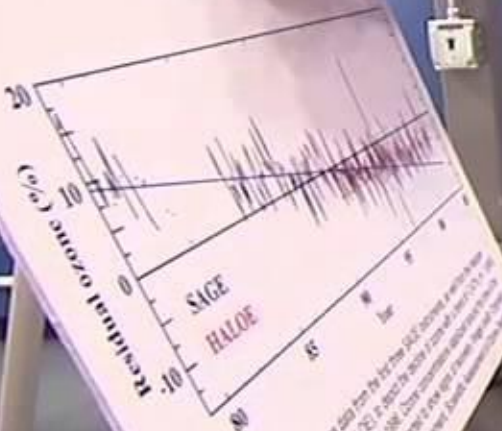


Ozone Trend



This graph combines data from the first two SAGE instruments and the HALOE instrument. The y-axis is Total Ozone (TO) in Dobson Units (DU) and the x-axis is Year. The trend line shows a decrease of approximately 0.5 DU per decade between 1979 and 2006. These instruments were used to measure the total ozone column and were part of the Earth Radiation Budget Experiment (ERBE) mission. The data was collected from 1985 to 2005.



1

00:00:00,909 --> 00:00:04,930

"Here's some of the stories trending This Week at NASA!"

2

00:00:04,930 --> 00:00:09,809

NASA's Cassini spacecraft and the agency's Deep Space Network have yielded evidence that

3

00:00:09,809 --> 00:00:15,299

a large underground ocean of water does indeed exist on Saturn's moon Enceladus -- a theory

4

00:00:15,299 --> 00:00:17,760

formulated in 2005.

5

00:00:17,760 --> 00:00:24,039

Radio frequency and gravity measurements taken as Cassini flies by the moon suggest a large,

6

00:00:24,039 --> 00:00:29,970

possibly regional ocean about 6 miles deep, situated beneath an ice shell about 19 to

7

00:00:29,970 --> 00:00:31,970

25 miles thick.

8

00:00:31,970 --> 00:00:36,350

Evidence of the below-ground ocean validates the inclusion of Enceladus to the list of

9

00:00:36,350 --> 00:00:41,790

possible places in our solar system to contain microbial life.

10

00:00:41,790 --> 00:00:44,309

Having completed all its main mission objectives...

11

00:00:44,309 --> 00:00:50,050

NASA's Lunar Atmosphere and Dust Environment

Explorer or LADEE spacecraft is in the extended

12

00:00:50,050 --> 00:00:54,559

phase of its mission -- orbiting a mile or two above the surface of our moon.

13

00:00:54,559 --> 00:00:59,910

LADEE is in this super-low orbit to gather valuable clues about the moon's dust environment

14

00:00:59,910 --> 00:01:03,340

and its tenuous atmosphere, known as an exosphere.

15

00:01:03,340 --> 00:01:07,980

Per planning, the mission will end when LADEE impacts the moon's surface sometime between

16

00:01:07,980 --> 00:01:10,910

now and late April.

17

00:01:10,910 --> 00:01:15,250

During a Women's History Month event in Northern Virginia, NASA Administrator Charlie Bolden

18

00:01:15,250 --> 00:01:20,470

spoke to members of Women in Aerospace about the contributions women have made to the American

19

00:01:20,470 --> 00:01:25,930

aerospace industry and how NASA continues to benefit from the work of women across the

20

00:01:25,930 --> 00:01:26,930

agency.

21

00:01:26,930 --> 00:01:31,460

He also thanked the organization for promoting science, technology, engineering and math,

22

00:01:31,460 --> 00:01:37,860

or STEM programs and encouraged continued support of NASA's proposed Fiscal Year 2015

23

00:01:37,860 --> 00:01:44,880

budget -- to help the agency maintain its leadership in science and aerospace technology.

24

00:01:44,880 --> 00:01:48,740

Associate Administrator Robert Lightfoot also discussed the budget --- at a meeting with

25

00:01:48,740 --> 00:01:51,410

employees at Langley Research Center.

26

00:01:51,410 --> 00:01:55,520

During the visit, Lightfoot and new Chief Technologist David Miller also viewed the

27

00:01:55,520 --> 00:02:03,570

hardware for the Stratospheric Aerosol and Gas Experiment III on ISS -- or "Sage-3" experiment.

28

00:02:03,570 --> 00:02:08,090

Scheduled to launch to the International Space Station on a SpaceX Dragon spacecraft in early

29

00:02:08,090 --> 00:02:15,700

2015, Sage-3 will measure ozone, water vapor and aerosols in Earth's atmosphere.

30

00:02:15,700 --> 00:02:20,740

At the Spring 2014 Aeronautics and Space Engineering Board meetings in Washington, Administrator

31

00:02:20,740 --> 00:02:26,170

Bolden gave an update on NASA's big picture activities and plans under the FY15 budget

32

00:02:26,170 --> 00:02:27,170

request.

33

00:02:27,170 --> 00:02:32,360

Meanwhile, several other agency officials spoke about NASA activities in specific areas

34

00:02:32,360 --> 00:02:36,880

-- including Aeronautics Research, Space Technology and Science.

35

00:02:36,880 --> 00:02:43,110

The ASEB was established in 1967 to focus talents and energies of the engineering community

36

00:02:43,110 --> 00:02:49,630

on significant aerospace policies, programs and issues of national importance.

37

00:02:49,630 --> 00:02:54,260

During an event at NASA headquarters, a group of international students in a global fellowship

38

00:02:54,260 --> 00:02:59,860

program presented studies they put together, using satellite data and mapping technologies,

39

00:02:59,860 --> 00:03:02,910

to address climate change impacts in their regions.

40

00:03:02,910 --> 00:03:08,610

Sponsored by NASA, the U.S. Agency for International Development and the Association of American

41

00:03:08,610 --> 00:03:14,890

Geographers, the My Community, Our Earth / SERVIR program supports long-term training of young

42

00:03:14,890 --> 00:03:20,569

scholars in the use of space-based observations,

to address climate change issues in developing

43

00:03:20,569 --> 00:03:22,680

regions.

44

00:03:22,680 --> 00:03:28,160

Kennedy Space Center Director Bob Cabana officially welcomed PaR Systems, Incorporated of Shoreview,

45

00:03:28,160 --> 00:03:34,840

Minnesota as a new partner during an April 2 ceremony at Cape Canaveral's Hangar N facility.

46

00:03:34,840 --> 00:03:39,630

NASA wants to retain the unique inventory of nondestructive test and evaluation equipment

47

00:03:39,630 --> 00:03:44,390

at the facility and the capability for current and future mission support.

48

00:03:44,390 --> 00:03:49,600

PaR Systems will operate Hangar N at its own expense and perform nondestructive testing

49

00:03:49,600 --> 00:03:54,640

and other related aerospace, marine and industrial products services.

50

00:03:54,640 --> 00:03:59,600

Partnerships between NASA and other organizations are a key element in Kennedy's transition

51

00:03:59,600 --> 00:04:04,580

from a historically government-only launch facility to a multi-user spaceport for both

52

00:04:04,580 --> 00:04:07,590

government and commercial customers.

53

00:04:07,590 --> 00:04:09,430

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