

Internship 2022

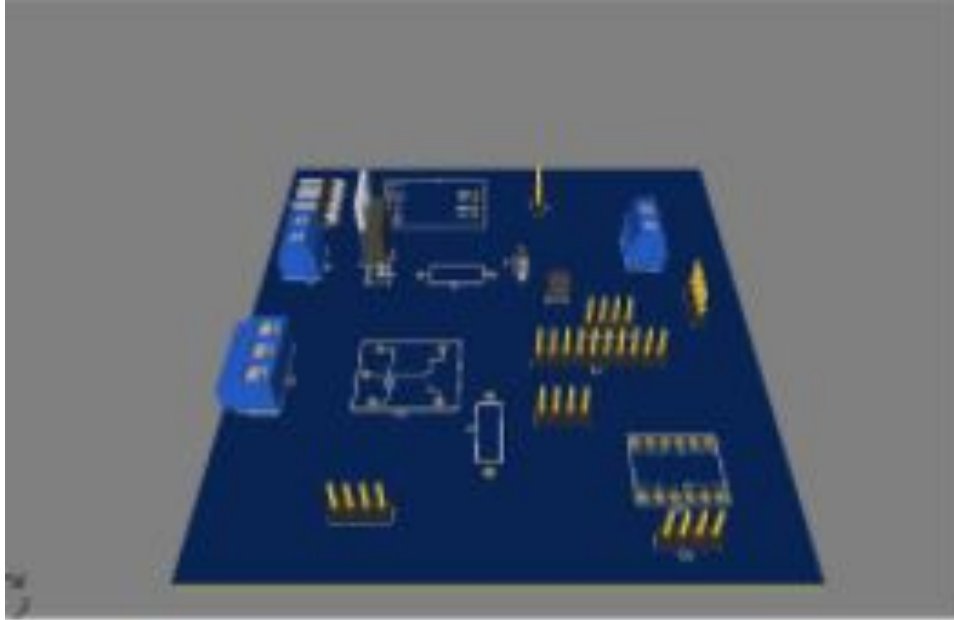
Progress report format for team meeting

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16/02/2022- 22/02/2022

Tasks completed last week

- [#32] Test stand PCB design
- [#33] PCB Etching.
- [#68] Ignition Testing.
- [#19] Iterative static firing test. (First)

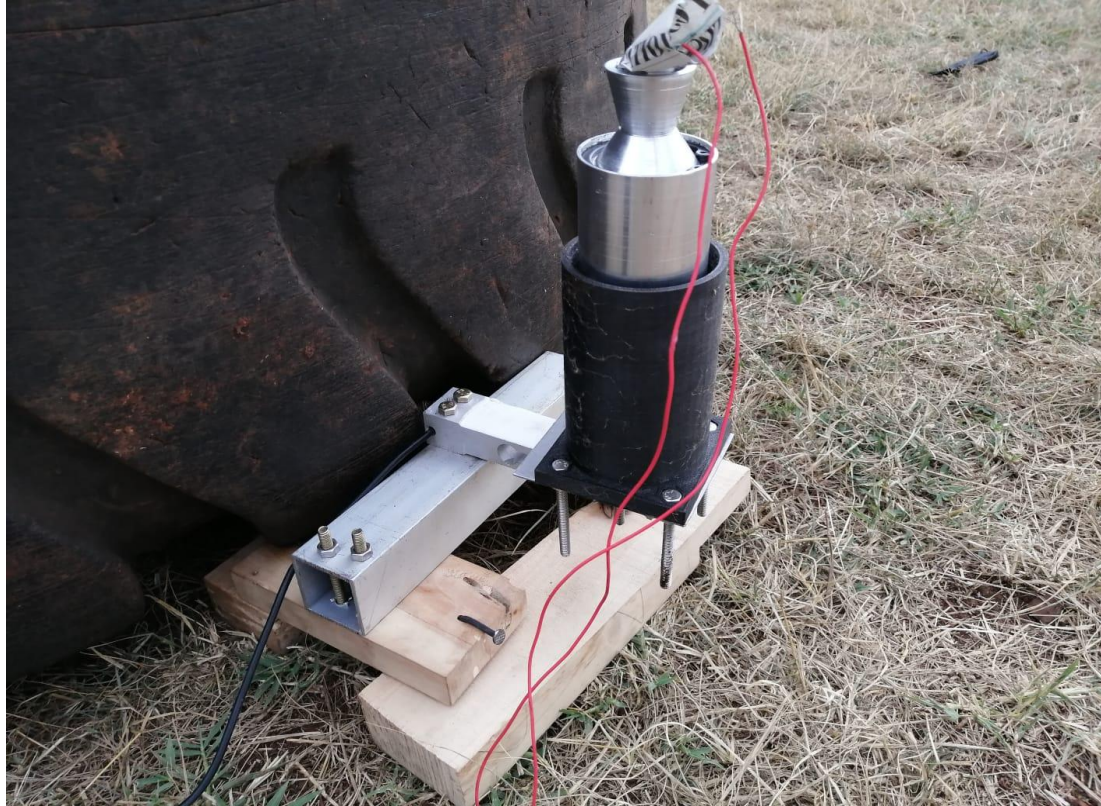
PCB DESIGN AND ETCHING(Failed)



The first three designs failed.
This is the current design
that is being etched at the
moment.

STATIC FIRING

The setup of the test stand.



STATIC TEST FIRING VIDEO



OBSERVATIONS.

- The igniter took a few seconds before igniting opposed to the immediate response we expected. That was after several tries.
- The fuel took close to one minute before it fully burnt out. According to the simulations, the fuel should take 2 seconds to burn out.
- No data was collected from the Raspberry Pi.

Tasks in this week

- [#85] Preparation of Potassium Perchlorate.
- [#56] Fuel casting.
- [#32] Test stand PCB design
- [#33] PCB Etching.
- [#68] Preparation and Ignition Testing.
- [#71] Casing fabrication (Finalising).

Timeline

Month	Intern week	Tasks
Jan		
	Week 1	Research and going through N1 reports.
	Week 2	Fabrication of PCB.
	Week 3	Nozzle fabrication, Igniter test.
Feb	Week 4	Fuel casting.
	Week 5	Test stand design and fabrication.
	Week 6	Launch Pad design and fuel tests .
	Week 7	Testing and improvements on the final work.