

# PERSPECTIVES OF GENOME EDITING AND METABOLIC MODELLING OF METHANOTROPHIC BACTERIA

International seminar; March 22, 2023

## Scientific Programme:

1. 18.00 -18.05: **Dedysh S.N.** Opening remarks and welcome to participants (Research Center of Biotechnology RAS, Moscow, Russia).  
18.05 – 19:05: **Kalyuzhnaya M.G.** “Methanotrophy inside out: from a cell to biotechnology” (San Diego State University, San Diego, USA).
2. 19.05 – 19.40: **Akberdin I.R.**, Kulyashov M., Kolmykov S., Hamilton R., Khlebodarova T.M., Kalyuzhnaya M.G. “Perspectives of transcriptomics data integration into a metabolic model of the methanotrophic bacterium *Methylovulum microbium alcaliphilum* 20ZR” (Sirius University, Sochi, Russia).
3. 19.40 – 20.00: **Oshkin I.Y.**, Suleimanov R.Z., Dedysh S.N. “*Methylococcus capsulatus* MIR as a new object for genomic and transcriptomic studies” (Research Center of Biotechnology RAS, Moscow, Russia).
4. 20.00 – 20.35: **But S.Y.** “Genome editing of methanotrophic bacteria: challenges and reproducibility” (Pushchino Scientific Center for Biological Research of RAS, Pushchino, Moscow region, Russia).
5. 20.35 – 21.05: **Rozova O.N.**, Khmelenina V.N. “Features and mysteries of the metabolism of the obligate methanotroph *Methylococcus capsulatus*” (Pushchino Scientific Center for Biological Research of RAS, Pushchino, Moscow region, Russia).
6. 21.05- 21.30: Discussions and final remarks.

## Participants:

1. **Prof. Marina G. Kalyuzhnaya**  
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San Diego, USA
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- 6. Dr. Ilya R. Akberdin**  
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