POP Rocket Club Kickoff Meeting (Parent info)

Fall 2017
Mr. Zurek

POP Rocket Club and RedHawk TARC

- We are continuing the Prince of Peace Rocket club and TARC team for the fall of 2017.
- The rocket club will teach the students the basics of model rocketry.
- Each club member will build and fly their own rocket(s) this year.
- For those in 7th and 8th grade who are more interested in rocketry and rocketry competition we are also continuing the Redhawk TARC team.
- In order to participate in the club or on the team, each student will have to join the National Association of Rocketry.
    - $25 yearly membership
    - Membership includes insurance for the member
    - Bimonthly Sport Rocketry Magazine

What is TARC?

- Team America Rocketry Challenge is the world's largest rocketry contest.
- STEM program sponsored by NAR and AIA to develop science and engineering skills in middle and high school students.
- Teams of 7th-12th graders compete in engineering competition for scholarships and prizes.
- Students learn to use hands on engineering skills to design and fabricate a rocket to meet challenging mission criteria.
- The TEAM solves a rocketry related engineering problem, by designing, building, testing and flying a rocket of their own design.
- Once design is complete, team flies 2-3 qualifying flights.
- Top 100 teams nationally are invited to the national fly-off.
- Winner of National fly-off goes to worldwide competition in Europe.

RedHawk TARC

- POP TARC team started by Rebecca Zurek in 2016.
- The core team will consist of 3-10 students committed to being a successful TARC team.
- We will learn about Rockets, from what makes them fly, to designing a stable flight platform, to protection of a payload.
- We will learn how to use industry used CAD(3d modeling) software, flight simulation software, and a 3D printer and it’s software.
- We will always work together as a team and ALWAYS put safety first.
- Each team member will learn about rocketry by building and flying their own individual rocket, and then contributing to the design, build, and operation of the team rocket.
- If enough people are interested, we will have two teams this year.

What is Expected of You

- Bring a willingness to learn and participate as a valuable member of the Team.
- Join NAR as an junior member. (This is not negotiable).
- Participate in all team activities.
- Commit to the success of the RedHawk team… this is no different than any other team you are on.
- Take this seriously:
  - We will have fun learning about, building, and flying rockets but...
  - There will be NO tolerance for unsafe behaviour.
- Document what you do in the team labbook.
- Split costs of team equally. (after team entry fees which will be paid by Mr. Zurek)

Tentative Schedule

2nd meeting build up rocket

3rd meeting learn to simulate rocket, check build of rockets, and go over 2018 TARC project.

Sunday afternoon Launch.

Subsequent meetings will consist of various design topics and work on team project. (intro to solid modeling, 3d printing, etc.)

For 2nd meeting

Make sure you have joined NAR and send me your NAR member number (without this you will not be building a rocket next meeting)

http://www.nar.org/join-nar/

Watch the videos on how to build a rocket 1-6 at this site:

https://www.youtube.com/watch?v=gYh1pWHoQXE

Bring your thumbdrive

Shoebox to bring your rocket home in (will not be dry by end of meeting)