U.S. DEPT. OF COMMERCE
NOAA Earth System Research Lab

Seacions August 2013 **DIGITAL OZONESONDE CHECKLIST** *FLT#* HU 821

INITIAL PREPARATION ~7 DAYS BEFORE FLIGHT.

DATE (LOCAL): 08/27/2013
INITIALS: NLP
PUMP# (add x,y,z,R): 2Z22239

1. Run zero air 10 minutes ✓ (√)
2. PUMP CURRENT: 94.70
3. PUMP PRESSURE: 29
4. ENSCI Press/vac: 26/20 in Hg
5. Bypass cell ✓ (√)
6. Add 5-6cc cathode ✓
7. 30 MINUTES HI O_3 ✓ (√)
8. 3 MINUTES NO O_3 ✓ (√)
9. DUMP CATHODE RINSE: ✓ (√)
10. ADD 3.0 CC FRESH CATHODE # ✓
11. ADD 1.5 CC ANODE SOLUTION: ✓ (√)
12. RUN 10 MINUTES on NO O_3 ✓ (√)
13. RECORD CURRENT: **BG** = 0.264 µamps
14. RUN 10 MINUTES on 5 µamps O_3 ✓ (√) - then switch to NO O_3 AIR.
15. **RECORD:** TIME TO DROP FROM 4 TO 1.5 µamps: 40.95 sec.
16. Run sonde for 10 minutes on NO O_3 AIR ✓ (√)
17. Short the cell leads: ✓ (√)
18. Intake tube stored in sonde frame: ✓ (√)
19. Place Instrument inside plastic bag: ✓ (√)
20. Store inside Styrofoam flight box: ✓ (√)

2-5 DAYS AFTER INITIAL PREP: REPLACE SOLUTIONS: DATE (LOCAL): 09/02/2013

1. Replace Cathode/Anode ✓ (√)
2. RUN 5 MINS on NO O_3 ✓ (√)
3. RECORD CURRENT: 0.060 µamps
4. RUN 5 MINS on 5 µamps O_3 ✓ (√)
5. Switch to NO O_3 AIR
6. RECORD TIME TO DROP FROM 4 TO 1.5 µamps: 24.26 sec
7. RUN 5 MINS on NO O_3 ✓ (√)
8. Short cell leads ✓ (√)
9. Store inside Styrofoam flight box: ✓ (√)

FLIGHT PREPARATION IN LAB.

DATE (LOCAL): 09/04/2013
INITIALS: NLP

1. Cathode solution # or date written on bottle: 238
2. CHANGE CATHODE SOLUTION (3cc): ✓ (√)
3. CHANGE ANODE SOLUTION (1.5cc): ✓ (Yes/No)
4. RUN ON NO O_3 FOR 10 MINUTES: ✓ (√)
5. RECORD THE NO O_3 BACKGRND#1: **BG1**= 0.048 µamps
6. RUN ON 5 microamps of O_3 for 10 Minutes: ✓ (√)
7. SWITCH TO NO O_3 AIR.
8. **RECORD:** THE TIME TO DROP FROM 4 TO 1.5 µamps: 24.0 sec
9. **RECORD:** 5 – T100 FLOWRATE TIMES:

T100 FLOWRATE TIMES:

ROOM TEMP (C): 23.9, ROOM RH (%): 41
Flowrate Correction: 2.71 (%)

FLOWRATE #1: 29.47 sec
FLOWRATE #2: 29.42 sec
FLOWRATE #3: 29.33 sec
FLOWRATE #4: 29.40 sec
FLOWRATE #5: 29.24 sec
•AVERAGE T100: 29.37 **sec**

DAY OF FLIGHT @ THE LAUNCH SITE.

FLIGHT NUMBER: HU 821
GMT DATE (YYMMDD): 09/04/2013 LOCAL DATE: 09/04/2013
GMT LAUNCH TIME: 19:02 LOCAL TIME: 14:02
Operator Initials: NLP
BALLOON SIZE: 1000 Grams: TOTEX ___ Hwoyee ✓ (√ one)
PAY-OFF-WEIGHT: 1700 Grams: Burst Alt: 30,20 (km)

O_3 sn: 2Z22239 **O_3 CELL BACKGROUND (µamps):** 0.048
O_3 Flowrate: 29.37 (sec) **O_3 Flowrate Correction:** 2.71 (%)

Radiosonde s/n: 20989 Freq: 403 (MHz)

SURFACE PRES: 995.3 (hPa)
SURFACE TEMP: 28 (C)
SURFACE RH: 47.2 (%)
Sky Conditions: _____
REMARKS: _____