



Space **to** Ground

1

00:00:03,090 --> 00:00:05,410

WELCOME TO SPACE TO GROUND, I'M GARY JORDAN.

2

00:00:05,410 --> 00:00:10,940

THIS WEEK, CARGO CONTINUOUSLY COMING AND GOING AS HUMANS CONTINUOUSLY INHABIT THE

3

00:00:10,940 --> 00:00:12,260

NOW 19 YEARS STRONG.

4

00:00:13,820 --> 00:00:19,060

THE JAPANESE HTV-8 CARGO VEHICLE IS SCHEDULED TO DEPART THE STATION ON NOVEMBER 15

5

00:00:19,060 --> 00:00:24,160

IT'S 34 DAY STAY ON THE STATION LOADED WITH TRASH, INCLUDING OLD NICKEL-HYDROGEN BATTERIES

6

00:00:24,160 --> 00:00:26,289

THAT WERE SWAPPED OUT EARLIER THIS YEAR.

7

00:00:26,289 --> 00:00:30,480

THE CARGO VEHICLE WILL BURN UP UPON RE-ENTRY INTO THE EARTH'S ATMOSPHERE OVER THE

8

00:00:31,220 --> 00:00:34,930

ON NOVEMBER 2ND, NORTHROP GRUMMAN'S CYGNUS CARGO VEHICLE WILL LIFT OFF FROM THE V

9

00:00:34,930 --> 00:00:36,329

FLIGHT FACILITY IN VIRGINIA.

10

00:00:36,329 --> 00:00:41,550

A NEW RECORD OF 8,200 POUNDS OF CARGO ON CYGNUS WILL MAKE ITS WAY TO STATION ON TO

11

00:00:41,550 --> 00:00:46,010

NEW ANARES 230+ ROCKET, THAT WILL GIVE THAT MASS THE EXTRA BOOST.

12

00:00:46,010 --> 00:00:49,620

YOU CAN WATCH BOTH OF THESE EVENTS ON NASA TV OR THE AGENCY'S WEBSITE.

13

00:00:50,480 --> 00:00:55,100

NEW CARGO MAKING ITS WAY TO STATION MEANS MORE SCIENCE FOR THE EXPEDITION 61 CREW

14

00:00:55,100 --> 00:00:56,180

TO GET THEIR HANDS ON.

15

00:00:57,140 --> 00:01:01,360

SCIENTIFIC INVESTIGATIONS MAKE UP TWO TONS
OF THE CARGO ABOARD CYGNUS.

16

00:01:01,360 --> 00:01:04,520

INVESTIGATIONS RANGE FROM RADIATION TO SPACE FOOD.

17

00:01:04,520 --> 00:01:09,280

SPECIALIZED TOOLS TO WORK ON THE ALPHA MAGNETIC SPECTROMETER WILL BE USED ON UPCOMING

18

00:01:09,289 --> 00:01:13,429

TO REPAIR THIS EXPERIMENT THAT'S LOOKING
FOR EVIDENCE OF DARK MATTER AND ANTIMATTER.

19

00:01:13,429 --> 00:01:18,270

A SPECIAL VEST CALLED ASTRO RAD MAY SHIELD
ASTRONAUTS ON ARTEMIS MISSIONS AND BEYOND

20

00:01:18,270 --> 00:01:23,099

FROM CERTAIN KINDS OF RADIATION, SO STATION ASTRONAUTS WILL SEE HOW IT FITS AND FEELS

21

00:01:23,099 --> 00:01:28,349

THE ZERO-G OVEN WILL EXAMINE THE ABILITY TO
BAKE FOOD IN SPACE, WHICH MAY PROVIDE PSYCHOLOGICAL

22

00:01:28,349 --> 00:01:32,930

AND PHYSIOLOGICAL BENEFITS FOR ASTRONAUTS ON LUNAR AND DEEP SPACE MISSIONS.

23

00:01:32,930 --> 00:01:36,529

THESE ARE JUST A FEW EXPERIMENTS THAT JOIN
THE THOUSANDS THAT HAVE TAKEN PLACE ABOARD

24

00:01:36,529 --> 00:01:40,680

THE INTERNATIONAL SPACE STATION SINCE THE
FIRST CREW ARRIVED 19 YEARS AGO

25

00:01:40,680 --> 00:01:42,360

ON NOVEMBER 2ND 2000.

26

00:01:42,369 --> 00:01:47,240

WE'RE COUNTING DOWN TO TWENTY YEARS OF CONTINUOUS HUMAN PRESENCE IN 2020, AND THE

27

00:01:47,240 --> 00:01:51,539

YEAR WE'LL BE RECOGNIZING SOME OF THE GREATEST MOMENTS IN SPACE STATION HISTORY, R

28

00:01:51,539 --> 00:01:54,279

NEW AND UNIQUE CONTENT, AND MUCH MORE.

29

00:01:54,279 --> 00:01:58,889

SEE MORE ON HOW YOU CAN ENGAGE WITH #SPACESTATION20.

30

00:01:58,889 --> 00:02:03,159

SEND IN YOUR QUESTIONS ON OUR UPCOMING BROADCASTS AND HERE ON SPACE TO GROUND U