

Nihon-University
Nakamura & Miyazaki Laboratory

Development of 2-stage deployment system



Main feature of our Cansat is

Inseparable 2 stage-deployment system

2 stage-deployment

To avoid strong wind at the high altitude.

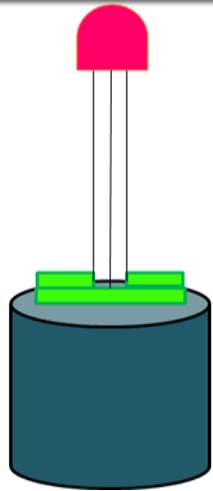
Inseparable

Not to lose anything in the dessert.

Not to cause aeropack staff to find our dropping.

We offer that inseparable structure can make the competition more harder!!

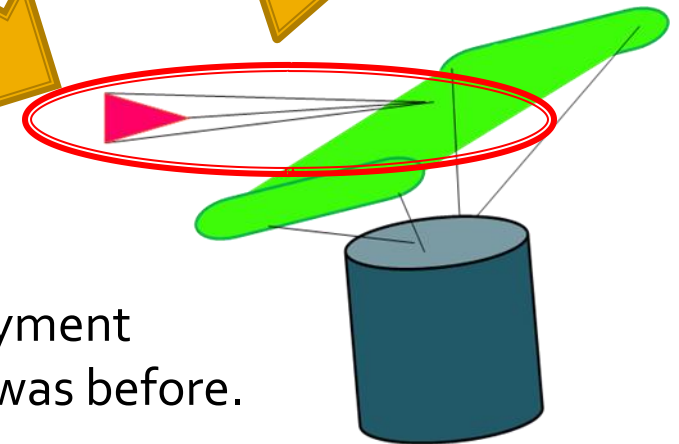
Over view of Inseparable 2-stage deployment system



- It spreads small drogue chute after the release from the rocket.
- It speedily comes down to about 3,000ft in the sky.

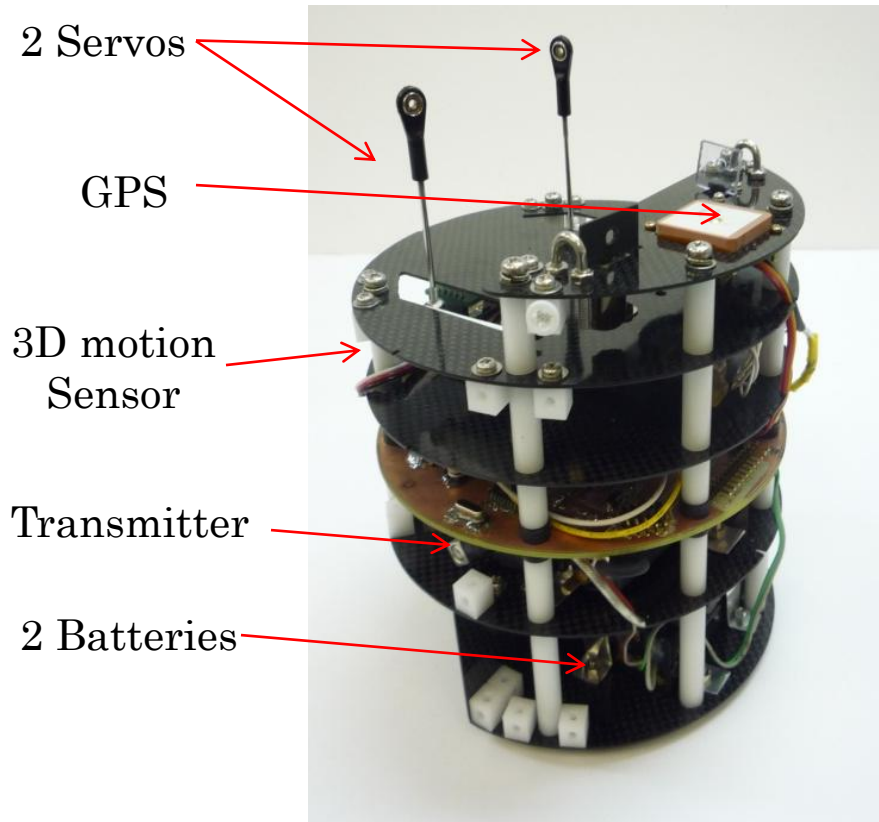
2 stage-deployment system

Inseparable



- Spreads parafoil after it reaches to 3,000ft .
- The drogue chute is folded by the shock of deployment and reduce drag much lower compare to what it was before.
- Controls itself to the target smoothly.

Overview of Messenger



Small drogue chute



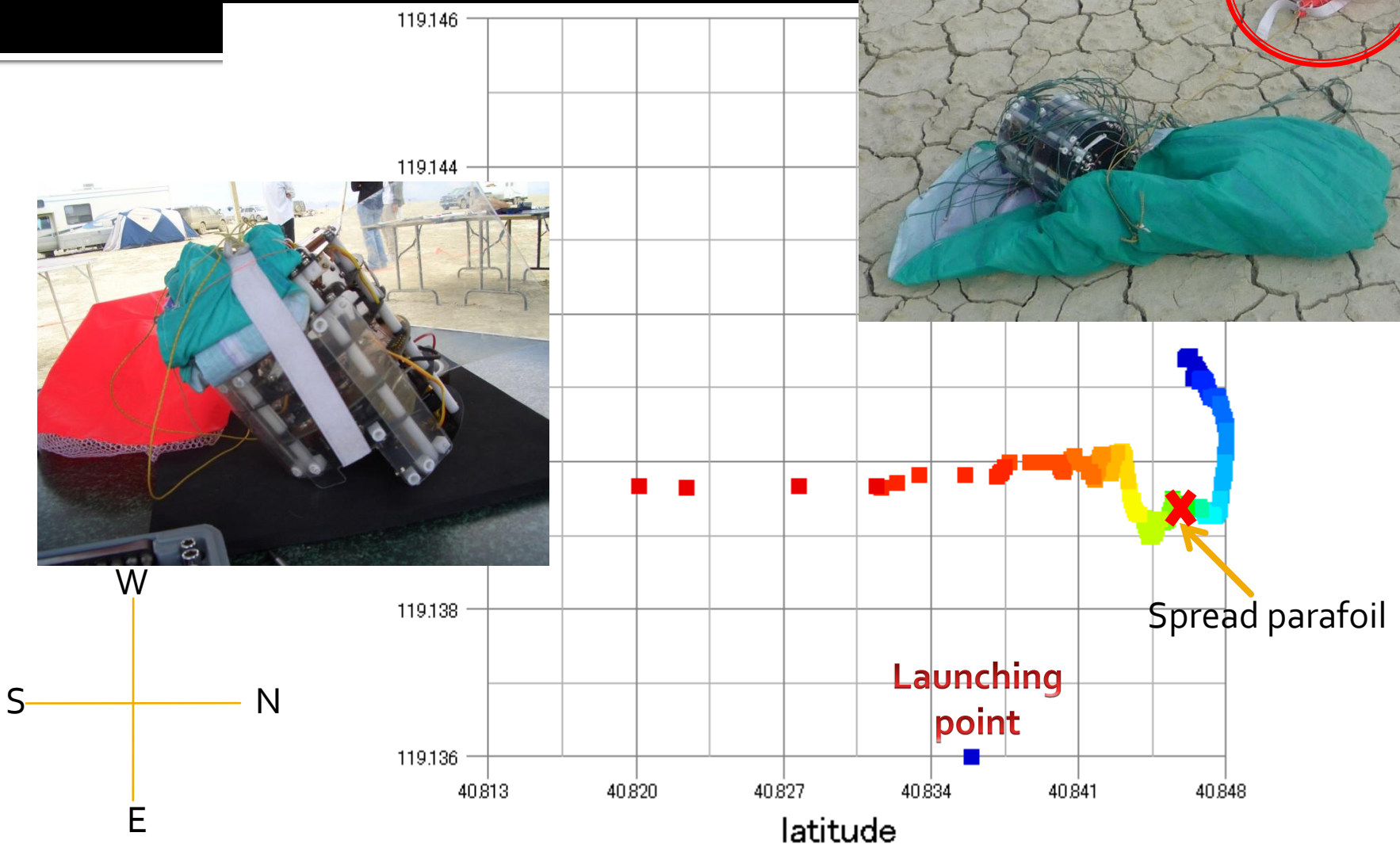
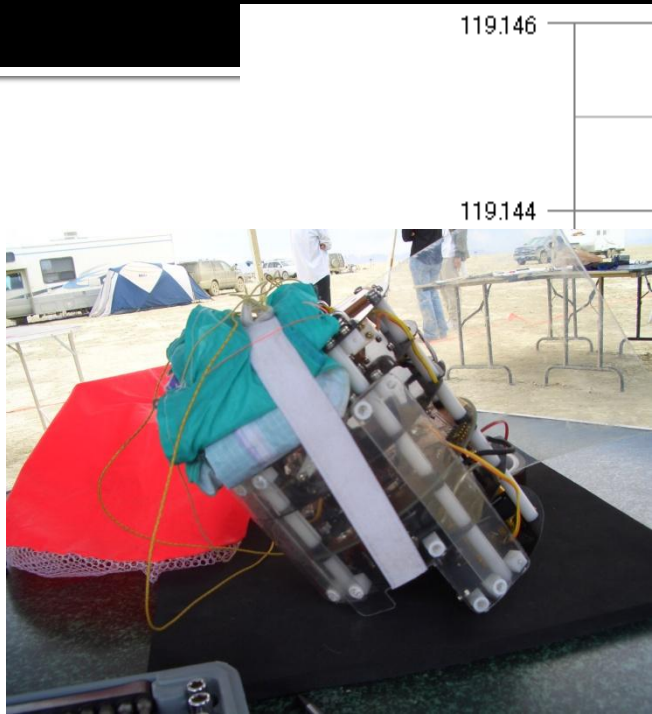
Before deployment

After deployment

Handmade parafoil

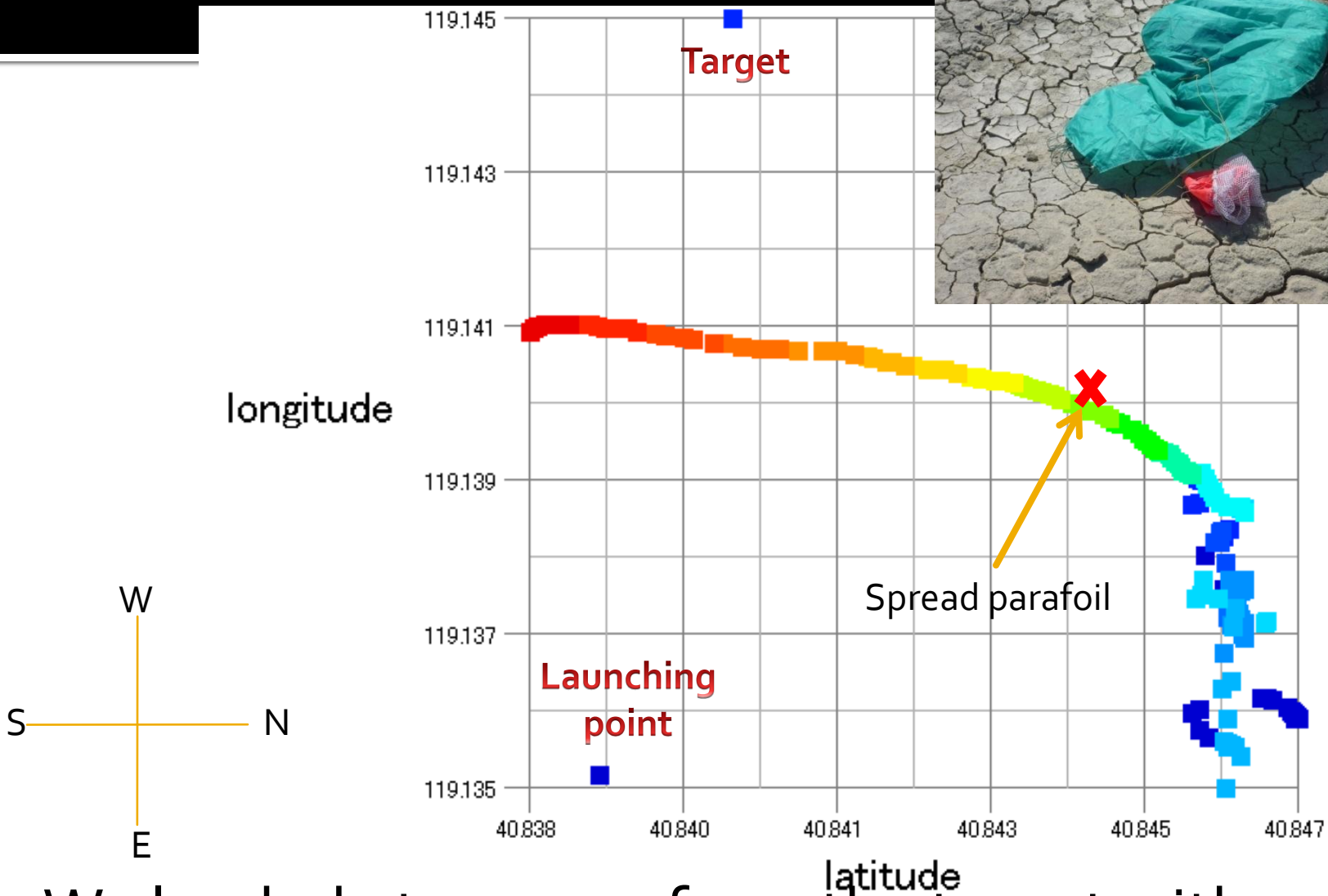


Result of 1st try



We landed at 818 m from the target with control

Result of 2nd try



We landed at 1,130 m from the target with control

1st launch with Richard's rocket!



Your rocket is so cool!
We could land at about 800m from the target!



Richard & Laura & Lupe 🎵

★ ★ Thank you Richard ★ ★

2nd launch with Jim's rocket!



Jim brought us a great opportunity!

Ready to go!!



★☆☆ Thank you Jim ☆☆☆

End

***Thank you for your
listening!***

ありがとうございました！！

Arigato - gozaimashita!!