

HELENA PORTO
MARINAH RAPOSO
CAROLINE AQUINO
GEORGE RAPPEL

ORIENTAÇÃO: MALU FRAGOSO E GUTO NÓBREGA



PESQUISA

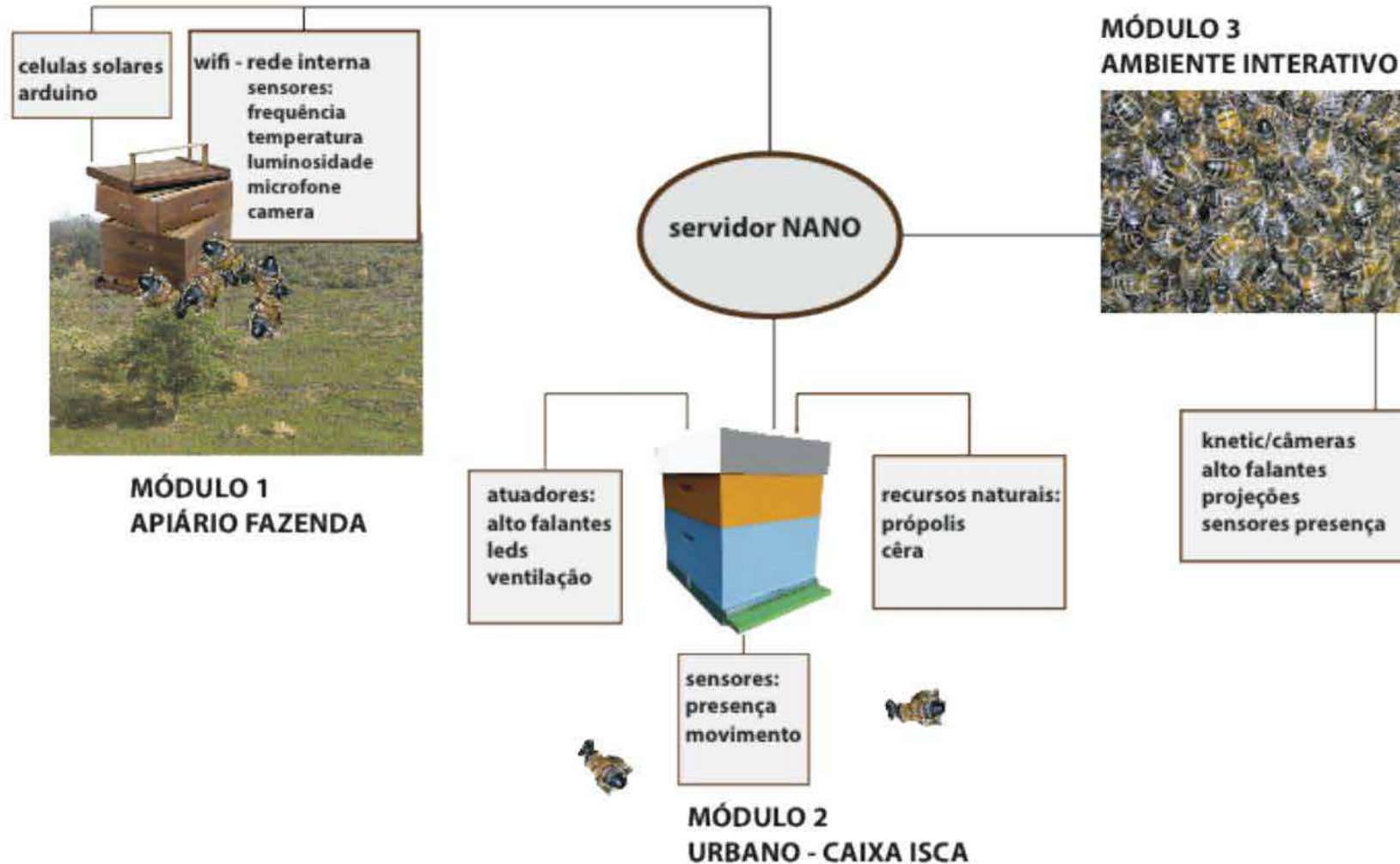
.formas, materiais, processos construtivos dos objetos e estruturas desenvolvidos pelo nano.

.otimização, aperfeiçoamento de tais formas, uso de materias e processos.

.buscar soluções para os mais diversos desafios construtivos.

PROJETO

S.H.A.S.T. - Sistema Habitacional para Abelhas Sem Teto



OBJETO

NÓS ABELHAS

instalações interativas
que representam de
forma metafórica o
ambiente das abelhas

- .portátil
- .interessante visualmente
- .fácil fabricação
- .dialogar com a poética do projeto



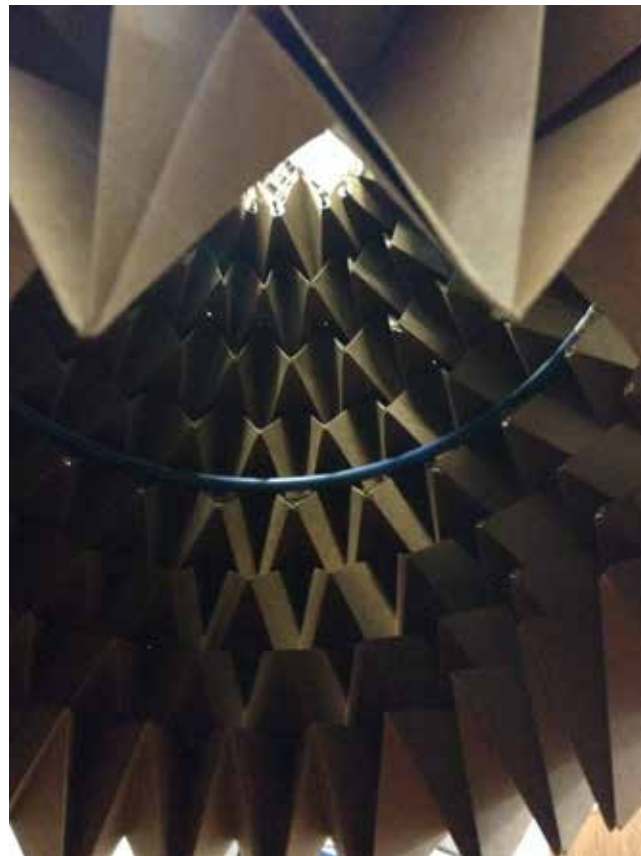
OBJETO

NÓS ABELHAS

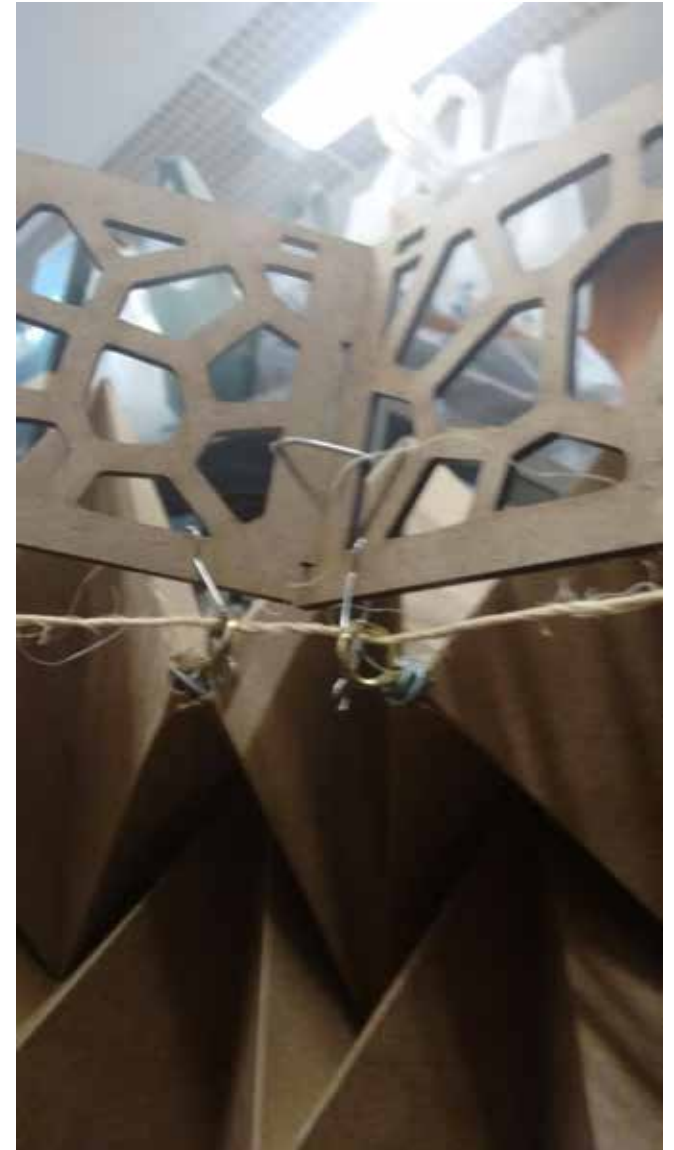
- .forma: origami waterbomb
- .material: papel craft 420mg
- .processo: corte laser



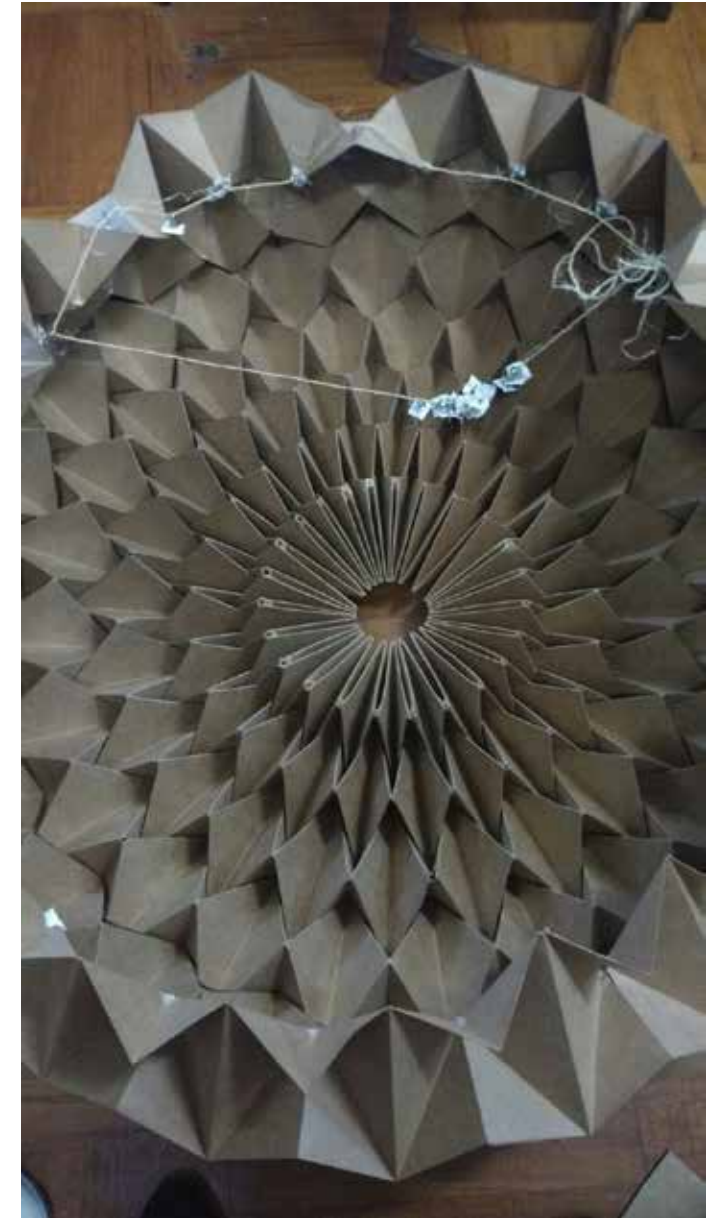
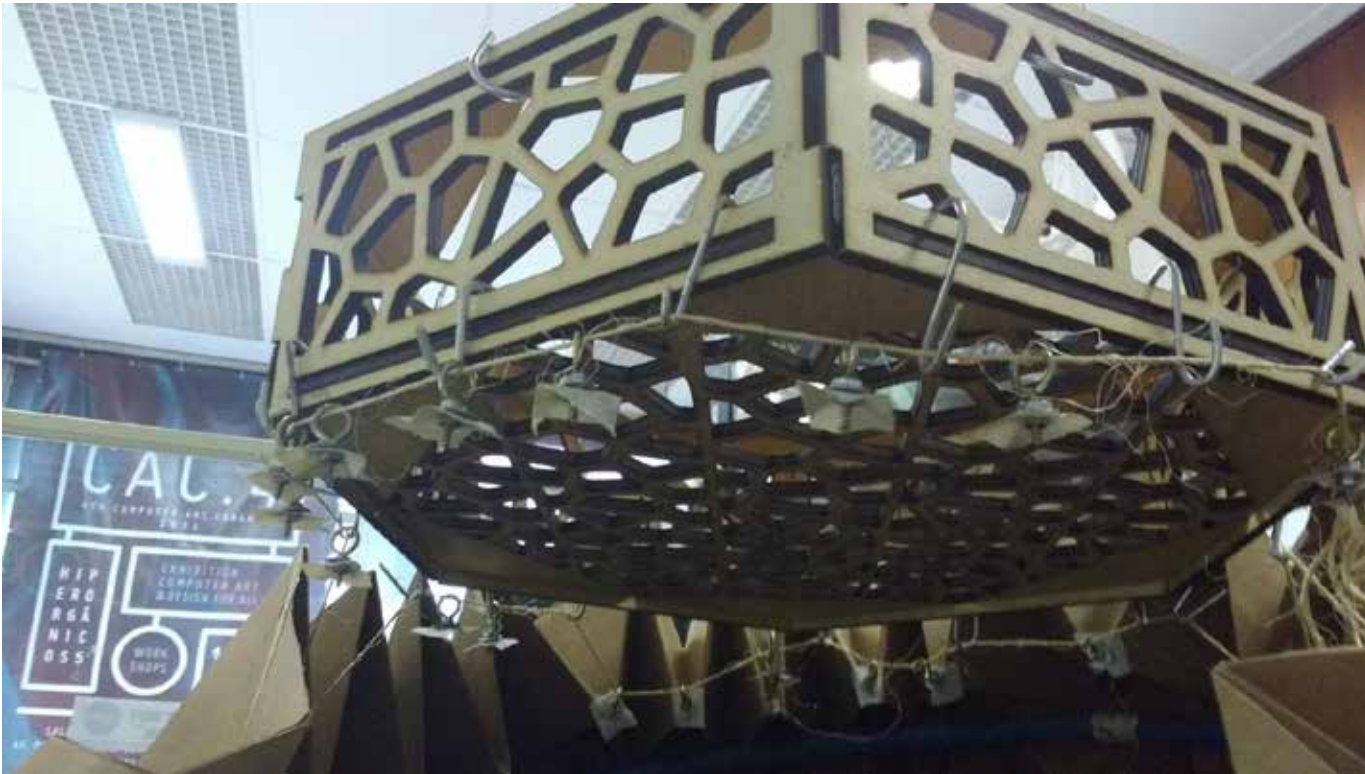
OTIMIZAÇÃO FORMA



OTIMIZAÇÃO ENCAIXES



OTIMIZAÇÃO ENCAIXES

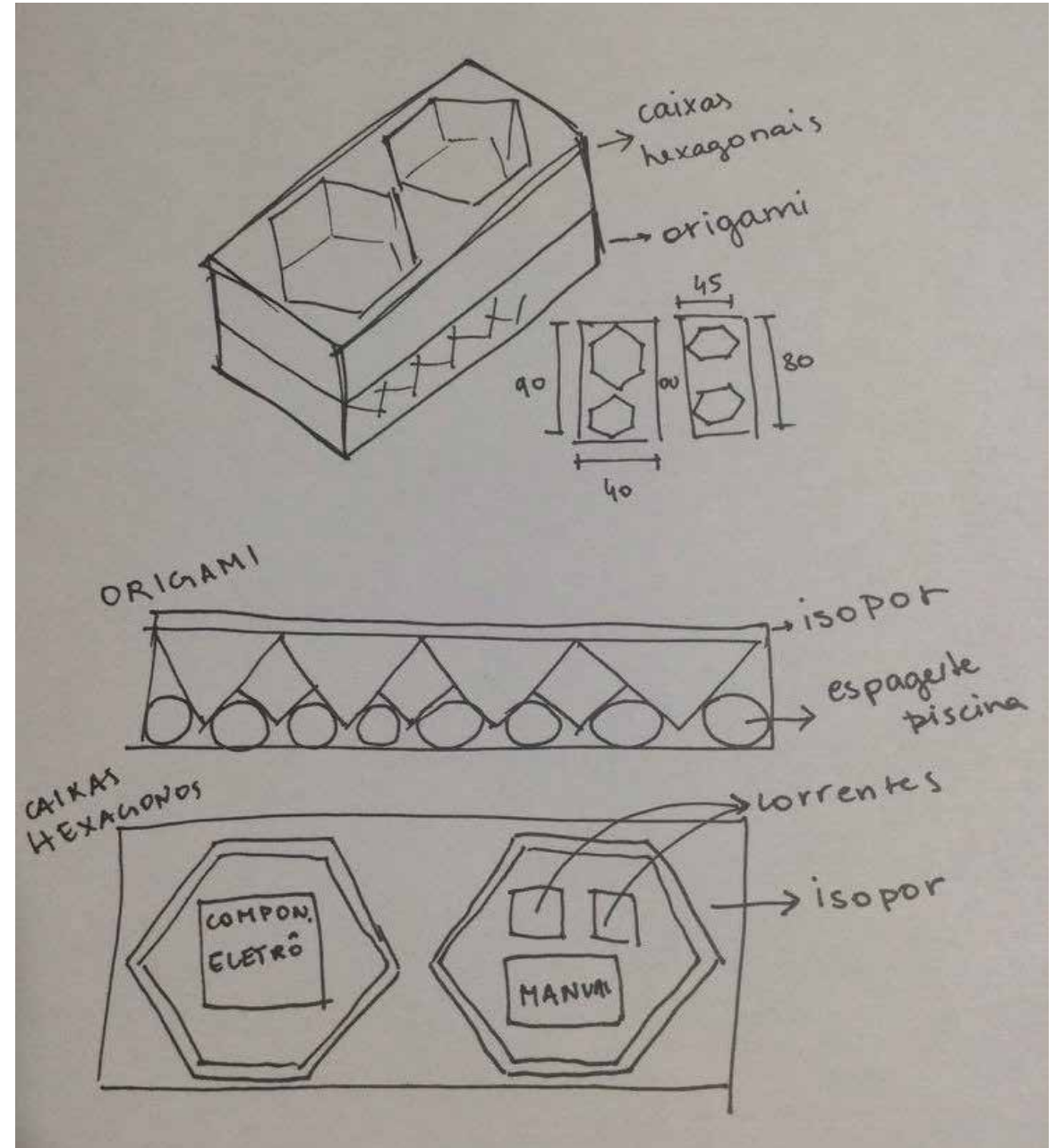


OTIMIZAÇÃO ENCAIXES



EMBALAGEM

- .leve
- .compacta
- .baixo custo
- .protege o objeto



EMBALAGEM

.material: isopor, papelão,
papel craft, espuma de
polietileno (espaguete)





MANUAIS: FABRICAÇÃO E MONTAGEM

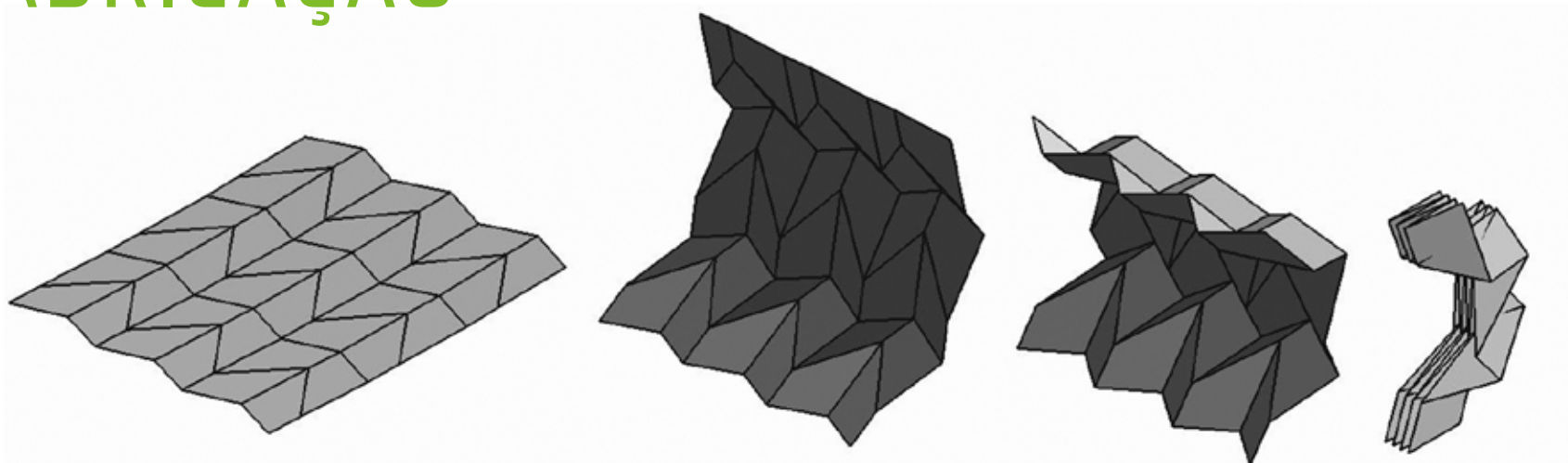
.otimização dos processos de
fabricação e montagem

.permttir que qualquer indivíduo consiga:

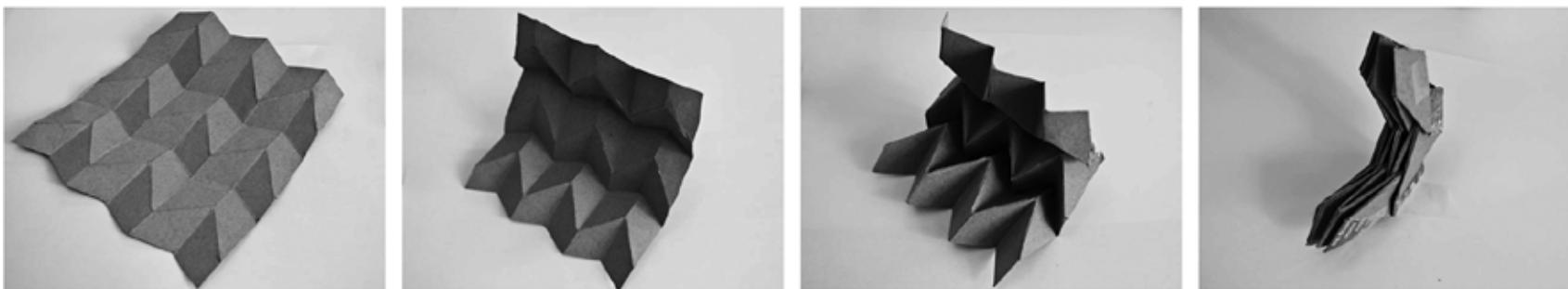
_montar a obra de forma rápida

_fabricar de forma autônoma uma unidade
completa (origami, caixas hexagonais)

MANUAIS: FABRICAÇÃO



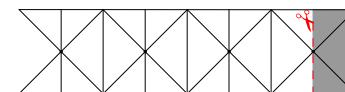
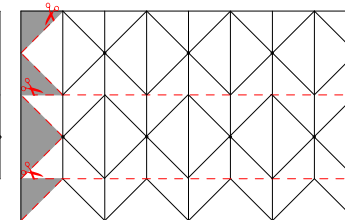
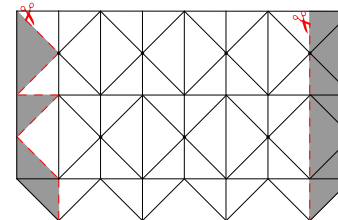
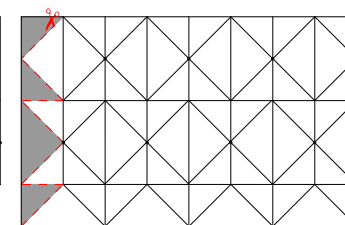
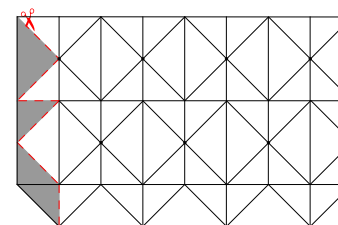
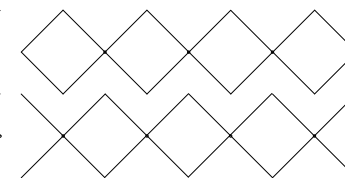
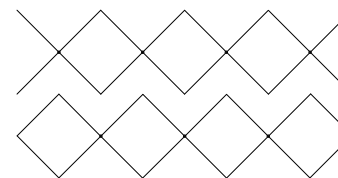
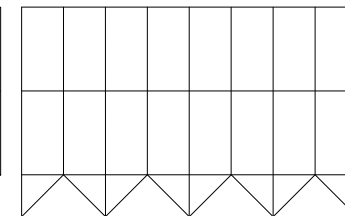
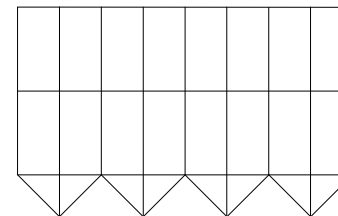
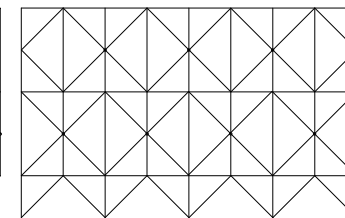
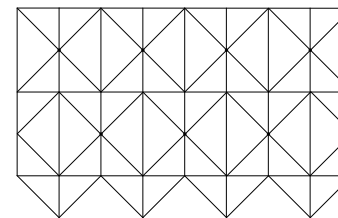
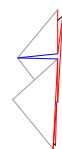
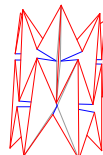
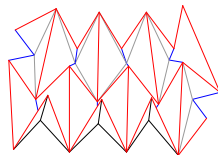
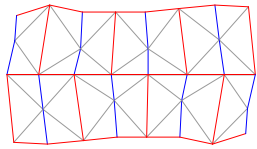
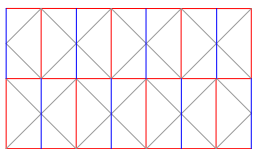
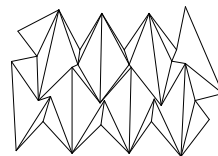
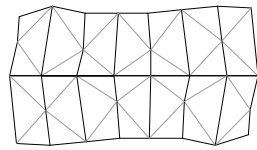
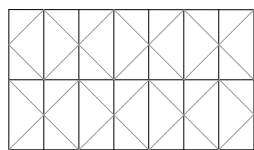
(a) Folding sequence simulated in MATLAB



(b) Folding sequence of card prototype

referência

MANUAIS: FABRICAÇÃO



OUTROS MATERIAIS

TECIDO

.processo: plissado no vapor



Alex Wolfe + Mahvish Nagda

OUTROS MATERIAIS

TECIDO

.processo: plissado no vapor



Alex Wolfe + Mahvish Nagda

OUTROS MATERIAIS

TECIDO

.teste de testes plissado no calor
(180°C-30min no forno)

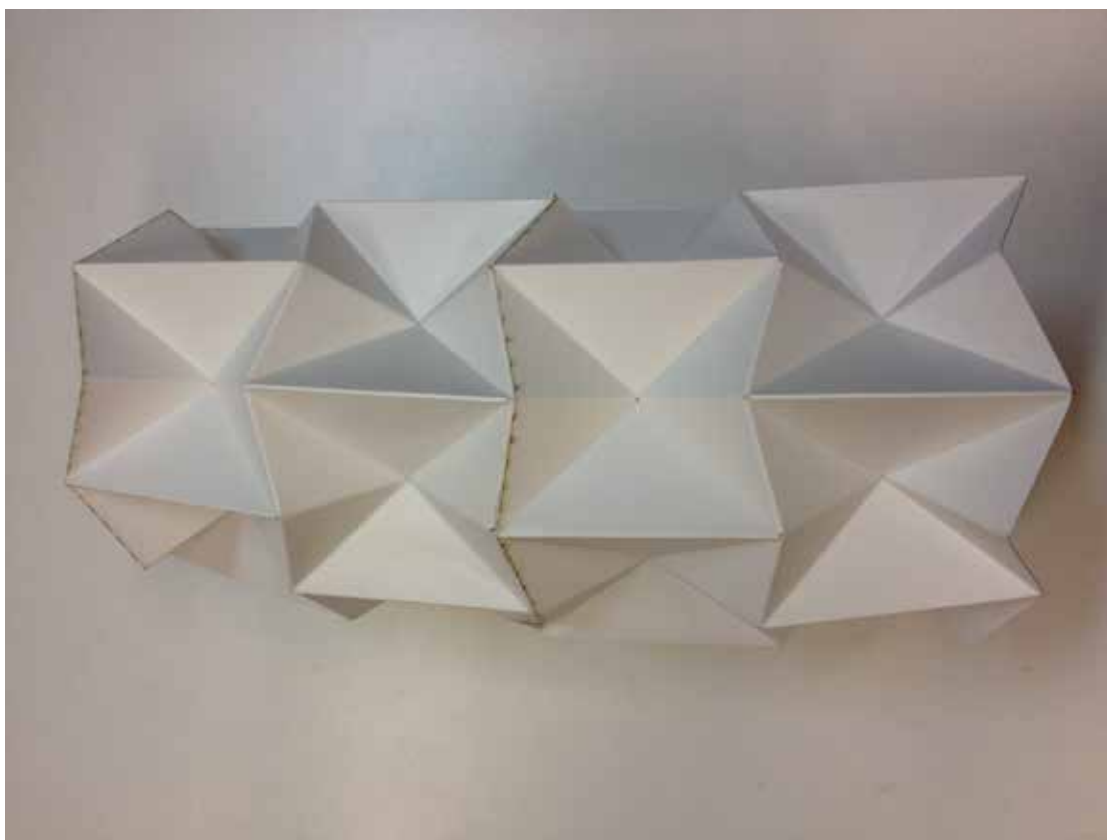
.tecido de poliéster



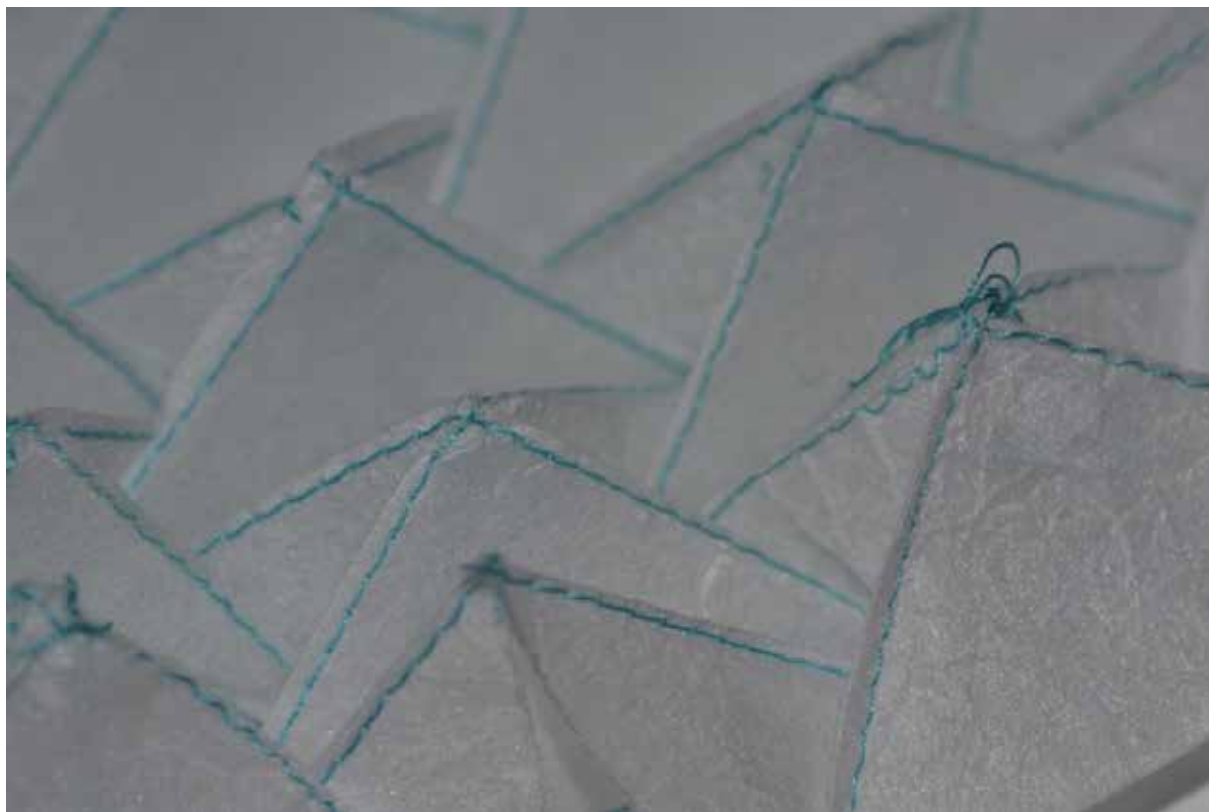
OUTROS MATERIAIS

PLÁSTICOS

.polipropileno .corte a laser

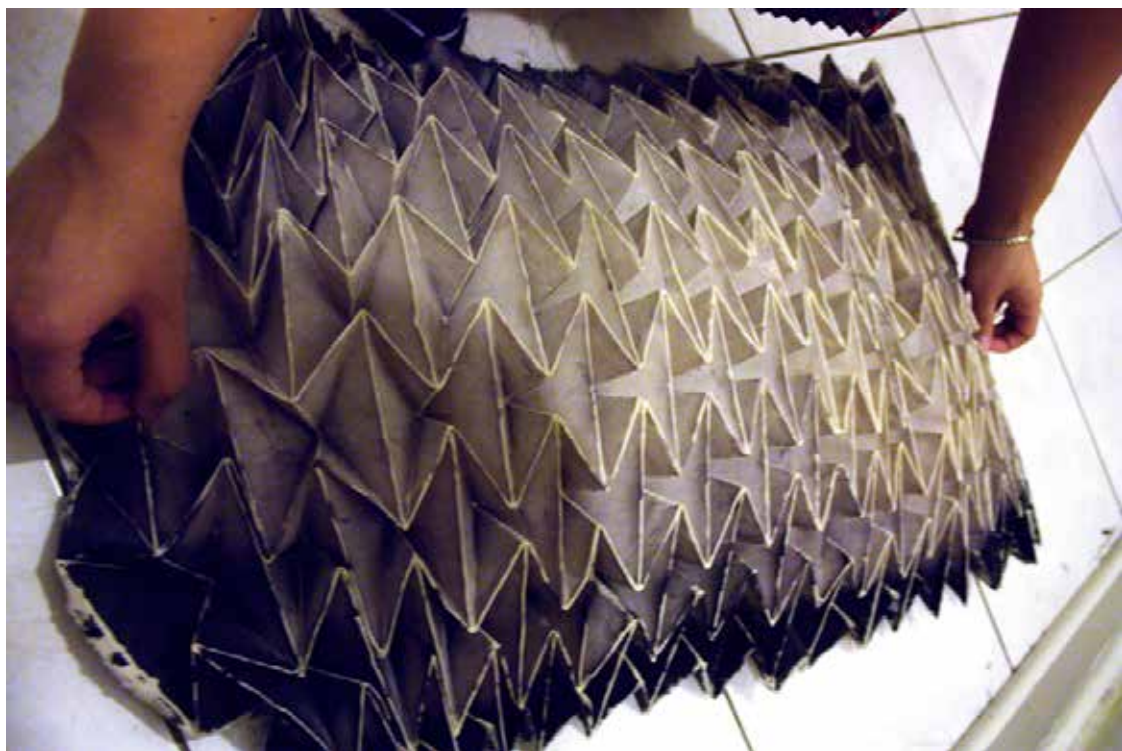


NOVAS POSSIBILIDADES TECIDO



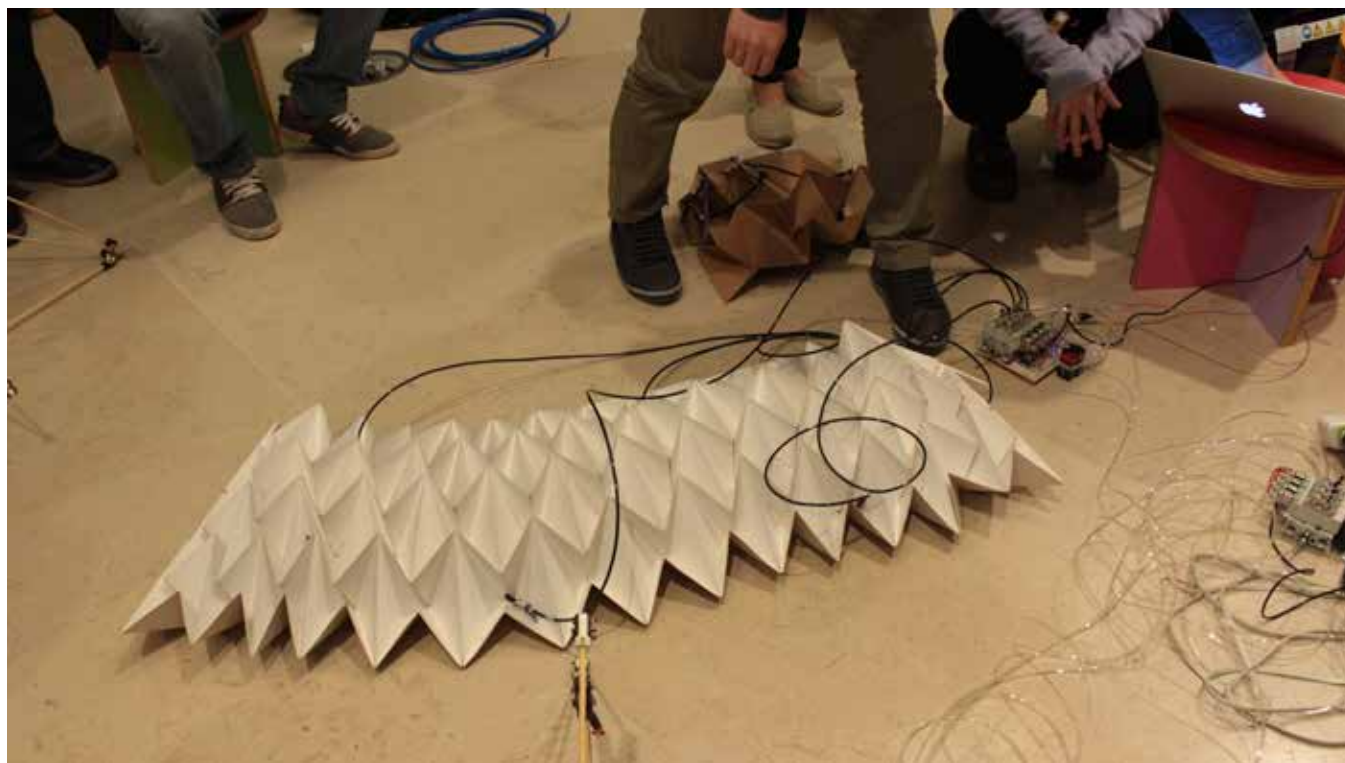
Lynsey Calder

NOVAS POSSIBILIDADES TECIDO



Alex Wolfe + Mahvish Nagda

NOVAS POSSIBILIDADES MOVIMENTO



Workshop “Construindo Proto-Ecologias”

OBRIQADA!