Aerobic bioremediation of perchlorate contamination via a novel *Pseudomonas stutzeri* construct

Stephanie Qin, Anna Barger, Alex Wang, Joe Yang, Ms. Vivien Marmerstein, Dr. Eric Young (936-Technologies)
Western Reserve Academy, Hudson, Ohio, United States

- Achieving *in situ* bioremediation of perchlorates via genetically engineered *P. stutzeri* bacterium
- Uses 3 step reduction pathway to produce chloride and oxygen
- Circumventing oxygen competition with FDP system in second plasmid
- CO2, H2O and biomass produced as by-products