## October 2, 2023 Yuri G. Prokhorov Cylinders in algebraic manifolds

A smooth projective variety X is said to be cylindrical if it contains a cylinder, i.e., a Zariski open subset U isomorphic to a product  $Z \times \mathbb{A}^1$  for some variety Z. The existence of a cylinder is closely related to the existence an effective action of the additive group  $\mathbb{G}_a$  on an affine cone over X. I am planning to survey old and new results on the existence of a cylinder on algebraic varieties focusing on the case of varieties with  $b_2(X) = 1$ .

## SCIENTIFIC SEMINAR "DIFFERENTIAL GEOMETRY AND APPLICATIONS"

headed by Academician of RAS Anatoly T. Fomenko

The seminar takes place online in ZOOM on Mondays from 4:45 p.m. to 6:20 p.m. (Moscow time) The zoom-ref is provided only to registered persons To be registered, ask any participant of our seminar to endorse you Announcements of previous talks can be found on the seminar website http://dfgm.math.msu.su/chairsem.php