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| <b>Title:</b>    | <b>A privacy-preserving protocol for finding the nearest doctor in an emergency</b>                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
| <b>Year:</b>     | 2010                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| <b>Author:</b>   | Georgios Drosatos, Pavlos S. Efraimidis                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
| <b>Abstract:</b> | <p>In this work, we define the Nearest Doctor Problem (NDP) for finding the closest doctor in case of an emergency and present a secure multi-party computation for solving it. The solution is based on a privacy-preserving cryptographic protocol and makes use of the current location of each participating doctor. The protocol is efficient and protects the privacy of the location of all doctors. A prototype implementing the proposed solution for a community of doctors that use mobile devices to obtain their current location is presented.</p> |