

BOEING

Space**to**Ground



1
00:00:03,100 --> 00:00:06,071
WELCOME TO SPACE TO GROUND, I AM KATHRYN CLAYTON.

2
00:00:06,071 --> 00:00:08,800
THE LAUNCH AND CAPTURE OF SPACEX'S 18TH CARGO

3
00:00:08,800 --> 00:00:12,900
RESUPPLY MISSION WILL BRING MORE SCIENCE,
RESEARCH AND A NEW GATEWAY TO THE

4
00:00:12,900 --> 00:00:14,560
INTERNATIONAL SPACE STATION.

5
00:00:16,260 --> 00:00:19,480
SPACEX-18 LAUNCHED FROM CAPE CANAVERAL ON THURSDAY.

6
00:00:19,490 --> 00:00:23,770
ASTRONAUTS CRISTINA KOCH AND NICK HAGUE ARE SET TO OPERATE THE ROBOTIC ARM TO CAP

7
00:00:23,770 --> 00:00:25,510
THE DRAGON THIS WEEKEND.

8
00:00:25,510 --> 00:00:31,040
DRAGON IS HOLDING MORE THAN 5000 POUNDS OF CARGO INSIDE, INCLUDING SUPPLIES, CRITICA

9
00:00:31,040 --> 00:00:36,379
SPARES, HARDWARE TO SUPPORT RODENT RESEARCH AS WELL AS DOZENS OF BIOLOGY, PHYSIC

10
00:00:36,379 --> 00:00:39,010
MATERIALS SCIENCE INVESTIGATIONS.

11
00:00:39,010 --> 00:00:43,050
DRAGON IS SET TO REMAIN AT THE STATION FOR
ABOUT A MONTH BEFORE RE-ENTERING THE EARTH'S

12
00:00:43,050 --> 00:00:48,600
ATMOSPHERE AND SPLASHING DOWN IN THE PACIFIC OCEAN WITH 3,300 POUNDS OF RETURN CAP

13

00:00:49,600 --> 00:00:54,560

ONE OF THE PRIMARY PAYLOADS ON THE SPACEX-18 IS THE INTERNATIONAL DOCKING ADAPTOR 3

14

00:00:54,560 --> 00:00:55,800

OR IDA-3.

15

00:00:56,720 --> 00:01:02,059

IDA-3 REPRESENTS A GATEWAY TO THE FUTURE FOR EXPLORATION, ALLOWING AMERICA'S FIRST

16

00:01:02,059 --> 00:01:04,250

HUMAN RATED SPACECRAFT SINCE THE SHUTTLE.

17

00:01:04,250 --> 00:01:08,860

IT WILL BE THE 8TH PORT FOR A VISITING VEHICLE AND WILL ALLOW TWO COMMERCIAL CREW VEH

18

00:01:08,860 --> 00:01:11,260

TO DOCK TO THE STATION AT THE SAME TIME.

19

00:01:11,260 --> 00:01:16,960

IDA-3 IS MORE SOPHISTICATED THAN PREVIOUS DOCKING SYSTEMS AND USES LASERS AND SENSORS

20

00:01:16,960 --> 00:01:21,750

TO CONNECT THE STATION TO SPACECRAFTS CREATING AN AUTOMATIC ALIGNMENT AND CONNEC

21

00:01:21,750 --> 00:01:24,230

ALMOST LIKE A CAR THAT CAN PARK ITSELF!

22

00:01:24,230 --> 00:01:28,189

THE NEW DOCKING PORT WILL BE INSTALLED THROUGH A MIX OF GROUND CONTROLLED ROBOTIC

23

00:01:28,189 --> 00:01:30,960

AND A SPACEWALK CURRENTLY SCHEDULED FOR NEXT MONTH.

24

00:01:31,740 --> 00:01:36,590

THE DOZENS OF INVESTIGATIONS SOON-TO-BE DELIVERED TO THE SPACE STATION PROVIDE OPP

25

00:01:36,590 --> 00:01:42,390

FOR OTHER GOVERNMENT AGENCIES, PRIVATE INDUSTRY, AND ACADEMIC AND RESEARCH INSTIT

26

00:01:42,390 --> 00:01:44,909

CONDUCT MICROGRAVITY RESEARCH.

27

00:01:44,909 --> 00:01:49,180

HIGHLIGHTS INCLUDE THE BIOROCK INVESTIGATION WHICH WILL EXAMINE THE INTERACTION BETW

28

00:01:49,180 --> 00:01:54,119

MICROBES AND ROCKS IN MICROGRAVITY AS WELL AS PHYSICAL AND GENETIC CHANGES IN THE M

29

00:01:54,119 --> 00:01:57,759

THIS INFORMATION COULD EVENTUALLY HELP EXPLORERS ON THE MOON OR MARS.

30

00:01:57,759 --> 00:02:03,020

THE BIOFABRICATION FACILITY WILL PROVIDE A
PLATFORM TO PRINT BIOLOGICAL TISSUES, THIS

31

00:02:03,020 --> 00:02:07,189

COULD BE AN IMPORTANT STEP TO 3D PRINTING
USABLE HUMAN ORGANS.

32

00:02:07,189 --> 00:02:11,250

GOODYEAR TIRE WILL INVESTIGATE SILICA ROLLS IN SPACE TO GAIN A BETTER UNDERSTANDING O

33

00:02:11,250 --> 00:02:15,800

ITS STRUCTURES AND PROPERTIES TO IMPROVE TIRE MANUFACTURING AND PERFORMANCE.

34

00:02:15,800 --> 00:02:20,300

ALL OF THE INVESTIGATIONS ON SPACEX 18 REPRESENT SIGNIFICANT DISCOVERIES TO FURTHER

35

00:02:20,300 --> 00:02:23,080

OF MOON AND MARS EXPLORATION.