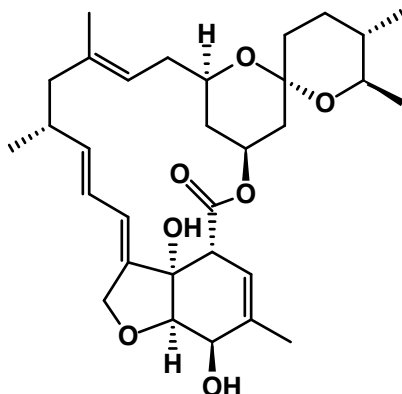


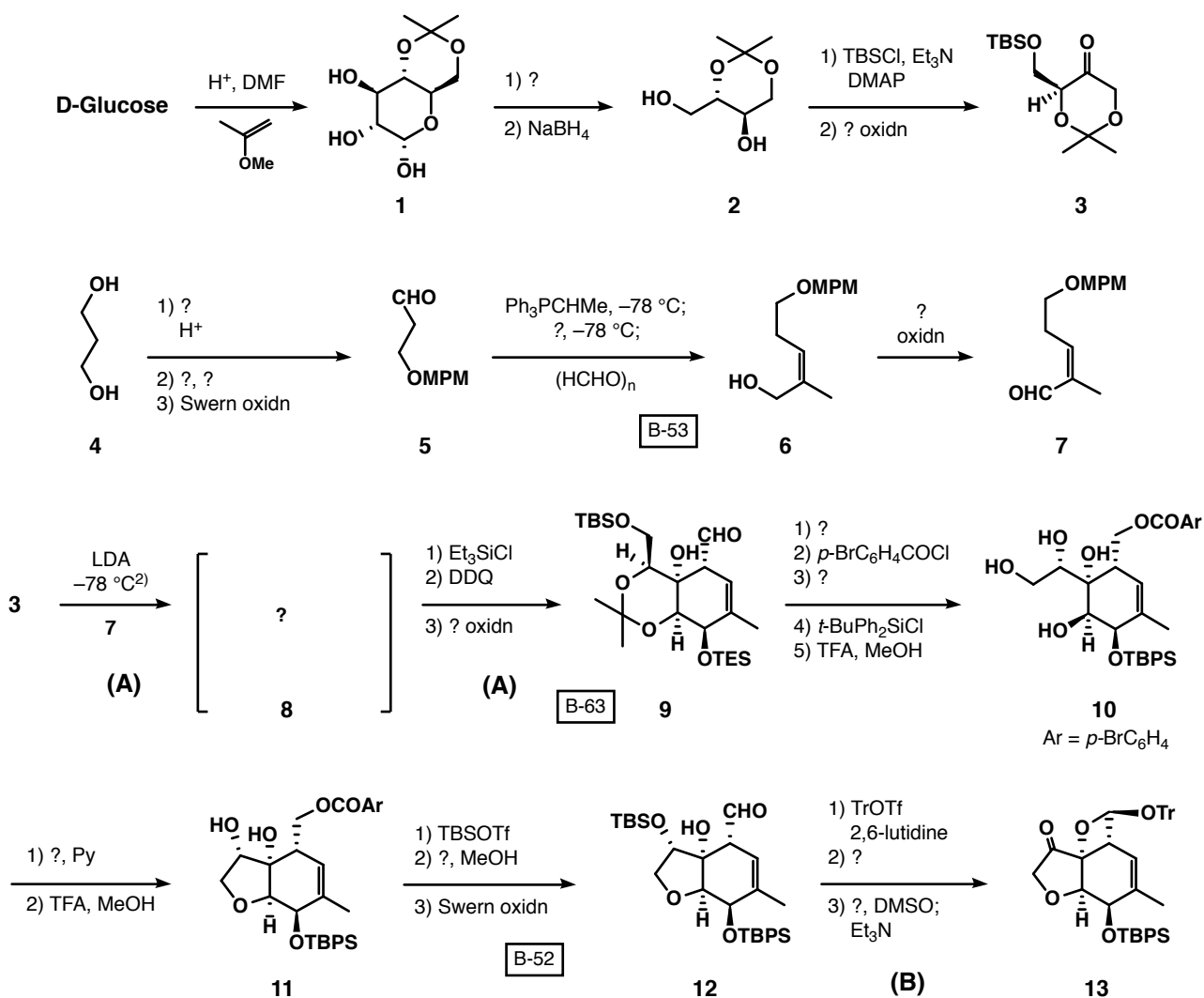
# Milbemycin $\alpha_1$ ( $A_3$ )<sup>\*</sup> (TKGP-180901)

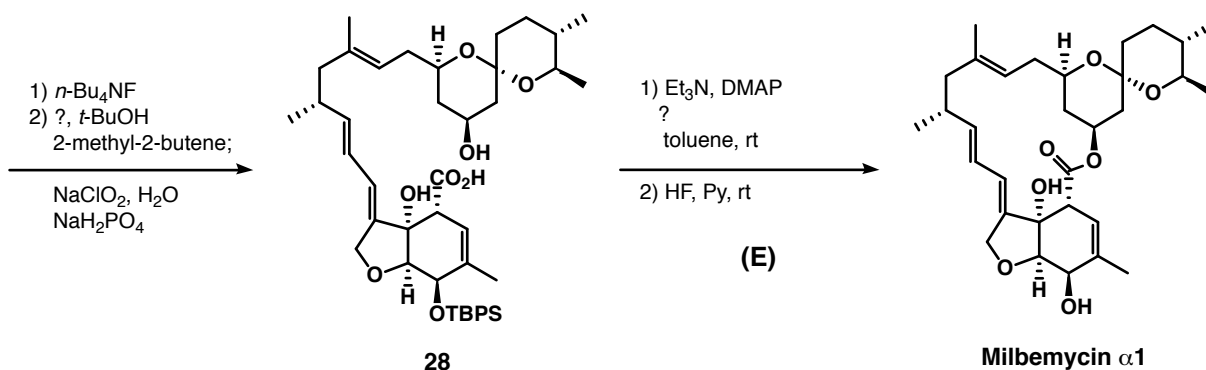
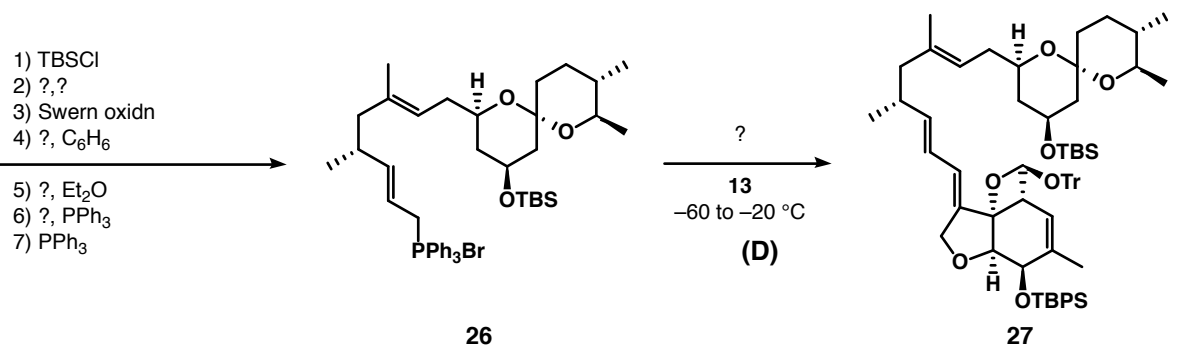
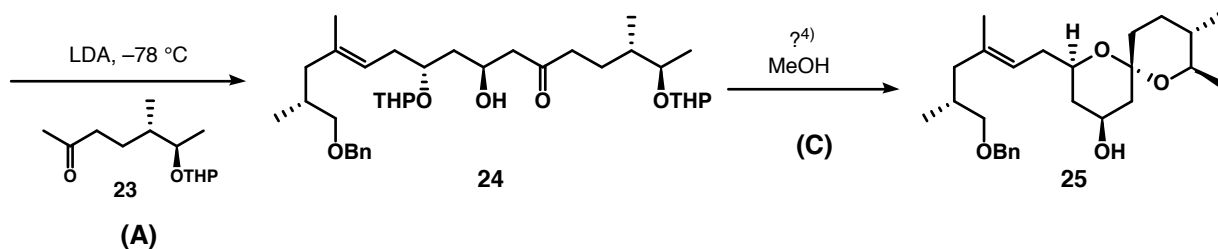
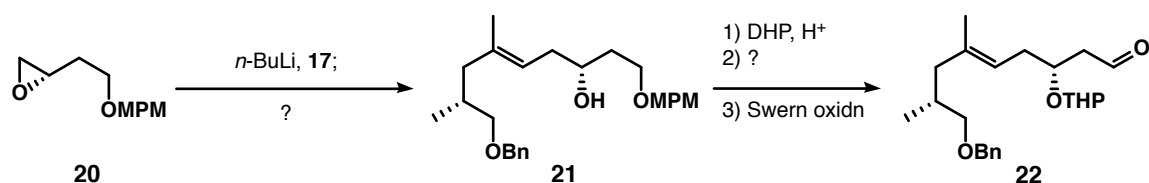
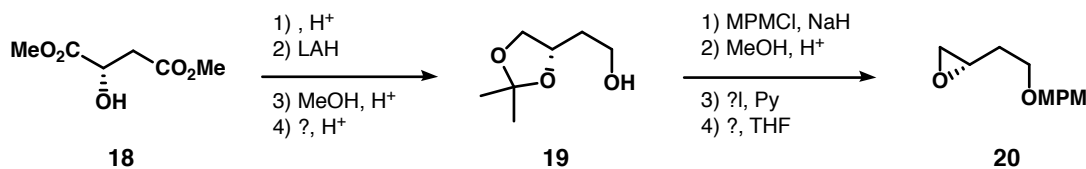
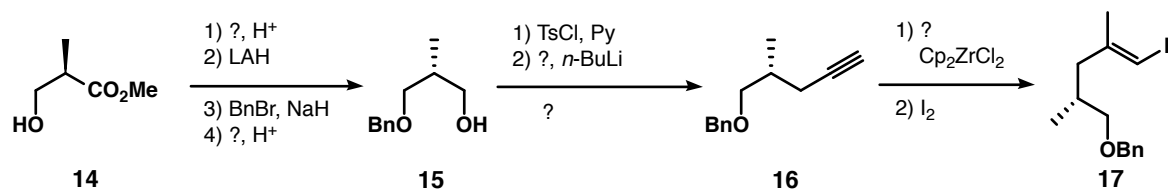
Masahiro Hirama<sup>1)</sup>



Activities: Antiparasitic

Key Reactions: A) Aldol condensation B) Oxetane acetal formation C) Spiroketalization  
D) Wittig reaction E) Macrolactonization





- References: 1) Hirama, M.; Noda, T.; Yasuda, S.; Itô, S. *J. Am. Chem. Soc.* **1991**, *113*, 1830.  
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