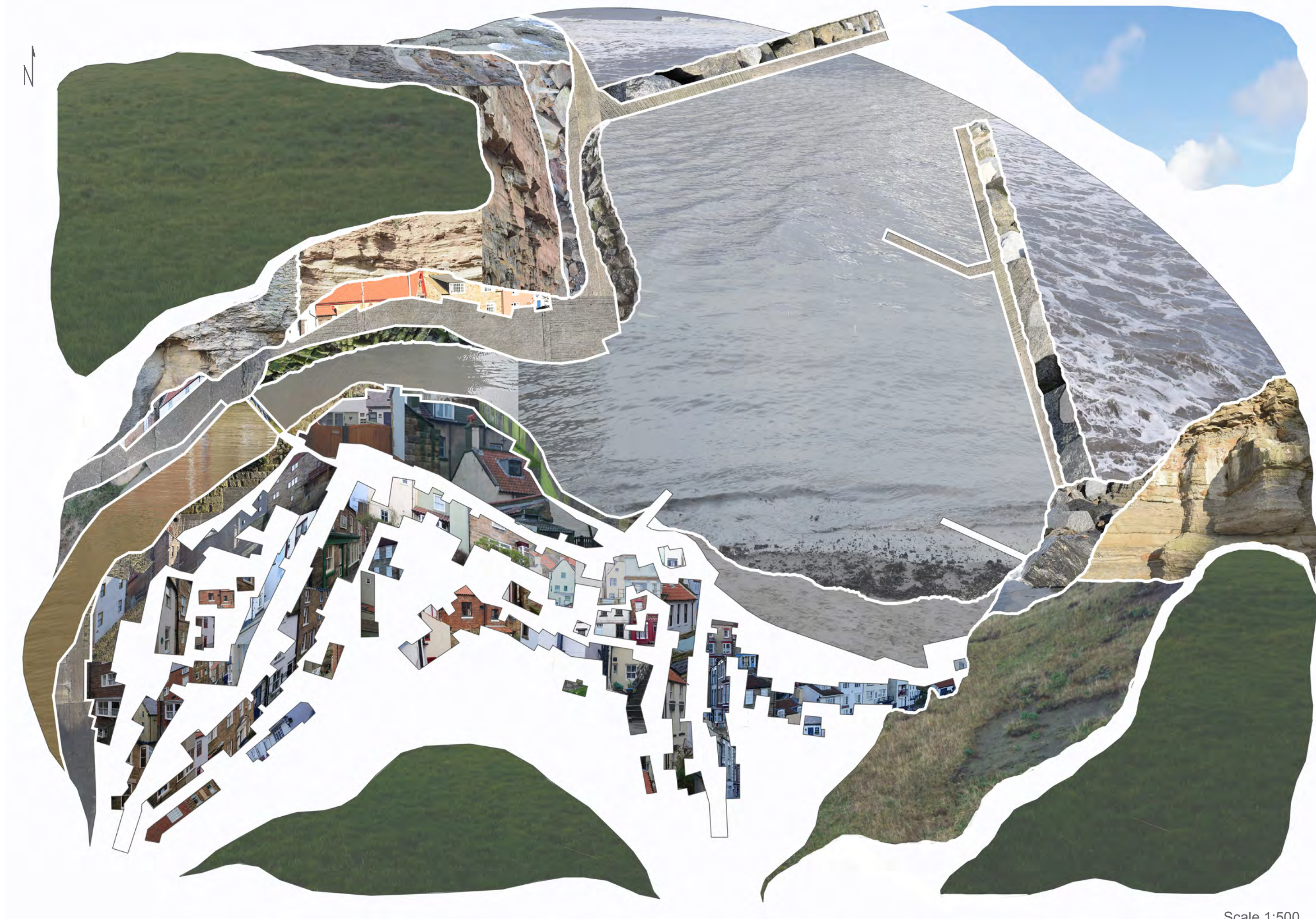


CODING DESIGN





Scale 1:500

Staithes is a small old village in Yorkshire by the North Sea facing north. The village is full of aging textures, human made and natural. The contrast of the natural and the artificial environment is strong and clear. In the details of the towns surroundings, one can notice, how time can form the environment and also blend the artificial with the natural. The drawing above record different textures, natural and artificial, and their interaction in details and as a whole. The images below show the town and the cliff as one.





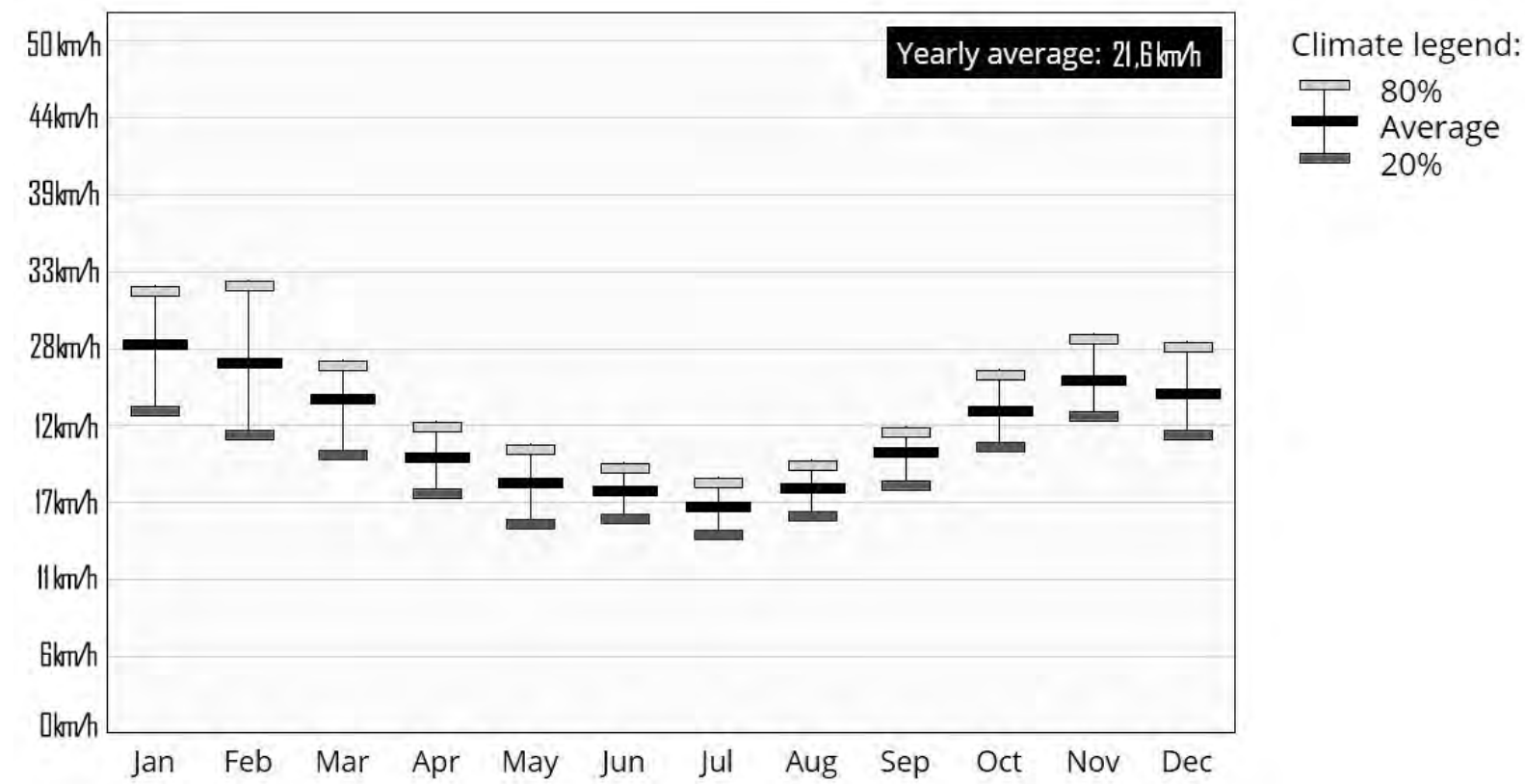


The site is located at the end of the town surrounded by the **hard solid** rock from one side, and the **soft fluid** openness of the bay and the sky from another. And it also has a contrast in its boundaries, where it is structured and angled from the back and almost free from the front Scale 1:500

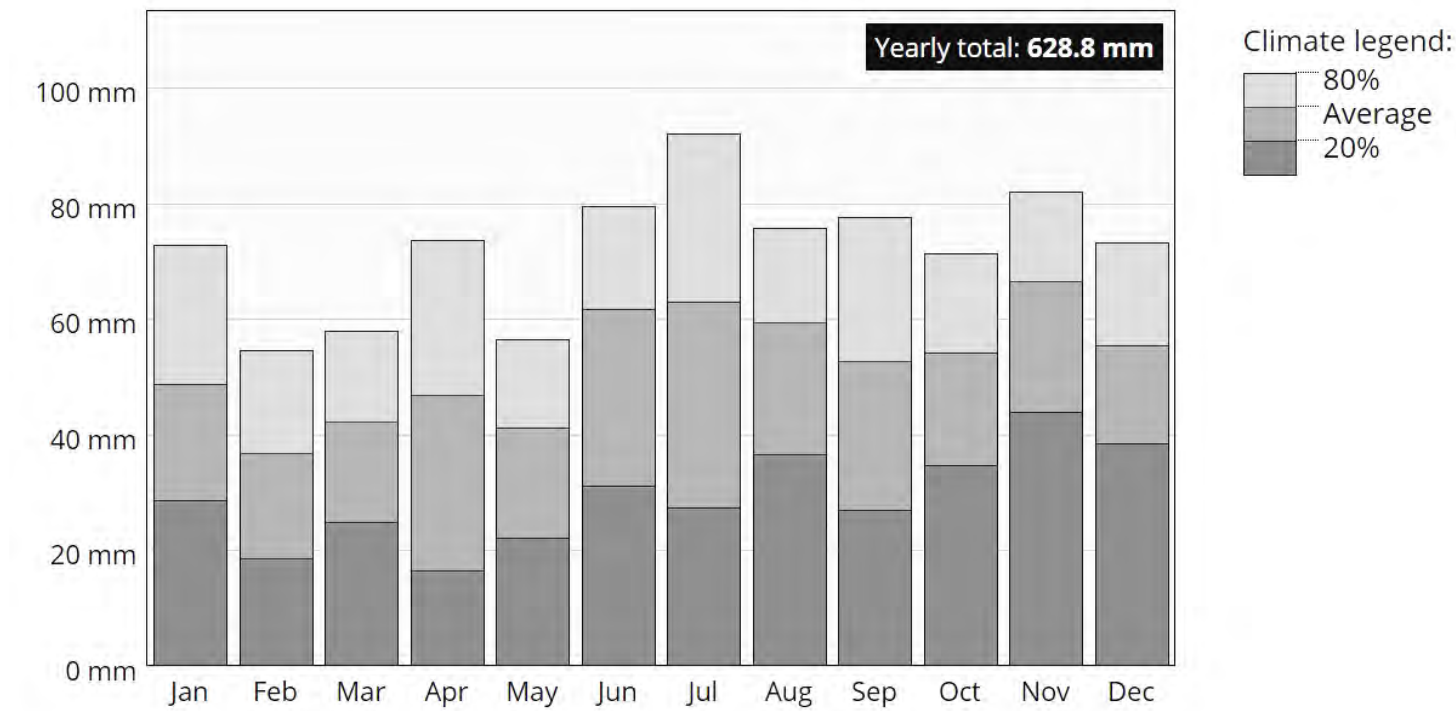




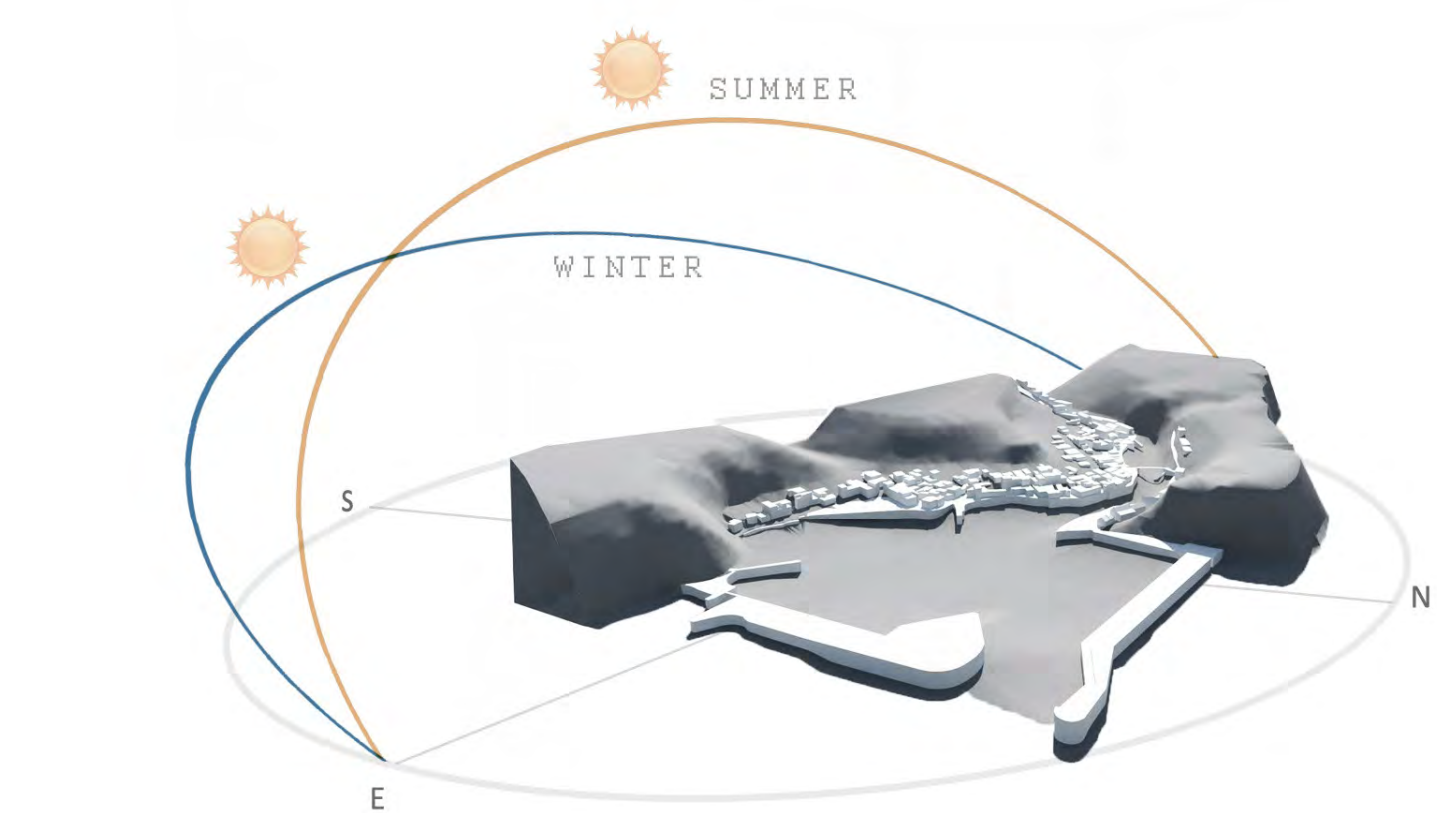
STAITHER WEATHER ANALYSIS



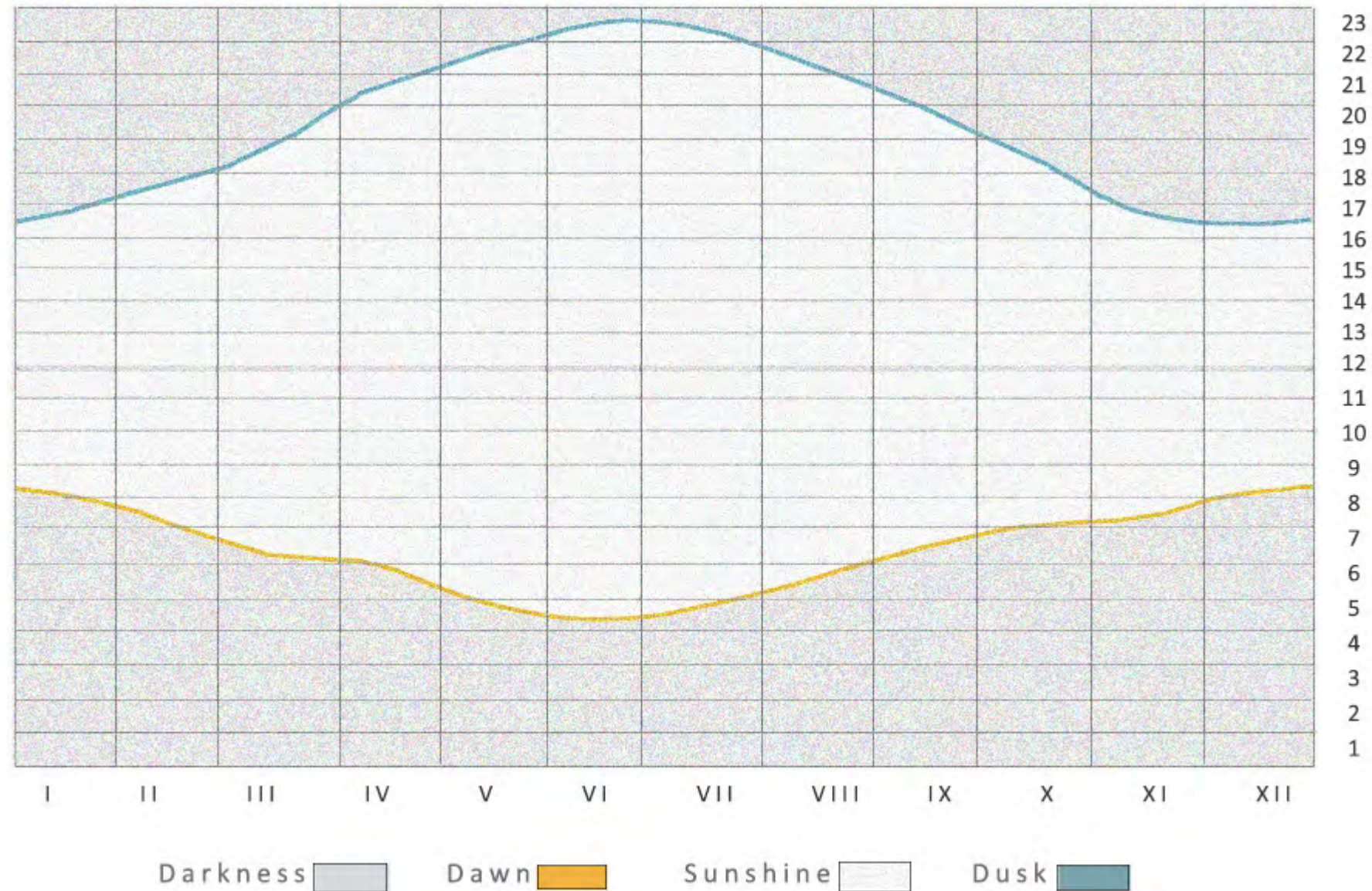
Wind



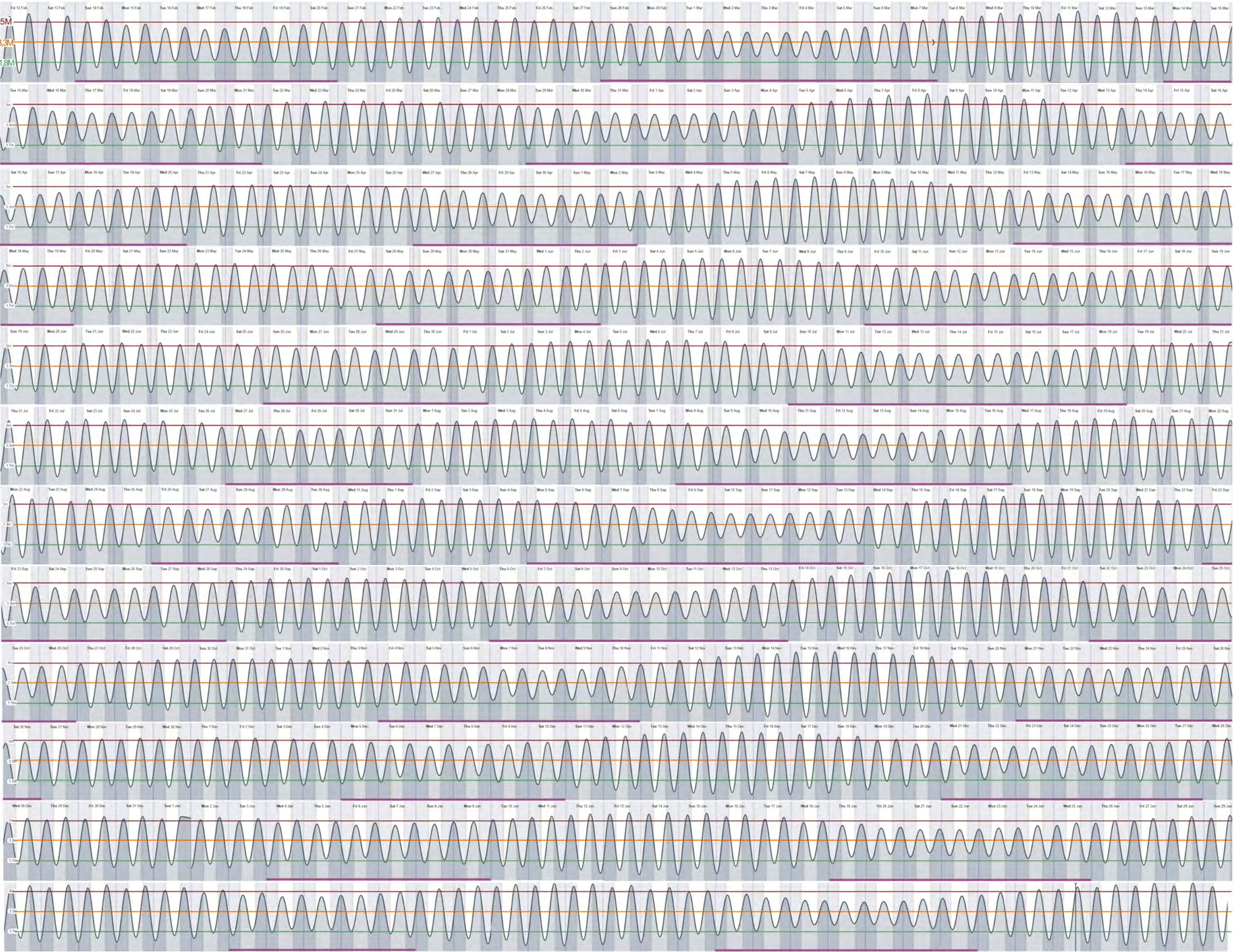
Rain



Sun path



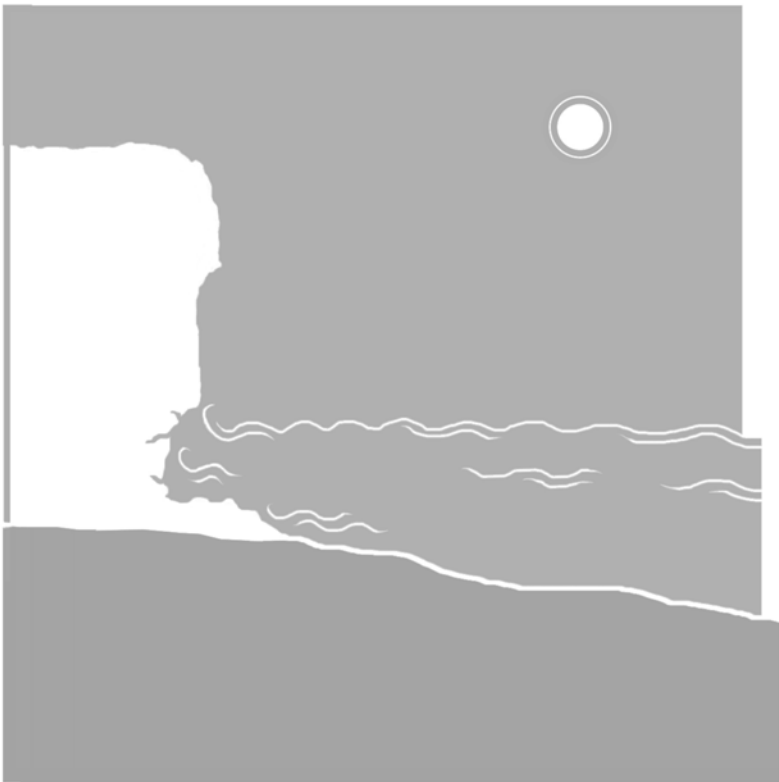




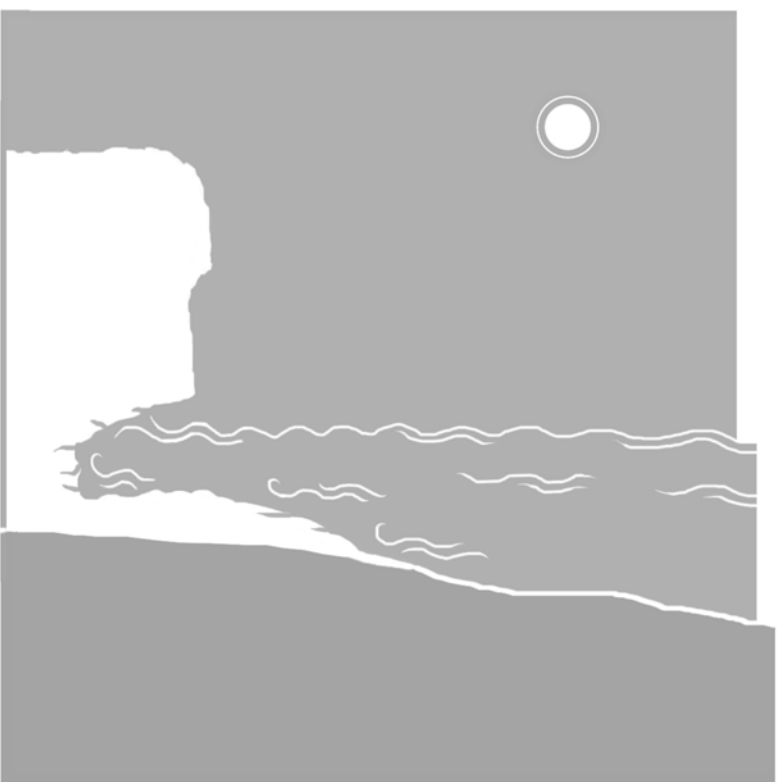
Waves average through out the year



Waves hit the Cliff causing cracks through the Stone



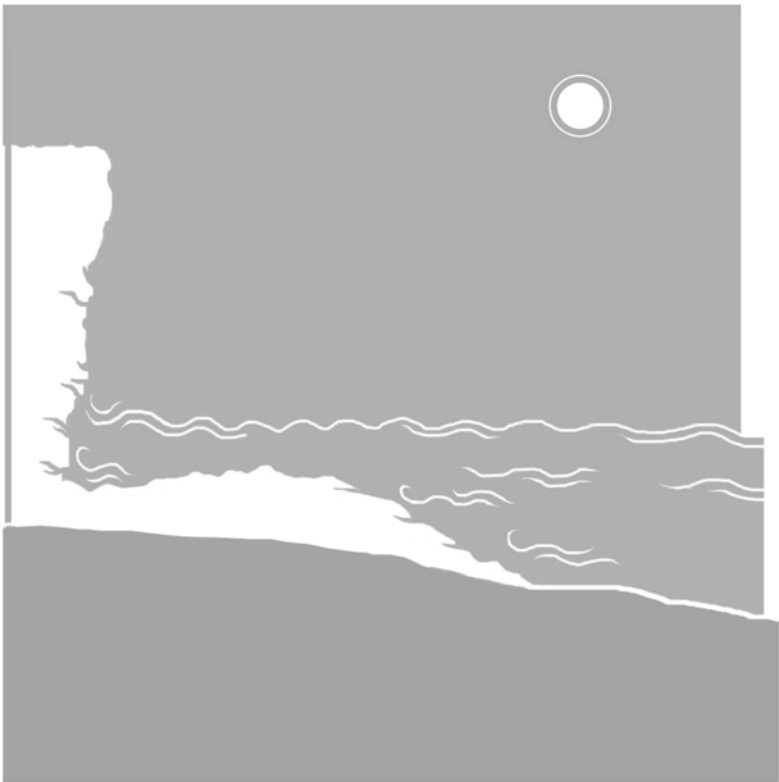
The Stone start to break, fall and gather next to the Cliff



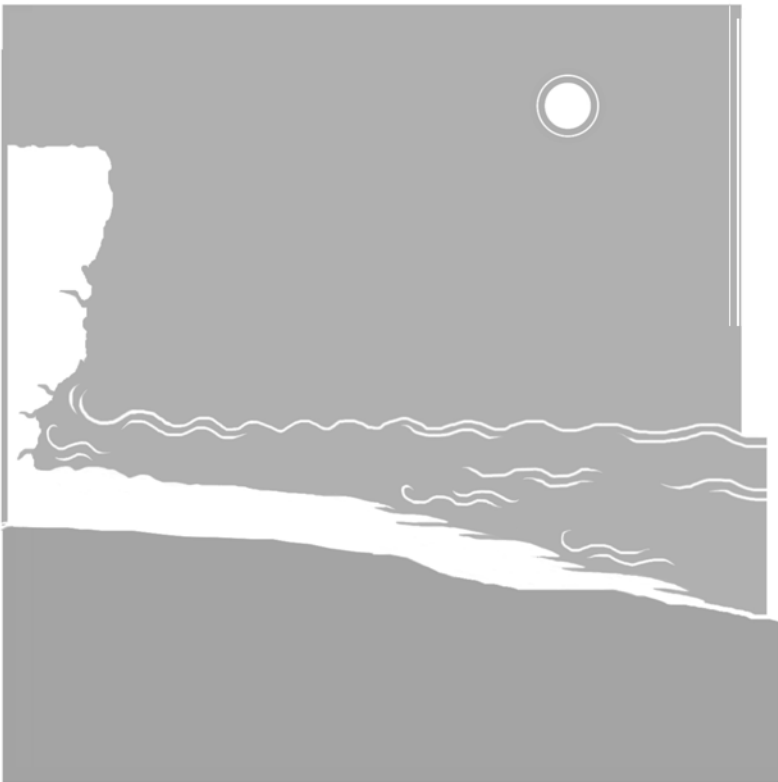
The Waves keep breaking the stone then pull it into the sea



The Waves break through the lower part deeper leaving the upper part unsupported, so it starts to crack.then Fall.



The fallen upper part start to get pulled by the waves



The Waves keep hitting and breaking the Cliff and also keep Pulling and smoothing the Falling part Creating a Wavecut.

This diagram show the way steps of the **Wave Cut** formation, which is an interesting way of **interaction** between rock and water, where a process of **push and pull** can break and also create textures and formations.



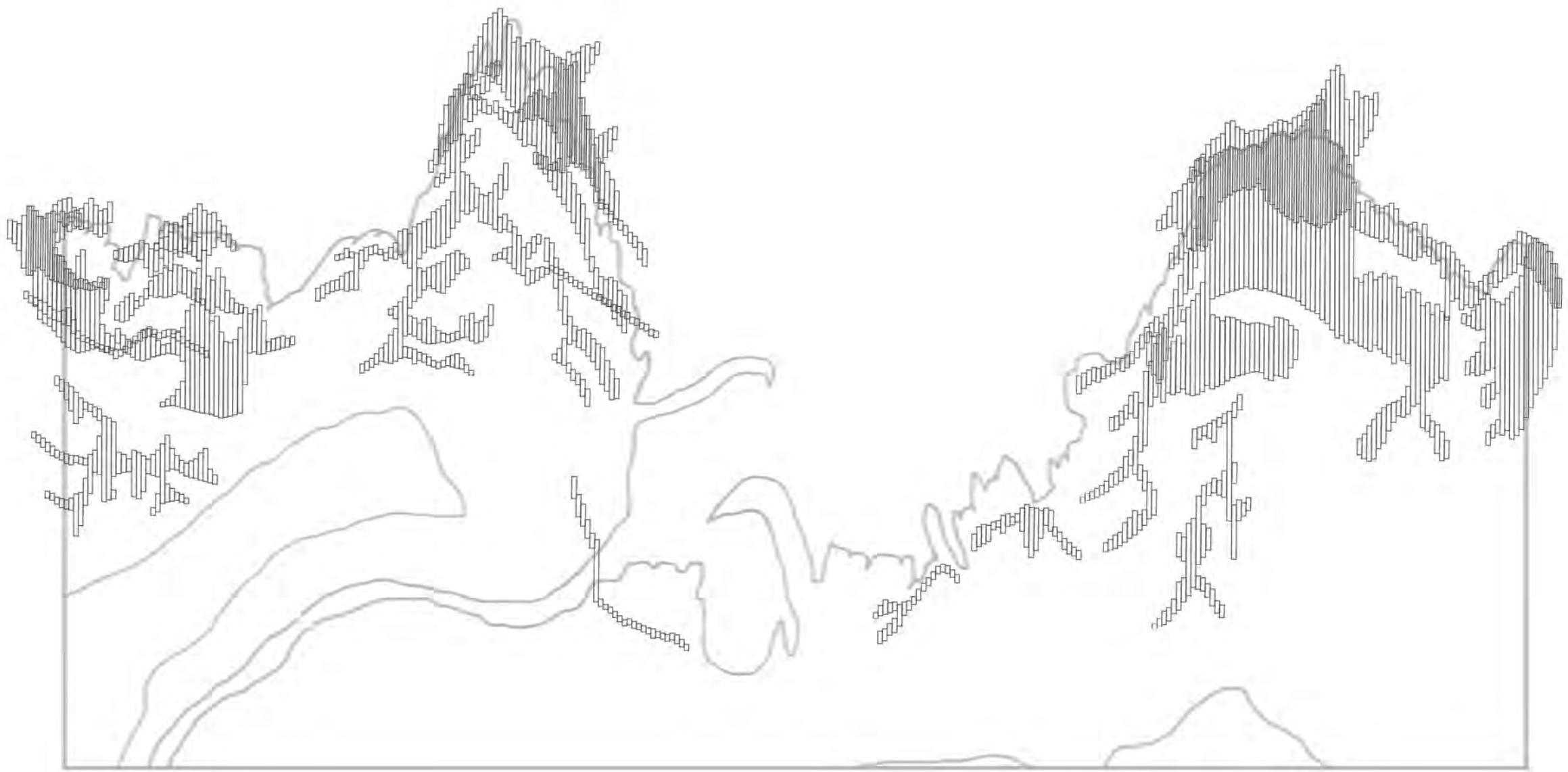
N



Low tide Waves concentration



High tide Wave concentration

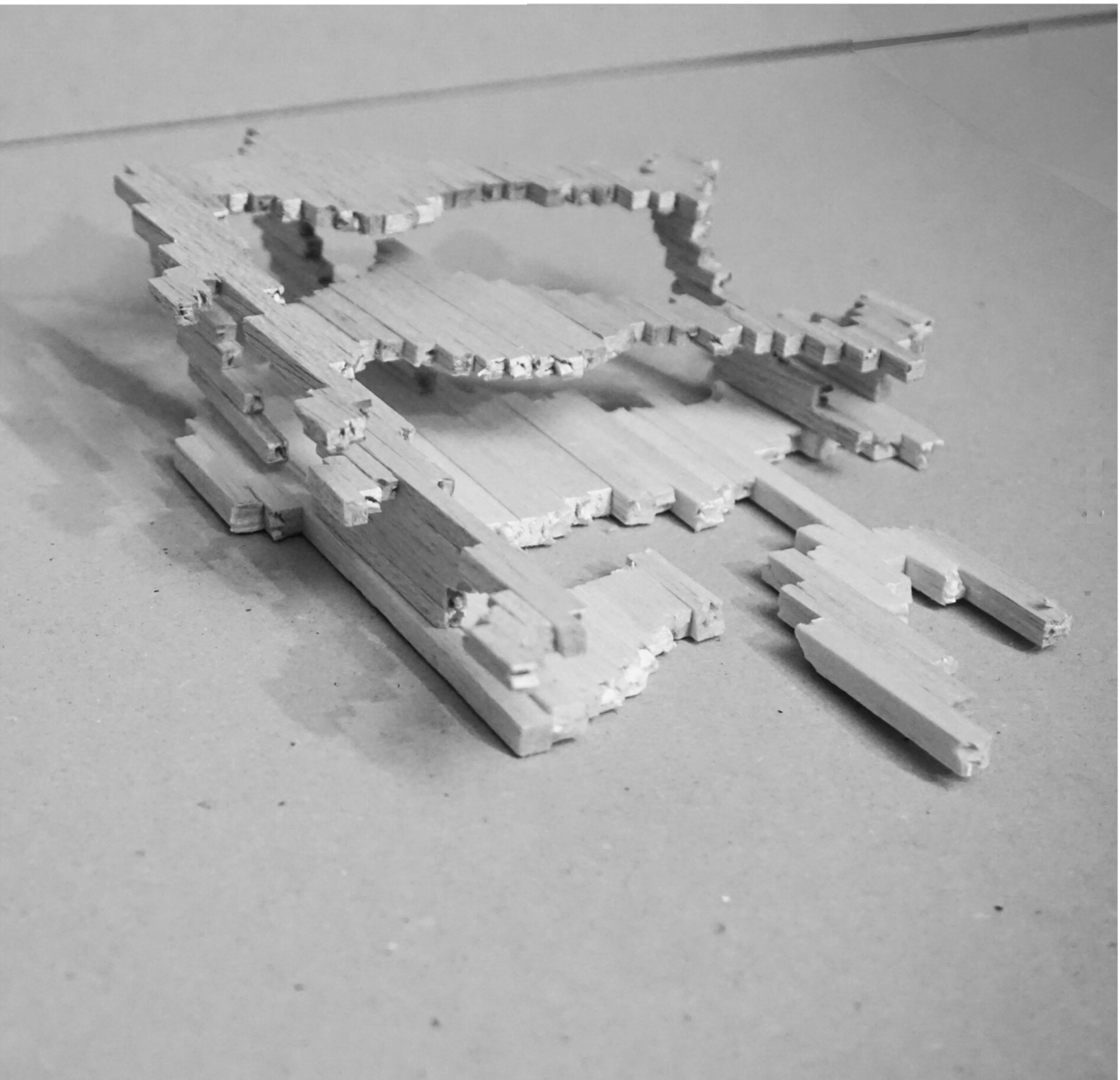
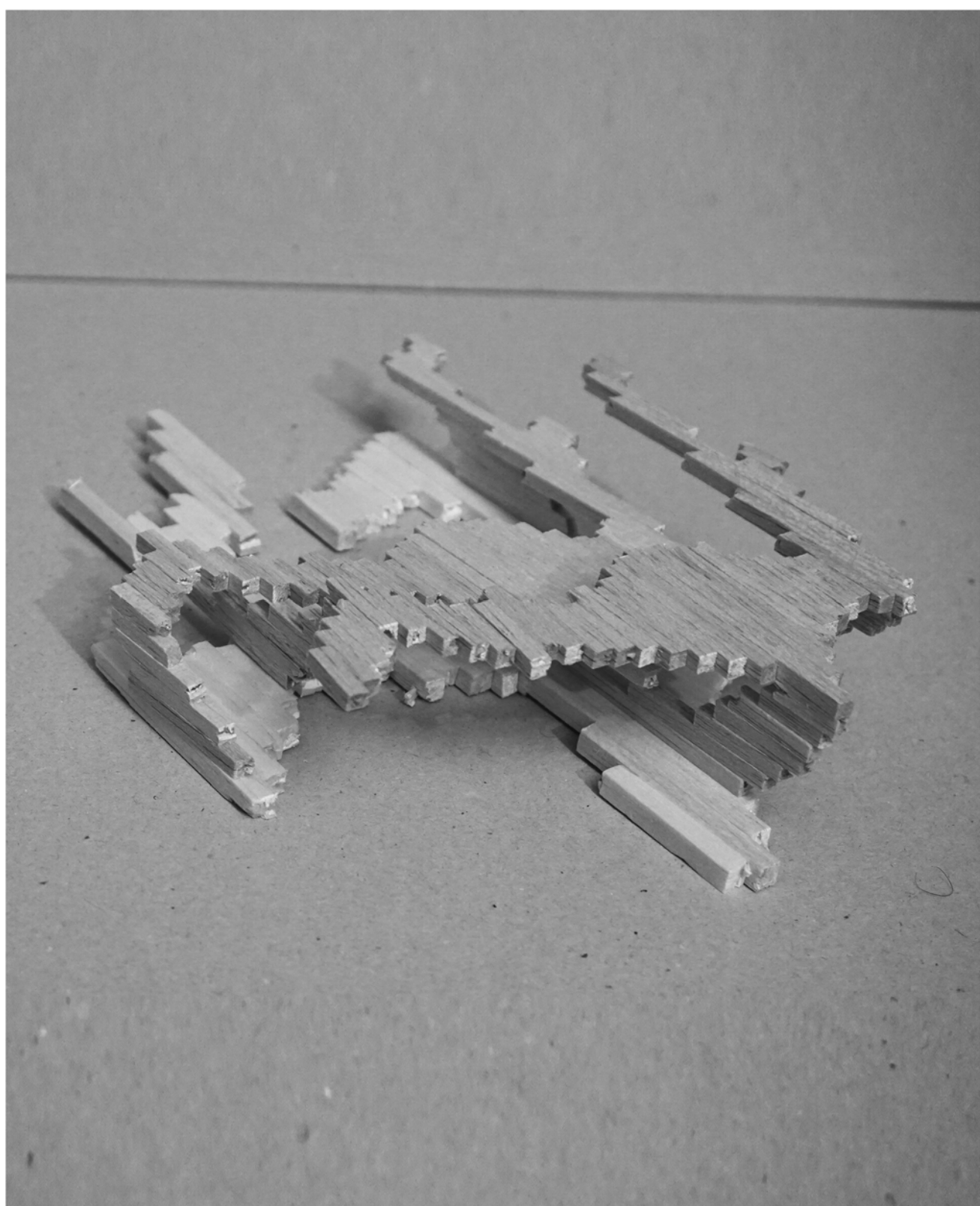
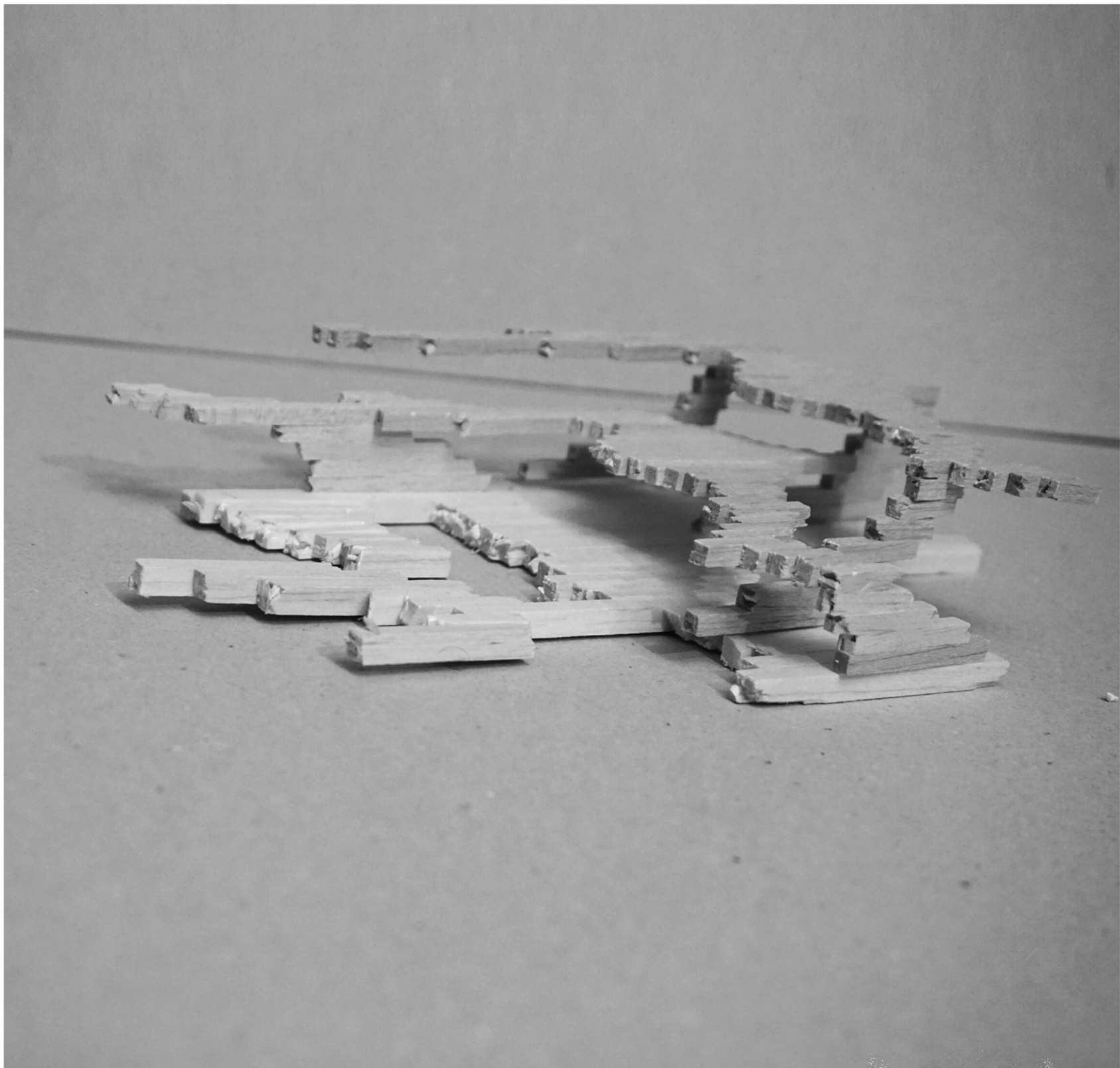


High and Low tide Waves

The diagrams above recording of waves concentration over the wave cut , based on Google earth images data.

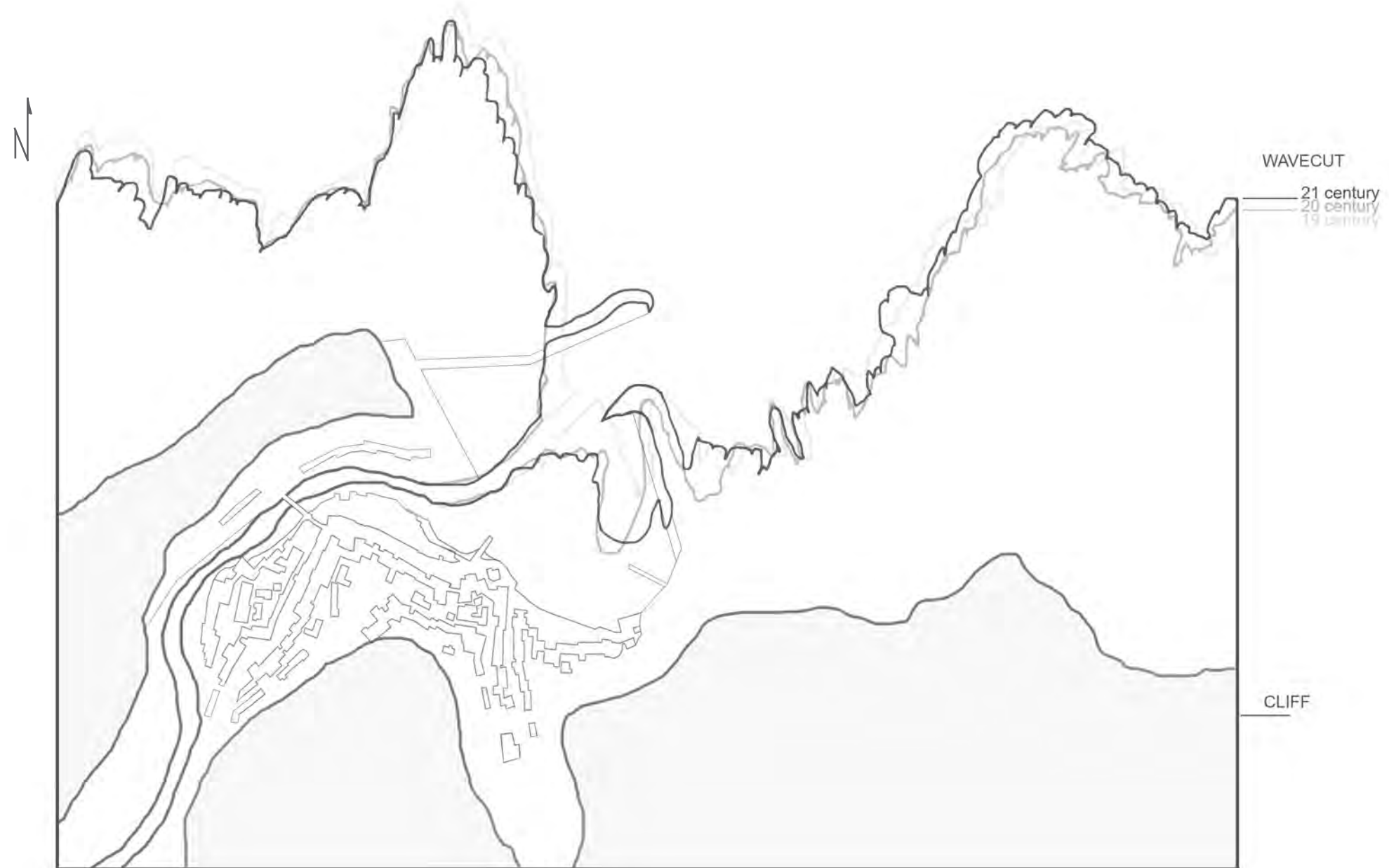
Scale 1:4000





A model talking about the concentration and the kind of waves affecting the Wave Cut by pushing and pulling it.



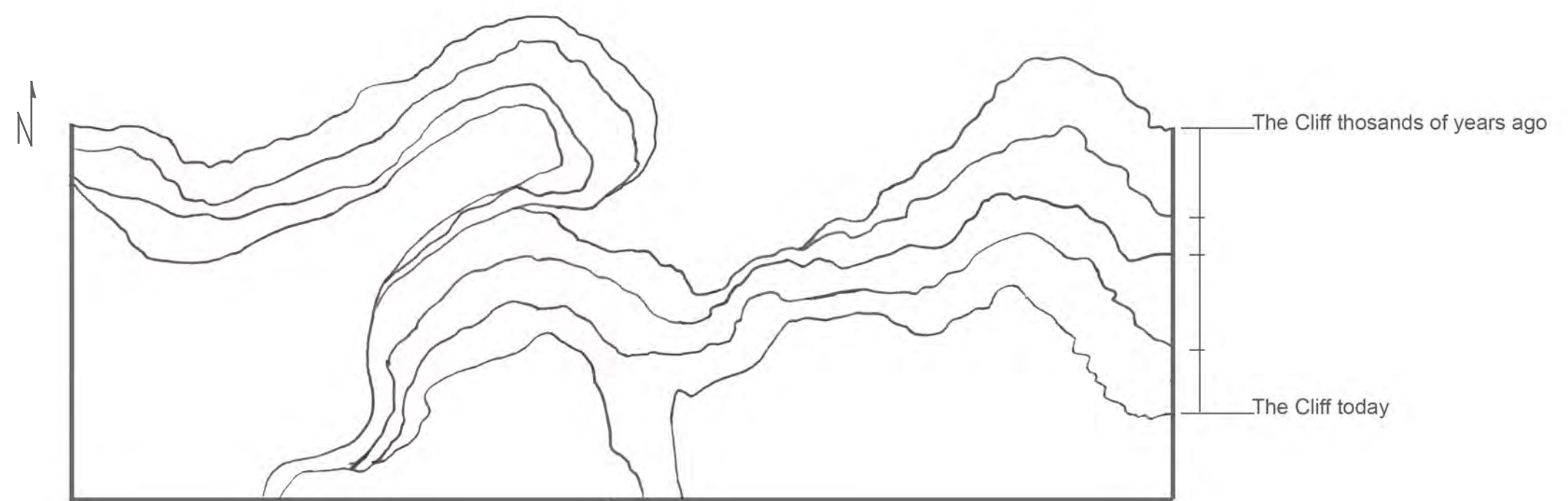


A map of Staithes showing the history of the Wave Cut front movement, being pushed and pulled, based on historic data.  
Scale 1:4000

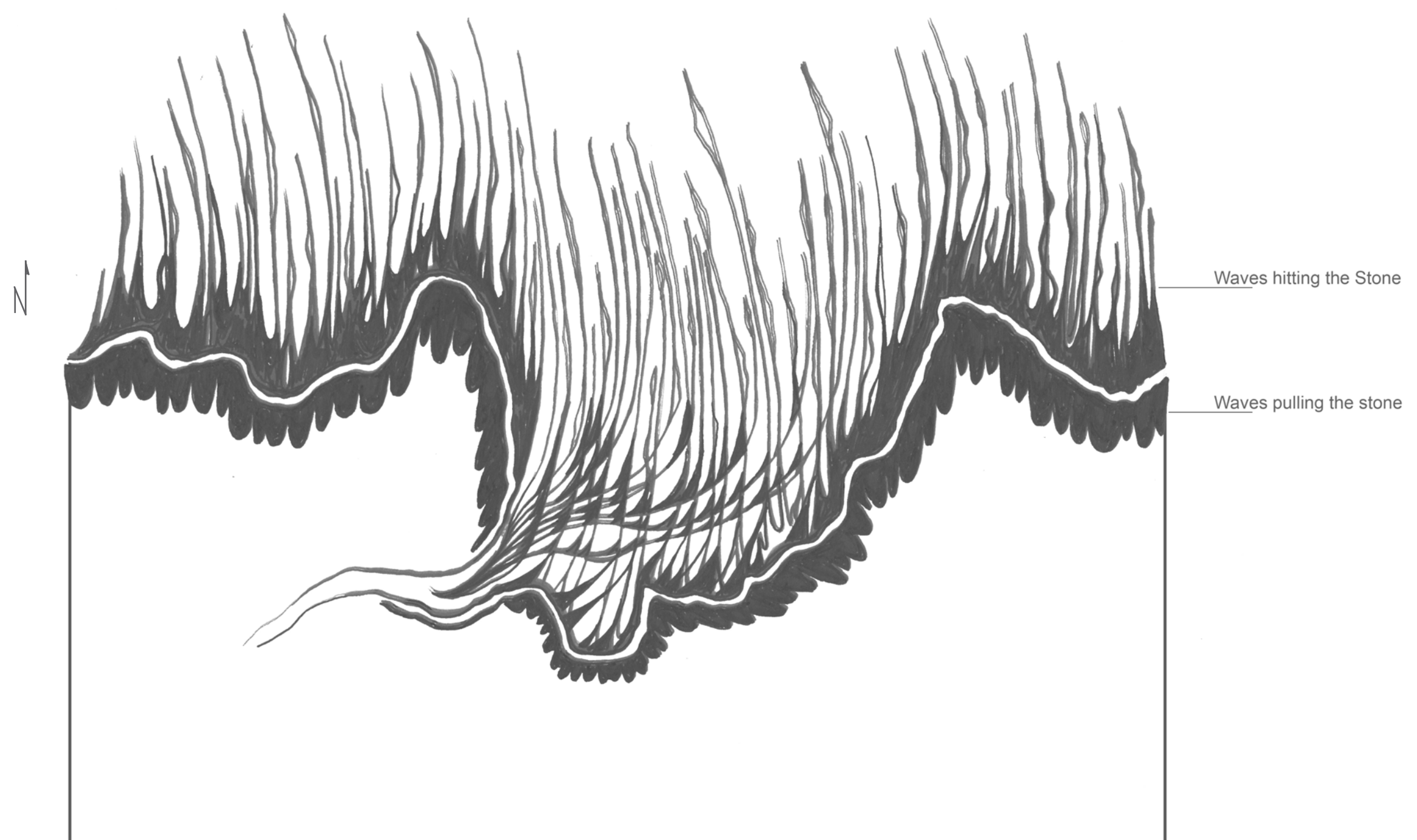


A map of Staithes tracing the movement of the Wave Cut front and the cliff through 100 years, based on historic data.  
Scale 1:4000



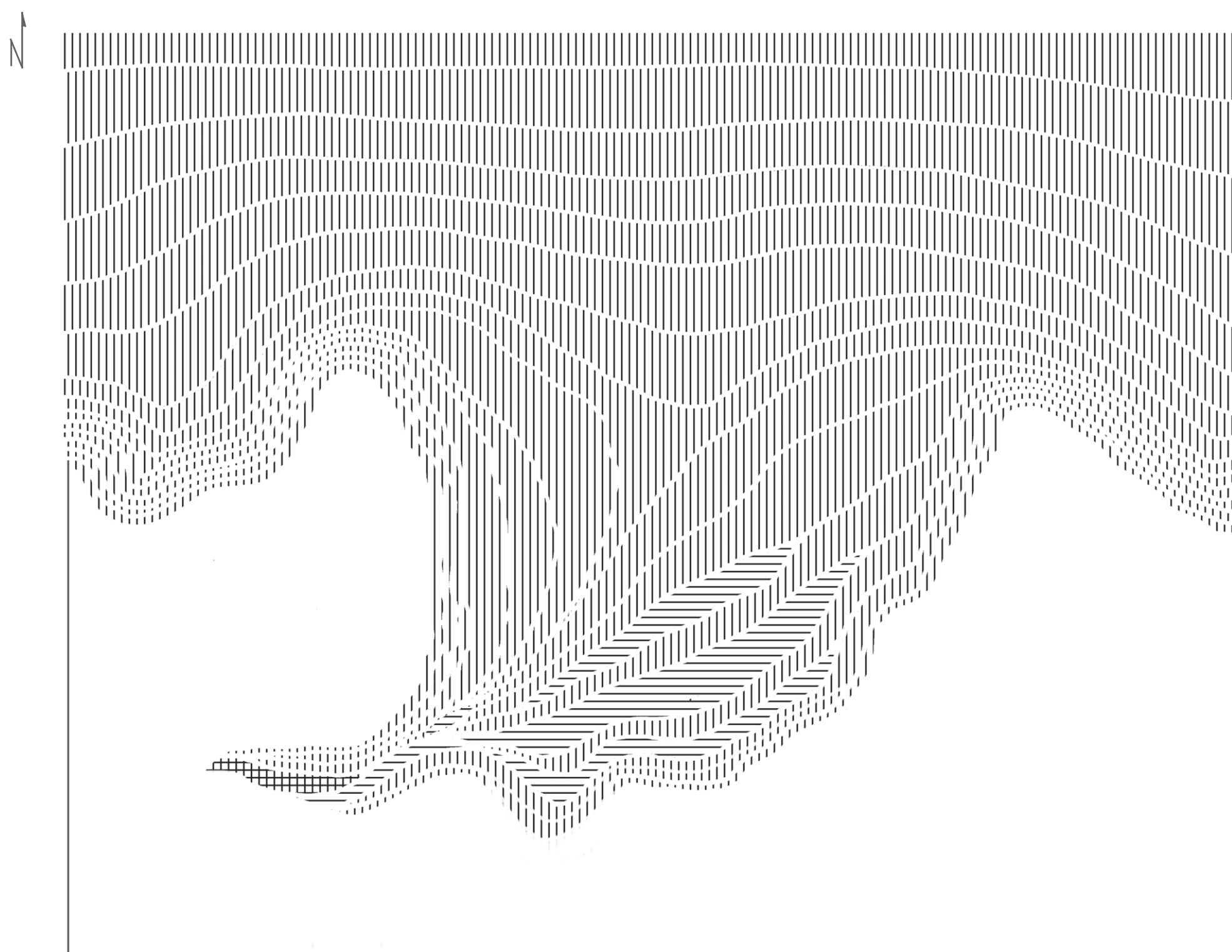


This diagram shows Estimation of the cliff location thousands of years ago, based on the previous diagram.  
Scale 1:4000

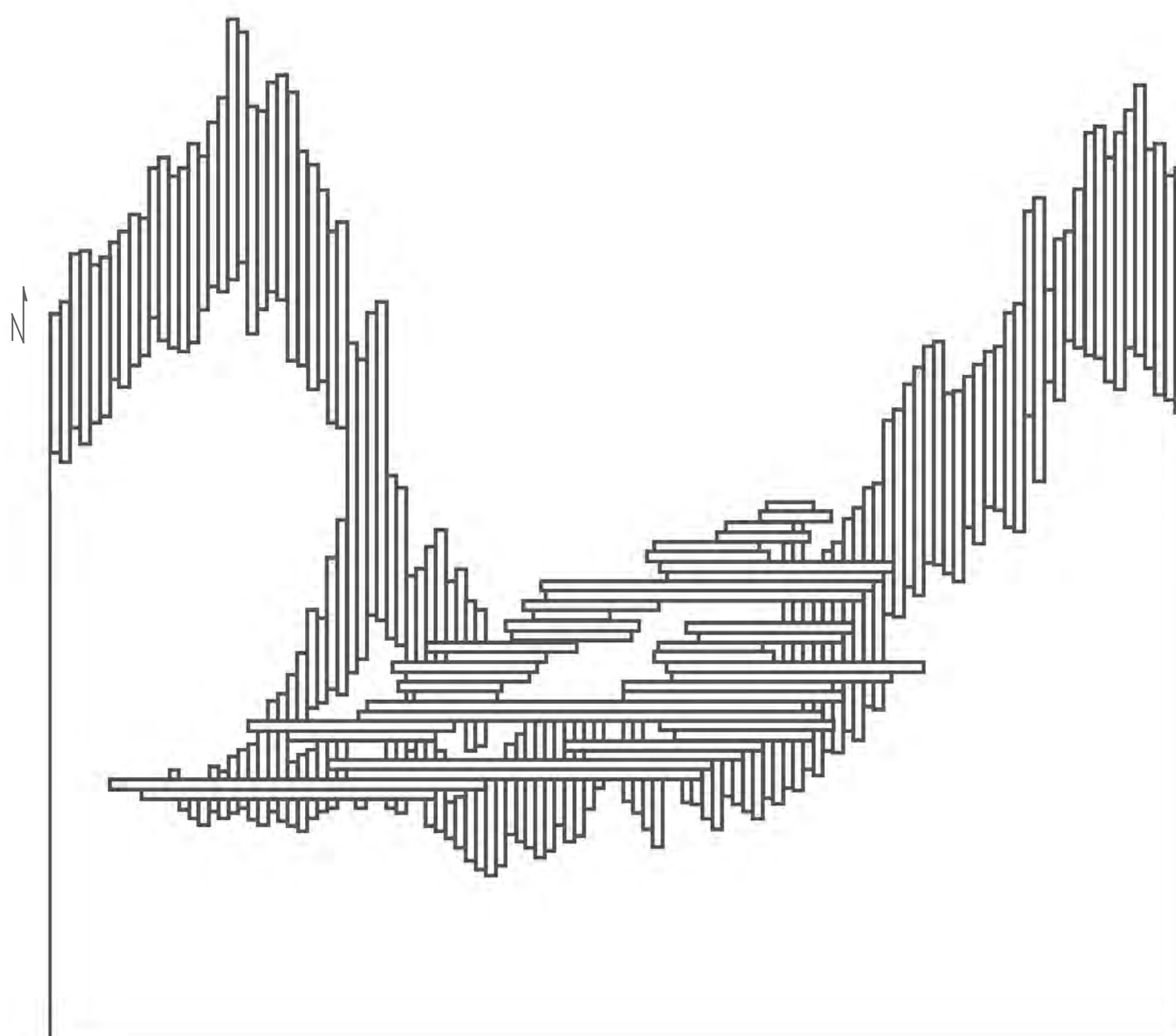


Based on the previous diagram, This diagram estimates how the waves influenced the cliff and how the waves moved it through out the years, and how that process formed the **direction** of the Wave Cut layout. It also show how the river played a role in shifting the direction and the pressure of the waves that also influenced the erosion process, therefore the wave cut formation  
Scale 1:4000



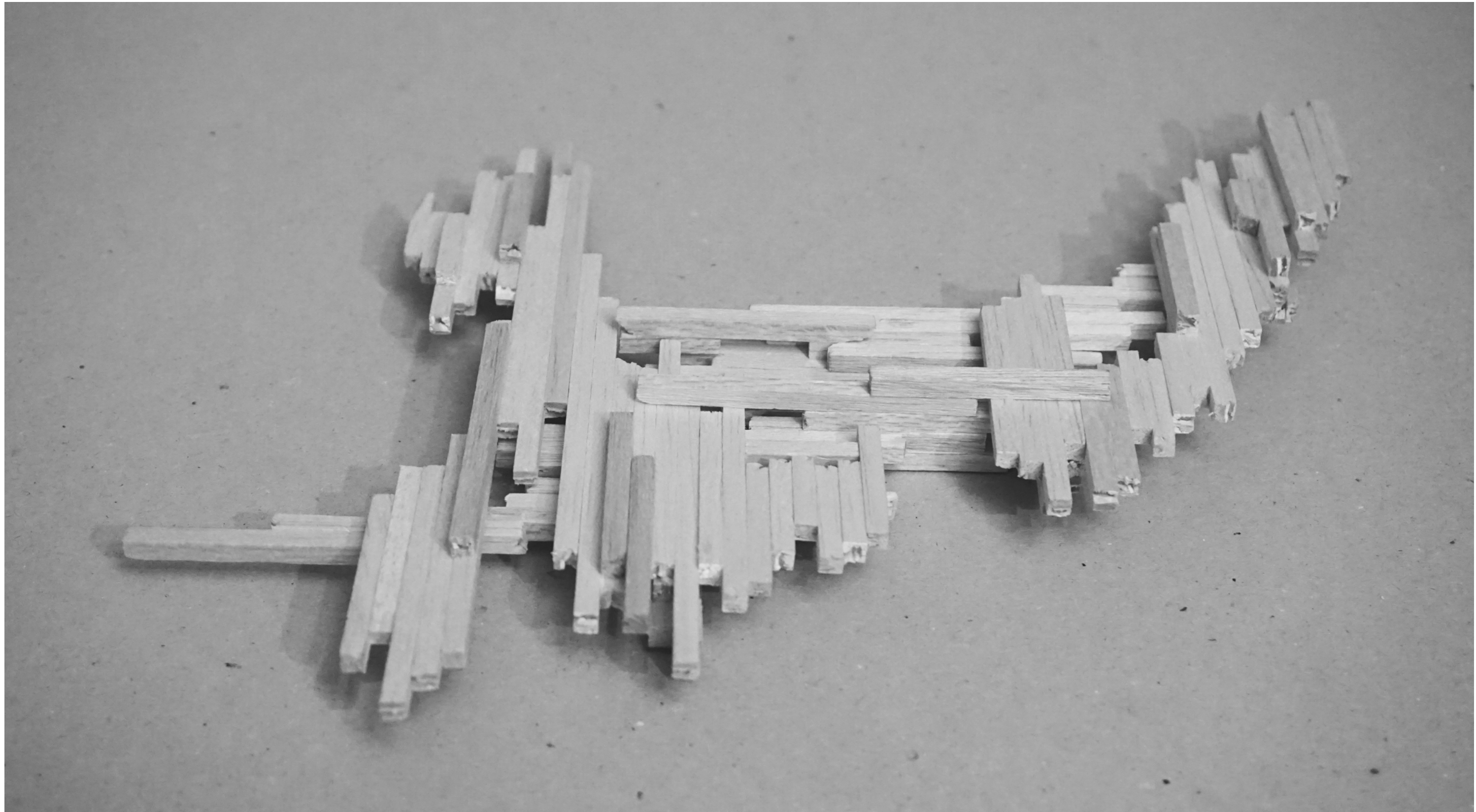
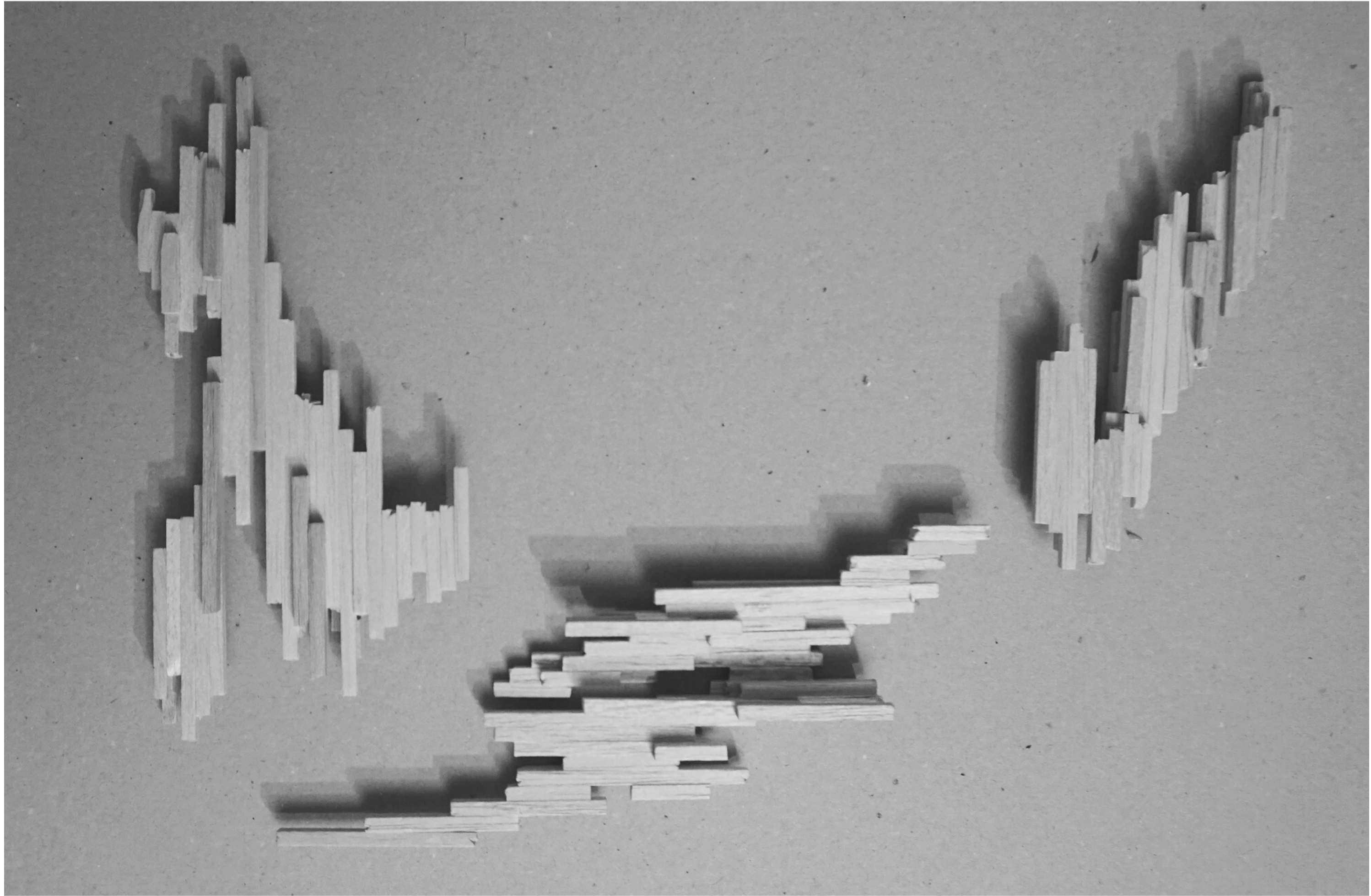


A combination of the **direction** and the **pressure** distribution of the waves, Based on the previous diagram.  
Scale 1:4000



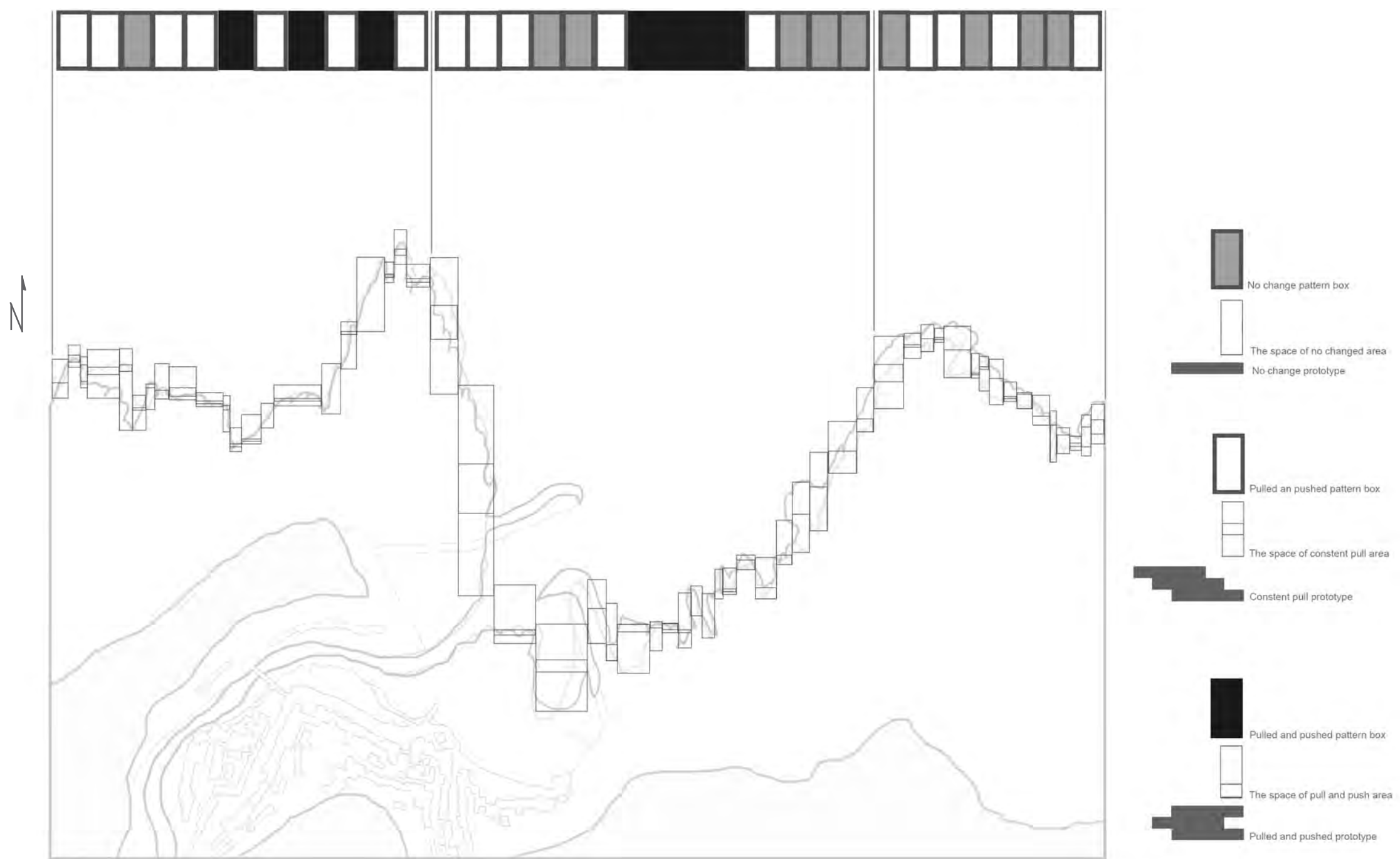
A trace over the **direction** of the waves, based on the past two diagrams.  
Scale 1:4000



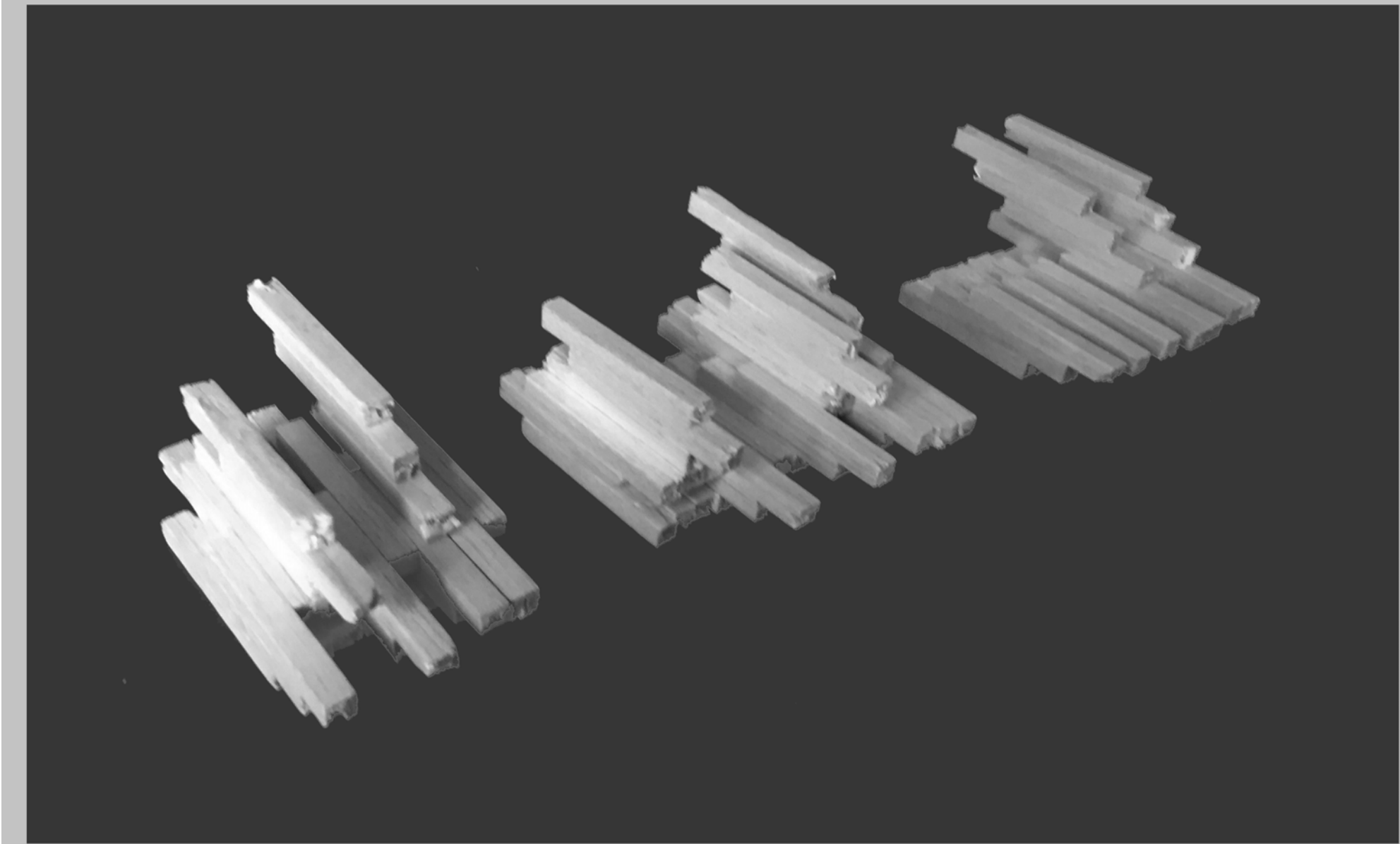


A model made of three parts talking about the different spatiality that the directions of the waves create around the cliff, based on the previous drawing.





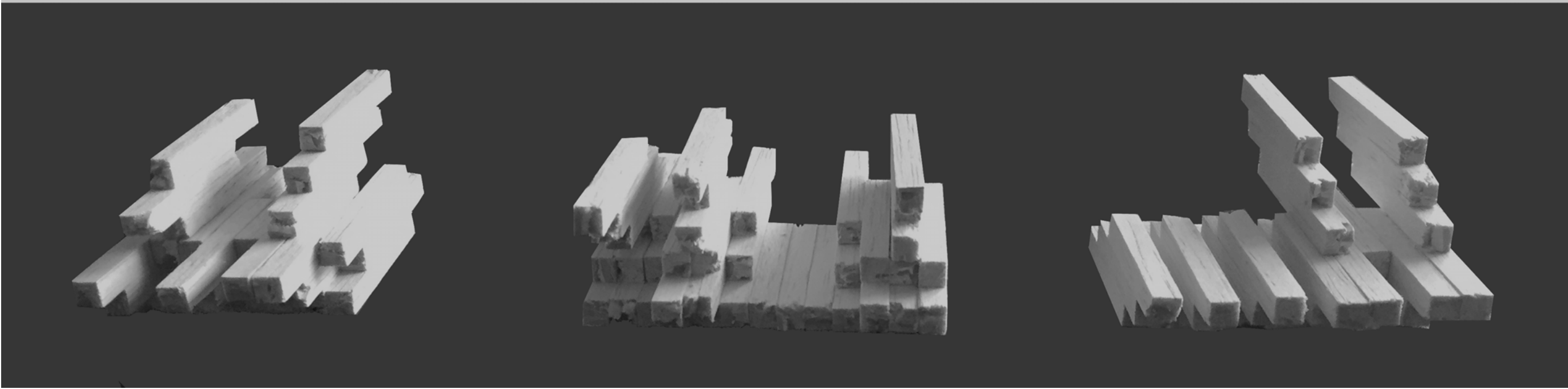
This diagram talks about the front of the Wave cut in detail, where and how it was pulled and pushed by the waves, creating a movement pattern expressing the wave cut formation process. And also creating a Prototype for each kind of movement.  
Scale 1:4000



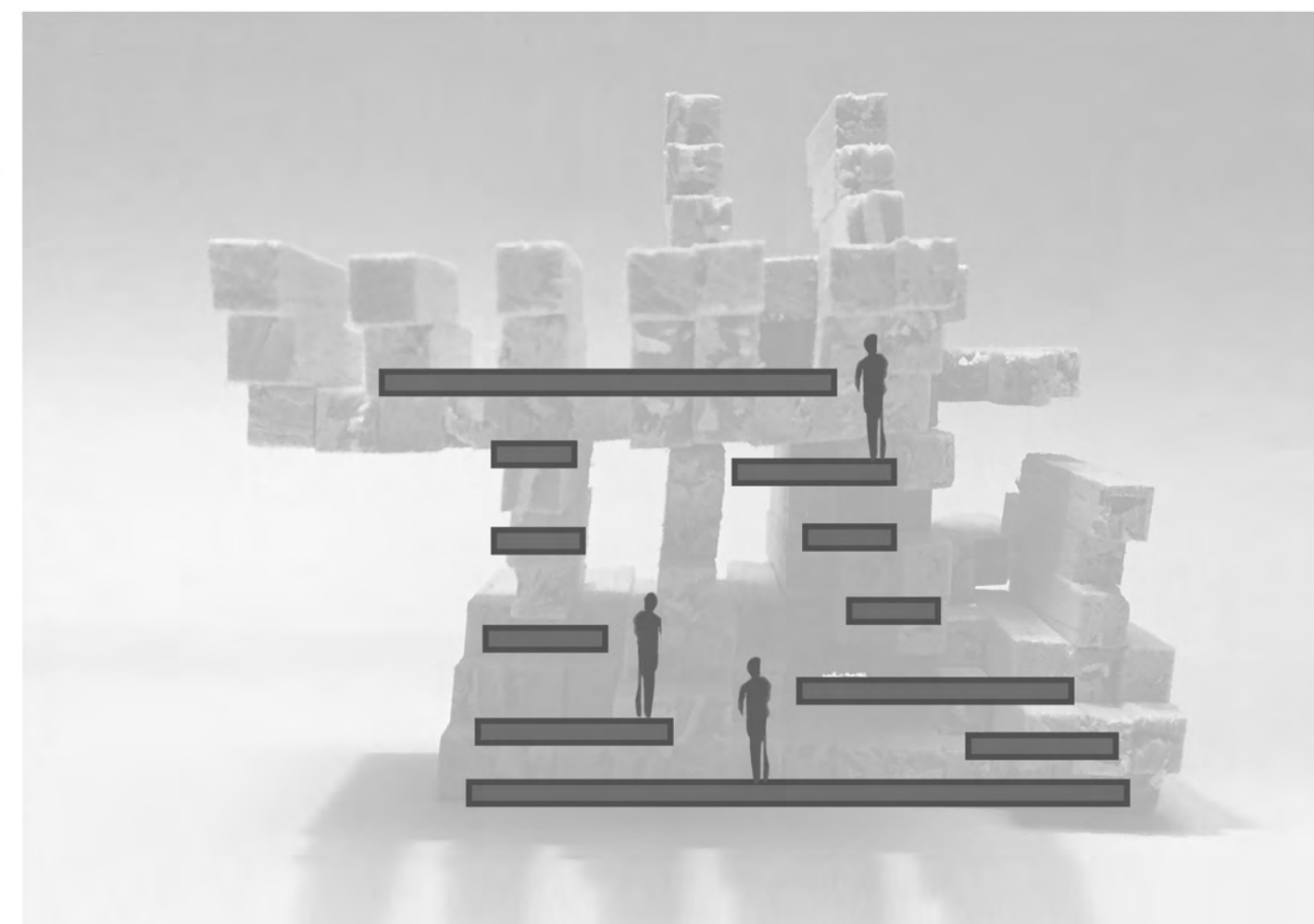
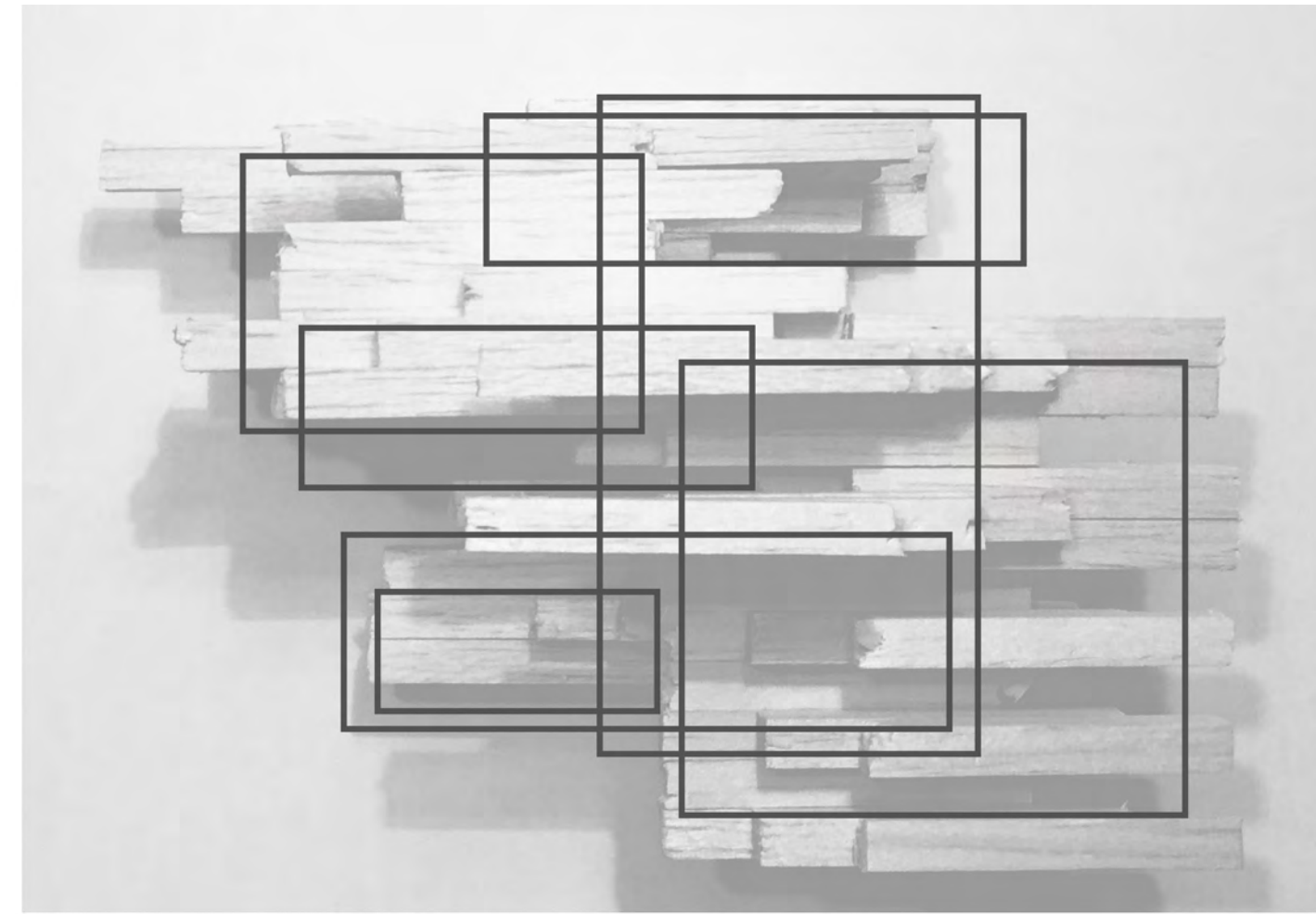
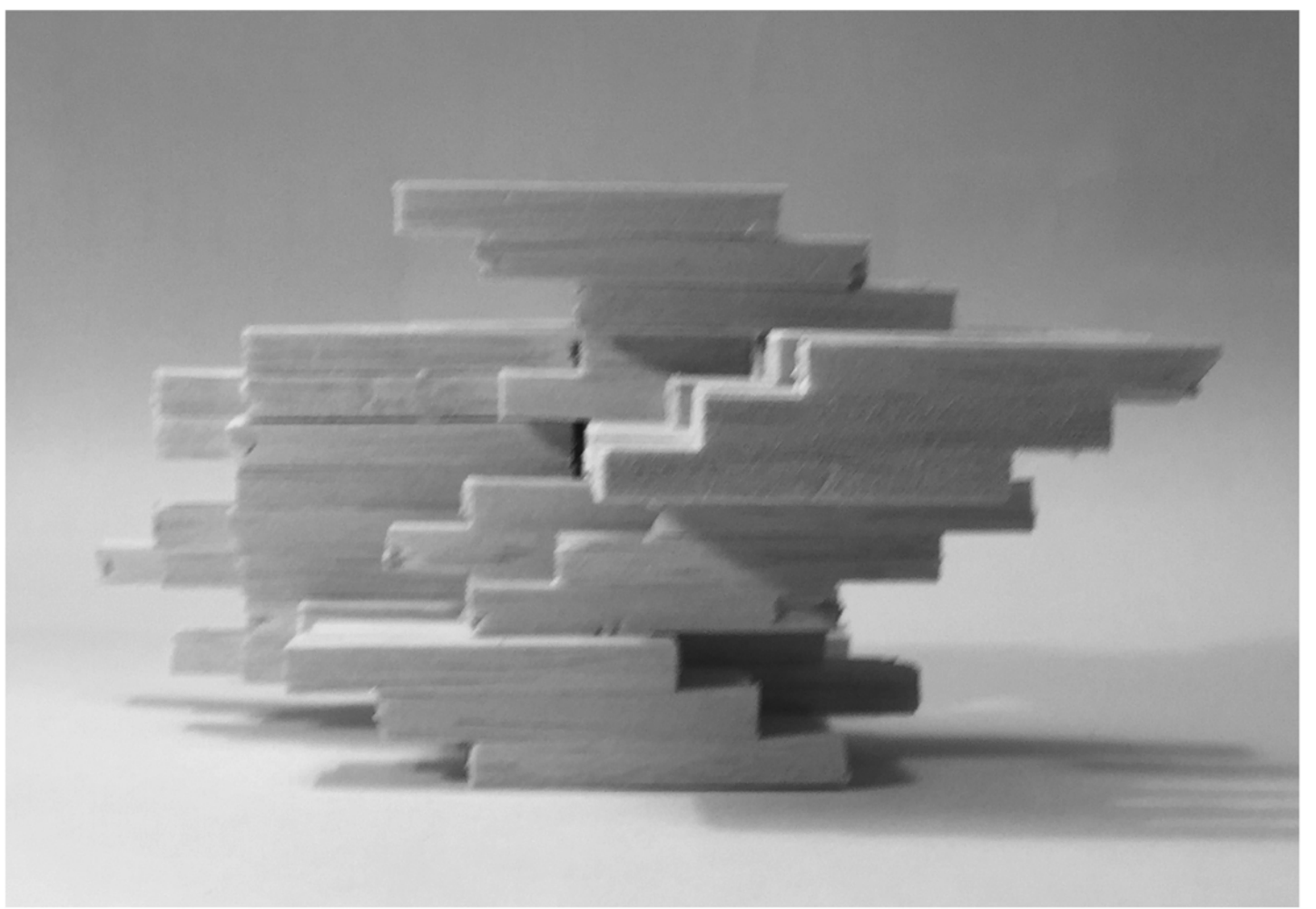
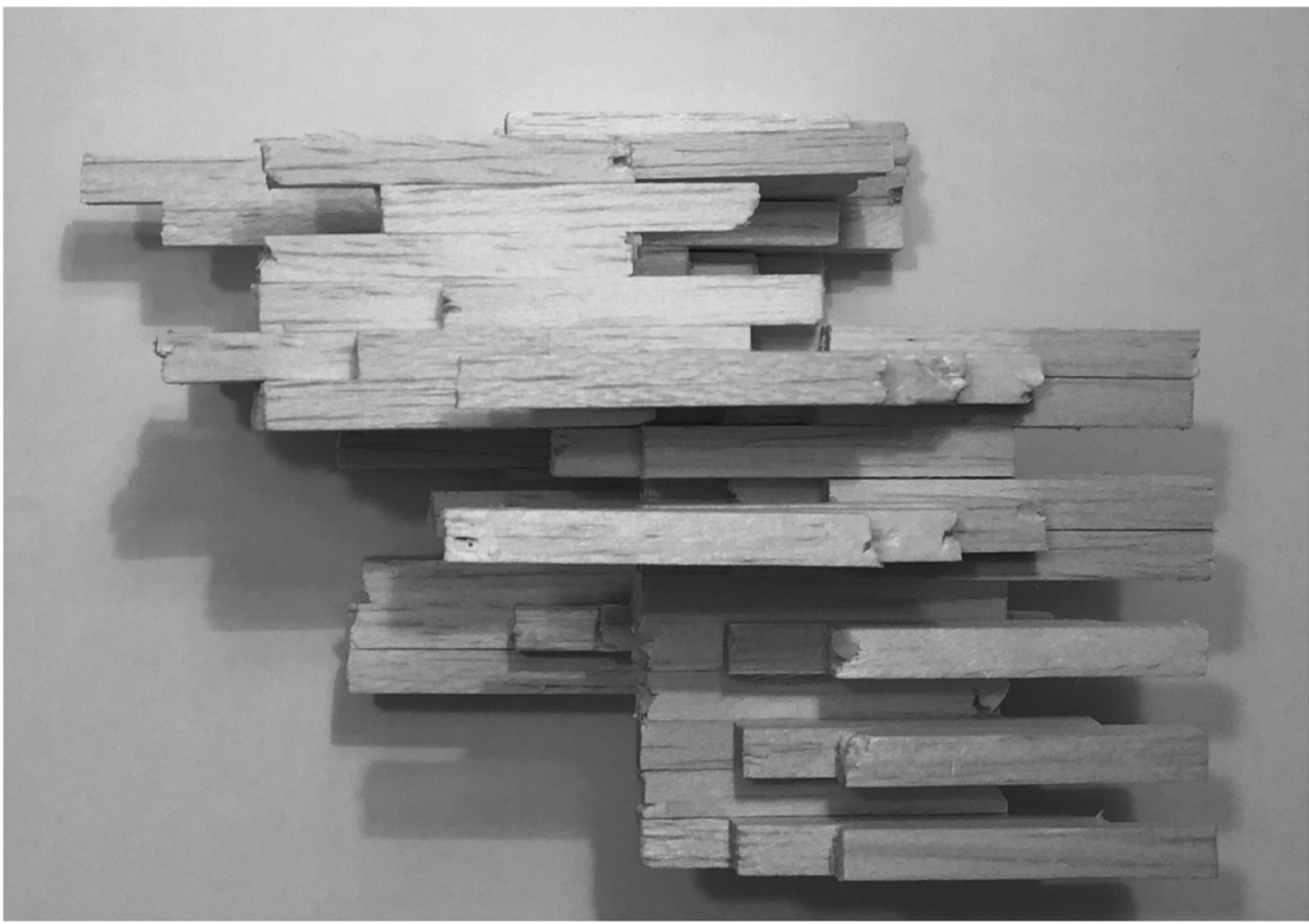
Based on the movement pattern from the diagram above and its three parts arrangement, three aggregations were created by using the three prototype based models below, the models below are based on the three prototypes explained in the previous diagram.



Models based on the three prototypes

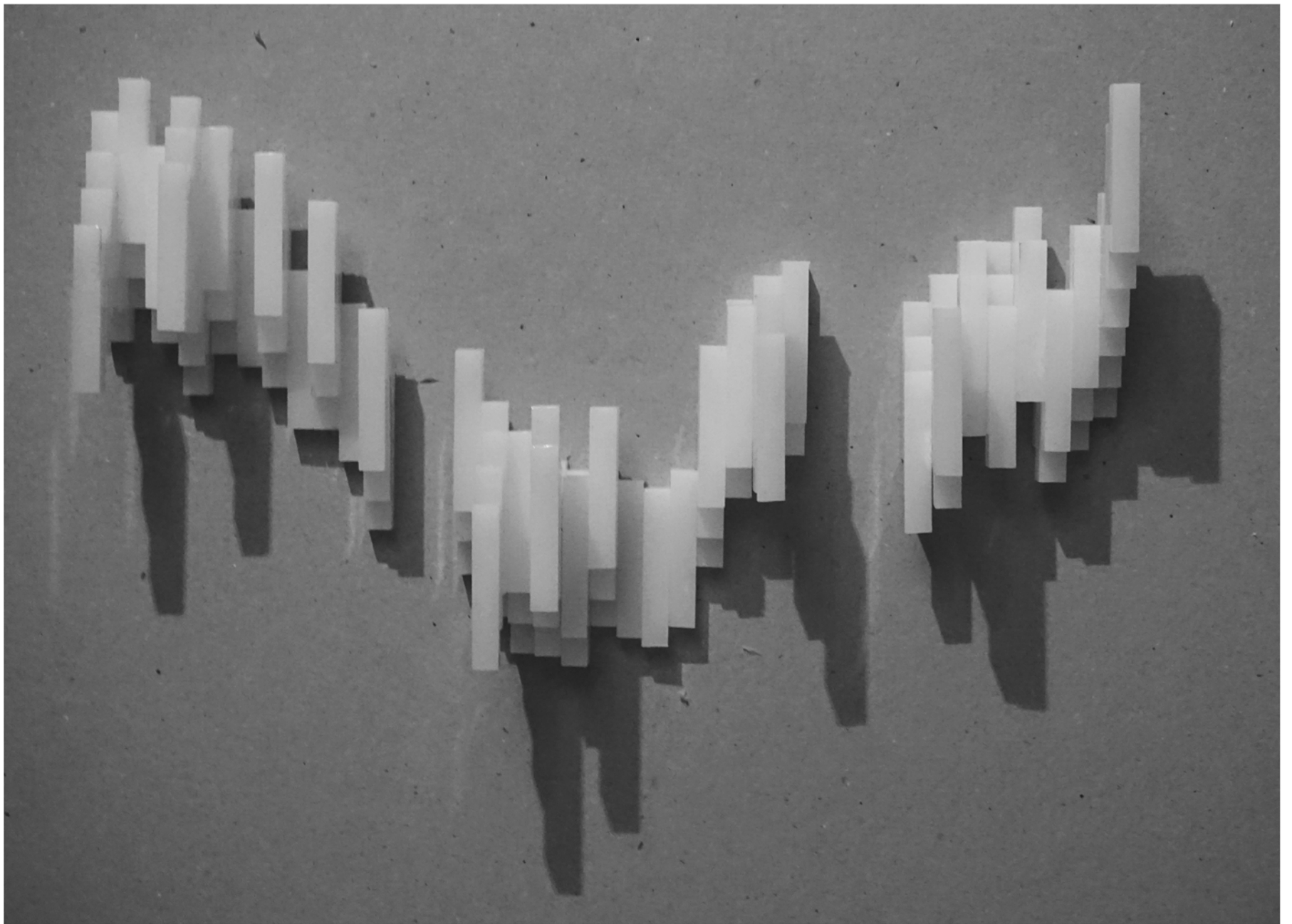
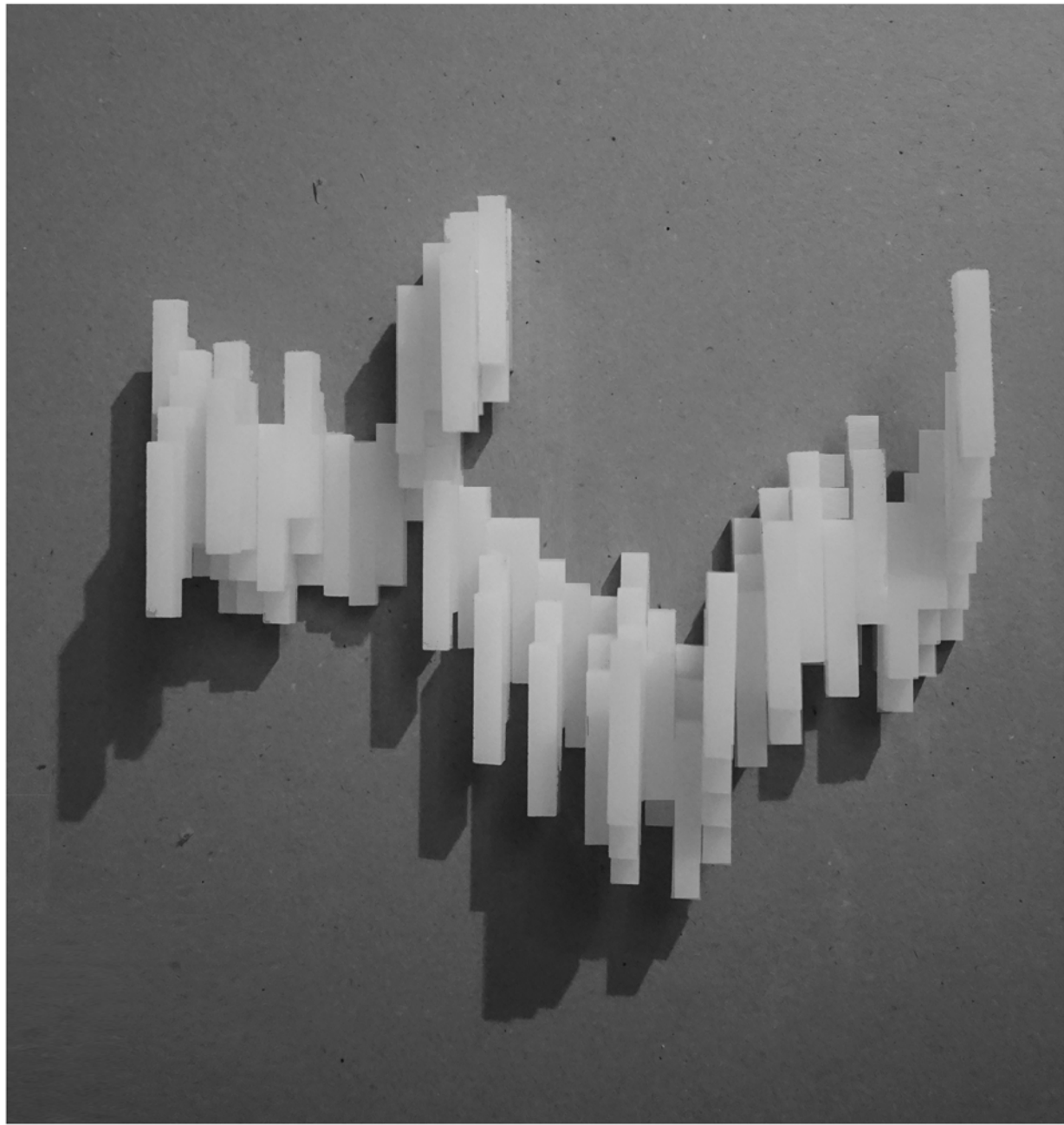




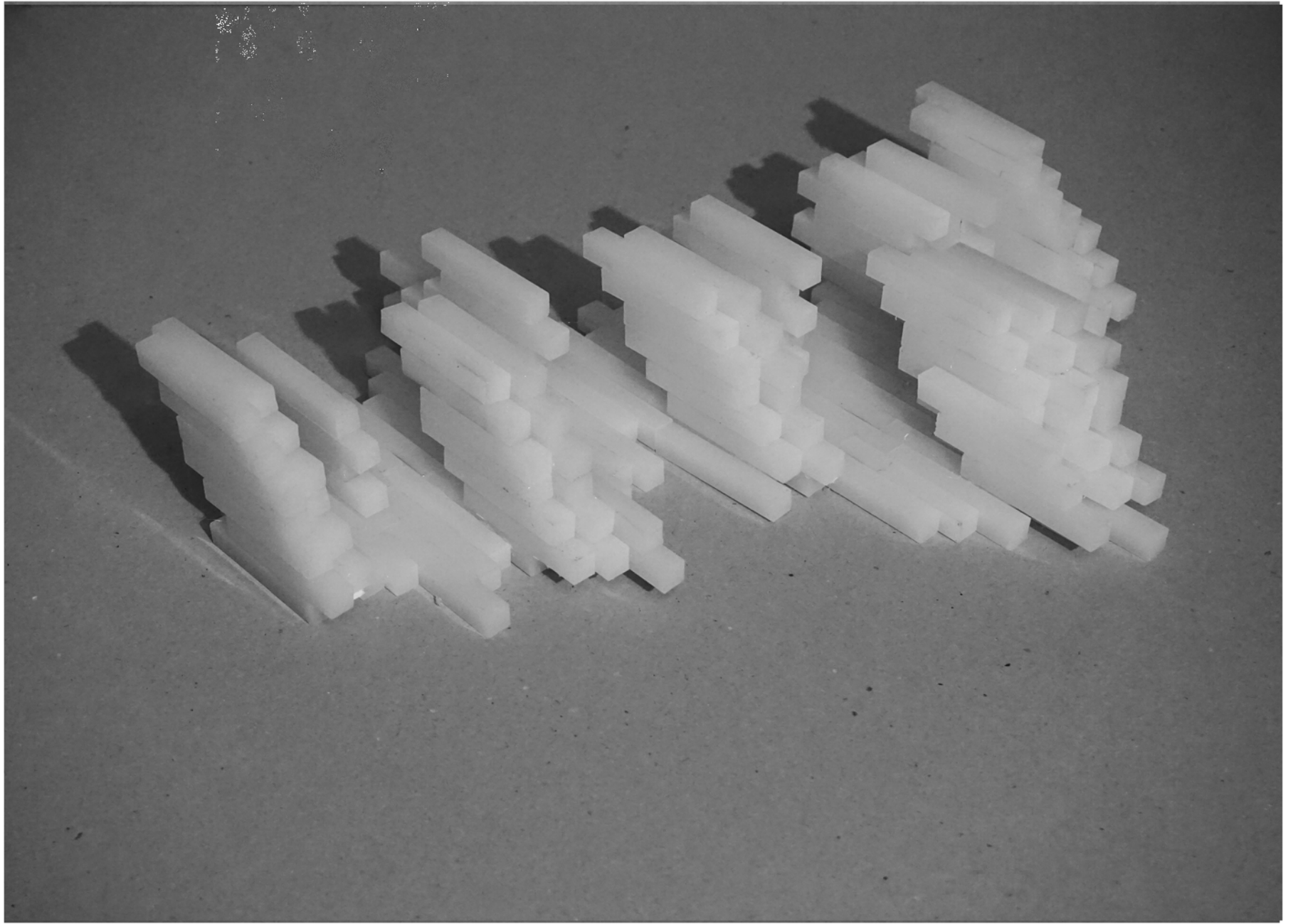
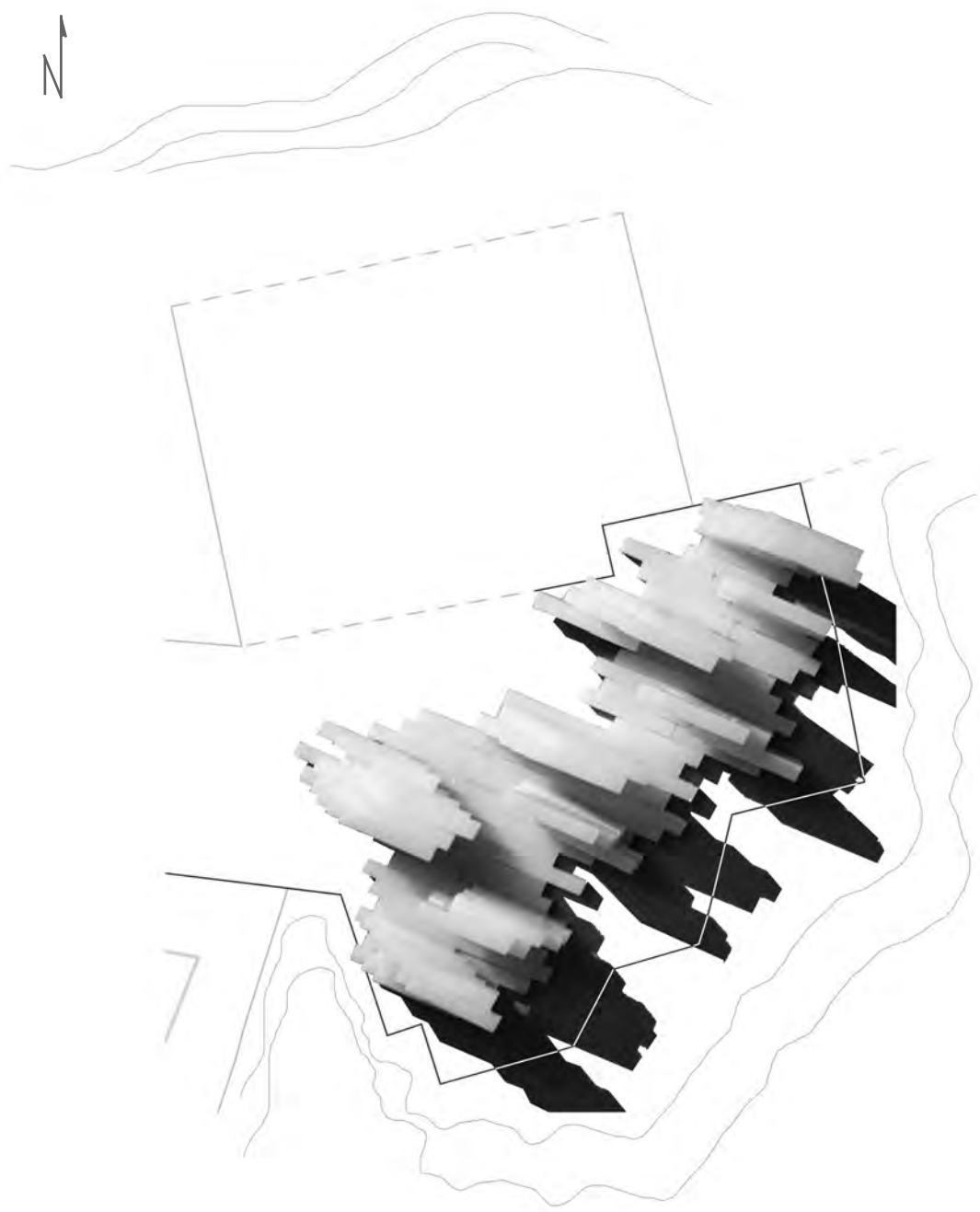


The three aggregations put together creating space that expresses the pull and push motion in its choreography.  
Scale 1:100





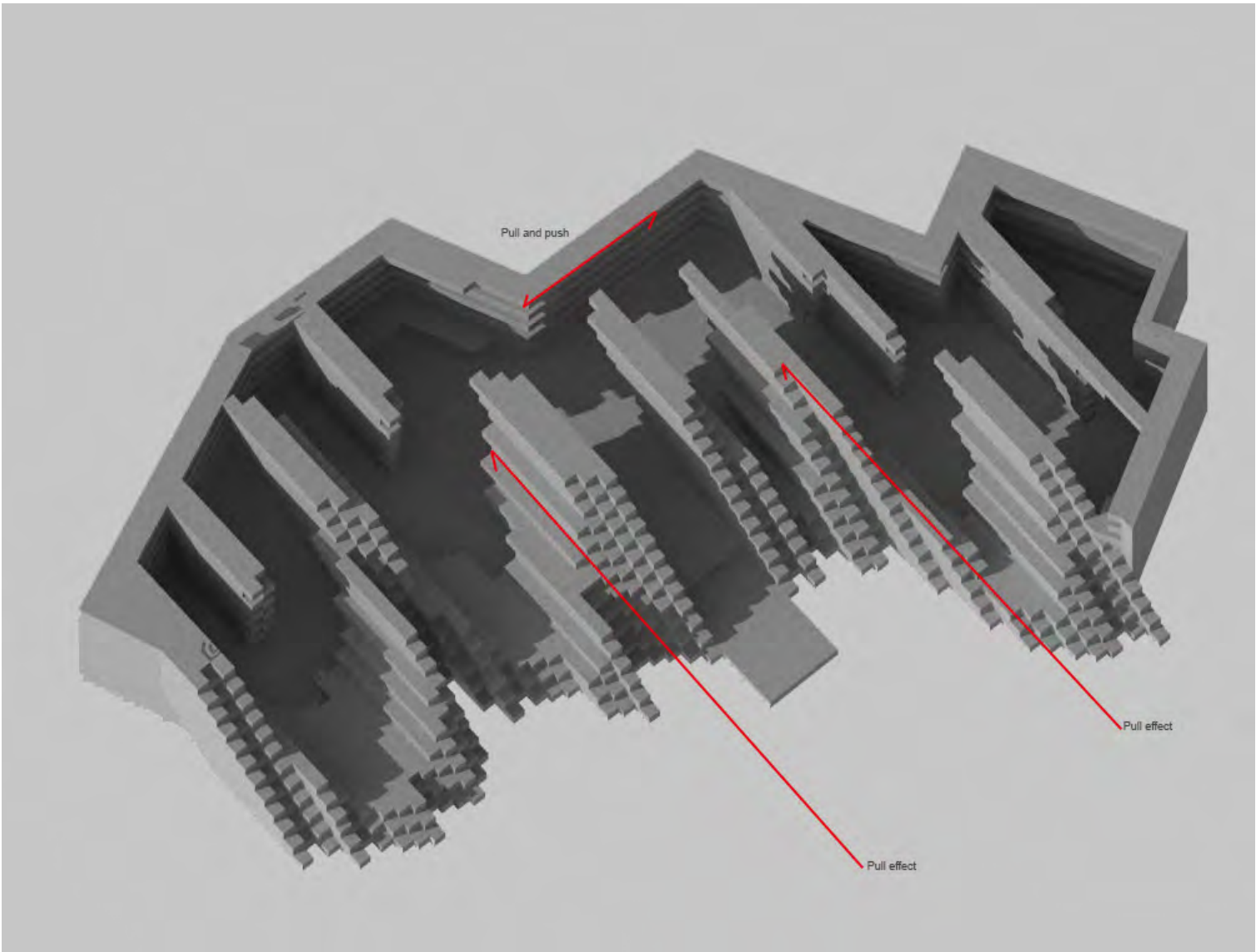
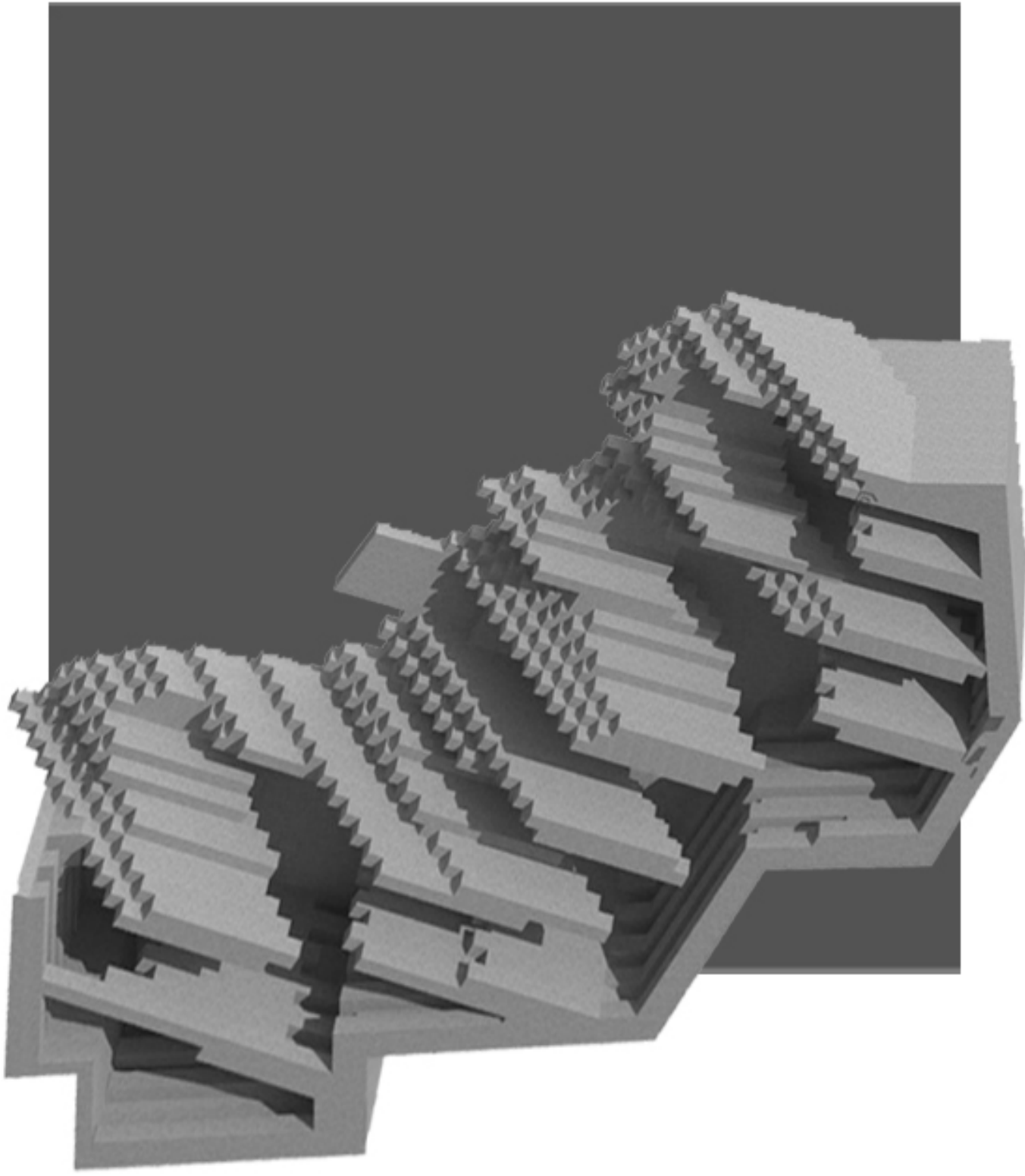
Experimenting with the prototypes with different material and different three aggregation forms, relating the wave cut to the site.



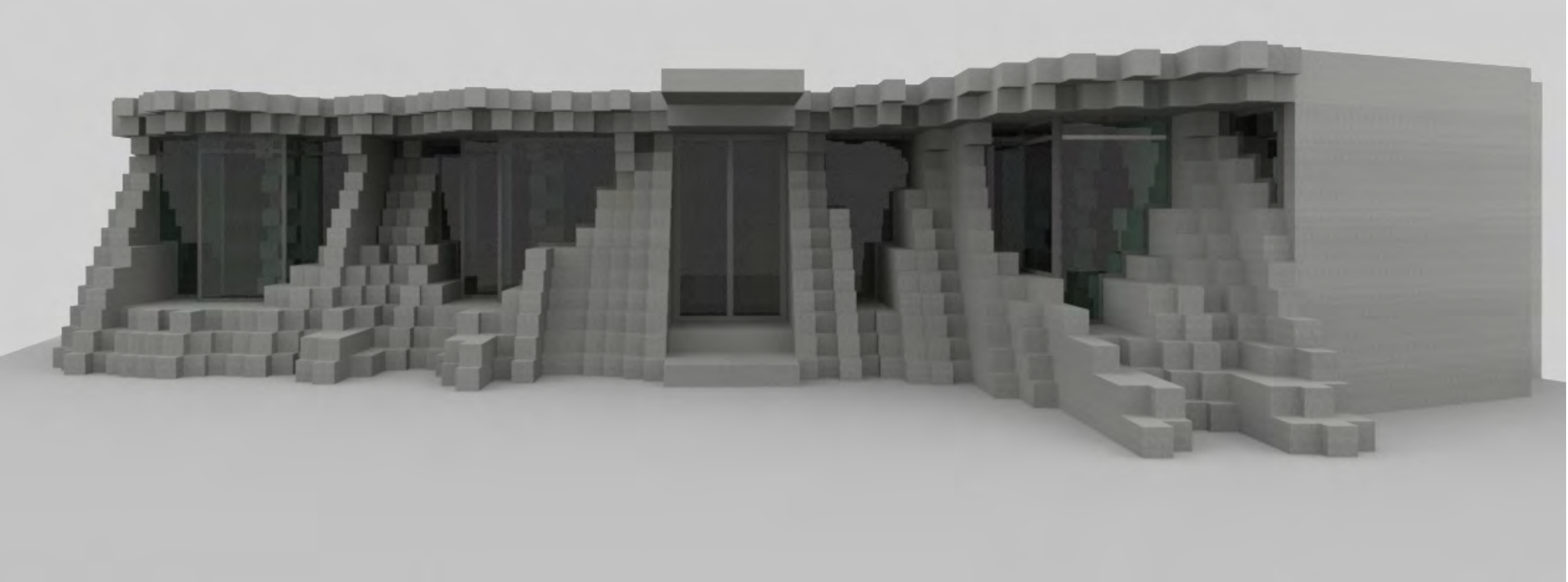
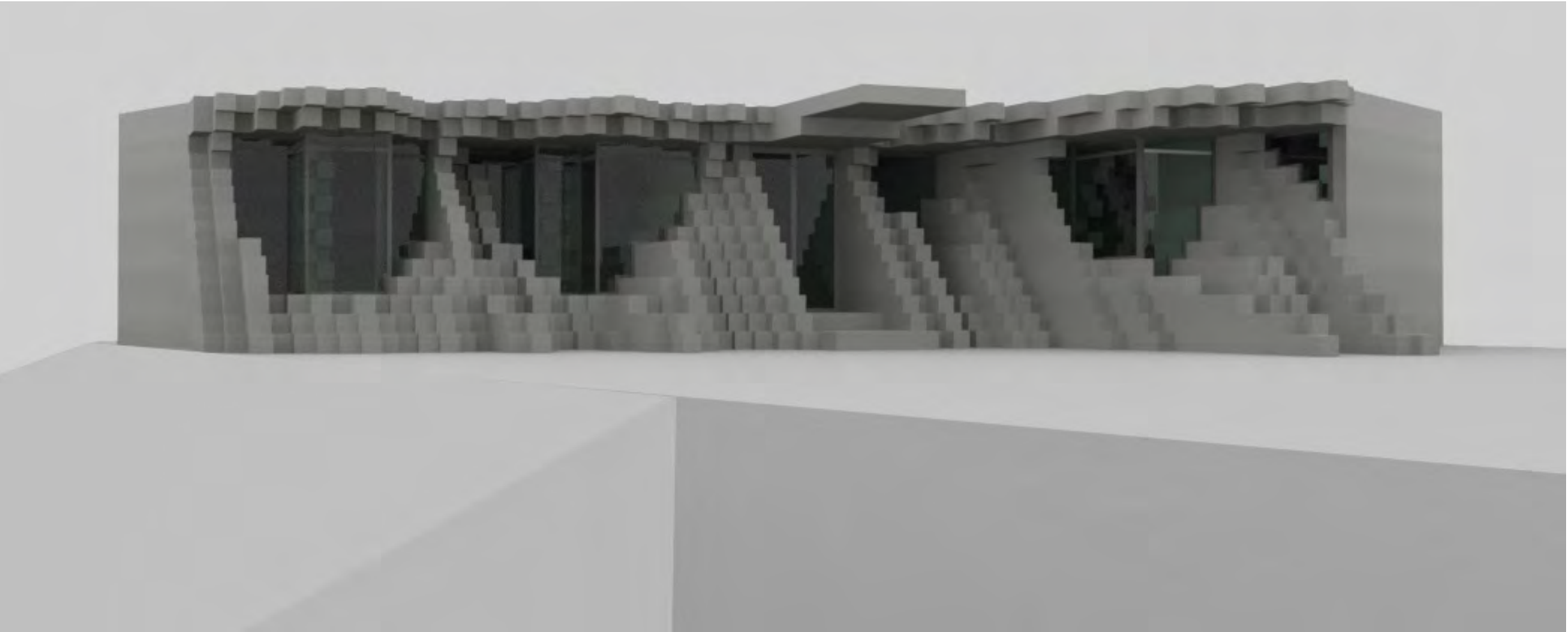
This aggregation is created from multiple copies of the three prototype based models (Beams), arranging them in response to the site to create space that pull, push and direct.

Model scale 1:50  
Drawing scale 1:200



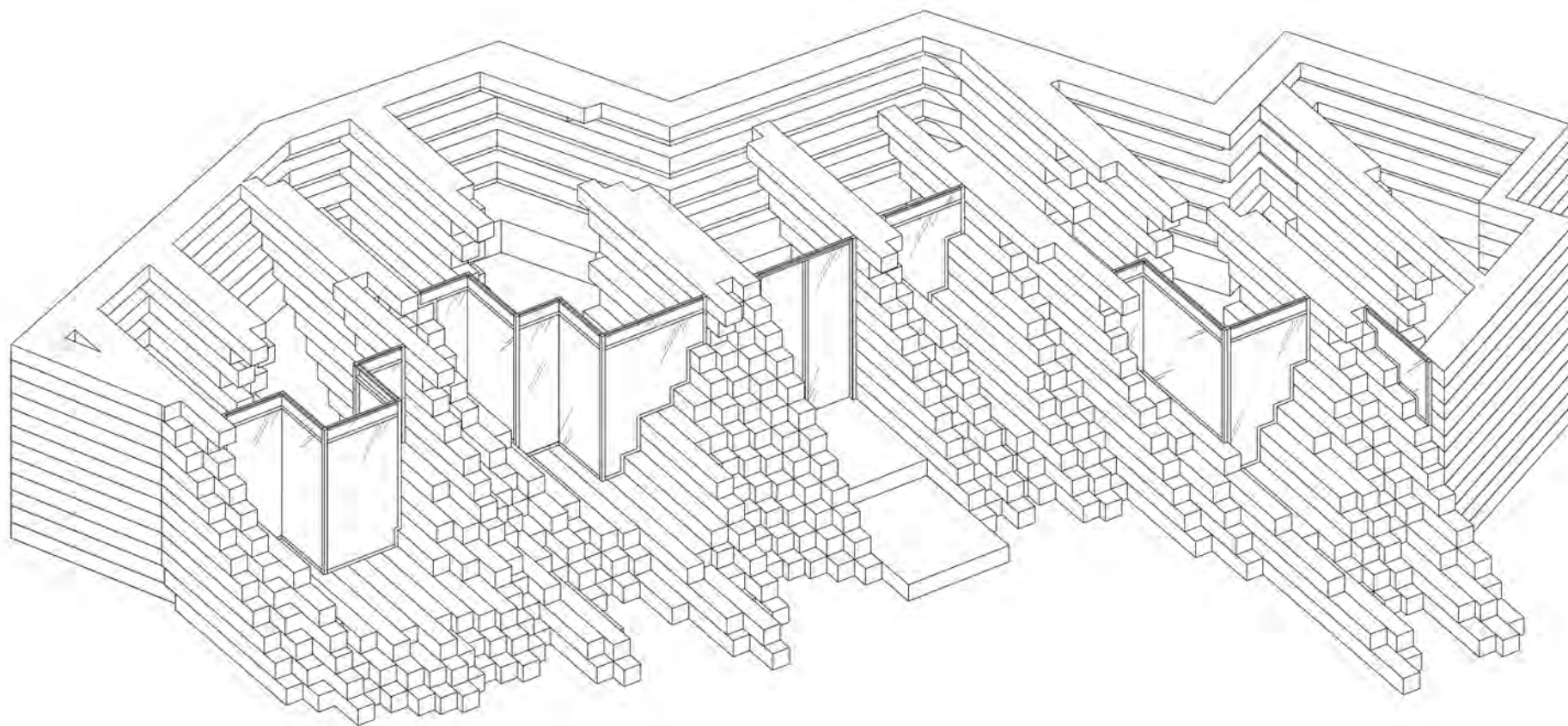
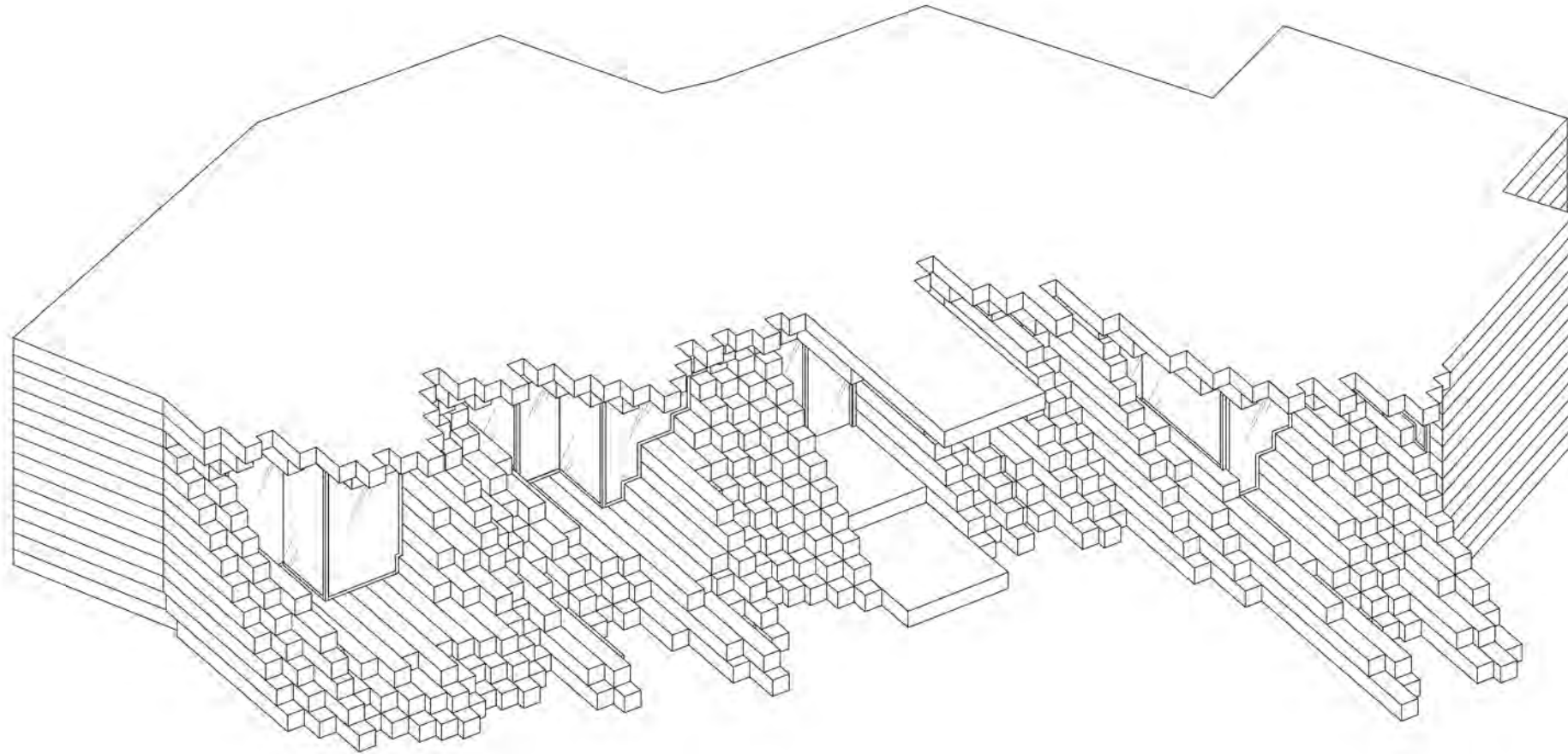


3D Model of the development of previous aggregation, laying it within the site boundaries. The **rigidity and flatness** of the cliff behind created a challenge and gave inspiration to lay down the beams in different direction **contrasting** with the **fluid facade**, directing the flow within the building.



3D model of the architecture created from the previous steps





This drawing shows the choreography between the aggregations, and the bench and shelves that are part of the wall  
Scale 1:100

## Narrative

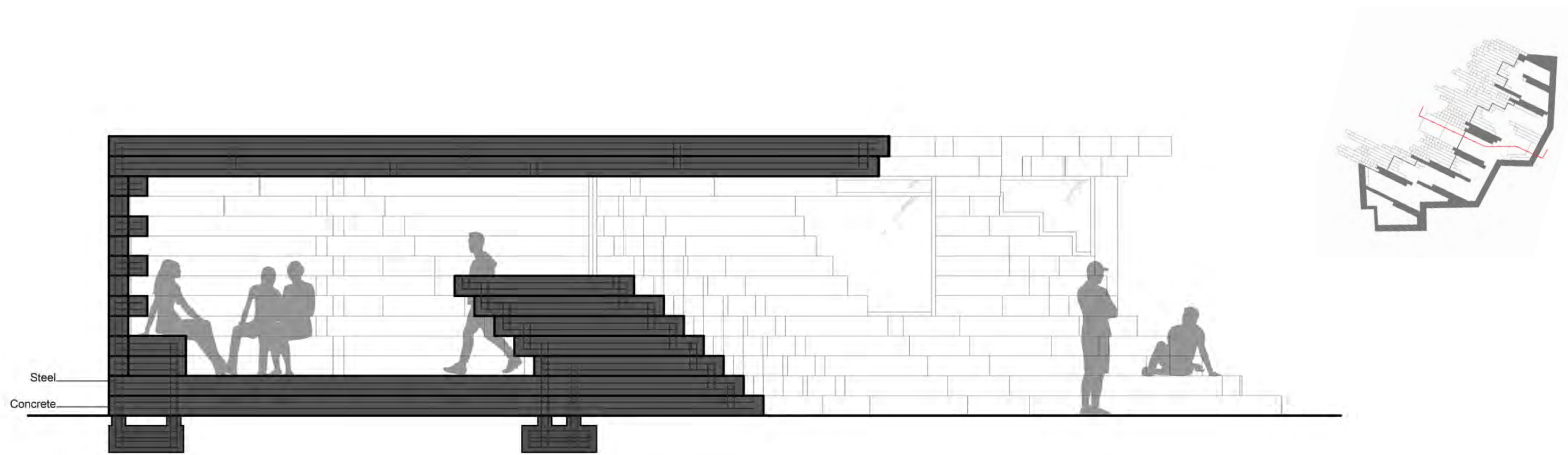
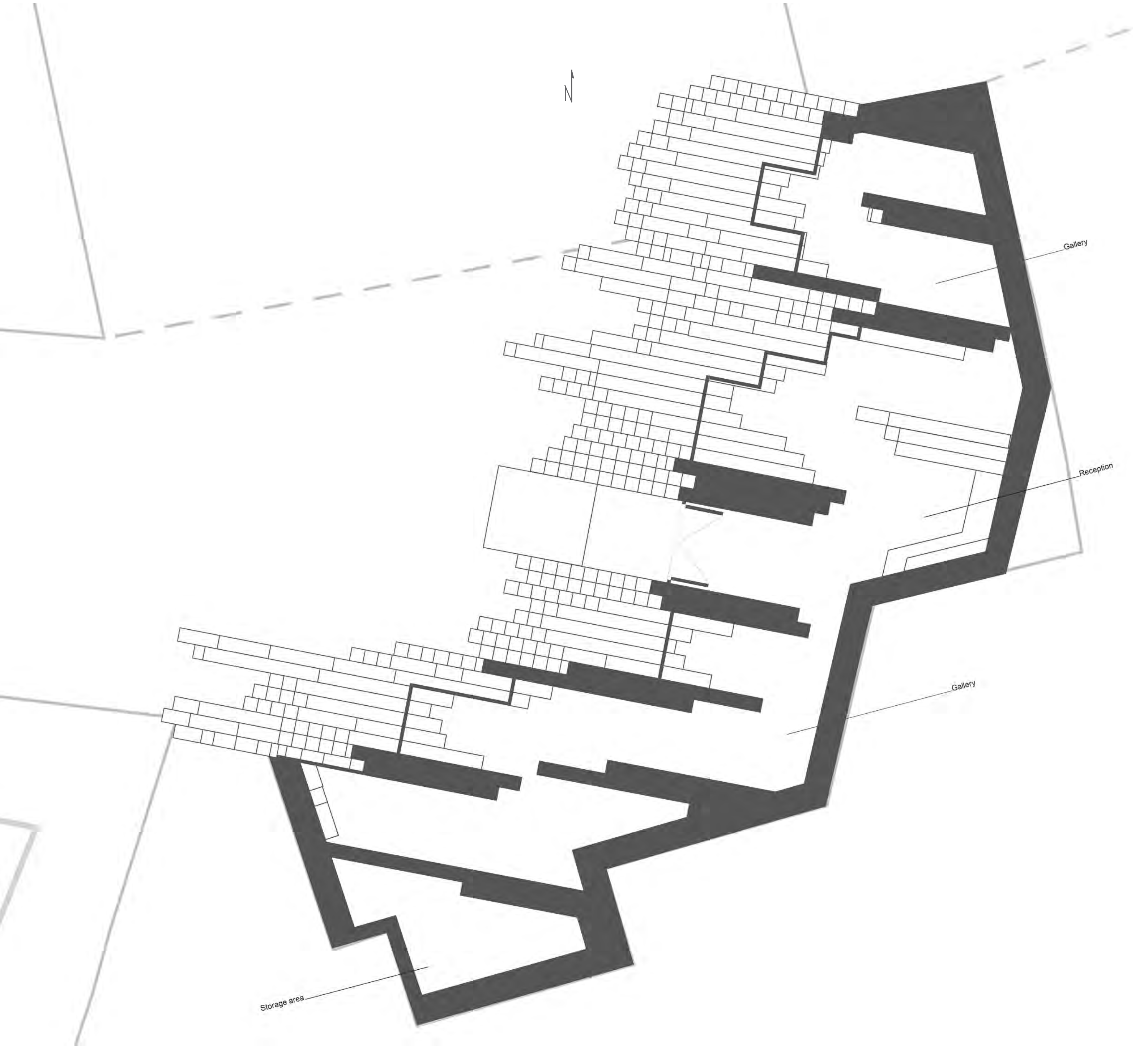
Inspired by the influence of the **soft and fluid** waves motion pushing and pulling the **hard and rigid** rock formation of the Wave Cut, The design creates space lead by choreography, a space that is curios in its surrounding and layout.

As the space is about pulling, pushing and choreography, a gallery could fit into the mould of the space. The space will function as a mini **photography gallery** that would host original photographs of Staithes and surroundings geology.

The **orientation** and location of the site is perfect for a gallery as it is facing north and it is right under the cliff. This position prevent direct sunlight which is a requirement for galleries, also the windows are positioned in a way to minimise direct sunlight.

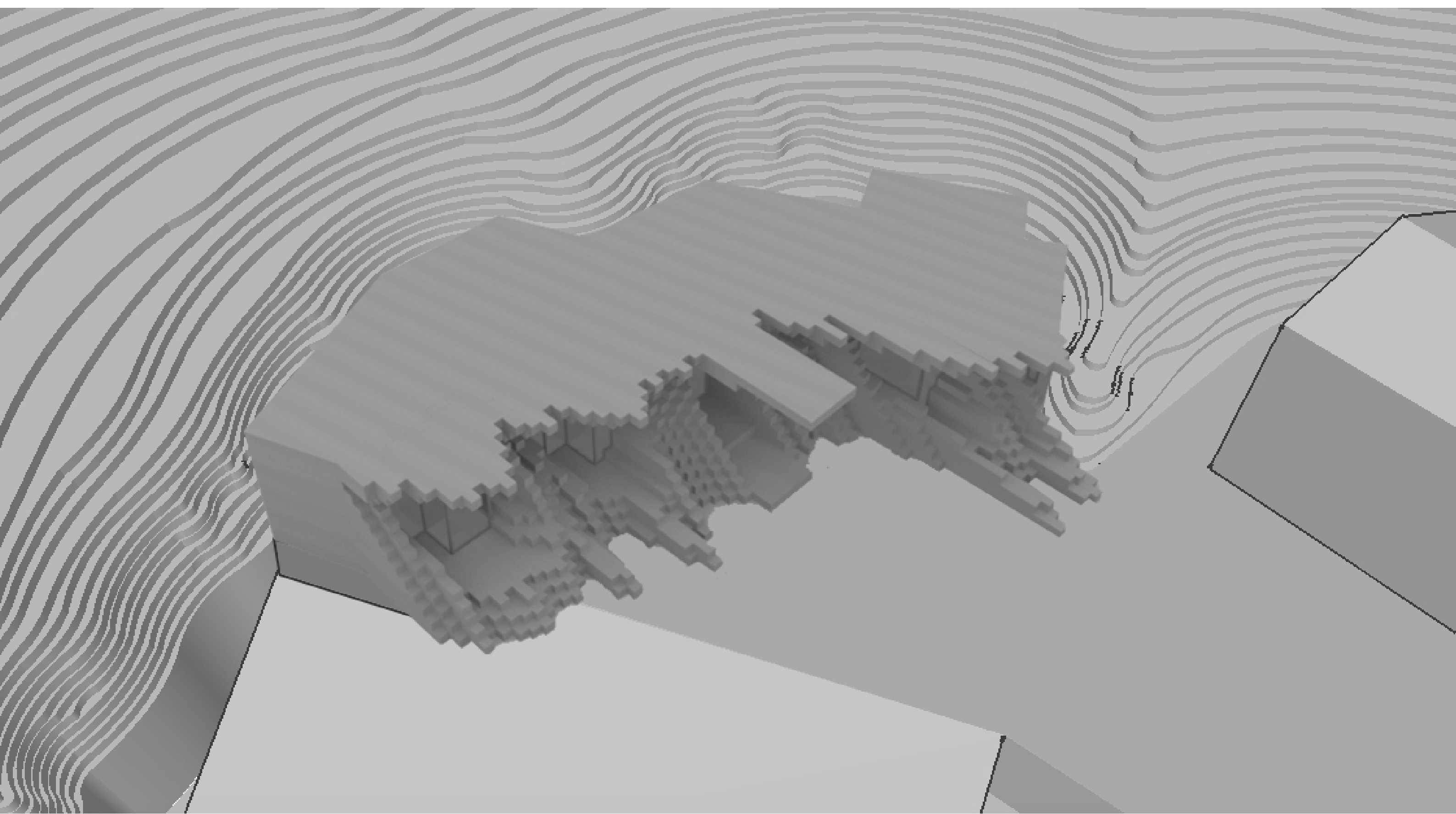
The gallery is made from one material which is concrete, inside and outside, even the furniture, which is minimal, it is part of the construction.



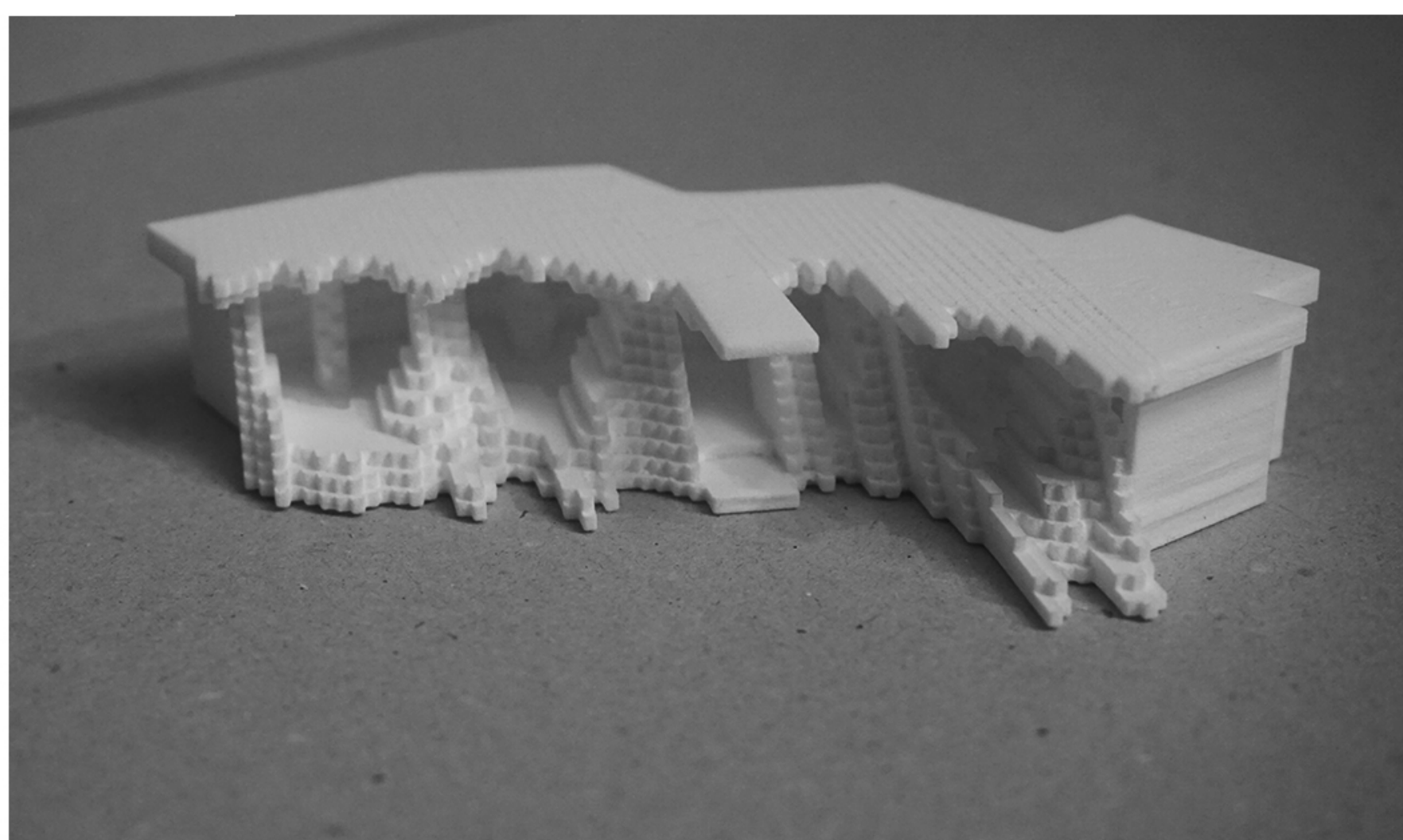
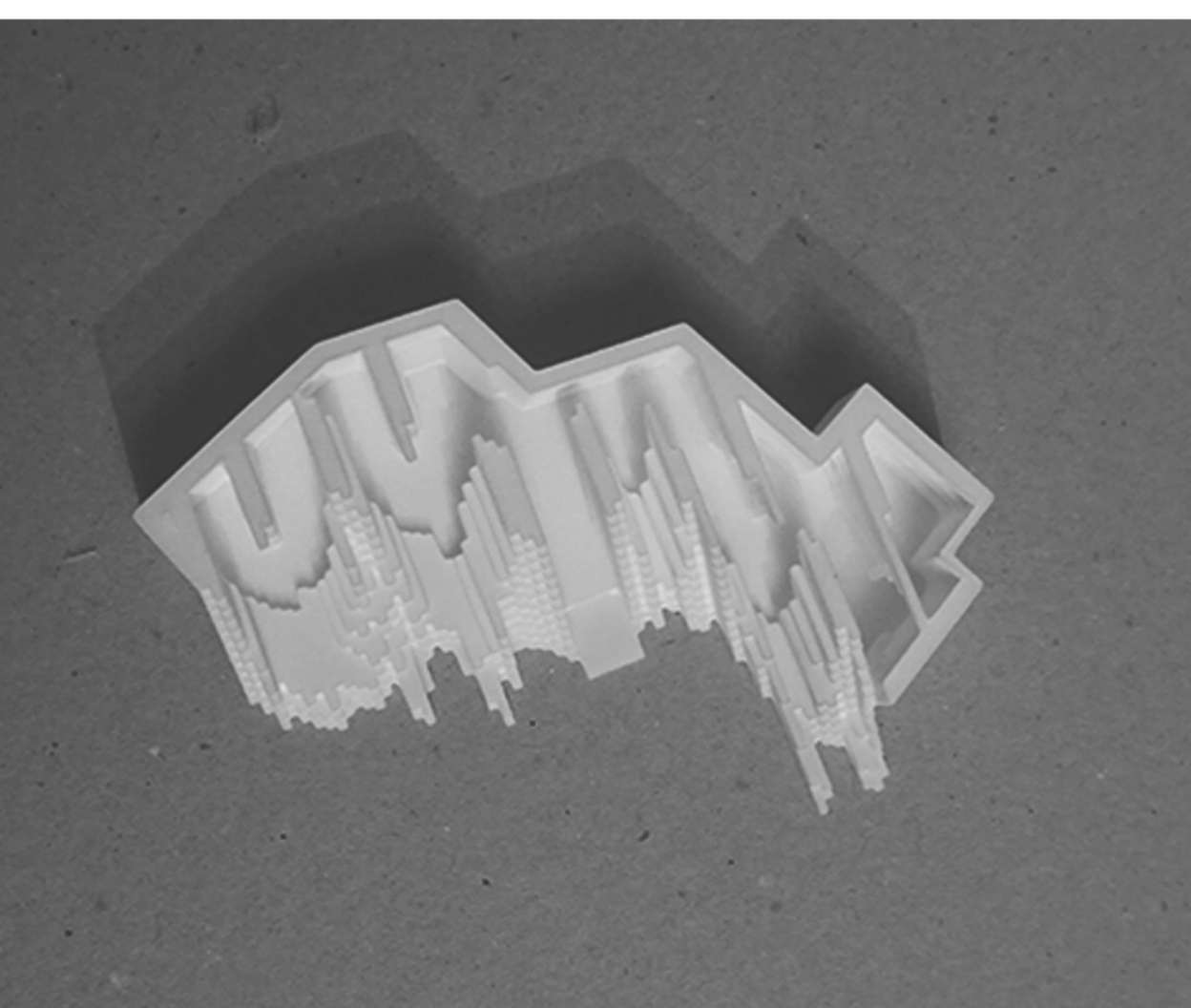


Structural section and plan in context  
Scale 1:50





3D model in context

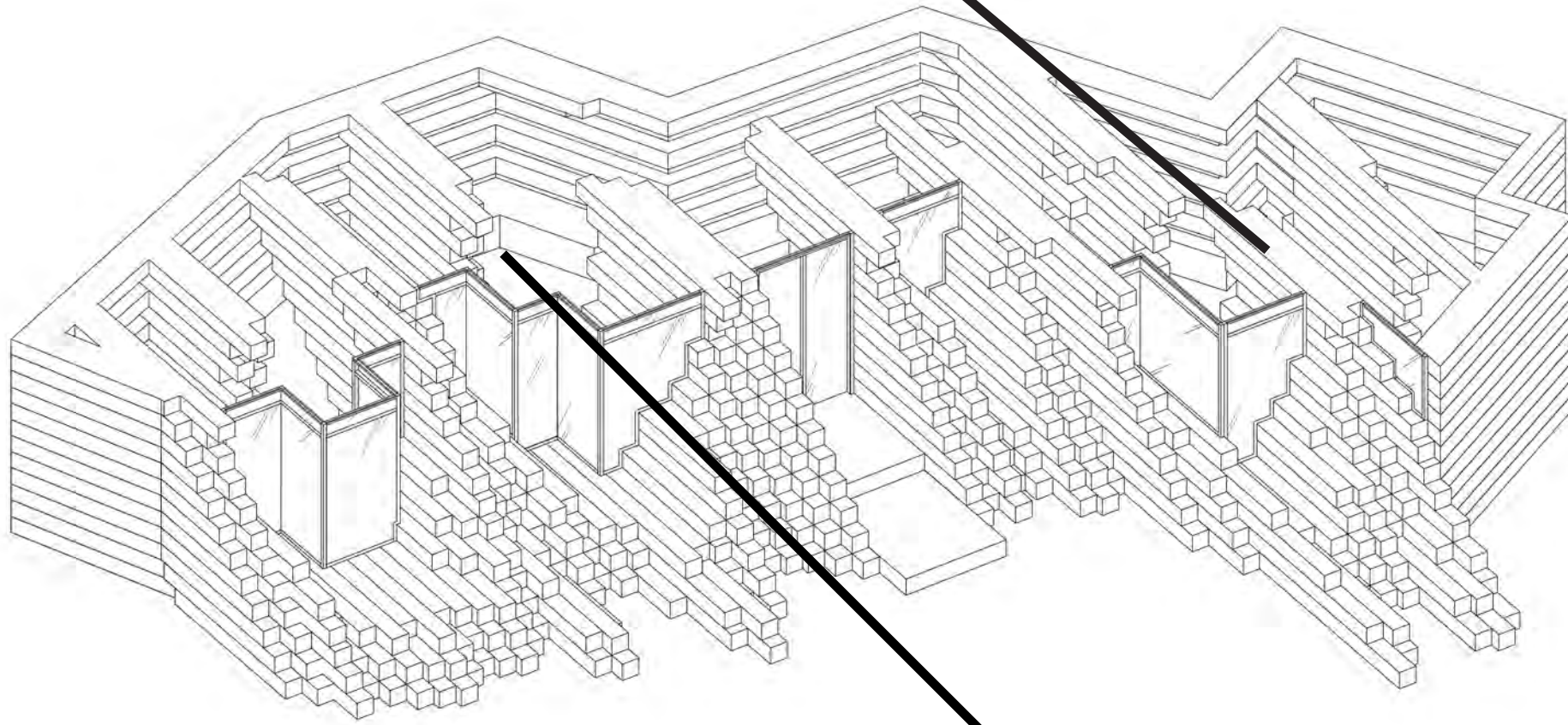


3D printed model  
Scale: 1:100





View from a part of the gallery



VIEW FROM THE RECEPTION





Front view



Architecture in context