



### Disadvantages

- Low energy efficiency
- PM2.5
- Toxins, SO<sub>x</sub>, NO<sub>x</sub>
- Transportation issue and cost



### Advantages

- Mobile on-site treatment
- High efficiency
- Automatic waste sizing and feeding
- Scalability and portability
- Environmental friendly



## Our microwave pyrolysis/gasification technology development

### Highlights

- Fast heating
- Easily-controlling
- Using a negligible amount of carrier gas
- Energy-saving
- Nearly 100% chemical recyclables
- Mature R&D plans



Using SiC bed

Improving heating rate



Further improving system design



Transfer it to company



### Outcome of the Project

- An advanced microwave gasification technology will be developed for cost effectively and safely converting medical wastes to electricity
- Potential economic, environmental and ecological impacts of the proposed strategy will be evaluated
- The research findings will be used for seeking industrial partnerships and external funds for further R & D efforts