



Beluga whale in Churchill River estuary, Manitoba

## Summary

**Beluga Bits** is a **citizen science** project based on images collected in the Churchill River estuary in Manitoba, Canada. Every summer thousands of belugas gather in this estuary, providing a unique opportunity to study them and monitor their ecosystem. These belugas are part of the Western Hudson Bay population, which spend the winter in ice-covered waters far to the north. Each year when the sea ice begins to melt in the spring, these belugas travel south to estuaries and coastal areas within Hudson Bay. We still don't fully know all the benefits they gain by making the long journey to these areas. Estuaries may provide a safe refuge from killer whales, they may provide warmer water to help belugas moult their skin, or it may be a combination of these and other factors. One thing we do know is that in the Churchill River estuary belugas are close enough that we can peek into their underwater world and ask questions about beluga social structure and their natural history.

You can become a citizen scientist and help us learn more about beluga! Join us on **Zooniverse**, a web platform which hosts citizen science projects, including **Beluga Bits**.



### KEY TERMS

- **Citizen Science** - Public participation in scientific research, sometimes called community or participatory science.
- **Workflow** - A series of questions or tasks where citizen scientists can help researchers by providing answers or classifications.
- **Classification** - A set of answers provided by a citizen scientist within a workflow.
- **Data** - Information that can be collected and examined to help answer research questions.



### DISCUSSION QUESTIONS

1. **What did you enjoy about your experience while participating on Beluga Bits?**
2. **What is a question that you would ask a Beluga Bits researcher?**
3. **How do your answers on Beluga Bits contribute to what we know about beluga whales?**



### ADDITIONAL RESOURCES

- [Zooniverse | Beluga Bits](#) - Beluga Bits citizen science project
- [Zooniverse | Beluga Bits in the Classroom](#) - Classroom-friendly Beluga Bits project
- [Explore | Underwater Beluga Whale Cam](#) - Underwater beluga whale camera livestream
- [Zooniverse](#) - Main site for Zooniverse.org, an online platform featuring dozens of citizen science projects





Lion's mane jellyfish  
in the Churchill River  
estuary, Manitoba

## How to get started

1. Go to [Zooniverse](#).
2. Click [Projects](#) in the upper left corner of the site banner and scroll down to use the search function to find Beluga Bits.
3. Once you're on the [Beluga Bits](#) homepage, register as a user / login to your username using the links in the upper right corner of the site banner. You can participate without registering and logging in, but we do encourage you to do so.
4. Click [Classify](#) on the site banner or scroll down on the home page and select an active workflow under the "Get started" section. Complete the Tutorial, paying close attention to the instructions and examples given. Once you have completed the Tutorial, you're ready to get started!

## Choosing a workflow

Beluga Bits is an evolving project and you may see the available workflows change to reflect current data and research questions. While we encourage classrooms to contribute to the live workflows, we have developed classroom-friendly versions of past workflows.

When you are ready to start supporting belugas and citizen science, try the following:

**Beluga Bits** - This is the main Beluga Bits project, where students and teachers can participate in active workflows and contribute to the larger Beluga Bits dataset. Here students and teachers can also interact with the larger Beluga Bits and Zooniverse.org community.

**Beluga Bits in the Classroom** - This is the classroom-friendly version of the Beluga Bits project which will only be accessible to students and teachers. Here you will find classroom-friendly versions of past workflows which will help students develop observational skills but do not contribute to the larger Beluga Bits dataset.

## Where can I go if I have questions?

There are a few places you can look to if you have questions, aren't sure about a photo, or would like to learn more about a topic:

- **Tutorial** - Tutorials are available for each workflow and are designed to help you get started answering questions about the photos you are viewing. You can access a tutorial at any time while working on a workflow by clicking the "Tutorial" button at the top of your Task window.
- **Field Guide** - The Field Guide is full of useful information to help answer your questions about workflows, belugas, and our photos. You can access the Field Guide at any time while working on a workflow by clicking the Field Guide tab at the right side of your screen. Within the Field Guide, click on the question you are interested in to learn more and view example photos.
- **FAQ** - The [FAQ](#) provides answers to common questions about Beluga Bits and belugas in general. You can find the FAQ by clicking on the [About](#) button on the site banner and selecting FAQ.
- **Talk** - The [Talk](#) forum is a great platform to ask questions and engage with the Beluga Bits community. You can access the forum by clicking on the Talk button within the site banner, or if you want to discuss the photo you are looking at within a workflow you can click "Done & Talk" in the lower right corner of the Task window.