



SpaceX: Commercial Cargo and Crew Update

Adam Harris
Vice President of Government Sales
February 5, 2014



SPACEX 2014

- Founded in 2002
- Over 3,000 employees



Vandenberg AFB, CA



Hawthorne, CA



McGregor, TX



Cape Canaveral AFS, FL

MISSION SUCCESS



Inaugural Flight
June 2010



NASA COTS 1
December 2010



NASA COTS 2+
May 2012



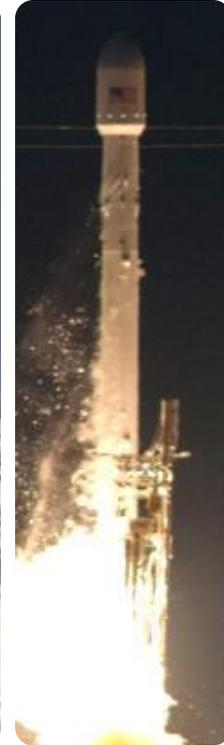
NASA CRS 1
October 2012



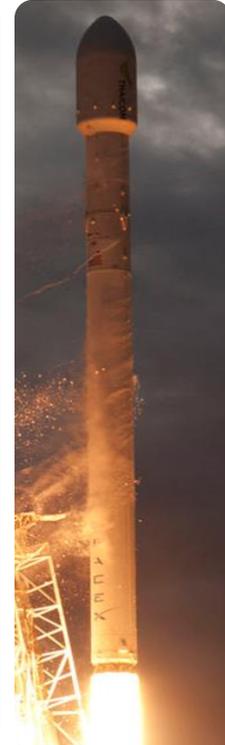
NASA CRS 2
March 2013



CASSIOPE
September 2013



SES-8
December 2013



Thaicom-6
January 2014

COMMERCIAL CARGO

COTS Program (2008 – 2012)

- Firm, fixed-price, milestone-based Space Act Agreements (SAAs)
- 3 orbital test flights (SpaceX, 2; Orbital Sciences, 1)
- Two new launch vehicles and spacecraft
- First private spacecraft to berth with the ISS



CRS Contract (2012 – 2016)

- Firm, fixed-price FAR contracts
- Three successful cargo delivery flights to the ISS
- CRS-3 scheduled for March 2014
- World's only ability to return significant scientific cargo to earth
- Most affordable cargo transportation



Beyond CRS (2016 –)

- ISS operation extended to 2024
- Opportunity for greater utilization and scientific discovery at America's orbiting national lab
- Minimize reliance on foreign cargo systems
- Opportunities for joint crew and cargo missions



COMMERCIAL CREW

CCiCap

- Meeting all CCiCap milestones on schedule
- Dragon will be the **safest crewed spacecraft in history** with the sophisticated SuperDraco Launch Abort System (LAS)
- Upcoming pad abort and in-flight abort tests
- Obviates need to send \$450 million/year to Russia for transportation of American astronauts



CCtCap

- CCtCap will complete development and demonstrate operations
- Procurement is firm-fixed price
- Bids were due January 22nd - NASA will announce the CCtCap winners by September 2014

CCiCap Completed Milestones

CCiCap Kickoff Meeting	✓
Financial and Business Review	✓
Integrated System Requirements Review (ISRR)	✓
Ground Systems and Ascent Preliminary Design Review (PDR)	✓
Pad Abort Test Review	✓
Human Certification Plan Review	✓
On-Orbit and Entry Preliminary Design Review (PDR)	✓
In-Flight Abort Test Review	✓
Safety Review	✓
Flight Review of Upgraded Falcon 9	✓
Dragon Parachute Tests	✓



SPACEX

Questions?

