F=ma Physics 2023 at San Diego Math Circle.

Your instructor is Jacob Saret, a graduate student at the UCSD Department of Physics.
You can contact me at **contact.saret.co**. This form is the fastest way to reach me for questions.

All materials for the class, including the schedule, will be posted on the website, **sdmc.saret.co**. Current materials and announcements can be found through the **2023** button, and older course materials can be found through the **2022**, **2021**, **2020** and **2019** buttons.

The official schedule and other administrative information, including **Zoom meeting details**, is kept on the San Diego Math Circle website, **sdmathcircle.org**.

About the course.

We will be meeting from 1 PM to 2:30 PM on numerous Sundays from November 2022 up until the 2023 F=ma exams. Currently, the AAPT has not announced the dates for the 2023 F=ma exams, but they are usually at the end of January or beginning of February.

This year, we will be meeting through Zoom, in the same way the regular Saturday SDMC sessions proceed. Further details will be on the course website, among other places. Please note that the **Zoom meeting details are not on the course website** as they are available only through SDMC.

About the sessions.

Most sessions will include discussion of physics content and problem solving techniques. Some weeks, we will have practice exams, and towards the end of the course we will have a final review.

I will assign light homework most weeks, which usually consists of either a few problems to work in explicit detail, which I prefer not to do during our limited class time, or a practice exam to help decide the next topics in the course. I will not intentionally give you tedious homework.

About the exam.

The F=ma exam is 25 multiple choice questions (answers A-E) which you have 75 minutes to complete. Getting 14-18 correct answers usually qualifies students for the US Physics Olympiad.

Most of the exam is basic mechanics, like that covered in AP Physics 1 or AP Physics C Mechanics, but closer to the level of the former. Some calculus can help but it is not strictly necessary.

However, due to the pacing of the exam, the spirit of the questions is very different from what you might find in a physics class at your school.