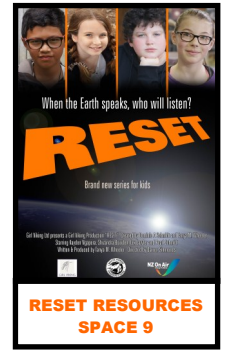


SPACE—THAT FINAL FRONTIER:

There are several **asteroid** belts in our Solar System. One is an inner belt, located between Mars and Jupiter and several asteroids or small/dwarf planets nearby. There are millions of asteroids in this belt, ranging in size from small rocks to several hundred kilometres. The distance between asteroids can be several kilometres. If you are standing on one asteroid, you will probably not even see another. If you were in a space ship flying through an asteroid belt you would be very unlucky to crash into one.

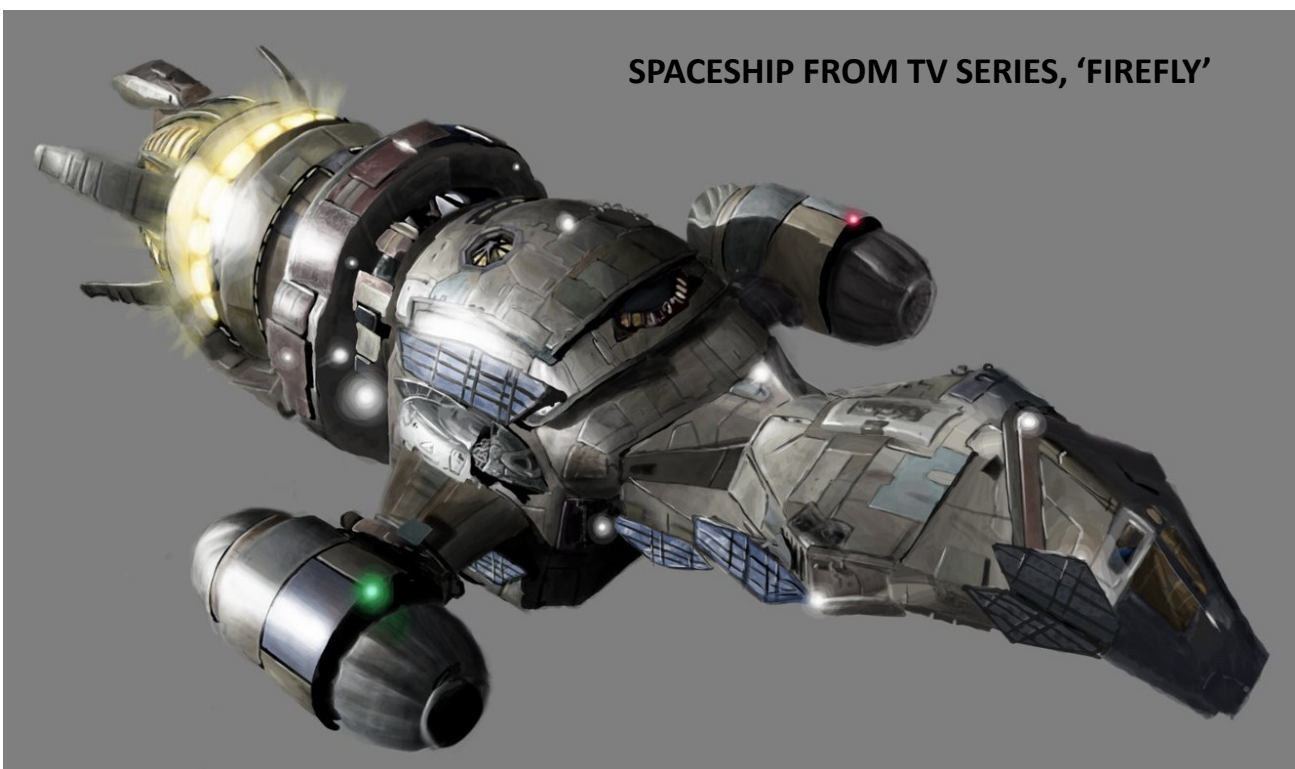


ACTIVITY:

Movies and Sci-Fi TV shows have been designing amazing spaceships for decades. All kinds of designs and propulsion methods have been designed.

- 1) Look up some design images for space ships from movies or shows like FIREFLY, STAR TREK, STAR WARS, PROMETHEUS and BATTLESTAR GALACTICA. See what sort of things other designers have done, then think about what sort of design you would like to make.
- 2) Design your own space ship. Think about size, how many people it can transport, and how far it could travel.
- 3) What features would it need inside and outside? List or draw/design them.
- 4) EXTENSION - Current space shuttles have rockets that detach. Explain why they drop off the space shuttles.

Another asteroid belt is called the Oort Cloud and is believed to have trillions of objects in it. This massive belt is a long way from the Sun. It is about 50,000 to 200,000 times further away from the Sun as Earth is. The outer boundary of the Oort Cloud is what **astrophysicists** use to define the outer boundary of our Solar System.



Thanks to Taher Hansen and Tanya M. Wheeler for developing our Space Resources.