

## Propositions

Belonging to the thesis: “Microbubbles in molecular imaging and drug delivery”

Ilya Skachkov, 20 January 2016

1. The egg came first.  
*(this thesis)*
2. Microbubbles can be used for therapy with small molecules, large particles and stem cells.  
*(this thesis)*
3. Microbubbles, like humans, play better in teams.  
*(this thesis)*
4. Ultrasound settings can shift the balance between reversible and irreversible sonoporation.  
*(this thesis)*
5. Baby-birds and bubbles like CHIRPs.  
*(this thesis)*
6. An engineer can teach a biologist to calibrate an ultrasound transducer, a biologist can teach an engineer to culture cells, *but* both never good enough to make them feel satisfied about each other.
7. Medicine is a science of uncertainty and an art of probability.  
*William Osler*
8. The goal of science and engineering is to build better mousetraps. The goal of nature is to build better mice.
9. Being a biologist in the lab is like being chef in high rank Michelin restaurant, the cells you are taking care of always get more expensive lunch than you are.
10. You have to crack a few eggs to make an omelet.
11. There are no problems which can not be solved if you have a big mug of coffee and a friend to share it.