

#### **4 Rigel in the constellation Orion**

Distance

770 light years

Luminosity

46,000 times that of the sun

Colour

Blue-white

Surface temperature

12,300 K

Diameter

62 times the diameter of the sun

(To Planet Trail scale: 90 m)

Mass

17 solar masses

Evening visibility

November to March

Rigel is the brightest star in the constellation Orion and the fifth brightest star we can see in the sky. It falls into the blue giant phase of the star life cycle. Rigel harbours a multiple star system. The above data refer to the main star. With a radius of around 45 million kilometres, Rigel would almost reach Mercury's orbit if it replaced our sun in the solar system.

Rigel forms the Winter Hexagon together with the stars Aldebaran in Taurus, Capella in Auriga, Pollux in Gemini, Procyon in Canis Minor and Sirius in Canis Major.

Betelgeuse is the second brightest star in the constellation Orion. With a luminosity 135,000 times that of our sun, it is the brightest star within a distance of 1,000 light years. It falls into the red supergiant phase of the star life cycle with a diameter 800 times greater than the sun. It will eventually explode as a supernova at an undetermined point in time.

Other bright stars in the constellation Orion:

Betelgeuse                      Distance: 640 light years

Bellatrix                      Distance: 243 light years

Alnilam                      Distance: 1,342 light years

Alnitak                      Distance: 818 light years

Mintaka                      Distance: 916 light years

#### **4 Constellation Orion**

The constellation Orion is considered to be the most striking winter constellation. In ancient times, people saw a male figure depicted in it. Three bright stars next to each other form the figure's belt, the bright stars below form the feet and those above the shoulders.

Below the belt stars, a small milky patch is visible to the naked eye. This is the Orion Nebula (M 42), a self-luminous interstellar cloud of dust and gas. It has been discovered that new stars are forming within this nebula. Today, Orion is often depicted as a kneeling male figure wielding a club. He also usually carries a sword and wears a lion's pelt over his arm.

There are several myths about the constellation Orion. We will limit ourselves to the following story:

Orion boasted that he was the greatest hunter in all the world and that he could kill any animal he wanted. This angered Gaia, the goddess of Earth, so much that she sent a giant scorpion to kill Orion with its sting. Artemis, the goddess of hunting, mourned Orion so much that Zeus placed Orion and the scorpion in the sky. He positioned them so that they would never be seen in the sky at the same time. Before Orion rises in the east, the scorpion disappears in the west.