

The challenge of designing a deployable installation began with researching frame construction typologies, which could offer kinematic opportunities. Through my research I interviewed Bradford Hansen-Smith, who directly studied geometry with Buckminster Fuller in 1982. During this time, he discovered a weaving pattern which joined paired rods at their ends to create a vector equilibrium in the center, allowing for movement. Using this fundamental pattern, various materials and diameters of rods/rubber connectors were studied to gain maximum performance. Multiple geometries were studied to understand their relationship to both motion and structure. The development of hybrid patterns and parabolic transformations of the fundamental weave allowed the final installation to structure itself while accommodating for user interaction. Tangential extensions of the patterns connection points highlight the differentiation between areas of volume and surface. The program of the model is both environmental and sculptural, while permitting a lively repositioning by the user.