**HARBOR Flight Summary Log, Flight Designation: HAR130602**

Left Ogden at approximately 5:40 a.m. in three vehicles, approximately 13.5 team members (0.5 = one child)

**Launch Location:** Duchesne Airport, U69

40.19667°N, 110.38361°W, 5820 ft ASL

Arrived at launch location at 8:40 a.m., MDT

**Manifest and masses:**

2000g Balloon

Cutdown = Eckel design, 315g

Parachute = Large, orange/white with hoop, 952g

MSA v3 and v4 in box with external temp sensor and CO2 sensor, 666g

Cameras = two Canon still cameras (16 and 32 GB SD cards), Two GoPros (II & III)

GoPros mounted on ends of wooden booms, total system mass for cameras = 1210g

Two SBATS in blue foam boxes = 368g each

Ozonesonde/radiosonde = 663g

**Total Flight Mass including parachute & five packages = 4542g = 9.99lb**

Ballast weight (lift) set at 150% = 15lb

Package spacing was approximately 10 feet except the two SBATS were about a foot apart.

**Flight Parameters:**

Fill Started at 10:02:30 a.m. MDT

Fill Completed and balloon nozzle tape off started at 10:19:00 a.m. MDT (approximate)

Fill duration = 16.5 minutes at 30 to 40 psi on the secondary gauge

He used = 1 tank plus 1000psi

Cutdown Set to a delay of: 2.5 hours

Cutdown armed at: 10:23:00

Launch Time: 10:23:35

Burst Time: 11:16:25 Observed burst and was able to visually observe the parachute at full altitude.

Burst Altitude: 82841ft = 25.250km ASL

Landing Time: 12:06:50 p.m., MDT, Approximate; landing location 76° at 27.4 miles from launch

Returned Home (Ogden) and completed cleaning the gear and trailer at approximately 5:30 p.m.

**Misc. Notes:**

Round trip travel distance in SUV = 379.8 miles

Ozonesonde system needs a better set of antenna cables, precut tubes, better power system for preamp and radio.

We couldn’t find the new (grey) beacon so we flew without it.

Need to add to the camera checklists: A note to show the GPS time to the cameras before and after flight.

Obtained ozone data for the duration of the entire flight, both up and down.

Water landing in Bottle Hollow Reservoir, recovered by boaters who saw it splashdown.