

Spring 2016

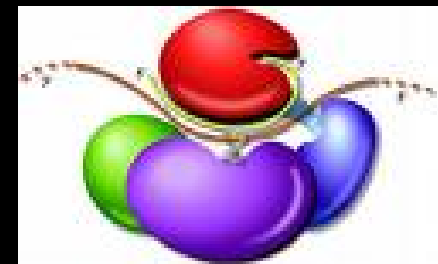
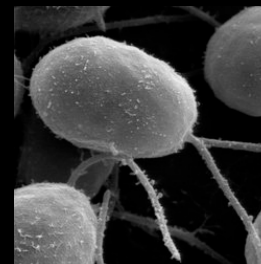
BIOL 6305/BIOL 4301- 066

RNA Silencing and Regulatory Small RNAs

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RNA Silencing, also known as **RNA Interference (RNAi)**, is a deeply conserved, sequence homology-based regulatory mechanism that operates in most eukaryotes. Starting with an introduction on the historical background, this course will cover our current understanding on the **biogenesis and function of microRNA (miRNA) and other classes of endogenous small RNAs** in a variety of eukaryotic model systems. Through lectures, presentations and class discussions on the milestone works, this course will expose graduate and upper division undergraduate students to the **cutting-edge development in this exciting and fast-moving frontier of molecular & cell biology**. Students with an interest in cell biology, molecular biology, biochemistry, genetics, and other related areas are all welcome to take this opportunity.



RNA Silencing & Regulatory Small RNAs

- Why should you consider taking this course ?

- One of the most *exciting* and *fast-moving* frontiers in biology
- An excellent example showing the *importance* of "junk DNAs"
- Important role of RNA silencing in processes such as *developmental* timing, tissue *patterning*, *transposon* taming, and *defense* against invading viruses
- Coverage of this topic in your current molecular & cell biology *textbooks* is either *none* or most likely *obsolete*
- Better prepare you for *graduate* school, *medical* school, or undergraduate *research* positions

- Questions? Please feel free to contact or meet the instructor