
PARKER SOLAR PROBE

1
00:00:00,100 --> 00:00:03,160
(music)

2
00:00:03,160 --> 00:00:08,530
NASA's Parker Solar Probe mission
is about to embark on a historic journey to

3
00:00:08,530 --> 00:00:12,000
our very own star - the sun.

4
00:00:12,000 --> 00:00:17,990
Named for Dr. Eugene N. Parker, whose contributions
have revolutionized our understanding of the

5
00:00:17,990 --> 00:00:18,990
sun,

6
00:00:18,990 --> 00:00:23,519
Parker Solar Probe will usher in a new era
of exploration.

7
00:00:23,519 --> 00:00:25,830
It's a mission of extremes.

8
00:00:25,830 --> 00:00:31,710
The spacecraft will plunge through the sun's
atmosphere called the corona and fly closer

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00:00:31,710 --> 00:00:37,780
to the sun's surface than any spacecraft in
history - more than seven times closer.

10
00:00:37,780 --> 00:00:43,170
The sun's surface is hot, temperatures exceeding
10,000 degrees Fahrenheit.

11
00:00:43,170 --> 00:00:49,360
But the real surprise is its atmosphere is
even hotter, 300 times hotter.

12
00:00:49,360 --> 00:00:54,950
Facing the corona's brutal heat and radiation conditions, Parker Solar Probe will finally

13
00:00:54,950 --> 00:01:01,050
provide answers to some of the most important questions about how our sun works.

14
00:01:01,050 --> 00:01:05,690
As Parker Solar Probe speeds around the sun making these measurements, it's moving at

15
00:01:05,690 --> 00:01:09,540
over 430,000 miles per hour.

16
00:01:09,540 --> 00:01:14,130
That's like traveling from New York to Tokyo in less than a minute.

17
00:01:14,130 --> 00:01:19,520
This mission is the culmination of 60 years' work by the best and brightest scientific

18
00:01:19,520 --> 00:01:21,319
and engineering minds.

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00:01:21,319 --> 00:01:27,780
Today, our technology will let us achieve our dreams to reveal the secrets of the corona

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00:01:27,780 --> 00:01:34,610
and our sun and to one day help better protect technology from the threats of space weather.