

## Crosscurrents Exhibition 2024:



Project: **Diatoms – Jewels of the Sea**

Artists: Niki Collier – felt designer and visual artist  
Cathy Dillon – writer and artist  
Brian Fitzgerald – artist & illustrator



Niki



Cathy



Brian

## Project outline

For our Crosscurrents project we are jumping into the sea to explore the amazing world of diatoms, with an installation incorporating felt sculpture and audio.

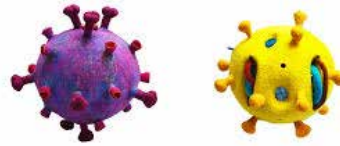
Diatoms are tiny organisms, or microalgae, that are found in abundance in the oceans, waterways and soils of the world. They are both ordinary and extraordinary.

Living diatoms are vital for the health of the planet and for us: they generate between 20 and 50 per cent of the oxygen we breathe every year. They make up nearly half of the organic material found in the oceans and serve directly or indirectly as food for many animals.

Diatoms are unicellular organisms – they occur either as solitary cells or in colonies which can take the shape of ribbons, fans, zigzags or stars. They are unique in that each one is surrounded by a cell wall made of transparent, opaline silica called a frustule. These ‘glass houses’ are perforated by intricate and delicate patterns, and they cause colouration of the structures – diatoms have been described as ‘jewels of the sea’ and ‘living opals’.

They are the most common type of phytoplankton algae, but populations are declining. Scientists attribute this decline to the acidification of the oceans due to climate change. A recent study published in Nature magazine predicted that ocean acidification will drive a global decline of diatoms by between 13% and 26% by the year 2200.





We are in the process of creating an interactive felt sculpture, with audio text, inspired by and illuminating these fascinating organisms that are both beautiful and essential for the functioning of our planet. Our aim is to make a piece that is engaging, accessible and playful, and suitable for both adults and younger people.

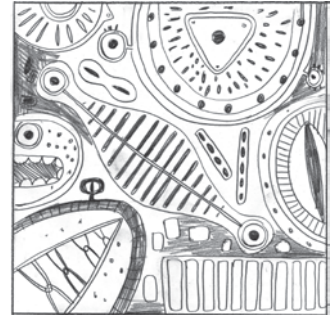
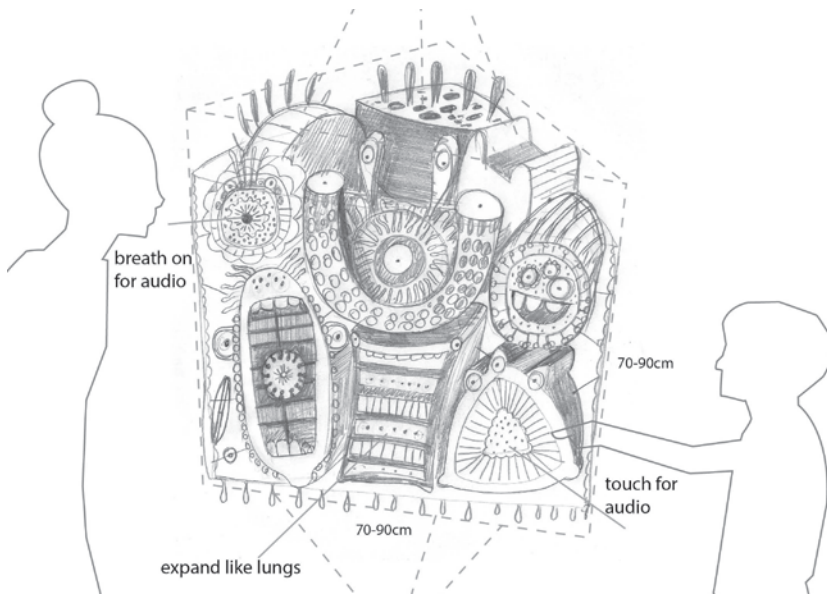


We began our collaboration in Autumn 2023 with an initial in-person meeting in Dún Laoghaire to discuss the idea and how we could go about creating our artwork. Once we had decided on our theme, we started our own WhatsApp group so we could chat about the project in between meetings.



We held a meeting over Zoom in November and we all came together in person on December 19 for a felting workshop in Niki's studio in Marlay Park, Rathfarnham, where we created the initial parts of the felt sculpture.





Brian usually works in 2D as you can see from his early, detailed sketches. Niki is the 3D expert and she set about taking elements from Brian's drawings that would work well in a 3D sculpture. Brian then made a 3D model in clay – still quite detailed – which he intends to simplify even more for the finished piece. He used the photographs of the models to create a coloured artwork as a rough guide to suggest a side view of the intended sculpture.

Niki was really inspired by both Brian's and Cathy's work.

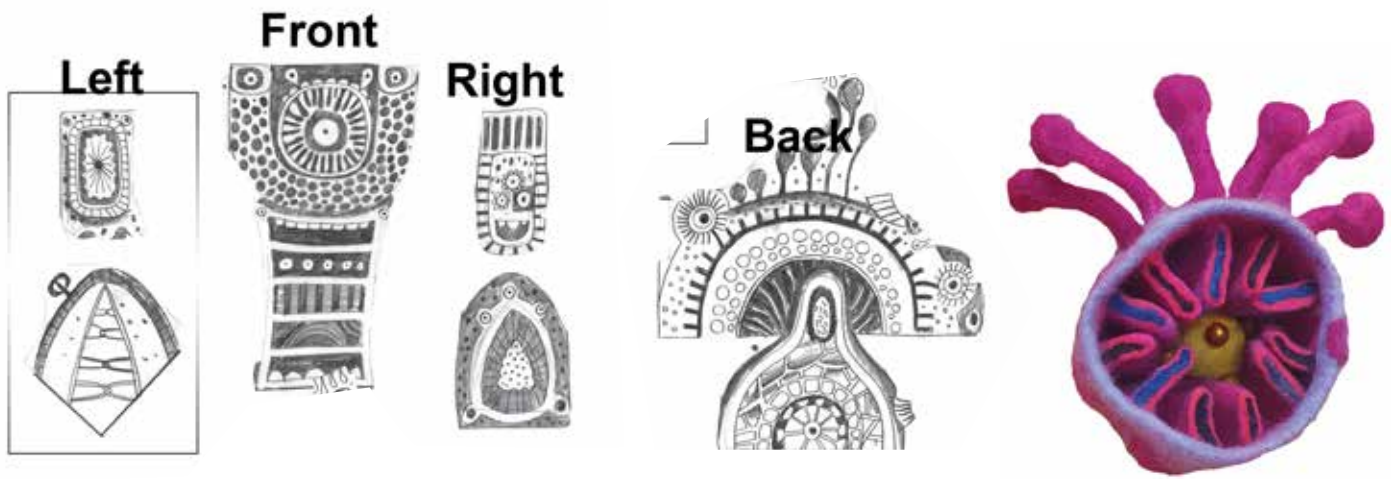


She started exploring Brian's work by making some of his illustrations from the Moon and the Sun into sock monsters.

She read Cathy's poetry and the insightful words were both source of healing and inspiration.

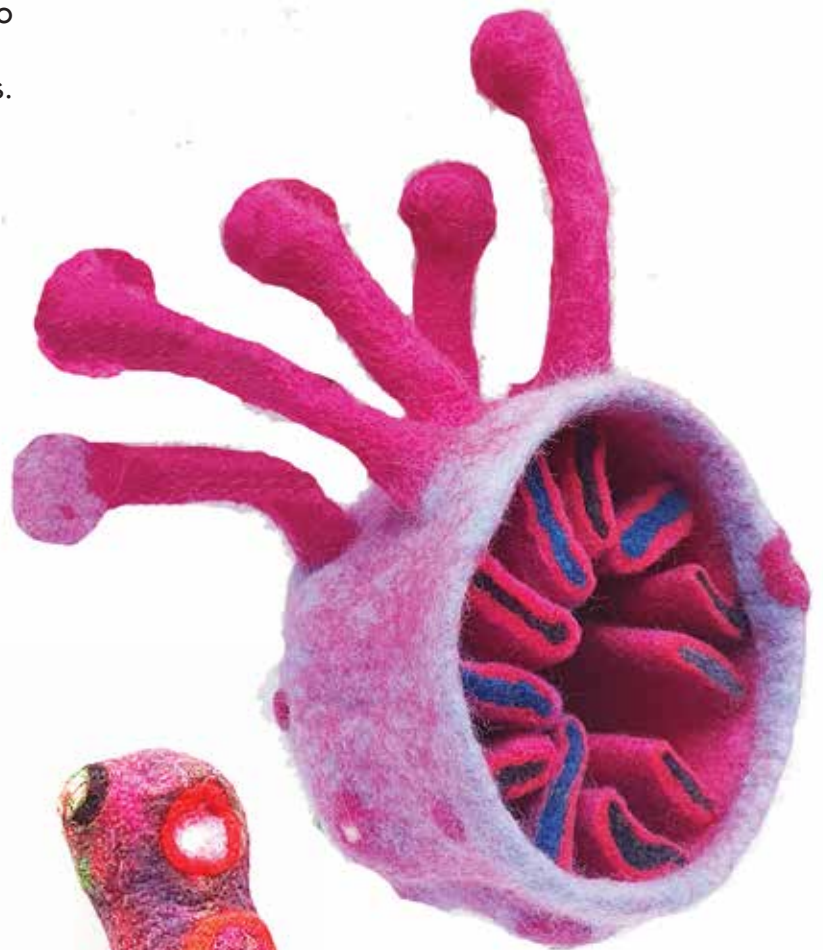
One of the poems was the foundation for creating Niki's new work in free-hand machine embroidery on felt.





Brian's initial drawings served as an engine to start exploring the components of the diatoms.

Niki is in the process of making enough diatoms to allow for the group to work on putting the box of monsters together to create a beautifully chaotic and clever interactive offering that is accessible to all.



Not sure what to put here as a finish ..do we have some snaps of digital speakers or buttons we might use for the audio?

Cathy's prose poems will be incorporated into the felt sculpture using digital technology so that they are activated when people interact with the piece.

Since Christmas, we have been in regular contact and, as the photographs show, have progressed quite a lot further with our project. We are enjoying our collaboration very much and we are confident that we can deliver an engaging and thought-provoking piece for the exhibition.

A line drawing of the sculpture in the gallery with student pointing at it.

Question: how do we best install it. Hanging from the ceiling which means it'll move a lot when touched or on a plinth...or some other way?