



Term 1 2021: Einsteins Club – Years 3 and 4

Venue: Brighton Grammar School

Term Fee: \$285

(Semester enrolments available for \$570)

The Science of Marvel

Meeting 1: Ironman's Rust Issues

Focus: Chemistry

Tony Stark has everything anyone could want – good looks, wealth, power and a really cool super suit... but even with all this he still has some serious (t)rust issues. As elemental as the oxygen he breathes, we will explore how a Periodic Table might look in the Marvel Universe and investigate how various chemical reactions can be sped up and slowed down. Much like Ironman's personal issues, it always comes back to reactions!

Meeting 2: Spiderman's Tangled Web of Deceit

Focus: Logic – Experimental Theory

Peter Parker doesn't know who he can trust. He has been presented with a web of problems and potential solutions, each leading him down a different path... but he doesn't know which are lies and which are the truth. Using the scientific method, we will examine each of the hypotheses, predict outcomes and then carry out experiments to obtain results that tell us fact from fiction. Is logic the only factor, or could there be answers hidden in the worldwide web?

Meeting 3: Black Panther's Light Duties

Focus: Physics - Optics

Wakanda is facing a dark future. While T'Challa (Black Panther) has been out saving the Marvel Universe, Kilmonger has infiltrated the government and attempted to harness the powers of vibranium. He has left invisible clues that only the wisest can see. But how can these secrets be hidden in plain sight? To help shed some 'light' on the mystery, you will learn about sunlight, additive and subtractive colour and the weird properties of refraction.

Meeting 4: Captain America's Time Is Up

Focus: Physics and Astronomy

Captain America has always had trouble with time. Whether being cryogenically frozen or finding himself in an alternate timeline, this First Avenger doesn't have second to lose. Now he is on the clock – he has to piece together the timeline of a Red Skull 'Time Crime'... before his time is up. To help him solve the crime, we will examine the various hypothetical theories behind time and how it possibly relates to the speed of light and our position in the never-ending rotation of the universe.

What to Bring:

Each week please bring a blank A4 notebook and a well-stocked pencil case including;

- Pens and Pencils
- Scissors
- Sticky tape
- Glue stick

Club Leader: Pete Wolstenholme

Pete has a passion for finding new and exciting ways of engaging students which has led him to his current role with RethinkPD and teaching with G.A.T.E.WAYS. He loves finding hidden order and patterns in seemingly chaotic mathematical situations and believes these skills are particularly important for our increasingly online world. Having benefitted from a gifted program when he was at school, Peter is keen to 'pay it forward' and provide a new generation with enriching and challenging learning experiences.