

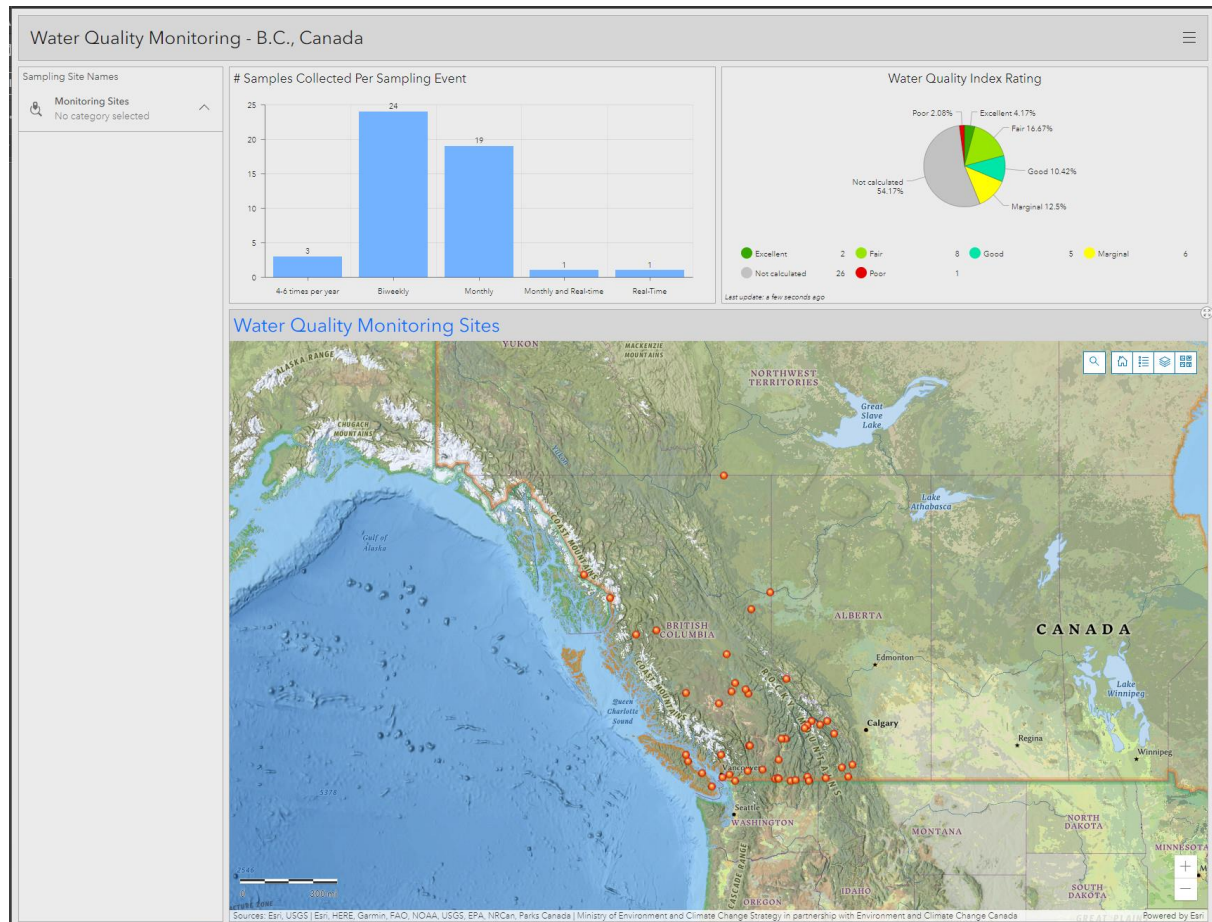
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Lab 6 – ESRI Dashboards
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I am using water quality monitoring data from [Canada BC Water Quality Stations](#) feature service layer accessed from ArcGIS online for this lab.

1. Link to ESRI Dashboard:

<https://www.arcgis.com/apps/dashboards/06d279d16e9743e397bfc163fab43a7b>

2. Screenshot of dashboard



3. This dashboard displays primary water quality monitoring data for streams collected by the Government of British Columbia, Canada. This data is suitable for anyone wanting to know the quality of the streams around them or that they may be traveling to, whether it is in excellent or poor condition. The dashboard also shows how often sites are sampled, informing the public how often their streams are being assessed. This information could be useful for anyone wanting to recreate (fishing, boating, camping) in or around these streams or government officials wanting to monitor an area for future restoration efforts.

Strengths: The graphs and side panel are interactive and link to the sites shown on the map. By selecting one or more bars in the bar graph and/or the slices in the pie chart, the sites

associated with that data are shown on the map, and other sites disappear. For example, if I want to view only the sites ranked as poor water quality, I would select the 'poor' slice in the pie chart, and only those sites would display on the map. The side panel drops down and shows all the site numbers displayed on the map. By selecting one or more sites, those sites will flash and pan on the map. A dialog box opens as sites are selected to show the attribute table related to that site.

Weaknesses: When selecting sites in the sidebar, the entire attribute table is displayed for that site. This can be cumbersome and overwhelming to the public, as it may show more information than they wanted to view or didn't expect. Also, if more than one site is selected in the side panel, the symbology disappears when it pans to the next item selected. Lastly, when sites are deselected in the side panel, the zoom on the map extent does not reset automatically.

Future Improvements: I would like to change/modify the dialog box that opens when clicking sites to show different information. This could possibly look like the stream name, if it is in a forest service area and name of the forest service area, lat/long information, water quality index rating, and lastly, a link to the attribute table with water sample analysis results (opened in a new window). That way, the user doesn't have to scroll through the dialog box to find basic information. The symbols disappearing when multiple sites are selected from the side panel could be resolved by removing the 'pan' action in the configurations. This will also resolve the map extent not resetting when sites are deselected from the side panel.