



1
00:00:06,869 --> 00:00:02,389
station this is houston are you ready

2
00:00:12,629 --> 00:00:10,470
houston station i'm ready for the event

3
00:00:19,429 --> 00:00:12,639
lisa this is mission control houston

4
00:00:24,790 --> 00:00:21,830
station this is isa journey at issa

5
00:00:28,230 --> 00:00:24,800
australia in rome we're here with ansel

6
00:00:31,109 --> 00:00:28,240
messagero wyatt and adityvoo

7
00:00:32,709 --> 00:00:31,119
and give the mind to enrique battifolia

8
00:00:36,790 --> 00:00:32,719
for the first question sorry how can you

9
00:00:43,590 --> 00:00:39,190
loud and clear

10
00:00:52,310 --> 00:00:45,270
you know the mighty enrique betty foley

11
00:00:57,350 --> 00:00:53,590
this is erica

12
00:01:01,750 --> 00:00:59,590
my first question is this

13
00:01:02,950 --> 00:01:01,760

your second spacewalk was very

14

00:01:05,830 --> 00:01:02,960

adventurous

15

00:01:09,270 --> 00:01:08,070

we're trying to understand what happened

16

00:01:13,109 --> 00:01:09,280

but

17

00:01:15,830 --> 00:01:13,119

if you were to have the go ahead for

18

00:01:18,950 --> 00:01:15,840

resuming a spacewalk what would you need

19

00:01:18,960 --> 00:01:22,630

hi enrique welcome aboard

20

00:01:26,950 --> 00:01:25,030

yes right now we are still in the

21

00:01:29,510 --> 00:01:26,960

troubleshooting

22

00:01:31,270 --> 00:01:29,520

phase we have eliminated a lot of the uh

23

00:01:32,469 --> 00:01:31,280

possible sources

24

00:01:35,030 --> 00:01:32,479

of cooling

25

00:01:36,789 --> 00:01:35,040

fluid that came into the helmet so we're

26

00:01:42,870 --> 00:01:36,799

proceeding very well

27

00:01:44,390 --> 00:01:42,880

chris and i are very ready to resume

28

00:01:47,030 --> 00:01:44,400

where we left off

29

00:01:47,990 --> 00:01:47,040

we have all the equipment ready

30

00:01:49,830 --> 00:01:48,000

therefore

31

00:02:07,109 --> 00:01:49,840

as soon as

32

00:02:10,869 --> 00:02:08,630

from around the station all the various

33

00:02:13,510 --> 00:02:10,879

components that we took out the first

34

00:02:15,750 --> 00:02:13,520

time that we uh stowed back in

35

00:02:17,910 --> 00:02:15,760

after the interruption and after that

36

00:02:19,910 --> 00:02:17,920

after a few days we would be able to go

37

00:02:25,910 --> 00:02:19,920

out again and we would be very happy to

38

00:02:29,030 --> 00:02:27,270

my second question

39

00:02:31,430 --> 00:02:29,040

it's a little lighter

40

00:02:49,030 --> 00:02:31,440

i wanted to ask you

41

00:02:53,430 --> 00:02:51,750

yeah more than it took finished

42

00:02:55,750 --> 00:02:53,440

moving all the elements all the

43

00:02:57,589 --> 00:02:55,760

materials from the tv

44

00:02:59,589 --> 00:02:57,599

from atv

45

00:03:02,630 --> 00:02:59,599

albert einstein when we took all the

46

00:03:10,229 --> 00:03:02,640

materials inside i was in charge of

47

00:03:14,869 --> 00:03:13,030

by offering an italian dinner so

48

00:03:16,869 --> 00:03:14,879

practically

49

00:03:19,430 --> 00:03:16,879

in that occasion there were six of us i

50

00:03:20,229 --> 00:03:19,440

offered a first course a second course

51

00:03:23,190 --> 00:03:20,239

so

52

00:03:25,589 --> 00:03:23,200

i utilized almost my entire ration of

53

00:03:27,270 --> 00:03:25,599

italian food fortunately there's still a

54

00:03:28,070 --> 00:03:27,280

little bit left that i'm going to show

55

00:03:30,830 --> 00:03:28,080

you

56

00:03:33,670 --> 00:03:30,840

i still have one

57

00:03:36,070 --> 00:03:33,680

lasagna perhaps i'll have it on a sunday

58

00:03:38,390 --> 00:03:36,080

so that i can remind myself how to eat

59

00:03:41,030 --> 00:03:38,400

in italy on sunday and then i still have

60

00:03:44,149 --> 00:03:41,040

a tiramisu

61

00:03:45,830 --> 00:03:44,159

sure

62

00:03:48,070 --> 00:03:45,840

i'm going to be able to eat because

63

00:03:52,470 --> 00:03:48,080

karen

64

00:04:11,509 --> 00:03:54,070

so perhaps i will give it to her since

65

00:04:18,069 --> 00:04:14,149

what did the two space walks add to your

66

00:04:21,990 --> 00:04:20,069

um

67

00:04:23,110 --> 00:04:22,000

well it's it's hard to answer this

68

00:04:25,590 --> 00:04:23,120

question

69

00:04:28,710 --> 00:04:25,600

i i think that the search for the

70

00:04:30,310 --> 00:04:28,720

infinite is is like infinite itself it

71

00:04:33,990 --> 00:04:30,320

should never end and it's important that

72

00:04:35,990 --> 00:04:34,000

it should be that way so now

73

00:04:38,150 --> 00:04:36,000

if nothing else they increase my

74

00:04:39,430 --> 00:04:38,160

appetite because i

75

00:04:41,670 --> 00:04:39,440

have seen

76

00:04:43,909 --> 00:04:41,680

what it's possible to see on orbit what

77

00:04:47,030 --> 00:04:43,919

you can see when you leave the station

78

00:04:49,909 --> 00:04:47,040

ahead this extraordinary opportunity so

79

00:04:51,030 --> 00:04:49,919

if nothing else i'm even hungrier

80

00:04:53,189 --> 00:04:51,040

for these

81

00:04:54,310 --> 00:04:53,199

visions and these experiences therefore

82

00:04:58,310 --> 00:04:54,320

definitely

83

00:05:03,270 --> 00:05:01,270

to be able to do well and to continue in

84

00:05:06,070 --> 00:05:03,280

my research

85

00:05:13,029 --> 00:05:06,080

and possibly repeat experiences such as

86

00:05:18,070 --> 00:05:15,749

there are europeans japanese russians

87

00:05:22,550 --> 00:05:18,080

americans

88

00:05:29,909 --> 00:05:24,469

that is it easy to look at the earth

89

00:05:29,919 --> 00:05:33,189

it's a vision

90

00:05:36,790 --> 00:05:34,870

it's a little bit of a doppler vision in

91

00:05:40,310 --> 00:05:36,800

the sense that here on board

92

00:05:42,790 --> 00:05:40,320

we are one team one crew we're working

93

00:05:45,830 --> 00:05:42,800

towards the same goal research

94

00:05:49,430 --> 00:05:45,840

technology and science therefore

95

00:05:51,189 --> 00:05:49,440

we're all explorers in the spacecraft

96

00:05:52,870 --> 00:05:51,199

and we all think about the future we all

97

00:05:55,510 --> 00:05:52,880

look forward

98

00:06:01,029 --> 00:05:58,550

we have this other incredible occasion

99

00:06:03,270 --> 00:06:01,039

to look outside the window and look at

100

00:06:05,670 --> 00:06:03,280

the world so from here like you said

101
00:06:07,990 --> 00:06:05,680
it's true there are no borders

102
00:06:09,510 --> 00:06:08,000
for 400 kilometers

103
00:06:12,230 --> 00:06:09,520
altitude

104
00:06:14,070 --> 00:06:12,240
only the highest mountains have a relief

105
00:06:16,710 --> 00:06:14,080
but valleys

106
00:06:18,469 --> 00:06:16,720
rivers everything looks like a continuum

107
00:06:20,790 --> 00:06:18,479
the countries

108
00:06:23,909 --> 00:06:20,800
particularly the the internal countries

109
00:06:26,390 --> 00:06:23,919
in europe and africa in asia

110
00:06:27,909 --> 00:06:26,400
united states the central states that

111
00:06:30,070 --> 00:06:27,919
don't have a coastline are

112
00:06:31,670 --> 00:06:30,080
indistinguishable one from the other

113
00:06:49,110 --> 00:06:31,680

because these borders that we have

114

00:07:00,950 --> 00:06:54,420

[Music]

115

00:07:04,950 --> 00:07:02,550

breaking some records like being the

116

00:07:08,710 --> 00:07:04,960

first italian to walk in space what

117

00:07:10,390 --> 00:07:08,720

other records do you want to achieve

118

00:07:11,830 --> 00:07:10,400

well you're up there

119

00:07:14,629 --> 00:07:11,840

thank you for your question thank you

120

00:07:17,670 --> 00:07:14,639

for giving me a record i'm not here to

121

00:07:19,670 --> 00:07:17,680

break any records we are we're not here

122

00:07:21,510 --> 00:07:19,680

looking for the guinness

123

00:07:22,870 --> 00:07:21,520

or for an honorary mention we're here at

124

00:07:24,629 --> 00:07:22,880

work so

125

00:07:26,950 --> 00:07:24,639

i would say that it's not important to

126

00:07:29,510 --> 00:07:26,960

be the first the last it's important to

127

00:07:32,309 --> 00:07:29,520

be someone who has done a good work and

128

00:07:34,790 --> 00:07:32,319

i hope to be able to be in that category

129

00:07:36,950 --> 00:07:34,800

then obviously here on station for me

130

00:07:38,790 --> 00:07:36,960

everything is the first time

131

00:07:40,950 --> 00:07:38,800

so

132

00:07:43,110 --> 00:07:40,960

in a little while i will see the htv

133

00:07:45,749 --> 00:07:43,120

this the japanese spacecraft which will

134

00:07:48,550 --> 00:07:45,759

arrive this week and i will see a

135

00:07:49,430 --> 00:07:48,560

grapple for the first time i will not be

136

00:08:07,110 --> 00:07:49,440

the

137

00:08:11,350 --> 00:08:08,790

i think it would be

138

00:08:12,469 --> 00:08:11,360

important to have this ability and then

139

00:08:13,589 --> 00:08:12,479

for the future

140

00:08:15,670 --> 00:08:13,599

like you said

141

00:08:19,670 --> 00:08:15,680

the future is open

142

00:08:25,510 --> 00:08:23,110

i i still expect many possibilities a

143

00:08:27,430 --> 00:08:25,520

lot of new things for the months that i

144

00:08:29,430 --> 00:08:27,440

have left here i would like to be able

145

00:08:31,589 --> 00:08:29,440

to continue

146

00:08:32,709 --> 00:08:31,599

to have a good experience a positive

147

00:08:35,029 --> 00:08:32,719

experience

148

00:08:42,230 --> 00:08:35,039

like i have so far and then to continue

149

00:08:47,110 --> 00:08:44,630

the second question was for the

150

00:08:50,230 --> 00:08:47,120

future further down the line for all the

151
00:08:51,670 --> 00:08:50,240
uh ambitious missions

152
00:08:54,710 --> 00:08:51,680
such as the

153
00:08:57,110 --> 00:08:54,720
conquest of mars

154
00:08:59,990 --> 00:08:57,120
or building an asteroid

155
00:09:02,389 --> 00:09:00,000
a spacecraft that will uh maneuver

156
00:09:04,230 --> 00:09:02,399
asteroids if you were to choose which

157
00:09:15,110 --> 00:09:04,240
one would you like to participate in and

158
00:09:18,150 --> 00:09:16,790
of course the idea of going to mars and

159
00:09:21,350 --> 00:09:18,160
colonizing it

160
00:09:22,710 --> 00:09:21,360
is a an extremely fascinating idea very

161
00:09:24,310 --> 00:09:22,720
intriguing

162
00:09:27,110 --> 00:09:24,320
and the idea

163
00:09:28,790 --> 00:09:27,120

of going with a spacecraft to capture an

164

00:09:30,150 --> 00:09:28,800

asteroid and bringing it back is

165

00:09:31,750 --> 00:09:30,160

something

166

00:09:33,750 --> 00:09:31,760

that right now sounds like science

167

00:09:36,790 --> 00:09:33,760

fiction even if possible i would

168

00:09:38,870 --> 00:09:36,800

volunteer for any of these explorations

169

00:09:39,829 --> 00:09:38,880

uh going to the moon going back to the

170

00:09:42,630 --> 00:09:39,839

moon

171

00:09:44,389 --> 00:09:42,640

for a colonization program i would

172

00:09:45,990 --> 00:09:44,399

volunteer for any of these

173

00:09:55,750 --> 00:09:46,000

because this is my job

174

00:10:01,990 --> 00:09:57,750

there are international agencies like

175

00:10:07,030 --> 00:10:02,000

the italian space agency which

176

00:10:11,269 --> 00:10:09,350

very precise so my job is to support

177

00:10:13,030 --> 00:10:11,279

that policy

178

00:10:15,670 --> 00:10:13,040

with the italian space agency and the

179

00:10:16,790 --> 00:10:15,680

european space agency but in reality

180

00:10:21,670 --> 00:10:16,800

the the

181

00:10:24,630 --> 00:10:23,030

so in the end

182

00:10:28,150 --> 00:10:24,640

i will follow

183

00:10:34,310 --> 00:10:30,550

will decide

184

00:10:53,190 --> 00:10:36,310

and i will be happy to be on board of

185

00:11:00,310 --> 00:10:56,550

to reveal some secrets of a space f

186

00:11:02,230 --> 00:11:00,320

reporter photographer usually

187

00:11:04,710 --> 00:11:02,240

things are moving and you're still

188

00:11:06,630 --> 00:11:04,720

whereas here you're the one who's moving

189

00:11:08,470 --> 00:11:06,640

while the earth is beneath you so what

190

00:11:11,350 --> 00:11:08,480

techniques do you use

191

00:11:18,790 --> 00:11:11,360

and what's it like to be able to see

192

00:11:22,310 --> 00:11:20,550

in my opinion is that i don't feel like

193

00:11:24,069 --> 00:11:22,320

a photo reporter and i don't feel like

194

00:11:25,509 --> 00:11:24,079

i'm particularly good either

195

00:11:37,990 --> 00:11:25,519

on earth i don't have a lot of

196

00:11:42,550 --> 00:11:40,230

such as such a beautiful subject as the

197

00:11:43,590 --> 00:11:42,560

earth which is always perfect always

198

00:11:44,790 --> 00:11:43,600

different

199

00:11:46,310 --> 00:11:44,800

and yet

200

00:11:49,509 --> 00:11:46,320

in a manner of speaking

201
00:11:52,389 --> 00:11:51,110
with some details that we cannot see the

202
00:11:54,230 --> 00:11:52,399
first time around

203
00:11:57,670 --> 00:11:54,240
i'm very lucky because here on station

204
00:12:00,230 --> 00:11:57,680
we have some fantastic equipment uh at

205
00:12:01,509 --> 00:12:00,240
every astronaut's disposal we own them so

206
00:12:03,670 --> 00:12:01,519
here for example

207
00:12:05,670 --> 00:12:03,680
i have a camera

208
00:12:07,350 --> 00:12:05,680
out of the ones that we have available

209
00:12:09,509 --> 00:12:07,360
for astronauts

210
00:12:12,389 --> 00:12:09,519
which has one of my favorite lenses

211
00:12:15,430 --> 00:12:12,399
which is a 400 millimeter lens which is

212
00:12:18,150 --> 00:12:15,440
a lens that i use to zoom

213
00:12:19,509 --> 00:12:18,160

on very small details

214

00:12:21,509 --> 00:12:19,519

to be able to

215

00:12:34,150 --> 00:12:21,519

enhance the beauty

216

00:12:37,269 --> 00:12:36,069

however sometimes some details are worth

217

00:12:39,190 --> 00:12:37,279

capturing

218

00:12:41,829 --> 00:12:39,200

so the best way the technique that i

219

00:12:42,870 --> 00:12:41,839

utilize is to snap a lot of photos and

220

00:12:44,550 --> 00:12:42,880

then

221

00:12:47,829 --> 00:12:44,560

choose the ones that come out better and

222

00:12:54,470 --> 00:12:47,839

then the other lens that i like to use

223

00:12:59,750 --> 00:12:57,990

this camera with a 50 millimeter lens so

224

00:13:02,389 --> 00:12:59,760

this gives a good

225

00:13:05,350 --> 00:13:02,399

idea of the view the way we see it from

226

00:13:08,470 --> 00:13:07,430

so these are perhaps the

227

00:13:10,310 --> 00:13:08,480

most

228

00:13:12,790 --> 00:13:10,320

inspiring views you can see the

229

00:13:14,870 --> 00:13:12,800

curvature of the earth the atmosphere

230

00:13:17,590 --> 00:13:14,880

and then blackness right past the

231

00:13:20,470 --> 00:13:17,600

atmosphere this absolute black that may

232

00:13:22,870 --> 00:13:20,480

be scary which to me is fascinating so

233

00:13:25,190 --> 00:13:22,880

perhaps this is the lens that

234

00:13:26,949 --> 00:13:25,200

most of all gives the best idea the most

235

00:13:28,710 --> 00:13:26,959

immediate idea of what it's like to be

236

00:13:31,350 --> 00:13:28,720

on the space station

237

00:13:36,470 --> 00:13:31,360

and see the earth going beneath us at

238

00:13:42,150 --> 00:13:38,629

my second question is this

239

00:13:43,670 --> 00:13:42,160

if you were assigned to a second mission

240

00:13:47,030 --> 00:13:43,680

what would you leave

241

00:13:49,190 --> 00:13:47,040

of your actual of your current equipment

242

00:13:51,350 --> 00:13:49,200

and what would you bring with you next

243

00:13:53,190 --> 00:13:51,360

time

244

00:13:56,790 --> 00:13:53,200

great question

245

00:13:59,509 --> 00:13:56,800

i realized that i brought with me

246

00:14:01,590 --> 00:13:59,519

a lot of things that i don't need

247

00:14:03,430 --> 00:14:01,600

also because here on session there's

248

00:14:05,110 --> 00:14:03,440

seriously everything

249

00:14:06,230 --> 00:14:05,120

so little utensils that i brought with

250

00:14:08,870 --> 00:14:06,240

me

251
00:14:11,350 --> 00:14:08,880
that i realize i don't need

252
00:14:12,790 --> 00:14:11,360
okay

253
00:14:22,310 --> 00:14:12,800
a lot of food

254
00:14:25,430 --> 00:14:23,670
a little bit

255
00:14:27,670 --> 00:14:25,440
to remind yourself of your own country

256
00:14:30,389 --> 00:14:27,680
that's fine but but really

257
00:14:32,069 --> 00:14:30,399
i realized that you can live in in a

258
00:14:34,389 --> 00:14:32,079
very spartan way

259
00:14:35,189 --> 00:14:34,399
if you if i were to have this experience

260
00:14:37,189 --> 00:14:35,199
again

261
00:14:39,350 --> 00:14:37,199
i would try to have this little

262
00:14:43,350 --> 00:14:39,360
experiment too

263
00:14:47,509 --> 00:14:45,910

as as little as i can as the colonists

264

00:14:49,509 --> 00:14:47,519

one day will do when they explore new

265

00:14:52,389 --> 00:14:49,519

planets that will really need to be able

266

00:14:54,550 --> 00:14:52,399

to live with just a little bit if ice

267

00:14:56,870 --> 00:14:54,560

we're allowed to bring something

268

00:14:58,310 --> 00:14:56,880

different next time

269

00:14:59,189 --> 00:14:58,320

the only thing that i really miss right

270

00:15:02,389 --> 00:14:59,199

now

271

00:15:04,710 --> 00:15:02,399

are my daughters so

272

00:15:06,389 --> 00:15:04,720

so maybe it would be asking too much but

273

00:15:08,629 --> 00:15:06,399

i would love to have my family with me

274

00:15:09,829 --> 00:15:08,639

that would really be a dream i know that

275

00:15:11,670 --> 00:15:09,839

it cannot be

276

00:15:12,389 --> 00:15:11,680

realized but i know that maybe in the

277

00:15:14,710 --> 00:15:12,399

future

278

00:15:16,629 --> 00:15:14,720

the colonists that will leave for

279

00:15:19,110 --> 00:15:16,639

exploration to

280

00:15:24,069 --> 00:15:19,120

further planets will have this amazing

281

00:15:27,990 --> 00:15:26,710

on behalf of everyone i would like to

282

00:15:31,030 --> 00:15:28,000

ask if you could

283

00:15:31,040 --> 00:15:34,230

weightless condition

284

00:15:37,430 --> 00:15:35,350

and something else

285

00:15:40,310 --> 00:15:37,440

after a couple of months of uh

286

00:15:42,470 --> 00:15:40,320

weightlessness do you miss anything or

287

00:15:43,590 --> 00:15:42,480

do you miss anything from world with

288

00:15:45,829 --> 00:15:43,600

gravity

289

00:15:48,629 --> 00:15:45,839

the only thing that uh

290

00:15:51,110 --> 00:15:48,639

um here on orbit uh problematic in a

291

00:15:54,230 --> 00:15:51,120

sense is a problem without

292

00:15:57,670 --> 00:15:54,240

weight is the idea that somebody someone

293

00:15:59,430 --> 00:15:57,680

like me is losing everything

294

00:16:03,749 --> 00:15:59,440

i'm already

295

00:16:05,670 --> 00:16:03,759

wife knows very well that sometimes she

296

00:16:09,670 --> 00:16:05,680

has to find me

297

00:16:12,069 --> 00:16:09,680

help help me find my keys my glasses

298

00:16:14,150 --> 00:16:12,079

because i have the terrible

299

00:16:15,829 --> 00:16:14,160

habit of putting everything everywhere

300

00:16:17,829 --> 00:16:15,839

so here in station

301
00:16:20,629 --> 00:16:17,839
if you're not really methodical it's

302
00:16:22,629 --> 00:16:20,639
really easy to lose everything

303
00:16:25,189 --> 00:16:22,639
because not only is it possible to put

304
00:16:26,870 --> 00:16:25,199
something on a wall

305
00:16:29,110 --> 00:16:26,880
on the ceiling

306
00:16:30,470 --> 00:16:29,120
but it's also easy for it to come off

307
00:16:32,150 --> 00:16:30,480
and fly somewhere

308
00:16:34,230 --> 00:16:32,160
so perhaps

309
00:16:37,990 --> 00:16:34,240
that's the only part

310
00:16:41,910 --> 00:16:40,230
that can be a little problematic but for

311
00:17:00,730 --> 00:16:41,920
everything else that gravity i don't

312
00:17:05,270 --> 00:17:03,030
[Music]

313
00:17:08,710 --> 00:17:05,280

a space station

314

00:17:13,669 --> 00:17:11,429

a new colleague will arrive

315

00:17:15,829 --> 00:17:13,679

a little particular a little robot if

316

00:17:18,549 --> 00:17:15,839

i'm not mistaken

317

00:17:20,949 --> 00:17:18,559

there's another one an american robot on

318

00:17:25,270 --> 00:17:20,959

board how do you how do you think about

319

00:17:27,350 --> 00:17:25,280

robots in space for the future

320

00:17:30,150 --> 00:17:27,360

probiology robonaut

321

00:17:33,510 --> 00:17:30,160

just today robonaut is helping us with

322

00:17:36,390 --> 00:17:33,520

an experiment in the american lab

323

00:17:38,150 --> 00:17:36,400

it's working with especially

324

00:17:39,190 --> 00:17:38,160

with a special set of

325

00:17:42,150 --> 00:17:39,200

instruments

326

00:17:43,590 --> 00:17:42,160

which we uh put in front of him

327

00:17:44,710 --> 00:17:43,600

so that on earth

328

00:17:47,909 --> 00:17:44,720

he can be

329

00:17:50,310 --> 00:17:47,919

controlled to perform some actions

330

00:17:52,950 --> 00:17:50,320

the little japanese robot that is

331

00:17:54,870 --> 00:17:52,960

arriving with the htv i haven't been

332

00:17:56,230 --> 00:17:54,880

trained on it but my colleague karen

333

00:17:58,950 --> 00:17:56,240

nyberg

334

00:18:00,789 --> 00:17:58,960

is going to be responsible

335

00:18:02,630 --> 00:18:00,799

for the experiment with this robot for

336

00:18:05,830 --> 00:18:02,640

the future i see very well integration

337

00:18:07,430 --> 00:18:05,840

between robots and men

338

00:18:10,470 --> 00:18:07,440

particularly robots

339

00:18:12,549 --> 00:18:10,480

perhaps not humanoid but like rovers

340

00:18:14,390 --> 00:18:12,559

that can be independent but also

341

00:18:16,470 --> 00:18:14,400

controlled by spacecraft

342

00:18:18,950 --> 00:18:16,480

to allow

343

00:18:21,029 --> 00:18:18,960

a more safe environment before landing

344

00:18:22,230 --> 00:18:21,039

so i think this integration is already

345

00:18:23,990 --> 00:18:22,240

ongoing

346

00:18:35,590 --> 00:18:24,000

and it will be indispensable for the

347

00:18:39,830 --> 00:18:37,909

so you're used to flying at twice the

348

00:18:42,870 --> 00:18:39,840

speed of sound

349

00:18:45,350 --> 00:18:42,880

so but with space walks you're going at

350

00:18:47,990 --> 00:18:45,360

23 times the speed of sound so what what

351

00:18:49,430 --> 00:18:48,000

sensations does that give you

352

00:18:52,789 --> 00:18:49,440

well they're completely different

353

00:18:53,909 --> 00:18:52,799

emotions the majority of my of my career

354

00:18:57,190 --> 00:18:53,919

i've flown

355

00:19:00,390 --> 00:18:57,200

on planes on on fighter planes at low

356

00:19:03,190 --> 00:19:00,400

altitude so flying at low altitude very

357

00:19:07,909 --> 00:19:03,200

low altitude the the sensation of speed

358

00:19:14,310 --> 00:19:10,870

that it gives you a huge adrenaline shot

359

00:19:15,510 --> 00:19:14,320

and it's an exhilarating sensation here

360

00:19:17,110 --> 00:19:15,520

outside the station

361

00:19:21,029 --> 00:19:17,120

[Music]

362

00:19:25,000 --> 00:19:22,870

it's a mental status it's completely

363

00:19:27,990 --> 00:19:25,010

different the risks are different

364

00:19:32,710 --> 00:19:28,000

[Music]

365

00:19:38,390 --> 00:19:35,669

has completely different times than

366

00:19:39,909 --> 00:19:38,400

flying at high speeds so they're

367

00:19:41,830 --> 00:19:39,919

killed

368

00:19:44,549 --> 00:19:41,840

emotions that i

369

00:19:46,470 --> 00:19:44,559

set aside

370

00:19:48,870 --> 00:19:46,480

that i can then use

371

00:19:51,270 --> 00:19:48,880

in other similar occasions but for an

372

00:19:54,150 --> 00:19:51,280

extra vehicular activity you don't

373

00:19:56,390 --> 00:19:54,160

perceive this this sensation of speed

374

00:19:58,549 --> 00:19:56,400

unless you look down on earth running by

375

00:20:00,310 --> 00:19:58,559

you the only sensation

376

00:20:03,029 --> 00:20:00,320

is is that of feeling like you're

377

00:20:06,710 --> 00:20:03,039

falling in honestly i didn't feel it i i

378

00:20:10,789 --> 00:20:08,870

with respect to the space station and

379

00:20:13,110 --> 00:20:10,799

astronaut is completely still you're

380

00:20:19,110 --> 00:20:13,120

moving with the space station so two

381

00:20:26,950 --> 00:20:20,710

thank you station that concludes the