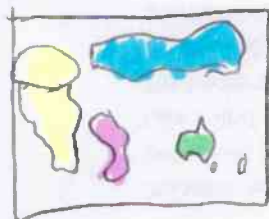


IDEAS

WORLD VIEW / COUNTRY COMPARISON

Choropleth



Grouped bar Histogram

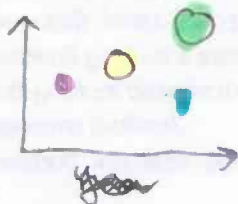


TRACKING AN INDIVIDUAL STRATEGIES STATS

Line



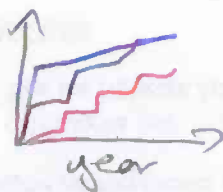
bubble



table

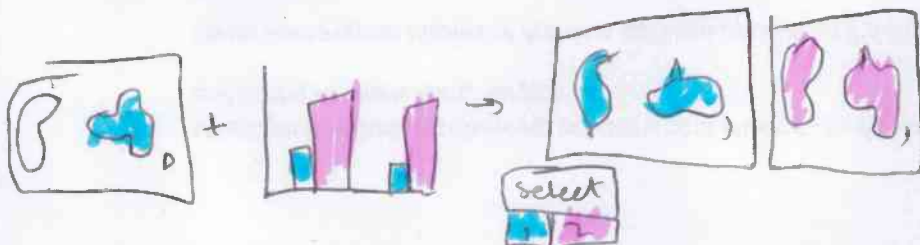
year	~
year	~
year	~
year	~

TRENDS GLOBALLY OVERTIME



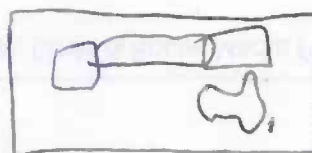
COMBINE & REFINE

TOGGLE CHOROPLETH MAP



FILTER

WORLD VIEW

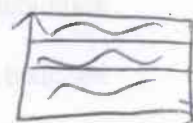
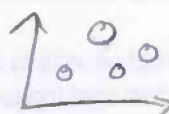


- saturation shows quantity
- easy at a glance

TRENDS WGR TIME



INDIVIDUAL FOCUS



CATEGORIZE

WORLD VIEW

- Shows quick comparison
- quickly identifies interesting spots in the data

Focus

- Extends from world view
- goes into more depth

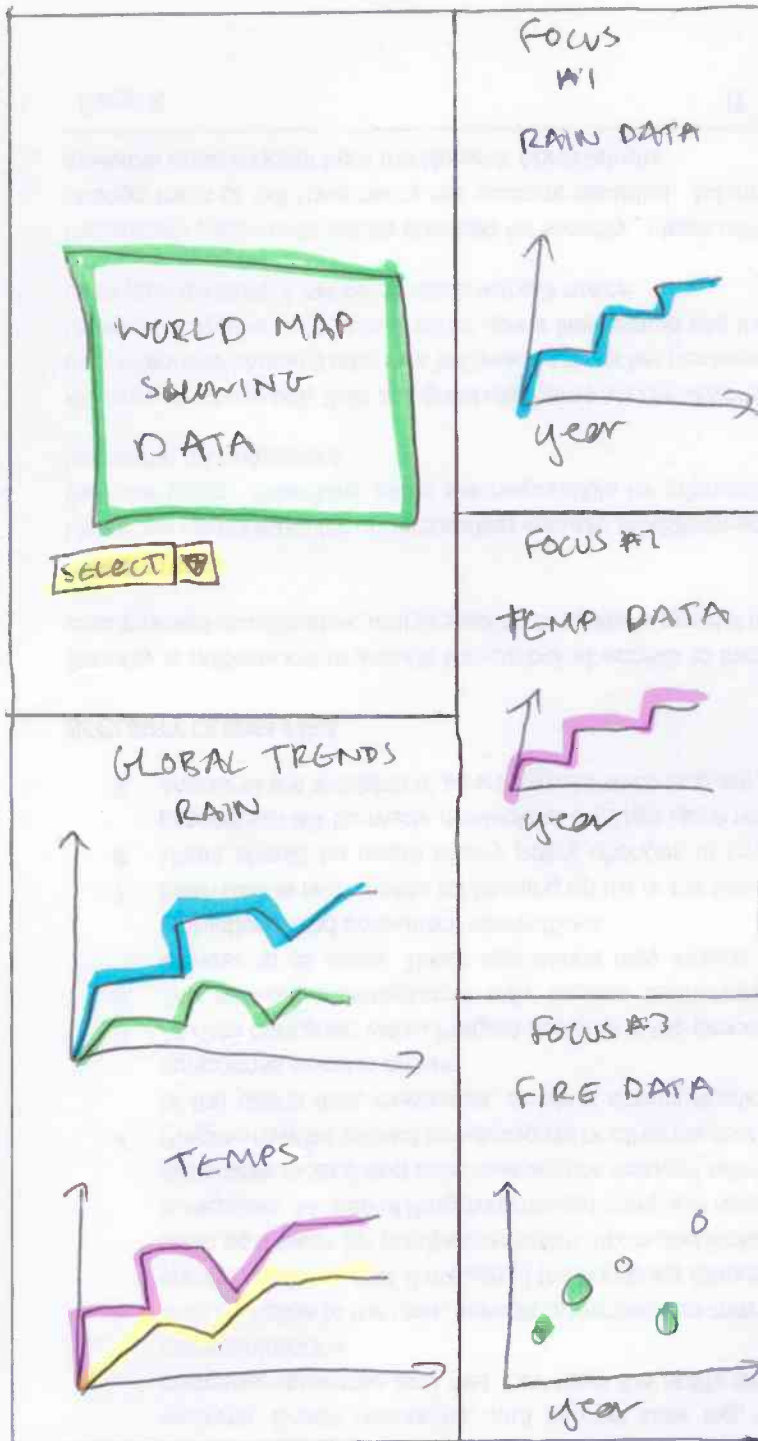
COMPARISON / TRENDS

- see if trends are similar across countries

POSTH QUESTIONS

- How are the rainfall / temp linked to the amount of wildfire damage?
- Are there any other trends in the rain vs temp data?
- Which countries are affected the most / which are stable?

LAYOUT



SUMMARY

TITLE: MAP FOCUS + SIDE PANEL
AUTHOR: DILSHAN PERNANDO
DATE: 2/16/25
SHEET #: 2
TASK: BROAD + FOCUS MODE

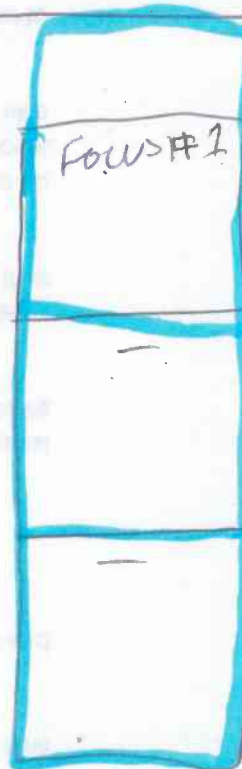
OPERATIONS



choose country from dropdown

focus panels update to show chosen country stats

- global trend line highlights chosen country



Focus

- lots of focus on the side panels and the map
- helps user see the story of a country, global trend lines help contextualize the data

DISCUSSION

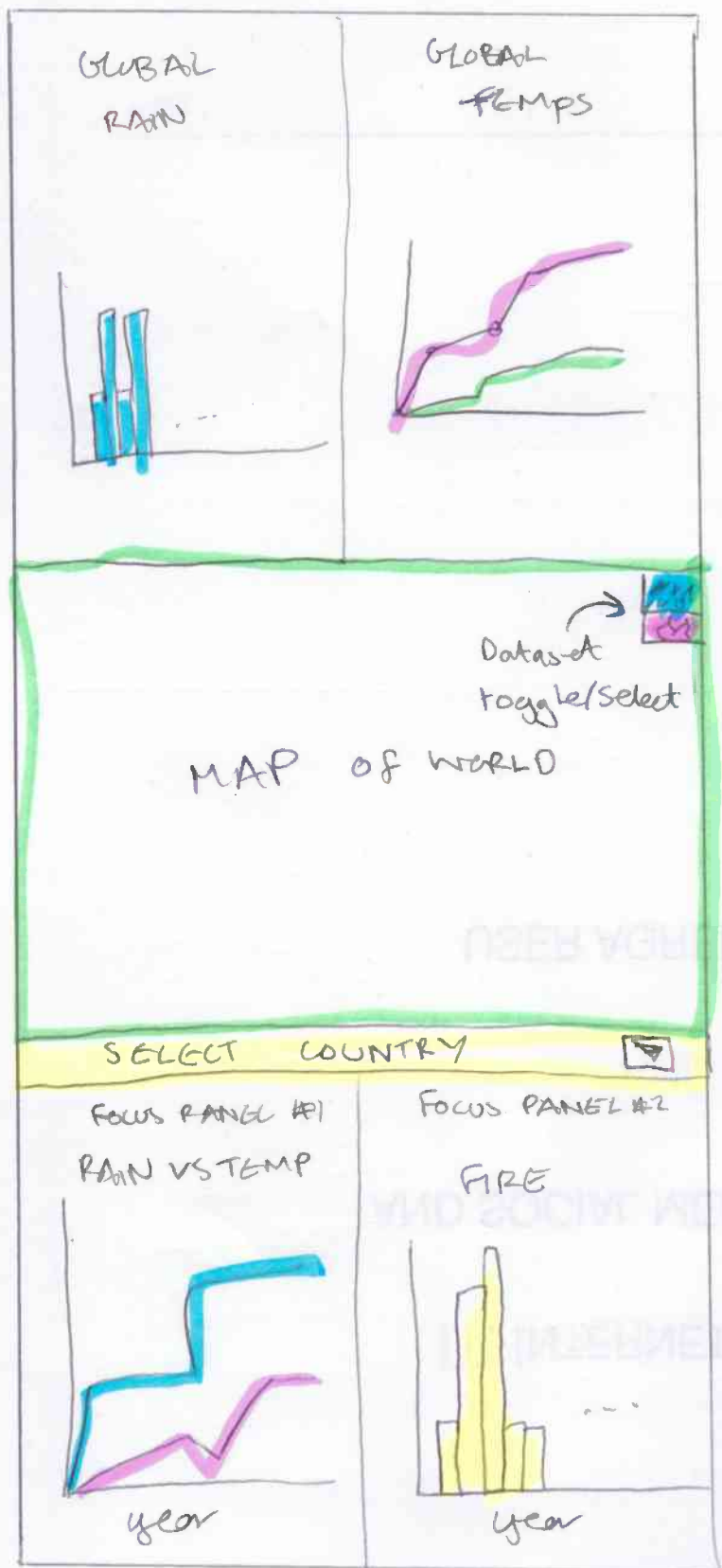
Pros

- can show lots of info
- high interactivity

cons

- maybe not enough space
- some countries do not have enough data to focus on them.

LAYOUT



FOCUS

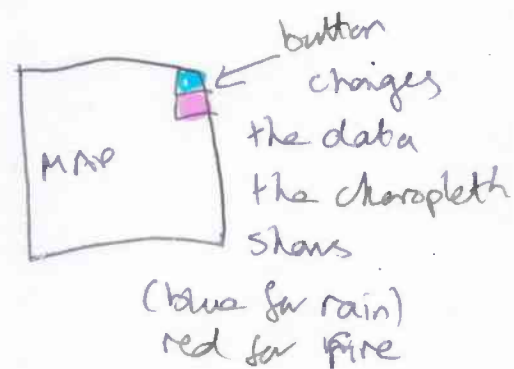
- MAP is the biggest focus
- central element that is the largest and controls other panels



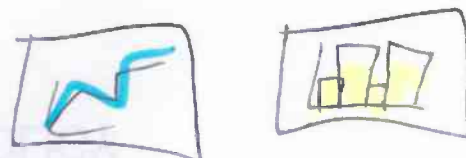
SUMMARY

TITLE: CENTRAL DESIGN
AUTHOR: DILSHAN FERNANDO
DATE: 5-10-25
SHEET: 3
TASK: MAP FOCUS

OPERATIONS



select



- choosing country changes selections to match country data

DISCUSSION

- better storytelling

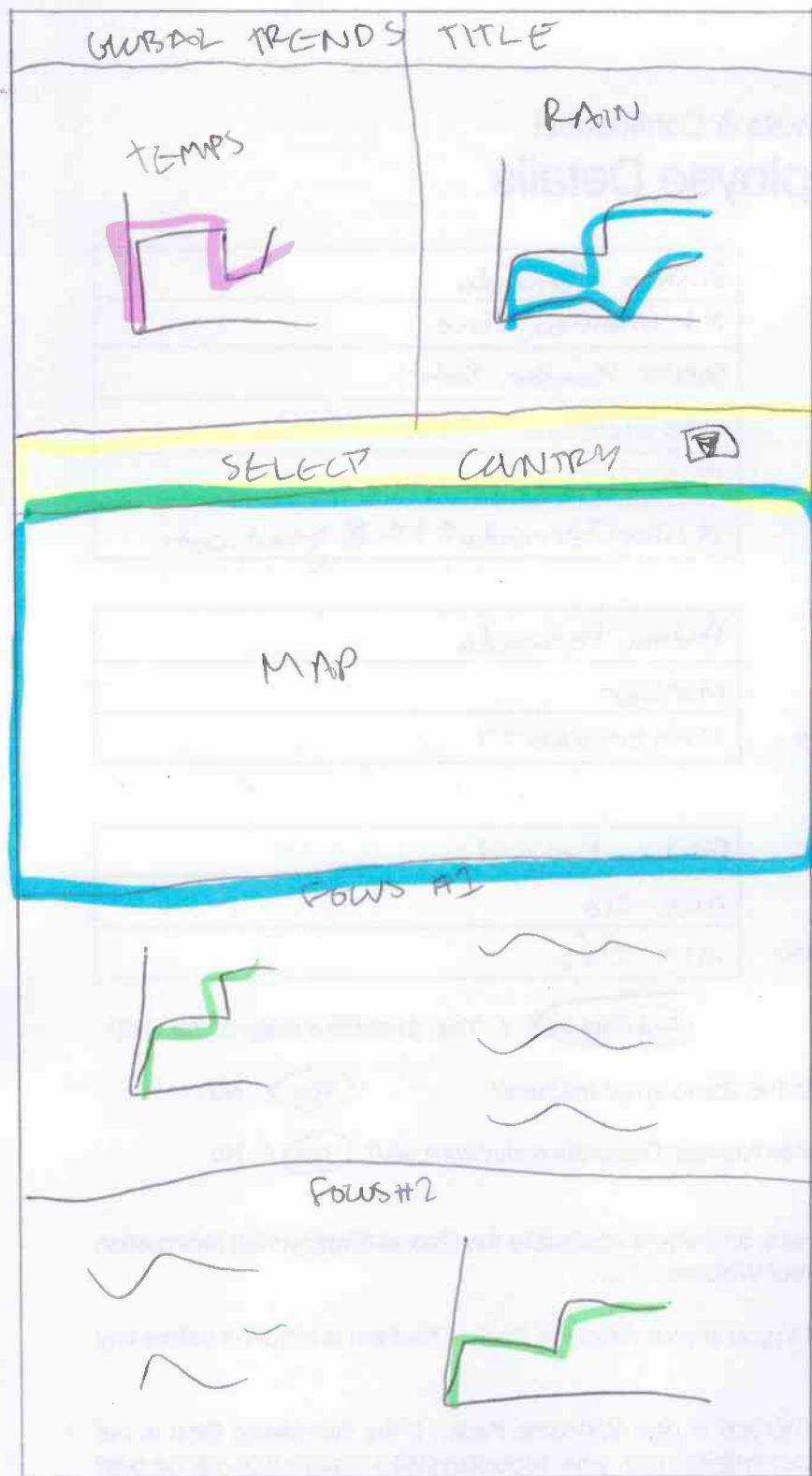
PROS

- MAP is obvious
- can show lots of different data without overwhelming

CONS

- Hard to space properly
- Titles for main piece will be heard

LAYOUT



Focus

- main focus is on the specific country data once chosen
- the content tent helps draw the eyes and make connections

SUMMARY

TITLE: SPACED OUT

AUTHOR: DILSHAN FERNANDO

DATE: 5-10-25

SHEET: 4

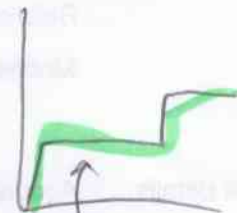
TASK: In depth content

OPERATIONS

SELECT ▾

- changes map focus and panels

Global Idioms



- linked to focus country select box to highlight chosen country

DISCUSSION

Pros

- good content for share data due to paragraphs

Cons


- content can be different for different countries

Title: Final implementation
 Author: Dishan Fernando
 Date: 5-10-25
 Sheet: 5

Task: combine and refine

OPERATIONS

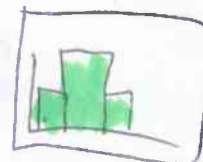
Drop downs filter data

 For the map
 AND the two
 "in depth" graphs
 next to the
 map

No selection



COUNTRY NAME



The two focus panels
 are line graphs when no
 country is selected but turn
 into bar chart when a
 country is chosen

- Both versions have
 hover tooltips

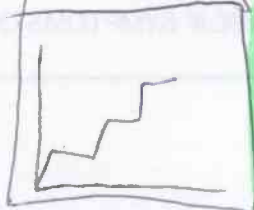
- Map has tooltip

TITLE

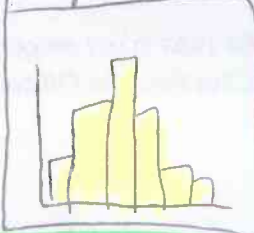
MAP OF X72

MAP

Fire severity



of fires



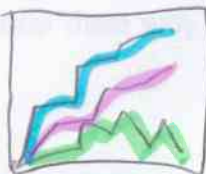
COUNTRY



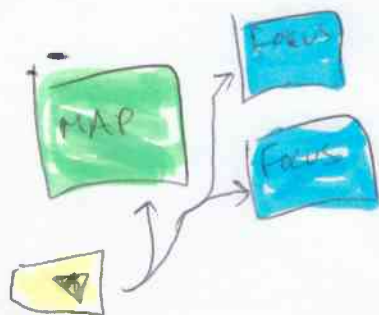
RAIN/FIRE



GLOBAL TRENDS



Focus



- The interactive top
 half allows the user to
 choose what they
 want to see

- Draws attention and
 shows the most
 detail.

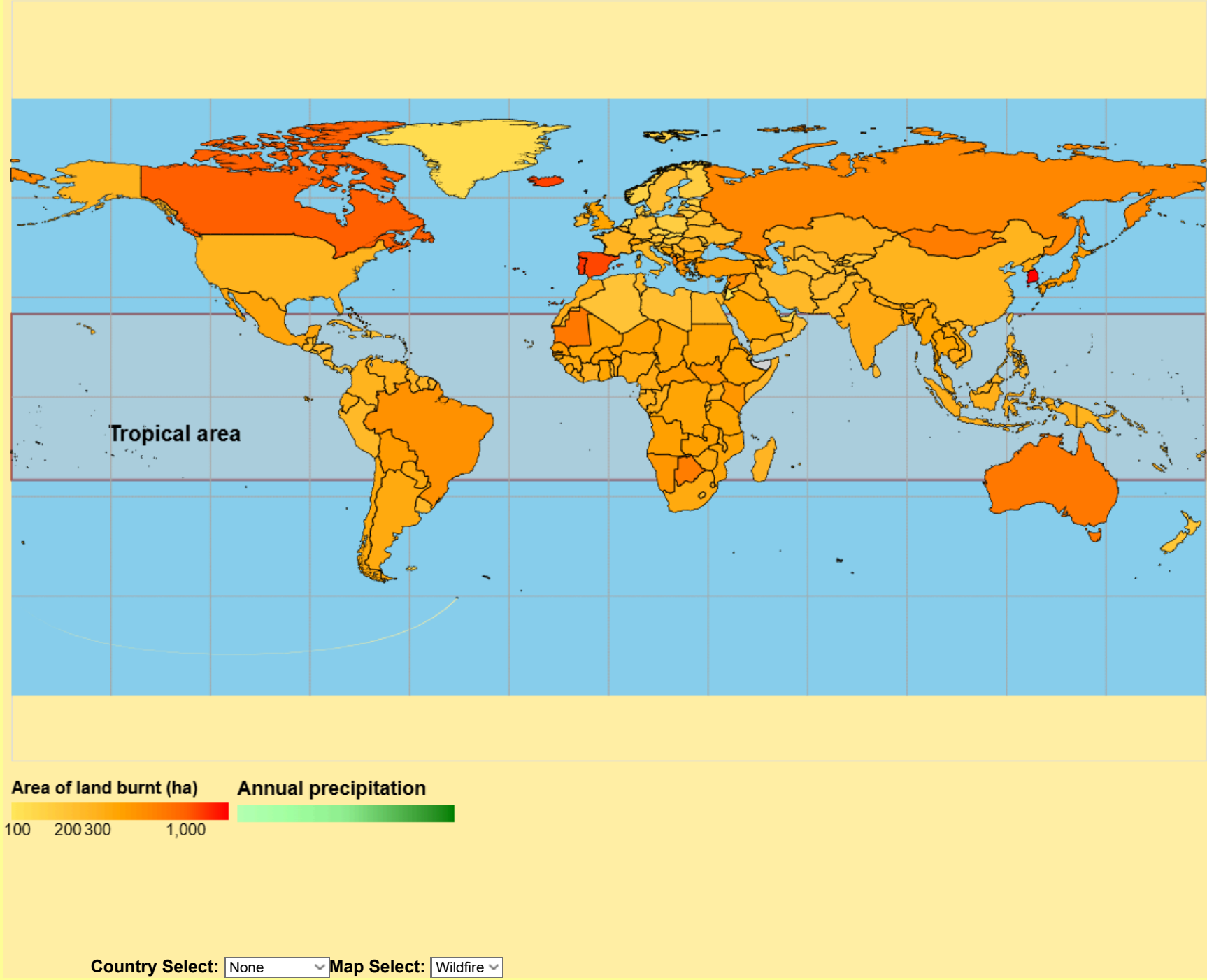
Detail

- 1 week to implement
- Uses HTML & CSS
- All idioms are feasible
 in HTML/JavaScript
- Make sure to align
 x-axis years where
 comparison occurs

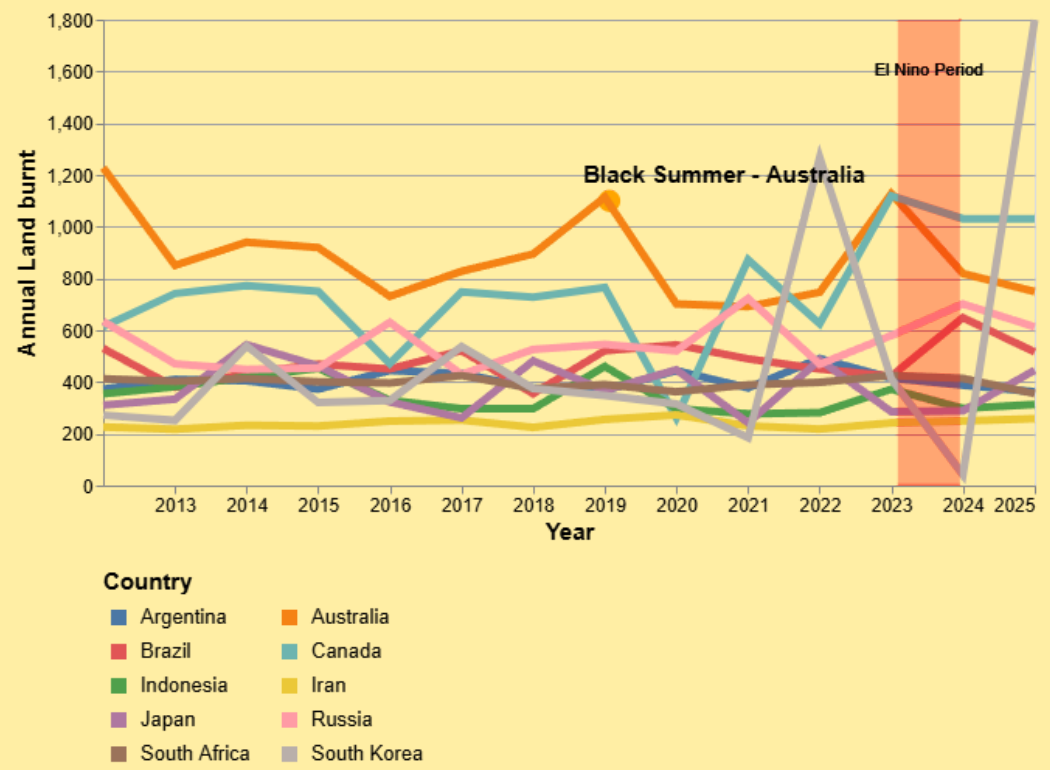
WILDFIRES AND THE EFFECT OF GLOBAL VARIABLES

We are looking to investigate the global affects of environment and how the potential changes in rainfall and temperatures may contribute to a change in wildfire severity and occurence. **Select a country using the dropboxes below** to look further into the data about these countries! You can have a look at the rainfall worldwide as well by selecting "Rainfall" in the map select dropdown.

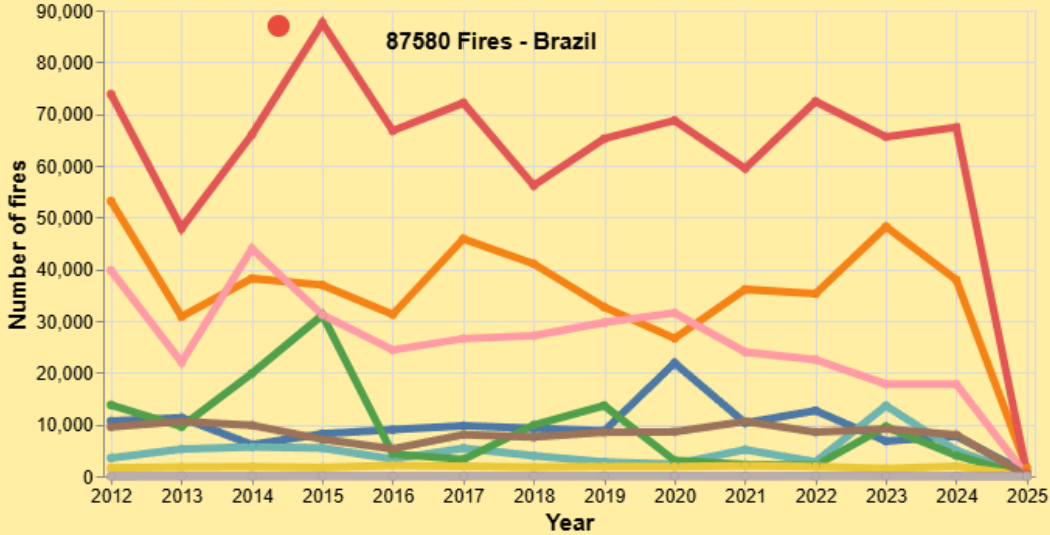
Most recently recorded landmass burnt by wildfires in every country



Annual landmass burnt in wildfires over time in each country



Number of wildfires occurring in each country



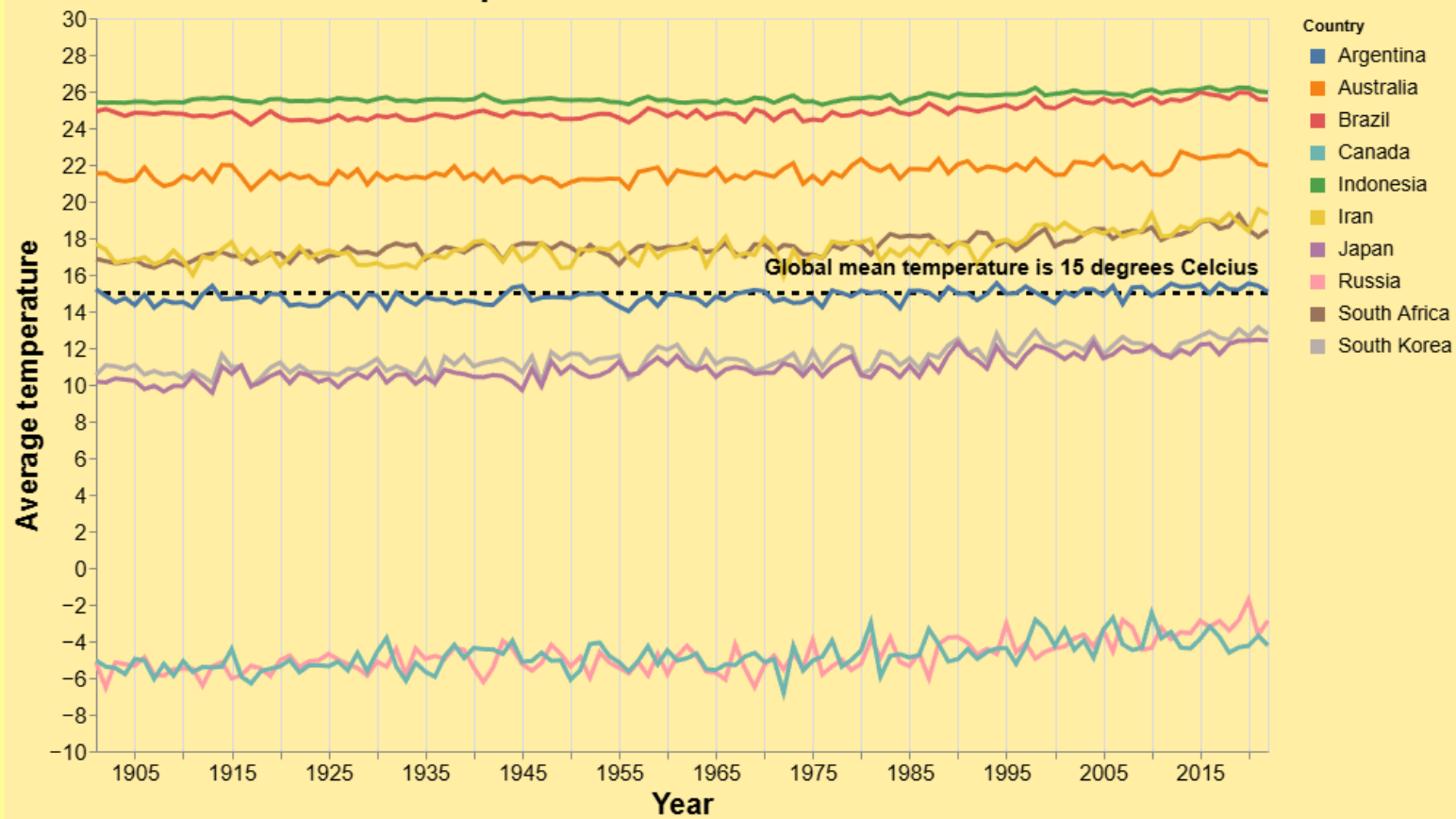
An interesting trend in the above data showing how despite Brazil having consistently the highest number of fires, the severity of these fires are quite low. When compared to a country like Australia who has lower numbers of fires but a higher average landmass burnt per year, Brazil seems not to suffer as much damage in terms of area burnt.

Another interesting highlight is how countries that have more of a rainforest or jungle environment (such as Indonesia or Argentina) tend to have lower amounts of wildfire activity, possibly due to the nature of the weather in those areas.

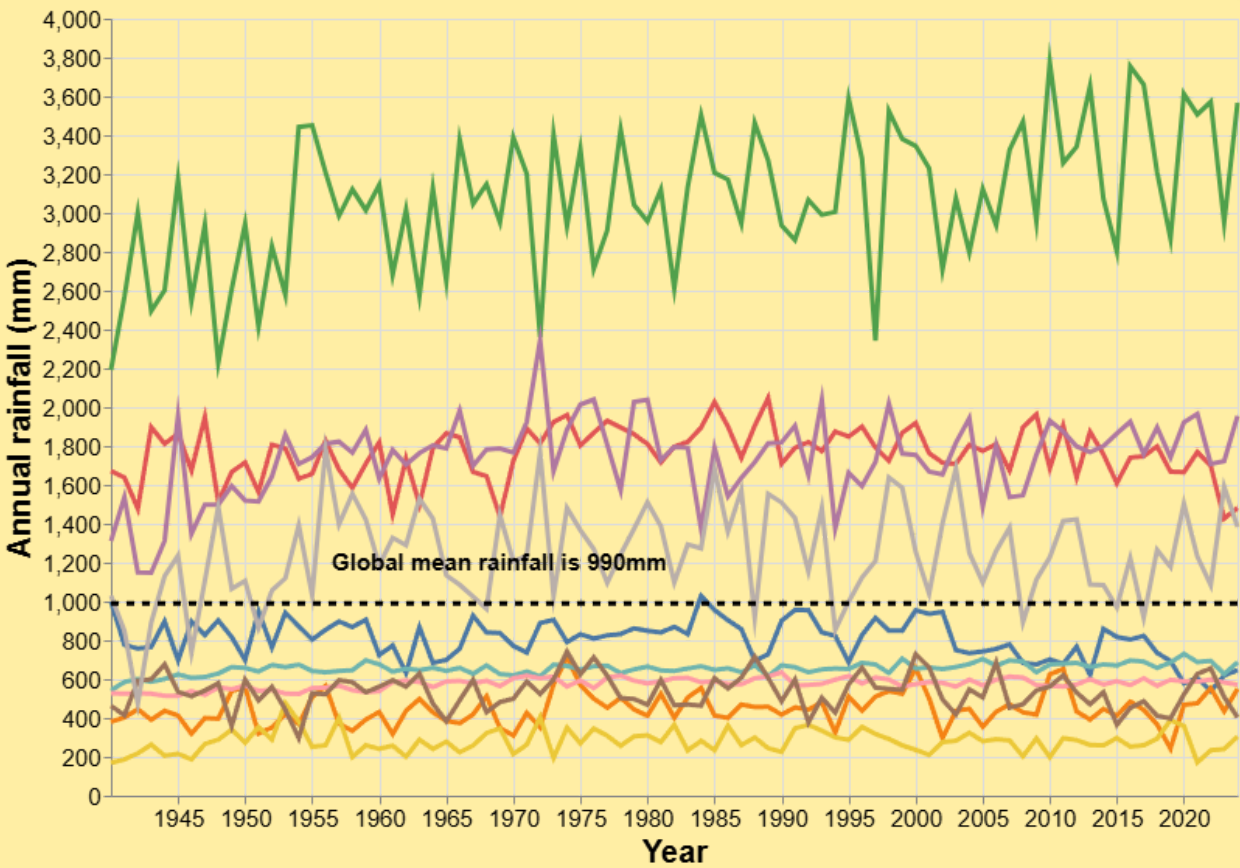
It is also highly visible that the countries that lie within the tropics have a lower overall wildfire effect and a higher average rainfall.

Global Environmental Trends

Record of annual temperature over time across different countries



Record of annual rainfall over time across different countries



On the left is a comparison of the global temperature changes from countries of varying environments. It's clear to see that over the past 30 years, there as been very little variation in the average temperature. This is expected and shows that at least in this short term, there are no apparent trends that are easily determined.

The average rainfall chart on the right helps to show just how varied the amount of rain can be for different climates with countries such as Indonesia situated in the tropics having significantly more rain, with a larger variance on it's annual rainfall, it shows the importance of rainfall in the wildfire occurence chance as Indonesia has the highest average temperature and yet has one of the lowest wildfire occurence rates out of all of the compared countries.

Date published: 18/10/2025

Author: Dilshan Fernando

Data sources:

[1] <https://data.worldbank.org/indicator/AG.LND.PRCP.MM?end=2021&start=1961&view=chart&year=2018>

[2] <https://ourworldindata.org/wildfires>

[3] <https://www.kaggle.com/datasets/nafayunnoor/annual-number-of-wildfires-per-country-2012-2025>