



## **Sixty Second Adventures in Astronomy**

### *Event Horizons*

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Just what is 'the point of no return'?

Karl Schwarzschild was a German physicist who not only served in the First World War, but at the same time managed to work out the exact distance from the centre of a black hole – to the point where gravity becomes so strong that even light can't escape.

This is the point of no return, also known as the Event Horizon – because, much like the normal horizon, beyond it nothing can be seen.

But it's not just black holes that have event horizons.

The expansion of the Universe is accelerating - meaning the space between distant galaxies and us is expanding so quickly that their light can't travel fast enough, ever to reach us.

So the whole universe is a bit like an inside out black hole – and as it carries on expanding, fewer and fewer galaxies will be observable to us as they pass to the other side of the event horizon.

And when they're lost from view, that's it. They're not coming back. That's the point of the point of no return.

And the whole Universe will eventually just...