



July 2026

Update

**Oklahoma Space
Alliance**

A Chapter of The
National Space Society

A free email newsletter of the Oklahoma Space Alliance

Victus Haze Launch



Credit: Rocket Lab



July 2026 OSA Meeting

Saturday, July 9, 2025

2:00 PM

Norman Computers

916 W Main St, Norman, OK
73069

405-863-6173

Program— Space News
and Events

Website:

<http://osa.nss.org>

Quote of the Month

"How many more years I shall be able to work on the problem I do not know. I hope, as long as I live. There can be no thought of finishing, for 'aiming at the stars,' both literally and figuratively, is a problem to occupy generations, so that no matter how much progress one makes, there is always the thrill of just beginning."— Robert Goddard (1932 fan letter to H.G. Wells)

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Oklahoma Space Alliance

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July 9, 2026

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Ruh-Ro!



Credit: CCTV

It's the space story of the year. On July 10, China recovered a rocket during an orbital launch for the first time, pulling off the feat during the Long March 10B's maiden liftoff.

Articles: <https://www.space.com/space-exploration/launches-spacecraft/making-history-china-lands-rocket-during-an-orbital-launch-for-1st-time-ever>

<https://www.cnn.com/2026/07/10/china/china-reusable-rockets-test-breakthrough-intl-hnk>

<https://www.scientificamerican.com/article/chinas-long-march-10b-rocket-successfully-launches-and-lands-in-a-global-spaceflight-milestone/>

There Wasn't Supposed to Be an Earth-Shattering Kaboom



Credit: X/@Truthful_ast

On May 28, a Blue Origin New Glenn undergoing a static fire test at the Cape blew up on the pad, with major damage to Launch Complex 36. It's a huge setback to BO in general, and BO's lunar program in particular. Whether New Glenn will fly again before next year is in doubt. But Blue Origin is raising private capital for the first time.

Articles: <https://www.space.com/space-exploration/launches-spacecraft/blue-origins-new-glenn-rocket-explodes-in-massive-fireball-during-prelaunch-test>

<https://www.space.com/space-exploration/launches-spacecraft/blue-origin-starts-rebuilding-launch-pad-damaged-by-new-glenn-rocket-explosion-and-it-will-look-very-different-when-its-done>

<https://arstechnica.com/space/2026/07/nasa-chief-praises-progress-blue-origin-is-making-after-launch-failure/>

<https://arstechnica.com/space/2026/06/safety-officials-finally-have-a-good-idea-of-what-a-big-rocket-explosion-can-do/>

<https://arstechnica.com/space/2026/07/blue-origin-for-the-first-time-is-expected-to-raise-private-capital/>

Help is on the Way



Credit: NASA

On July 3, the Northrop Grumman Pegasus XL rocket was air-launched for the very last time, sending Katalyst Space Technologies' LINK satellite on a rescue mission to save NASA's Neil Gehrels Swift Observatory and tow it to a stable orbit, preventing its imminent fall back to Earth.

Article: <https://www.space.com/space-exploration/launches-spacecraft/no-one-thought-it-was-going-to-be-possible-a-space-telescope-is-falling-out-of-space-this-is-nasas-daring-plan-to-save-it>

<https://www.space.com/space-exploration/launches-spacecraft/nasa-successfully-launches-rescue-mission-to-save-swift-space-telescope-from-burning-up-in-earths-atmosphere>

<https://arstechnica.com/science/2026/07/katalysts-satellite-rescue-mission-is-now-in-pursuit-of-nasas-swift/>

Partner for Mars



Credit: Relativity Space

On June 17, NASA announced a public-private partnership with Relativity Space; RS will design, build and launch Aeolus to carry a weather monitoring instrument suite to orbit around Mars. Aeolus will be the first to provide daily measurements of the planet's global weather. Launch is targeted for 2028. Meanwhile, NASA has finally released its solicitation for a Mars telecom orbiter, with selection by October.

Articles: <https://www.space.com/space-exploration/missions/a-private-company-will-build-and-launch-nasas-next-mars-orbiter-in-2028-and-its-not-spacex>

<https://www.nasa.gov/news-release/nasa-announces-public-private-partnership-to-advance-mars-science>

<https://arstechnica.com/space/2026/05/one-mars-spacecraft-two-senators-and-a-cloud-of-questions/>

Space Force Needs Speed, and Gets It



Credit: Rocket Lab

Just 16 hours and 42 minutes passed between Rocket Lab receiving the Notice To Launch from the Space Force's Space Safari Program Office and liftoff of the company's Electron launch vehicle on the Victus Haze Tactically Responsive Space (TacRS) mission. This beats the previous TacRS record set by Firefly Aerospace three years ago on the Victus Nox mission by more than 10 hours.

Article: <https://www.space.com/space-exploration/launches-spacecraft/rocket-lab-launches-us-space-force-mission-with-less-than-17-hours-notice-a-new-record>
<https://www.space.com/space-exploration/launches-spacecraft/1-private-spacecraft-intercepts-another-on-space-forces-groundbreaking-victus-haze-mission>

Starfall



Credit: SpaceX

SpaceX launched its new Starfall capsule on June 23. It appears to be designed to support point-to-point cargo deliveries as well as space-based manufacturing.

Articles: <https://www.space.com/space-exploration/launches-spacecraft/spacex-launching-its-1st-starfall-reentry-capsule-early-on-june-23-watch-it-live>

<https://www.space.com/space-exploration/launches-spacecraft/what-is-starfall-a-look-at-spacexs-mysterious-new-return-capsule>

<https://arstechnica.com/space/2026/06/with-starfall-spacex-eyes-an-edge-in-global-cargo-delivery-from-orbit/>

Stop Teasing Us



Credit: NASA/JPL-Caltech/MSSS

"Measurements of two mudstones show hundreds of organic detections, making this the most robust organic detection in Jezero crater," per a new paper on discoveries made by the Perseverance rover. The evidence pointing to life (at least prior life) on Mars continues to strengthen.

Articles: <https://www.space.com/astronomy/mars/did-nasa-just-find-evidence-of-ancient-life-on-mars-perseverance-rover-spots-complex-carbon-in-red-planet-rocks>

Even the Queen



Credit: Virgin Galactic

A Gen-Z-led non-profit called Operation Period is planning the world's first dedicated mission to study menstruation in microgravity. Its founders will fly on Virgin Galactic sometime next year. China is also interested in human reproductive biology in space. Synthetic human embryos were delivered to its Tiangong space station in June to determine whether one of the earliest stages of human development can withstand microgravity. It's the first experiment of its kind.

Articles: <https://english.mathrubhumi.com/technology/science/periods-in-space-how-a-gen-z-led-mission-is-redefining-menstruation-study-why5clw6>

<https://www.space.com/space-exploration/human-spaceflight/menstruation-in-space-will-be-studied-for-1st-time-with-operation-period>

<https://www.straitstimes.com/world/mission-to-study-menstruation-in-space-expected-to-launch-in-2027>

<https://geekspin.co/china-is-testing-whether-humans-can-reproduce-in-space>

The High Cost of Pork



Credit: Thales Alenia Space

A new memo from NASA's Office of Inspector General details how major pieces of Artemis program hardware became costly components of lunar missions that no longer align with the agency's new plans to return astronauts to the moon and have since been canceled.

Article: <https://www.space.com/space-exploration/artemis/nasa-spent-usd5-9-billion-on-artemis-program-hardware-it-may-never-use>

<https://arstechnica.com/space/2026/06/analysis-finds-the-exploration-programs-nasa-recently-canceled-were-running-way-late/>

<https://arstechnica.com/space/2026/06/nasas-1-1-billion-gateway-habitation-module-is-unlikely-to-be-used-for-something-else/>

Waste Not, Want Not



Credit: NASA

Among other news at the NASA press conference updates on its lunar plans is Jared Isaacman's proposal to send the engineering test article for the Mars rovers Perseverance and Curiosity to the moon. The test rover (formerly known as Optimism) would be renamed PROMISE, short for "Polar Rover for Observation, Mapping, and In-Situ Exploration".

Articles: <https://www.space.com/astronomy/moon/promise-me-the-moon-nasa-wants-to-send-spare-nuclear-powered-mars-rover-to-the-lunar-surface>
<https://arstechnica.com/space/2026/06/nasa-may-send-a-backup-nuclear-powered-mars-rover-to-the-moon/>

Nuke LEO!

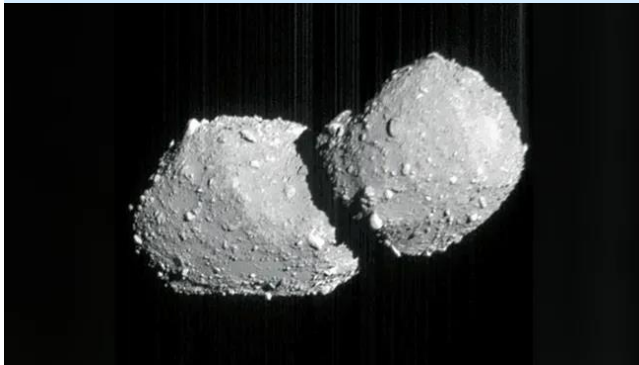


Credit: SpaceX

On July 7, SpaceX launched the first nuclear-powered commercial satellite. The BOHR (Betavoltaic Orbital High-Reliability) satellite, built by Florida-based company City Labs, rode to orbit on SpaceX's Transporter-17 rideshare mission.

Article: <https://www.space.com/space-exploration/launches-spacecraft/spacex-just-launched-the-1st-ever-nuclear-powered-commercial-satellite>

They're Here, They're There, They're Everywhere



Credit: JAXA

On July 5), the Japan Aerospace Exploration Agency's Hayabusa2 probe, rerouted after delivering samples of asteroid Ryugu to earth in 2020, performed a close flyby of another asteroid. This one was NEO Torifune. Just hours later, the Chinese space agency released images from Tianwen-2, arriving at its own target asteroid, 469219 Kamo'oalewa, a quasi-moon of Earth.

Articles: <https://www.space.com/space-exploration/asteroid-comet-missions/japans-hayabusa2-probe-captures-remarkable-photo-of-a-two-headed-asteroid-62-million-miles-away>

<https://www.space.com/space-exploration/asteroid-comet-missions/china-releases-first-photo-of-earths-elusive-quasi-moon-kamooalewa>

<https://arstechnica.com/space/2026/07/there-were-not-one-but-two-asteroid-encounters-this-weekend/>

Reorganization Everywhere



Credit: CASC

China is reorganizing its lunar program. And on this side of the field, NASA is reorganizing, too. Among other symptoms of the new wind blowing, CalTech may no longer be the manager of JPL. There will be a competition...

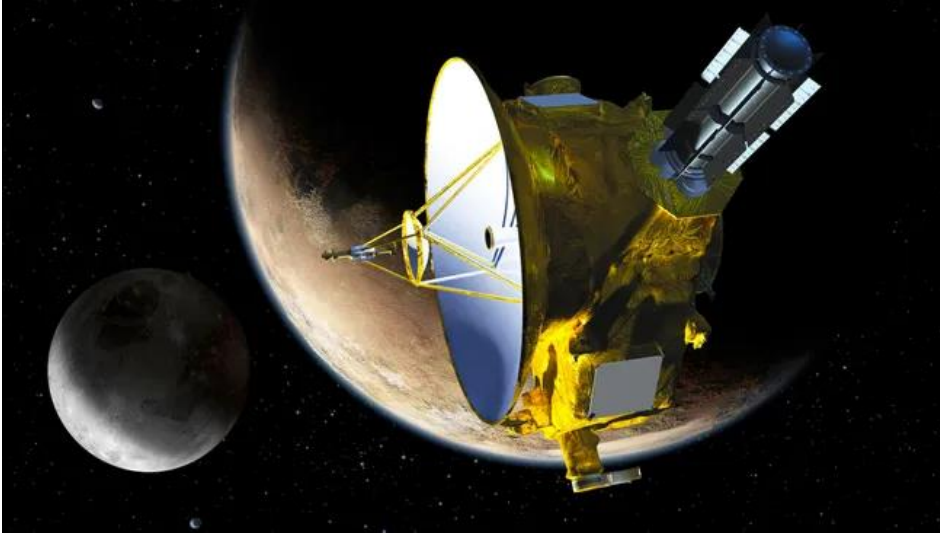
Articles: <https://www.space.com/space-exploration/china-shakes-up-its-space-programs-to-land-astronauts-on-the-moon-by-2030-we-will-spare-no-effort>

<https://www.space.com/space-exploration/shakeup-at-jpl-control-over-iconic-nasa-center-could-change-for-1st-time-in-nearly-100-years>

<https://arstechnica.com/space/2026/05/to-achieve-major-goals-nasa-seeks-to-streamline-its-organization/>

Commented [U1]:

Wakey, Wakey



Credit: NASA

After nearly a year in hibernation mode, New Horizons just woke up to transmit the data its instruments have been collecting while it slept.

Articles: <https://www.space.com/space-exploration/launches-spacecraft/nasas-new-horizon-probe-just-woke-up-from-hibernation-6-billion-miles-away-beyond-pluto-whats-it-doing-out-there>

<https://science.nasa.gov/mission/new-horizons/>

<https://phys.org/news/2026-07-nasa-horizons-spacecraft-hibernation-good.html>

Money and Guts

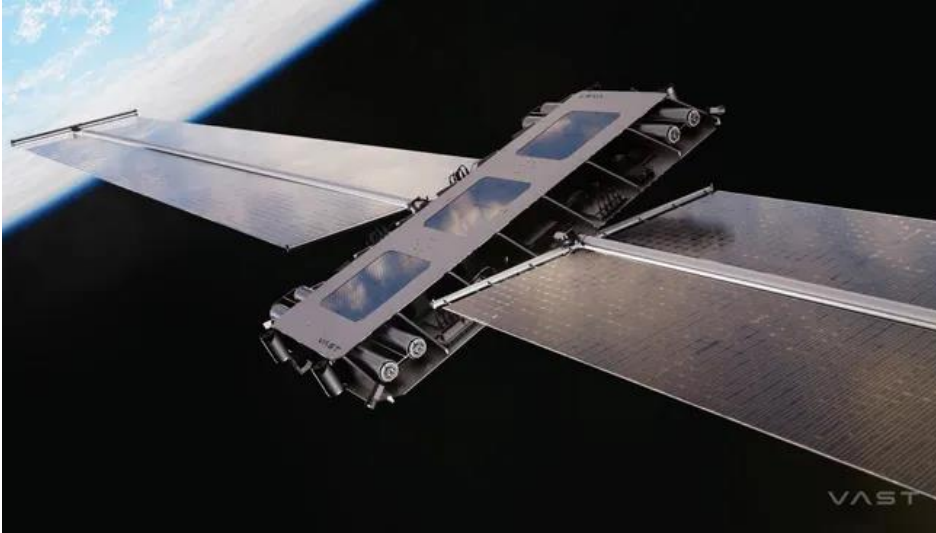


Credit: Fram2/SpaceX

Cryptocurrency billionaire Chun Wang, who financed and flew on the Fram2 private polar-orbit mission, has stepped forward to do the same thing with the first manned flyby of Mars – on a Starship, of course. No date set yet – also, of course. He's the fourth billionaire to book a trip to the moon or beyond on Starship.

Article: <https://www.space.com/space-exploration/private-spaceflight/this-cryptocurrency-billionaire-will-fly-spacexs-1st-private-starship-to-mars-but-when>
<https://www.ecoportal.net/en/billionaire-private-starship-mars-flyby/23174/>
<https://newspaceeconomy.ca/2026/05/22/spacex-announces-first-private-human-spaceflight-to-mars-crypto-billionaire-chun-wang-to-command-historic-starship-flyby-mission/>

Branching Out



Credit: Vast

Vast has announced plans to make satellites as well as space stations.

Article: <https://www.space.com/space-exploration/human-spaceflight/vast-space-stations-announces-satellite-line>

<https://arstechnica.com/space/2026/05/vast-space-seeks-to-diversify-by-building-satellites-as-well-as-space-stations/>

Commented [U2]:

Star Catcher



Credit: Star Catcher

Star Catcher Industries has raised \$65M in a Series A round to build what it calls the first power grid in space. More to the point, it has actual signed customers, both government and private.

Articles: <https://spacedaily.com/sd-n-a-a-florida-startup-just-raised-65-million-to-beam-concentrated-sunlight-at-satellites-and-the-customer-list-shows-how-fast-orbital-power-is-becoming-a-real-market/>

<https://www.space.com/technology/star-catcher-just-raised-usd65-million-to-build-the-worlds-first-power-grid-in-space-with-lasers>

That's All, Folks



Credit: NASA/John Kraus