

Bertín López
Portfolio

ARCHITECT / DESIGNER / MERCENARY

2020

NEFLIUM

Mexico City

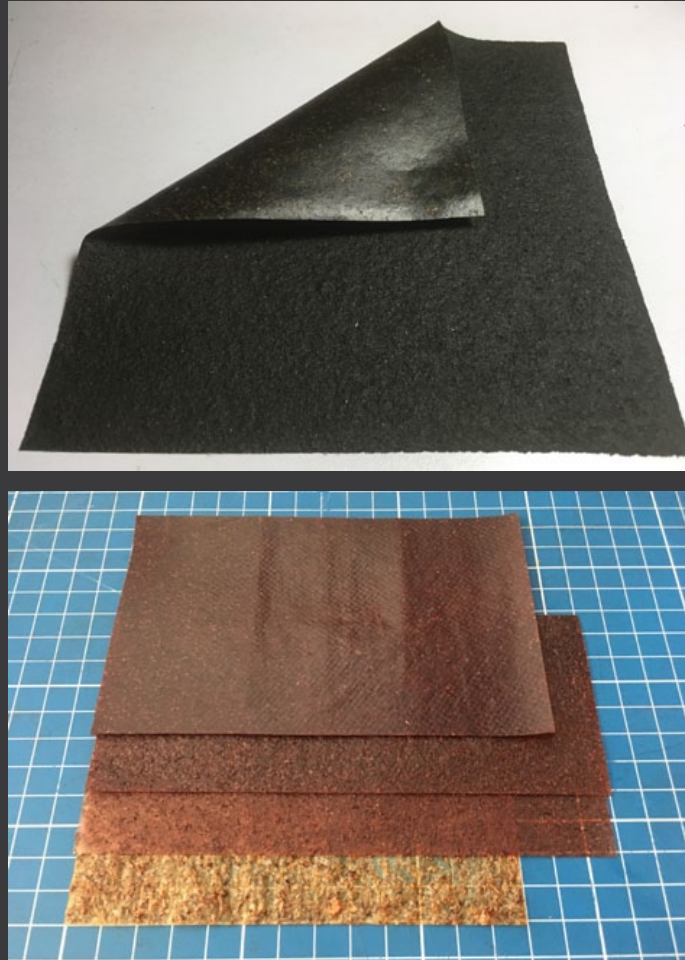
Portfolio 12-20

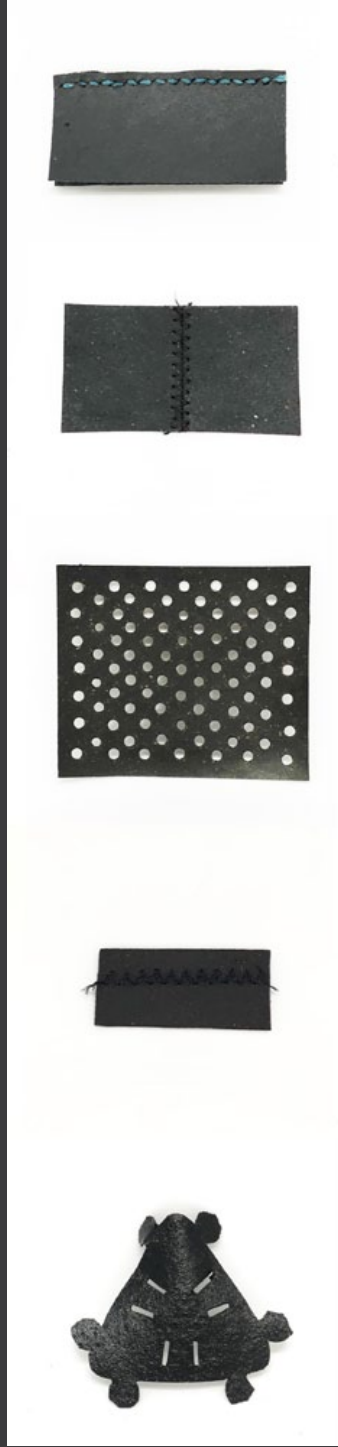
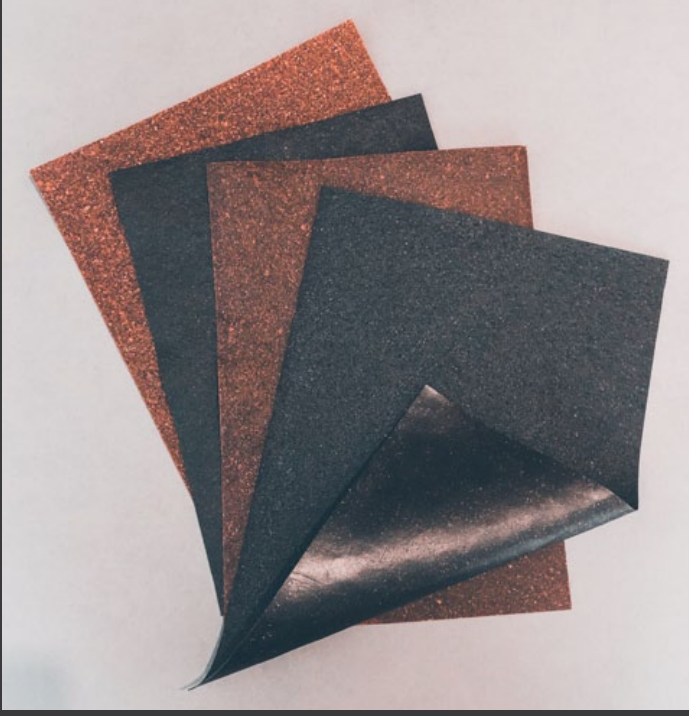
Berlin Lopez
With the advice of Biology Studio
biologystudio.com.mx/

Neflium is my current and most ambitious project. It's a fruit base leather under developing, and it's made principally with the waste of tropical fruits from the south part of Mexico.

Using the fruit waste and other biodegradable components I created a material that is similar to leather, sharing some aesthetic characteristics but with particular and unique properties.

Depending on the formula and the components can vary its flexibility and resistance, but always conserving a sweet smell and rough but curious and natural texture. The most important part of its composition is that it's created only using 100% of biodegradable and non-toxic ingredients, also designed with the methodology "From Cradle to Cradle" thinking always from a perspective of the natural cycles of the organic materials.





2020

NEFLIUM

Mexico City

Portfolio 12-20

Berlin Lopez
<https://www.behance.net/Rebeldo>

I have designed two specific products at this point with my material, one is a case for AirPods and the other is a wallet. Both products were designed and made with the same ecodesign principles of Neffium for example, avoiding the use of glue, paint, toxic chemicals or components. On the other hand, I tried to make useful objects but with an elegant aesthetic appearance.

These objects are commonly fabricated in animal leather, which uses a lot of water and toxic chemical in its production and causing a tremendous environmental impact. What I'm trying to achieve is to design a collection of objects to replace common use disposable products that are made with toxic and long-term degradable materials.

I used handcraft techniques of leather working combined with digital fabrication strategies to fabricate products, combining the best of both approaches. At the end, the resulting objects have more environmental and design values than common use products made with leather or plastic.

Neffium it's a noble material that has clear applications for fashion, furniture and design. The next phase is to use to fabricate bigger objects with complex geometry.



17-19 STUDENTS PROJECTS

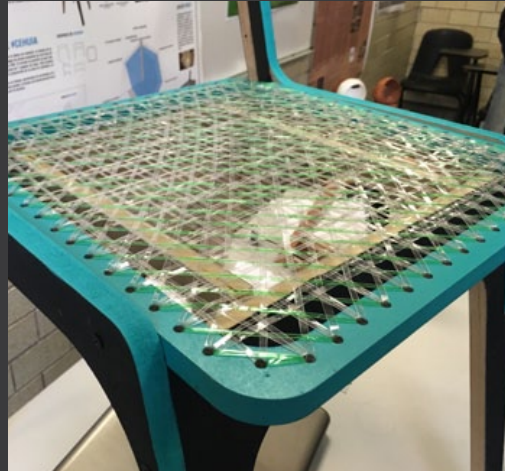
UNITEC-Mexico City

Portfolio 12-20

Berlín Lopez
As teacher for Technologic University of Mexico (UNITEC)
<https://www.unitec.mx/>

Here I present some of my students projects developed during the Ecodesign course I teach at UNITEC university in Mexico City. The course is mainly focused in the design of certain type of products using the "cradle to cradle" methodology and combining the material experimentation but with the approach of concepts like, life cycle of materials, sustainability, recycling, upcycling, carbon cycle and many others.

The students can choose between 5 different type of projects: Pet-base products, powerless speaker, habitat for plants, food packaging and packing lamp. They develop the projects during a 3 months course from theory to a full-scale functional product. During the past 3 years we have created more than 150 products which include the use of biomaterials and composite materials developed by experimentation in class. Resulting not only in new products but in new ways to use materials.



2019 Boost Stand

Mexico city

Portfolio 12-20

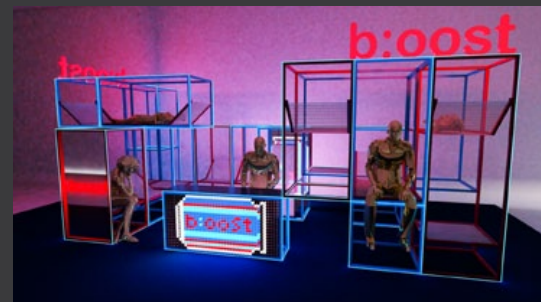
Berlin Lopez
As external Designer for Kano&Co
kanojco.com

The main idea for this project was to have modules that can be assembled in function of the square meters required by the brand depending by the scale of the venue where they have to present their products.

The first aesthetic element of the design was the use light to reinforce the concept of modules but at the same time to introduce the visitor to the institutional colors of the brand, so they can distinguish the brand from the competitors.

Another important element was the use of an infinity mirror to give the users a photo opportunity moment and not only exhibit product. In other modules the users can recline and relax or they can explore upper modules guided by the lights.

The final result was an adaptive and attractive installation that can be refreshed easily and represents proudly the values of the brand.



2018

Magento

Mexico city

Portfolio 12-20

Berlin Lopez
As external Designer for Kano&Co
kanojco.com

The main idea for this project was to use one big element to make visible the stand from the distance, but at the same time we wanted a clean stand without big structural elements that can distract the visitors. The solution was a simple ribbon that crosses the entire stand, this element has many functions. First of all, is the support of the main identity element, which is the logo, secondly it provides the general illumination of the scene and, and finally it has publicity and tv screens for brand visuals.

At the end we did a project that is visible from the distance, has brand identity, and obviously uses the institutional colors, but its clean and simple. The result it's an attractive stand realized with very small budget that meets client needs.



2018

Mayan Warrior

Burning man-USA

Portfolio 12-20

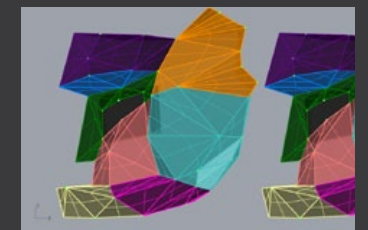
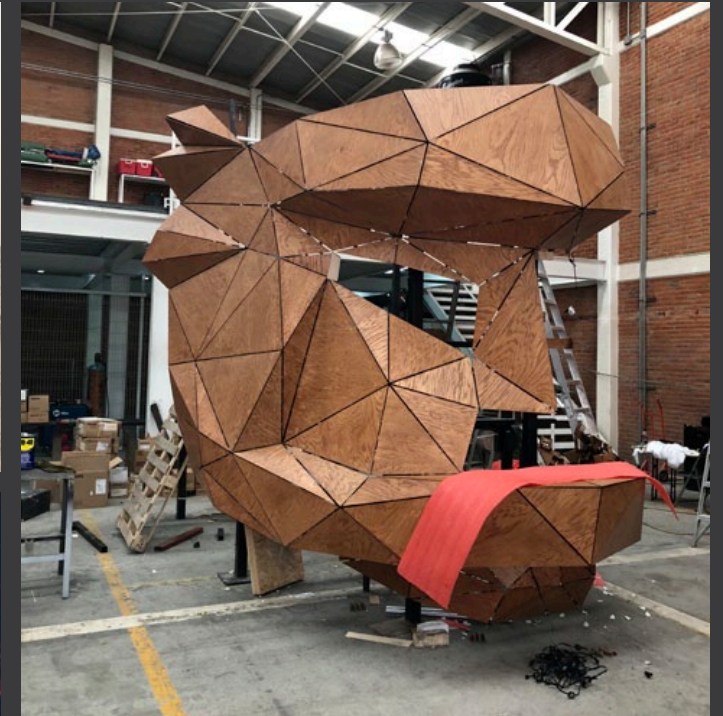
Berlin Lopez
As Designer & Fabrication Mgr of Kano&Co
kanojco.com

This project was developed for “Mayan Warrior”, a collective of artists, photographers, designers, technicians, architects and musicians from Mexico City and the North of California. The collective is looking to present to the world, the incredible ascent of the electronic contemporary Mexican music and at the same time offer respect to the deep visual roots of their beginning.

The main idea was to refresh the image of the principal transport of the Mayan Warrior, that has to be between the classic fashion of the collective, but at the same time needed a new face that represent the values of the new tendencies of the actual design. In this way we created the new image starting with triangular panels interconnected that let see between the spaces of union where the light of multiple colors pass trough to give presence and an attractive esthetic to the final design.

The main trouble was the fabrication of easily transportable and assemblable modules from Mexico City, since they must travel to Nevada and be assembled, mounted and adjusted by a totally different team on site.

At the end we developed a new mask for the main truck of the Mayan Warrior trough a system for joints for panels based on past projects, reconfiguration an existing paneling program made in Rhinoceros with Grasshopper. This programming helped us to fabricate the pieces completing the initial goals. The result was a modular, removable sculptural piece that reminds the beginnings of the collective that propose a new face for the future.



This is the second collaboration between Rima Arquitectura and Kano&Co to realize an interior design project. The walls on the project have an importance with their impressive size and disposition because they displace constantly of their axis in the search of the esthetic and optimization of the working areas.

At the end of the project we obtained a wall with asymmetrical triangular geometries that grows upon the space with the finality of give clarity, sense and beauty to each one of the spaces. The walls and the inside structural engineering of them is designed in Rhinoceros and Grasshopper, then we fabricated them with the help of the same tools plus the integration of CNC machines and traditional woodworking with finishes in engineering wood floors.



2018 | Lich King 101

Portfolio 12-20

Berlin Lopez
<https://www.behance.net/Rebeldo>

This project is a special mask commission for "Día de los Muertos" celebration and is designed based on the abstraction of some specific elements of the November 1 celebration of Mexican culture.

The final model development as well as the cutting templates are designed in Rhinoceros Grasshopper which guaranteed a perfect ergonomics for the user. The final result is cured and laser marked along with tabs that facilitate its assembly.



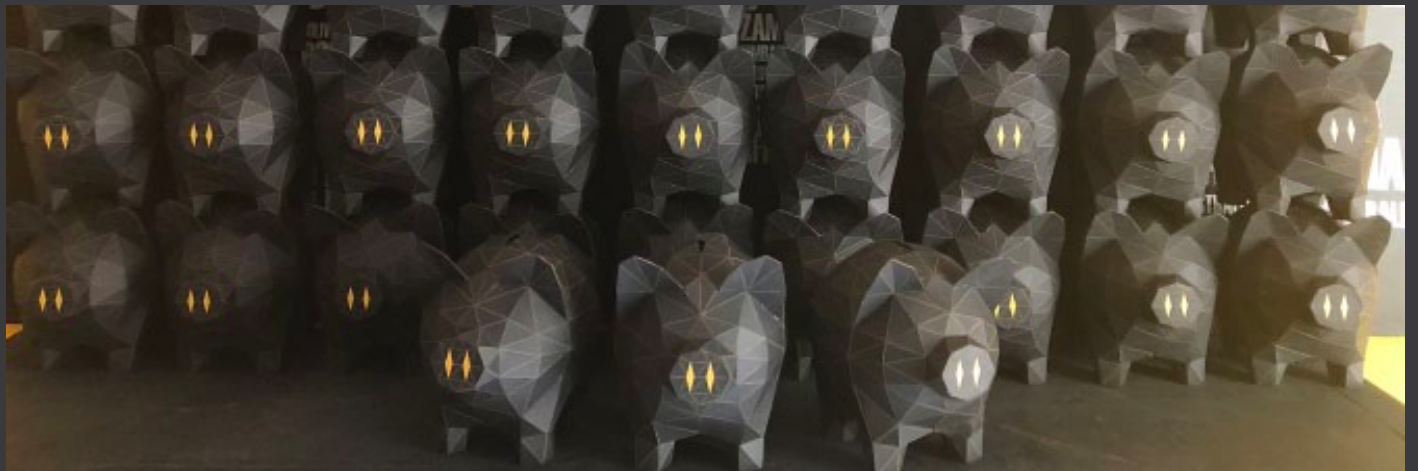
2018 | PIGGYBNK 1/2

Portfolio 12-20

Berlin Lopez
<https://www.behance.net/Rebeldo>

This project is part of a series of design objects fabricated in paper with the help of digital fabrication tools. It was a commission for "The Why Element Mindset" and is basically a piggy bank and a gift that the brand gives to the people who finishes the course.

The project is inspired by "Pechan" a character of Ranma 1/2 anime, and because of that I did an abstraction process of the character, the classical elements of the piggy banks and the requirements of the client combined to conform the final design. The digital model was built in Rhinoceros with Grasshopper, like digital fabrication development that allowed to make the product in paper with lasercut.



2018 BEAR-VEDERE

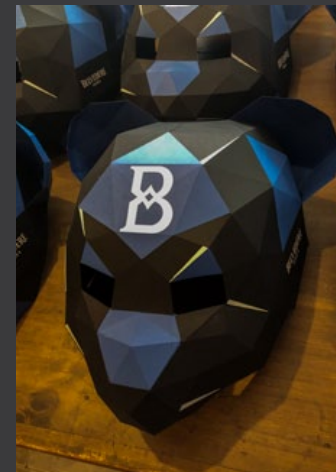
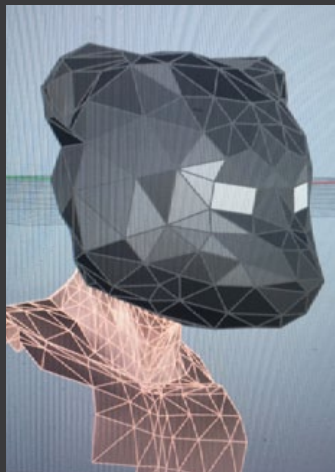
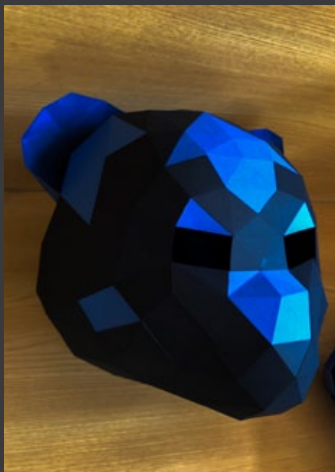
Portfolio 12-20

Berlin Lopez
In collaboration with Mocre & Neon Tikki Tiger
mocre.mx
facebook.com/Neoniti/

In this project we developed a complete immersive experience for Belvedere vodka brand, we created a virtual reality video and designed the illumination of the spaces where the users interact with the brand.

Beside to this we designed a mask and a half mask, specifically for the project. This mask include element in the design that change with the light of the space, so the users can experiment several versions of the masks depending on the place where they are in a specific moment.

For the design of the mask I worked with the abstraction of the bear that hold the bottles of Belvedere. The digital model was made in rhinoceros with Grasshopper, like the development of digital fabrication archives that allowed to make the mask in paper with laser and build by hand later.



14-19 Digital Fabrication Mexico City

Portfolio 12-20

Berlin Lopez
As Designer & Fabrication Manger of Kano&Co
kanojco.com

I present a selection of my most recent projects made with digital fabrication tools. Also in 2 of them are incorporated into a series of digital collage as part of an exploratory approach to digital art.

The first is a design project of a mask for a character called "polygon". This mask has special requirements such as internal acoustics, ventilation and an almost perfect ergonomic fit. All these could be solved thanks to a development in Rhinoceros+Grasshopper.

The second is a series of animals made in stereotomy for the generation of a "jungle" themed environment. They are designed in Rhinoceros+Grasshopper and cut in a CNC router to ensure accuracy and that these can be assembled and disassembled as many times as required in the future.

The remaining pieces are some significant projects that led to the development of more recent ones where digital manufacturing is essential for design needs.

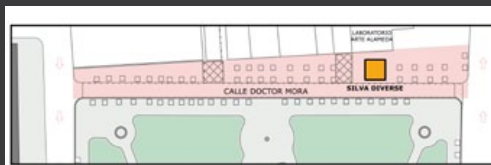


Silva Diverse

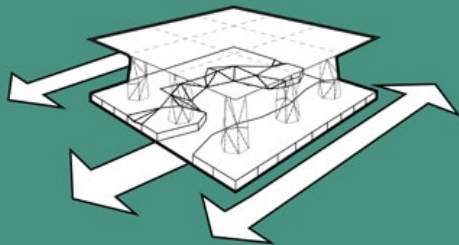
Mexico City

Silva Diverse it's a pavilion for the 19 "Arquive Contest". It's based on the exploration of generative process that allows a different approximation to the conventional shapes trough the decomposition of basic geometry generating coplanar triangles. We wanted to do a pavilion that incents the user to transit it on many ways, allowing them to experience different forms of the pavilion every day in interaction with other users.

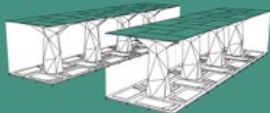
The pavilion is a 12mx12mx3.5m Pavilion that is made in plywood. Its designed in 8 modules of 42m2 each one, and they can be mounted in different form depending of the use or the place to show. The cuts of the panels are made with digital fabrication techniques in Rhinoceros with Grasshopper.



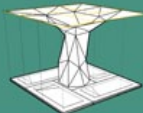
MODO PABELLÓN - FORO ABIERTO



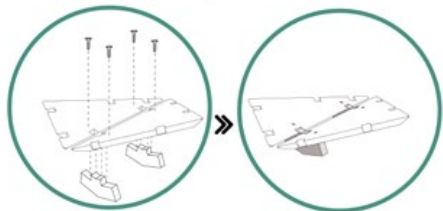
MODO ALBERGUE TEMPORLA



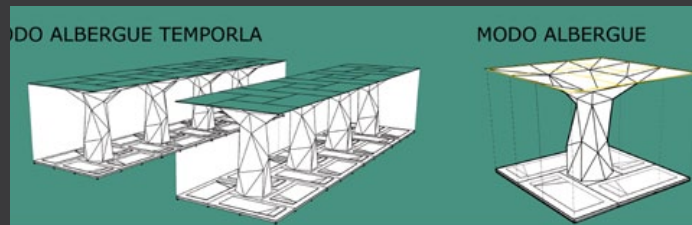
MODO ALBERGUE



La reproducibilidad del pabellón radica fundamentalmente en el sistema de programación/ fabricación digital. Este sistema reduce significativamente la mano de obra, ya que traslada el trabajo en campo tradicional a los procesos de diseño y corte por control numérico. Aplicando los mismos fundamentos de su diseño en diferentes entornos con áreas geométricas complejas permite la generación de varios tipos de pabellón.



SISTEMA CONSTRUCTIVO

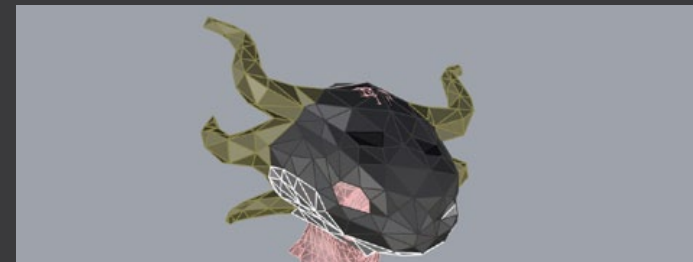
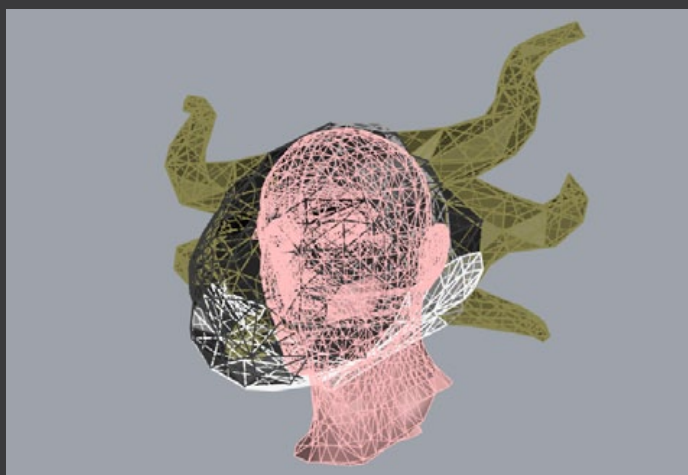


Axolotl Pond
CCDMX - Mexico City

This project is composed in two parts and both deal with the interaction of the user with art and new technologies for the creation of this. In the first, a tiger mask was built that includes a lenticular system that allows the spectator to interact with an artist's mural (Mocre) and appreciate it as a 3D illustration. Being the same user a fundamental part of the mural.

The second project is an axolotl mask, which complements the interaction of a painting made in virtual reality and the viewer, but also in turn with the artist who made it (Mocre).

Both projects have as a background to raise awareness about endangered species, in turn the artist's works reflect on how species have adapted to the current conditions generated by humans.



2017 Promises Pavilion

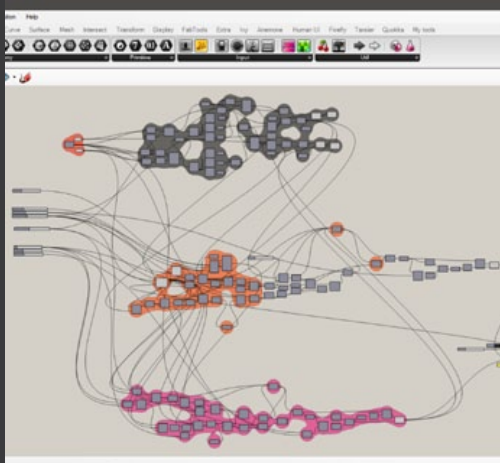
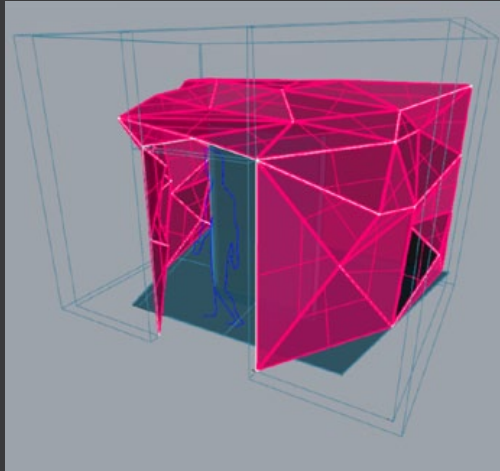
Habitat Expo - Mexico City

Portfolio 12-20

Berlin Lopez
As Designer & Fabrication Mgr of Kano&Co
kanojco.com

The concept of this project is to introduce the user to an alternative reality in which it becomes present once it enters the space and returns to the head towards the exit.
This pavilion consists of a box that contains a substructure made of triangular polygons that have a series of separations between them, which allows a set of lights that draw the edges of the same polygons. Complemented by a central mirror that also functions as a gateway to a space that becomes infinite once the user enters and begins to go through it.

For the realization of this structure specializes in a specific assembly. Rhinoceros with Grasshopper that would later be cut into a router. CNC together with the triangular panels for later its final end. Be assembled on the site and form the complete pavilion.



2016

TR33 of Wishes

Monterrey - México

Portfolio 12-20

Berlin Lopez
As Designer & Fabrication Manger of Kano&Co
kanojco.com

The concept of this project is to take up the oriental traditiion of the "wish tree" and take it to a contemporary context including digital manufacturing techniques and complement it with an artistic intervention that the piece made.

As design challenge we had to generate a piece that could be transported in parts and installed in the place where it would be exposed, in addition to that this piece had to be self-supporting and with a geometry similar to the branches of a tree. many times as necessary.

For this installation of art we use one of the assemblies that we developed in a previous project, we adapt and simplify it to be used in smaller triangular polygons that could generate more complex and organic shapes such as a tree. A system of nomenclature was also developed that would allow us an easy control of the pieces a quick assembly with the help of our assistants in another site, since the pieces besiege more than 500. One of the advantages of the system that we develop, is that it could be disassembled and assembled as many times as necessary.



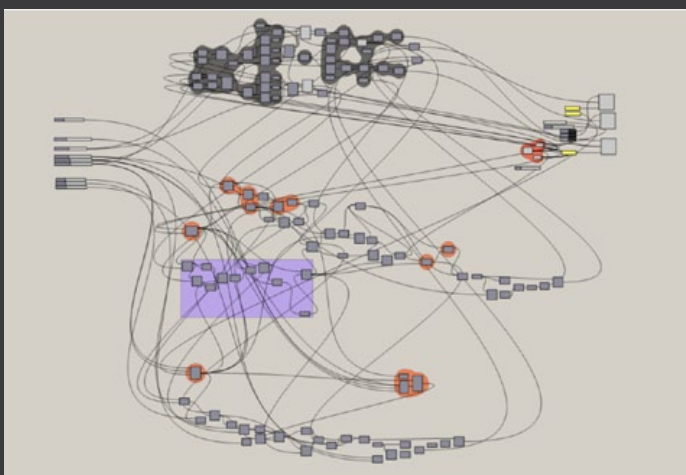
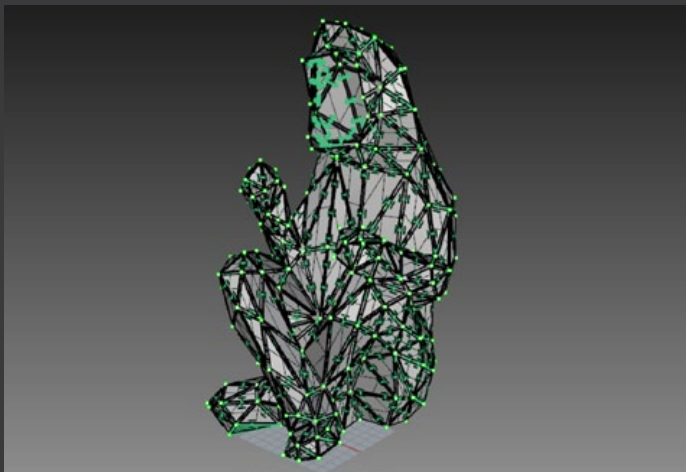
Xochipilli

Burning man-USA

Both inside and outside, the sculpture is designed to give a new spiritual, physical and mental experience. It's our own contemporary interpretation of the cult that the sacred image of the original figure of Xochipilli carries within.

This piece has been conceived to become an interactive image of the God that embraces all the artistic expressions as sacred. Based on the 3D-scanned model (by Dimensión N) of the real statue currently housed in the National Museum of Anthropology in Mexico City, it was designed and built at KanoShop.mx, LED lights programmed by OOSPP.

Xochipilli undoubtedly represents not simply the Prince of Flowers but more specifically the Prince of Inebriating Flowers, including the mushrooms that, in Nahuatl poetry, were called "flowers that intoxicate". Known as curative and sacred, these plants were used in shamanic rituals for "healing the soul" and making people "connect" — which, we believe, is the main purpose of our artwork.



14-19 | Art & Furniture

Mexico City

Portfolio 12-20

Berlin Lopez
As Designer & Fabrication Mgr of Kano&Co
kanojco.com

In this section, I present a selection of some of the most representative furniture projects I have designed, based on previous architectural projects.

What the particular line that I have developed is to combine the traditional techniques of carpentry for the manufacture of furniture and the contemporary techniques of digital manufacturing and industrial processes. In turn, they generate, through digital tools such as the rhinoceros and the grasshopper, the opportunity for customers to have customized pieces for their spaces, but without this representing an additional cost.

Another of my interests is the collaboration with artists where what is sought is to bring new digital manufacturing technologies to more traditional artists who do not know them and try to incorporate them as part of their creative processes to enrich their work and the final product that does. will be exposed to the public. In particular, she has worked with the artist Cecilia Villanueva with very interesting results.



Soccer Media

Mexico City

Interior design project where the main actor is a wall of 3 meters high by 64m in length with views on both sides. This wall is also decomposing into triangular polygons that vary throughout its journey and mark the overall aesthetics of the entire project.

For this project, all manufacturing and assembly engineering was carried out in rhinoceros with grasshopper, with the main challenge being to achieve triangular pieces of walnut wood up to 3.5m with variations of plane change between them.

A ceiling was also developed, consisting of triangular pieces that resemble the wall, as well as a counter that integrates perfectly with the surroundings where it is located and forms a complete composition with the 3 elements.

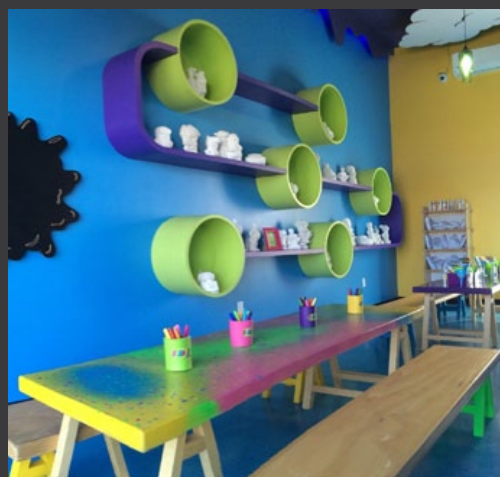
The final result is a wall with a complex geometry but which is visually attractive and imposing, giving the project a character of identity and allowing us to explore new manufacturing techniques that would mark the way for future projects.



Blast
Chiapas - Mexico

This project sought to combine the traditional building and carpentry techniques together with the new digital fabrication tools to create a synergy that resulted in organic and colorful shapes with a lot of movement to reflect the value of this brand of children's party halls. The most important technical part of the project is the 15-meter-long organic ceiling made with a stereotomy in the Rhinoceros software together with Grasshopper and which extends throughout the space as an iconic element of the identity of the place.

An interesting part of the project is that it was carried out in Mexico City and everything was sent to be assembled in the city of Tuxtla in the south of the country, demonstrating the possibilities that the current digital manufacturing techniques have to generate breakdowns and instructions to put together projects outside from the place where the pieces are made.

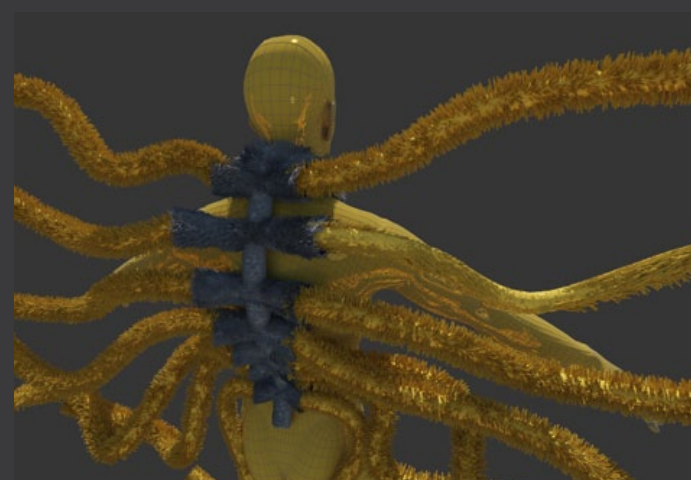


Exospine

Adaptive suit

Exploratory project that seeks to question how the clothes, materials and accessories of the future will be. The main idea of this project is the creation of an exoskeleton that gives the user the ability to increase their abilities depending on the needs that are presented, but always in a dynamic and adaptive way.

For the dummy of the exoskeleton, natural fibers combined with resin and white glue were used, having as objective in the first instance to identify the user's interaction with their exoskeleton and how they could be adapted to each other for the next stage.



2014

343² of Forest

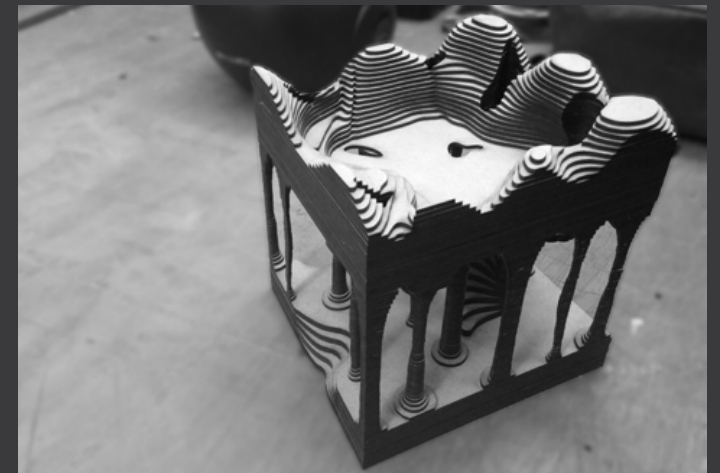
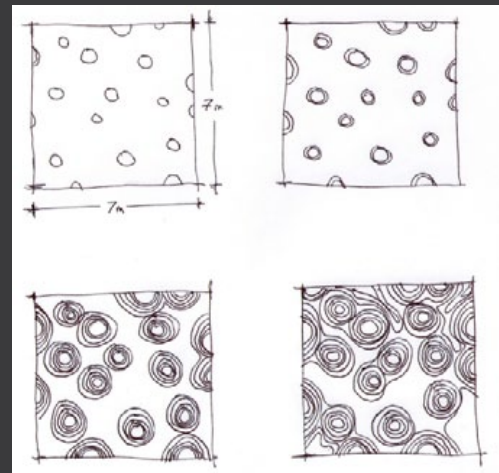
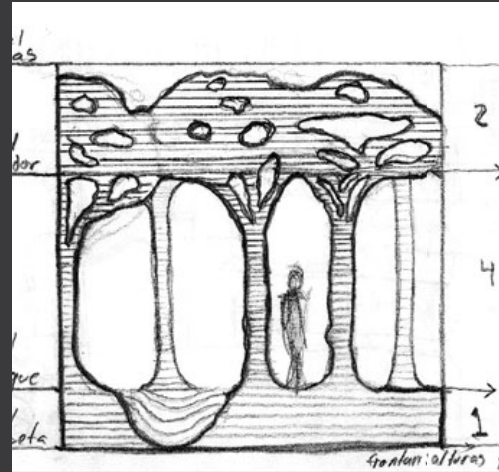
Mexico city

Portfolio 12-20

Berlin Lopez
In collaboration with Antonio O'Connell
antoniooconnell.com/

The idea arises as a reflection on the contrast between the natural landscape and the urban sprawl as a metaphorical struggle of opposites. The project consists of replicating 343 m³ of forest with wood that was evidently taken from a natural ecosystem but that the hand of man has modified in a process of destruction and construction. This architectural pavilion has a viewpoint and urban furniture that invite reflection in the treetops rebuilt.

The location is in the Paseo de la Reforma, one of the most important avenues in Mexico City and is currently used as a sculptural promenade with artistic urban furniture designs and temporary exhibitions, although by the method of construction and construction, this pavilion could be mounted in different parts of the city.



2013 | Distopic Future

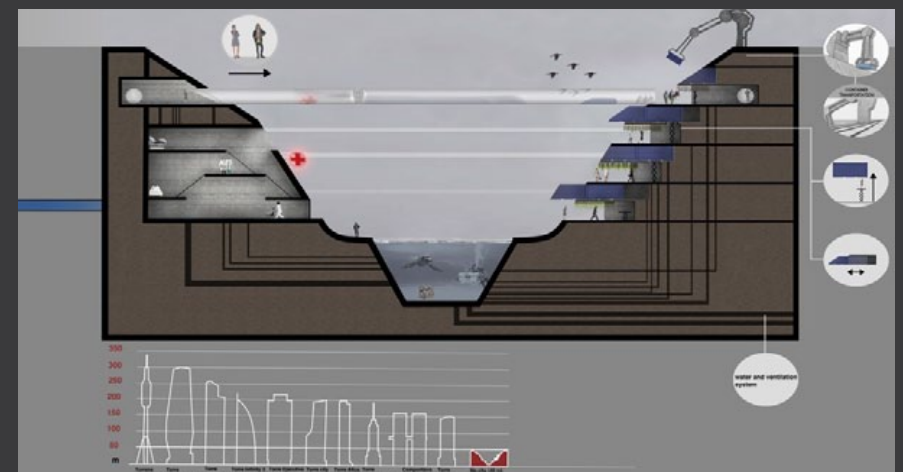
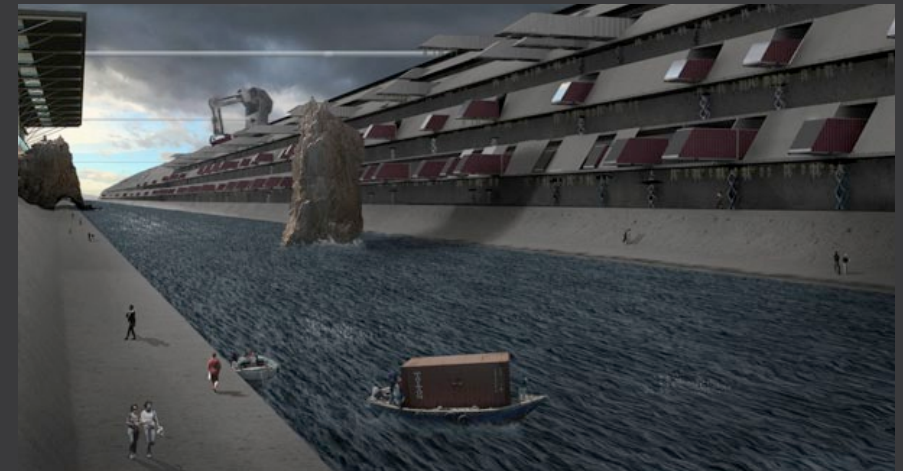
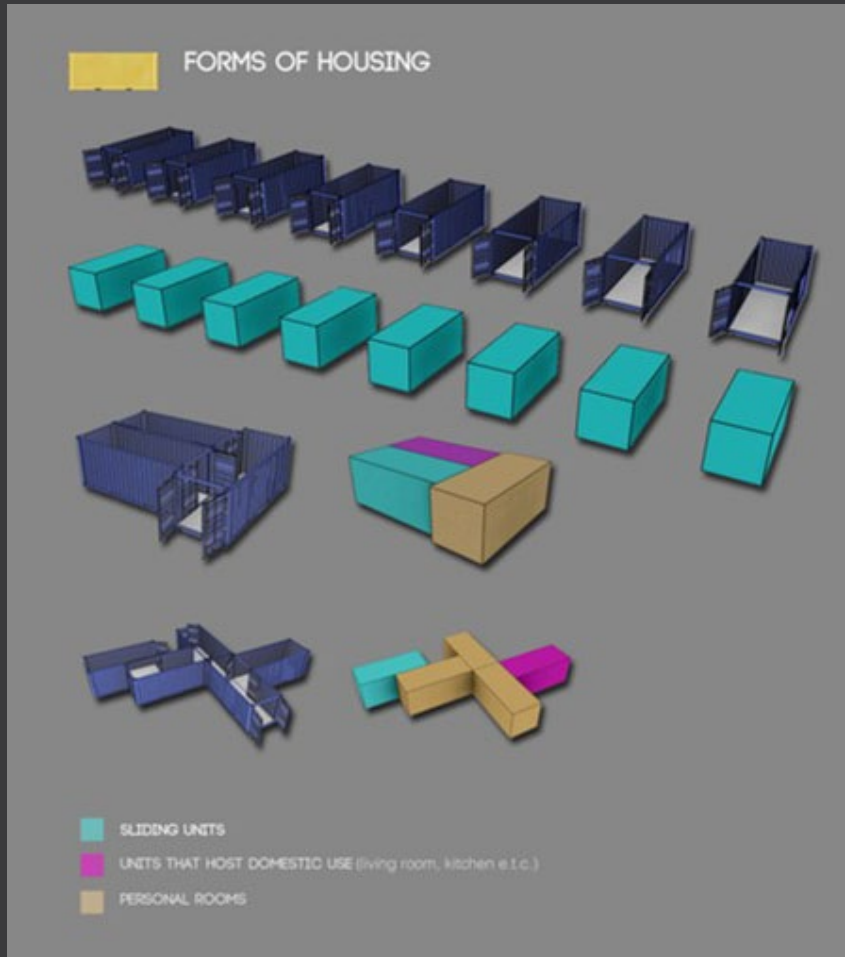
UAM-Mexico City

Portfolio 12-20

Berlin Lopez
In collaboration with Alex Vounatsos and
Giorgos Peo

What would Mexico City be like in 1000 years? This project proposes a dystopian future answering this question, where the water coming from the regulatory vessels bordering the northern area of Mexico City, supply a large canal that follows the old road of the train tracks, which on its slopes contains spaces with all kinds of uses, from housing that poses as adaptable modular systems to entertainment centers and farming spaces to supply food to communities.

These modulated spaces transported by large mechanical arms that can be displaced through the entire route draw a recomposed landscape. In addition, the old stations become poles of development where business centers and other activities now take place, being necessary to move using boats that replace what was once the automobile as the most used means of transport.

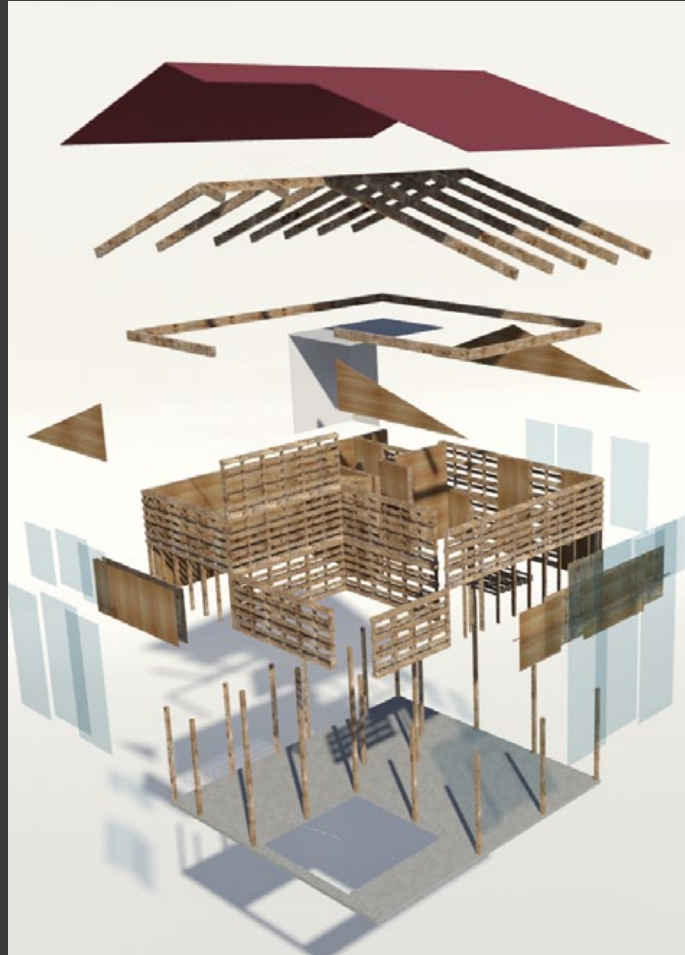


Tarima House

UAM - Mexico city

The Tarima House concept was designed to solve the problem of affordable housing for the Mexican population in rural areas, through the creation of a living space reusing wooden pallets as a building system allowing us to generate walls by assembling the modules with wooden poles to give greater stability and rigidity to housing. Its assembly was designed so that any person, with or without knowledge in construction can participate in the assembly of the structure; as a process of self-construction.

The house platform plays with 2 types of platform, one open for the windows (generating a nice game of lights and shadows in the interior); and a closed one that allows us to hide the facilities and at the same time generates an air layer as a thermal regulator. On the frames of the platform, the perimeter beams that carry the roof to 2 waters that protect the house from the sun and the rain rest.





Bertín López

<https://www.instagram.com/mynameisrebeldo/>

<https://www.behance.net/Rebeldo>