

Ф44 СБЛИЖЕНИЕ	T=13:20:21
ЗАПР СБ	ОСК ГСО 12
Б1	А 8 ЗК ОХ 0,000%
ДУС12 1	УТ 0,16 ОУ 0,044%
Р 10,0	ОЗ 0,061%
СВ.00000	РАЗВОРОТ
	ПРС
	Т 0,00°
	Ψ 0,00°
	ϑ 0,00°
	Ψ+ 0,00°
	ϑ+ 0,03°
	Р 0,000
	Р 0,00
Р 0,000км	ΩУ 0,000 0,000
Р 0,00н/с	ΩZ 0,000 0,000
	ИН:ЗАПРЕТ ИКВ

1  
00:00:01,000 --> 00:00:03,800

“Here’s some of the stories trending This Week at NASA!”

2  
00:00:03,800 --> 00:00:11,000

On Aug. 13, NASA conducted a test firing of the RS-25 rocket engine at Stennis Space Center.

3  
00:00:11,000 --> 00:00:16,920

The 535 second test was the sixth in the current series of seven developmental tests of the

4  
00:00:16,920 --> 00:00:18,800

former space shuttle main engine.

5  
00:00:18,800 --> 00:00:23,970

Four RS-25 engines will power the core stage of the new Space Launch System (SLS) rocket,

6  
00:00:23,970 --> 00:00:28,390

which will carry humans deeper into space than ever before, including to an asteroid

7  
00:00:28,390 --> 00:00:29,440

and Mars.

8  
00:00:29,440 --> 00:00:35,020

A pre-test NASA Social featured a discussion with deputy administrator Dava Newman and

9  
00:00:35,020 --> 00:00:41,200

other behind-the-scenes perspectives for the agency’s social media followers.

10  
00:00:41,200 --> 00:00:46,170

On Aug. 10, astronauts onboard the International Space Station had space grown vegetables on

11  
00:00:46,170 --> 00:00:48,450

their menu for the first time ever.

12

00:00:48,450 --> 00:00:56,129

The red romaine lettuce they ate was produced by NASA's Deployable Vegetable Production

13

00:00:56,129 --> 00:01:01,390

System, or Veggie experiment – which provides lighting and nutrients to grow a variety of

14

00:01:01,390 --> 00:01:03,280

plants in space.

15

00:01:03,280 --> 00:01:07,290

The experiment could help astronauts grow food on the journey to Mars, and could help

16

00:01:07,290 --> 00:01:10,830

farmers grow crops more efficiently on Earth.

17

00:01:10,830 --> 00:01:15,120

While veggies were sampled inside the space station, Russian cosmonauts Gennady Padalka

18

00:01:15,120 --> 00:01:19,090

and Mikhail Kornienko conducted a spacewalk on the outside.

19

00:01:19,090 --> 00:01:24,500

The pair retrieved an experiment deployed in 2013 to study space plasma, replaced and

20

00:01:24,500 --> 00:01:29,500

upgraded communications equipment on the Russian segment of the ISS, cleaned residue from the

21

00:01:29,500 --> 00:01:34,440

windows of the Russian service module, and conducted a complete photographic inspection

22

00:01:34,440 --> 00:01:36,260

of the station exterior.

23

00:01:36,260 --> 00:01:41,180

It was the 188th spacewalk in support of space station assembly.

24

00:01:41,180 --> 00:01:45,400

Six months after arriving with three tons of food, fuel and supplies, a Russian Progress

25

00:01:45,400 --> 00:01:50,140

cargo craft undocked from the station on Aug. 14.

26

00:01:50,140 --> 00:01:54,690

Another Progress, which arrived in July, remains docked to the station – with yet another

27

00:01:54,690 --> 00:01:59,850

scheduled to launch Oct. 1 loaded with additional supplies and cargo.

28

00:01:59,850 --> 00:02:04,380

Astronomers have found the smallest supermassive black hole ever detected in the center of

29

00:02:04,380 --> 00:02:05,750

a galaxy.

30

00:02:05,750 --> 00:02:10,720

The discovery of this interstellar oxymoron, made with NASA's Chandra X-ray Observatory

31

00:02:10,720 --> 00:02:16,200

and the Clay Telescope in Chile, could provide clues to how larger black holes formed along

32

00:02:16,200 --> 00:02:20,920

with their host galaxies 13 billion years or more in the past.

33  
00:02:20,920 --> 00:02:25,349  
This black hole is estimated to be less than half the mass of the previously found smallest

34  
00:02:25,349 --> 00:02:27,720  
black hole at the center of a galaxy.

35  
00:02:27,720 --> 00:02:33,920  
Aug. 12 marked the 10-year anniversary of the launch of NASA's Mars Reconnaissance Orbiter,

36  
00:02:33,920 --> 00:02:37,250  
on its mission to study the history of water on Mars.

37  
00:02:37,250 --> 00:02:41,319  
While other Mars missions have shown that water flowed across the Martian surface in

38  
00:02:41,319 --> 00:02:46,370  
the past, MRO's extreme close up imagery looks for proof of whether water was ever

39  
00:02:46,370 --> 00:02:49,069  
around long enough to sustain life.

40  
00:02:49,069 --> 00:02:55,150  
MRO completed its primary science phase in 2008, and continues to yield "bonus science"

41  
00:02:55,150 --> 00:03:00,220  
on its second extended mission, which began in 2012.

42  
00:03:00,220 --> 00:03:04,920  
The sunshield for NASA's James Webb Space Telescope was inspected recently at a Northrop

43  
00:03:04,920 --> 00:03:07,680  
Grumman clean room in southern California.

44  
00:03:07,680 --> 00:03:14,400  
The sunshield uses an effective sun protection factor, or SPF, of 1,000,000 to keep the observatory's

45  
00:03:14,400 --> 00:03:16,750  
sensitive instruments from overheating.

46  
00:03:16,750 --> 00:03:21,460  
By comparison -- sunscreen for humans typically has an SPF of 8 to 50.

47  
00:03:21,460 --> 00:03:27,650  
The annual Perseid meteor shower took place during the overnight hours of August 12 and

48  
00:03:27,650 --> 00:03:31,440  
Aug. 13, with live coverage from Marshall Space Flight Center..

49  
00:03:31,440 --> 00:03:36,980  
The Perseids are associated with the comet Swift-Tuttle, which orbits the sun every 133

50  
00:03:36,980 --> 00:03:38,030  
years.

51  
00:03:38,030 --> 00:03:42,520  
Every August, the Earth passes through a cloud of the comet's debris, which burns up in

52  
00:03:42,520 --> 00:03:47,370  
Earth's atmosphere -- creating one of the best meteor showers of the year.

53  
00:03:47,370 --> 00:03:49,519

And that's what's up this week @NASA ...