

Project ID	DIP113		
Long Title	Tidal Energy Storage System		
Short Title	TESS		
Keywords	Site; Rural; Multi-sector/Grid; Electricity; Tidal; Direct Electric Storage; Power Quality & Grid Integration;		
Location (Town, Region, Country)	Bluemull Sound	Shetland	Scotland
Latitude and Longitude	60.69N	0.99W	
OSGB code	HP 55 01		
Status	Ongoing		
Start Date	2017		
End Date	2018		
Description	<p>Nova Innovation has secured funding from the Scottish Government's Low Carbon Infrastructure Programme (LCITP) to build and operate an energy storage solution for the Shetland Tidal Array. A key aim of the project is to demonstrate the economic and technical benefit of combining Nova's tidal array and an energy storage system to enable array expansion and overcoming of grid constraints.</p> <p>The system combines energy storage with renewable generation to allow control of output to the grid, contributing to grid stability. The project has the potential to facilitate the development of a Scottish supply chain in the emerging smart grid, energy storage and renewable market.</p>		
Sectors	Generation		
Funding Sources	Low Carbon Infrastructure Programme		
Budget £	£317,000 (£188,000 from LCITP)		
Partners	Nova Innovation, Denchi		
Energy vectors	Electricity		
Scale (lab/site/ small/community/region/national)	Site		
Technologies demonstrated	Battery storage, tidal		
Economic models demonstrated	Grid services, new commercial models		
Other concepts demonstrated	Grid constraint mitigation		
Industry engagement			
Consumer engagement			
Project Reports (incl. links)			
Datasets (incl. links)			
Website/social media	https://www.novainnovation.com/lcitp		
Information sources	As above		