



1  
00:00:06,960 --> 00:00:15,270  
this week at nasa

2  
00:00:19,269 --> 00:00:16,430  
with the launch of

3  
00:00:22,550 --> 00:00:19,279  
sts-135 officially set for july 8th at

4  
00:00:24,550 --> 00:00:22,560  
11 26 a.m eastern daylight time the

5  
00:00:27,349 --> 00:00:24,560  
four-member crew commander chris

6  
00:00:30,070 --> 00:00:27,359  
ferguson pilot doug hurley and mission

7  
00:00:32,310 --> 00:00:30,080  
specialist sandy magnus and rex wallham

8  
00:00:33,910 --> 00:00:32,320  
is making its final preparations for the

9  
00:00:35,190 --> 00:00:33,920  
final mission of the space shuttle

10  
00:00:37,270 --> 00:00:35,200  
program

11  
00:00:39,030 --> 00:00:37,280  
space shuttle atlantis 12-day mission to

12  
00:00:40,869 --> 00:00:39,040  
the international space station will

13  
00:00:42,950 --> 00:00:40,879

deliver the rafaello multi-purpose

14

00:00:45,510 --> 00:00:42,960

logistics module filled with supplies

15

00:00:48,229 --> 00:00:45,520

and spare parts to sustain station

16

00:00:50,229 --> 00:00:48,239

operations once the shuttles are retired

17

00:00:52,790 --> 00:00:50,239

the mission also will fly the robotic

18

00:00:54,869 --> 00:00:52,800

refueling mission an experiment designed

19

00:00:57,110 --> 00:00:54,879

to demonstrate and test the tools

20

00:00:59,750 --> 00:00:57,120

technologies and techniques needed to

21

00:01:02,150 --> 00:00:59,760

robotically refuel satellites in space

22

00:01:04,549 --> 00:01:02,160

even satellites not designed to be

23

00:01:06,870 --> 00:01:04,559

serviced this flight is incredibly

24

00:01:09,990 --> 00:01:06,880

important to space station the the cargo

25

00:01:12,310 --> 00:01:10,000

that is coming up on this flight is is

26

00:01:15,030 --> 00:01:12,320

really mandatory for for space station

27

00:01:18,230 --> 00:01:15,040

the first space shuttle mission sts-1

28

00:01:20,149 --> 00:01:18,240

launched on april 12 1981 with veteran

29

00:01:23,109 --> 00:01:20,159

astronaut john young and first-time

30

00:01:25,429 --> 00:01:23,119

flyer bob crippen aboard columbia

31

00:01:32,390 --> 00:01:25,439

the liftoff of atlantis will be shuttle

32

00:01:36,469 --> 00:01:34,390

nasa administrator charles bolden

33

00:01:38,870 --> 00:01:36,479

outlined the agency's post-shuttle

34

00:01:40,870 --> 00:01:38,880

future in a speech to media and members

35

00:01:42,870 --> 00:01:40,880

at the national press club in washington

36

00:01:45,510 --> 00:01:42,880

i'm here to tell you that american

37

00:01:48,469 --> 00:01:45,520

leadership in space will continue for at

38

00:01:50,149 --> 00:01:48,479

least at least the next half century

39

00:01:53,030 --> 00:01:50,159

because we've laid the foundation for

40

00:01:55,190 --> 00:01:53,040

success and for us at nasa failure is

41

00:01:56,950 --> 00:01:55,200

not an option bolden told the luncheon

42

00:01:59,109 --> 00:01:56,960

gathering and a national television

43

00:02:01,109 --> 00:01:59,119

audience that nasa will continue its

44

00:02:03,429 --> 00:02:01,119

human space exploration efforts aboard

45

00:02:05,190 --> 00:02:03,439

the international space station and by

46

00:02:07,670 --> 00:02:05,200

developing new technologies and

47

00:02:09,990 --> 00:02:07,680

capabilities to send future generations

48

00:02:11,350 --> 00:02:10,000

to multiple destinations beyond low

49

00:02:14,150 --> 00:02:11,360

earth orbit

50

00:02:15,910 --> 00:02:14,160

we are not ending human space flight

51  
00:02:19,110 --> 00:02:15,920  
we are recommitting ourselves to it and

52  
00:02:21,510 --> 00:02:19,120  
taking necessary and difficult steps

53  
00:02:24,150 --> 00:02:21,520  
today to ensure america's preeminence in

54  
00:02:26,470 --> 00:02:24,160  
human space exploration for years to

55  
00:02:28,309 --> 00:02:26,480  
come bolden also spoke of nasa's

56  
00:02:30,309 --> 00:02:28,319  
continued innovation in aeronautics

57  
00:02:32,470 --> 00:02:30,319  
research and dedication to sending

58  
00:02:34,309 --> 00:02:32,480  
robotic science missions into the solar

59  
00:02:36,550 --> 00:02:34,319  
system and beyond

60  
00:02:38,710 --> 00:02:36,560  
special guest speaker four-time shuttle

61  
00:02:40,949 --> 00:02:38,720  
astronaut mark kelly talked of the

62  
00:02:42,869 --> 00:02:40,959  
continuing recovery of his wife

63  
00:02:45,910 --> 00:02:42,879

congresswoman gabrielle giffords of

64

00:02:47,990 --> 00:02:45,920

arizona and the end of the shuttle era i

65

00:02:49,990 --> 00:02:48,000

love her very much

66

00:02:52,630 --> 00:02:50,000

but i have to say i also love the space

67

00:02:54,470 --> 00:02:52,640

shuttle very much

68

00:02:55,670 --> 00:02:54,480

the space shuttle has been very good to

69

00:02:57,830 --> 00:02:55,680

this country

70

00:02:59,910 --> 00:02:57,840

it's an incredible ship that is

71

00:03:02,229 --> 00:02:59,920

difficult to let go

72

00:03:04,229 --> 00:03:02,239

in just one week from today

73

00:03:11,830 --> 00:03:04,239

the space shuttle will rock it off the

74

00:03:15,589 --> 00:03:13,910

nasa's robotic lander development

75

00:03:17,990 --> 00:03:15,599

project of the marshall space flight

76  
00:03:22,790 --> 00:03:18,000  
center conducted the second free-flight

77  
00:03:25,110 --> 00:03:22,800  
test of a robotic lander prototype 2-1

78  
00:03:27,589 --> 00:03:25,120  
the lander successfully executed its

79  
00:03:29,750 --> 00:03:27,599  
planned flight profile rising to a

80  
00:03:31,750 --> 00:03:29,760  
six-foot hover and descending to a

81  
00:03:33,670 --> 00:03:31,760  
controlled soft landing

82  
00:03:35,670 --> 00:03:33,680  
overhead and side mounted cameras

83  
00:03:38,309 --> 00:03:35,680  
captured the action in high definition

84  
00:03:40,710 --> 00:03:38,319  
and infrared allowing engineers to see

85  
00:03:42,869 --> 00:03:40,720  
the performance engage the temperatures

86  
00:03:44,070 --> 00:03:42,879  
of thruster plumes invisible to the

87  
00:03:46,309 --> 00:03:44,080  
naked eye

88  
00:03:48,869 --> 00:03:46,319



these tests will aid in the design and

89

00:03:52,070 --> 00:03:48,879

development of a new generation of small

90

00:03:53,990 --> 00:03:52,080

smart versatile robotic landers capable

91

00:03:56,149 --> 00:03:54,000

of performing science and exploration

92

00:03:58,869 --> 00:03:56,159

research at multiple destinations in the

93

00:04:00,869 --> 00:03:58,879

solar system

94

00:04:03,350 --> 00:04:00,879

all of the mirrors that will fly aboard

95

00:04:05,750 --> 00:04:03,360

nasa's james webb space telescope have

96

00:04:08,030 --> 00:04:05,760

been polished representing a major

97

00:04:10,949 --> 00:04:08,040

milestone for the observatory

98

00:04:13,429 --> 00:04:10,959

jwst has four types of mirrors made of

99

00:04:15,990 --> 00:04:13,439

beryllium its primary one which is

100

00:04:18,550 --> 00:04:16,000

actually comprised of 18 individual

101  
00:04:20,949 --> 00:04:18,560  
mirrors will enable scientists to

102  
00:04:23,830 --> 00:04:20,959  
capture light from faint distant objects

103  
00:04:27,270 --> 00:04:23,840  
in the universe faster than any previous

104  
00:04:29,909 --> 00:04:27,280  
space observatory and see objects as far

105  
00:04:32,310 --> 00:04:29,919  
away as the first galaxies in the

106  
00:04:34,870 --> 00:04:32,320  
universe as the successor to the hubble

107  
00:04:36,870 --> 00:04:34,880  
space telescope the webb telescope is

108  
00:04:39,510 --> 00:04:36,880  
the world's next generation space

109  
00:04:47,110 --> 00:04:39,520  
observatory it will be the most powerful

110  
00:04:50,790 --> 00:04:49,030  
two nasa aircraft are conducting

111  
00:04:52,950 --> 00:04:50,800  
research flights over the baltimore

112  
00:04:55,590 --> 00:04:52,960  
washington region and northeast maryland

113  
00:04:58,469 --> 00:04:55,600

this summer to improve how ground-level

114

00:05:01,350 --> 00:04:58,479

air quality is measured from space

115

00:05:03,350 --> 00:05:01,360

discover a queue for deriving

116

00:05:04,950 --> 00:05:03,360

information on surface conditions from

117

00:05:07,430 --> 00:05:04,960

column and vertically resolved

118

00:05:09,350 --> 00:05:07,440

observations relevant to air quality is

119

00:05:11,590 --> 00:05:09,360

a targeted four-year science

120

00:05:13,670 --> 00:05:11,600

investigation to complement data

121

00:05:15,749 --> 00:05:13,680

gathered by nasa satellites

122

00:05:17,590 --> 00:05:15,759

space-borne instruments monitoring air

123

00:05:19,830 --> 00:05:17,600

quality have trouble distinguishing

124

00:05:21,670 --> 00:05:19,840

between pollution high in the atmosphere

125

00:05:22,950 --> 00:05:21,680

and pollution near the surface where

126  
00:05:24,790 --> 00:05:22,960  
people live

127  
00:05:26,950 --> 00:05:24,800  
discover a q's measurements will be

128  
00:05:28,710 --> 00:05:26,960  
combined with ground-based observation

129  
00:05:31,110 --> 00:05:28,720  
sites to help scientists tell the

130  
00:05:33,510 --> 00:05:31,120  
difference

131  
00:05:35,110 --> 00:05:33,520  
we can work with our private sector and

132  
00:05:37,749 --> 00:05:35,120  
tap into that

133  
00:05:39,990 --> 00:05:37,759  
u.s industry nasa deputy administrator

134  
00:05:41,830 --> 00:05:40,000  
lori garver web chatted with users of

135  
00:05:44,150 --> 00:05:41,840  
the social media twitter about the

136  
00:05:46,469 --> 00:05:44,160  
future of the agency

137  
00:05:48,550 --> 00:05:46,479  
hosted by astronaut mike massimino

138  
00:05:51,029 --> 00:05:48,560

better known to tweeters by the handle

139

00:05:53,270 --> 00:05:51,039

astro mike the one-hour question and

140

00:05:54,710 --> 00:05:53,280

answer session was carried on nasa tv's

141

00:05:56,950 --> 00:05:54,720

ustream channel

142

00:05:59,110 --> 00:05:56,960

garver and massimino invited the twitter

143

00:06:01,430 --> 00:05:59,120

community to ask questions about nasa's

144

00:06:04,790 --> 00:06:01,440

plans for human exploration of space

145

00:06:06,550 --> 00:06:04,800

post shuttle the exploration plans

146

00:06:09,350 --> 00:06:06,560

of this nation i think we will do it in

147

00:06:11,110 --> 00:06:09,360

a cooperative way uh have the red planet

148

00:06:12,550 --> 00:06:11,120

in our sights the whole point of what

149

00:06:15,270 --> 00:06:12,560

we're doing is to develop these

150

00:06:17,189 --> 00:06:15,280

capabilities so we can go farther okay

151

00:06:19,189 --> 00:06:17,199

awesome all right we have another

152

00:06:21,029 --> 00:06:19,199

question they also discussed how nasa

153

00:06:22,550 --> 00:06:21,039

astronauts will continue to travel and

154

00:06:27,510 --> 00:06:22,560

work aboard the international space

155

00:06:32,070 --> 00:06:30,150

the annual agency honor awards ceremony

156

00:06:35,189 --> 00:06:32,080

was held at nasa headquarters on june

157

00:06:37,430 --> 00:06:35,199

30. the event recognized employees both

158

00:06:39,590 --> 00:06:37,440

individual and groups at nasa centers

159

00:06:41,670 --> 00:06:39,600

and facilities across the country who've

160

00:06:44,230 --> 00:06:41,680

made significant contributions to the

161

00:06:45,670 --> 00:06:44,240

nasa mission and america's space program

162

00:06:47,990 --> 00:06:45,680

over the past year

163

00:06:51,510 --> 00:06:48,000

a total of 88 awards were presented

164

00:06:55,670 --> 00:06:53,670

the smithsonian's national air and space

165

00:06:58,070 --> 00:06:55,680

museum in washington was the scene of a

166

00:07:00,070 --> 00:06:58,080

special celebration noting the 50th

167

00:07:01,510 --> 00:07:00,080

anniversary of the first nuclear space

168

00:07:07,189 --> 00:07:01,520

flight

169

00:07:09,990 --> 00:07:07,199

transit 4a spacecraft on june 29 1961

170

00:07:12,870 --> 00:07:10,000

carrying with it a snap 3b radio isotope

171

00:07:15,350 --> 00:07:12,880

power generator that produced 2.7 watts

172

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

of electrical power as well as other

173

00:07:22,950 --> 00:07:17,199

nuclear-powered missions undertaken by

174

00:07:22,960 --> 00:07:31,110

and now centerpieces

175

00:07:36,150 --> 00:07:33,749

diving like a bird of prey a nasa dryden

176  
00:07:37,990 --> 00:07:36,160  
fa 18 has been putting the landing radar

177  
00:07:40,150 --> 00:07:38,000  
for the mars science laboratory through

178  
00:07:42,550 --> 00:07:40,160  
its faces over edwards air force base in

179  
00:07:44,550 --> 00:07:42,560  
california

180  
00:07:46,390 --> 00:07:44,560  
the aircraft carried an experimental pod

181  
00:07:48,390 --> 00:07:46,400  
that housed the test radar underneath

182  
00:07:50,710 --> 00:07:48,400  
the aircraft's left wing

183  
00:07:53,430 --> 00:07:50,720  
during the flights the fa-18 climbed to

184  
00:07:56,070 --> 00:07:53,440  
40 000 feet then made stair-step dives

185  
00:07:58,309 --> 00:07:56,080  
over roger's dry lake at angles of 40 to

186  
00:08:00,230 --> 00:07:58,319  
90 degrees

187  
00:08:01,990 --> 00:08:00,240  
in order to simulate what the radar will

188  
00:08:03,350 --> 00:08:02,000



see during entry into the martian

189

00:08:05,510 --> 00:08:03,360

atmosphere

190

00:08:08,070 --> 00:08:05,520

being developed by nasa's jet propulsion

191

00:08:11,029 --> 00:08:08,080

laboratory the mars science laboratory

192

00:08:17,350 --> 00:08:11,039

with its curiosity rover is nasa's next

193

00:08:20,629 --> 00:08:18,950

hundreds of fourth through sixth grade

194

00:08:22,710 --> 00:08:20,639

students from the california high desert

195

00:08:24,710 --> 00:08:22,720

communities of mojave and california

196

00:08:26,550 --> 00:08:24,720

city recently participated in the

197

00:08:28,550 --> 00:08:26,560

seventh annual intermediate space

198

00:08:36,949 --> 00:08:28,560

challenge rocket contest at the mojave

199

00:08:40,469 --> 00:08:38,469

the challenge introduced science

200

00:08:42,389 --> 00:08:40,479

technology engineering and math through

201  
00:08:44,070 --> 00:08:42,399  
the hands-on experience of building and

202  
00:08:46,470 --> 00:08:44,080  
launching a rocket

203  
00:08:48,630 --> 00:08:46,480  
21 classroom teams from mojave and

204  
00:08:51,269 --> 00:08:48,640  
hacienda elementary schools built their

205  
00:08:52,949 --> 00:08:51,279  
own rockets wrote essays and cheered in

206  
00:08:55,430 --> 00:08:52,959  
youthful exuberance as their rockets

207  
00:08:57,190 --> 00:08:55,440  
soared hundreds of feet into the air

208  
00:08:59,110 --> 00:08:57,200  
nasa dryden flight research center's

209  
00:09:01,910 --> 00:08:59,120  
education office supplied 10 of the

210  
00:09:04,470 --> 00:09:01,920  
rockets and gift bags for the winners

211  
00:09:06,550 --> 00:09:04,480  
since 2005 about a thousand students

212  
00:09:08,230 --> 00:09:06,560  
have participated in the annual events

213  
00:09:10,630 --> 00:09:08,240

competing against their individual

214

00:09:12,630 --> 00:09:10,640

grades for the grand prize a traveling

215

00:09:14,470 --> 00:09:12,640

trophy that's awarded to the school

216

00:09:16,790 --> 00:09:14,480

scoring the highest overall average

217

00:09:19,430 --> 00:09:16,800

score

218

00:09:21,430 --> 00:09:19,440

and that's this week at nasa