

Innovative Technologies and Applications for Urban Air Pollution Control

National Science and Technology
Development Agency : NSTDA

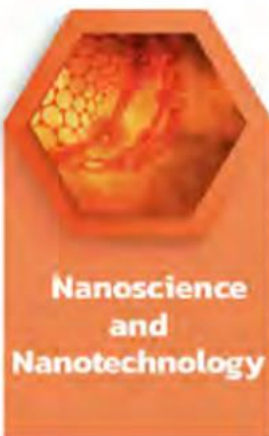
Ministry of Higher Education,
Science, Research and Innovation

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MTEC
a member of NSTDA

ศูนย์เทคโนโลยีโลหะและวัสดุ
National Metal and Materials Technol

NSTDA at a glance



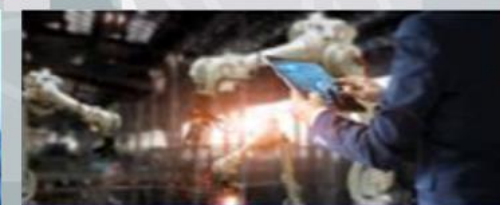
**Agriculture
and Food**



**Energy, Materials
and Biochemicals**



**Health
and Wellness**



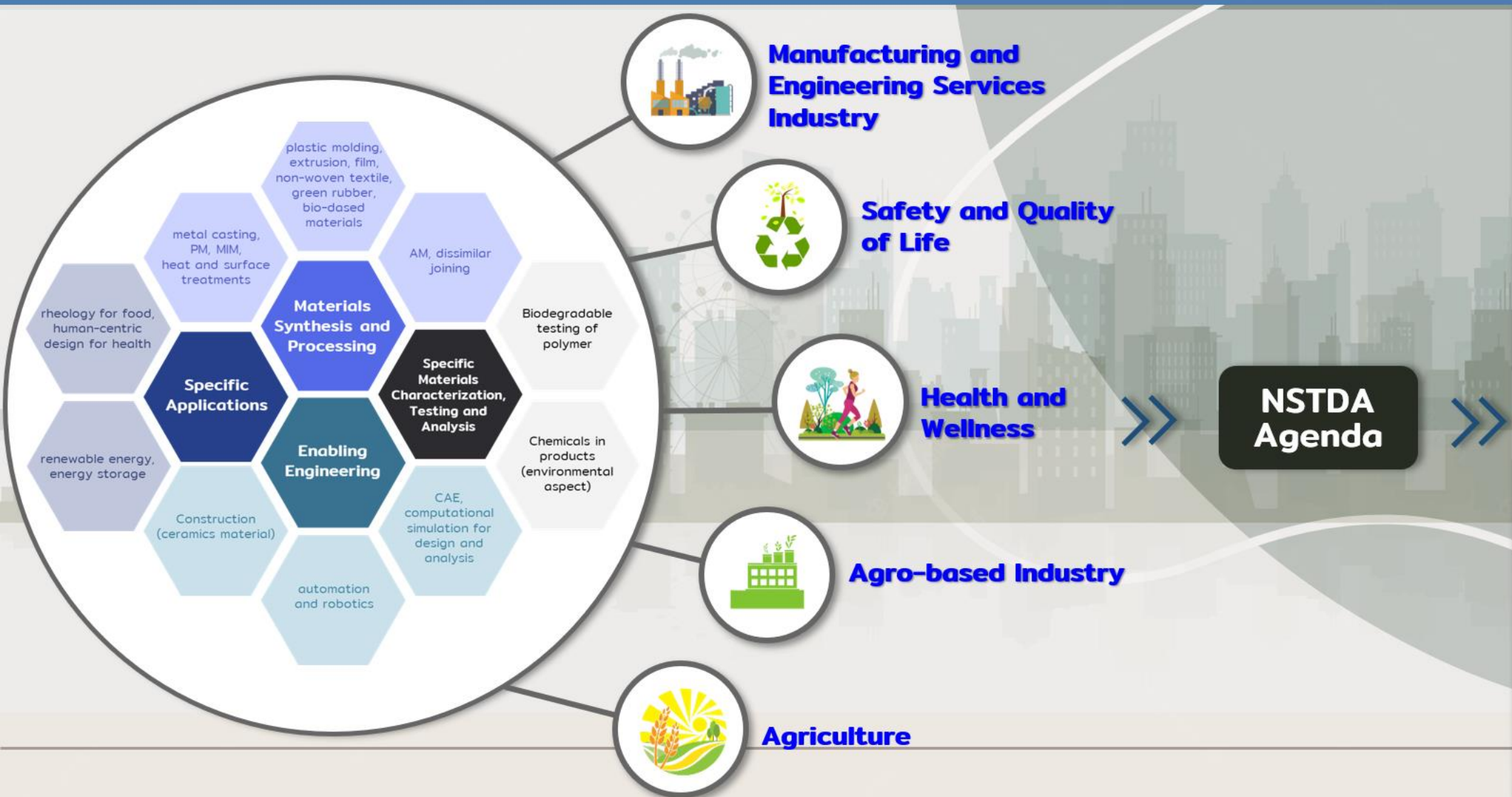
**Digital and
Electronics**

Circular and Green Economy

(Agriculture, Food, Tourism, Environmental friendly living, Sustainability)

Platform Technology / Frontier Research

National Metal and Materials Technology Center



Agriculture and Food



Health and Wellness



Energy and Environment



Digital and Smart Electronic

Technologies towards Net Zero Emission (Thailand) : Our Analysis

GHG emission reduction

Renewable/ Alternative energy

1. Bioenergy
2. Solar
3. Wind
4. H₂ energy
5. Nuclear
6. Energy Storage
7. Smart grid

9. Energy saving/ Energy efficiency

10. Improvement of IPPU (cement)
11. Improvement of IPPU (refrigerant)

12. Agricultural management

13. Circular economy and waste management

8. electrification

GHG capture

14. Carbon capture and utilization (CCU)

15. Carbon capture and storage (CCS)

16. Nature-based solutions

Energy and Transportation

- Energy and electricity generation
- Transportation
- Energy in Industrial sector
- Energy in Household
- Energy in Buildings
- Energy for Agriculture

Industrial Processing

Waste Treatment

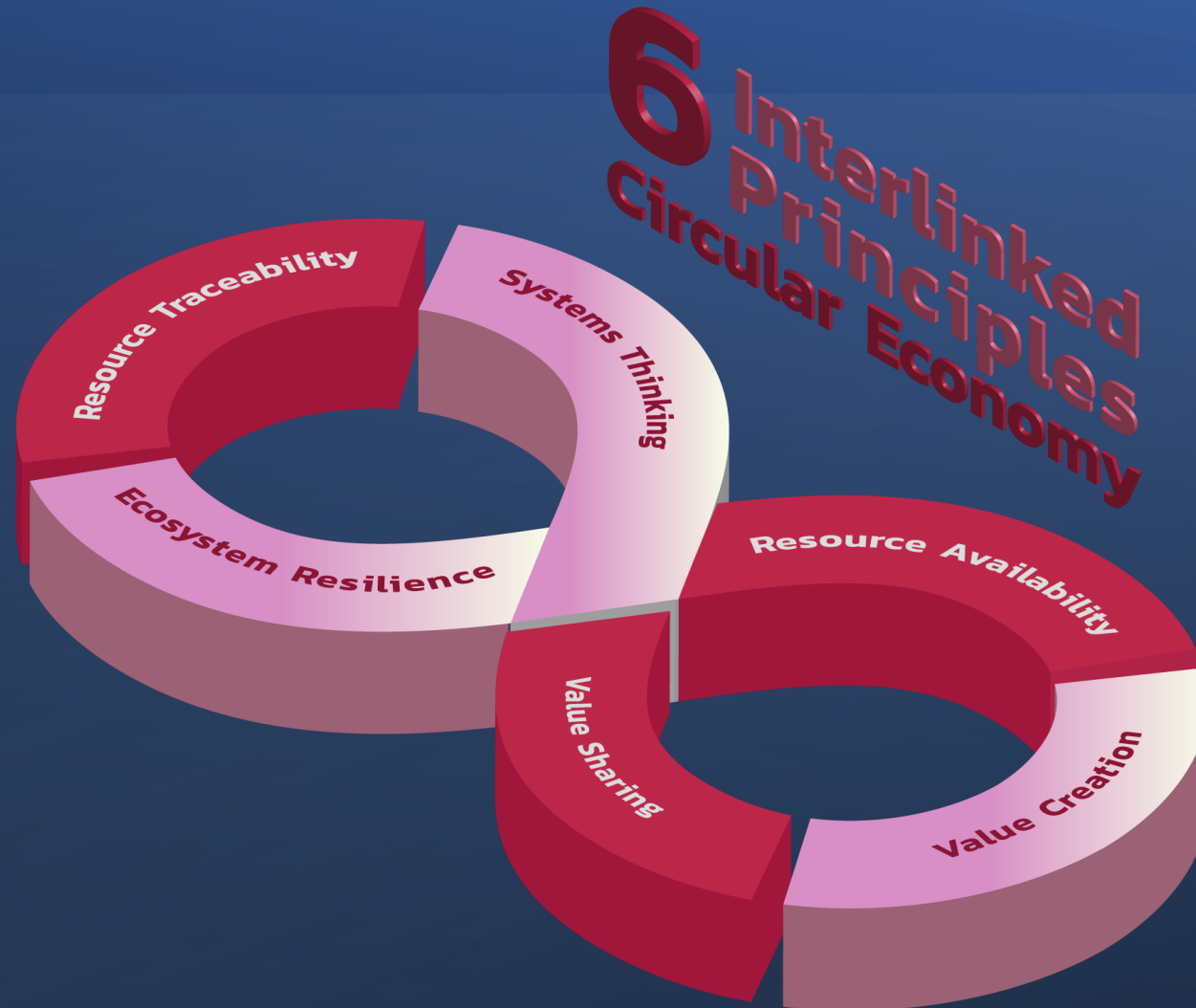
Agriculture

Forestation and Land Use

Cross-cutting approach

- Social sciences
- Financial and economic assessment and analysis
- Policy and Regulations (Tax, Incentives, Credit, Tariff, etc.)
- Life cycle assessment, Carbon footprint, Environmental assessment

Circular Economy and Net Zero Emission



Thank you



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