Stony Coral Tissue Loss Disease





CORE Strike Teams- Tier System

Tier III- Strike Team Volunteer

- Has completed classroom and in-water training sessions
- Can conduct roving diver surveys; can safely be a support diver for Intervention diver
- Can NOT perform interventions

Tier II- Intervention Diver

- Has completed classroom and in-water training sessions; has completed adequate number of intervention dives as support diver
- Determined at the discretion of the field lead prior to a dive day
- Can perform interventions under supervision of field leader only

Tier I- Strike Team Field Leader

- Can lead, guide, and organize intervention dive days (under direction of Strike Team Coordinator and Coral Disease Response Coordinator)
- One Strike Team Field Leader must be present for all intervention dive days
- Specifically identified and approved by Strike Team Coordinator and Coral Disease Response Coordinator

The Highly Susceptible Species

<u>Common Name</u>	<u>Scientific Name</u>	<u>Species Code</u>
Maze Coral	Meandrina meandrites	MMEA
Elliptical Star Coral	Dichocoenia stokesii	DSTO
Pillar Coral	Dendrogyra cylindrus	DCYL
Smooth Flower Coral	Eusmilia fastigiata	EFAS
Boulder Brain Coral	Colpophyllia natans	CNAT
Grooved Brain Coral	Diploria labyrinthiformis	DLAB
Symmetrical Brain Coral	Pseudodiploria strigosa	PSTR
Knobby Brain Coral	Pseudodiploria clivosa	PCLI

Meandrina meandrites - MMEA

Maze Coral







Tan to yellow-brown hemispherical shaped heads or flattened plates. Mazes of ridges have a zipper-like appearance.

Dichocoenia stokesii -DSTO

Elliptical Star Coral







Yellow-brown or cream colored domed heads with protruding round, oval, or "y" shaped corallites.

Dendrogyra cylindrus - DCYL

Pillar Coral



Tan to brown pillar like columns. Polyps are extended during the daytime giving a hairy appearance.





Eusmilia fastigiata - EFAS

Smooth Flower Coral





Hemispherical mound with yellow-brown widely spaced round or oval tubular projections.



Colpophyllia natans - CNAT

Boulder Brain Coral



Large rounded domes or plates. Ridges are typically brown with wide valleys being green, tan, or whitish.





Diploria labyrinthiformis - DLAB

Grooved Brain Coral







Tan to yellow-brown hemispherical heads. Double ridges and sometimes deep valleys.

Pseudodiploria strigosa - PSTR

Symmetrical Brain Coral



Hemispherical domes or plates. Evenly rounded ridges and connected long narrow valleys. Has distinct light line at the top of its ridges





Pseudodiploria clivosa - PCLI

Knobby Brain Coral







Yellow- brown or bluish-gray hemispherical domes or encrusting with irregular knobs. Typically only found in very shallow water (~15ft or less)

The Intermediately Susceptible Species

<u>Common Name</u>	<u>Scientific Name</u>	<u>Species Code</u>
Great Star Coral	Montastrea cavernosa	MCAV
Mountainous Star Coral	Orbicella faveolata	OFAV
Lobed Star Coral	Orbicella annularis	OANN
Boulder Star Coral	Orbicella franksi	OFAV
Smooth Star Coral	Solenastrea bournoni	SBOU
Blushing Star Coral	Stephanocoenia intersepta	SINT
Massive Starlet Coral*	Siderastrea siderea*	SSID*

Montastrea cavernosa - MCAV

Great Star Coral



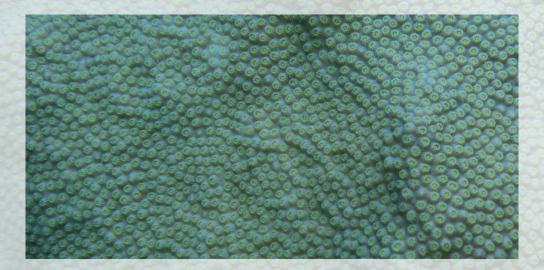
Green, brown, gray, or fluoresce red orange massive fleshy mounds and domes. Large, excerpt corallites. Polyps usually retracted during the day, but can sometimes be seen extended. Sometimes have bright green polyps





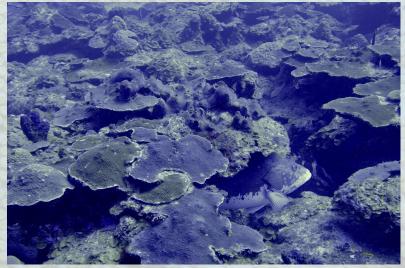
Orbicella Faveolata- OFAV

Mountainous Star Coral



Large mounding or plating colony, red-brown, brown, green, yellow in color. Small excerpt polyps. Has bumps along regular ridges





Orbicella annularis- OANN

Lobed Star Coral



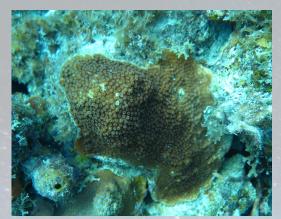
Larged semi-hemisphere colonies made of separate pillars or "lobes". Yellow to brown in color, with very small excerpt polyps.





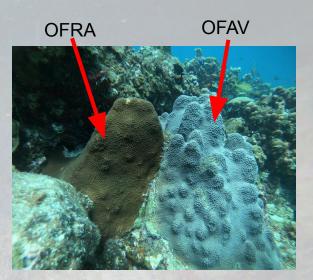
Orbicella Franksi- OFRA

Boulder Star Coral



Large mounding or plating colony with small irregular bumps, red-brown, brown, green, yellow in color. Small excerpt polyps. Typically found in deeper water





Differences from OFAV:

- Polyps more spaced out
- Irregular bumps
- Tends to grow in deeper water

Solenastrea bournoni

Smooth star coral

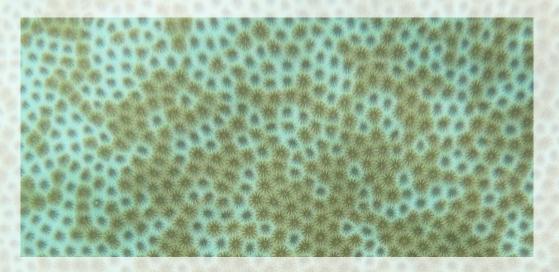




Mounding colony, yellow/brown in color, can sometimes appear quite pale. Bumpy surface with dark, excerpt polyps

Stephanocoenia Intersepta- SINT

Blushing Star Coral



Small mounds or partially encrusting pale or reddish with dark insert polyps. Pigmentation of the colony is often concentrated into the polyps, leaving bare white skeleton.



Siderastrea siderea- SSID

Massive Star Coral



Small mounds red in color with dark inset polyps. Extremely common. Can appear blue or purple when bleached. Exhibits signs of stress as Dark Spot Disease (DSD)





Additional Corals to Identify

<u>Common Name</u>	<u>Scientific Name</u>	<u>Species Code</u>
Lettuce/Sheet Coral	Agaricia spp.	AGGSP
Cactus Coral	Mycetophyllia spp.	МҮСЕТ
Mustard Hill Coral	Porites astreoides	PAST

Agaricia spp. Lettuce/Leaf Coral



Thin plates or in encrusting colonies with very little height, thin ridges provide texture. Enormous depth range (3-300+ft), can be found in shallow water underneath ledges or in the open.





Mycetophyllia spp.

Cactus Coral



Mounding or thick plating colonies with thick raised bumps and ridges. Overall darker in color but can have bright fluorescent colors as well



Colonies can be fairly rare, usually only a few on a given reef.





Porites astreoides

Mustard Hill Coral



Extremely common, weedy coral species, found as bumpy mounds or plates. Yellow-brown to green in color. Very small corallites.





Stony Coral Tissue Loss Disease

Strike Team Training
Part II: Disease Identification





Other Coral Health Notes (Not SCTLD)





Predation



Coral Bleaching



Black Band Disease



White Plague

General Traits:

- Slower
- One lesion from growth edge
- Follows bleaching events
- Largely affects
 OFAV, OFRA, and OANN











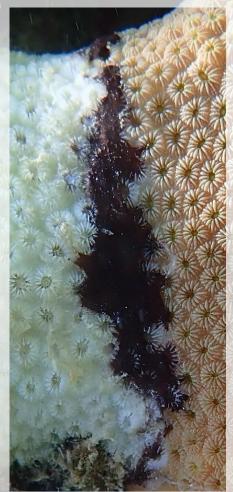


Black Band Disease

General Traits:

- Distinct "black band" on disease margin of bacteria
- Slow moving
- Consistently present in low levels on the reef, but can have outbreaks









Photos from Dr. Marilyn Brandt at UVI

Coral Bleaching



Caused by thermal stress, coral tissue is still present, but appears stark white





Coral Predation

















Stony Coral Tissue Loss Disease

Strike Team Training

Part III: Roying Diver Survey I

Part III: Roving Diver Survey Methodology



Goals of the Roving Diver:

- Explore and characterize the reef
- Document the status of the reef.
- Identify if coral disease is present/absent

- ~20-40min Explorative dive (with photos)
- Recording types of coral
- Recording any impairments

DATE:			Site Name:					Surveyor:			
Start Time	2		Survey #			th		Notes (site	:		
End Time			Visibility		Ten	ıp (F)					
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			le Specie						aired Corals	•	
Species	0	1-9	10-25	>25	#	Sp	ecies	Obsv.	Notes	Picture?	
MMEA					1						
DCYL					2					1 🗆	
DSTO					3					1 🗆 1	
EFAS					4						
CNAT					5						
DLAB					6						
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BL		blea	aching		10					□	
PAL		pa	aling		11						
DIS		misc.	disease		12					↓ ∐ ∣	
PRED		pre	dation		13					↓ ∐ ∣	
REC		recent	mortalit	у	14					↓ ∐ ∣	
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DLA		Diplor	ia labyrinth	iformis	16					↓ ∐ ↓	
DST		Dick	nocoenia st	okesi	17					▎႘▏	
DCY		Deno	drogyra cyli	ndrus	18					∐	
EFA		Eus	milia fastig	iata	19					∐	
PCL		Pseud	dodiploria d	divosa	20					∐	
PST		Pseud	lodiploria si	trigosa	21					∐	
CNA		Colp	oophyllia no	atans	22					↓ ¦ ∣	
MME		Mean	drina meai	ndrites	23					▎႘▏	
MCA		Monto	astraea cav	ernosa	24					↓ - -	
OFA		Orb	icella favec	olata	25						
OFR		Oi	rbicella frar	rski	26					↓¦↓	
OAN		Orb	icella annu	laris	27					∐	
SSII		Side	erastrea sid	lerea	28					↓ -	
SBO		Solei	nastrea bou	ırnoni	29					∐	
SIN	Γ	Stenhai	nocoenia in	tersenta	30			I			

Start of dive information:

- Date
- Site "name"
- Surveyor- diver and diver buddy
- Start time
- Max depth (note range of depth if needed)
- Temperature (if possible)
- Reef type (patch, shelf, slope, etc.)
- Misc notes
 - Note here if DPVs are used

Take a photo of the datasheet with this information to separate dives in photos

DATE:			Site Nar	ne:			Surveyor:						
Start Tim	ne		Survey#		Dep	Depth Notes (site health, spots on SSID?):							
End Time	•		Visibility		Ten	np (F)							
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DCYL					2								
DSTO					3								
EFAS					4								
CNAT					5								
DLAB					6								
PSTR					7								
PCLI					8								
	Observ	ance Co	des		9								
BL		ble	aching		10								
PAL		р	aling		11								
DIS		misc.	disease		12								
PRED		pre	dation		13								
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	Speci	es Code	es es		15								
DL	AΒ	Diploi	ria labyrinth	iformis	16								
DS	го	Dic	hocoenia st	okesi	17								
DC	YL	Den	drogyra cyl	indrus	18								
EFA	AS	Eu.	smilia fastig	giata	19								
PC.	LI	Pseu	dodiploria (clivosa	20								
PST	ΓR	Pseud	dodiploria s	trigosa	21								
CN.	AT	Col	pophyllia na	atans	22								
MM	EA	Meai	ndrina mea	ndrites	23								
MC.	AV	Mont	astraea cav	vernosa	24				I ∐				
OF	AV	V Orbicella faveol			25				⊢ ∐				
OFI	RA	0	rbicella frai	nski	26								
OAl	NN	Ori	bicella annu	laris	27								
SS	D	O Siderastrea siderea											

29

Solenastrea bournoni
Stephanocoenia intersepta

SBOU

Highly susceptible species:

- Tally presence/absence of highly susceptible species
 - None
 - Single
 - Few (2-9)
 - o Many (10-25)
 - Abundant (25+)
- Take photos of healthy individuals- within reason
 - Focus on individuals that would be easily relocated on future surveys
- Count ALL individuals- healthy or diseased, in this count

DAT	TE:			Site Name:					Surveyor:			
Stai	rt Time	:		Survey#		Dep	th		Notes (site health, spots on SSID?):			
End	l Time			Visibility		Ten	np (F)		1			
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			1-9	le Specie 10-25		#				aired Corals	Picture?	
_	cies	0	1-9	10-25	>25		Sp	ecies	Obsv.	Notes	Picture:	
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DC						2	<u> </u>				⊣	
DST	_					3					⊣	
EFA	_					4					⊣	
CNA	AT					5					」	
DLA						6	<u> </u>				J ∐	
PST	R					7					J ∐	
PCL	.1					8					」	
	C	bserv	ance Co	des		9						
	BL		blea	aching		10					╛	
F	PAL		pa	aling		11						
[DIS		misc.	disease		12						
P	RED		pre	dation		13						
F	REC		recent	mortalit	у	14						
		Speci	es Code	es		15						
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	DST	Э	Dicl	hocoenia st	okesi	17					$\neg \Box$	
	DCY	L	Deno	drogyra cyli	ndrus	18					$\neg \Box$	
	EFA	S		milia fastig		19						
Г	PCL	I		dodiploria d		20						
Г	PSTI	R		dodiploria s		21					7 🗇	
	CNA	Т		pophyllia na		22					7 🗇	
Г	MME	A		ndrina mea		23					┦ 🗒 .	
T	MCA	.V		astraea cav		24					┦ 🗇	
	OFA	V		oicella faved		25					1 □	
Г	OFR.	A		rbicella frai		26					┦ 🗇	
	OAN	N		oicella annu		27					┦ 🗇	
	SSII)		erastrea sia		28						
\vdash	SBO			nastrea bou		29					┦	
\vdash	SIN			nocoenia in		30					┦	

Health impaired corals

- Corals with any health impairments (even if unsure of impairment)
- Record species, observed impairment, and any notes (multiple lesions, previously photographed colony, etc.)
- Photograph the colony
- Tally presence/absence of diseased colonies like highly susceptible species (None, One, Few, Many, Abundant)
- Focus on documenting health impairments across as many species as possible. At a severe location, it won't be possible to document every colony

DATE:			Site Name:					Surveyor:				
Start Tim	e		Survey #			th		Notes (site health, spots on SSID?):				
End Time			Visibility		Temp (F)			1				
Distance dive	100		Reef		уре							
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Hi	ghly Su	sceptib	le Specie	s				Impa	aired Corals			
Species	0	1-9	10-25	>25	#	Sp	ecies	Obsv.	Notes	Picture?		
MMEA					1							
DCYL					2							
DSTO					3					I □ I		
EFAS					4							
CNAT					5] □ [
DLAB					6					」 □ I		
PSTR					7							
PCLI					8					l □ l		
Č	Observ	ance Co	des		9					Ì □ I		
BL		blea	aching		10					l □ l		
PAL		pa	aling		11					l ∐ l		
DIS		misc.	disease		12					l ⊔ l		
PRED		pre	dation		13					∣ ∐ I		
REC		recent	mortalit	у	14					∣ ∐ I		
	Speci	es Code	!S		15					∣ ∐ I		
DLA	В	Diplor	ia labyrinth	iformis	16					∣ <u>⊔</u> ∣		
DST	O	Dick	nocoenia st	okesi	17					∣ <u>⊔</u> ∣		
DCA	L	Deno	drogyra cyli	ndrus	18					l ∐ l		
EFA	.S	Eus	milia fastig	jiata	19					l ∐ l		
PCI	I	Pseud	dodiploria d	divosa	20					∣ ∐ I		
PST	R	Pseud	lodiploria s	trigosa	21					∣ ∐ I		
CNA	T	Colp	oophyllia no	atans	22					∣ ∐ I		
MMI		Mean	drina mea	ndrites	23					∣ ∐ I		
MCA	V	Monte	astraea cav	ernosa	24					∣ ∐ I		
OFA	V	Orb	icella faved	olata	25					∣ ∐ I		
OFR		Oi	rbicella frai	nski	26					∣ ∐ I		
OAN		Orb	icella annu	laris	27					∐		
SSI		Side	erastrea sia	lerea	28					∣ ¦ ∣ I		
SBC		Solei	nastrea bou	ırnoni	29					∣ ∐ I		
SIN	Т	Stenhau	nocoenia in	tarcanta	30				I	i I I I		

Reference codes to assist the diver- NOT COMPREHENSIVE

 Possible observations of health impairment (bleaching, disease, paling, recent mortality)

Coral species codes

DATE:			Site Nar	ne:				Surveyor:			
Start Tim	e		Survey#		Dep	Depth Notes (site health, spots on SSIE				:	
End Time	:		Visibility		Ten	np (F)					
Distance				Reef T	ype						
dive Take		of data s	heet at st			surve	v. Take o	verview pho	oto of entire reef at end of	survev.	
			le Specie						aired Corals		
Species	0	1-9	10-25	>25	#	Sn	ecies	Obsv.	Notes	Picture?	
MMEA					1						
DCYL					2					1 □ 1	
DSTO					3					1 □ 1	
EFAS					4					1 □ 1	
CNAT					5					1 □ I	
DLAB					6					1 🗆 I	
PSTR					7					1 □ I	
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	Observa	nce Co	des		9					1 🗆 I	
BL		blea	aching		10					1 □ I	
PAL		pa	aling		1:					1 🗆 I	
DIS			disease		1:					1 □ I	
PRED		pre	dation		13					1 □ I	
REC			mortalit	у	14					1 □ I	
		es Code			15] □	
DLA	AВ	Diplor	ia labyrinth	iformis	16] 🔲	
DST	O	Dich	nocoenia st	okesi	17] 🔲	
DCY	ΥL	Deno	drogyra cyli	ndrus	18] □	
EFA	AS	Eus	milia fastig	iata	19] 🔲	
PCI	LI	Pseud	dodiploria d	divosa	20					」□I	
PST	R	Pseud	lodiploria s	trigosa	2:					」	
CNA	AΤ	Colp	oophyllia no	itans	22					」 <u>□</u> Ⅰ	
MM	EA	Mean	ndrina mea	ndrites	23					∣ ∐ ∣	
MCA	AV	Monte	astraea cav	ernosa	24					∣ ∐ I	
OFA	V	Orb	icella faved	olata	25					∣ ∐ ∣	
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OAN	٧N	Orb	icella annu	laris	27					」	
SSI	D	Side	erastrea sia	lerea	28					∣ ∐ ∣	
SBC)U	Solei	nastrea bou	ırnoni	29					∣ ∐ ∣	
SIN	T Stephanocoenia intersepta				30						

Roving Diver Methodology

- Max survey time: ~40 minutes
- Note end time
- Approximate visibility
- Depth range (if different than planned)

Take a photo of the complete datasheet

DATE: Site Name:				ne:			Surveyor:				
Start Time	tart Time Survey#			Depth		Notes (site health, spots on SSID?):					
End Time			Visibility		Temp (F)		1				
Distance diver				Reef T	уре		1				
Take	photo	of data	sheet at st	art and e	nd o	f survey. Take o	verview pho	to of entire reef at end of	urvey.		
Highly Succeptible Species					Impaired Corals						
Species	0	1-9	10-25	>25	#	Species	Obsv.	Notes	Picture?		
MMEA					1						
DCYL					2						
DSTO					3						
EFAS					4						
CNAT					5						
DLAB					6						
PSTR					7						
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Observance Codes

Species Codes

PAL

PRED

REC

DLAB

DSTO

DCYL

EFAS

PCLI

PSTR

CNAT

MMEA

MCAV

OFAV

OFRA

OANN

SSID

SBOU

SINT

bleaching

paling

misc. disease

predation

recent mortality

Diploria labyrinthiformis

Dichocoenia stokesi

Dendrogyra cylindrus

Eusmilia fastigiata

Pseudodiploria clivosa

Pseudodiploria strigosa

Colpophyllia natans

Meandrina meandrites

Montastraea cavernosa

Orbicella faveolata

Orbicella franski

Orbicella annularis

Siderastrea siderea

Solenastrea bournon

Stephanocoenia intersepta

Stony Coral Tissue Loss Disease

Strike Team Training

Part IV: Disease Treatment Part 1- Amoxicillin



Pre-dive Preparation

- Weigh out amoxicillin to be used as a 1:8 weight ratio with Base2b
 - a. For 1 jar of Base2b (400g), this is 50g of amoxicillin
- Within 18 hours of intended use, mix Base2b with amoxicillin
 - a. Can be done in the jar with small spatula or spoon, or in a medium sized mixing bowl
 - b. Best done with Base2b at room temperature
- 3. Load syringes/caulking gun tubes with mixture
 - a. Best done with Base2b cold (not frozen)
- Keep mixture out of direct sunlight/high heat during transportation

Diving Protocol

- 1. Identify SCTLD-infected colony
 - a. Do not treat colonies with greater than ~80% mortality
- 2. Photograph the colony
 - a. If colony is to be fate-tracked, nail a numbered tag immediately adjacent to the colony before photographing
- 3. Apply the treatment along the disease margin, ~1cm width
 - a. Take care that any smaller lesions are treated as well
 - Use modeling clay sparingly to keep the treatment attached to the colony
- 4. Photograph the colony with treatment







Stony Coral Tissue Loss Disease



Strike Team Training

Part V: Disease Treatment Part 2- Culling/Amputation



Culling Methodology

Culling is the removal of infected coral colonies from the reef, this should be avoided if possible.

- Only remove colonies <30cm max diameter
- Only remove colonies if they cannot be amputated
- Photograph colonies prior to culling



Culling Methodology

- 1. Photograph the colony
- 2. Use a chisel or flathead screwdriver to hammer underneath/around the base of the colony to dislodge it
- 3. Immediately place the entire colony into a sealable plastic bag
 - a. It is important to do this quickly to minimize mucus spread in the water column
- Use a mesh bag to transport removed colonies, and use lift bags for safe transport and ascent.



Amputation Methodology

Amputation is the removal of the now dead coral skeleton and any tissue along the diseased margin

- Only on colonies >30cm in max diameter
- Can only be done when disease is on a growth margin



Amputation Methodology

- 1. Identify and photograph an infected colony
 - a. If fate tracking, install a tag adjacent to the colony before photographing
- 2. Use a hammer and chisel or long flathead screwdriver to remove recently dead skeleton
 - a. May be more time effective to use an angle grinder
- Place amputated fragment(s) immediately into a large resealable bag
- 4. Treat the amputation edge and any lesions that could not be amputated with antibiotic paste
- 5. Photograph the colony, now treated
- 6. Use a mesh bag to transport removed fragments, and use lift bags for safe transport and ascent.



Stony Coral Tissue Loss Disease



End of Dive Day Data Management

- Disinfect all equipment and dive gear
- Rinse, dry, and photograph/scan any datasheets
- 3. Upload photos to a common location
- Dive leader contacts strike team leader and disease coordinator with full report:
 - Include access to photos
 - Provide summary of corals treated by species
 - Provide scans/photos of datasheets
 - Highlight any concerns

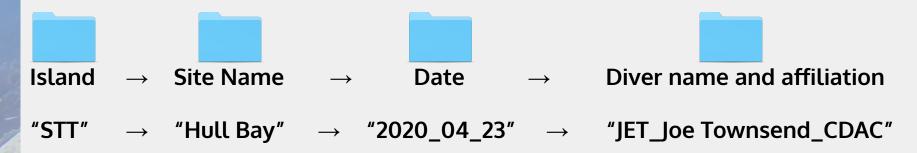


Full disinfection protocol at:

https://www.vicoraldisease.org/s/Diver-Decon-Guidelines-USVI-8-8-19.pdf

Photo Organization

Photos will be organized on the Coral Disease Advisory Committee photo repository following a specific folder pathway:

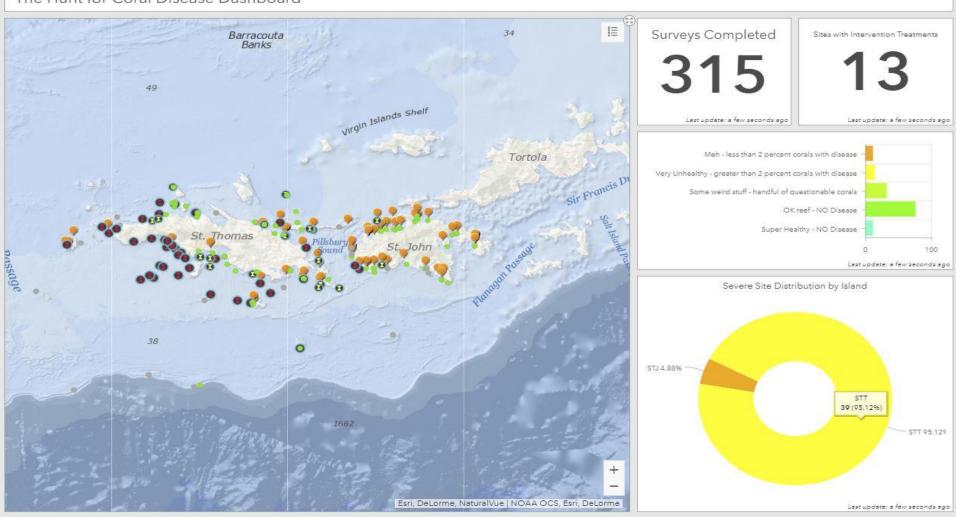


Photos may be used for research and community outreach purposes with credit to the diver when necessary

Photos should be kept elsewhere by the strike team lead in a similar format

	SCTLD Roving Survey 🖈 🖭 File Edit View Insert Format Data Tools Add-ons Help Last edit was 5 days ago													
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2	Survey ID	Island	Site Name or Landmark	Latitude	Longitude	Grid (optional)	Zone) (optional)) Date	Survey Type (HFCD, Roving Survey, Researcher Report)		Data Entry (Initials)	SCTLD Present/Absent/S uspect? (P/A/S)	Level of severity of SCTLD	Other sig. impairments observed
343	0384	STX	Buck Island STX	17.80518	-64.60329	i		12/8/2019	9 Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	A	None *	
344	0385	STX	Buck Island STX	17.80389	-64.60086				Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	Α -	None *	
345	0386	STX	Buck Island STX	17.80289	-64.59821	4		The second section is a second second	Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	A	None *	
346	0387	STX	Buck Island STX	17.80219	-64.5955	i .			Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET		None *	
347	0388	STX	Buck Island STX	17.80188	-64.59254	i l		12/12/2019	9 Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	Α -	None *	
348	0389	STX	Buck Island STX	17.8019	-64.621			12/13/2019	Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	Α -	None *	
349	0390	STX	Buck Island STX	17.794	-64.6048			12/14/2019	9 Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	A	None *	
350	0391	STX	Buck Island STX	17.78337	-64.64498	i		12/15/2019	9 Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	A	None *	
351	0392	STX	Buck Island STX	17.793	-64.62905	4		12/16/2019	9 Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	Α *	None *	
352	0393	STX	Buck Island STX	17.77951	-64.61807			12/17/2019	9 Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	Α *	None *	
353	0394	STX	Buck Island STX	17.792	-64.6159	A		12/18/2019	9 Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	Α -	None *	
354	0395	STX	Buck Island STX	17.78754589 -	-64.61103162			12/19/2019	Researcher Report	Kristen Ewen, Nate Hanna Holloway	JET	Α	None *	
355	0396	STJ	Hart Bay	18.31450535 -	-64.78481384	i		12/20/2019	9 Researcher Report	Lee Richter	JET	Α *	None *	
356	0397	STJ	Great Cruz Bay to Chocolate Hole	18.3137992	-64.79152286	į.		12/21/2019	9 Researcher Report	Lee Richter	JET	P	Severe *	
357	0398	STJ	Reef Bay	18.32278586 -	-64.74793509	4		12/22/2019	HFCD	Sara McCutcheon	JET	A	None *	
358	0399	STT	Tunnels of Thatch	18.36361	-64.87067	A		4/11/2020	Researcher Report	Lee Richter	JET	Р 🕶	Severe *	
359	0400	STT	Sapphire (point closest to Shark Island	18.33534	-64.8488	4		4/25/2020	HFCD	Self. Pamela New	JET	р •	Severe *	
360	0401	STX	Northstar	17.76958	-64.8208	i		4/26/2020	Researcher Report	Leslie Henderson	JET	Α -	None *	
361	0402	STX	Butler Bay wrecks	17.75088	-64.8952	á l		4/19/2020	Researcher Report	Leslie Henderson	JET	Α -	None *	
362	0403	STJ	Cinnamon Cay	17.73796	-64.7191	4		4/27/2020	Researcher Report	Jeff Miller	JET	Α -	None *	
363	0404	STJ	America Point	18.35801	-64.7504	A		4/25/2020	Researcher Report	Jeff Miller	JET	Α *	None *	
364	0405	STJ	Windswept Reef - Peter Bay	18.35638	-64.7646			4/25/2020	Researcher Report	Jeff Miller	JET	Α -	None *	
365	0406	STJ	Trunk Cay, East side	18.35431	-64.77	4		4/25/2020	Researcher Report	Jeff Miller	JET	Α *	None *	
366	0407	STJ		18.3507	-64.6987			4/18/2020	Researcher Report	Jeff Miller	JET	Α -	None *	
367	0408	STJ	Magens Bay TCRMP/Monitoring Site	18.37424909	-64.9343868	A		4/29/2020	Roving Survey	J. Townsend, J. Quetel	JET	Α *	None *	WP, PAL
368	0409	STT	Cocculus Rock Monitoring Site	18.30881	-64.897946			4/10/2020	Roving Survey	J. Townsend, J. Quetel	JET	Р +	Moderate *	BL, PAL
369	0410	STT	Cocculus Rock Monitoring Site	18.30881	-64.897946			5/1/2020	Roving Survey	J. Townsend, J. Quetel	JET	р 🕶	Moderate ▼	BL, PAL, DS
370	0411	STX	Smugglers Cove	17.75707	-64.59196	4		2/23/2020	HFCD	Allison Babcock	JET	Α -	None *	
371	0412	STJ	Johnson's Reef (Northern Edge)	18.36575	-64.77362	4		5/3/2020	Researcher Report	Lee Richter, Sara McCutcheon	JET	р 🔻	Moderate ▼	
372													•	

The Hunt for Coral Disease Dashboard



Submitting "Researcher Reports"

- If a formal roving diver survey couldn't be conducted, a dive should still be noted
- Trained divers who can identify coral species and coral disease can submit "Researcher Reports" to the Hunt for Coral Disease survey sheet
- Enter the survey sheet as best as possible and put in the notes section "RESEARCHER REPORT" with any observations
- Include photos and descriptions as much as possible

https://survey123.arcgis.com/share/9838819b5e1748448297255f6fd1a183

The Hunt for Coral Disease

Para instruccione	s en español, haz	z clic <u>aquí.</u>		
O STT	O STX	O stu	O PR	
O Other				
Dive Date				
Name(s)*				

Your Email*

We may use this in the furture to let you know about Reef Resilience events!

|--|--|--|--|--|

Point of Contact for Questions/Concerns



loe Townsend

Coral Disease Response Coordinator for the USVI

joetown94@gmail.com (704) 340-2168



Jason Quetel

Chief of Field Operations, CORE

fieldops@corevi.org (340) 643-5654



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Strike Team Lead for St. John

TBA