

In this document are the different tasks for you to show your skills.

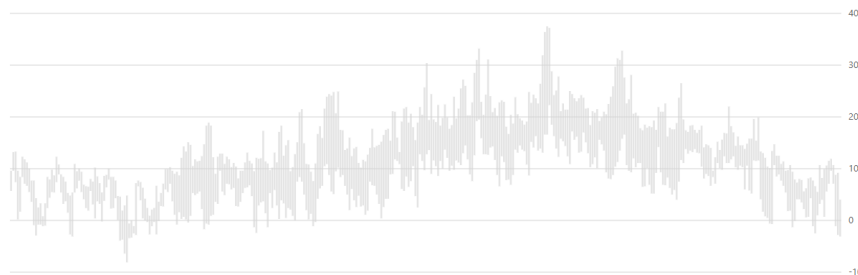
I do not expect you to complete everything, please just stop after about 6 hours. When you have time, select the bonus tasks with which you can best demonstrate your skills. In other words try to get as much value in the time you have.

The project folder contains a readme.md file that explains the project setup.

Main rule: you cannot use any other dependencies, libraries, external imports etc. for the assessment. All the code added to the project should be written by you.

If you run the project. You'll see a lot of bars. Each bar represents the maximum temperature of that day. It's one year of data from Dec 1, 2018 to Nov 30 2019.

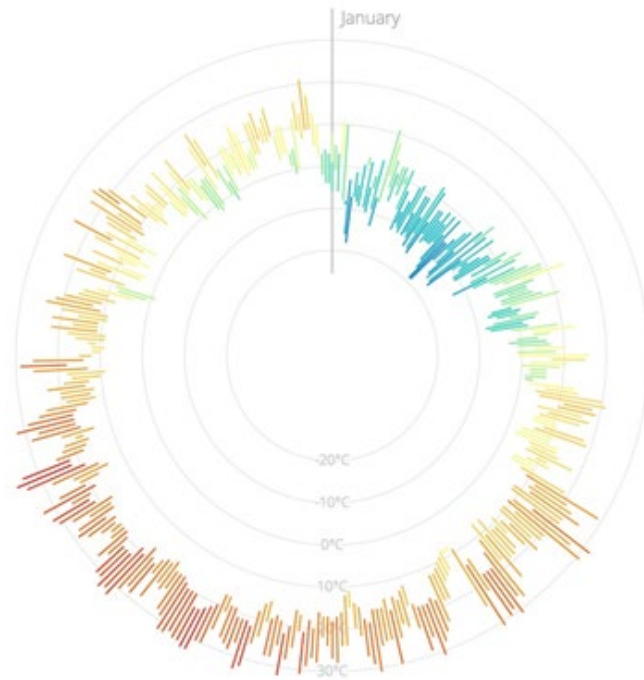
1. Explore the project and try to figure out how it works; read the readme.md file
2. It is a bit strange to use a bar chart for data that does not start at 0. In fact what we want to do, is connect the bottom of the bars to the minimum temperature, which is also available in the dataset. Try to get something like below:



3. Let's give this thing some color! Can you color each bar based on the average temperature that day? Blue for cold days, red for warm days seems a sensible choice. Try to make it look nice.
4. We do currently have a lot of bars, which might not always be ideal. We like to understand the temperatures by week. Check the file models/weather.js and use the method getDataByWeek to aggregate the data by week. Try to connect the weekly data to the visualization using the Connector component in App.js.
5. Bonus: ideally we use a gradient to color the bars. So the bottom of the bar will be

more blue and the top more red. Below image shows what we are after.

6. Bonus: We now have a pretty cool graph already, but let's try to make it even more spectacular! What about a radial graph? Can you make something like the image below?



- a. To do this create a new component, **keep the bar chart you already have!**
- b. Replace the grid line with circles from the example before
- c. Tip: lookup some information about the “transform” attribute, which will be quite useful for this.
- d. It's your choice whether you use daily or weekly data here
7. Bonus: when hovering a bar, can you display the day/week, and temperatures in the center of the circle? Or if you haven't done the radial graph perhaps you can show these values in a tooltip..?
8. Bonus: the dataset also contains hours of sunshine and amount of rainfall. Can you add this information in any interesting way to one of the graphs? You may not have time to execute your idea(s), but please write down your idea(s) in the readme file!

After you are done, zip the project (**without the node_modules and .git folders!**) and submit it by e-mail to: assessment@zolabo.com