



**MORPHEUS**

1  
00:00:00,560 --> 00:00:05,029  
Welcome to Kennedy Now. A regular look  
inside activities and progress

2  
00:00:05,029 --> 00:00:09,320  
at NASA's Kennedy Space Center in  
Florida and by KSC teams

3  
00:00:09,320 --> 00:00:10,700  
around the country.

4  
00:00:11,700 --> 00:00:13,420  
A United Launch Alliance

5  
00:00:13,420 --> 00:00:19,280  
Atlas 5 roared off launch complex 41 on  
January 23rd

6  
00:00:19,280 --> 00:00:22,350  
to lift NASA's latest tracking and data relay satellite into orbit

7  
00:00:22,350 --> 00:00:25,880  
high above Earth. Weighing 7,600  
pounds

8  
00:00:25,880 --> 00:00:29,350  
the TDRS-L communications  
spacecraft was placed into a

9  
00:00:29,350 --> 00:00:32,400  
geosynchronous transfer orbit by the  
Atlas booster

10  
00:00:32,400 --> 00:00:36,500  
when it settles into its permanent orbit  
about 22,300 miles above the

11  
00:00:36,500 --> 00:00:40,780  
the earth the satellite will send commands

and data back and forth

12

00:00:41,200 --> 00:00:44,770

between ground stations and the International Space Station

13

00:00:44,770 --> 00:00:47,980

the Hubble Space Telescope and NASA's fleet of

14

00:00:47,980 --> 00:00:51,100

earth-orbiting observatories.

15

00:00:53,140 --> 00:00:58,030

A lift off on a different excited engineers when the experimental

16

00:00:58,030 --> 00:01:01,949

Morpheus lander leapt off the Earth and steered itself to a gentle landing

17

00:01:01,949 --> 00:01:05,439

on a landing field strewn with hazards to simulate landing on another world.

18

00:01:05,439 --> 00:01:09,369

Morpheus does not carry any people and flies itself

19

00:01:09,369 --> 00:01:13,299

through an automated approach and landing sequence. Once the checkout flights are

20

00:01:13,299 --> 00:01:17,299

complete the full-length flights with a specialized system called

21

00:01:17,299 --> 00:01:20,869

ALHAT onboard will be the first to show that the lander

22

00:01:20,869 --> 00:01:24,420

can detect and avoid dangerous objects and still make a safe landing.

23

00:01:24,420 --> 00:01:27,460

The lander technologies are scalable

24

00:01:27,460 --> 00:01:30,659

could support future robotic missions  
and eventually

25

00:01:30,659 --> 00:01:32,600

human lander designs

26

00:01:34,900 --> 00:01:38,700

Sierra Nevada Corporation announced its intention in January

27

00:01:38,700 --> 00:01:42,390

to launch the first orbital mission of its Dream  
Chaser spacecraft

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00:01:42,390 --> 00:01:44,060

from the Florida spaceport

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00:01:44,060 --> 00:01:49,259

atop a United Launch Alliance Atlas five rocket. The company intends to process the

30

00:01:49,259 --> 00:01:51,429

winged spacecraft at Kennedy facilities

31

00:01:51,429 --> 00:01:55,049

including the high bay of the historic  
operations and checkout building

32

00:01:55,049 --> 00:01:59,850

Sierra Nevada's plan calls for the Dream  
Chaser to glide back to Earth

33

00:01:59,850 --> 00:02:03,900

and land at Kennedy's Shuttle Landing Facility. The mission

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00:02:03,900 --> 00:02:05,200  
will not carry astronauts

35

00:02:05,200 --> 00:02:09,140  
but, Sierra Nevada is developing the  
Dream Chaser to carry people

36

00:02:09,140 --> 00:02:10,500  
into low-Earth orbit.