

The SVR's Harrier Hydroshunter project passes a significant milestone

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The Severn Valley Railway is celebrating the successful completion of the latest stage of its Harrier Hydroshunter project, with the removal of the original diesel engine from a Class 08 'donor' shunter.

The leading heritage railway is working in partnership with the University of Birmingham and local start-up company Vanguard Sustainable Transport Solutions, to carry out the UK's first-ever conversion of a diesel shunter to run on hydrogen power.

The railway hired in a giant 100-tonne crane to lift the diesel engine out of the Class 08 shunter, 08635, at its Kidderminster diesel depot. Now the project can progress to the next stage, the installation of a hydrogen-battery hybrid traction system, that's being developed at the University of Birmingham.

The lift of the shunter engine was preceded by the removal of the 34-tonne 2700hp engine from a Class 50. The power unit for 50033 'Glorious' will now have a replacement generator fitted.

Tony Middleton, the Class 50 Association's volunteer engineering director worked across both engine lifts and said: "This stage of the project has been a long time in preparation and it's given the opportunity for a

number of our younger volunteers to work on an exciting and groundbreaking scheme.

“They’ve had to make a lot of preparations, stripping the components and removing the nuts and bolts.”

The original diesel engine is no longer required for the Harrier Hydroshunter, but will be used for training and to provide spare parts for future engineering projects.

Peter Amor, project engineer at Vanguard Sustainable Transport Solutions, was thrilled to see the engine lifted out of the donor shunter. He said: “We’re really making some fantastic progress on this project and it’s thanks to the hard graft of Severn Valley Railway volunteers that we’ve now reached this stage. This has been the culmination of a lot of work and it’s absolutely fantastic to see the lift taking place!”

“I’m thrilled that we’ve got this far and I can’t wait to continue pushing ahead with the design of the hydrogen power pack.”

After the Harrier Hydroshunter receives its new power pack, it’s planned that testing will take place at the Severn Valley Railway later this year.

Photo credit: Phil Seymour

Video credit: Severn Valley Railway