

**Sbitneva, Larissa V.**

**Transsymmetric spaces. New results.** (English) [\[Zbl 0947.20054\]](#)

Kolář, Ivan (ed.) et al., Differential geometry and applications. Proceedings of the 7th international conference, DGA 98, and satellite conference of ICM in Berlin, Brno, Czech Republic, August 10-14, 1998. Brno: Masaryk University. 437-442 (1999).

After necessary preliminaries on transsymmetric spaces [see *L. V. Sabinin, L. L. Sabinina* and the author, Publ. Math. 54, No. 3-4, 303-311 (1999)], the author announces a number of new results on perfect transsymmetric spaces. The most interesting of them is that any geodesic loop of a perfect transsymmetric space is a left Bol loop. Other results give a complete description of perfect transsymmetric spaces as reductive spaces in terms of Lie algebras.

For the entire collection see [\[Zbl 0923.00021\]](#).

Reviewer: [Vladislav V. Goldberg \(Newark/New Jersey\)](#)

**MSC:**

- [20N05](#) Loops, quasigroups
- [53C35](#) Differential geometry of symmetric spaces
- [22A30](#) Other topological algebraic systems and their representations
- [14M17](#) Homogeneous spaces and generalizations
- [17D99](#) Other nonassociative rings and algebras

**Keywords:**

[perfect transsymmetric spaces](#); [quasigroups](#); [geodesic loops](#); [reductive spaces](#); [left Bol loops](#)

**Full Text:** [EMIS](#)