**Supervisor Interaction:**

The students will have started to research the topic on the Tuesday afternoon and should have some basic knowledge of the subject, as well as what is expected of them through the week (report, presentation behaviour etc.).

First Meeting: **Wednesday 9.40am** – introduce the project along with yourself to the student

Collect the report: **Thursday 4.00-4.30pm** – students are to hand in their reports to you, there must be no extensions - all reports must be collected by the end of Thursday.

Mark the reports: Please make sure that you mark all of the group reports (according to the mark schemes provided) by **2.00pm on Friday** so that we can collate the results before the oral presentations.

Mark the presentations: **Friday 2.45-4.00pm** Please come along promptly for the groups presentations on Friday, which we will all be marking as we go along (again the mark scheme will be provided).

Other visits: We ask that you please also check in on the students at least twice a day on the Wednesday and Thursday to ensure that the group are making progress and going down the right track.

Please note that Martin and Stacey will be around all week, if there are any issues with the groups please feel free to approach us with anything – or let us know if you are unable to check in on your group etc.

Variables:

The students have access to LT data of a variable star, and are to use NSO software, LT Image (which they will have been trained to use), or equivalent, to track light curve of the star.

They should measure the brightness of the star over time from a series of images, compared to at least 2 other stars in the field (at account for atmospheric changes to the brightness). They should then use the ratio of the variable to the most constant star and plot the data onto a graph to showing the light curve of the star over time. They should look at the light curve and compare the shape of types of variable star to decide which type it is, they can also find out what the star is by looking up objects at the same RA and Dec.

During the 3 days they must also complete a report based on their analysis and a presentation (in powerpoint or equivalent). These must be completed by the end of Thursday and should include an introduction, outline of their project, outline of their results and conclusions – try to ensure they cover the following information: What is a variable star? What types of variable star are there? What makes the stars vary? What kind of star are you researching and how do you know? What is the period of the variable? Etc.