products.

Energy Consumption: Let's use data to make data.

In 2018, energy consumption is higher from 10PM - 2AM.

Consumers have less distractions as they *wind-down* (relaxed).



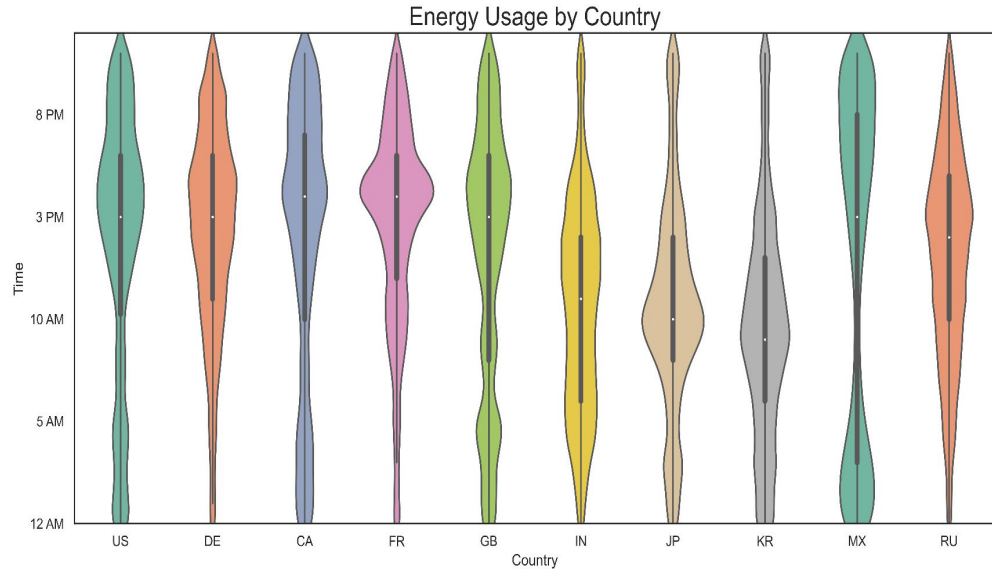
** Data is normalized to reflect the number of months

Fun fact:
Consumer engagement behavior is more influential at night.

Energy Consumption: The music is nothing if the audience is deaf.

Know your target audience. Their buying habits vary globally.

Increase advertisement frequency during times of high region activity.

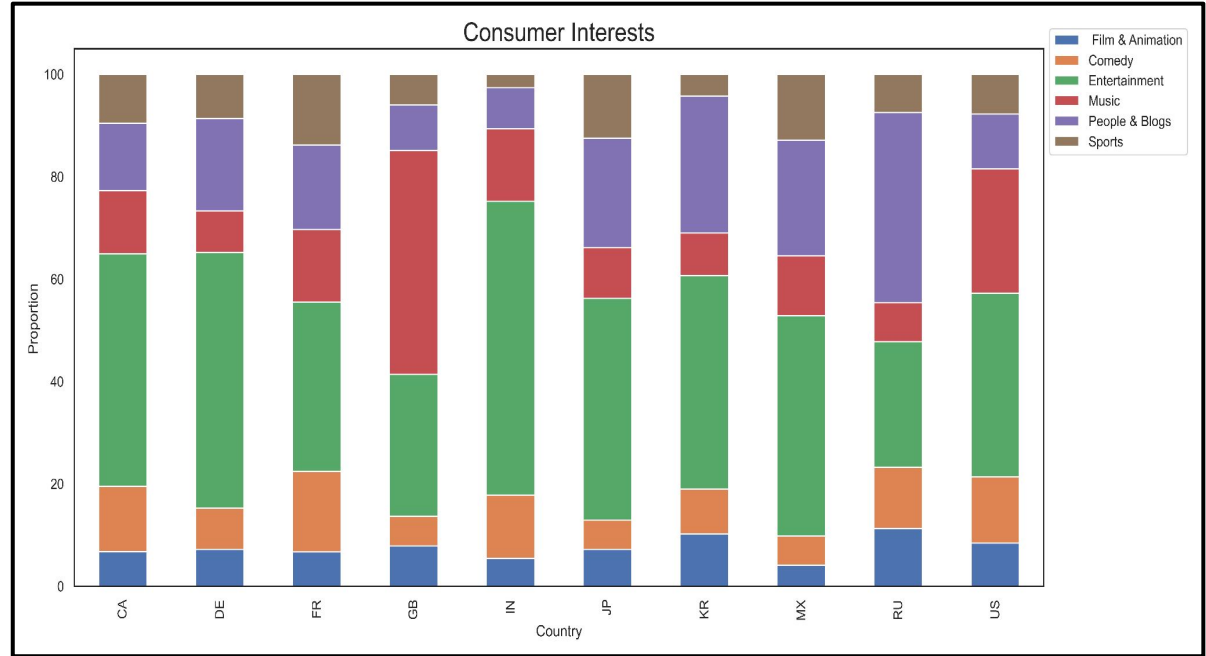


Exploratory Analysis:

In search for the perfect element.

Consumer views of certain products vary between countries.

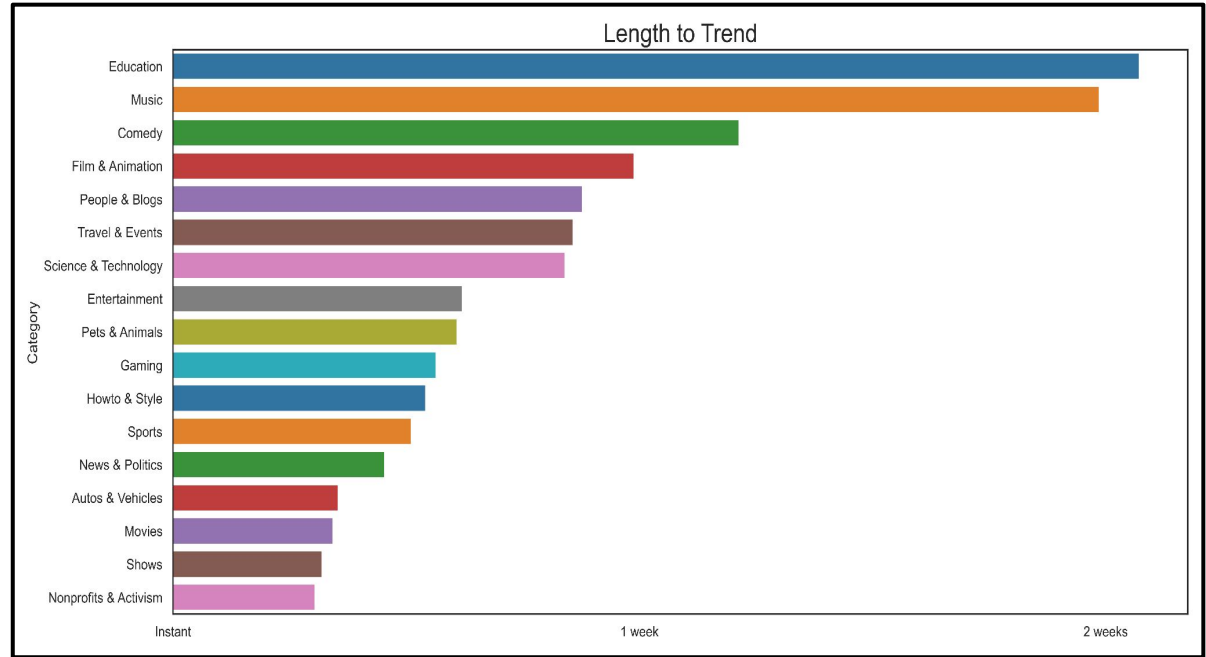
Analyzing regional interests can help predict consumer demand.



Exploratory Analysis: The power of *word-of-mouth*.

Information travel
differently based on
consumer interests.

Products selling different
categories should expect
varying levels of sales.



Fun fact:
90% of consumers are more likely to purchase a product through W-O-M.

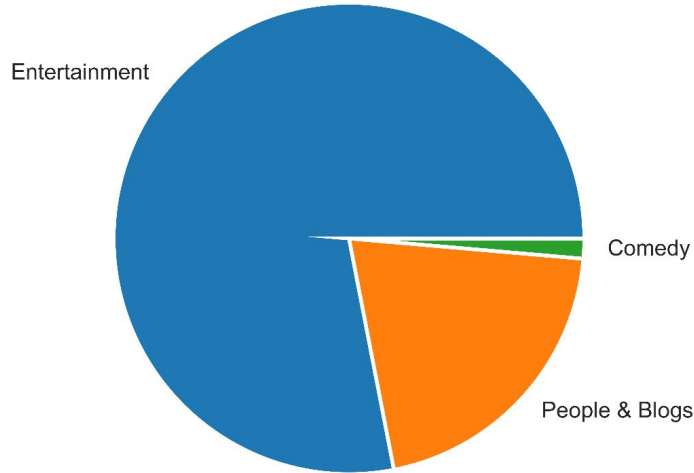
Exploratory Analysis:

Deconstructing consumer spending habits.

Word-of-mouth travel most dominantly in the Entertainment sector.

Companies can help boost sales by partnering with people in entertainment.

Affiliate Marketing Partners: Amazon



Scraped ~10K links

Extracted category of each product

50% electronics,
17% home goods,
8% Beauty,
8% DIY

Fun fact:
Technology is a top performer in affiliate marketing.

Conclusion:

That's all, folks!

Effective Marketing

WHAT

Analyze consumer interactions to understand ***what*** they want.

Energy Consumption

WHEN

Evaluate ***when*** the consumer is most likely to purchase a specific product.

Exploratory Analysis

HOW

Optimize ***how*** ROI and product margin can increase annually.

If I had more time...

- Find other datasets/observations to support trend hypothesis. See usage impact of CoVID-19.
- Scrape more than just Amazon links: find out which categories are most advertised.
- Compare trends from parallel social media platforms, including TikTok and Instagram.

What impact did CoVID have in consumer demand?

What's the dominating marketplace platform for each category?

How do interests vary across platforms and age groups?