



1
00:00:10,470 --> 00:00:08,230
t-minus 30 seconds and counting

2
00:00:14,709 --> 00:00:10,480
28

3
00:00:21,590 --> 00:00:14,719
pcs reduced launch roger 25 status check

4
00:00:21,600 --> 00:00:25,670
15 seconds and counting

5
00:00:28,150 --> 00:00:27,189
t minus 10

6
00:00:29,269 --> 00:00:28,160
9

7
00:00:30,150 --> 00:00:29,279
8

8
00:00:31,189 --> 00:00:30,160
seven

9
00:00:32,229 --> 00:00:31,199
six

10
00:00:33,430 --> 00:00:32,239
five

11
00:00:34,549 --> 00:00:33,440
four

12
00:00:35,590 --> 00:00:34,559
three

13
00:00:38,630 --> 00:00:35,600

two

14

00:00:44,389 --> 00:00:42,310
and liftoff of noah's goals are

15

00:00:46,630 --> 00:00:44,399
america's most advanced

16

00:00:48,950 --> 00:00:46,640
weather eye in the sky

17

00:00:55,750 --> 00:00:48,960
elevating environmental intelligence to

18

00:00:59,670 --> 00:00:57,910
of control and your response looks good

19

00:01:00,630 --> 00:00:59,680
now flying the zero angle attack phase

20

00:01:03,510 --> 00:01:00,640
of flight

21

00:01:05,590 --> 00:01:03,520
body right so good

22

00:01:07,830 --> 00:01:05,600
booster has throttled down as scheduled

23

00:01:10,070 --> 00:01:07,840
response looks good

24

00:01:11,910 --> 00:01:10,080
roll program is complete fire it's

25

00:01:22,950 --> 00:01:11,920
controlling down the middle listening to

26

00:01:28,390 --> 00:01:25,749

standing by dude

27

00:01:29,590 --> 00:01:28,400

this is the maximum aerodynamic pressure

28

00:01:31,109 --> 00:01:29,600

area

29

00:01:32,870 --> 00:01:31,119

when mechanical stress on the rocket

30

00:01:34,789 --> 00:01:32,880

reaches its peak because of the rocket's

31

00:01:38,069 --> 00:01:34,799

velocity and resistance created by the

32

00:01:42,630 --> 00:01:39,590

nasa's

33

00:01:44,630 --> 00:01:42,640

atlas v booster has been thrown back up

34

00:01:46,870 --> 00:01:44,640

and responsive is good goes our

35

00:01:50,870 --> 00:01:46,880

spacecraft

36

00:01:54,230 --> 00:01:52,069

at this point

37

00:02:04,870 --> 00:01:54,240

the united launch alliance atlas booster

38

00:02:08,790 --> 00:02:06,950

one minute 50 seconds into flight the

39

00:02:10,229 --> 00:02:08,800

first two solid rocket boosters will be

40

00:02:11,830 --> 00:02:10,239

jettisoned

41

00:02:26,390 --> 00:02:11,840

followed by about a second and a half

42

00:02:29,750 --> 00:02:28,550

coming up in srp jettison and we have

43

00:02:31,670 --> 00:02:29,760

the first pair

44

00:02:34,470 --> 00:02:31,680

and the second pair looks like a good

45

00:02:40,150 --> 00:02:37,750

now find q alpha limited steering

46

00:02:42,550 --> 00:02:40,160

and we have had our roll bias pointing

47

00:02:44,309 --> 00:02:42,560

start system securing

48

00:02:46,710 --> 00:02:44,319

vehicles making good progress down the

49

00:02:55,670 --> 00:02:49,110

rd180 continues to look good pump speeds

50

00:03:01,750 --> 00:02:57,750

and booster has throttled back right on

51
00:03:01,760 --> 00:03:08,790
two minutes 25 seconds into flight

52
00:03:12,309 --> 00:03:10,390
all systems continue to look very good

53
00:03:15,830 --> 00:03:12,319
at this point currently find an altitude

54
00:03:18,910 --> 00:03:15,840
of 48 miles downrange distance 85 miles

55
00:03:18,920 --> 00:03:25,750
95 miles per hour

56
00:03:29,830 --> 00:03:28,309
and we have fired the rcs power valve

57
00:03:36,869 --> 00:03:29,840
system is now pressurizing the flight

58
00:03:41,030 --> 00:03:38,550
three minutes into flight

59
00:03:42,949 --> 00:03:41,040
about 30 seconds away from jettison of

60
00:03:45,110 --> 00:03:42,959
the payload fairing which has protected

61
00:03:46,710 --> 00:03:45,120
noaa's goes-r during its flight through

62
00:03:49,270 --> 00:03:46,720
the atmosphere

63
00:03:51,110 --> 00:03:49,280

and we have gun throttling

64

00:03:53,309 --> 00:03:51,120

to two and a half g's in preparation for

65

00:04:18,789 --> 00:03:53,319

payload

66

00:04:18,799 --> 00:04:24,790

three minutes 42 seconds into flight

67

00:04:30,790 --> 00:04:27,990

and we have throttled back up

68

00:04:33,189 --> 00:04:30,800

next approaching our 4.6 g

69

00:04:35,749 --> 00:04:33,199

constant throttle

70

00:04:38,150 --> 00:04:35,759

about and we have throttle push phase

71

00:04:53,350 --> 00:04:38,160

cooldown is underway about 30 seconds

72

00:04:53,360 --> 00:05:02,150

standing by for booster engine

73

00:05:06,390 --> 00:05:04,390

engine shutdown looks good

74

00:05:08,310 --> 00:05:06,400

standing by in about six seconds for the

75

00:05:11,670 --> 00:05:08,320

centaur's second stage to separate from

76

00:05:13,430 --> 00:05:11,680

the booster indication of ac

77

00:05:17,990 --> 00:05:13,440

good separation unlocks pre-starter

78

00:05:26,150 --> 00:05:20,469

and we have ignition and full thrust on

79

00:05:30,710 --> 00:05:27,670

this uh

80

00:05:31,670 --> 00:05:30,720

centaur single rl10c engine

81

00:05:35,189 --> 00:05:31,680

burn

82

00:05:38,550 --> 00:05:35,199

producing 22 900 pounds of thrust

83

00:05:40,390 --> 00:05:38,560

will burn for just under eight minutes

84

00:05:41,990 --> 00:05:40,400

you're gonna see our rcs thermal

85

00:05:44,469 --> 00:05:42,000

conditioning firings

86

00:05:45,990 --> 00:05:44,479

osm go ahead

87

00:05:47,270 --> 00:05:46,000

adjust security roadblocks for pad

88

00:05:50,310 --> 00:05:47,280

access control

89

00:05:53,990 --> 00:05:52,390

readiness pole our all-time performance

90

00:05:56,710 --> 00:05:54,000

looks good chamber pressures fuel

91

00:05:58,070 --> 00:05:56,720

injectors um sorry fuel inventory

92

00:06:00,550 --> 00:05:58,080

pressure

93

00:06:03,990 --> 00:06:00,560

box pump discharge all within band ready

94

00:06:24,070 --> 00:06:04,000

atlas pneumatics ready center propulsion

95

00:06:28,150 --> 00:06:26,230

loop operation except it is still

96

00:06:30,390 --> 00:06:28,160

requesting a slightly oxidizer rich

97

00:06:33,189 --> 00:06:30,400

condition

98

00:06:35,189 --> 00:06:33,199

we do have indication of the booster

99

00:06:48,070 --> 00:06:35,199

stage performance at this point

100

00:06:51,990 --> 00:06:50,150

rcs line temperatures continue to warm

101
00:06:53,589 --> 00:06:52,000
towards bottle temperatures

102
00:07:00,230 --> 00:06:53,599
our 10 performance continues to look

103
00:07:00,240 --> 00:07:18,469
pressures are stable squirt off

104
00:07:21,110 --> 00:07:19,830
our body rates continue to look good

105
00:07:24,150 --> 00:07:21,120
controlling down the middle current

106
00:07:27,110 --> 00:07:24,160
altitude 139 miles downrange distance

107
00:07:32,390 --> 00:07:27,120
888 miles current velocity 14

108
00:07:32,400 --> 00:07:40,070
coming up on the format change

109
00:07:44,550 --> 00:07:42,629
and we did have a slight drop in data