

TITLE: Implementation of Electrical Impedance Tomography

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The project aims to develop and expand an existing algorithmic reconstruction of electrical impedance tomography (EIT). This is an imaging method, which seeks to reconstruct the electric conductivity of a conducting body by suitable measurements at the boundary. Part of the project will involve the numerical implementation of partial differential equations, and another the implementation of optimization algorithms. Another part will involve machine learning implementation. Yet another will involve the operation and further development of an EIT measurement device, and the processing of the measurements in our algorithm.