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As-build process for accelerator, target and neutron scattering systems at European Spallation Source

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As the European Spallation Source (ESS) advances through construction and commissioning in Lund, Sweden, it is crucial to evaluate the status of each system and ensure that 3D models and 2D drawings accurately represent on-site conditions. The as-built process for mechanical systems is fundamental in maintaining accuracy, ensuring compliance, and reducing risks while easing future maintenance. Achieving this requires strong collaboration between project management, design, engineering, and installation teams to track modifications, resolve discrepancies, and systematically document changes. Data from 3D scans, manufacturer documentation, NCRs, and project records are utilized to compare the built structures with the original designs. This contribution outlines the as-built process, its key stakeholders, and their roles at different project stages. Additionally, it presents a proof of concept showcasing the benefits and challenges of its implementation at ESS.

Footnotes

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