

VIII INTERNATIONAL CONFERENCE

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«Advanced Agritechnologies, Environmental Engineering and  
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«Population of the *Columba livia* in Yoshkar-Ola and execution of the  
ecological project "Watch out, ornithosis!"»

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# Problem statement

- Currently, the population of synanthropic bird species in cities is increasing every year, which draws the attention of scientists to the study of the processes of formation of stability of synanthropic bird species, such as the *Columba livia* (Gmelin, 1789).
- The purpose of this work is to analyze the state of the *C. livia* population in the central part of the city of Yoshkar-Ola and to present the first results of the project "Watch out, ornithosis!" from the Presidential Grants Foundation of the Russian Federation.



# Solution methods

- We conducted research in Yoshkar-Ola (Mari El Republic, Russia). We studied the seasonal dynamics of *C. livia* abundance during 2018-2019 and 2021-2022. The birds were counted by the route method, on a transect with a fixed width.
- As part of the "Watch out, ornithosis!" project, performers and volunteers in February – May 2022 conducted a survey of the people demonstrating their level of knowledge about ornithosis and other diseases carried by urban birds.
- For the statistical analysis we used the  $\chi^2$  criterion, ANOVA, Scheffe's test.





# Conclusions

## Results, implementation



Figure. *Columba livia* on boulevard in Yoshkar-Ola

- For 4 years, the population density of pigeons in the city center has increased and amounted to about 1,000 individuals per km<sup>2</sup> (Figure).
- As part of the first phase of the project "Watch out, ornithosis!" from the Presidential Grants Foundation of the Russian Federation we conducted a survey of the citizens. As a result of the survey, we identified risk groups of the people due to ignorance about the features of the disease ornithosis. Older people feed pigeons more often and do not know about the diseases that birds carry. Schoolchildren also do not know about ornithosis.

# Contacts

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