



Spaceto**Ground**

1
00:00:06,630 --> 00:00:04,710
houston station on space to ground

2
00:00:09,350 --> 00:00:06,640
welcome to space to ground i'm nilla for

3
00:00:11,430 --> 00:00:09,360
ramji a vehicle departure studying the

4
00:00:13,589 --> 00:00:11,440
use of magnetic fields and a

5
00:00:16,230 --> 00:00:13,599
thanksgiving message another productive

6
00:00:17,830 --> 00:00:16,240
week aboard the orbiting laboratory

7
00:00:20,230 --> 00:00:17,840
proceeding with release

8
00:00:22,150 --> 00:00:20,240
on saturday november 20th northrop

9
00:00:24,870 --> 00:00:22,160
grumman's cygnus 16th commercial

10
00:00:27,269 --> 00:00:24,880
resupply mission named after former nasa

11
00:00:29,029 --> 00:00:27,279
astronaut ellison onizuka departed the

12
00:00:31,269 --> 00:00:29,039
space station

13
00:00:33,430 --> 00:00:31,279

cygnus will de-orbit in mid-december

14

00:00:35,430 --> 00:00:33,440

following a de-orbit engine firing to

15

00:00:37,190 --> 00:00:35,440

set up a destructive re-entry in which

16

00:00:39,350 --> 00:00:37,200

the spacecraft filled with waste the

17

00:00:41,510 --> 00:00:39,360

space station crew packed will burn up

18

00:00:43,750 --> 00:00:41,520

in the earth's atmosphere

19

00:00:45,910 --> 00:00:43,760

studying the use of magnetic fields to

20

00:00:47,990 --> 00:00:45,920

assemble tiny structures from particles

21

00:00:51,990 --> 00:00:48,000

suspended in a liquid took place this

22

00:00:54,150 --> 00:00:52,000

week with the in space for investigation

23

00:00:55,910 --> 00:00:54,160

in space 4 looks at how colloidal

24

00:00:57,590 --> 00:00:55,920

structures change the properties of

25

00:00:59,990 --> 00:00:57,600

assembled materials such as its

26
00:01:01,910 --> 00:01:00,000
mechanical response to or interaction

27
00:01:04,630 --> 00:01:01,920
with light and heat

28
00:01:07,190 --> 00:01:04,640
microgravity offers a unique opportunity

29
00:01:10,149 --> 00:01:07,200
to observe assembly in ways and over

30
00:01:12,550 --> 00:01:10,159
time skills not possible on earth

31
00:01:15,030 --> 00:01:12,560
results could provide insight into how

32
00:01:18,070 --> 00:01:15,040
to harness nanoparticles to fabricate

33
00:01:20,070 --> 00:01:18,080
and manufacture new materials this work

34
00:01:22,230 --> 00:01:20,080
could also advance the manufacturing of

35
00:01:24,630 --> 00:01:22,240
materials on earth for applications such

36
00:01:26,469 --> 00:01:24,640
as thermal shields sound dampening

37
00:01:29,270 --> 00:01:26,479
devices camouflage

38
00:01:31,590 --> 00:01:29,280

medical diagnostics and possibly even

39

00:01:34,550 --> 00:01:31,600

active cloaking materials space to

40

00:01:35,990 --> 00:01:34,560

ground the expedition 66 crew celebrated

41

00:01:38,149 --> 00:01:36,000

the thanksgiving holiday with a

42

00:01:40,710 --> 00:01:38,159

traditional and international feast

43

00:01:42,469 --> 00:01:40,720

while in microgravity the seven member

44

00:01:44,310 --> 00:01:42,479

crew floated around the thanksgiving

45

00:01:46,630 --> 00:01:44,320

table this year with a wonderful meal

46

00:01:49,350 --> 00:01:46,640

which included roasted turkey candied

47

00:01:51,270 --> 00:01:49,360

yams and cherry blueberry cobbler

48

00:01:53,590 --> 00:01:51,280

astronauts also took a moment to share

49

00:01:55,429 --> 00:01:53,600

their own thanksgiving memories

50

00:01:57,749 --> 00:01:55,439

for me thanksgiving has always been

51
00:02:00,310 --> 00:01:57,759
about spending time with people i love

52
00:02:02,389 --> 00:02:00,320
the most it's a low overhead holiday you

53
00:02:03,990 --> 00:02:02,399
don't have to buy anything or do

54
00:02:05,510 --> 00:02:04,000
anything you just get to hang out at

55
00:02:07,510 --> 00:02:05,520
home and just be with each other which

56
00:02:10,070 --> 00:02:07,520
is why it's my favorite holiday the food

57
00:02:11,830 --> 00:02:10,080
is a big part of it being thankful for

58
00:02:13,990 --> 00:02:11,840
the fact that we we have it and we can

59
00:02:15,350 --> 00:02:14,000
enjoy it but also is a reason to come

60
00:02:16,470 --> 00:02:15,360
together with all of our family and

61
00:02:18,390 --> 00:02:16,480
friends

62
00:02:21,560 --> 00:02:18,400
that's all for today on space to ground

63
00:02:32,790 --> 00:02:21,570

we'll see you next week