<u>Real-time access for drifting buoy data –</u> <u>Advanced instructions</u>

To access real-time data from drifting buoys, please visit the NOAA GDP ERDDAP webpage at https://erddap.aoml.noaa.gov/gdp/erddap/tabledap/OSMC RealTime.html. Here, you will see the list of possible variables. Examples include: date ranges, specific regions, sst data, slp data, etc.

** Please note, the real-time dataset linked above is hosted on the NOAA GDP ERDDAP as a remote dataset. To access the source dataset, please visit the NOAA OSMC ERDDAP at http://osmc.noaa.gov/erddap/tabledap/OSMC_30day.html. **

1. To begin, select "Uncheck All."

ERDDAP Easier access to scientific data				
ERDDAP > <u>tabledap</u> > Data Acces	ss Form ø			
Dataset Title: OSMC 30 day RT data 🖂 🔤 Institution: OSMC (Dataset ID: OSMC 30day)				
Information: Summary @ License @ FGDC ISO 19115 Metada	ta Background & Subset Ma	ake a graph		
Variable @ Check All Uncheck All	Optional Constraint #1 @	Optional Constraint #2 @	Minimum @ or a List of Values @	Maximum @
platform_code (WMO id or ship call sign) @	>= 0	<= 0		
✓ platform_type Ø	>= 0	<= 0		0 - +
Country @	>= 0	<= 0		0-+0
✓ time (observation date, UTC) Ø	>= 0 2017-08-17T00:00:00Z	<= 0		
✓ latitude (degrees_north) Ø	>= 0	<= 0	-89.0	89.0
<u></u>				
Iongitude (degrees_east) Ø	>= 0	<= 0	-180.0	180.0
observation_depth @	>= 0	<= 0		
I sst (sea surface temperature, Deg C) Ø I atmp (air temperature, Deg C) Ø	>= 0	<= 0 <= 0		
I precip (precipitation, mm) Ø I ztmp (profile water temperature, Deg C) Ø	>= 0	<= 0		
z sal (profile salinity) @	>= 0	<= 0		
sip (sea level pressure, hPa) @	>= 0	<= 0		
in sip (sea level pressure, rina) @	>= 0	<= 0		
windspa (wind speed, ms) @	>= 0	<= 0		
windun (wind norr direction, bag tab) @	>= 0	<= 0		
waterlevel (m) @	>= 0	<= 0		
clouds (cloud cover, oktas) @	>= 0	<= 0		
dewpoint (dew point temperature, Deg C) @	>= 0	<= 0		
uo (eastward sea water velocity, m s-1) @	>= 0	<= 0		
vo (northward sea water velocity, m s-1) @	>= 0	<= 0		
wo (upward sea water velocity, m s-1)	>= 0	<- 0		
rainfall rate (m s-1) @	>= 0	<= 0		
hur (relative humidity) @	>= 0	<= 0		
sea_water_elec_conductivity (S m-1) @	>= 0	<= 0		
sea_water_pressure (dbar) @	>= 0	<= 0		
Ids (surface downwelling longwave flux in air, W m-2) @	>= 0	<= 0		
rsds (surface downwelling shortwave flux in air, W m-2) @	>= 0	<= 0		
⊘ waterlevel_met_res (meteorological residual tidal elevation, m)	>= 0	<= 0		
waterlevel_wrt_lcd (tidal elevation WRT local chart datum, m) @	>= 0	<= 0		
water_col_ht (water column height, m) @	>= 0	<= 0		
wind_to_direction (degree) @	>= 0	<= 0		
Ion360 (longitude, degree_east) @	>= 0	<= 0		

2. Once all boxes are unchecked, within "platform type", select "DRIFTING BUOYS {GENERIC}" from the pull-down tab on the far right.

ERDDAP tabledap Data Acces ataset Title: OSMC 30 day RT data 🖂 🖾 Statistical OSMC (Dataset ID: OSMC 30day)			
titution: OSMC (Dataset ID: OSMC 30day)			
formation: Summary @ License @ FGDC ISO 19115 Metadat	Deckeround @ I Subset I Ma	ka a graph	
iornation. Summary of Eldense of 1000 100 10110 (Metadat	I Dackground as I Dubser I ma	No a graph	
riable @ Check All Uncheck All	Optional	Optional	
platform code (WMO id or Ship call sign) @	Constraint #1 @	Constraint #2 @	"C-MAN WEATHER STATIONS"
	>= 0	<- 0	"CLIMATE REFERENCE MOORED BUOYS"
platform_type @	= O "DRIFTING BUOYS (GENER	<= 0	✓ "DRIFTING BUOYS (GENERIC)"
country @	>= 0	<= 0	"GLOSS"
time (observation date, UTC) @	>= 2017-08-17T00:00:00Z	<= C	"ICE BUOYS"
atitude (degrees_north) @	>= 🖸	<= 🗘	"MOORED BUOYS (GENERIC)"
lanaituda (daaraan aan) @	>= 0	<= 0	"PROFILING FLOATS AND GLIDERS (GENERIC)"
longitude (degrees_east) @		N= 🔽	"RESEARCH" "SHIPS"
observation_depth @	>= 🖸	<= 0	"SHIPS" "SHIPS (GENERIC)"
sst (sea surface temperature, Deg C) @	>= 0	<= 0	"SHORE AND BOTTOM STATIONS (GENERIC)"
atmp (air temperature, Deg C) @	>= 0	<= 0	"TIDE GAUGE STATIONS (GENERIC)"
precip (precipitation, mm) @	>= 0	<= 0	"TROPICAL MOORED BUOYS"
ztmp (profile water temperature, Deg C) @	3= 0	c= 0	"TSUNAMI WARNING STATIONS"
zsal (profile salinity) @	28.0	<= 0	"UNKNOWN"
slp (sea level pressure, hPa) @	>= 0	<= 0	"VOLUNTEER OBSERVING SHIPS" "VOLUNTEER OBSERVING SHIPS (GENERIC)"
windspd (wind speed, m/s) @	>= 0	<= 0	"VOLUNTEER OBSERVING SHIPS (GENERIC)" "VOSCLIM"
winddir (wind from direction, Deg true) @	>= 0	c= 0	"WEATHER AND OCEAN OBS"
wyht (sea surface wave significant height, m) @	>= 0	<= 0	"WEATHER BUOYS"
waterlevel (m) @	>= 0	<= 0	"WEATHER OBS"
clouds (cloud cover, oktas) @	>= 0	<= 0	
dewpoint (dew point temperature, Deg C) @	>= 0	<= 0	
uo (eastward sea water velocity, m s-1) @	>= 0	<= 0	
vo (northward sea water velocity, m s-1) @	>= 0	<= 0	
wo (upward sea water velocity, m s-1) @	>= 0	<- C	
rainfall_rate (m s-1) @	>= 🗘	<= 0	
hur (relative humidity) @	>= 🖸	<= 0	
sea_water_elec_conductivity (S m-1) @	>= 0	<= <mark>0</mark>	
sea_water_pressure (dbar) @	>= 😳	<= 🖸	
rlds (surface downwelling longwave flux in air, W m-2) @	>= 0	<= <mark>0</mark>	
sds (surface downwelling shortwave flux in air, W m-2) @	>= 0	<= 0	
vaterlevel_met_res (meteorological residual tidal elevation, m) @	>= 0	<= <mark>0</mark>	
waterlevel_wrt_lcd (tidal elevation WRT local chart datum, m) @	>= 0	<= O	
water_col_ht (water column height, m) @	>= 0	<= 0	
wind_to_direction (degree) @	>= 0	<= 0	
Ion360 (longitude, degree_east) @	>= 😳	<= ᅌ	

3. After selecting "DRIFTING BUOYS" within "platform_type", next select the desired variable(s). For example, if you are interested in specific drifters, select "platform_code", then enter each WMO number within "platform_code" "Optional Contraint #1", ensuring that each ID is within double quotes ("...") and the operator for this constraint is set to "=~". The operator selection is found to the left of the Optional Constraint field. If you are interested in multiple WMO numbers, ensure they are separated by the pipe or bar symbol (|) and within double quotes ("...").

For example, a single drifter should appear as: =~ "5301670", while the suitable option for multiple drifters is: =~ "6801859|1801734|5301670".

Please Note: There are no spaces between the WMO # and pipe or bar symbol (|).

Easier access to scientific data	_			ght to you by <u>NOAA NMES SW</u>
<u>ERDDAP</u> > <u>tabledap</u> > Data Acces	s Form 🧧			
Dataset Title: OSMC 30 day RT data 🖂 🔤				
nstitution: OSMC (Dataset ID: OSMC 30day)				
nformation: Summary @ License @ FGDC ISO 19115 Metadat	a Background 🕫 Subset Ma	ake a graph		
	Optional	Optional	Minimum @	Maximum @
Variable @ Check All Uncheck All	Constraint #1 @	Constraint #2 @	or a List of Values @	
platform_code (WMO id or Ship call sign) @	=~ 0 "32699 4601615"	<= 0		
platform_type @	- O "DRIFTING BUOYS (GENER	<= 0	"DRIFTING BUOYS (GENERIC)"	0 - + 0
country @	>= 0	<= 0		0-+0
time (observation date, UTC) @	>= 0 2017-09-12T00:00:00Z	<= 0		
latitude (degrees north) @	>= 0	<= 0	-89.0	89.0
longitude (degrees_east) @	>= 0	<= 0	-180.0	180.0
observation_depth @	>= 0	<= 0		
sst (sea surface temperature, Deg C) @	>= 0	<= 0		
atmp (air temperature, Deg C) 🖗	>= 0	<= 0		
precip (precipitation, mm) @	>= 0	<= 0		
ztmp (profile water temperature, Deg C) @	>= 0	<= 0		
zsal (profile salinity) @	>= 0	<= 0		
slp (sea level pressure, hPa) @	>= 0	<= 0		
windspd (wind speed, m/s) @	>= 0	<= 0		
winddir (wind from direction, Deg true) @	>= 0	<= 0		
wvht (sea surface wave significant height, m) @	>= 0	<= 0		
waterlevel (m) @	>= 0	<= 0		
clouds (cloud cover, oktas) @	>= 0	<= 0		
dewpoint (dew point temperature, Deg C) @	>= 0	<= 0		
uo (eastward sea water velocity, m s-1)	>= 0	<= 0		
vo (northward sea water velocity, m s-1) @	>= 0	<= 0		
wo (upward sea water velocity, m s-1) @	>= 0	<= 0 <= 0		
rainfall_rate (m s-1) @ hur (relative humidity) @	>= 0	<= 0		
sea water elec conductivity (S m-1) @	>= 0	<= 0		
sea_water_elec_conductivity (S m-1) @	>= 0	<= 0		
rlds (surface downwelling longwave flux in air, W m-2) @	>= 0	<= 0		
rsds (surface downweiling longwave flux in air, W m-2) @	>= 0	<= 0 <= 0		
waterlevel_met_res (meteorological residual tidal elevation, m) @	>= 0	<= 0		
waterlevel_met_res (meteorological residual idal elevation, m) @	>= 0	<= 0		
water col ht (water column height, m) @	>= 0	<= 0		
wind_to_direction (degree) @	>= 0	<= 0		

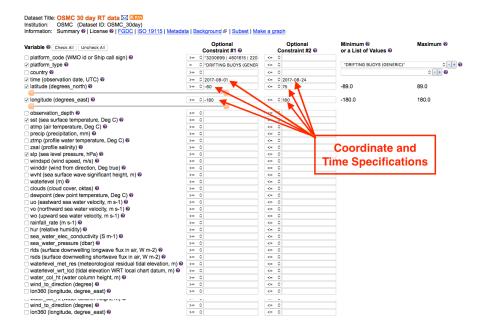
If you have multiple drifters and the WMO #'s are in sequential order, enter the first WMO # in "Optional Constraint #1" and the final WMO # in "Optional Constraint #2". For example, if the desired sequence of WMO #'s includes 1301742, 1301743, 1301744, and 1301745, simply enter >= "1301742" in "Optional Constraint #1" and <= "1301745" in "Optional Constraint #2".

ERDDAP Easler access to scientific data			Broug	ht to you by <u>NOAA NMES</u> SWESC
ERDDAP > tabledap > Data Acces	ss Form _e			
Dataset Title: OSMC 30 day RT data ⊠ 1000 Institution: OSMC (Dataset ID: OSMC 30day) Information: Summary @ License @ FGDC ISO 19115 Metada	a Background @ Subset Mal	ke a graph		
Variable @ Check All Uncheck All	Optional Constraint #1 @	Optional Constraint #2 @	Minimum @ or a List of Values @	Maximum @
platform_code (WMO id or Ship call sign) @	>= 0 "4101552"	<= 0 "4101555"		
platform type @	- C "DRIFTING BUOYS (GENER	<= 0	"DRIFTING BUOYS (GENERIC)"	0 - + 0
country @	>= 0	<= 0		0 - + 0
time (observation date, UTC) @	>= 0 2017-09-12T00:00:00Z	<= 0		
□ latitude (degrees_north) @	>= 0	<= 0	-89.0	89.0
Iongitude (degrees_east) Ø	>= 0	<= 0	-180.0	180.0
observation_depth @ sst (sea surface temperature, Deg C) @	>= 0	<= 0 <= 0		
atmp (air temperature, Deg C) @	>= 0	<= 0		
precip (precipitation, mm) @	>= 0	<= 0		
ztmp (profile water temperature, Deg C) @	>= 0	<= 0		
zsal (profile salinity) @	>= 0	<= 0		
slp (sea level pressure, hPa) @	>= 0	<= 0		
windspd (wind speed, m/s) @	>= 0	<= 0		
winddir (wind from direction, Deg true) @	>= 0	<= 0		
wvht (sea surface wave significant height, m) @	>= 0	<= 0		
waterlevel (m)	>= 0	<= 0		
clouds (cloud cover, oktas) Ø	>= 0	<= 0		
dewpoint (dew point temperature, Deg C) @	>= 0	<= 0		
uo (eastward sea water velocity, m s-1) @	>= 0	<= 0		
vo (northward sea water velocity, m s-1)	>= 0	<= 0		
wo (upward sea water velocity, m s-1) @	>= 0	<= 0 <= 0		
□ rainfall_rate (m s-1) Ø □ hur (relative humidity) Ø	>= 0	<= 0		
sea water elec conductivity (S m-1) @	>= 0	<= 0		
sea_water_pressure (dbar) @	>= 0	<= 0		
rids (surface downwelling longwave flux in air, W m-2) @	>= 0	<= 0		
rsds (surface downwelling shortwave flux in air, W m-2)	>= 0	<= 0		
waterlevel_met_res (meteorological residual tidal elevation, m) @	>= 0	<= 0		
waterlevel_wrt_lcd (tidal elevation WRT local chart datum, m)	>= 0	<= 0		
water_col_ht (water column height, m) @	>= 0	<= 0		
wind_to_direction (degree) @	>= 0	<= 0		
Ion360 (longitude, degree_east) @	>= 0	<= 0		

4. Next, select additional variables from the list, including time, latitude, longitude, SST, and SLP.

ataset Title: OSMC 30 day RT data ⊠ আ stitution: OSMC (Dataset ID: OSMC_30day) formation: Summary @ License @ FGDC SO 19115					
	Metadata Background @ Subset Mal	ke a graph			
ariable @ Check All Uncheck All	Optional Constraint #1 @	Optiona Constraint		ଡ of Values ଡ	Maximum @
platform_code (WMO id or Ship call sign) @				a values w	
platform_type @	= 0 "DRIFTING BUOYS (GENER	<= 0	PRIETING	BUOYS (GENERIC)"	0
country @	>= 0	<= 0		boorb (ochenio)	0-+0
time (observation date, UTC) @ 🕇 👞	>= 0 2017-08-17T00:00:007	<= 0			V
latitude (degrees_north) @	>= 0	<= 0	-89.0		89.0
laulude (degrees_north) + X			-08.0		05.0
longitude (degrees_east) @ 🗙 🗲		<= 0	-180.0		180.0
observation_depth @		<= 0			
sst (sea surface temperature, Deg C) @ 🌟 ┥		<= 0	· ·		
atmp (air temperature, Deg C) @	>= 0		Select of	lesired	
precip (precipitation, mm) @ ztmp (profile water temperature, Deg C) @	>= 0	<= 0			
zimp (profile water temperature, beg c) @		<= 0 <= 0	- varia	ples.	
sip (sea level pressure, hPa) @	>= 0	<= 0			
windspd (wind speed, m/s) @	>= 0	<= 0			
windspa (wind speed, mis) @ winddir (wind from direction, Deg true) @	>= 0	<= 0			
wyht (sea surface wave significant height, m) @	>= 0	<= 0			
waterlevel (m) @	>= 0	<= 0			
clouds (cloud cover, oktas) @	>= 0	<= 0			
dewpoint (dew point temperature, Deg C) @	>= 0	<= 0			
uo (eastward sea water velocity, m s-1) @	>= 0	<= 0			
vo (northward sea water velocity, m s-1) @	>= 0	<= 0			
wo (upward sea water velocity, m s-1) @	>= 0	<= 0			
rainfall_rate (m s-1) @	>= 0	<= 0			
hur (relative humidity) @	>= 0	<= 0			
sea_water_elec_conductivity (S m-1) @	>= 0	<= 0			
sea_water_pressure (dbar) @	>= 0	<= 0			
rlds (surface downwelling longwave flux in air, W m-2) @		<= 0			
rsds (surface downwelling shortwave flux in air, W m-2)		<= 0			
waterlevel_met_res (meteorological residual tidal elevation		<= 0			
waterlevel_wrt_lcd (tidal elevation WRT local chart datur		<= 0			
water_col_ht (water column height, m) @	>= 0	<= 0			
wind to direction (degree) @	>= 0	<= 0			

**Please note: If you desire specific coordinates, and/or a time parameter, you must enter these values In the "Optional Constraint" boxes to right of each field. **



5. OPTIONAL: Once all desired variables have been chosen, for best output results, under "Server-side Functions", order variables by "platform_code" and "time". By doing so, the output will be displayed by WMO number and time (chronologically).

WARNING: Using the "orderBy" feature on large ERDDAP requests may trigger a HTTP 413 "outOfMemoryError" response when you complete step 7. If this error appears, we suggest that you divide your original data request into multiple smaller requests, or resubmit your original request without the "orderBy" feature.

Ariable @ Check All Uncheck All	Optional Constraint #1 @	Optional Constraint #2 @	Minimum @ or a List of Values @	Maximum @
platform_code (WMO id or Ship call sign) @	>= 0	<= 0		
platform_type @	 DRIFTING BUOYS (GENER) 	<= 0	"DRIFTING BUOYS (GENERIC)"	0
country @	>= 0	<= 0		0 - + 0
time (observation date, UTC) @	>= 0	<= 0		
latitude (degrees_north) @	>= 0 20	<= 0 30	-89.0	89.0
longitude (degrees_east) @	>= 0-70	<= 0-60	-180.0	180.0
observation_depth @	>= 0	<= 0		
sst (sea surface temperature, Deg C) @	>= 0	<= 0		
atmp (air temperature, Deg C) @	>= 0	<= 0		
precip (precipitation, mm) @	>= 0	<= 0		
ztmp (profile water temperature, Deg C) @	>= 0	<= 0		
zsal (profile salinity) 🖗	>= 0	<= 0		
slp (sea level pressure, hPa) @	>= 0	<= 0		
windspd (wind speed, m/s) @	>= 0	<= 0		
winddir (wind from direction, Deg true)	>= 0	<= 0		
wvht (sea surface wave significant height, m) @	>= 0	<= 0		
waterlevel (m) @	>= 0	<= 0		
clouds (cloud cover, oktas) @	>= 0	<= 0		
dewpoint (dew point temperature, Deg C) @	>= 0	<= 0		
uo (eastward sea water velocity, m s-1) @	>= 0	<= 0		
wo (upward sea water velocity, m s-1) @	>= 0	<= 0		
rainfall rate (m s-1)	>= 0	<= 0		
hur (relative humidity)	>= 0	<= 0		
sea water elec conductivity (S m-1) @	>= 0	<= 0		
sea water pressure (dbar) @	>= 0	<= 0		
rids (surface downwelling longwave flux in air, W m-2) @	>= 0	<= 0		
rsds (surface downwelling shortwave flux in air, W m-2)	>= 0	<= 0		
waterlevel_met_res (meteorological residual tidal elevation, m) @	>= 0	<= 0		
waterlevel wrt Icd (tidal elevation WRT local chart datum, m)	>= 0	<= 0		
water_col_ht (water column height, m) @	>= 0	<= 0		
wind to direction (degree) @	>= 0	<= 0		
lon360 (longitude, degree_east) @	>= 0	<= 0		
erver-side Functions @				
orderBy O @ (" platform_code O time	٥(0	٥) (o ")

ERDDAP > tabledap > Data Access Form .

Dataset Title: OSMC 30 day RT data 🖂 🔤

Submit (Please be patient. It may take a while to get the data.)

6. To select the desired output format, select from the options within "File type".

C C DRIFTING BUOYS (GENER C	<= 0 <= 0 <= 0	"DRIFTING BUOYS (GENERIC)"	0 -
-= 0		"DRIFTING BUOYS (GENERIC)"	0 - 0
	(r.)		
	N= V		0 - + 0
-= 0	<= 0		
= 0 20	<= 0 30	-89.0	89.0
-= 0 -70	<= 0-60	-180.0	180.0
-= 0	<= 0		
-= 0	<= 0		
-= 0	<= 0		
-= 0	<= 0		
-= 0	<= 0		
= 0	<= 0		
-= 0	<= 0		
= 0	<= 0		
-= 0	<= 0		
-= 0	<= 0		
= 0	<= 0		
-= 0	<= 0		
-= 0	<= 0		
= 0	<= 0		
-= 0	<= 0		
= 0	<= 0		
-= 0	<= 0		
-= 0	<= 0		
= 0	<= 0		
0	<= 0		
-= 0	<= 0		
= 0	<= 0		
-= 0	<= 0		
= 0	<= 0		
-= 0	<= 0		
-= 0	<= 0		
	• 0 • 0		

Options include: comma separated (.csv), MATLAB (.mat), PDF (.pdf), ASCII (.asc), HTML (.html), etc.

7. Once you have entered the desired information and chosen the output file type, click "Submit" to receive the data, or you can generate a URL that saves the specified variables. The URL can be used to reference the dataset parameters at a later date, and/or can be shared with colleagues.

Ariable @ Check All Uncheck All		Optional Constraint #1 @		Optional Constraint #2 @	Minimum @ or a List of Values @	Maximum @
platform code (WMO id or Ship call sign) @	>= <	3200699 4601615 220	<=	0		
platform type @	= 0	"DRIFTING BUOYS (GENER	<=	0	"DRIFTING BUOYS (GENERIC)"	0 -
country @	>= <		<=			0-+0
ime (observation date, UTC) @		2017-08-01		0 2017-08-24		
latitude (degrees_north) @	>= <			0 75	-89.0	89.0
Ingitude (degrees_east)	>= <	-180	<=	≎]180	-180.0	180.0
observation depth @	>= <		<=	0		
sst (sea surface temperature, Deg C) @	>= <		<=	0		
atmp (air temperature, Deg C) @	>= <		<=	0		
precip (precipitation, mm) @	>= (1	<=	0		
ztmp (profile water temperature, Deg C) @	>= (1	<=	0		
zsal (profile salinity) @	>= <		<=	0		
slp (sea level pressure, hPa) @	>= <		<=	0		
windspd (wind speed, m/s) @	>= <		<=	0		
winddir (wind from direction, Deg true) @	>= <		<=	0		
wvht (sea surface wave significant height, m) @	>= <		<=	0		
waterlevel (m) @	>= <			0)		
clouds (cloud cover, oktas) @	>= <		<=	0)		
dewpoint (dew point temperature, Deg C) @	>= <		<=	0		
uo (eastward sea water velocity, m s-1) @	>= <		<=	0		
vo (northward sea water velocity, m s-1) @	>= <			0		
wo (upward sea water velocity, m s-1) @	>= <		<=			
] rainfall_rate (m s-1) @	>= <		<=			
hur (relative humidity) 🖗	>= <		<=			
sea_water_elec_conductivity (S m-1) @	>= <			0		
sea_water_pressure (dbar) @	>= <		<=			
rlds (surface downwelling longwave flux in air, W m-2) 🖗	>= <			0		
rsds (surface downwelling shortwave flux in air, W m-2) 🖗	>= <		<=	0		
waterlevel_met_res (meteorological residual tidal elevation, m) @	>= <		<=	0		
waterlevel_wrt_lcd (tidal elevation WRT local chart datum, m) @	>= <		<=			
water_col_ht (water column height, m) @	>= <			0		
wind_to_direction (degree) @	>= <			0		
] lon360 (longitude, degree_east) @	>= <		<=	0		
Server-side Functions @						
orderBy 0 @ (" platform_code 0 time		0		0	0	≎ ")

ERDDAP > tabledap > Data Access Form @

Submit (Please be patient. It may take a while to get the data.)