

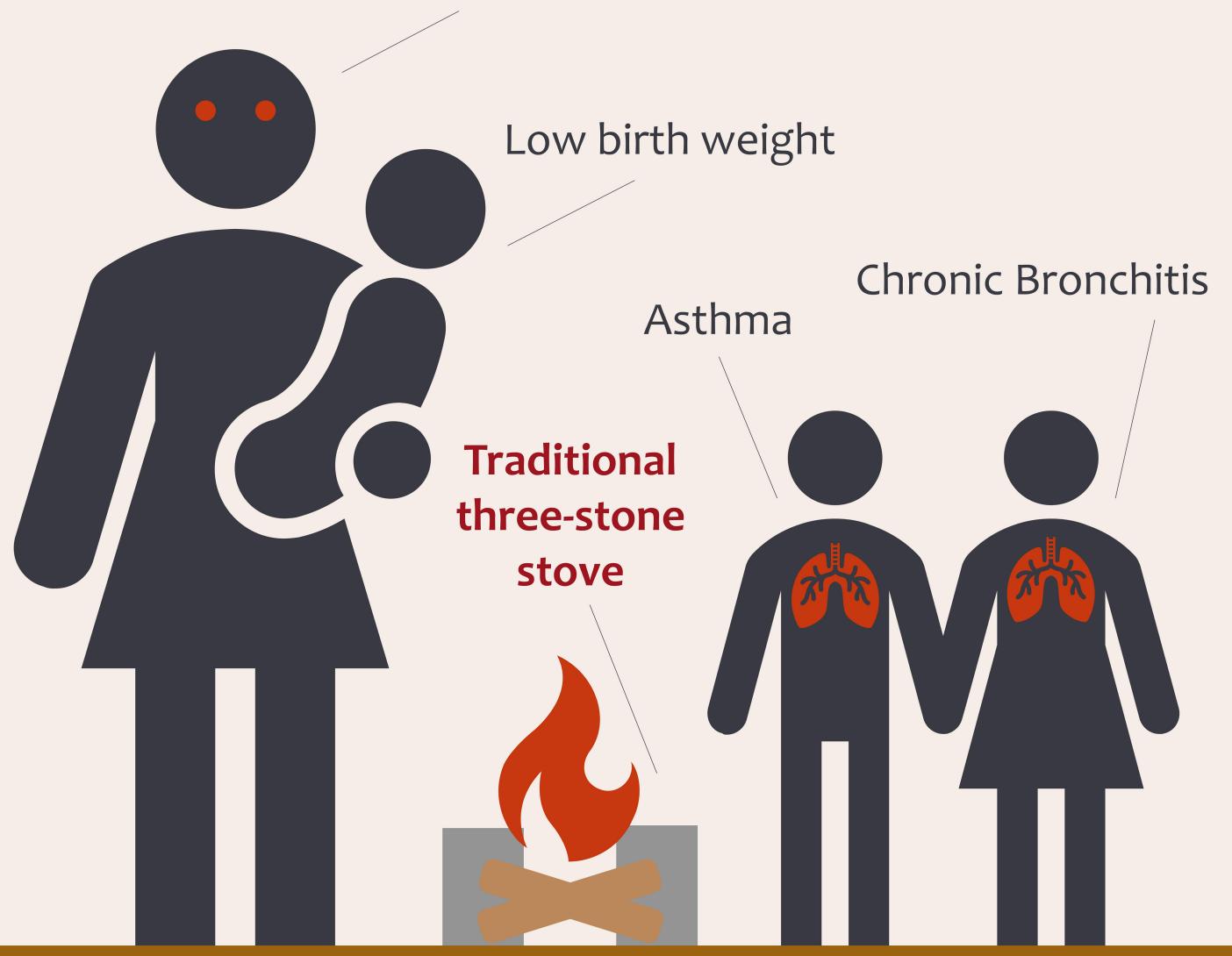
## Indoor Air Pollution in Rural India

Ana Grandgeorge, Cameron Huneke, Caroline Lebak, and Maeve Sousa Great Problems Seminar: Heal the World with Professor Stoddard and Professor Rao

#### Problem

76% of Kanpur's Rural population is reliant on solid biomass fuel for cooking. The traditional stoves have a low thermal efficiency and cause negative side effects because of the excess of fuel burned.

18% develop blindness



Current Solutions: Improved Stoves

Forced Draft

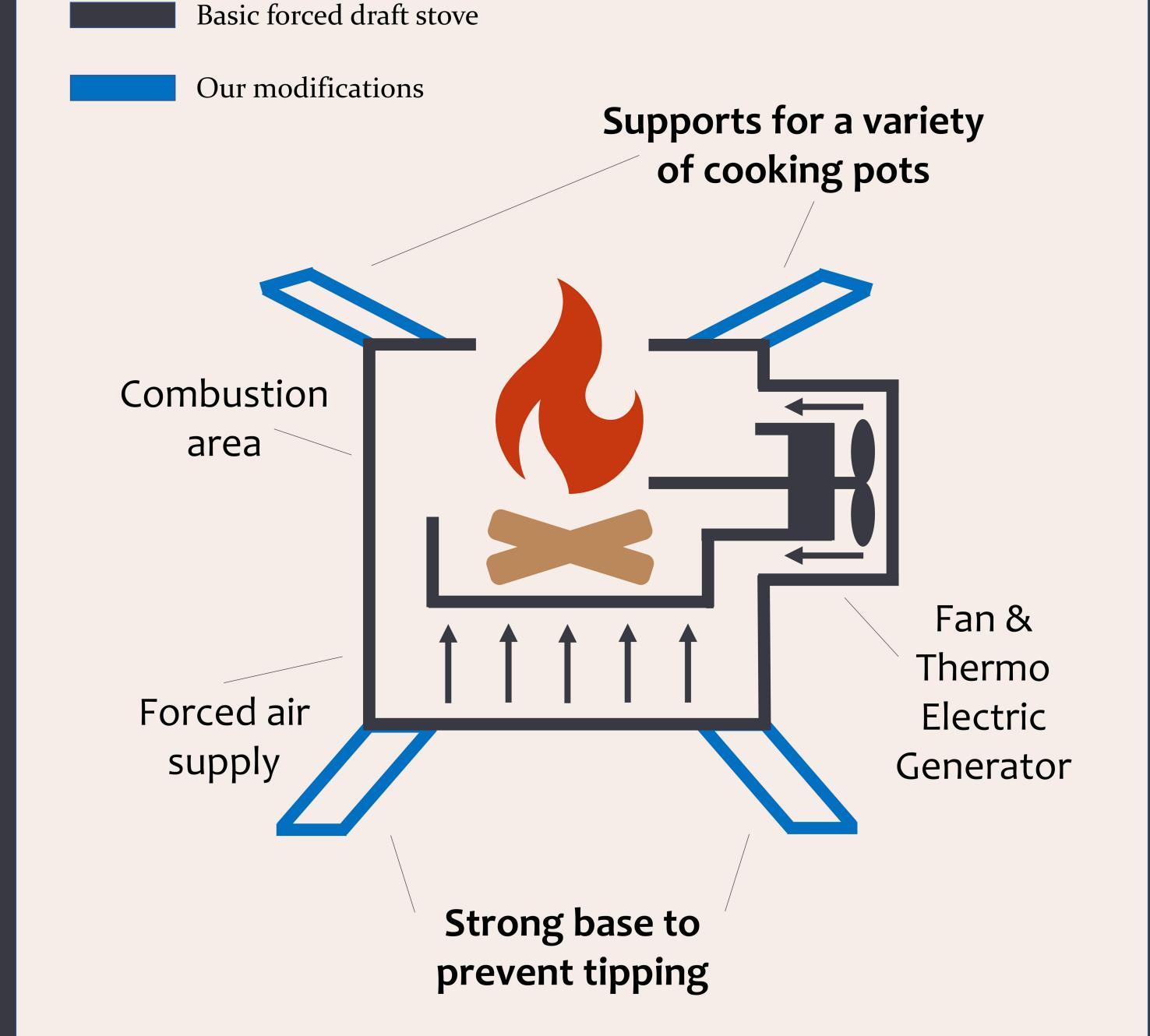
Most thermally efficient of improved stove

Easy to tip and not adaptable to various cookware

Natural Draft

Slightly more thermally efficient than traditional stoves

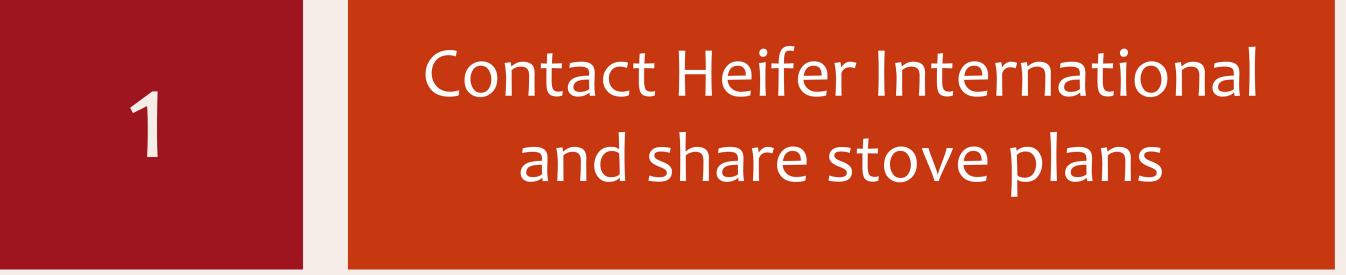
# Our Solution: Modified Forced Draft Stove



#### CO produced (g/kg)



### Implementation







# Criteria for measuring the effectiveness:

- 1. Rate of adoption
- 2. Reduction in household air pollution
- 3. Cultural appropriateness
- 4. Rate of decrease in health symptoms
- 5. General satisfaction from trial group

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