RV Atalante EUREC4A-OA



Daily cruise report (03 February 2020)

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1. Objective

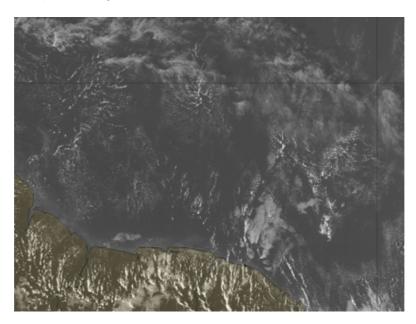
Today we deployed the OCARINA and PICCOLO automated platforms and completed the multiple frontal crossing on the Suriname shelf. We were sailing in parallel to the Maria S Merian, initially separated by 0.5 NM, and, for the last leg, 5 NM. During this transect we launched radiosondes every 45 min while the Maria S Merian was sampling the atmospheric with its lidars and radar. At 2 pm the two ships splat for their own successive destination. Before dust we rejoined OCARINA and PICCOLO and successfully recovered them.

2. Synoptic Situation

Dry trade winds.

Easterly wind 10-15kt. The waves are about 2-3 feet.

Mesoscale cloud patterns (20utc): sugar.



| Time (local) | Coverage | Types | remarks |
|--------------|----------|---------|---------|
| 0800 | 0/8 High | - | |
| | 0/8 Mid | - | |
| | 2/8 Low | Cu | |
| 1200 | 2/8 High | Ci | |
| | 4/8 Mid | Ac | |
| | 3/8 Low | Cu | |
| 1600 | 0/8 High | - | |
| | 0/8 Mid | - | |
| | 4/8 Low | Cu, TCU | |

Inter-calibration: No intercalibration today.

Stations:

| Stati | ions: | | | | | | |
|-----------------------------------|-------------------------|---|----------------|-----------------|------|---------------------------------|--|
| Date | Approx Local Time | Operation | Lat | Lon | NM | Operations | |
| 03/02 | 4 h if 8 kts | From WP3: 6°24'N 54°04'W go northward to WP4: 6°54' 54°04'W | 6°54'N | 54°04'W | 30 | MVP, 8 kts | |
| 03/02 | 05:00 | OCARINA & PICCOLO deployment | | | | | |
| 03/02 | 4 h if 8 kts | From WP4: 6°54' 54°04'W go southwestward to WP5: 6°32'N 54°22'W | 6°32'N | 54°22'W | 30 | MVP, 8 kts | |
| 03/02 | 5h15' hrs if 10 kts | From WP8: 6°32'N 54°22'W go northward to WP9: 7°06' 54°22'W | 7°06'N | 54°22'W | 41 | MVP, 8 kts | |
| Departure of the Maria S. Merian. | | | | | | | |
| 03/02 | 14:15 | From WP9: 7°11' 54°22'W to WP10: OCARINA & PICCOLO actual positions | 6°49.952' N | 54°16.569' W | | MVP, 9 kts | |
| 03/02 | 17:00 | OCARINA & PICCOLO recovery | | | | | |
| 03/02 | 19:00 | From WP10: OCARINA & PICCOLO actual positions to WP11: 6°30'N 54°40'W | 6°30'N | 54°40'W | | MVP, 9 kts | |
| 03/02 | 21:30 | From WP11: 6°30'N 54°40'W to WP12: French drifters position | | | 62NM | MVP, 9 kts, 10 kts if needed | |
| 04/02 | 5:00 | Hunting & fishing the 4 French Drifters Positions @3 Feb 2020, 7:00 pm UTC: 1. 6.4545278 -53.9672194 2. 6.462 -53.972 3. 6.465 -53.975 4. 6.4154, -53.8932 | | | | | |
| 03/02 | 4 h if 8 kts | From WP4: 6°54' 54°04'W go southwestward to WP5: 6°32'N 54°22'W | 6°32'N | 54°22'W | 30 | MVP, 8 kts | |
| 03/02 | 5h15' hrs if 10 kts | From WP8: 6°32'N 54°22'W go northward to WP9: 7°06' 54°22'W | 7°06'N | 54°22'W | 41 | MVP, 8 kts | |

Autonomous systems deployed: None

Overflights: No overflights. We are too far south.

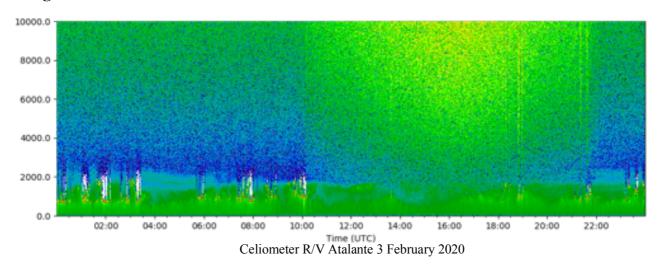
4. Instrument Status

All instruments seem to work well. Today Vaisala radiosounding reception was more stable.

5. Outlook

After recovering (hopefully) all 4 French drifters we will head back to the Ring3 to complete its survey and perhaps meet with the 3 NASA saildrones..

6. Figures



Deployment of OCARINA



Deployment of PICCOLO

