



Master thesis

Title

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Kurzzusammenfassung

Abstract

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Conventions

Throughout the text of this thesis scalars are written in italic s, vectors in bold italic *s and matrices in bold $\mathbf M$ fonts. A matrix element is denoted as $[\mathbf M]_{\alpha,\beta}$. The summation/multiplication over nearest neighbour sites i and j is $\langle ij \rangle$ as a subscript to \sum /\prod . Furthermore, Hartree atomic units are used in general and only in selected instances it is deviated from this: $\hbar = m_{\rm e} = {\rm e}^{-4\pi/\varepsilon_0} = 1$.

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I Conclusion

List of Symbols

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