

## **Gelfand problem and autoignition of laminar jets**

In this talk I will discuss an elementary model for auto-ignition of laminar jets. This model is based on Frank-Kamenskii theory of thermal explosion in a context of non-premixed flames and therefore can be viewed as a kind of extension of a classical Gelfand problem. I will discuss several monotonicity properties of the model and its limiting behavior for large and small jets.