THE HUMANE SOCIETY OF THE UNITED STATES

HUMANE SOCIETY INTERNATIONAL

To: Honorable Chair Mateo and Maui County Councilmembers
Council of the County of Maui
Submitted via email: county.clerk@mauicounty.us

RE: Council Meeting July 2, 2010, 9:00am
IN SUPPORT OF AGENDA ITEM 10-65; Pertaining to Animal Control and Aquatic Life Operations.

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In Support: Agenda Item 10-65, Animal Control and Aquatic Life Operations

The Humane Society of the United States (HSUS/HSI), the nation's largest animal protection organization, with more than 11 million members and constituents, including 49,770 in Hawaii, and The HSUS/HSI's international arm, Humane Society International (HSI), support the two bills pertaining to aquatic life and animal control for the council's consideration today.

We deeply thank the Council for addressing this important matter that affects the lives of more than 17,000 animals per year. Furthermore, we are in correspondence with and committed to assisting enforcement agencies such as the Maui Humane Society with training and other resources to most effectively enforce this important and necessary measure.

The global trade in live wild animals as pets—including live fish for display in home aquaria—involves billions of animals every year. The trade threatens the survival of wild populations and causes unacceptable treatment of the animals. This thriving industry feeds on consumer demand for rare and beautiful animals. Whether small carnivores, exotic birds such as parrots, reptiles and amphibians, or fish, few species are safe from this demand.

The HSUS/HSI opposes the keeping of wild animals as pets. By "wild" we mean any species that has not been domesticated by selective breeding for certain traits that make them appropriate companion animals, whether they are bred in captivity or taken directly from the wild.

Keeping wild animals as pets is inhumane. The means by which wild animals are captured, held and transported to consumers cause unacceptable levels of injury, damage to health and cruel treatment. Those animals who survive the journey from the wild to the living room may fare no better. Wild animals are difficult to care for in a home environment. In many cases, the husbandry needs are unknown or impossible to meet. Many wild animals are sold as newborns or juveniles; as they grow to maturity they become difficult and dangerous to keep. As a result, wild animals suffer and die from malnourishment, neglect, and abuse in captivity.

The wild-caught fish trade causes injury, damage to health and cruel treatment of fish. The global trade in marine fish involves between 20 and 24 million individual animals, 99 percent of whom are wild-caught (Wabnitz et al. 2003).

High levels of mortality of marine fish in the aquaria trade, associated with inadequate handling and transport, have been widely recognized as a problem (Wabnitz et al 2003). One study demonstrated mortality rates of fish from Sri Lanka to the United Kingdom of 15 percent during and immediately after collection, 10 percent during transit, and 5 percent in holding facilities (Wood 1985). This means that 30 percent of the fish collected died before reaching the market. Once in a home aquarium, mortality rates continue to climb due to inadequate husbandry and stress suffered on the journey from the coral reef to the home aquarium. The industry treats fish like cut flowers to be displayed until they die (often of starvation), then discarded and replaced.

Below is a list of the species of fish and the number exported from Maui County in 2009, according to reports that licensed collectors are required to supply to the Hawaii Department of Land and Natural Resources. It should be noted that the majority of collectors do not report and even those reports filed may misrepresent species or quantities since they are not verified by onsite inspections. Consequently, the numbers and species reportedly collected may be a considerable underestimate.

Maui County Coral Reef Fish Collection Reported in 2009		
Common Name	Scientific Name	No.
Pinktail Durgon	*Melichthys vidua*	4
Boxfish	*Ostracion meleagris*	14
Black Durgon	*Melichthys niger*	18
Leaf Scorpionfish	*Taenianotus triacanthus*	18
Black-banded, Bandit Angelfish	*Desmoholocanthus arcuatus*	24
Fisher's Angelfish	*Centropyge fisheri*	26
Goldrim Tang	*Acanthurus nigricans*	32
Moorish Idol	*Zanclus cornutus*	43
Orange-stripe Wrasse	*Stethojulis balteata*	48
Orange Shoulder Surgeonfish	*Acanthurus olivaceus*	54
Scarlett Wrasse	*Pseudocheilinus evanidus*	57
Redtail, Psychedelic Wrasse	*Anampses chrysocephalus*	58
Arc-eye Hawkfish	*Paracirrhites arcatus*	79
Potter's Wrasse	*Macropharyngodon geoffroy*	80
Clown Wrasse, Yellowtail Coris	*Coris gaimard*	90
Eight-lined Wrasse	*Pseudocheilinus octotaenia*	96
Bird Wrasse	*Gomphosus varius*	98
Saddle Wrasse	*Thalassoma dupperey*	128
Clown Tang	*Naso lituratus*	157
Pencil Wrasse	*Pseudojuloides cerasinus*	182
Forcepfish	*Forcipiger flavissimus*	203
Pinkface, Ornate, Xmas	*Halichoeres ornatissimus*	358

Four-lined Wrasse	*Pseudocheilinus tetrataenia*	387
Potter's Angelfish	*Centropyge potteri*	450
Achilles Tang	*Acanthurus achilles*	591
Flame Wrasse	*Cirrhilabrus jordani*	632
Kole, Yelloweye, Goldring	*Ctenochaetus strigosus*	1,223
Yellow Tang	*Zebrasoma flavescens*	11,967

The husbandry needs of many of the fish species collected from Maui reefs simply cannot be met in captivity. Collection and export of animals that have virtually no chance of survival in captivity should cease. To continue this practice is to condone inhumane treatment to animals.

Among the species collected in Maui County that do not survive well in captivity are:

- Achilles tang and Moorish idol: Paletta (2001) recommends these as species for "the beginner [hobbyist] to avoid".

- Potter's Wrasse: One hobbyist website states that it is "likely the majority of Potter's collected are doomed despite anything you might be able to provide or do" (Premium Aquatics 2010). The website further explains,

> *"Just one amongst the many beautiful endemics of the U.S. 50th State, Hawai'i's Potter's Angel is not easy for many to locate in the wild... w/o careful observation. It's relatively abundant in and amongst the finger-like coral (*Porites compressa*) which is its typical domain, but so secretive that w/o keen searching and patience, most divers miss it entirely. This cryptic lifestyle is a chief clue to success with Potter's in captivity. They're shy, need plenty of cover, and a dearth of "busy" tankmates. Most failures in the care of this* Centropyge *stem from a lack of this understanding... coupled with the trials of rough capture, tortuous holding, shipping and handling stress and damage through the "chain of custody" going from the wild through wholesalers, retailers to the consumer."*

- Goldrim Tang: "rarely lives for more than a few weeks in captivity" (Premium Aquatics 2010).
- Achilles Tang: "Success with this soft-bodied species can only be had from securing a healthy specimen initially, providing a large living space, and high, consistent specific gravity and oxygen concentration" (ibid).
- Kole, Yelloweye, Goldring (*Ctenochaetus strigosus*): "The dismal survival rates for *Ctenochaetus* are more a function of poor capture, handling, transport and feeding problems imposed by their captors, than these fishes suitability as captive specimens"(ibid).

HSUS/HSI is appalled by cruel practices employed by fish collectors in Hawaii such as piercing the swim bladder. We are equally appalled that the Hawaii Department of Land and Natural Resources (DLNR) defends this practice as humane. DLNR have testified that "The piercing of the swim bladder "or venting" is done to help fish acclimate to the reduced pressure at the ocean

surface, relative to the depths at which they are collected. Bladder expansion from changes in water pressure can cause severe injury, by pushing out eyes from their sockets and expelling the stomach through the mouth" (Polhemus, 2010). Many U.S. States have policies against venting, or "fizzing" as it is sometimes called. For example, the New Hampshire Fish and Game Department states, "During fizzing, there is an increased chance of infection to the fish and the potential to pierce other internal organs. Additionally, although the most obvious sign of rapid depressurization is an over inflated swim bladder, there is also internal damage that occurs to the brain and heart (as a result of gas bubbles in the blood). Damage to the brain and heart is often the cause of death in these fish and fizzing will not correct for this type of injury" (New Hampshire Department of Fish and Game 2010). New Hampshire's alternative to fizzing: Don't take fish from deep water. HSUS/HSI strongly recommends that Maui County prohibit swim bladder puncturing.

Another inhumane practice used by Hawaii collectors is starving the fish prior to export. The DLNR have defended this practice as humane stating that, "shippers of live aquatic life regularly withhold food for 12 hours prior to shipment. This is intended to reduce the amount and concentration of waste … the fasting procedure is an accepted industry practice to reduce mortality due to degraded water quality and there is no information that this practice is inhumane." On the contrary, the published industry standards for the shipment of live animals known as the International Air Transport Association's Live Animals Regulations (IATA 2009) do not include starvation prior to shipment of tropical fish. There is no scientific basis for the claim that withholding food from a tropical fish before shipment is necessary to improve water quality. For tropical fish who graze regularly throughout the day, several days without food before being exported from Maui, plus up to 48 hours without food during shipment, mean that fish are starving by the time they reach the importer. HSUS/HSI strongly recommends that Maui County adopt regulations to require that those in the business of fish export must comply with IATA standards.

Other cruel practices including fin trimming, exposure to inappropriate temperatures, and inadequate water quality should also be addressed.

Collection of animals from the wild for the pet trade is harmful to wild populations. There are many examples of wild populations of animals that have been decimated by over-collection to supply the exotic pet trade. Slow lorises of Southeast Asia (*Nycticebus* spp.), the hyacinth macaw of South America (*Anodorhynchus hyacinthinus*) of Central and South America, and the radiated tortoise of Madagascar (*Geochelone radiata)* are some non-fish species that have been harmed by trade. Among marine fish species whose survival is threatened by collection for the aquaria trade are the Banggai cardinalfish of Indonesia (*Pterapogon kaudermi*), the scribbled angelfish of Australia and Papua New Guinea (*Chaetodontoplus duboulayi*), and the mandarinfish of The Phillipines (*Synchiropus splendidus*). In Hawaii, researchers have raised concerns about the collection of uncommon or rare species for the trade including Tinker's butterflyfish (*Chaetodon tinkeri*), the Hawaiian turkeyfish (*Pterois sphex*) and the flame angelfish (*Centropyge loricula*). The U.S. Coral Reef Task Force has recognized that U.S. demand for aquarium species can indeed threaten the sustainability of coral reef species and ecosystems (U.S. Coral Reef Task Force 2000).

There are many problems with the current management of collection of fish for export from Hawaii. The number of fish exported from Hawaii annually is actually unknown. For example, in 1995 the official export figure was 422,823 according to DLNR. However, this figure was based on reports filed by only 40 percent of people permitted or licensed to export fish, and therefore is believed to significantly underestimate the actual number of fish exported (Boggiatto et al. 2004). The fact that 60 percent of permit and license holders disregard the requirement to provide monthly catch reports to DLNR apparently without consequence is of concern. The lack of such basic information as the number of fish exported on a species-specific basis does not allow effective management.

Although allowed by law, DLNR has not adopted regulations that limit the number of fish collected by each permit holder (a bag limit), size limits, open and closed seasons, or other common management tools adopted by other jurisdictions that export marine fish for the aquaria trade, such as Florida. DLNR requires collectors to have permits, and commercial collectors to have licenses, but permit holders can collect any number of fish of any species. They can also collect fish anywhere with the exception of Marine Life Conservation Districts and Fish Replenishment Areas. As a result, although the industry is regulated in the sense that permits are issued, except as noted in the previous sentence, there is no management system being applied that would ensure that wild populations are not harmed by levels of collection. This is troubling given the apparent high level of trade.

There is ample scientific and anecdotal evidence that the level of collection of marine fish for the home aquaria trade has had significant detrimental impacts on wild fish populations in Hawaii. Research has established that collection of fish for the aquarium trade is a major source of over-fishing on the island of Hawaii (Tissot 1999; Tissot and Hallacher 2003); in one study, seven of ten fish species targeted by collectors were found to be significantly reduced in abundance (*ibid*). Anecdotally, independent divers and dive tour operators have been reporting declines in fish abundance for at least the past decade. Although every area where collection occurs has not been studied in order to scientifically determine the impact of collection on the abundance of species, this should not be used as an excuse for inaction. When it comes to extractive wildlife use, precaution should be applied in cases of scientific uncertainty in order to protect species from over-exploitation.

In addition to concerns about the sustainability of collection and the survival of collected species, current aquarium collection practices in Hawaii raise significant concerns about the effects of aquarium collection on Hawaii's valuable coral reef ecosystems. Among the top Hawaiian exports are the yellow tang (*Zebrasoma flavescens*), kole (*Ctenochaetus strigosus*), chevron tang (*Ctenochaetus hawaiiensis*), Achilles tang (*Acanthurus achilles*), and clown tang (*Naso lituratus*), all of which are important herbivorous species that have experienced significant population declines in areas were fish are collected for export. Herbivorous fish play a crucial role in reef ecosystems by preventing algae to outcompete living corals. On other reefs around the world, overfishing of herbivores has resulted in ecosystem shifts in which corals and other important reef-dwelling benthic invertebrates become smothered by overabundant fleshy algae.

Hawaii's DLNR is not ensuring that collection for the fish pet trade is not causing a detriment to wild populations. HSUS/HSI urges Maui County to impose additional requirements on collectors to address the shortfall and to protect Maui's reef neighbors.

Destructive collection techniques are also of concern. Collectors in Hawaii have been observed breaking coral to capture fish and even using bleach, both of which are illegal (Tissot and Hallacher 2003).

Fish in the pet trade are animals who deserve humane treatment. The more than 17,000 animals collected alive from the reefs of Maui County every year for the pet trade deserve better treatment than what they are currently receiving. Indeed, they deserve the same standards of care guaranteed by Hawaii law HRS 711-1109 relating to cruelty to animals, including but not limited to intentionally, knowingly or recklessly: a) Causing substantial bodily injury, starving, tormenting; b) Depriving of necessary sustenance; c) Killing without need; d) Carrying or causing to be carried in or upon any vehicle or other conveyance in a cruel or inhumane manner; and e) Confining or causing to be confined in a cruel or inhumane manner. These practices are not acceptable for a pet dog and should not be acceptable for a pet fish.

Therefore, HSUS/HSI strongly supports the bill for an ordinance amending Chapter 6.04, Maui County Code, pertaining to animal control. This important bill would include "aquatic life" as a type of animal receiving protection under the code, including protection from purposeful injury (by "fizzing" for example), food deprivation and other inhumane practices. Should the bill be passed, The HSUS/HSI stands ready to assist the implementing agency in preparation of materials and training of staff regarding humane treatment of fish.

Aquatic life operations must be held accountable for inhumane treatment of animals or environmentally destructive practices. Those who are collectors or exporters must be held to higher standards than those of the Hawaii DLNR. The bill for an ordinance amending Title 5, Maui County code, pertaining to aquatic life operators, is an important step toward better regulation of this industry. In addition to the issuance of permits, HSUS/HSI strongly recommends that criteria for approval of permits be established by law. For example, the applicant should provide information that collection of the animals from the wild will not cause harm to the wild population, that they are in compliance with Hawaii law HRS 711-1109 relating to cruelty to animals, and that preparation for shipping and shipping itself is in compliance with the IATA regulations.

In conclusion, HSUS/HSI supports both bills before the Council and thanks the Council for taking up this important issue. We urge the Council to adopt these critical protective measures.

Thank you for this opportunity to provide testimony.

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