

## The creative process of Dio Wong's artistic paper sculpture

Before stepping into Sustainable Art, Dio was already a master in figurine sculpture, portraying human, living creatures, or characters from animation, into an original standing 3d prototype for mass production. The working field usually includes art or design, production engineering, and packaging design and sometimes also participates in promotion, therefore, he needs to be familiar with a variety of different production methods such as injection molding, vinyl, electronics, machinery, pu, gum, electricity, and three-dimensional printing. In more than thirty years in this profession, he observed that most assembly scale model kits were casted in materials such as aluminium wire, plastic, and polyurethane resin, which are neither recyclable nor sustainable. Knowing global and local waste problems had gotten worse everyday, Dio felt a sense of responsibility that, as a sculptor and artist, he needed to create Artwork that draws social attention to these matters and to promote the concept of sustainable development for people now and in the future. Recently, he started to develop an idea of making a large size standing sculpture using more environmentally friendly and sustainable mediums, that's when recycled paper comes to his mind.

One tonne of paper takes 17 trees and 1500 litres of oil to make. Meanwhile, recycling paper production creates 74% less air pollution and 35% less water pollution than producing paper from virgin fibres. Hong Kong is one of the most cosmopolitan and modern Asian cities in the world, however, its recycling rate for paper, glass and metal is lower than that of its competitor Singapore. According to the South China Morning Post, 11,428 tonnes of municipal solid waste is thrown away into landfills per day, or 4.17 millions tonnes per year, 20% of the domestic solid waste collected is paper. Yet, the total daily amount of waste paper in Hong Kong is still rising every year, reaching over 2,702 tonnes. In 2018, a three days paper jam crisis revealed just how serious is the paper wasting in Hong Kong. The local recycling industry

staged a walkout which caused a huge backlog of waste paper at recycling firms, as a consequence, leaving large amounts of dumped cardboard uncollected on streets. It was only a tip of the iceberg, and what made it even more depressing was, not so much Hong Kong citizens even noticed the strike of the recycling industry because they got used to piles of garbage and wasted paper on the street so quickly, that only manifests people careless if their living city is being traded as a rubbish dump or harms the surrounding natural environment. A series of events make Dio even more devoted to his idea of creating Artwork with wasted paper. In the past few months, he joined an Artist in residence program held by Hong Kong Artist Co-op in Sha lek corner, an local autonomous visual arts organization, where he is being provided space and time to explore his artistic mind.

During the first week of The Local and overseas Artists-in-residence program at Sha lek corner, Dio sketches out a few rough ideas on sketchbook and visits different locations like recycling bins, schools, offices, to collect recycled paper. It is not difficult to collect enough used ready- to- throw- away paper, the challenge would be making Papier-mâché out of it. First step, any non-biodegradable part needs to be separated out, such as glossy paper or cellophane from envelope windows. Then, tear or shedder the remaining recycled paper for the following step, making the Papier-mâché paste. This part is easily done with Artist co-op's human forced standing zero-Carbon recycled paper pulp making bike, several water bottles filled with recycled cut up paper, water, a bit of water soluble glue, are adapted to the back wheel of the bike, when scooting the bike, it blends the mixture inside the bottles instead of rolling forward, keeps scooting the bike until there's no lump inside the mixture, a organic Papier-mâché paste is made. The whole operation behind it is simple, but impressive nonetheless. Dio tries using the finished paste to build a sculpture, but soon he realizes this version of paper paste is too lumpy and not stretch enough for large-scale standing sculpting. Dio has to reconsider the ingredients for the Papier-mâché paste, so he turns to run-of-the-mills wasted paper boards, usually used

for transporting or packaging, collected from industrial buildings. This time he soaks the collected paper boards in water for a period of time because it takes time for the water to soak into the fibers of the paperboard and make them soft and pliable, when the material is weak and easily torn, he tears them into small pieces and put them in water bottles, repeat the same steps from last time. The 2nd paste comes out in an earthy brown tone, and it is more sticky than the 1st paste, so Dio is pleased with the result.

After the Papier-mâché recipe is determined, Dio wants to test the finished paper paste by building a middle scale sculpture , a paper whale, is the first image that instinctively pops out in his head. Even in Dio's previous series works of art, animals are commonly used as references for the form of design. He believes that every organism has a unique ecosystem within which it lives. This ecosystem is its natural habitat. This is where the basic needs of the organism to survive are met: food, water, shelter from the weather and place to breed its young. All organisms need to adapt to their habitat to be able to survive. However, humans as one of the living species, lose their religious sense of order and place within the world. They hide in houses built with cement and concrete, distant themselves from nature, valuing profits and corporate growth over life and wellbeing, bringing only immense decrease in biodiversity, mass extinction, permanent destructive changes to the earth's atmosphere and soil, forests. It all started when the human industrial revolution began in the 18th century, when the first whale was killed by a man to get its oils as lamp fuel. Since then whales were hunted nearly to extinction and humans turned into Industrial slaves, living in a modern industrialised world that lacks autonomy. The classic literature "*Moby Dick*" or commonly called "*The Whale*" written in 1850 by Herman Melville, emerged during the industrial revolution when individualism and unrestrained competition were the ideologies fueling America's dream of progress. It also divulges industrial society's effect to kill and consume nature through measurement, by words and paragraphs describing the book character's struggle to kill the whale.

*“Consider the subtleness of the sea; how its most dreaded creatures glide under water, unapparent for the most part, and treacherously hidden beneath the loveliest tints of azure. Consider also the devilish brilliance and beauty of many of its most remorseless tribes, as the dainty embellished shape of many species of sharks. Consider, once more, the universal cannibalism of the sea; all whose creatures prey upon each other, carrying on eternal war since the world began.*

*Consider all this; and then turn to the green, gentle, and most docile earth; consider them both, the sea and the land; and do you not find a strange analogy to something in yourself? For as this appalling ocean surrounds the verdant land, so in the soul of man there lies one insular Tahiti, full of peace and joy, but encompassed by all the horrors of the half-known life. God keep thee! Push not off from that isle, thou canst never return!”*

— Herman Melville, *Moby Dick*

In Dio's mind, the image of a dead whale represents the end of the harmony between human and Nature, it is a testimony to the greediness and selfishness in humanity. To capture the very depiction, Dio spends the second week of the Artists-in-residence program at Sha lek corner to build a rough virtual whale model for the sculpture using 3D printing design software. The advantage of using digital tech is that every detail, like scale, form and composition of the piece, can be predicted by the Artist, also avoiding unnecessarily waste during the creative process. With the digital 3D design script in one hand, Dio starts building a skeleton to support the inner space of the whale. He uses a bucket to water the bamboo strips, which are recycled material provided by Artist co-op. Next, he takes an old towel, soaks it in water and then covers the strips with this towel, leaving it overnight. This preparation will protect the crafter's hand from bamboo fiber and also ensure that bamboo strips don't break when Dio blends them to build the skeleton of the whale. Then, some wasted paper boxes and rolls are combined and taped to a

rough cylindrical shape but tapering at both ends, a single wire wrap around the boxes, Insert a bamboo strip distanced equally from each other, start bamboo weaving to create a skeleton to support the following step. Last but not least, recycled paper strips are stuck over the skeleton form and smoothen down with fingers. The form is completely covered with a layer of the saturated paper strips over lapping each other and running in different directions. After one layer is applied, it takes up to 24 hours to dry completely. Once the first layer is dry, Dio applies a second layer with the paste made with paper board and glue, which is heavier and thicker, creating a pleasantly rough fine-grained texture but also making the sculpting process more challenging. Dio repeats this process until he gets the desired look of the whale, and lets it dry.

The success of the paper whale sculpture proves the artistic value in recycled material, Dio continues to explore further more in different recycled medium with his mentees from the Sustainability Art mentorship scheme in the following two weeks. There are six mentees in the scheme, Dio plays in a psychological test with each of them on the first time they meet. The test only has one question: What animal would you choose to be in your next three lives if you weren't human? The types of animals the mentee's answers represent their outer and inner personalities. For example, if cheetah is your answer, it means you are super active and spontaneous, and able to respond quickly to their surroundings. The purpose of the test is to close the distance between humans and animals living in the wild . People tend to show more understanding and empathy to what they feel close to. By knowing what type of animal every mentees is, Dio asks them to try to step out of the unnatural frame of society and the world in which humans are perpetually controlled and commanded by technology such as the computer mandated work. Instead, try to see the world through the lens of their representivity animal's narratives. Is the surrounding environment harsh to survive in? Is human influence leading the changes in the distribution of organisms ? What caused the immense ecological and habitat

destruction since humanity became the dominant species on earth? The questions Dio wants to mention are to think about through the art.

The above question may readily be extended to the concept of sustainability. Living in a fast speed, modern, consumer driven society means it's hard for people in it to see the down side of it, people have been subconsciously trained to think like a consumer, The negative effects of consumerism include the depletion of natural resources and pollution of the Earth. The way the consumer society is working is not sustainable. Humans are currently overusing Earth's natural resources by more than 70 percent. One of the most practical solutions to stopping people from over consuming the natural sources on earth is sustainable living. Sustainable living is a practical philosophy that aims to reduce personal and societal environmental impact by making positive changes which counteract climate change and other negative environmental concerns. With the arrival of the new millennium, the artistic community continued to develop sustainable art, noting its impact at the social and environmental level. Sustainable artists now seek to optimize the use of natural resources to reduce the environmental footprint of their work.

Actually, sustainability/ sustainable development is not a new concept but it is continually rising in either academic, political, or social circles. Google reports the average monthly searches on the terms with global warming highest at 450,000; climate change at 165,000; and sustainability at 135,000. A search of the world-wide web for “*sustainability*” and “*sustainable*” and “*sustainable development*” produces almost 1 million pages using the alta vista search-engine. Preventing these terms become overused cliché in any aspect, in 1987, the prime minister Gro Harlem Brundtland and her united nations commissions performed a remarkable feat in offering a definition of sustainable development - “*development which meet the need of the present without compromising the ability of future generation to meet their own need*” - It developed guiding principles for sustainable development as it is generally understood today.

When Awareness of Sustainability Issues is growing rapidly globally, most people in Hong Kong still lack the understanding of it. Through the Sustainability Art mentorship scheme, Dio hopes to lead the mentees to view the world from different species' point of view, see how human's activities have damaged the earth's ecology, thereby creating a sustainable art work inspired by the whole thinking process. Most mentees start to create stunning artworks that respond to Dio's psychological game and the concepts within 2 weeks. A mentee, Jane, builds a human size vertical jellyfish with expired translucent bandages, meanwhile, the other mentee creates an owl with wasted paper and packaging paper of snacks.

Beside mentees' creative progress, Dio hasn't stopped on his artworking project. After the paper whale, Dio is determined to build something even larger scale; a Maya statue with a modern tool ( e.g. telephone) in its hand. The inspiration comes from Dio's belief that humans have proven the selfishest species on earth. Legend of the ancient Atlanta civilization was destroyed by human's greed and self-destruction. *Raphus cucullatus*, or so called *Dodo*, was extinct in 1640 ,shortly after it was discovered in 1598 and hunted by settlers. Looking into the history of human development, different civilizations can never coexist. In particular, Maya was one of the most dominant civilizations constructing impressive stone cities and making advances in agriculture, calendar-making and mathematics, among other fields. But by A.D. 900, those great stone cities were mostly abandoned. Theories about what caused the Classic Maya collapse have ranged from overpopulation to ongoing military conflict between competing city-states to some catastrophic environmental event, but the main reason is the Spanish conquered Maya and destroyed almost everything that can document mayans culture.

Whenever a new civilization appears, the old one will either fight the new one or be eradicated. In this century, resources are everyone's struggle. If the lost Maya civilization represents the primeval human society, the modern technology will be representing the new rising civilization. Modern society is very dependent on technology, which definitely brings

confidence to daily life but also causes damage to nature. What will be the result of the battle of these two civilizations? Is one going to engulf the other? Or are they finally going to embrace each other? No matter what happens, humans definitely will be playing an important role in it and be affected the most.