

A list of references concerning Lie-point symmetries of differential equations

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What follows is the reference/bibliography section from a volume (maybe) in preparation; together with a few references concerned with other topics met in the course of the discussion along the volume, it gives a substantial amount of bibliography for what concerns Lie-point symmetries of differential equations, in particular for what concerns applications to equations of interest in Physics and Mathematical Physics; special attention is given to papers published in the last few years.

I hope the work of collecting this bibliography can be of interest, and maybe even useful, to other people, so that I put it at disposition of anybody interested in the subject, in the hope I did not forget or overlook too many contributions; I would be glad of any help in filling the gaps in it.

References

For ease of the reader, we have collected here all the references quoted along the volume; we have also added a substantial number of other works which were not quoted but which deal directly or are concerned with, and/or relevant to, the general topic of Lie-point symmetries of differential equations. This bibliography has no ambition to be complete (and we apologize to authors which were not included only because of lack of attention by the present author), but we think it can be a service to the reader and help him to know about the existence and location of a certain amount of papers relevant to the topic; it seems to the author that this surely quite incomplete list is nevertheless the biggest one available at this moment.

In the search for relevant papers, as the reader will easily notice, we have particularly concentrated our attention on recent contribution; this list can be supplemented with the works quoted in the bibliographic sections of Olver or Bluman and Kumei books. A number of older works are also quoted, too; in particular we have tried to quote a number of very old issues concerned with group analysis of differential equations we were aware of, to illustrate how the topic is not at all new, and how substantial steps were performed a long time ago (which does not exclude that they could have been forgotten for a while).

The reader will also immediately notice that we have not quoted the father of all the story, i.e. Sophus Lie. The quotation of his complete works is, we think, implicit. Another, less easy to be fixed, hole in the bibliography is constituted by russian works which were not translated into western languages. Here no excuse is possible, and I can only apologize for not being able to accede the russian literature, first of all for not reading russian. Some list of russian references can be find in the review papers (most of them appearing in "Russian Mathematical Surveys") and books written by russian authors and quoted here.

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