
MOONRAT
7

1
00:00:00,710 --> 00:00:05,090
“Here’s some of the stories trending This
Week at NASA!”

2
00:00:05,090 --> 00:00:09,690
With a more than ninety percent probability
that Comet ISON broke apart from a major heating

3
00:00:09,690 --> 00:00:14,219
event on its approach to the sun Thanksgiving
Day, the search is on for what’s left of

4
00:00:14,219 --> 00:00:19,929
it. NASA will use a variety of space and Earth
based telescopes to monitor the comet over

5
00:00:19,929 --> 00:00:25,369
the next several weeks, before the fate of
ISON can be confirmed.

6
00:00:25,369 --> 00:00:29,849
The Orion spacecraft’s protective heat shield
was transported from New England where it’s

7
00:00:29,849 --> 00:00:34,539
been under construction to Kennedy Space Center
– in preparation for Orion's first test

8
00:00:34,539 --> 00:00:39,339
mission in September of next year. The heat
shield will protect Orion from temperatures

9
00:00:39,339 --> 00:00:45,070
as high as five-thousand degrees Fahrenheit
as it reenters our atmosphere at 22-thousand

10
00:00:45,070 --> 00:00:49,630
miles an hour from a high altitude orbit.
It’s the world's largest ablative heat shield

11
00:00:49,630 --> 00:00:54,429
for a spacecraft and is critical for crew
safety.

12
00:00:54,429 --> 00:00:59,739
Blue Origin recently test fired a new hydrogen
and oxygen-fueled rocket engine at the company's

13
00:00:59,739 --> 00:01:05,969
West Texas facility. The test of the BE-3
engine simulated various stages of flight

14
00:01:05,969 --> 00:01:11,259
– including launch, final burn and landing.
In partnership with NASA’s Commercial Crew

15
00:01:11,259 --> 00:01:15,960
Program, Blue Origin is developing vehicles
that could provide transportation services

16
00:01:15,960 --> 00:01:19,369
for humans and cargo to low-Earth orbit.

17
00:01:19,369 --> 00:01:25,920
NASA’s Great Moonbuggy Race is now the Human
Exploration Rover Challenge. This new engineering

18
00:01:25,920 --> 00:01:30,780
design challenge focuses on the agency’s
current plans to explore not just the moon

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00:01:30,780 --> 00:01:35,720
– but planets, asteroids and other bodies
in the solar system … encouraging students

20
00:01:35,720 --> 00:01:41,610
to design, construct and test technologies
for mobility in these environments. The event

21

00:01:41,610 --> 00:01:47,200
takes place April 10-12, next year at the
U. S. Space & Rocket Center in Huntsville,

22
00:01:47,200 --> 00:01:54,619
Alabama. More details are at www.nasa.gov/roverchallenge.

23
00:01:54,619 --> 00:01:59,010
NASA scientist Ed Stone – the principal
investigator of the Voyager mission stopped

24
00:01:59,010 --> 00:02:04,039
by the Steven Colbert show to discuss the
mission – which has seen Voyager 1 surprise

25
00:02:04,039 --> 00:02:09,300
the world by becoming the first human-made
object to reach interstellar space. But Colbert

26
00:02:09,300 --> 00:02:14,520
teamed up with NASA to give Stone another
surprise. The former Jet Propulsion Laboratory

27
00:02:14,520 --> 00:02:19,860
directory was presented the NASA Distinguished
Service Medal – the agency's highest award

28
00:02:19,860 --> 00:02:25,110
for those who have personally made a contribution
representing substantial progress to the NASA

29
00:02:25,110 --> 00:02:27,450
mission.

30
00:02:27,450 --> 00:02:32,320
NASA Associate Administrator Robert Lightfoot
and others in the aerospace community attended

31
00:02:32,320 --> 00:02:36,760
a celebration at Cleveland's Great Lakes

Science Center to mark the 50th anniversary

32
00:02:36,760 --> 00:02:43,530
of the first successful Atlas-Centaur launch
back on November 27, 1963. The Centaur upper

33
00:02:43,530 --> 00:02:47,880
stage - the world’s first liquid hydrogen-fueled
rocket was developed at Glenn Research Center

34
00:02:47,880 --> 00:02:54,130
-- then known as Lewis. The Centaur has sent
spacecraft to every planet in the solar system.

35
00:02:54,130 --> 00:02:58,840
Voyager and most recently MAVEN were launched
by a Centaur.

36
00:02:58,840 --> 00:03:01,040
And that’s what’s up … This Week at
NASA.