Launch Director Checklist

Split Launch and Recovery

NS-74

Launch Location: MERCERSBURG MIDDLE SCHOOL

Launch date: ~~XXXXXXXX~~ 1/27/18

Payload Lineup:

~~COMMAND~~ MARS II

COMMAND

THE SUN!

~~PANORAMIC~~ TYson

MARS II

TARDIS

_____

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Balloon Size(s): 1600 g + pilot (350 or 600g)

Callsigns: W3EAX-8, 12

TARDIS — W3EAX-11

Pre-Flight Inventory

Charge:
- ✓ ✓ Car battery
- ✓ ✓ Wi-fi hotspot(s)
- ✓ ✓ Walkie-Talkie(s)
- ✓ ✓ Tracking Laptops

Check Inventory of:
- ✓ ✓ BLT Bucket
- ✓ ✓ Inflation Bucket — missing clamp
- ✓ ✓ Recovery Bucket - missing ziploc bags
- ✓ ✓ Launch Kit - needs more desiccant
  - SMA connector box
- ✓ ✓ Main tracking box

Pre-Flight Packing List

Launch Vehicle:

Inflation Equipment - Bowden
- ✓ ✓ Balloons
- ✓ ✓ Helium tanks (3)
- ✓ ✓ Tarp (Big)
- ✓ ✓ Parachute and Ring
- ✓ ✓ Command Module kit
- ✓ ✓ Broom
- Trash Bag
- ✓ ✓ Square Plywood Bases (2)
- ✓ Scale for Measuring Payloads

Payloads - 7
- ✓ ✓ Battery box
- ✓ Battery Charger
- ✓ Payloads
- ✓ ✓ Soldering Iron & wire
- ✗ Spare LVCs - don't exist

1/27

✓ ✗ Tyler's Weather Ground Station

Kits/Buckets ✗
✓ ✗ BLT Bucket - 7
✓ ✗ Inflation Bucket - 7
✓ ✗ Launch Kit - 12
✗ Main tracking box - Nassif

Tracking/Communications
Tracking Laptop
✓ ✗ Tracking Antennas
900s Ground station
✓ ✗ Radios
✓ Walkie-Talkies
✓ ✗ Wi-Fi hotspot
✓ ✗ Power Inverter
✓ ✗ Car magnets
✗ Rayish

Recovery Vehicle: 2.7964

✓ Recovery -12
✓ ✗ Bow Saw ✗
✓ ✗ Extension Pole
✓ ✗ Scythe
✓ ✗ Sling Shot
✓ ✗ Tarp (Small)

Kits/Buckets
✓ ✗ Recovery Bucket - 12

Tracking/Communications

- [ ] Tracking Laptop
- [✓] Tracking Antennas
- [ ] Radios
- [✓] Walkie-Talkies
- [✓] Wi-Fi hotspot
- [ ] Power Strip(s)
- [ ] Car magnets
- [ ] Car battery

Launch Checklist

Launch/Inflation Setup

- [ ] Pre-launch setup meeting (See PAO)
- [✓] Tarp setup (indicate full or half configuration)
- [✓] Place BLT in optimal launch location
- [✓] Indication direction of payload string from balloon
- [ ] Parachute-to-balloon lanyard configured
- [✓] Parachute and ring untangled
- [ ] Command Module in place
- [✓] Harmless payload stickers on each payload
- [✓] Payload string lined up and assembled

Pre-Inflation Checklist

- [✓] **Hook lanyard from parachute around balloon neck before connecting to inflation tube**
- [ ] ~~Tethers in Place~~
- [ ] ~~Brief 2 tether handlers (See PAO)~~
- [✓] Did Dr. Bowden call the tower? (See Dr. Bowden)
- [✓] Balloon in BLT ready to go (See BLT Engineer)

Pre-Release Checklist

- [x] Check payloads are ready
- [x] Final communications check
- [x] Call tower @ t-10 minutes

Countdown & Release

- [x] Inform payload PoCs to hold payloads above the launch pad
- [ ] ~~Tether handlers ready~~
- [x] Slowly raise payload string
- [x] Measure Total Free Lift = optional ~~(optional)~~ (Kinda optional)
- [x] Countdown from 10 (Final Countdown Song Optional)
- [x] Release!

Release Time Mark = 10:00 am

✳ Hold @ ~ 9:45 for no tracking jackets