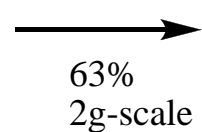


1. MeI, K₂CO₃ (77%)
 2. CoCl(PPh₃)₃,
 acetone (46%)



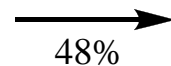
E

Py₂AgMnO₄,
 CH₂Cl₂



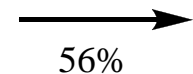
F

1. TBSCl
 2. Na-Hg



G

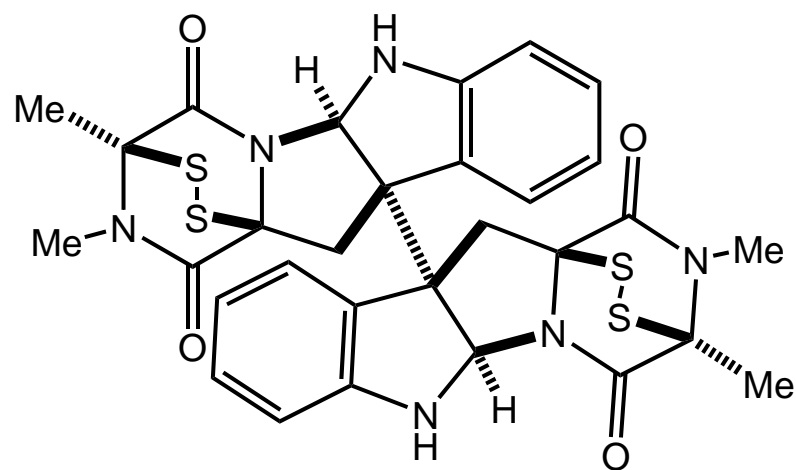
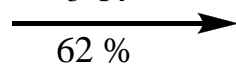
TFA, K₂CS₃
 CH₂Cl₂



H

H

1. HOCH₂CH₂NH₂
 acetone
 2. KI₃, pyridine



(+)-11,11'-dideoxyverticillin A