

## BEIS UK/South Korea Bilateral Collaboration on Smart Energy Innovation – Summary Project Details

- 3 bilateral, experimental development projects;
- Total value of UK grants awarded: £1,664,839

Lead UK Company	UK Partners	Lead South Korea organisation	Project Title	Brief Project Description	UK Grant Award
GridDuck	GenGame	Gachon University	Energy Flexibility via V2G Gamification	This project demonstrate how gamification of EV charging and V2G charging and discharging in South Korea and the UK can better balance electric loads locally and nationally.	£360,000
Electron	N/A	GridWiz	Project Artemis	This project will pilot an energy flexibility trading platform in South Korea. The partners will collaborate to research, design and test energy flexibility products for the South Korean electricity market. Building upon Electron’s existing flexibility trading platform, the project aims to assist the development of a marketplace that can provide price signals to incentivise demand side response capacity, maximise the value of existing assets and inform investment decisions for flexibility providers and grid operators.	£430,081
Doosan Babcock Ltd	Innovatium LLP University of Birmingham Advanced Forming Research Centre (AFRC)	Institute for Advanced Engineering (IAE)	Demand Response using Off-peak Power for Liquefied air Energy storage Technologies (DROPLET)	This project will demonstrate a liquid air production and storage system that uses existing spare air compressor capacity and off-peak power to produce and store liquefied air, which has a significantly higher specific energy density relative to existing methods. The stored liquid air will then be used in place of running air compressors at selected times, improving the efficiency of existing compression systems allowing electricity consumption periods to be shifted to times of lower demand.	£874,758