

1
00:00:07,160 --> 00:00:09,539

Your guide to constellations,

2
00:00:09,539 --> 00:00:14,759

deep-sky objects, planets, and events:

3
00:00:14,759 --> 00:00:22,039

Tonight's Sky. Highlights of the September sky:

4
00:00:40,020 --> 00:00:43,960

Venus, blazing in the western sky around sunset

5
00:00:43,960 --> 00:00:48,780

for much of the year, bows out by months' end.

6
00:00:48,780 --> 00:00:52,660

Jupiter, not far from Venus in the southwestern sky,

7
00:00:52,659 --> 00:00:59,339

moves lower as the month progresses.

8
00:00:59,340 --> 00:01:02,880

A small telescope reveals large-scale atmospheric

9
00:01:02,880 --> 00:01:11,960

features of Jupiter and the sunlit clouds of Venus.

10
00:01:18,540 --> 00:01:22,220

Saturn and Mars shine in the southern sky against

11
00:01:22,219 --> 00:01:26,260

the stars of Sagittarius.

12
00:01:26,260 --> 00:01:30,100

The waxing moon passes each in turn on the 17th

13
00:01:30,099 --> 00:01:34,959

and 19th of the month.

14
00:01:37,819 --> 00:01:41,919

The rusty surface of Mars and iconic rings of Saturn

15
00:01:41,920 --> 00:01:49,000
are easily visible, even in small telescopes.

16
00:02:01,060 --> 00:02:05,980
September nights feature the "wet quarter" of the sky.

17
00:02:05,980 --> 00:02:08,400
Two neighboring constellations bear

18
00:02:08,400 --> 00:02:12,599
ancient references to water.

19
00:02:12,599 --> 00:02:16,180
Aquarius is one of the oldest constellations,

20
00:02:16,180 --> 00:02:21,319
recognized even by early civilizations.

21
00:02:21,319 --> 00:02:24,379
In ancient mythologies, Aquarius is the

22
00:02:24,379 --> 00:02:27,219
god of the waters.

23
00:02:27,219 --> 00:02:35,340
Look for the Water Jar, a group of stars shaped like a Y.

24
00:02:35,340 --> 00:02:37,680
A rich, compact cluster of

25
00:02:37,680 --> 00:02:41,020
stars can be seen in Aquarius.

26
00:02:41,020 --> 00:02:46,340
Known as M2, it contains about 150,000 stars

27
00:02:46,340 --> 00:02:51,560
located about 37,500 light-years away.

28
00:02:51,560 --> 00:02:55,920
Binoculars present it well, but a small telescope reveals

29

00:02:55,919 --> 00:03:03,619
much more detail in the cluster's compact center.

30
00:03:10,379 --> 00:03:16,439
Nearby lies the great constellation Capricornus.

31
00:03:16,439 --> 00:03:19,919
Known in mythology as the Water Goat, it represents a

32
00:03:19,919 --> 00:03:23,259
creature that fed and watered the infant Zeus,

33
00:03:23,259 --> 00:03:28,679
ruler of the Greek gods.

34
00:03:32,219 --> 00:03:36,659
Algedi is the brightest star in Capricornus.

35
00:03:36,659 --> 00:03:41,299
It's visible in binoculars as an elongated star.

36
00:03:41,300 --> 00:03:45,020
This odd shape is due to a visual trick.

37
00:03:45,020 --> 00:03:49,219
From our distant vantage point, two unrelated stars

38
00:03:49,219 --> 00:03:53,099
appear to be close together.

39
00:03:53,099 --> 00:03:59,539
Capricornus also hosts a dense cluster of stars, M30.

40
00:03:59,539 --> 00:04:03,599
A small telescope easily resolves individual stars

41
00:04:03,599 --> 00:04:07,900
in the cluster.

42
00:04:24,160 --> 00:04:28,020
Comet Giacobini-Zinner, which became visible last

43
00:04:28,019 --> 00:04:31,139

month, should reach its brightest in

44

00:04:31,139 --> 00:04:33,620

September as it passes through the constellation

45

00:04:33,620 --> 00:04:38,000

of Auriga and between Gemini and Orion.

46

00:04:38,000 --> 00:04:41,100

It may be barely visible to the naked eye,

47

00:04:41,100 --> 00:04:43,980

but possible to see with binoculars.

48

00:04:43,980 --> 00:04:51,540

Look for the comet in the east after midnight.

49

00:04:51,540 --> 00:04:58,160

The night sky is always a celestial showcase.

50

00:04:58,160 --> 00:05:04,980

Explore its wonders from
your own backyard.