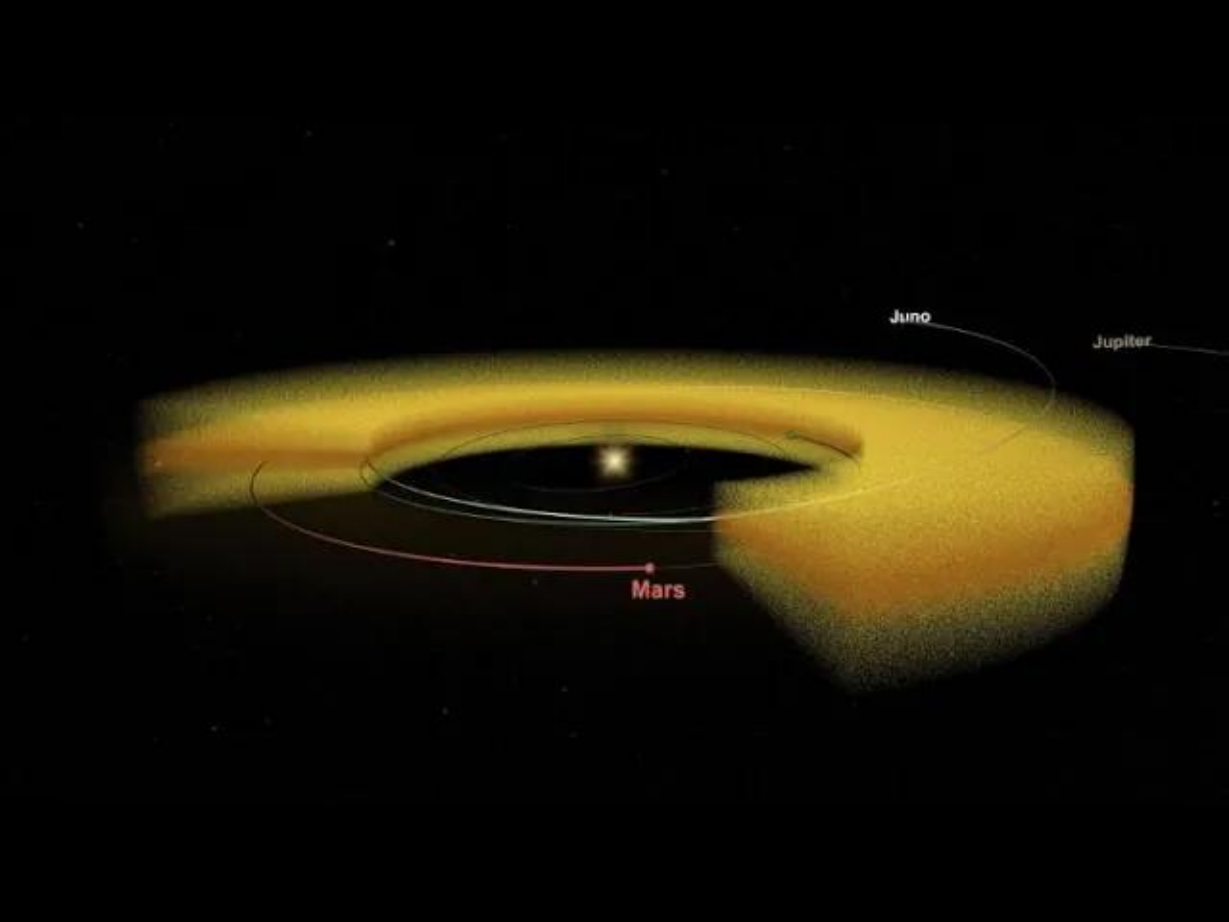
Juno
Jupiter
Mars

1
00:00:00,216 --> 00:00:05,238
[Text on screen]
NASA’s Juno spacecraft has shed new light on an old mystery.

2
00:00:05,555 --> 00:00:10,193
For centuries, scientists have debated the origin of the Zodiacal Light...

3
00:00:10,193 --> 00:00:15,031
which appears above the horizon after dusk and before dawn.

4
00:00:15,031 --> 00:00:16,833
■■■

5
00:00:16,833 --> 00:00:23,173
The Zodiacal Light is sunlight, scattered by an interplanetary cloud of dust.

6
00:00:24,340 --> 00:00:30,663
Scientists thought that the dust comes from asteroids or comets.

7
00:00:30,663 --> 00:00:36,336
(Launch commentary by George Diller)
And liftoff of the Atlas V with Juno on a trek to Jupiter!

8
00:00:36,336 --> 00:00:42,275
In 2011, Juno launched and spent five years traveling to Jupiter.

9
00:00:43,076 --> 00:00:48,648
During its journey, Juno was repeatedly struck.

10
00:00:48,648 --> 00:00:51,251
■■■

11
00:00:51,251 --> 00:00:56,089
Dust grains pelted the solar arrays, excavating debris.

12
00:00:56,389 --> 00:01:01,895
Cameras on Juno saw the debris, providing data on the impacts.

13
00:01:02,946 --> 00:01:08,718
Juno had flown through the dust cloud that causes the Zodiacal Light...

14
00:01:08,718 --> 00:01:14,090
allowing scientists to map its distribution for the first time.

15
00:01:14,090 --> 00:01:20,096
The map pointed to an unexpected source for the dust - Mars.

16
00:01:20,096 --> 00:01:25,335
Mars could be ejecting the dust during global dust storms.

17
00:01:25,335 --> 00:01:27,771
■■■

18
00:01:27,771 --> 00:01:32,425
Juno’s findings will help to protect future missions...