

SO EXACTLY

WHAT IS THE

RS-25

ENGINE ?

1

00:00:00,590 --> 00:00:05,050

So ... Exactly what is the RS-25 Engine?

2

00:00:05,050 --> 00:00:11,430

This amazing engine will be part of NASA's Space Launch System, which will be the most

3

00:00:11,430 --> 00:00:17,199

powerful rocket in the world ... and will send our astronauts to the Moon and eventually

4

00:00:17,199 --> 00:00:18,920

to Mars.

5

00:00:18,920 --> 00:00:27,410

NASA has 16 RS-25s with plans to build more ... and each SLS rocket will have 4 Engines.

6

00:00:27,410 --> 00:00:29,310

These Engines are Big...

7

00:00:29,310 --> 00:00:30,619

REALLY BIG.

8

00:00:30,619 --> 00:00:35,030

The RS-25 is 14 feet tall, and 8 feet in diameter

9

00:00:35,030 --> 00:00:42,150

That is about the size and weight of a compact car... or, 2 F-15 jet engines, and produces

10

00:00:42,150 --> 00:00:44,730

8 times more thrust.

11

00:00:44,730 --> 00:00:51,280

Along with the 2 solid rocket boosters... the RS-25 engines will power the SLS at speeds

12

00:00:51,280 --> 00:00:59,559
of 17,500 mph ... that is 73 times faster
than an Indy 500 race car.

13
00:00:59,559 --> 00:01:05,119
For 3 decades, the RS-25 helped propel the
Space Shuttle into orbit.

14
00:01:05,119 --> 00:01:08,990
These Engines have been modified and upgraded
for their bold new mission

15
00:01:08,990 --> 00:01:14,189
... and are being tested at NASA's Stennis
Space Center.

16
00:01:14,189 --> 00:01:20,039
These big, beautiful engines are designed
to send astronauts on future missions beyond

17
00:01:20,039 --> 00:01:25,380
Earth's orbit ... and advance American leadership
in space.