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## On transport properties of Majorana fermions in superconductors: free & interacting

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# **On transport properties of Majorana fermions in superconductors: free & interacting**

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Front cover: Spectral function of the SYK impurity lattice with the lines of zeros. Chiral Majorana mode propagating along the edge of a two-dimensional topological superconductor, with a graphene fragment in the lower left corner. Back cover: Tunneling spectroscopy of a black hole chip (SYK quantum dot), on the background of a graph of the low-high voltage duality derived in this thesis. The author's name is tilted representing the "rotating" Holstein-Primakoff approach proposed in this thesis.

*To my parents.*  
*Моим родителям.*



# Contents

|          |   |           |
|----------|---|-----------|
| <b>1</b> | <b>Introduction</b>   | <b>1</b>  |
| 1.1      | Preface . . . . .   | 1         |
| 1.2      | Electrical signatures of Majorana surface states . . . . .  | 4         |
| 1.3      | The Sachdev-Ye-Kitaev model in solid state systems . . . . .  | 6         |
| 1.4      | This thesis . . . . .   | 10        |
| 1.4.1    | Chapter 2 . . . . .   | 10        |
| 1.4.2    | Chapter 3 . . . . .   | 10        |
| 1.4.3    | Chapter 4 . . . . .   | 11        |
| 1.4.4    | Chapter 5 . . . . .   | 11        |
| 1.4.5    | Chapter 6 . . . . .   | 12        |
| 1.4.6    | Chapter 7 . . . . .   | 12        |
| 1.4.7    | Chapter 8 . . . . .   | 12        |
| <b>2</b> | <b>Wiedemann-Franz-type relation between shot noise and thermal conduction of Majorana surface states in a three-dimensional topological superconductor</b> | <b>15</b> |
| 2.1      | Introduction . . . . .  | 15        |
| 2.2      | Surface-sensitive thermal and electrical conduction . . . . .   | 17        |
| 2.2.1    | Description of the geometry . . . . .   | 17        |
| 2.2.2    | Scattering formulas . . . . .   | 18        |
| 2.2.3    | Electron-hole symmetry enforced upper bound on the shot noise power . . . . .   | 18        |
| 2.3      | Combined effects of electron-hole and time-reversal symmetries on the shot noise power . . . . .  | 19        |
| 2.3.1    | Surface Hamiltonian with tunnel coupling to metal contacts . . . . .  | 19        |
| 2.3.2    | Condition on the coupling matrix for equality of shot noise and thermal conductance . . . . .   | 21        |

|          |  |           |
|----------|--|-----------|
| 2.4      | Formulation and solution of the surface scattering problem   | 22        |
| 2.4.1    | Reduction to an effectively 2D geometry . . . . .  | 22        |
| 2.4.2    | Single-surface transmission matrix . . . . .   | 23        |
| 2.4.3    | Transmission matrix for coupled top and bottom surfaces . . . . .  | 24        |
| 2.5      | Thermal conductance and corresponding shot noise power .   | 26        |
| 2.5.1    | Single surface . . . . .   | 26        |
| 2.5.2    | Coupled surfaces . . . . .   | 27        |
| 2.5.3    | Finite aspect ratio . . . . .  | 28        |
| 2.5.4    | Locality condition . . . . .   | 29        |
| 2.6      | Numerical solution of the full 3D scattering problem . . .   | 30        |
| 2.6.1    | Model Hamiltonian . . . . .  | 30        |
| 2.6.2    | Translationally invariant system . . . . .   | 31        |
| 2.6.3    | Disorder effects . . . . .   | 33        |
| 2.7      | Discussion . . . . .   | 33        |
| 2.8      | Appendix: Matrix Green's function of the surface Hamiltonian . . . . .                                       | 35        |
| 2.8.1    | Single surface . . . . .   | 36        |
| 2.8.2    | Coupled top and bottom surfaces . . . . .  | 37        |
| <b>3</b> | <b>Topologically protected charge transfer along the edge of a chiral <math>p</math>-wave superconductor</b> | <b>39</b> |
| 3.1      | Introduction . . . . .   | 39        |
| 3.2      | Full counting statistics of Majorana edge states . . . .   | 41        |
| 3.2.1    | Finite temperature . . . . .   | 43        |
| 3.3      | Discussion . . . . .   | 45        |
| 3.4      | Appendix: Effect of a tunnel barrier at the NS contact . .   | 47        |
| <b>4</b> | <b>Valley switch in a graphene superlattice due to pseudo-Andreev reflection</b>                             | <b>49</b> |
| 4.1      | Introduction . . . . .   | 49        |
| 4.2      | Graphene superlattice with anti-unitary symmetry . . . .   | 50        |
| 4.3      | Topological phase transitions . . . . .  | 52        |
| 4.4      | Valley switch . . . . .  | 54        |
| 4.5      | Robustness of the valley switch . . . . .  | 55        |
| 4.6      | Conclusion . . . . .   | 57        |
| 4.7      | Appendix: Scattering matrix of the graphene superlattice .   | 57        |

|  |           |
|--|-----------|
| <b>5 Low-high voltage duality in tunneling spectroscopy of the Sachdev-Ye-Kitaev model</b>                           | <b>59</b> |
| 5.1 Introduction . . . . .   | 59        |
| 5.2 Tunneling Hamiltonian . . . . .  | 61        |
| 5.3 Tunneling current . . . . .  | 62        |
| 5.4 Low-high voltage duality . . . . .   | 63        |
| 5.5 Conclusion . . . . .   | 64        |
| 5.6 Appendix: Outline of the calculation . . . . .   | 65        |
| 5.6.1 Generating function of counting statistics . . . . .   | 65        |
| 5.6.2 Saddle point solution . . . . .  | 66        |
| 5.6.3 Average current and shot noise power . . . . .   | 67        |
| <b>6 Isolated zeros in the spectral function as signature of a quantum continuum</b>                                 | <b>69</b> |
| 6.1 Introduction . . . . .   | 69        |
| 6.2 Isolated zeros in the spectral function . . . . .  | 71        |
| 6.3 SYK model . . . . .  | 73        |
| 6.4 Cluster of SYK nodes . . . . .   | 75        |
| 6.5 Holographic fermions . . . . .   | 77        |
| 6.6 Conclusion . . . . .   | 79        |
| 6.7 Appendix: Outline of the calculation . . . . .   | 80        |
| 6.7.1 Inclusion of general coupling between discrete levels  | 80        |
| 6.7.2 Mean-field treatment of the SYK model with two component impurity . . . . .                                    | 81        |
| 6.7.3 Multiple states coupled to the SYK continuum . . . . .   | 83        |
| 6.7.4 Effective momentum coupling by the SYK chain . . . . .   | 85        |
| <b>7 Gapless odd-frequency superconductivity induced by the Sachdev-Ye-Kitaev model</b>                              | <b>87</b> |
| 7.1 Introduction . . . . .   | 87        |
| 7.2 The model . . . . .  | 88        |
| 7.3 SYK proximity effect . . . . .   | 89        |
| 7.4 Conclusion . . . . .   | 94        |
| 7.5 Appendix: Gor'kov Green's function for the QD variables .  | 94        |
| <b>8 First-order dipolar phase transition in the Dicke model with infinitely coordinated frustrating interaction</b> | <b>99</b> |
| 8.1 Introduction . . . . .   | 99        |
| 8.2 Dicke Hamiltonian for a Cooper pair boxes array . . . . .  | 101       |

|                             |  |            |
|-----------------------------|--|------------|
| 8.3                         | Diagonalization of the frustrated Dicke model . . . . .                        | 104        |
| 8.3.1                       | Tunneling regime . . . . .   | 104        |
| 8.3.2                       | Rotating Holstein-Primakoff representation . . . . .                           | 106        |
| 8.3.3                       | Superradiant dipolar regime . . . . .  | 108        |
| 8.4                         | First order dipolar phase transition . . . . .                                 | 111        |
| 8.5                         | Conclusions . . . . .  | 117        |
| 8.6                         | Appendix: Bogoliubov's transformation for the frustrated Hamiltonian . . . . . | 117        |
| 8.7                         | Appendix: Quantum phase transition in the Dicke model .                        | 119        |
| <b>Bibliography</b>         |  | <b>123</b> |
| <b>Summary</b>              |  | <b>139</b> |
| <b>Samenvatting</b>         |  | <b>143</b> |
| <b>Curriculum Vitæ</b>      |  | <b>147</b> |
| <b>List of Publications</b> |  | <b>149</b> |