

Halawa Stream Monitoring Data Sheet

Observer/s: _____

Date: 06-15-26 Site Name: Upstream Site Time: 0743

WEATHER CONDITIONS

NOW	Past 24 Hours	Has there been a heavy rain in the past 7 days?
<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> yes <input checked="" type="checkbox"/> no
<input type="checkbox"/> rain (steady rain)	<input type="checkbox"/> rain (steady rain)	
<input checked="" type="checkbox"/> showers (intermittent)	<input checked="" type="checkbox"/> showers (intermittent)	
<u>20</u> % cloud cover	<u>80</u> % cloud cover or less	
<input type="checkbox"/> clear/sunny	<input type="checkbox"/> clear/sunny	

WATER QUALITY

Water level dry wet standing water flowing water sheen visible

Observed Turbidity/Sedimentation: Clear, sediment at bottom

Water Color: clear

Estimated Depth: 1"

Visibility: 100% to the bottom

Tide (if applicable): N/A

Notes: Light drizzle.

SPECIES OBSERVATIONS

Fish Kill? Yes No # Dead Fish 0

Fish Breathing Stress/Gulping None Yes

Fish Abnormal Behavior None Yes

Notes: Opiuma trees are flowering so there is more bird activity.

Species Observed	# of individuals	Behavior	Notes/Observations
red-vented bulbul	7	Loafing	In the trees above the stream.
spotted dove	1	Flying	Flew over the stream.
warbling white-eye	1	Loafing	In the trees above the stream.
common myna	1	Loafing	In the trees above the stream.

Halawa Stream Monitoring Data Sheet

PHOTOGRAPHS



Photograph #
1:
Upstream Site
looking
upstream.



Photograph #
2:
Upstream Site
looking
downstream.

Halawa Stream Monitoring Data Sheet

Observer/s: _____

Date: 6-15-2026 Site Name: Discharge Site Time: 0730

WEATHER CONDITIONS

NOW	Past 24 Hours	Has there been a heavy rain in the past 7 days?
<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> yes <input checked="" type="checkbox"/> no
<input type="checkbox"/> rain (steady rain)	<input type="checkbox"/> rain (steady rain)	
<input type="checkbox"/> showers (intermittent)	<input checked="" type="checkbox"/> showers (intermittent)	
<u>10</u> % cloud cover	<u>80</u> % cloud cover or less	
<input checked="" type="checkbox"/> clear/sunny	<input type="checkbox"/> clear/sunny	

WATER QUALITY

Water level dry wet standing water flowing water sheen visible

Observed Turbidity/Sedimentation: sediment at bottom

Water Color: clear

Estimated Depth: 1"

Visibility: 100% to bottom

Tide (if applicable): N/A

Notes: More leaf litter present in the stream.

SPECIES OBSERVATIONS

Fish Kill? Yes No # Dead Fish 0

Fish Breathing Stress/Gulping None Yes

Fish Abnormal Behavior None Yes

Notes: The discharge project cleared the vegetation on the slope above the discharge pipe.

Species Observed	# of individuals	Behavior	Notes/Observations
koloa	2	Foraging	In the stream.
red-vented bulbul	4	Loafing	In the vegetation above the stream.
common myna	2	Flying	Flew over the stream.
warbling white-eye	2	Loafing	In the vegetation above the stream.

Halawa Stream Monitoring Data Sheet

PHOTOGRAPHS



Photograph #
1:
Discharge Site
looking
upstream.



Photograph #
2:
Discharge Site
looking
downstream.

Halawa Stream Monitoring Data Sheet

Observer/s: _____

Date: 06-15-26 Site Name: Downstream Site 1 Time: 0708

WEATHER CONDITIONS

NOW	Past 24 Hours	Has there been a heavy rain in the past 7 days?
<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> yes <input checked="" type="checkbox"/> no
<input type="checkbox"/> rain (steady rain)	<input type="checkbox"/> rain (steady rain)	
<input type="checkbox"/> showers (intermittent)	<input checked="" type="checkbox"/> showers (intermittent)	
<u>50 %</u> cloud cover	<u>80 %</u> cloud cover or less	
<input checked="" type="checkbox"/> clear/sunny	<input type="checkbox"/> clear/sunny	

WATER QUALITY

Water level dry wet standing water flowing water sheen visible

Observed Turbidity/Sedimentation: Clear, sediment at bottom

Water Color: clear

Estimated Depth: 1"-2"

Visibility: 100% to the bottom

Tide (if applicable): N/A

Notes: Small oil patches observed in the usual spots.

SPECIES OBSERVATIONS

Fish Kill? Yes No # Dead Fish 0

Fish Breathing Stress/Gulping None Yes

Fish Abnormal Behavior None Yes

Notes: None

Species Observed	# of individuals	Behavior	Notes/Observations
common waxbill	3	Foraging	In the vegetation above the stream.
red-vented bulbul	1	Flying	Flew over the stream.
mosquito fish	~100	Swimming	In the stream.
common myna	1	Flying	Flew over the stream.
red-whiskered bulbul	1	Loafing	On the chain link fence above the stream.
spotted dove	1	Loafing	Along the concrete side above the stream.
rose-ringed parakeet	1	Flying	Flew over the stream.

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red-vented bulbul	2	Loafing	In the vegetation above the stream.
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PHOTOGRAPHS



Photograph # 1:
Downstream Site 1 looking upstream.

Halawa Stream Monitoring Data Sheet

Observer/s: _____

Date: 06-15-26 Site Name: Downstream Site 2 Time: 0658

WEATHER CONDITIONS

NOW	Past 24 Hours	Has there been a heavy rain in the past 7 days?
<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> yes <input checked="" type="checkbox"/> no
<input type="checkbox"/> rain (steady rain)	<input type="checkbox"/> rain (steady rain)	
<input checked="" type="checkbox"/> showers (intermittent)	<input checked="" type="checkbox"/> showers (intermittent)	
<u>80</u> % cloud cover	<u>80</u> % cloud cover or less	
<input type="checkbox"/> clear/sunny	<input type="checkbox"/> clear/sunny	

WATER QUALITY

Water level dry wet standing water flowing water sheen visible

Observed Turbidity/Sedimentation: Clear, sediment at bottom.

Water Color: clear

Estimated Depth: 1"-1'

Visibility: 100% to bottom.

Tide (if applicable): N/A

Notes: Light drizzle.

SPECIES OBSERVATIONS

Fish Kill? Yes No # Dead Fish 0

Fish Breathing Stress/Gulping None Yes

Fish Abnormal Behavior None Yes

Notes: None

Species Observed	# of individuals	Behavior	Notes/Observations
black-crown night heron	3	Loafing	In the stream bed and trees above the stream.
spotted dove	3	Loafing	In the vegetation above the stream and in the stream bed.
common waxbill	1	Flying	Flew over the stream.
zebra dove	1	Flying	Flew over the stream.
jungle fowl	1	Loafing	In the vegetation above the stream.
spotted dove	1	Flying	Flew over the stream.

Halawa Stream Monitoring Data Sheet

PHOTOGRAPHS



Photograph #
1:
Downstream
Site 2 looking
downstream.

Halawa Stream Monitoring Data Sheet

Observer/s: _____

Date: 06-15-26 Site Name: Estuary Site 1 Time: 0636

WEATHER CONDITIONS

NOW	Past 24 Hours	Has there been a heavy rain in the past 7 days?
<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> yes <input checked="" type="checkbox"/> no
<input type="checkbox"/> rain (steady rain)	<input type="checkbox"/> rain (steady rain)	
<input type="checkbox"/> showers (intermittent)	<input checked="" type="checkbox"/> showers (intermittent)	
<u>80</u> % cloud cover	<u>80</u> % cloud cover or less	
<input checked="" type="checkbox"/> clear/sunny	<input type="checkbox"/> clear/sunny	

WATER QUALITY

Water level dry wet standing water flowing water sheen visible

Observed Turbidity/Sedimentation: sediment mixed in the water.

Water Color: dark green to brown

Estimated Depth: 1" to 6'

Visibility: 1'

Tide (if applicable): -0.1 ft

Notes: None

SPECIES OBSERVATIONS

Fish Kill? Yes No # Dead Fish 0

Fish Breathing Stress/Gulping None Yes

Fish Abnormal Behavior None Yes

Notes: None

Species Observed	# of individuals	Behavior	Notes/Observations
white tern	3	Flying	Flew over the stream.
red-vented bulbul	4	Loafing	In the vegetation above the stream.
spotted dove	2	Flying	Flew over the stream.
koloa/mallard hybrid	1	Loafing	In the mud flat in the stream.
warbling white-eye	1	Flying	Flew over the stream.
common waxbill	3	Flying	Flew over the stream.
spotted dove	1	Loafing	In the vegetation above the stream.

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rose-ringed parakeet	3	Flying	Flew over the stream.
common myna	3	Flying	Flew over the stream.
rock dove	1	Flying	Flew over the stream.
zebra dove	3	Flying	Flew over the stream.
tilapia	5	Swimming	In the stream.

PHOTOGRAPHS



Photograph # 1:
Estuary Site 1 looking upstream.

Halawa Stream Monitoring Data Sheet

Observer/s: _____

Date: 06-15-26 Site Name: Estuary Site 2 Time: 0647

WEATHER CONDITIONS

NOW	Past 24 Hours	Has there been a heavy rain in the past 7 days?
<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> storm (heavy rain)	<input type="checkbox"/> yes <input checked="" type="checkbox"/> no
<input type="checkbox"/> rain (steady rain)	<input type="checkbox"/> rain (steady rain)	
<input checked="" type="checkbox"/> showers (intermittent)	<input checked="" type="checkbox"/> showers (intermittent)	
<u>50%</u> cloud cover	<u>80%</u> cloud cover or less	
<input type="checkbox"/> clear/sunny	<input type="checkbox"/> clear/sunny	

WATER QUALITY

Water level dry wet standing water flowing water sheen visible

Observed Turbidity/Sedimentation: Clear, sediment at bottom.

Water Color: clear to light green

Estimated Depth: 1" - 2'

Visibility: 100% to the bottom

Tide (if applicable): -0.1 ft

Notes: None

SPECIES OBSERVATIONS

Fish Kill? Yes No # Dead Fish 0

Fish Breathing Stress/Gulping None Yes

Fish Abnormal Behavior None Yes

Notes: None

Species Observed	# of individuals	Behavior	Notes/Observations
warbling white-eye	1	Loafing	In the vegetation above the stream.
common myna	5	Flying	Flew over the stream.
common waxbill	1	Flying	Flew over the stream.
jungle fowl	1	Loafing	In the grassy area nearby the stream.

Halawa Stream Monitoring Data Sheet

PHOTOGRAPHS



Photograph #
1:
Estuary Site 2
looking
upstream.



Photograph #
2:
Estuary Site 2
looking
downstream.

WATERBIRD SURVEY DATASHEET

WETLAND CONDITION CODES				WEATHER CODES			
Water Level (WL) 0 = dry 1 = lower than normal 2 = normal 3 = higher than normal	Human Impact (HI) 0 = indirect (little garbage, few people) 1 = moderate 2 = heavy (many people present; e.g., wading, boating, fishing, etc)	Rainfall (RF) 0 = no rain 1 = mist or fog 2 = drizzle 3 = light rain 4 = heavy rain 5 = snow or hail	Wind 0 = no wind, < 1 mph 1 = smoke drifts, 1-3 mph 2 = wind felt on face, 4-7 mph 3 = leaves and twigs rustle, 8-12 mph 4 = dust raises, branches stir, 13-18 mph 5 = small trees sway, >19 mph				
Vegetation Cover (VC) 0 = open water (<25% veg) 1 = 26-50% veg cover 2 = 51-75% veg cover 3 = >75% cover	Shoreline Condition of Tidal Wetlands (SC) 0 = water at high tide mark N/A=not applicable 1 = water 25 ft from high tide mark 2 = water 50 ft from high tide mark 3 = water >50 ft from high tide mark	Cloud Cover (CC) = Estimate to the nearest 10%					

Date 06-15-26

REMINDERS: If site is not accessible, include wetland name and write 'no access'

Observers [REDACTED]

If no birds observed, fill out top portion and write 'no birds'

KEEP A COPY FOR YOUR RECORDS

Island O'ahu

Subadult includes juveniles and chicks

Wetland Name	US				DC				DS 1				DS 2			
	WL	VC	HI	SC	WL	VC	HI	SC	WL	VC	HI	SC	WL	VC	HI	SC
Condition	2	0	0	N/A	2	0	0	N/A	2	0	0	N/A	2	0	0	N/A
Weather	CC	RF	Wind		CC	RF	Wind		CC	RF	Wind		CC	RF	Wind	
Time	Start		Stop		Start		Stop		Start		Stop		Start		Stop	
	0743		0748		0730		0735		0708		0713		0658		0703	
COOT adult																
subadult																
GALLINULE/MOORHEN adult																
subadult																
STILT adult																
subadult																
KOLOA adult																
subadult																
Koloa/Mallard Hybrid	2 (Adult/foraging)															
Mallard (domestic/feral)																
Other Domestic Duck																
Black-cr. Night Heron	3 (adult/loafing)															
Cattle Egret																
Pacific Golden Plover																
Ruddy Turnstone																
Sanderling																
Wandering Tattler																
Northern Pintail																
Mallard (migratory)																
Lesser scaup																
White tern																
Comments	No water/shorebirds observed.								No water/shorebirds observed.							

WATERBIRD SURVEY DATASHEET

WETLAND CONDITION CODES		WEATHER CODES	
Water Level (WL) 0 = dry 1 = lower than normal 2 = normal 3 = higher than normal	Human Impact (HI) 0 = indirect (little garbage, few people) 1 = moderate 2 = heavy (many people present; e.g., wading, boating, fishing, etc)	Rainfall (RF) 0 = no rain 1 = mist or fog 2 = drizzle 3 = light rain 4 = heavy rain 5 = snow or hail	Wind 0 = no wind, < 1 mph 1 = smoke drifts, 1-3 mph 2 = wind felt on face, 4-7 mph 3 = leaves and twigs rustle, 8-12 mph 4 = dust raises, branches stir, 13-18 mph 5 = small trees sway, >19 mph
Vegetation Cover (VC) 0 = open water (<25% veg) 1 = 26-50% veg cover 2 = 51-75% veg cover 3 = >75% cover	Shoreline Condition of Tidal Wetlands (SC) 0 = water at high tide mark N/A=not applicable 1 = water 25 ft from high tide mark 2 = water 50 ft from high tide mark 3 = water >50 ft from high tide mark	Cloud Cover (CC) = Estimate to the nearest 10%	

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Island O'ahu

Subadult includes juveniles and chick

Wetland Name	ES 1				ES 2											
	WL	VC	HI	SC	WL	VC	HI	SC	WL	VC	HI	SC	WL	VC	HI	SC
Condition	2	0	2	0	2	0	0	0								
Weather	CC	RF	Wind		CC	RF	Wind		CC	RF	Wind		CC	RF	Wind	
	80	0	0		50	1	0									
Time	Start		Stop		Start		Stop		Start		Stop		Start		Stop	
	0636		0641		0647		0652									
COOT adult																
subadult																
GALLINULE/MOORHEN adult																
subadult																
STILT adult																
subadult																
KOLOA adult																
subadult																
Koloa/Mallard Hybrid	1 (Adult/loafing)															
Mallard (domestic/feral)																
Other Domestic Duck																
Black-cr. Night Heron																
Cattle Egret																
Pacific Golden Plover																
Ruddy Turnstone																
Sanderling																
Wandering Tattler																
Northern Pintail																
Mallard (migratory)																
Lesser scaup																
White Tern	3 (Adult/flying)															
Comments	No water/shorebirds observed.															