PBG 431 Plant Genetics recitation

Non Ribosomal peptide synthesis

Professor Joey Spatafora explained that some fungi attack insects and therefore could be used as a bio-control tool. The infected, dead insects are used like “zombies” to spread the fungal spores and infect new insect targets. Something interesting in this process is that the compounds that kill the insect can be useful in human medicine. For example, in humans, cyclosporine (a secondary metabolite) has been used widely to enable organ transplants.

What is unique about the synthesis of cyclosporine that “violates” the central dogma of molecular biology?