



1
00:00:07,529 --> 00:00:11,440
This Week At NASA...
“Hey guys!”

2
00:00:11,440 --> 00:00:16,390
President Obama spoke with the crews of space
shuttle Endeavour and the International Space

3
00:00:16,390 --> 00:00:18,810
Station from the Roosevelt Room of the White
House.

4
00:00:18,810 --> 00:00:24,300
“I think I speak for the all young people
here, and everybody back home how proud we

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00:00:24,300 --> 00:00:31,939
are of you, how excited we are about the work
that is being done on the Space Station, and

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00:00:31,939 --> 00:00:38,010
how committed we are to continuing human space
exploration in the future.”

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00:00:38,010 --> 00:00:42,910
The president discussed their missions with
commanders George Zamka and Jeff Williams

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00:00:42,910 --> 00:00:48,129
and their respective STS-130 and Expedition
22 crew members.

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00:00:48,129 --> 00:00:52,320
“Well, thank you very much, Mr. President.
It is a large team effort.\h In front of you,

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00:00:52,320 --> 00:00:58,910
you have the joint crew of Endeavour and the
Space Station, and we are the ones that are

11
00:00:58,910 --> 00:01:04,520
fortunate enough to be able to accomplish
this great mission together in space.\h But

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00:01:04,520 --> 00:01:08,920
there are many thousands of people around
the world that gave the best of themselves,

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00:01:08,920 --> 00:01:12,469
over many years, in order to have the days
that we've been having up here.”

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00:01:12,469 --> 00:01:18,520
Mr. Obama noted the ISS's new era of discovery
and innovation that'll foster scientific

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00:01:18,520 --> 00:01:23,280
breakthroughs through advances in space research
conducted in the station's laboratories.

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00:01:23,280 --> 00:01:29,409
“When we do cellular research for even -- like
for cancer research, for instance, on Earth

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00:01:29,409 --> 00:01:33,719
the cells actually collapse under their own
weight, and so their growth on Earth are a

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00:01:33,719 --> 00:01:38,549
little bit distorted.\h Here, without the
gravity effect, we can grow cells very purely

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00:01:38,549 --> 00:01:41,460
and understand the mechanisms by which they
are replicating.”

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00:01:41,460 --> 00:01:46,159
The president also took special interest in
the station's new cupola. The seven-windowed

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00:01:46,159 --> 00:01:50,610
observation deck, delivered and installed
on the ISS by space shuttle Endeavour's

22
00:01:50,610 --> 00:01:56,670
crew, will host a robotics work station and
has the best view humans in space have ever

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00:01:56,670 --> 00:02:01,860
had of Earth and the stars.
"The amazing work that is being done on

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00:02:01,860 --> 00:02:10,950
the International Space Station not only by
our American astronauts but also by our colleagues

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00:02:10,950 --> 00:02:20,959
from Japan and Russia is just a testimony
to your human ingenuity, a testimony to extraordinary

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00:02:20,959 --> 00:02:30,519
skill and courage you guys bring to bear,
and a testimony to why continued space exploration

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00:02:30,519 --> 00:02:38,040
is so important and is part of the reason
my commitment to NASA is unwavering."

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00:02:38,040 --> 00:02:43,069
Middle school students from Michigan, Florida,
North Carolina and Nebraska in Washington

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00:02:43,069 --> 00:02:48,220
for an engineering competition, and several
dignitaries joined President Obama to ask

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00:02:48,220 --> 00:02:53,050
questions of the orbiting astronauts.
"This is Ruth, coming from North Carolina.

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00:02:53,050 --> 00:03:01,190
-- What are some of the benefits of exploring space as opposed to exploring other places

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00:03:01,190 --> 00:03:04,400
on Earth?”
“Learning about how we, ourselves, work

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00:03:04,400 --> 00:03:10,930
and how we can handle changes if we go somewhere very different than what we're used to is

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00:03:10,930 --> 00:03:15,510
something that's valuable also on Earth.”
This was the second call President Obama has

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00:03:15,510 --> 00:03:21,280
made to the International Space Station. He spoke with the crews of STS-119 and Expedition

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00:03:21,280 --> 00:03:27,340
18 last March.
“Bye, guys!”

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00:03:27,340 --> 00:03:33,500
New findings by NASA's Chandra X-ray Observatory in the Andromeda galaxy have provided a major

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00:03:33,500 --> 00:03:39,310
advance in understanding a type of supernova believed critical to studying dark energy.

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00:03:39,310 --> 00:03:45,620
A zoom into this composite image of Andromeda, also known as M31, shows astronomers that

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00:03:45,620 --> 00:03:53,090
the merger of what's left of two dense stars is the likely cause of many Type Ia supernovas.

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00:03:53,090 --> 00:03:58,769
Type Ia supernovas have been used to measure the accelerated expansion of the universe.

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00:03:58,769 --> 00:04:03,579
Astronomers believe that expansion's being caused by the dark energy they think pervades

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00:04:03,579 --> 00:04:10,560
the universe – and about which they know very little.

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00:04:10,560 --> 00:04:15,909
The telescope aboard NASA's Stratospheric Observatory for Infrared Astronomy, or SOFIA,

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00:04:15,909 --> 00:04:22,520
was successfully activated during a January 15 test flight of almost six hours. Engineers

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00:04:22,520 --> 00:04:27,910
examined the telescope's movement and stability to verify that it could remain locked in on

47
00:04:27,910 --> 00:04:33,680
a celestial object while the aircraft maneuvers in flight. This successful dry-run comes after

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00:04:33,680 --> 00:04:39,060
the telescope's large cavity external door was opened during two test flights in December.

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00:04:39,060 --> 00:04:44,580
These developments pave the way for SOFIA to begin astronomy missions as early as this

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00:04:44,580 --> 00:04:49,970
spring.
A new NASA Web site can help our future explorers

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00:04:49,970 --> 00:04:54,150
and leaders better understand the how's
and why's of climate change – and what

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00:04:54,150 --> 00:05:00,080
they can do to make our planet more habitable.
Called “Climate Kids,” the new Web site

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00:05:00,080 --> 00:05:05,940
is the latest companion to NASA's award-winning
Global Climate Change Web site.

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00:05:05,940 --> 00:05:11,490
Aimed at students in grades 4 through 6, the
multimedia-rich site uses age-appropriate

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00:05:11,490 --> 00:05:16,970
language, games and humorous illustrations
and animations to help break down and understand

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00:05:16,970 --> 00:05:20,080
an important topic most adults find difficult
to grasp.

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00:05:20,080 --> 00:05:23,520
“Kind of far south for a polar bear ain't
you? “

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00:05:23,520 --> 00:05:28,380
“You don't say. Look, my habitat is shrinking
and I obviously fell asleep on the wrong iceberg.”

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00:05:28,380 --> 00:05:33,560
“What you say?”
Climate Kids can be found at <http://climate.nasa.gov/kids>

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00:05:33,560 --> 00:05:45,580
“Godspeed John Glenn!”
Forty-eight years ago, Mercury astronaut John

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00:05:45,580 --> 00:05:50,690
Glenn became the first American to orbit the Earth when an Atlas rocket successfully carried

62
00:05:50,690 --> 00:05:55,870
his Friendship 7 capsule into space.
"Roger. Zero G and I feel fine."

63
00:05:55,870 --> 00:06:00,610
Glenn completed three orbits to usher in a new era of space travel...

64
00:06:00,610 --> 00:06:04,410
"Oh, that view is tremendous!"
...that eventually led to Apollo astronauts

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00:06:04,410 --> 00:06:08,740
walking on the moon by the end of the 1960s.
And that's This Week @ NASA.