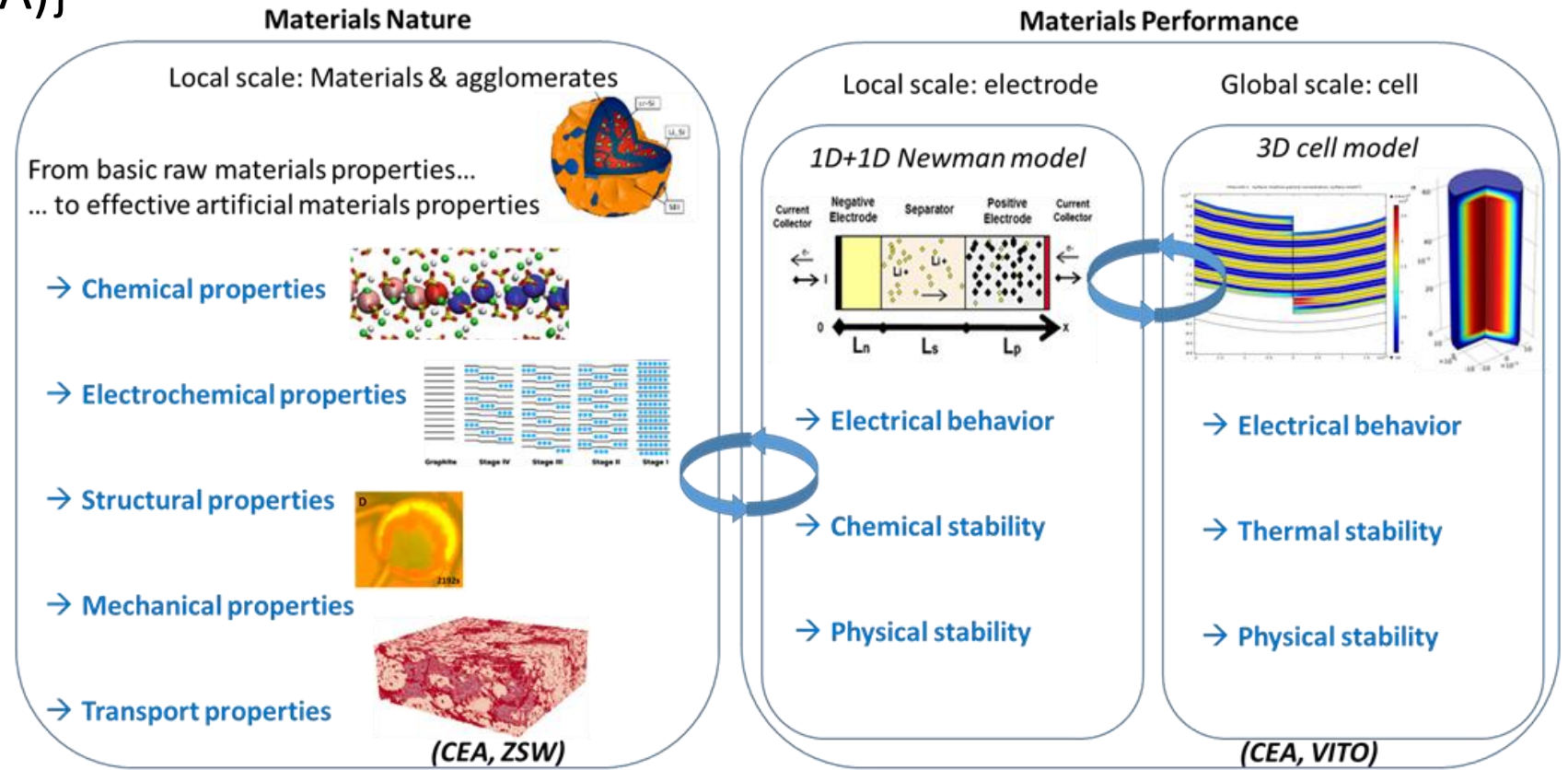


Modelling

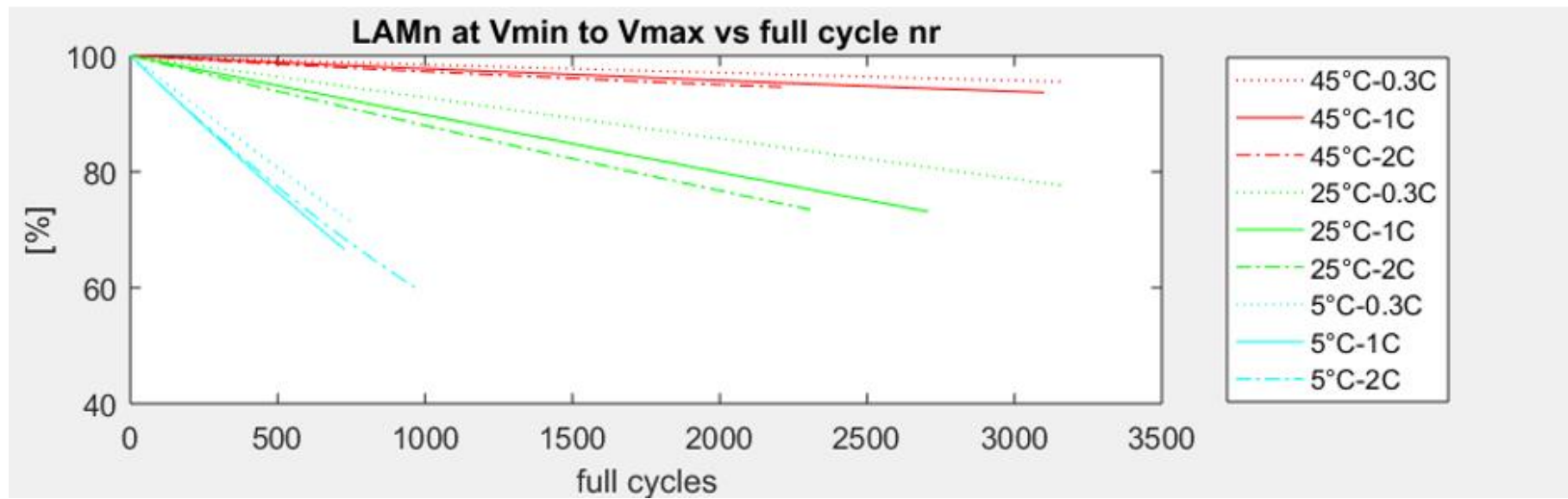
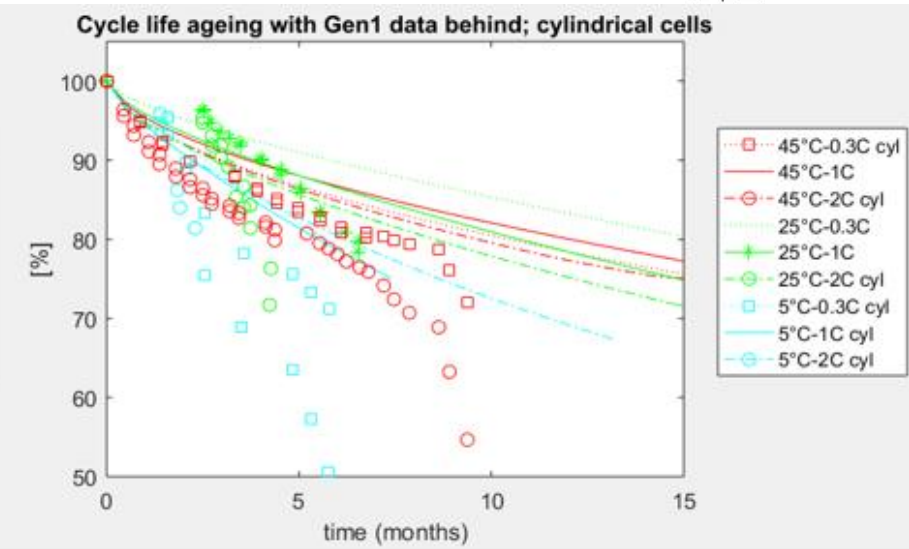
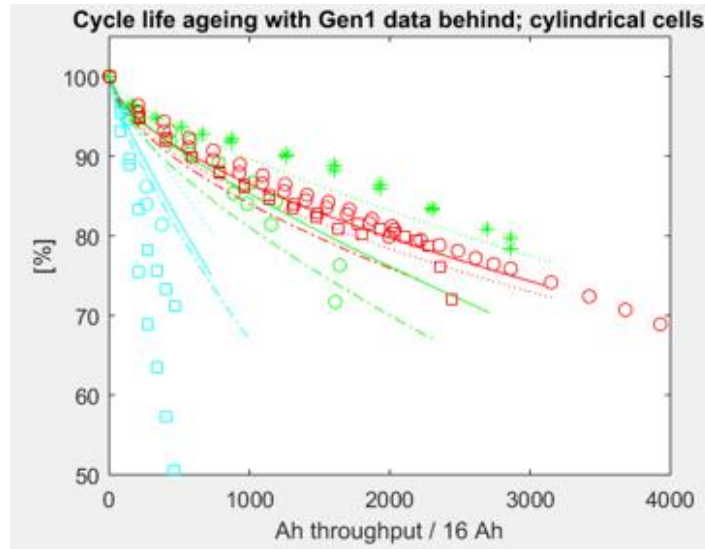
- Modelling of Material performance
 {Electrical behaviour (CEA, VITO);
 Chemical & Thermal stabilities (CEA, VITO);
 Physical stability (CEA)}



Modelling



Example:
Understanding ageing
based on physics-
based relations



R&D Status: Advanced

Modelling

What can we characterize : electrodes – cells – batteries

Experimental time: 2 weeks or longer

Advantage: best way to understand and predict battery behaviour

-- battery design

-- ageing > improved use profiles

Drawback: Measurement data depending. Time consuming, but less than doing many experiments

R&D Status: Advanced

- SEI growth mechanism
- Li-plating mechanism
- Active material loss mechanism

