Total Synthesis of (+)-Roxaticin

Significance: The oxo-polyene macrolide (+)-roxaticin has been a popular target for the synthetic community. This synthesis requires only 20 steps and is particularly efficient due to a lack of chiral auxiliary controlled reactions and redox manipulations.

Comment: The key step in the synthesis is a C–C bond forming transfer hydrogenation (e.g. A → C), which is used to form seven C–C bonds.