## PLAN OF ACTION

## Amit Rajaraman Mentor: Aryaman Maithani

## References

The only reference to be used is the mentor's notes for representation theory which can be found here, with some possible reference to the cited book, namely *Representation Theory of Finite Groups* by Benjamin Steinberg.

## Tentative Schedule

I plan to cover sections 1 (Group representations), 2 (Character Theory and Orthogonality Relations), 3 (The Dimension Theorem), and 7 (Fourier Analysis on Finite Groups). If time permits and I am ahead of schedule, I will additionally cover section 8 (Burnside's Theorems).

The schedule is as follows:

Week 1	Section 1.1
Week 2	Sections 1.2, 2.1
Week 3	Sections 2.2, 2.3
Week 4	Section 2.4
Week 5	Sections 2.5, 2.6
Week 6	Sections 3, 7.1, 7.2
Week 7	Sections 7.3 to 7.5
Week 8	Wrapping up the report and video presentation