



*For the Protection of Hawaii's Native Wildlife*  
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**HAS COMMENTS ON THE FEIS FOR THE KAWAINUI-HAMAKUA MASTER PLAN PROJECT**

The Hawaii Audubon Society (HAS) has reviewed the Final Environmental Impact Statement for the "Kawainui-Hamakua Master Plan Project" and finds it that it still does not meet the requirements of Hawaii Revised Statutes (HRS) Chapter 343 nor Hawaii Administrative Rules (HAR) Title 11 Section 200. The Master Plan FEIS reveals that its primary purpose is the development of these wetlands for greatly increased human use (9,000-10,000 visitors per month) when it should be the restoration of this severely degraded wetland ecosystem.

DLNR/DOFAW's State Wildlife Sanctuaries program is charged with implementing wetland management techniques to restore, enhance, protect and maintain wetland ecosystems, recognizing that ecosystem condition and its ability to function properly as a wetland is critical to the recovery of endangered waterbird species. The U.S. Fish & Wildlife Recovery Plan recommends minimizing human disturbance to waterbirds and their habitats, which includes controlling human access to waterbird habitats during breeding season.

Kawainui Marsh and Hamakua Marsh share international recognition as biosphere reserve sites under the auspices of UNESCO, and as Wetlands of International Importance under the Ramsar Convention. The Master Plan's FEIS indicates that the Plan, if implemented, will harm this public trust resource and violate Article IX Section 8 and Article XI Sections 1, 7 and 9 of the Hawaii Constitution.

These wetlands are part of a single mountain-to-ocean ecosystem that has been degraded by upstream water diversions to the Waimanalo watershed and the construction of a dyke/wall for flood control, which has prevented stream flow from following its natural course through Kawainui Marsh, through Hamakua Marsh, and on into the ocean, diverting it instead to the artificial Oneawa canal, which doesn't allow water out of the Kawainui wetland ecosystem at low water levels. The impact of these diversions, plus the Kappa`a valley

industrial park pollution, alien California grass and Hale Koa introduced to feed cattle, private residences and a hospital along more than half of the Kawainui Marsh border, and businesses and parking lots along Hamakua Marsh, are all examples of existing cumulative impacts that have led to the buildup of the huge 8-10 feet thick floating peat mat in the center of Kawainui Marsh and the degradation of these RAMSAR wetlands.

The FEIS for these wetlands should, but does not, contain a detailed and comprehensive wetlands ecosystem restoration plan and detailed habitat management plans in order to protect four endangered Hawaiian waterbirds and several migratory waterbird species that are protected by the Migratory Bird Treaty Act. The Master Plan FEIS does not disclose all the existing cumulative environmental impacts on Kawainui Marsh, let alone reasonably foreseeable impacts such as climate change and sea level rise.

The Master Plan's FEIS discloses, and only partially, the environmental impacts of its preferred alternative. HRS Chapter 343 requires that all cumulative impacts be disclosed and their impacts on the resource assessed. It does not matter if DLNR cannot control most of these impacts. But it can prevent the addition of more buildings, septic systems, parking lots, and other stressors on state land along the makai side of Kapa`a Quarry Road, the last undeveloped edge of Kawainui Marsh such as:

- Four parking lots and numerous trails.
- Education Center on Kapa`a Quarry Road with a 5,000 sq ft building, eight kauhale totaling 5,300 sf; a parking lot, septic system with a leach field, have 6000 visitors a month and the ability to hold several events yearly for 200-500 people
- Vegetation processing, on Kapa`a Quarry road, will have a 5,000 sf building with septic system and leach field;
- Kapa`a Culture Center, on Kapa`a Quarry Road, 7,200 sf total, 2 driveways off Kapa`a Quarry Road, a nursery and caretakers cottage and a septic system with leach field and have the ability to hold several large events with hundreds of people.

The FEIS indicates that the proposed Kapaa Cultural Center will have various buildings (800-1500 sf) a total of 10,000 sf. which will undoubtedly increase the cumulative and significant impacts on Kawainui's already stressed wetlands. Currently there are **no** buildings along the makai side of the Quarry Road and there is no municipal sewer line so the Center will have a septic wastewater system with leach field that will inevitably leach into the wetland. There will also be more than one driveway off Kapaa Quarry Road to parking lots from which runoff contaminated with lead and fuel will flow down into the Marsh. The FEIS projects that such "improvements" to the Marsh will attract 9,050 visitors a month (currently there are about 3,000 people a month in Kawainui mostly for work projects, cultural practices etc.)

The FEIS for the Master Plan Project allows the BLNR to grant long term leases to private organizations to construct buildings, parking lots and septic systems located mere yards from Class 1 waters for the purpose of conducting state- supported cultural-religious practices and educational activities. These activities do not need to be conducted in or immediately next to a sensitive wetland and should not be accommodated, particularly if they restrict public access to and exploit public trust resources for commercial purposes. The Cultural Center, which will be constructed on public trust land, will not be open to the general public on a everyday basis, but the public apparently will be invited to attend special classes. The FEIS does not disclose whether fees will be collected, but if they do these are commercial activities disguised as cultural practices.

BLNR is responsible as trustee to manage Kawainui Marsh and Hamakua Marsh in the interest of the public and not support private appropriation of these wetlands as this FEIS allows. As trustee, the BLNR has an obligation not only to preserve state property subject to the public trust, but also not allow for any diminution of the trust corpus. The public trust doctrine places BLNR under fiduciary obligation to protect trust resources and prevent private appropriation.

The Public Trust Doctrine is incorporated into the Hawaii State Constitution, which recognizes the application of public trust principles in the management of all its natural resources, including prevention of water diversions from and pollution of public trust wetland resources. Article XI Section 1 “For the benefit of present and future generation, the State and its political subdivision shall conserve and protect Hawaii’s natural beauty and all natural resources, including land, water, air minerals and energy sources, and shall promote the development and utilization of these resources in a manner consistent with their conservation . . . All public natural resources are held in trust by the State for the benefit of the people.”

The FEIS indicates that the Master Plan will lead to more degradation of this public trust resource; it is not a plan that will restore wetland ecosystems, the habitat of endangered and migratory waterbirds and protect a World Wetland of International Importance. This Master Plan Project allows substantial degradation of environmental quality to continue, which will also substantially affect human health.

One of the objectives of the cultural centers, the Education Center kauhale is to “...include growing traditional Hawaiian food crops including kalo (taro) and ulu (breadfruit)” (Volume II page 3-57) However, Kawainui Marsh is too contaminated for food production. The future site for vegetation processing was previously the City’s Kapa`a Street Light Storage Yard. In 2006 the City removed 71 electrical transformers when “one transformer tipped over releasing an unknown volume of dielectric fluid to bare soil” “Matrix sampling by emergency response contractor detected PCBs in three wipe samples and a soil sample at the site.” While

the DOH recommended additional quality control/assurance sampling...” the FEIS does not mention if that sampling has been completed and the results. Instead the Master Plan/FEIS asserts over and over again that there are no adverse or cumulative impacts. However PCBs and other toxins have contaminated the sediment in Kawainui from the now-closed unlined landfill mauka, the Kapaa Industrial Park and the adjacent Kappa Stream. For decades sewage from the Maunawili pump station was sent directly into Kawainui. Sewage from cesspools and septic system drainfields in the surrounding urban areas leach down into the water table and move laterally into Kawainui. Sea level rise and the accompanying rise in the water table will facilitate the spread of even more urban contamination into these wetlands.

The Master Plans FEIS does not disclose these past, present and future adverse effects. Instead it proposes adding more contaminants to Kawainui by adding restrooms along Kapaa Quarry Road where there is no access to municipal waste water treatment plants. See pg 2-53 Comfort Stations. “Planned comfort stations, which are separate from the cultural centers or education center, would consist of modular prefabricated structures having either 2 or 4 toilets (2 men, 2 women) with floor areas ranging from about 200 to 350 sf, depending upon the number of toilets.” “Such a restroom facility can be a conventional design that processes wastewater using a leach field similar to the existing facility serving the city Model Airplane Park, or utilize newer green technology consisting of a self-contained restroom with or without utilities.

Kapa`a Stream, which flows from Kapa`a Valley into Kawainui Marsh, is bordered by auto repair shops and other industrial uses and a rock quarry for which TMDL (Total Maximum Daily Load) standards have been calculated because so many contaminants get into the stream. Waters from Kapa`a Stream flow into Kawainui Marsh, particularly during heavy rains. Kapa`a Stream is supposed to be a Class 2 inland stream under State Department of Health Water Quality Standards, whose objective as applied to Kapa`a Stream is “to protect its uses for recreational purposes, support and propagation of fish and other aquatic life...” Yet Kapa`a Stream is on the State Department of Health List of Impaired Waters prepared under the federal Clean Water Act §303(d) because of elevated concentrations of turbidity, total suspended solids, nutrients, and metals in the stream.

Hawaii's Clean Water Act, HRS § 342D, became law in 1989. HRS § 342D-17 provides that all state agencies are required to enforce it. HRS §342D-50 Prohibition. "(a) No person, including any public body, shall discharge any water pollutant into state waters, or cause or allow any water pollutant to enter state waters except in compliance with this chapter, rules adopted pursuant to this chapter, or a permit or variance issued by the director." See *Kelly v. 1250 Oceanside Ptnrs*, 111 Haw. 205, 140 P.3d 285 (2006); see also Haw. const. art. XI, sec. 1. HAR Chapter 11-54-4(a) requires that “[a]ll waters shall be free of substances attributable to

domestic, industrial, or other controllable sources of pollutants, including: "(5) Substances or conditions or combinations thereof in concentrations which produce undesirable aquatic life

The Master Plan's FEIS identifies the following sources of contamination of Kawainui's wetlands, but nevertheless supports allowing access to an additional 9,000-10,000 visitors **per month** into these wetlands.

- "Kapa`a Stream, a contributory to Kawainui, is a Class 2 Inland Stream..." "DOH identified water quality in Kapa`a Stream as impaired by elevated turbidity, total suspended solids (TSS) nutrients (TN, TP) and metals. Subsequent review of toxic metals standards and data relative to total hardness (calcium = magnesium) present in Kapa`a Stream found the stream impaired by excessive metals" (DOH 2007) (Volume I Pg 3-91)
- "...groundwater weeping from the side of the landfill into the canal has been observed (DOH 2007) (Volume II Pg 3-91)
- A 1989 water quality report states that sediment "Samples detected the presence of heavy metals including chromium (Cr), lead (Pb), mercury (Hg)" with "heavy metal presence in the upper wetland sediment" that "was substantially greater than that in the lower wetland sediments." (Volume II Pg 3-110)
- "Sediment samples were taken in the 1989 water quality study effort previously discussed to assess the presence of toxic materials in Kawainui. Samples detected the presence of heavy metals including chromium (Cr), lead (Pb) and mercury (Hg). With the exception of cadmium (Cd) and mercury, both of which generally occur in some concentrations in the samples, the heavy metal presence in the upper wetland sediment was substantially greater than that in the lower wetland sediments. However, nickel (Ni) was found in great concentration at Station Nol. 8" (Volume II Pg 3-111)
- "Chromium VI was present at Stations 3 and 6 in low concentrations" "Chromium VI in aquatic systems is typically associated with discharge from electroplating, leather tanning, or textile industries" "TPH can be broken down by bacteria and/or sink into wetland sediments" "Toluene, a water insoluble component of gasoline, was the only volatile organic detected. In surface waters, the biodegradation half-life of toluene is estimated to range from 4-22 days. Therefore, it is not surprising that only 5 of 141 analyzed pollutants were present in detectable amounts since Kawainui functions as a sediment trap and repository for many toxic substances" EIS should have evaluated these impacts since the wetland will be used for taro and other plants." "The few toxic compounds found in solution in the wetland are likely due to the assimilation and sequestering capabilities of the wetland" "This conclusion may explain the greater presence of heavy metals in upper marsh segments identified in the 1989 water quality

study, as the wetland may be retaining suspended heavy metals before they arrive in lower marsh areas.” (Volume II Pg 3-113)

- “Sediment samples indicated that the marsh contained heavy metals including chromium, lead, and mercury. However, this was not unusual in comparison with other Oahu watersheds due to heavy metals being naturally present in weathered basalt and would thus be expected in sediments derived from erosion of this material.” “Metals are entombed in the sediments and concentrated through plant uptake into fibrous tissue in the biomass.” (Volume II Pg 3-117)

HAR § 11-200-9(c) provides "For agency or applicant actions, the proposing agency or the approving agency, as appropriate, shall analyze alternatives, in addition to the proposed action in the environmental assessment." All alternatives must include the potential environmental impacts associated with them. In addition, while a FEA is not required to consider all alternatives, it is required to provide and analyze sufficient reasonable alternatives. *Price*, 81 Haw at 182, 914 P.3d at 1375. The Master Plan's FEIS includes only two alternatives: The No Action alternative and DLNR's preferred alternative, which does not disclose all the environment impacts associated with the building of multiple structures, septic systems and parking lots along the last undeveloped edge of Kawainui Marsh and the admission of 9,000-10,000 visitors **per month** into these already contaminated and degraded wetlands.

The alternative preferred by the Hawaii Audubon Society and others, but not considered, would:

- Limit human use of these wetlands, such as closing Kawainui Marsh and Hamakua Marsh to all visitors during the endangered Hawaiian wetland birds and migratory wetland birds nesting seasons;
- Prohibit leasing or granting month-to-month permits to build on state land makai of the Quarry Road, Kalanianaʻole Highway between the Quarry Road and Castle Hospital and Kailua Road between the Highway and Hamakua Drive.
- Prohibit commercial activity on state land in and around the Kawainui-Hamakua Marsh Complex.
- Require all toilets within 2000 feet of Kawainui Marsh and Hamakua Marsh and on adjacent state land uphill from the wetlands to be connected to the nearest City and County of Honolulu waste water treatment facility;
- Relocate the Kapa`a Industrial Park out of the Kawainui-Hamakua complex watershed and provide for the cleanup of the contaminated soil in Kapa`a Valley.
- Provide for the restoration of natural water flow through these wetlands and prioritize the removal of the central peat mat in Kawainui Marsh to prevent future flooding of the downstream Coconut Grove residential area in Kailua.

- Provide for a detailed and comprehensive wetlands ecosystem restoration plan and detailed habitat management plans to protect four endangered Hawaiian waterbirds and several migratory waterbird species.

The Purpose of HRS Chapter 343 is "to establish a system of environmental review which will ensure that environmental concerns are given appropriate consideration in decision making along with economic and technical considerations." [HRS § 343-1] The State's environmental policy is set forth in the Constitution of the State of Hawaii Article XI section 1 and in HRS Chapter 344: "The purpose of this chapter is to establish a state policy which will encourage productive and enjoyable harmony between people and their environment, promote efforts which will prevent or eliminate damage to the environment and biosphere and stimulate the health and welfare of humanity, and enrich the understanding of the ecological systems and natural resources important to the people of Hawaii." [HRS § 344-1]

In sum, the Master Plan FEIS conflicts with the state's long-term environmental policies, goals and guidelines and does not satisfy the purpose of the Hawaii Environmental Policy Act. The members of the Hawaii Audubon Society believe only a fully restored and functioning Kawainui Marsh, which provides an abundance of habitat and protection for Hawaii's endangered waterbirds and migratory birds, whose water quality is as clean and pure as possible, has adequate water to provide sufficient waterbird habitat and facilitate native goby migration, actively protects known archaeological sites and seeks to discover as yet unearthed historical and archaeological sites, and is a secure and safe place to visit, can host only a limited number of people to experience its wonders.

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