CLOUD BROCADE

WORKSHOP, CANADA & LE FESTIVAL BAINS NUMÉRIQUES, FRANCE TORONTO, CANADA - 2011 / ENGHIEN-LES-BAINS, FRANCE - 20 Philip Beesley Living Architecture Systems Group



Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012. Photograph: Nicolas Laveyroux First edition Published by Philip Beesley © Philip Beesley 2016

All rights reserved. No part of this catalogue may be reprinted or reproduced or utilized in any form or by any electronic, mechanical, or other means, now known or hereafter invented, including photocopying and recording, or in any information storage or retrieval system, without permission in writing from the publisher.

Every reasonable attempt has been made to identify owners of copyright. Errors or omissions would be corrected in subsequent editions.

Library and Archives Canada Cataloguing in Publication

Beesley, Philip, 1956-, artist, sculptor

Cloud brocade : workshop, Canada & le Festival Bains Numérique, France, Toronto, Canada - 2011, Enghien-les-Bains, France - 20 / Philip Beesley (Living Architecture Systems Group).

Exhibition catalogue. Includes bibliographical references. Electronic monograph in PDF format. ISBN 978-1-926724-78-2 (pdf)

I. Beesley, Philip, 1956- --Exhibitions. I. Title.

NA749.B434A4 2016

709.2

C2016-902200-5

Publication Design and Production Philip Beesley Architect Inc. This publication is set in Gill Sans

DOI 10.21312/978-1-926724-78-2

This publication is available for download at: http://www.philipbeesleyarchitect.com/sculptures/1114-1214_Cloud-Brocade/Cloud-Brocade/PDF-Article.pdf



2 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012

INTRODUCTION

Cloud Brocade is a vertically oriented suspended geotextile equipped with a network of vessels that accumulates tiny amounts of stray organic matter from its surroundings. The underlying geometry of this work is generated from individual rhombus shaped elements, arranged in a non-repeating Penrose tessellation. Each tile can assume any of ten possible planar orientations allowing informal assembly akin to self-generation in natural growth patterns. Custom snap-fit silicon joints, acting much like cartilage, form resilient connections between elements giving the overall textile a high degree of flexibility and making it tolerant of large geometric distortions.

The *Cloud Brocade* system is organized in three strata that work in concert, performing functions of filtering, accumulation and primitive digestion. Tetrahedral pyramid skeletons made from custom laser-cut acrylic components form a delicate space-truss, studded with an array of small glass vessels that slowly gather atmospheric deposits. The vessels are seeded with simple 'protocells' that initiate primitive biological functions. A network of tubes affixed to the truss creates a basic circulatory system, connecting the glass vessels and enabling passive chemical exchanges. Felted layers of mylar fronds line the opposing side of the truss, acting as filtering membranes that pull valuable matter into the inner layers.

Cloud Brocade was first exhibited between October 2011 - February 2012 at WORKShop, an experimental design centre and gallery in Toronto, Canada. In June 2012, the sculpture was exhibited as part of Le Festival Bains Numériques in Enghien-les-Bains, France alongside a showing of photographs, drawings and video depicting the *Hylozoic Series*.

EXHIBITION CREDITS

ARTIST

Philip Beesley

DESIGN TEAM

Eric Bury Martin Correa Jonathan Tyrrell Susanne Eeg

STUDIO TEAM

Sue Balint Brandon DeHart Hayley Isaacs Andrea Ling Elena Moliotsias Anne Paxton Anne Sewell Kristie Taylor Mingyi Zhou

VOLUNTEERS

Ramona Adlakha Mehreen Ali Allison Cheng Ji Hee Choi Ishan Patel Michael Yu

SPONSORS

Ontario Arts History Canada Council for the Arts Social Sciences and Humanities Research Council of Canada Natural Sciences and Engineering Research Council of Canada Waterloo Architecture



3 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012 Photograph: Nicolas Laveyroux



4 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012



5 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012



6 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012



7 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012



8 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012



9 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012



10 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012



11 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012



12 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012



13 Cloud Brocade - Toronto, Canada - 2011 & Enghien-les-Bains, France - 2012. Photograph: Nicolas Laveyroux

REFERENCES

For Further Reading:

- Beesley, Philip, ed. Living Cities: Vision and Method. Cambridge: Resource Positive Architecture and Waterloo Architecture, 2011. Print.
- Beesley, Philip. Hylozoic Ground: Liminal Responsive Architectures. Toronto: Riverside Architectural Press, 2010. Print.
- Beesley, Philip. "Case Study: Meshes as interactive surfaces." Digital Fabrication in Architecture. By Nick Dunn. London: Laurence King, 2010. 46-48.
- Beesley, Philip. "Soil and Protoplasm." Manufacturing the Bespoke. Ed. Bob Sheil. London: Wiley, 2010. 102-119.
- Beesley, Philip, ed. Kinetic Architectures and Geotextiles Installations. Toronto: Riverside Architectural Press, 2007 & 2010. Print.
- Krauel, Jacobo, Jay Noden, and William George. Contemporary digital architecture: design & techniques. Barcelona: Links, 2010.
- Schwartzman, Madeline. See yourself sensing: redefining human perception. London: Black Dog Publishing, 2011. 62.