**GEOMARKER**

**Overview**

The Geomarker is a public art lighting installation, shaped on the sign commonly used on digital maps to mark a destination point. In a context of returning to the sourse we mean a jorney with a start and end points. The Geomarker will show to the wayfarers desired destination point that’s they looking for. Currently this point is a Masdar-city. Thus we have find inspiration at the logo & indentity colors of Masdar city to design the Geomarker.

The widespread use of digital maps has brings this sign well recognizable, and its transfer to reality also causes certain emotions in the viewer. The height of the installation is 6 meters, so it can be clearly seen from a distance.

We realize that this is not the first attempt to transfer a sign from a virtual to a real one, but this time we created a fully-autonomous all-weather light installation of a universal form that is not related with any business corporation and does not infringes any copyright.

**Construction**

Construction of the art object is a polymer-coated metal frame covered with a banner mesh. The frame is installed on the concrete foundation. On the front sides of the art object installed the contours of the shape made of waterproof plywood. The lightbox in the middle of the front sides replicate the city of Masdar logo.

The Geomarker is equipped with the light system, consist of LED-neon backlight and two lightboxes, that is automatically turns on when it gets dark. All lightings are connected to the battery powered by solar panels placed on the top of the art object. The Geomarker can transmit the energy superabundance to a grid connection point to be designed by others.

**Conceptual cost estimate**

Foundation construction- 3000$

Steel frame fabrication – 7000$

Contours of the shape- 1000$

Cover mesh- 1000$

Lighting system – 2500$

Solar panels & equipment- 3000$

Assembly service- 500$

Total: 18000$

**Cost per watt**

Our calculations are based on a price of $ 3,000 for solar equipment and an estimated lifetime of 20 years. The aggregated capacity of solar panels is 350 watts / hour, expected annual capacity is 1050 kWh. We also consider a decrease of efficiency at second 10 years for 20%. Thus we got approx 1,5 $ costs per watt.

**Safety**

The art object is designed to withstand windgusts up to 25 m / s and completely safe for visitors. Direct public access to the art object is allowed. If necessary, anti-vandal equipment protection can be installed. The design has been successfully prodused, installed and tested.

**Environmental Impact Statement**

Proposed installation is designed for minimal impact on Masdar ecosystem. The Geomarker does not produce emissions – greenhouse or otherwise – nor any physical or airborne waste products. The structure is composed of recycled and renewable materials and, whenever possible, local materials with low transit impact. The steel structure is composed of recycled steel pipes welded into custom shapes, and is designed for clean deconstruction. Cover mesh is being removed and disposed of.

**Conclusion**

The Geomarker created for the public spaces design and allows to re-imagine any territory even without a comprehensive beautification.

The Geomarker designed as a permanent installation and will serve up to 20 years does not requireing any care. Cover elements can be replaced maintaining the same design. However, it is possible to completely change the cover design of the art object.