

Seacions August 2013

DIGITAL OZONESONDE CHECKLIST

FLT# HU 828

INITIAL PREPARATION ~7 DAYS BEFORE FLIGHT.

DATE (LOCAL): 09/16/2013
INITIALS: NLP
PUMP# (add x,y,z,R): 2225248

- 1. Run zero air 10 minutes (v)
- 2. PUMP CURRENT: 106.81
- 3. PUMP PRESSURE: 210
- 4. ENSCI Press/vac: 210/20.

- 5. Bypass cell (v)
- 6. Add 5-6cc cathode (v)
- 7. 30 MINUTES HI O₃ (v)
- 8. 3 MINUTES NO O₃ (v)

- 9. DUMP CATHODE RINSE: (v)
- 10. ADD 3.0 CC FRESH CATHODE # (v)
- 11. ADD 1.5 CC ANODE SOLUTION: (v)
- 12. RUN 10 MINUTES on NO O₃ (v)
- 13. RECORD CURRENT: BG = 0.194 μ amps (v)
- 14. RUN 10 MINUTES on 5 μ amps O₃ (v) - then switch to NO O₃ AIR.
- 15. RECORD: TIME TO DROP FROM 4 TO 1.5 μ amps: 31.45 sec.

- 16. Run sonde for 10 minutes on NO O₃ AIR (v)
- 17. Short the cell leads: (v)
- 18. Intake tube stored in sonde frame: (v)
- 19. Place Instrument inside plastic bag: (v)
- 20. Store inside Styrofoam flight box: (v)

2-5 DAYS AFTER INITIAL PREP: REPLACE SOLUTIONS: DATE (LOCAL): 09/17/2013

- 1. Replace Cathode/Anode (v)
- 2. RUN 5 MINS on NO O₃ (v)
- 3. RECORD CURRENT: 0.045 μ amps
- 4. RUN 5 MINS on 5 μ amps O₃ (v)
- 5. Switch to NO O₃ AIR

- 6. RECORD TIME TO DROP FROM 4 TO 1.5 μ amps: 25.71 sec
- 7. RUN 5 MINS on NO O₃ (v)
- 8. Short cell leads (v)
- 9. Store inside Styrofoam flight box: (v)

FLIGHT PREPARATION IN LAB.

DATE (LOCAL): 09/18/2013
INITIALS: 09/18/2013 NLP

T100 FLOWRATE TIMES:

ROOM TEMP (C): 23.8, ROOM RH (%): 37
Flowrate Correction: 1.94 (%)

- 1. Cathode solution # or date written on bottle: 239
- 2. CHANGE CATHODE SOLUTION (3cc): (v)
- 3. CHANGE ANODE SOLUTION (1.5cc): (Yes/No)
- 4. RUN ON NO O₃ FOR 10 MINUTES: (v) 0.059
- 5. RECORD THE NO O₃ BACKGRND#1: BG1 = ~~0.022~~ 0.059 μ amps (v)
- 6. RUN ON 5 microamps of O₃ for 10 Minutes: (v)
- 7. SWITCH TO NO O₃ AIR.
- 8. RECORD: THE TIME TO DROP FROM 4 TO 1.5 μ amps: 23.85 sec
- 9. RECORD: 5 - T100 FLOWRATE TIMES:

- FLOWRATE #1: 28.59 sec
- FLOWRATE #2: 28.79 sec
- FLOWRATE #3: 28.78 sec
- FLOWRATE #4: 28.74 sec
- FLOWRATE #5: 28.68 sec
- AVERAGE T100: 28.72 sec

DAY OF FLIGHT @ THE LAUNCH SITE.

FLIGHT NUMBER: HU 828
GMT DATE (YYMMDD): 09/18/2013 LOCAL DATE: 09/18/2013
GMT LAUNCH TIME: 19:10 LOCAL TIME: 14:10
Operator Initials: NLP
BALLOON SIZE: 800 Grams: TOTEX _____ Hwoyee (v one)
PAY-OFF-WEIGHT: 1700 Grams: Burst Alt: 24.99(km)

O₃ sn: 2225248 O₃ CELL BACKGROUND (μ amps): 0.059
O₃ Flowrate: 28.72 (sec) O₃ Flowrate Correction: 1.94 (%)

Radiosonde s/n: 20999 Freq: 403 (MHz)

SURFACE PRES: 996.4 (hPa)
SURFACE TEMP: 27.0 (C)
SURFACE RH: 57.6 (%)

Sky Conditions: _____

REMARKS: _____