

Supertranslations at spatial infinity and boundary conditions for Ashtekar-Barbero variables

We want to explore suitable boundary conditions for the asymptotically flat scenario of general relativity presented in terms of Ashtekar-Barbero variables. While the standard parity conditions have been already extensively studied, it turns out that they fail to produce non-trivial supertranslations at spatial infinity. We propose new parity conditions for the Ashtekar-Barbero variables that do yield non-trivial supertranslation charges at spatial infinity.

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