
MIPL VGR-2 RLTM
TRITON
11394.45(1)
0261N2+000
INPUT
OUTPUT
DC SUBTRACT ON
STRETCH- AUTO ENDS-IN
237:11:36

1
00:00:16,820 --> 00:00:14,839
using balloons and rockets astronomers

2
00:00:19,130 --> 00:00:16,830
have successfully launched telescopes

3
00:00:21,980 --> 00:00:19,140
into Earth orbit above the distorting

4
00:00:24,470 --> 00:00:21,990
effects of the atmosphere to explore

5
00:00:27,740 --> 00:00:24,480
deep space nASA has had great success

6
00:00:29,960 --> 00:00:27,750
with robotic probes like Voyager that

7
00:00:32,959 --> 00:00:29,970
have observed and sent back images of

8
00:00:35,330 --> 00:00:32,969
our solar system NASA and its partner

9
00:00:37,580 --> 00:00:35,340
the European Space Agency are now on the

10
00:00:40,090 --> 00:00:37,590
verge of launching a huge optical

11
00:00:43,819 --> 00:00:40,100
observatory into orbit around the earth

12
00:00:45,790 --> 00:00:43,829
Hubble Space Telescope will see objects

13
00:00:49,490 --> 00:00:45,800

even near the edge of the known universe

14
00:00:52,310 --> 00:00:49,500
with 10 times finer detail than possible

15
00:00:54,920 --> 00:00:52,320
from the ground at the heart of the

16
00:00:57,740 --> 00:00:54,930
observatory is an 8-foot mirror ground

17
00:00:59,900 --> 00:00:57,750
to near perfection when pointed at an

18
00:01:03,470 --> 00:00:59,910
object the mirror collects light and

19
00:01:05,780 --> 00:01:03,480
sends it to six instruments various

20
00:01:07,609 --> 00:01:05,790
satellites and ground stations relay the

21
00:01:10,160 --> 00:01:07,619
instruments information to the Space

22
00:01:12,980 --> 00:01:10,170
Telescope Science Institute in Baltimore

23
00:01:14,630 --> 00:01:12,990
Maryland viewing screens will allow

24
00:01:17,570 --> 00:01:14,640
scientists to make real-time

25
00:01:19,550 --> 00:01:17,580
observations at the same time a

26
00:01:22,609 --> 00:01:19,560
tremendous amount of data will be

27
00:01:24,289 --> 00:01:22,619
generated according to dr. Eric JSON

28
00:01:26,330 --> 00:01:24,299
we're talking about a huge amount of

29
00:01:28,580 --> 00:01:26,340
information in fact we colloquially

30
00:01:30,620 --> 00:01:28,590
referred to this as drinking from a

31
00:01:33,710 --> 00:01:30,630
firehose in order to help astronomers

32
00:01:36,410 --> 00:01:33,720
plan observations the Space Telescope

33
00:01:39,260 --> 00:01:36,420
Institute has the largest star catalogue

34
00:01:43,399 --> 00:01:39,270
in the world containing 19 million

35
00:01:45,950 --> 00:01:43,409
celestial objects the catalogue was made

36
00:01:48,920 --> 00:01:45,960
by scanning over 1,400 photographic

37
00:01:52,010 --> 00:01:48,930
plates of the entire sky the plates are

38
00:01:54,350 --> 00:01:52,020

also stored in a giant database so

39
00:01:57,080 --> 00:01:54,360
astronomers can call up a region like

40
00:02:00,649 --> 00:01:57,090
the Andromeda galaxy and manipulate the

41
00:02:06,020 --> 00:02:03,800
in our lifetime Space Telescope should

42
00:02:10,219 --> 00:02:06,030
match the discoveries made since the

43
00:02:12,979 --> 00:02:10,229
beginning of astronomy we hope to see in

44
00:02:15,170 --> 00:02:12,989
the words of Galileo Galilei wondrous

45
00:02:19,369 --> 00:02:15,180
things those were the words that he used

46
00:02:22,610 --> 00:02:19,379
in 1609 we want to see star systems we

47
00:02:24,740 --> 00:02:22,620
want to see images of the planets but in

48
00:02:27,080 --> 00:02:24,750
particular space telescope is designed

49
00:02:29,869 --> 00:02:27,090
to look out into deep space to study

50
00:02:31,580 --> 00:02:29,879
deep space astrophysics to go out to