



Space**to**Ground

1
00:00:03,040 --> 00:00:05,370
"HOUSTON, STATION ON SPACE TO GROUND."

2
00:00:05,370 --> 00:00:07,549
WELCOME TO SPACE TO GROUND, I'M ISIDRO REYNA.

3
00:00:07,549 --> 00:00:11,920
THIS WEEK MARKS THE BEGINNING OF EXPEDITION
64.

4
00:00:11,920 --> 00:00:14,070
TWO VETERAN INTERNATIONAL SPACE STATION CREW
MEMBERS

5
00:00:14,070 --> 00:00:16,440
SWAPPED COMMAND OF THE ORBITING LABORATORY
DURING

6
00:00:16,440 --> 00:00:19,590
A TRADITIONAL CHANGE OF COMMAND CEREMONY ON
OCTOBER 20th.

7
00:00:19,590 --> 00:00:22,020
THE SIX-MEMBER SPACE STATION CREW GATHERED
TOGETHER

8
00:00:22,020 --> 00:00:25,160
WHEN EXPEDITION 63 COMMANDER CHRIS CASSIDY
OF NASA

9
00:00:25,160 --> 00:00:27,300
CEREMONIALLY HANDED CONTROL OF THE STATION

10
00:00:27,300 --> 00:00:31,300
TO EXPEDITION 64 COSMONAUT SERGEY RYZHIKOV
OF ROSCOSMOS.

11
00:00:32,109 --> 00:00:34,590
"WE HAVE THIS SMALL TRADITION, WHERE THERE'S

12
00:00:34,590 --> 00:00:36,940
A KEY TO THE INTERNATIONAL SPACE STATION.

13
00:00:36,940 --> 00:00:39,680
IT'S A TOOL THAT WE USE ON THE RUSSIAN HATCHES

14
00:00:39,680 --> 00:00:41,580
TO OPEN AND CLOSE THE HATCHES.

15
00:00:41,580 --> 00:00:42,680
IT SYMBOLIZES

16
00:00:42,680 --> 00:00:45,960
THE CAMARADERIE THAT WE HAVE BETWEEN

17
00:00:45,960 --> 00:00:49,480
ALL OF THE SPACE AGENCIES, AND SERGEY,

18
00:00:49,480 --> 00:00:51,200
IT'S WITH GREAT PLEASURE AND HONOR THAT

19
00:00:51,200 --> 00:00:54,190
I PRESENT YOU THIS KEY AND COMMAND

20
00:00:54,190 --> 00:00:55,883
OF THE INTERNATIONAL SPACE STATION."

21
00:00:55,883 --> 00:00:57,292
"CONGRATULATIONS!"

22
00:00:58,047 --> 00:01:01,560
RYZHIKOV OFFICIALLY BEGAN HIS COMMAND ON OCTOBER
21st,

23
00:01:01,560 --> 00:01:03,900
WHEN CASSIDY AND FLIGHT ENGINEERS ANATOLY
IVANISHIN

24

00:01:03,900 --> 00:01:07,584

AND IVAN VAGNER UNDOCKED FROM THE STATION.

25

00:01:07,584 --> 00:01:09,720

THE CREW UNDOCKED FROM THE POISK MODULE INSIDE

26

00:01:09,720 --> 00:01:13,790

THE SOYUZ MS-16 CREW SHIP, RE-ENTERED THE
EARTH'S ATMOSPHERE

27

00:01:13,790 --> 00:01:16,250

JUST OVER THREE HOURS LATER AND PARACHUTED

28

00:01:16,250 --> 00:01:18,020

TO A LANDING IN KAZAKHSTAN,

29

00:01:18,020 --> 00:01:21,197

BRINGING THEIR 196 DAY SPACE MISSION TO AN
END.

30

00:01:22,000 --> 00:01:24,920

THIS WEEK'S QUESTION COMES FROM RIDGEDALE
MIDDLE SCHOOL.

31

00:01:24,920 --> 00:01:27,640

STUDENTS WANT TO KNOW IF ASTRONAUTS EVER EXPERIENCE

32

00:01:27,640 --> 00:01:32,030

A LANGUAGE BARRIER WHILE ABOARD THE INTERNATIONAL
SPACE STATION.

33

00:01:32,030 --> 00:01:33,720

A TRULY GLOBAL ENDEAVOR,

34

00:01:33,720 --> 00:01:35,640

THE UNIQUE MICROGRAVITY LABORATORY HAS

35

00:01:35,640 --> 00:01:38,860
HOSTED 240 PEOPLE FROM 19 COUNTRIES,

36
00:01:38,860 --> 00:01:42,740
ALMOST 3,000 EXPERIMENTS FROM OVER 4,200 RESEARCHERS

37
00:01:42,740 --> 00:01:45,210
IN MORE THAN 100 COUNTRIES, AND A VARIETY

38
00:01:45,210 --> 00:01:47,659
OF INTERNATIONAL AND COMMERCIAL SPACECRAFT.

39
00:01:47,659 --> 00:01:49,680
DIFFERENCES OF NATIONALITY AND CULTURE,

40
00:01:49,680 --> 00:01:51,850
AS WELL AS BEING ISOLATED FOR MONTHS AT A
TIME

41
00:01:51,850 --> 00:01:54,799
ON THE INTERNATIONAL SPACE STATION CAN BE
DEMANDING.

42
00:01:54,799 --> 00:01:57,030
BEFORE ASTRONAUTS TRAVEL INTO SPACE,

43
00:01:57,030 --> 00:01:58,670
THEY'RE BRIEFED ON THE CULTURAL DIFFERENCES

44
00:01:58,670 --> 00:02:01,590
THEY MAY ENCOUNTER WITH CREWMEMBERS FROM OTHER
COUNTRIES.

45
00:02:01,590 --> 00:02:04,920
WHILE ENGLISH IS THE PRIMARY LANGUAGE SPOKEN
ABOARD THE STATION,

46
00:02:04,920 --> 00:02:07,668
CREWS MUST ALSO BE PROFICIENT IN THE RUSSIAN

LANGUAGE.