Tiger King or Tiger Tyrant: Report on tools and Sources

Main topic - Animals (exotic) and human impact on them **Subtopics**

(Tiger) pets: Imke, Sebastiaan, Jesse

Regulations: Jasper (3x)

Human Influence: Daniela (2x), Sebastiaan, Jesse

Animal Facts: Jesse, Imke

Extinction: Sebastiaan, Daniela, Imke

Used materials

For this project, we have all made use of Kendo UI. Using some of the demos available we have created our various visualizations. To add up to that we made use of some Kendo add-ons from the Kendo library. We have used IntelliJ and GitHub to edit and merge all the different parts of the coherent story that we have made as an end product. The coding language used was a combination of Javascript (80%) and HTML(20%).

We have chosen to use Kendo UI for multiple reasons. Firstly we wanted to make something that was very interactive. Using Kendo would allow us to really make something that the user can interact with and manipulate, making it a very interesting material to work with. To add up to that, we also wanted to create a small challenge for ourselves. This was a good tool for that since it was not the easiest available whilst still being in our domain of interest. Nearly no one in the group had ever used Kendo UI except for Jesse who uses it in a professional setting as well. Lastly, we wanted to create a website because it is easy to share and very accessible to many people.

You can view our end product here.

Sources per visualization

- 1. Tigers in The Glacial Period VS Tigers Now (Imke)
- Wikipedia (Tigers)

This source was used since it provided a complete and clear overview of the required data. The tiger page was used for the spread during the glacial period and for the picture of where tiger colonies are present now. These countries were then written down in a dataset and marked as having tigers. This is all visible in the used data source.

- 2. Amount of tigers left in the wild per country (Sebastiaan)
- WWF Datasheet Tiger (Tigers in 2010)

This source was used to collect data on the remaining tigers in the wild in the year 2010. The source is by the WWF which can be considered a very reliable source. Exact numbers are indicated to be only estimations of the real numbers since exact populations of wild animals are hard to track.

Worldatlas (Tigers in 2014)

This source was used for tiger populations in 2014. The source is by Worldatlas and lists its own sources which makes it a reliable source.

- 3. Exotic Mammals Kept as Pets in Canada (Jesse)
- Risky Business (Unregulated exotic pet trade in Canada), Anti-Fraud, Bribery and Corruption Policy
 This source is used to gather information about the number of exotic animals kept as pets. The source
 is pretty reliable because the World Animal Protection organization seems to be very transparent and
 fights for a good cause. They also have a very clear policy against fraud and bribery.
- 4. Zoo's in the US per state VS animal captivity legislations per state (Jasper)
- Wikipedia (Zoos per US state)

This source is used to gather information about the number of zoos per state in the United States of America. The website is updated frequently and is thus considered relatively reliable and valid.

- Animal Legal & Historical Center (Ownership laws)

This source is used to find the intensity of law in the US regarding exotic animal ownership. The source is an official American website and can thus be trusted.

- 5. Endangered species around the world VS animal welfare laws (Jasper)
- Animal Protection Index (Animal welfare legislations)

Used to obtain data about the different intensities of legislation towards animal welfare around the world. The countries are ranked from A to G with A being the best there is and G being the worst there is. This company has locations around the world and is likely to have accurate data about the topics they provide.

- Endangered Earth (Endangered animal per country)
 Used to gain totals of endangered species around the world per country. The amounts on the website are manually combined and synthesized in excel.
- 6. Animal trophy import in the US VS hunting legislation in various countries (Jasper)
- Trophy hunting by the numbers (Amount of exported trophies per year)

 This source is a research about the animal trophy import from into the united states. In the document, a lot of information and data is given. The data that we have used is the timeline of totals throughout the year and the hunting legislation in various countries.
- Wikipedia (Hunting legislation in New Zealand), Wikipedia (Hunting legislation in Tanzania), Wikipedia (Hunting legislation in Argentina), Wikipedia (Hunting legislation in Zambia)
 The legislation in some countries was not provided in the initial document that we used for the visualization regarding trophy animals. Therefore we had to manually search for the laws. These were the websites that we have used to find information about legislation. We have tried to use official sites to make sure that the information is valid and reliable.
- 7. Animals used for meat consumption over time (total and subdivided per category) (Daniela)
- EU Open Data Portal

This website provided datasets on the total weights of different types of meat registered in slaughterhouses on a yearly bases. This data was not available for all countries in Europe. The countries for which there was no data were excluded from the dataset completely, to avoid visualizing weird proportions. The countries excluded were: the Netherlands, Luxembourg, Kosovo, North Macedonia, Norway, and Liechtenstein. This website contains a lot of datasets of practices within the European Union, publicly available to "unlock their economic potential" and be as transparent as can be.

- 8. Incidents in U.S. Zoos (Jesse)
- Big Cat Incidents in the United States

This source provides news stories of incidents that happened in zoos around the U.S. It is relatively reliable because generally, PETA takes their facts pretty seriously even though they are not the most trustworthy organization, in general, they do want to educate the public as good as possible.

- 9. Amount of zoos, aquaria, and dolphinariums per continent (Daniela)
- Wikipedia (Continent size and population)

This source was used to determine the sizes and populations of all continents (excluding Antarctica). Although Wikipedia is not the most reliable source, it was decided to still use it since it provided a clear overview and referred to a trustworthy source (United Nations World Population Prospect).

- Wikipedia (Zoos per country), Wikipedia (Aquaria per country), Wikipedia (Dolphinariums per country). These sources were used to create an overview of the number of zoos, aquaria, and dolphinaria per country. This dataset was created manually based on the input on these pages. Because of the high amount of data versus the amount of manual labor, as well as the inability to find an already existing dataset on this topic, Wikipedia was used as a valid source.
- 10. Deforestation between 2000 and 2005 (Sebastiaan)
- Mongabay

- This source was used to collect per country data on deforestation. It is collected from the Food and Agriculture Organization of the United Nations which means the data should be very reliable.

11. Deadliest animals on earth (Jesse)

- GatesNotes

This source is used to create an overview of the deadliest animals on earth. It is fairly reliable because Bill Gates is known as a very generous philanthropist who is dedicated to educating the world about a wide variety of issues.

- BBC

This source is there to support the numbers found on gatesnotes.com. The BBC is generally known as a very reliable source of data and journalism.

- 12. Animal weight in kg vs. life span in years (Imke)
- Website of everything (Weight and lifespan of animals)

This website provided a clear data set that needed some pre-processing to match all animals together. There were over a thousand animals available that are now searchable on the visualization website.

- 13. Amount of endangered animal species per country (Sebastiaan)
- Endangered Earth

This dataset was used to collect comprehensive data on the amount of endangered mammals per country. The data is based on the IUCN (International Union for the conservation of nature) red list. The IUCN consists of both governments and civil organizations and is the global authority on the status of the natural world.

- 14. Animals extinct in the wild, categorized per continent of origin and animal class (Daniela)
- WWF Wildfinder Database (List of species)

This dataset was used to initially get a general overview of species that are extinct in the wild. As WWF is well-known and well-established, it can be seen as a reliable and representative source.

- IUCN Red List of Threatened Species (List of animals)
 - After gathering a general overview, this list was compared with the IUCN Red List to remove species that are not animals (e.g. plants) and/or duplicate listings. This source was also used to try and get an overview of the number of individuals of such a species still being alive, but this could not be done sadly.
- Wikipedia (Original location of animals)

To get input on their location of origin, the location of their natural habitat, Wikipedia was used to supplement the information retrieved from the previous two sources. In the end, it also ensured that the list of animals extinct in the wild was as true as could be (triple checking this).

- 15. Number of humans vs. mammal extinction rates relative to 1 (lmke)
- Our world in data (Human population since 10000 BCE)

This data set was picked from a group of data sets available on this topic. This data set was used because it was approximately the average of all the other data sets as well as the most complete one. The others were filtered out and a data source was made using only Our world in data.

- Wikipedia (The Holocene extinction timeline)

This source was used since it provided a complete and clear overview of the required data. As for the Holocene extinction, the timeline page was used. Then the extinctions were counted per period and divided by the number of years in said period.