



1
00:00:06,869 --> 00:00:03,030
station this is houston are you ready

2
00:00:06,879 --> 00:00:10,150
i'm ready for the event

3
00:00:14,230 --> 00:00:12,150
cbs this morning this is mission control

4
00:00:17,590 --> 00:00:14,240
houston please call the station for a

5
00:00:20,550 --> 00:00:19,269
and this is cbs this morning how do you

6
00:00:24,550 --> 00:00:20,560
hear me

7
00:00:28,870 --> 00:00:25,910
we have you loud and clear from the

8
00:00:31,349 --> 00:00:28,880
international space station

9
00:00:35,350 --> 00:00:31,359
that is so cool

10
00:00:35,360 --> 00:00:41,670
we're going to begin guys come by

11
00:00:47,750 --> 00:00:42,830
in three

12
00:00:50,310 --> 00:00:48,709
i'm here

13
00:00:51,990 --> 00:00:50,320

look at her look at her wedding ring

14

00:01:03,510 --> 00:00:52,000

bouncing around on her because that is

15

00:01:06,310 --> 00:01:05,109

okay guys here we go

16

00:01:07,350 --> 00:01:06,320

standby

17

00:01:09,190 --> 00:01:07,360

three

18

00:01:11,190 --> 00:01:09,200

two

19

00:01:13,429 --> 00:01:11,200

this week we're looking at eye-opening

20

00:01:15,910 --> 00:01:13,439

breakthroughs and not just on earth

21

00:01:17,749 --> 00:01:15,920

astronaut karen nyberg blasted off for

22

00:01:20,469 --> 00:01:17,759

her mission aboard the international

23

00:01:22,630 --> 00:01:20,479

space station in may she'll be there

24

00:01:25,270 --> 00:01:22,640

conducting research until november we

25

00:01:28,789 --> 00:01:25,280

are pleased to have karen nyberg with us

26

00:01:32,950 --> 00:01:28,799

from about 250 miles above the earth

27

00:01:38,950 --> 00:01:35,109

good morning to you i'm happy that i can

28

00:01:42,069 --> 00:01:40,149

we're going to talk to you in a minute

29

00:01:44,630 --> 00:01:42,079

about some of the science experiments

30

00:01:47,429 --> 00:01:44,640

you're conducting but first i have to

31

00:01:50,710 --> 00:01:47,439

say i think you're one cool mom because

32

00:01:53,190 --> 00:01:50,720

you left a three-year-old son jack at

33

00:01:54,870 --> 00:01:53,200

home uh you missed his first day i think

34

00:01:56,550 --> 00:01:54,880

at preschool

35

00:02:00,310 --> 00:01:56,560

how is that being away from your young

36

00:02:04,950 --> 00:02:02,789

of course it's hard but we do have great

37

00:02:07,270 --> 00:02:04,960

communication i send down a video to him

38

00:02:09,350 --> 00:02:07,280

every day that's about 20 seconds long

39

00:02:12,150 --> 00:02:09,360

and my husband sends up pictures and

40

00:02:15,190 --> 00:02:12,160

videos and and our support people at

41

00:02:16,470 --> 00:02:15,200

nasa do the same and so you know there's

42

00:02:18,070 --> 00:02:16,480

there are people in the military who

43

00:02:20,309 --> 00:02:18,080

leave their families all the time so

44

00:02:21,589 --> 00:02:20,319

this is nothing unusual or new

45

00:02:24,229 --> 00:02:21,599

there's people going through it all of

46

00:02:28,229 --> 00:02:26,470

karen i i love looking at you in space

47

00:02:29,270 --> 00:02:28,239

and you have to say we love looking at

48

00:02:31,190 --> 00:02:29,280

your hair

49

00:02:37,750 --> 00:02:31,200

standing straight up it's so cool

50

00:02:41,509 --> 00:02:39,830

yeah it's uh it's it's not too bad to

51
00:02:44,630 --> 00:02:41,519
take care of every so often velcro

52
00:02:44,640 --> 00:02:51,750
what exactly are you doing up there

53
00:02:57,030 --> 00:02:54,710
we have a lot of things going on here uh

54
00:02:59,350 --> 00:02:57,040
the international space station building

55
00:03:01,509 --> 00:02:59,360
was complete uh within the last couple

56
00:03:03,589 --> 00:03:01,519
years and now we're starting to do a lot

57
00:03:06,149 --> 00:03:03,599
of science and

58
00:03:07,509 --> 00:03:06,159
so our day schedule is some science and

59
00:03:09,110 --> 00:03:07,519
also we have maintenance of the space

60
00:03:10,309 --> 00:03:09,120
station just like you would have

61
00:03:11,589 --> 00:03:10,319
maintenance

62
00:03:12,630 --> 00:03:11,599
in your house

63
00:03:13,750 --> 00:03:12,640

and

64

00:03:15,509 --> 00:03:13,760

we're going to have we just had a

65

00:03:17,110 --> 00:03:15,519

russian space walk to do some work

66

00:03:19,830 --> 00:03:17,120

outside of the space station a couple

67

00:03:21,670 --> 00:03:19,840

days ago and then in a couple weeks uh

68

00:03:23,270 --> 00:03:21,680

my crewmates chris and luca will go out

69

00:03:25,030 --> 00:03:23,280

on a spacewalk and then another one the

70

00:03:27,750 --> 00:03:25,040

next week so we have a lot of stuff

71

00:03:30,949 --> 00:03:29,430

karen one of the things that you're

72

00:03:32,550 --> 00:03:30,959

doing up there you're taking you're

73

00:03:34,550 --> 00:03:32,560

doing some experiments looking at the

74

00:03:38,070 --> 00:03:34,560

effects of space on the human body

75

00:03:41,350 --> 00:03:39,910

that's right we actually are looking at

76

00:03:43,670 --> 00:03:41,360

quite a few things one of the things

77

00:03:45,990 --> 00:03:43,680

about living in space is

78

00:03:47,750 --> 00:03:46,000

your body doesn't need things the same

79

00:03:50,390 --> 00:03:47,760

way that it needs them on earth like

80

00:03:52,789 --> 00:03:50,400

your bone structure and we found that

81

00:03:55,110 --> 00:03:52,799

the degradation of bone in astronauts is

82

00:03:56,630 --> 00:03:55,120

way faster than an elderly woman with

83

00:03:58,630 --> 00:03:56,640

osteoporosis

84

00:04:01,350 --> 00:03:58,640

and so we're definitely doing a lot of

85

00:04:04,070 --> 00:04:01,360

study on that we found out recently over

86

00:04:05,910 --> 00:04:04,080

the past few years that several of the

87

00:04:08,390 --> 00:04:05,920

astronauts are coming back after

88

00:04:10,869 --> 00:04:08,400

long-duration space flights with vision

89

00:04:11,910 --> 00:04:10,879

problems degradation in their vision and

90

00:04:14,070 --> 00:04:11,920

we just

91

00:04:19,189 --> 00:04:14,080

just this increment kicked off a whole

92

00:04:22,710 --> 00:04:20,789

can you tell people karen about your

93

00:04:24,150 --> 00:04:22,720

background because you know whenever you

94

00:04:25,830 --> 00:04:24,160

go to a high school reunion there's

95

00:04:27,909 --> 00:04:25,840

always somebody that wins the prize for

96

00:04:29,510 --> 00:04:27,919

coming the furthest that would certainly

97

00:04:31,670 --> 00:04:29,520

be you recently at your high school your

98

00:04:33,110 --> 00:04:31,680

reunion you come from a small town can

99

00:04:34,710 --> 00:04:33,120

you tell us what it was like growing up

100

00:04:39,350 --> 00:04:34,720

for you there and your dreams and

101
00:04:42,469 --> 00:04:41,030
yeah it was great a small town in

102
00:04:44,310 --> 00:04:42,479
central minnesota

103
00:04:45,830 --> 00:04:44,320
and most of the people that i graduated

104
00:04:47,510 --> 00:04:45,840
from high school with i knew since we

105
00:04:50,550 --> 00:04:47,520
started kindergarten there were only

106
00:04:53,270 --> 00:04:50,560
about 30 of us in our graduating class

107
00:04:54,950 --> 00:04:53,280
and so it's kind of a close class in

108
00:04:56,390 --> 00:04:54,960
that in that way when there's only 30

109
00:04:58,310 --> 00:04:56,400
people as opposed to some of the bigger

110
00:04:59,510 --> 00:04:58,320
schools where there's 600 people in in

111
00:05:01,990 --> 00:04:59,520
your class

112
00:05:03,749 --> 00:05:02,000
and i had a lot of great opportunities

113
00:05:06,629 --> 00:05:03,759

going to a school that size and i think

114

00:05:08,230 --> 00:05:06,639

for me it was actually a preferred

115

00:05:10,390 --> 00:05:08,240

school to go to than a bigger one would

116

00:05:11,590 --> 00:05:10,400

have been because it allowed me to not

117

00:05:14,230 --> 00:05:11,600

only

118

00:05:16,390 --> 00:05:14,240

excel in academics but also partake in

119

00:05:18,550 --> 00:05:16,400

sports and music where in a bigger

120

00:05:19,830 --> 00:05:18,560

school i'm not a great athlete and i

121

00:05:21,590 --> 00:05:19,840

probably would not have made the

122

00:05:22,950 --> 00:05:21,600

basketball team and the volleyball team

123

00:05:25,510 --> 00:05:22,960

and the track team

124

00:05:28,550 --> 00:05:25,520

and so in a school that size i was able

125

00:05:30,469 --> 00:05:28,560

to be a member of many teams and get a

126

00:05:33,189 --> 00:05:30,479

well-rounded base that helped me get

127

00:05:35,590 --> 00:05:33,199

where i am today

128

00:05:39,510 --> 00:05:35,600

karen this year half of the newest class

129

00:05:41,510 --> 00:05:39,520

of nasa astronauts are women

130

00:05:44,710 --> 00:05:41,520

what do you think

131

00:05:49,430 --> 00:05:44,720

that means for the way we explore space

132

00:05:53,830 --> 00:05:51,189

yeah i think that's fantastic and i

133

00:05:56,070 --> 00:05:53,840

think it's a natural evolution of things

134

00:05:58,309 --> 00:05:56,080

that eventually more women are starting

135

00:06:01,029 --> 00:05:58,319

to get into the fields you know the

136

00:06:02,710 --> 00:06:01,039

first astronaut class many years ago

137

00:06:04,710 --> 00:06:02,720

they selected all

138

00:06:07,110 --> 00:06:04,720

test pilots and there weren't any women

139

00:06:09,430 --> 00:06:07,120

test pilots at the time and so so the

140

00:06:11,350 --> 00:06:09,440

people they were selecting from was men

141

00:06:13,110 --> 00:06:11,360

and that's why it was men and as we get

142

00:06:14,950 --> 00:06:13,120

more and more women that are excelling

143

00:06:16,790 --> 00:06:14,960

in these areas we're just naturally

144

00:06:18,390 --> 00:06:16,800

going to get more and more women and i

145

00:06:19,510 --> 00:06:18,400

think it's fantastic it just makes

146

00:06:20,629 --> 00:06:19,520

everything

147

00:06:22,710 --> 00:06:20,639

the whole

148

00:06:25,270 --> 00:06:22,720

exploration experience just a lot more

149

00:06:29,350 --> 00:06:25,280

well-rounded to get than as many

150

00:06:34,710 --> 00:06:31,590

karen your bio on twitter reads

151
00:06:35,909 --> 00:06:34,720
astronaut by day aspiring quilter

152
00:06:36,790 --> 00:06:35,919
crafter

153
00:06:40,950 --> 00:06:36,800
artist

154
00:06:45,590 --> 00:06:40,960
runner by night wife and mommy 24 7.

155
00:06:49,909 --> 00:06:47,590
well right now i'm probably slacking on

156
00:06:52,550 --> 00:06:49,919
the wife and mommy part and i'm actually

157
00:06:55,270 --> 00:06:52,560
slacking on the rest of it too

158
00:06:57,589 --> 00:06:55,280
mostly playing astronaut

159
00:06:59,029 --> 00:06:57,599
but i i just like i like to do a lot of

160
00:07:01,589 --> 00:06:59,039
different things and it comes back to

161
00:07:03,110 --> 00:07:01,599
being well-rounded like i talked about

162
00:07:04,870 --> 00:07:03,120
from when i was in high school and being

163
00:07:06,390 --> 00:07:04,880

able to participate in a lot of

164

00:07:07,749 --> 00:07:06,400

different things and i just

165

00:07:10,870 --> 00:07:07,759

you know i think it's important for

166

00:07:13,029 --> 00:07:10,880

people to have hobbies and to have

167

00:07:15,350 --> 00:07:13,039

various things they can do at the end of

168

00:07:17,189 --> 00:07:15,360

the day when they get home from work

169

00:07:19,350 --> 00:07:17,199

things that are relaxing to them to me

170

00:07:21,430 --> 00:07:19,360

it happens to be sewing

171

00:07:23,670 --> 00:07:21,440

i could sew for hours it's very relaxing

172

00:07:26,390 --> 00:07:23,680

for me and i love to create things and

173

00:07:28,150 --> 00:07:26,400

so it's very satisfying to me when i

174

00:07:29,670 --> 00:07:28,160

when i spend some time and create

175

00:07:31,350 --> 00:07:29,680

something especially when i can give it

176

00:07:33,430 --> 00:07:31,360

as a gift it just makes me feel very

177

00:07:35,350 --> 00:07:33,440

good

178

00:07:39,749 --> 00:07:35,360

and quickly what is that ring bouncing

179

00:07:43,430 --> 00:07:41,990

this is my husband's wedding band i have

180

00:07:47,189 --> 00:07:43,440

my husband's wedding band and also a

181

00:07:50,390 --> 00:07:47,199

little charm with the j on it for my son

182

00:07:52,710 --> 00:07:50,400

son jack son jack sanj sun jack um this

183

00:07:54,790 --> 00:07:52,720

is a first for us a first round

184

00:07:58,790 --> 00:07:54,800

karen from space wonderful to talk to

185

00:08:04,869 --> 00:08:00,469

i'm glad you could join us thank have a

186

00:08:13,189 --> 00:08:07,510

that was very cool

187

00:08:17,350 --> 00:08:14,950

karen we have a signature it's nora

188

00:08:20,070 --> 00:08:17,360

o'donnell we have a signature line here

189

00:08:22,869 --> 00:08:20,080

in our program where we say all that

190

00:08:24,629 --> 00:08:22,879

and all that matters and we ask famous

191

00:08:29,589 --> 00:08:24,639

people and celebrities to do it would

192

00:08:33,430 --> 00:08:30,390

sure

193

00:08:37,509 --> 00:08:36,149

sit on my go say all that and all that

194

00:08:45,910 --> 00:08:37,519

matters

195

00:08:50,070 --> 00:08:47,509

nice

196

00:08:52,389 --> 00:08:50,080

thank you so much safe travels

197

00:08:57,030 --> 00:08:52,399

yay karen yeah yeah yeah

198

00:09:01,670 --> 00:08:59,509

station this is houston acr that

199

00:09:04,070 --> 00:09:01,680

concludes the cbs this morning portion

200

00:09:10,790 --> 00:09:04,080

of the event please stand by for a voice

201
00:09:10,800 --> 00:09:16,630
station this is cnn how do you hear me

202
00:09:22,870 --> 00:09:18,470
good morning cnn this is station i have

203
00:09:22,880 --> 00:09:32,310
fantastic

204
00:09:37,430 --> 00:09:35,509
nasa astronaut karen nyberg joined cnn's

205
00:09:40,150 --> 00:09:37,440
leading women live from the

206
00:09:42,310 --> 00:09:40,160
international space station karen we're

207
00:09:44,389 --> 00:09:42,320
absolutely delighted to have you with us

208
00:09:46,870 --> 00:09:44,399
this morning we've received questions

209
00:09:49,990 --> 00:09:46,880
from our audience all over the world via

210
00:09:53,190 --> 00:09:50,000
cnn.com facebook and twitter so let's

211
00:09:57,110 --> 00:09:53,200
get started our first question simeon

212
00:10:00,070 --> 00:09:57,120
birchalla cnn.com commenter asks is a

213
00:10:06,949 --> 00:10:00,080

huge competition for every seat on a

214

00:10:10,710 --> 00:10:08,310

well i i don't know if i'd say

215

00:10:12,310 --> 00:10:10,720

competition definitely everybody that's

216

00:10:15,750 --> 00:10:12,320

in the astronaut office that wants to

217

00:10:17,750 --> 00:10:15,760

fly is very uh very eager to do so even

218

00:10:20,630 --> 00:10:17,760

if they've gone before but generally

219

00:10:23,509 --> 00:10:20,640

it's it's uh it's kind of going in order

220

00:10:26,389 --> 00:10:23,519

of uh when a class is selected

221

00:10:28,710 --> 00:10:26,399

they start flying people from that class

222

00:10:31,110 --> 00:10:28,720

and then it go it depends on what roles

223

00:10:32,550 --> 00:10:31,120

are needed if we need to fly somebody

224

00:10:33,829 --> 00:10:32,560

who's going to be the commander of the

225

00:10:35,430 --> 00:10:33,839

space station

226

00:10:37,670 --> 00:10:35,440

frequently most often that's somebody

227

00:10:39,269 --> 00:10:37,680

who has experience flying if we need

228

00:10:41,829 --> 00:10:39,279

somebody who's going to be doing space

229

00:10:43,829 --> 00:10:41,839

walks we need somebody that can do that

230

00:10:46,230 --> 00:10:43,839

back when we were flying the shuttle

231

00:10:48,710 --> 00:10:46,240

there was a lot more specific tasks

232

00:10:51,190 --> 00:10:48,720

doing robotics ops and the space walks

233

00:10:52,550 --> 00:10:51,200

now on the space station

234

00:10:55,190 --> 00:10:52,560

everybody pretty much has to do

235

00:10:57,829 --> 00:10:55,200

everything and so it's a little

236

00:11:04,150 --> 00:10:57,839

competitive i guess but but your turn

237

00:11:09,910 --> 00:11:05,509

what type of experiments are you

238

00:11:13,990 --> 00:11:11,670

this week we've been doing a lot of

239

00:11:15,829 --> 00:11:14,000

experiments on our ocular health we've

240

00:11:17,750 --> 00:11:15,839

had some or noticed some problems over

241

00:11:19,910 --> 00:11:17,760

the past several years with many of our

242

00:11:21,829 --> 00:11:19,920

astronauts they come back

243

00:11:23,829 --> 00:11:21,839

to earth after three to six months in

244

00:11:25,750 --> 00:11:23,839

space and have

245

00:11:27,590 --> 00:11:25,760

long-term vision problems changes in

246

00:11:29,430 --> 00:11:27,600

their in their vision and so we're

247

00:11:31,269 --> 00:11:29,440

trying to figure out what exactly is

248

00:11:33,829 --> 00:11:31,279

causing that we're doing a number of

249

00:11:36,069 --> 00:11:33,839

tests in fact this week luca and i have

250

00:11:37,750 --> 00:11:36,079

been involved in numerous tests we're

251
00:11:38,949 --> 00:11:37,760
looking doing tonometry looking at the

252
00:11:40,949 --> 00:11:38,959
pressure of the eyes we're doing

253
00:11:43,269 --> 00:11:40,959
ultrasounds to look at the morphology of

254
00:11:45,910 --> 00:11:43,279
the eye we're doing funduscopy to look

255
00:11:48,150 --> 00:11:45,920
at take images of the retina

256
00:11:50,069 --> 00:11:48,160
vision tests so there's a whole suite of

257
00:11:51,350 --> 00:11:50,079
exams that we're doing and we're hoping

258
00:11:54,389 --> 00:11:51,360
that we can

259
00:11:56,389 --> 00:11:54,399
determine exactly what is causing this

260
00:11:58,230 --> 00:11:56,399
and hopefully mitigate the problem

261
00:12:01,110 --> 00:11:58,240
especially if we start longer duration

262
00:12:03,190 --> 00:12:01,120
missions going to mars or um or doing

263
00:12:04,629 --> 00:12:03,200

something else out to an asteroid

264

00:12:06,389 --> 00:12:04,639

anything that's going to take

265

00:12:08,870 --> 00:12:06,399

longer periods of time we really need to

266

00:12:10,949 --> 00:12:08,880

understand this so we don't degrade the

267

00:12:14,470 --> 00:12:10,959

vision of every astronaut that is going

268

00:12:19,590 --> 00:12:17,190

well one cnn commenter marek asks what

269

00:12:22,470 --> 00:12:19,600

do you think of the mars one project

270

00:12:26,870 --> 00:12:22,480

which aims to uh privately settle people

271

00:12:29,829 --> 00:12:28,470

yeah of course i think it would be

272

00:12:31,509 --> 00:12:29,839

interesting i think there are a lot of

273

00:12:33,509 --> 00:12:31,519

challenges and a lot of things that need

274

00:12:35,990 --> 00:12:33,519

to be figured out before that can be a

275

00:12:37,670 --> 00:12:36,000

successful mission that's mars is a long

276

00:12:40,550 --> 00:12:37,680

ways away and

277

00:12:42,710 --> 00:12:40,560

we have have a lot to learn but i'm

278

00:12:43,990 --> 00:12:42,720

guessing eventually that type of thing

279

00:12:45,670 --> 00:12:44,000

you know i don't know how many years

280

00:12:50,069 --> 00:12:45,680

from now will be but that type of thing

281

00:12:56,150 --> 00:12:54,069

floyd moore aged five and campbell of

282

00:12:58,629 --> 00:12:56,160

az challenger both asking the same

283

00:13:00,870 --> 00:12:58,639

question what is it like to sleep in

284

00:13:05,670 --> 00:13:00,880

space and have you ever floated out of

285

00:13:09,430 --> 00:13:07,269

it's actually quite comfortable sleeping

286

00:13:11,990 --> 00:13:09,440

in space we have sleeping bags that are

287

00:13:13,829 --> 00:13:12,000

that we hang from the wall and the first

288

00:13:15,910 --> 00:13:13,839

couple weeks when i was here it was very

289

00:13:17,670 --> 00:13:15,920

important to me to feel like i was

290

00:13:18,550 --> 00:13:17,680

almost laying on something and i would

291

00:13:20,470 --> 00:13:18,560

lay

292

00:13:22,470 --> 00:13:20,480

with my legs up like this

293

00:13:24,710 --> 00:13:22,480

sideways in the sleeping bag so i felt

294

00:13:26,550 --> 00:13:24,720

pressure along my back from one side of

295

00:13:28,710 --> 00:13:26,560

the sleeping bag and i felt pressure on

296

00:13:30,150 --> 00:13:28,720

my legs from the other side and it felt

297

00:13:31,829 --> 00:13:30,160

good because it stretched my back and it

298

00:13:34,069 --> 00:13:31,839

made me feel like i was actually lying

299

00:13:36,949 --> 00:13:34,079

in a bed now i've become a little more

300

00:13:38,870 --> 00:13:36,959

adapted to it and i can just float there

301
00:13:43,590 --> 00:13:38,880
and know i've never floated out of the

302
00:13:52,069 --> 00:13:45,590
question from me have you given up

303
00:13:56,310 --> 00:13:53,670
now sometimes i wear my hair out

304
00:13:58,069 --> 00:13:56,320
sometimes i tie it up i try to

305
00:14:00,470 --> 00:13:58,079
when i'm working in close quarters with

306
00:14:01,910 --> 00:14:00,480
other people i try to keep it to keep it

307
00:14:06,069 --> 00:14:01,920
the main goal is to keep it out of other

308
00:14:12,470 --> 00:14:09,509
under control at women in the air asks

309
00:14:15,670 --> 00:14:12,480
which women astronauts have influenced

310
00:14:20,949 --> 00:14:15,680
you and did you meet any of them as an

311
00:14:24,870 --> 00:14:22,790
yes when i was in high school when i was

312
00:14:27,990 --> 00:14:24,880
certain that being an astronaut is what

313
00:14:30,150 --> 00:14:28,000

my goal was um it was a very important

314

00:14:31,030 --> 00:14:30,160

time when sally ride was making her

315

00:14:36,710 --> 00:14:31,040

first

316

00:14:39,269 --> 00:14:36,720

she really impacted me and also just

317

00:14:41,110 --> 00:14:39,279

looking back i did some research on to

318

00:14:42,550 --> 00:14:41,120

valentina tereshkova when i was in high

319

00:14:44,710 --> 00:14:42,560

school because she was the first female

320

00:14:48,230 --> 00:14:44,720

to fly in space and i actually did meet

321

00:14:50,629 --> 00:14:48,240

her last year for a brief moment before

322

00:14:52,550 --> 00:14:50,639

traveling to baikonur as a backup for

323

00:14:55,189 --> 00:14:52,560

one of the missions and it was just

324

00:14:57,670 --> 00:14:55,199

fantastic opportunity to get to meet her

325

00:15:00,150 --> 00:14:57,680

i never did meet sally ride

326

00:15:01,829 --> 00:15:00,160

i met her sister after her passing but

327

00:15:03,670 --> 00:15:01,839

um it would have been fantastic to meet

328

00:15:05,910 --> 00:15:03,680

her too but i think those two kind of

329

00:15:07,430 --> 00:15:05,920

the firsts those names kind of stick in

330

00:15:11,430 --> 00:15:07,440

your head and i think they really become

331

00:15:16,870 --> 00:15:12,470

fantastic

332

00:15:20,150 --> 00:15:16,880

at n medio s asks do you think there is

333

00:15:26,389 --> 00:15:20,160

intelligent life in space besides the

334

00:15:29,990 --> 00:15:28,230

maybe we could beg to question that one

335

00:15:32,710 --> 00:15:30,000

as well um

336

00:15:34,790 --> 00:15:32,720

i i don't know i don't think i'm uh i

337

00:15:35,749 --> 00:15:34,800

don't think i'm smart enough to know

338

00:15:38,710 --> 00:15:35,759

um

339

00:15:40,629 --> 00:15:38,720

you know that the universe is so big it

340

00:15:42,389 --> 00:15:40,639

it's hard to imagine that there isn't

341

00:15:45,189 --> 00:15:42,399

something out there that's similar to

342

00:15:47,350 --> 00:15:45,199

our solar system and could provide what

343

00:15:50,470 --> 00:15:47,360

what the earth provides for us

344

00:15:53,189 --> 00:15:50,480

but certainly we haven't seen that and

345

00:15:55,030 --> 00:15:53,199

you know maybe someday we will and it's

346

00:15:57,829 --> 00:15:55,040

hard for me to say whether i truly

347

00:15:59,509 --> 00:15:57,839

believe it or not i think it's possible

348

00:16:01,430 --> 00:15:59,519

i don't believe we've seen anything but

349

00:16:05,910 --> 00:16:01,440

i think it's possible that there is is

350

00:16:09,350 --> 00:16:07,509

we've been talking about the experiments

351

00:16:12,069 --> 00:16:09,360

that you're undertaking while you're

352

00:16:14,710 --> 00:16:12,079

there and foo may martin

353

00:16:17,749 --> 00:16:14,720

asks on twitter how much physics and

354

00:16:22,629 --> 00:16:17,759

chemistry taught in high school helps at

355

00:16:27,509 --> 00:16:25,189

i think any type of scientific class or

356

00:16:29,910 --> 00:16:27,519

mathematical class or any class really

357

00:16:31,910 --> 00:16:29,920

that you take is helpful even if you

358

00:16:34,150 --> 00:16:31,920

don't use the specific fundamentals that

359

00:16:36,389 --> 00:16:34,160

you learn in that class there is

360

00:16:38,710 --> 00:16:36,399

something about learning how to learn

361

00:16:40,230 --> 00:16:38,720

that i think is very important in a very

362

00:16:42,550 --> 00:16:40,240

broad spectrum

363

00:16:44,310 --> 00:16:42,560

and the same for for college a lot of

364

00:16:45,749 --> 00:16:44,320

the classes you take you're like you

365

00:16:47,030 --> 00:16:45,759

think to yourself i'm never going to use

366

00:16:49,269 --> 00:16:47,040

this and you know what sometimes you

367

00:16:51,509 --> 00:16:49,279

don't but i think it's the application

368

00:16:53,509 --> 00:16:51,519

of learning how to learn even if you

369

00:16:55,350 --> 00:16:53,519

don't use those fundamentals again that

370

00:16:57,590 --> 00:16:55,360

is the most important but a lot of it

371

00:16:59,269 --> 00:16:57,600

you do use it's good the experiments

372

00:17:01,189 --> 00:16:59,279

that we do here i think it's important

373

00:17:03,350 --> 00:17:01,199

for us to have at least some

374

00:17:05,829 --> 00:17:03,360

understanding even though we are working

375

00:17:07,750 --> 00:17:05,839

directly with the um the investigators

376

00:17:09,350 --> 00:17:07,760

of the the scientific experiments it's

377

00:17:11,110 --> 00:17:09,360

important for us to kind of at least

378

00:17:13,350 --> 00:17:11,120

understand what's going on so we can

379

00:17:18,549 --> 00:17:13,360

help and maybe we can see things and we

380

00:17:22,870 --> 00:17:20,470

you must have had some amazing views

381

00:17:24,710 --> 00:17:22,880

from up there greg wagner on facebook

382

00:17:27,029 --> 00:17:24,720

asks what one place on earth would you

383

00:17:29,190 --> 00:17:27,039

most like to visit uh with only the

384

00:17:34,710 --> 00:17:29,200

knowledge of having seen it from the

385

00:17:37,270 --> 00:17:36,070

oh wow

386

00:17:38,630 --> 00:17:37,280

you know there are so many beautiful

387

00:17:40,230 --> 00:17:38,640

places i don't even know how i would

388

00:17:42,310 --> 00:17:40,240

answer that

389

00:17:44,510 --> 00:17:42,320

i've seen some i've seen some mountain

390

00:17:47,190 --> 00:17:44,520

ranges that are just absolutely

391

00:17:48,390 --> 00:17:47,200

incredible and

392

00:17:49,990 --> 00:17:48,400

you know i'd like to go see some of

393

00:17:52,390 --> 00:17:50,000

those but at the same time i've come

394

00:17:55,029 --> 00:17:52,400

along some coastlines that look just

395

00:17:56,710 --> 00:17:55,039

brehtaking and so

396

00:17:58,549 --> 00:17:56,720

i guess i would have a lot of traveling

397

00:18:01,110 --> 00:17:58,559

to do if i tried to go to every single

398

00:18:04,789 --> 00:18:01,120

place that that i thought looked like a

399

00:18:09,350 --> 00:18:07,590

well cnn mexico commentator louis flores

400

00:18:11,590 --> 00:18:09,360

gonzalez asked if you were offered the

401
00:18:14,150 --> 00:18:11,600
opportunity to take a one-way trip to

402
00:18:19,190 --> 00:18:14,160
the deepest part of the universe will

403
00:18:23,190 --> 00:18:21,350
a one-way trip no

404
00:18:25,830 --> 00:18:23,200
especially the current situation i'm in

405
00:18:26,710 --> 00:18:25,840
with a young son and a husband at home

406
00:18:43,430 --> 00:18:26,720
i

407
00:18:45,990 --> 00:18:43,440
you

408
00:18:48,070 --> 00:18:46,000
read my message or listen to my message

409
00:18:52,789 --> 00:18:48,080
as you are now what continent are you

410
00:18:56,950 --> 00:18:54,310
well let me see we actually have a

411
00:18:59,669 --> 00:18:56,960
program here we are

412
00:19:01,990 --> 00:18:59,679
we just uh passed over the east coast of

413
00:19:04,230 --> 00:19:02,000

south america and we are heading up

414

00:19:06,150 --> 00:19:04,240

towards africa we should be there in

415

00:19:07,669 --> 00:19:06,160

just a couple minutes and then we'll

416

00:19:12,310 --> 00:19:07,679

head up over

417

00:19:16,230 --> 00:19:13,909

in a couple of minutes time that is

418

00:19:18,549 --> 00:19:16,240

absolutely remarkable one quick question

419

00:19:21,190 --> 00:19:18,559

cnn leading women uh co-anchor christy

420

00:19:23,990 --> 00:19:21,200

lustad asked us uh says that you're a

421

00:19:30,070 --> 00:19:24,000

bit of a diy design keep she hears do

422

00:19:33,909 --> 00:19:31,990

i have been uh

423

00:19:36,789 --> 00:19:33,919

trying to do a little bit finding the

424

00:19:38,789 --> 00:19:36,799

free time it's amazing time goes so fast

425

00:19:40,310 --> 00:19:38,799

and in the on the in the weekdays in the

426

00:19:42,950 --> 00:19:40,320

evenings there's absolutely no time for

427

00:19:44,710 --> 00:19:42,960

that sundays is really my day and i

428

00:19:46,630 --> 00:19:44,720

actually got a few things out the other

429

00:19:48,710 --> 00:19:46,640

day and drew up a design on a piece of

430

00:19:50,789 --> 00:19:48,720

paper and cut up some old t-shirts and

431

00:19:52,310 --> 00:19:50,799

have started sewing things together i'm

432

00:19:53,909 --> 00:19:52,320

not quite sure exactly how it's going to

433

00:19:55,510 --> 00:19:53,919

turn out but

434

00:19:58,150 --> 00:19:55,520

i have spent a little bit of time and i

435

00:19:59,669 --> 00:19:58,160

have the supplies so i'm ready to uh

436

00:20:01,590 --> 00:19:59,679

when i when i find the time to sit there

437

00:20:05,270 --> 00:20:01,600

and do that only hopefully i'll get

438

00:20:09,750 --> 00:20:07,510

karen nyberg joining us from the

439

00:20:11,350 --> 00:20:09,760

international space station this morning

440

00:20:13,270 --> 00:20:11,360

karen it's been an absolute pleasure

441

00:20:19,430 --> 00:20:13,280

thank you very much indeed on behalf of

442

00:20:25,990 --> 00:20:21,190

thank you so much it was nice talking to

443

00:20:32,630 --> 00:20:28,789

station this is houston acr thank you

444

00:20:37,669 --> 00:20:35,350

thank you to cbs this morning and cnn