

UiO : Department of Physics
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Project 5: The diffusion equation

FYS3150 - Computational physics

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Abstract

Hei.

1 Mathematical theory

1.1 Forward Euler

1.1.1 Derivation

1.1.2 Error analysis

1.2 Backward Euler

1.2.1 Derivation

1.2.2 Error analysis

1.3 Crank-Nicolson

1.3.1 Derivation

1.3.2 Error analysis