

# KS4 and 5 Science Reading List

Anything which is on the Royal society book prize short list

<https://royalsociety.org/news/2021/09/book-prize-shortlist-2021/>

Examples:-

The Sleeping Beauties by Suzanne O'Sullivan

Science Fictions by Stuart Ritchie

## **General Science**

A Short History of Nearly Everything by [Bill Bryson](#)

Bad science by Ben Goldacre

Anything from the Horrible science series

Why don't penguins feet freeze

How to fossilise your hamster.

## **Biology**

Genome: The Autobiography of a Species in 23 Chapters (Paperback) by [Matt Ridley](#) (Author)

*The Body: A Guide for Occupants* by Bill Bryson

The magic of reality by Richard Dawkins

The double helix by James Watson

Sapiens by Yuval Noah Harari

The Panda's Thumb: More Reflections in Natural History by [Stephen Jay Gould](#)

Mitochondria and the meaning of life (Paperback) by [Nick Lane](#) (Author)

## **Chemistry**

Periodic tales by Hugh Aldersey- Williams

The disappearing spoon by Sam Kean

Margot Lee by Hidden Figures

## **Physics**

$E=mc^2$  by Brian Cox

Seven Brief Lessons on Physics by Carlo Rovelli

The Drunkard's Walk: How Randomness Rules Our Lives (Paperback) by [Leonard Mlodinow](#) (Author)

H<sub>2</sub>O: A Biography of Water (Paperback) by [Philip Ball](#) (Author)

Power, Sex, Suicide: Finding Moonshine: A Mathematician's Journey Through Symmetry (Paperback) by [Marcus du Sautoy](#) (Author)

Fermat's Last Theorem: The story of a riddle that confounded the world's greatest minds for 358 years (Paperback) by [Simon Singh](#)

Big Bang: The Most Important Scientific Discovery of All Time and Why You Need to Know About it (Paperback) by [Simon Singh](#)



Six Easy Pieces: Fundamentals of Physics Explained (Penguin Press Science) by [Richard P Feynman](#) (Author)  
The Pleasure of Finding Things Out by [Richard P Feynman](#) (Author)  
Dancing Naked in the Mind Field (Paperback) by [Kary Mullis](#) (Author)  
The Greatest Show on Earth: The Evidence for Evolution (Hardcover) by [Richard Dawkins](#) (Author)  
Quirkology: The Curious Science Of Everyday Lives (Paperback) by [Prof. Richard Wiseman](#) (Author)  
The Trouble with Physics: The Rise of String Theory, the Fall of a Science and What Comes Next (Paperback) by [Lee Smolin](#) (Author)  
We Need to Talk About Kelvin: What Everyday Things Tell Us About the Universe (Hardcover) by [Marcus Chown](#) (Author)  
Atom (Paperback) by [Jim Al-Khalili](#) (Foreword), [Piers Bizony](#) (Author)  
Black Holes, Wormholes and Time Machines (Paperback) by [Jim Al-Khalili](#) (Author)  
'13 things that do not make sense' by [Michael Brooks](#)  
Molecules of Murder: Criminal Molecules and Classic cases by [John Emsley](#)

## Video

Margot Lee Hidden Figures  
Blue Planet and Blue Planet 2  
Dynasties  
Enigma code  
Theory of everything  
Pirates verses Scientists  
Planet Earth

## Internet resources

Minute physics  
Free science lessons  
Crash course chemistry/biology/physics  
Fuse school  
khan academy  
chem guide  
Ted talks  
Royal institute Christmas lectures (and other video's)  
Primrose Kitten (YouTube channel)  
Seneca learning  
Isaac Physics  
Phet simulations

