## WHAT PROBLEMS COULD PEARLS POSSIBLY POSE?

Deciphering the ethical and environmental discourse perpetuated by the cultivation of pearls...

"Nothing gives the luxury of pearls," once declared the legendary fashion editor, Diana Vreeland, and though few can refute the luxurious luminosity pearls exude, the ethical concerns encompassing these opulent orbs are markedly less glamorous.

The world of pearls is nuanced and convoluted with many characteristics and subtleties that distinguish authenticity from imitation and equally, what's environmentally conscious or not. The pearl's popularity has prevailed for centuries - from its portrayal in 15th-century Tudor portraiture to its contemporary omnipresence in fashion collections such as those of Simone Rocha and Chanel. Its peerless natural beauty and its connotations with opulence, regality and resplendence have garnered great demand and desirability. However, fervent vegans, eco-warriors and radical environmentalists beg to differ, offering confident claims that the modern-day pearl industry, which is largely characterised by the farming of bivalves in the pursuit of producing saltwater and freshwater pearls, is fraught with 'cruel and unjust' implications. (PETA)

Pearls are created when an irritant obstructs the mantle of an oyster or mussel and enters its shell. The bivalves respond by coating this object with nacre, the crystalline substance that gives pearls their lustre and iridescence. Typically, only one pearl per 10,000 oysters naturally occurs and its creation of a pearl can take up to three years. To accelerate this process and increase its output, pearl farming - which consists of the artificial insertion of irritants into mollusks, was devised. Because these mollusks are categorically classified as living specimens and are susceptible to a certain extent of feeling, ardent animal rights activists have condemned the plight that the growing ubiquitousness of cultured pearls may inflict upon the species.

"I was a bit reluctant to see the surgical procedure that starts the cultivation process — I was expecting something gory" Vivian Morelli, who specialises in luxury jewellery journalism, informs me. In her New York Times feature published in May 2023, she relays her personal experience of visiting Mikimoto's Tatoku Pearl Farm on Japan's main island of Honshu. It was allegedly here that the artificial cultivation of pearls was developed 131 years ago, when its founder Kokichi Mikimoto sought to eradicate the problem posed by the overexploitation of depleting oyster reserves and the scarcity of natural pearls. His vision, Morelli recounts, was to "adorn the necks of all women around the world with pearls," and it is largely due to his efforts to this extent that pearls have become so widely attainable today. Rendering the farm's 'factory' (in which they start the culturing process) and their 'pearl research institute' (which is used for extensive research in marine biology and breeding) in minute detail, she describes the 'thousands upon thousands of Akoya pearl oysters' that reside in the bay's underwater nets, awaiting their fates. Following a personal demonstration by Junya Yamamura, the farm and factory manager, Morelli admits that the process was reminiscent of a seamless yet simple 'mini surgery or dental procedure' which is repeated 500-600 times daily. "I was so surprised, the farmers really do their best to minimise the stress of the oysters. It just involves the insertion of a bead made of shell into an oyster and it's done very swiftly."

Upon hearing Morelli's memories whilst in the nucleus of premium pearl production, the polemic launched by PETA against the process became progressively less plausible and their authority on the topic without

substantial evidence began to falter ever so slightly. "I got the impression that the oysters are very well taken care of and live in a very peaceful environment; the waters off the farm were so quiet and full of nutrients," reflects Morelli when approached about the alleged infliction of pain on these mollusks "Of course we don't know what the oysters feel exactly, but from what I saw, it did not seem cruel at all."

An April 2021 report published by Forbes asserts the 'innocuous' nature of pearl production even further "Pearls don't take away from the natural environment, but give back," it claims, "Pearls are farmed in the purest, unpolluted water, they are the perfect gem for today's ecologically-enlightened consumers."

Regardless of these dramatically differing views, the popularity and desirability of a cultured pearl shows no sign of waning. According to analytics site Statista, the export value of pearls from Japan in the past year has doubled to 45.6 billion Japanese yen (£227.6 million) and the number of exports has overseen a 30.2 per cent increase to 32 million grams of pearls.

In spite of their widespread use, J.J Rand insists that "Cultured pearls can't hold a candle to the iridescence of a natural pearl." The jewellery designer, who works extensively with Cartier and Vivienne Westwood explains that high-quality natural pearls are revered as the rarest of jewels, so much so that in 1917, the Cartier Fifth Avenue flagship, was purchased by Pierre Cartier in exchange for a matched double strand of natural pearls, which, at the time, was valued at \$1 million. Now, at Cartier, Rand expands on how they "measure the quality and value of a pearl by examining how lustrous, smooth and expansive its exterior is." Their selection of cultured Akoya pearls and mother of pearl for its fine jewellery is influenced by their "visible iridescence and indentations," and the more plentiful these qualities are, the higher their corresponding value will be. But are ethics and environmental concerns considered by these imposing jewellery brands or is everything catered commercially in the pursuit of monetary gain?

"At Vivienne Westwood, recent collections have featured glass-based Swarovski pearls in an attempt to emulate the real thing,"Rand divulges. "This acknowledges the environmental principles that the brand upholds alongside its renouncement of animal cruelty." According to the brand's website, in their highly sought-after pearl products, they have made the switch from plastic and resin-based pearls to glass and will "continue to work towards replacing all virgin plastic," in accordance with the proposed measures by the European Commission to restrict microplastics.

JW Anderson's Loewe is also taking the initiative to modulate towards a more mindful use of raw materials, including pearls. In May, Anderson decided to encapsulate this year's Met Gala 'Sleeping Beauty: Reawakening Fashion,' theme by crafting the corset worn by Ariana Grande using mother-of-pearl - an apt allusion to the timelessness of the mineral. Interestingly, this eye-catching piece was constructed using renewable Superlativa® materials, offering a sustainable solution by replenishing mother-of-pearl remnants that had been previously discarded and cast aside.

After observing the litany of potent and persuasive statements listed on PETA's website, ranging from "Stop murdering and exploiting pearls," to "Let bivalves be bivalves," I spoke to Lily Doidge, a representative from its London branch. Yet, her response was remarkably more subdued and speculative than that of her counterparts. "We aren't sure how much pain and suffering oysters are capable of experiencing," she admits, "So we urge people to err on the side of compassion by ceasing to purchase pearls as we don't know definitively that oysters *can't* suffer."

However, it also could be considered that through their well-intended advocacy, perhaps organisations such as PETA are inadvertently contributing to a larger, more pernicious problem.

As discussed by the jewellery editor and historian Carol Woolton on her podcast 'If Jewels Could Talk,' some cruelty-free pearl replications used in fashion, albeit vegan, can entail the use of cheap materials such as plastic and acrylic paint. The overconsumption of these mass produced alternatives often and inevitably ends up contributing to overloaded landfills - hence exacerbating the burgeoning problem of environmental pollution.

Ultimately, imitated and cultivated pearls both pose problems and, owing to their rarity and extortionate price point, the purchase of naturally sourced pearls is scarcely an option. So where does that leave one who is intent on owning their own shiny string? Like with many aspects of life- a happy balance should be struck where pearls are concerned.

For the consumer who concurs with Morelli's view that 'Nothing can quite emulate the resplendence of a natural pearl,' and is scouring the jewellery market for a new swanky string of pearls or a chic pair of dangly earringsthey may look no further than to Mikimoto or a trustworthy antiquarian. Conversely, for those who may empathise with the predicted plight provoked by the cultured pearl and are seeking a cruelty-free alternative, there are myriad high-quality iterations at their disposal such as those used by Vivienne Westwood.

Moreover, perhaps the greatest 'luxury' when it comes to pearls is choice and the ability the consumer wields to make one that is informed and conscientious in equal measure.