Brown-0129 (29 January 2020)

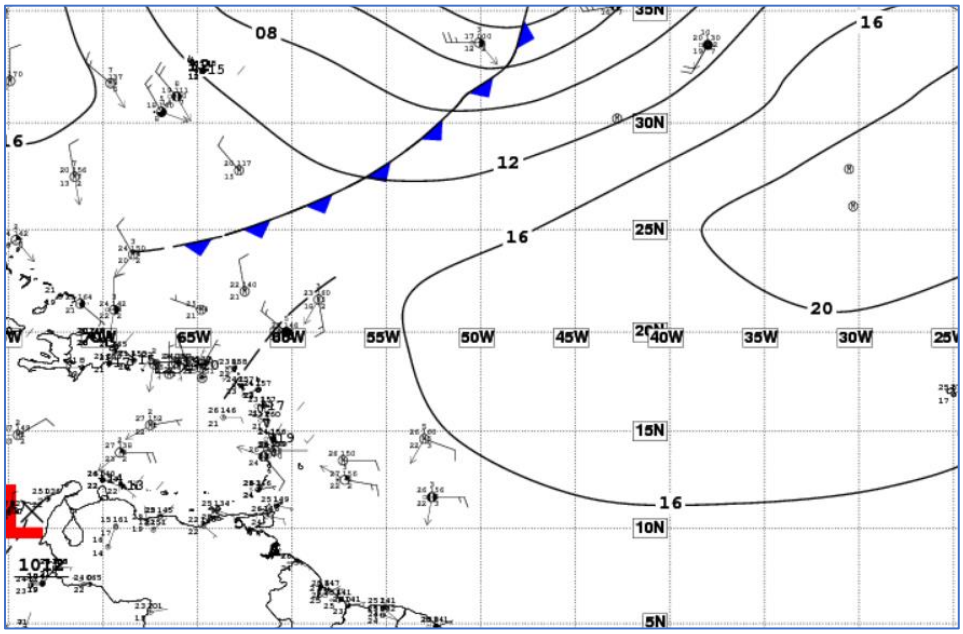
Janet Intrieri (Chief Scientist)
Compiled: 01.29 20:30 AST

1. Objective

The Brown left the Bridgetown Port, Barbados on 28 January 2020 at ~1815 AST and headed to 13.9 N, 54.5 W which we are calling the "P3 Point" (P3P). Balloon operations began with the 08Z launch on 29 January and then continued every 4 hours. No overflights today but communicated our 12 Z launch information and position to HALO team for tomorrow's flight.

2. Synoptic Situation

Atlantic High pressure system was the dominant synoptic feature. Mainly, shallow low-level cloudiness during the morning becoming mostly sunny thereafter.



Local Time (UTC -4)	Ship's Position	Coverage	Types	Remarks
1100	13°36'N 056°40'W	0/8 High	N/A	VCSH (Vicinity Showers)
		0/8 Mid	N/A	
		7/8 Low	Cu, Sc	
1800	13°41'N 056°11'W	0/8 High	N/A	
		0/8 Mid	N/A	
		1/8 Low	Cu	

3. Cruise-day Elements

Sondes launched every 4 hours starting at 08 Z.

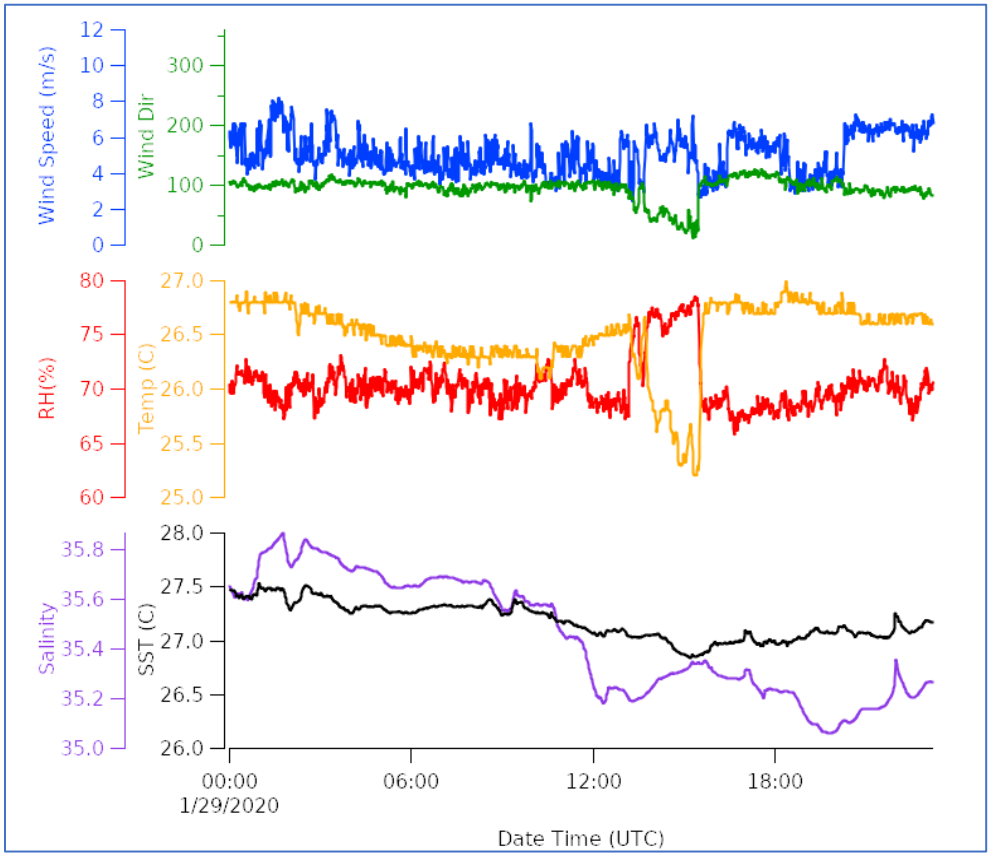
4. Instrument Status

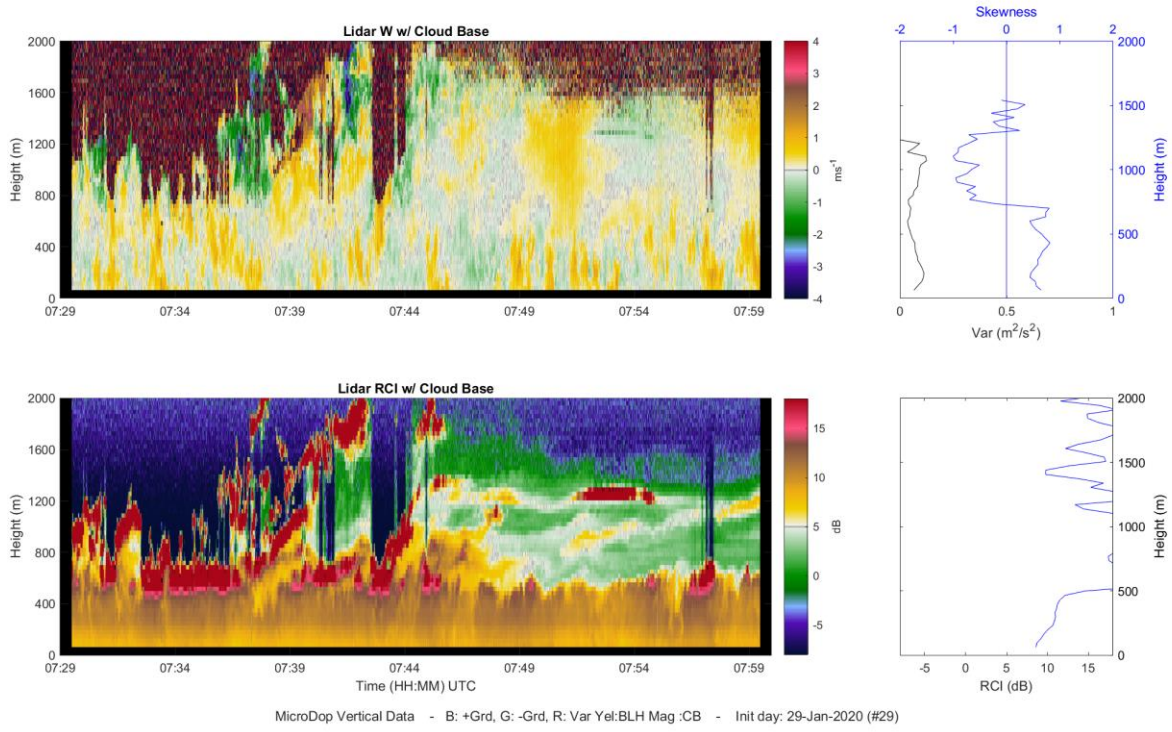
W-band cloud radar and Picarro isotope analyzer are operational now since both were repaired/replaced during the port call. Microwave radiometer will not be onboard during leg 2. All other systems are a "go".

5. Outlook

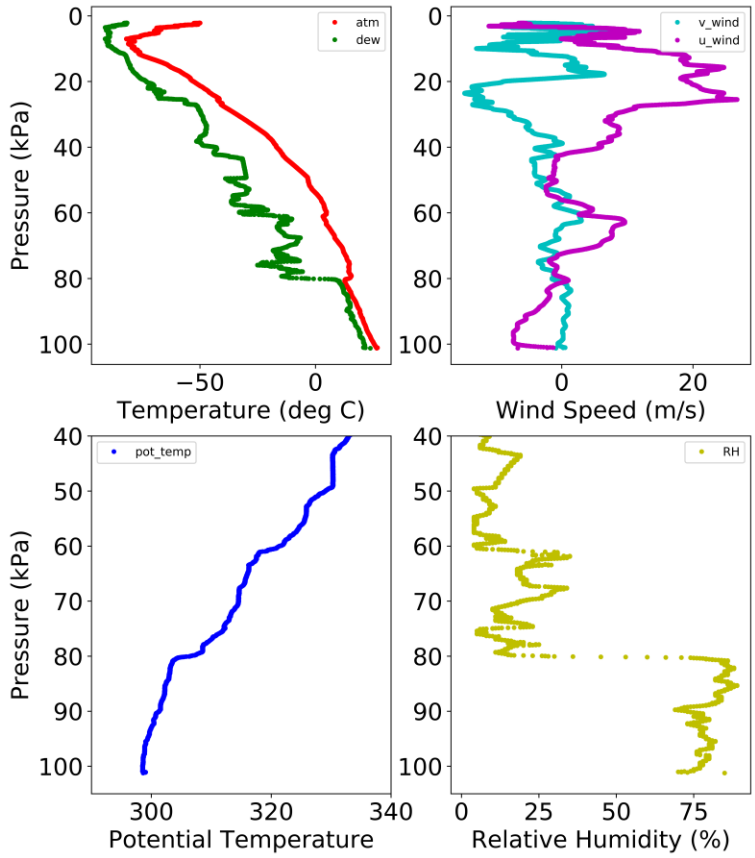
This evening, the Brown will transit to 13.21 N, -54.5 W then turn north to P3P to survey area for Swift deployments tomorrow. We will arrive at P3P by 0530 AST, and at 0800 we will recover and redeploy one of the Wave Gliders to replace the RH sensor. We will determine where to deploy Swifts (after looking at the previous night's transect information) and deploy 6 drifters along a line with 5 nm spacing. The (underway) CTD's will be obtained at each drifter deployment location and where the Wave Glider is redeployed.

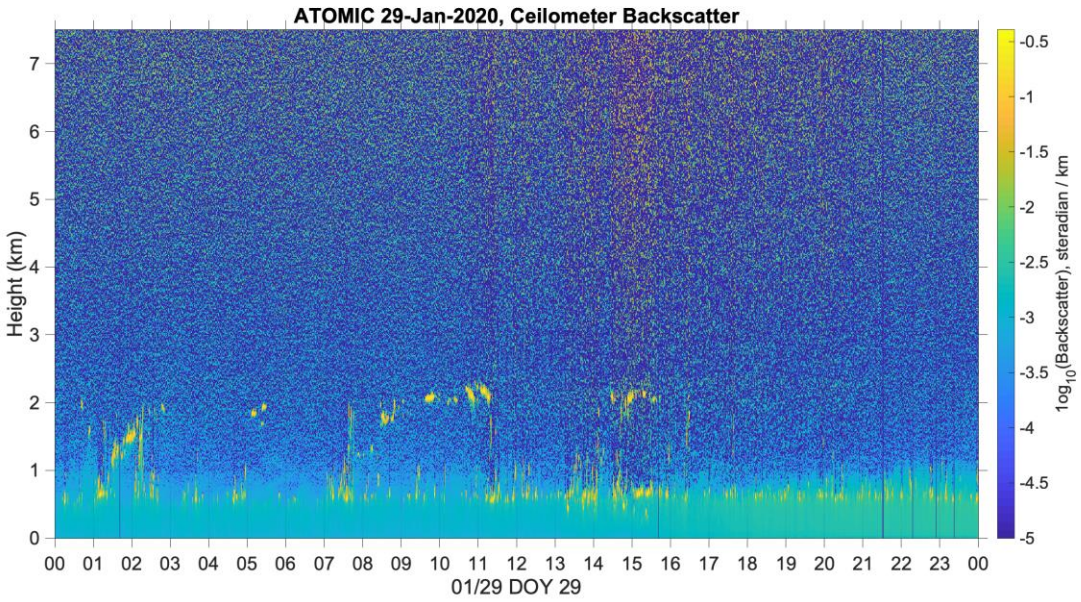
6. Figures





2020-01-29 0642UTC




ATOMIC 29-Jan-2020, Ceilometer Backscatter
Height (km)
0
1
2
3
4
5
6
7
00 01 02 03 04 05 06 07 08 09 10 11 12 13 14 15 16 17 18 19 20 21 22 23 00
01/29 DOY 29
-0.5
-1
-1.5
-2
-2.5
-3
-3.5
-4
-4.5
-5
log10(Backscatter), steradian / km