Tetrahedron 65 (2009) 5863–5877

Contents lists available at ScienceDirect

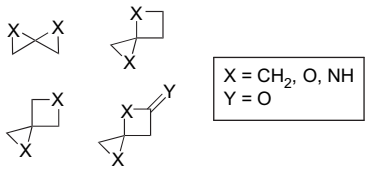
Tetrahedron

journal homepage: www.elsevier.com/locate/tet

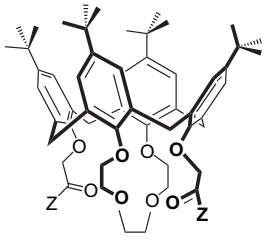
Tetrahedron Vol. 65, Issue 31, 2009

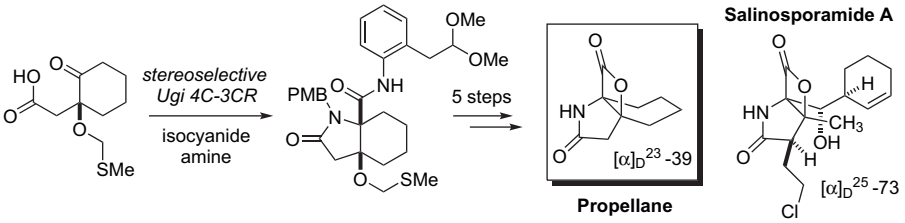
Contents

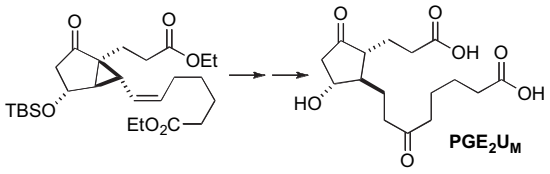
REPORT



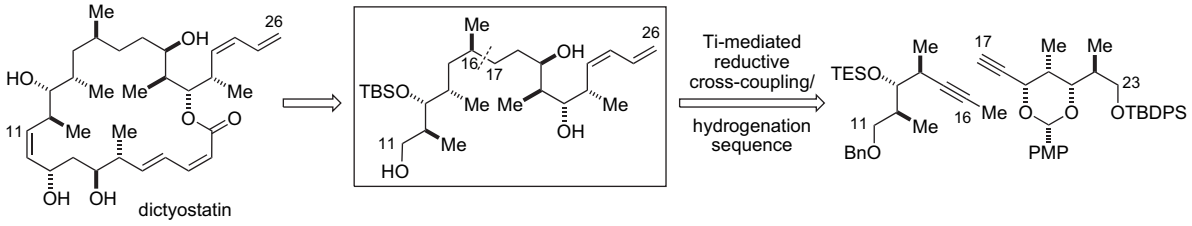
ARTICLES

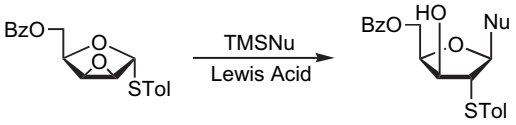


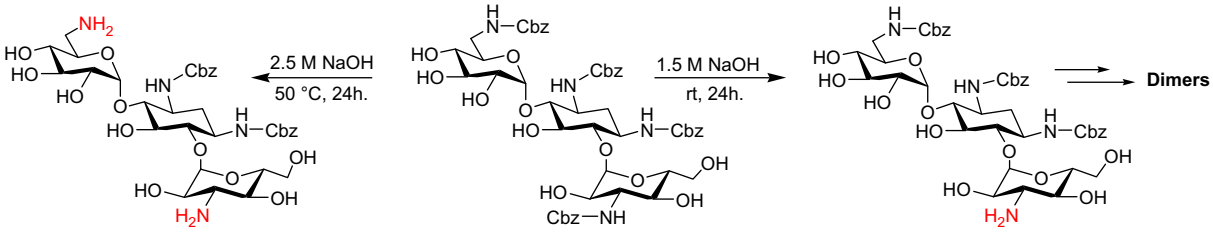


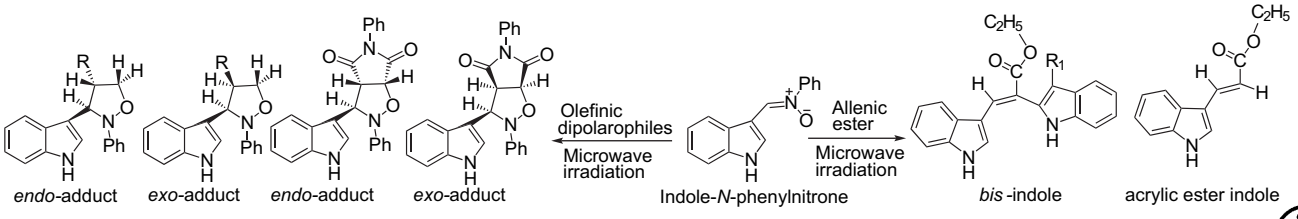


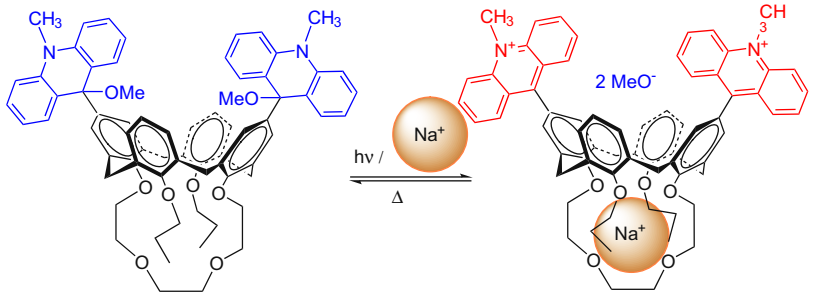
The best way to measure whole body production of the locally acting hormone prostaglandin E_2 (PGE_2) is to assess the accumulation of the major urinary metabolite, PGE_2U_M. A practical preparation of this delicate diacid is described. This synthetic PGE_2U_M will enable production of the antibodies that will be used to quantify this key metabolite.

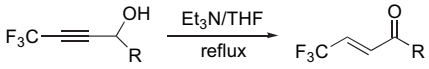


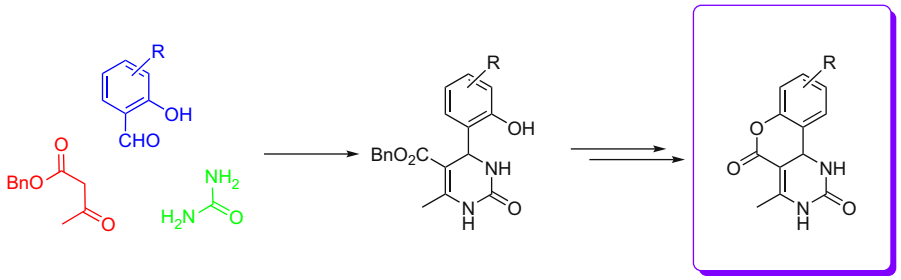


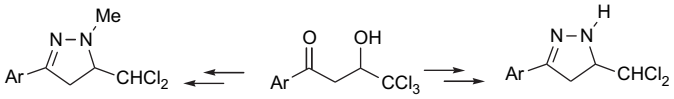


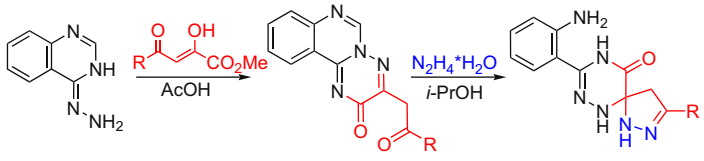


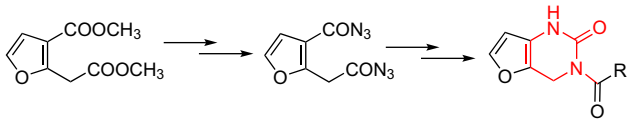


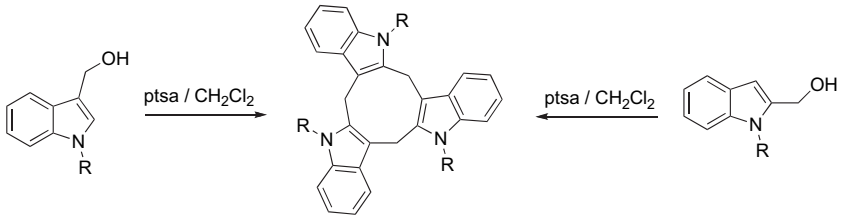


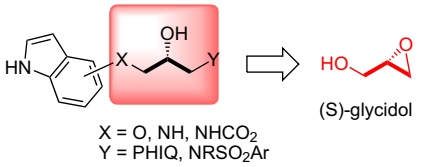


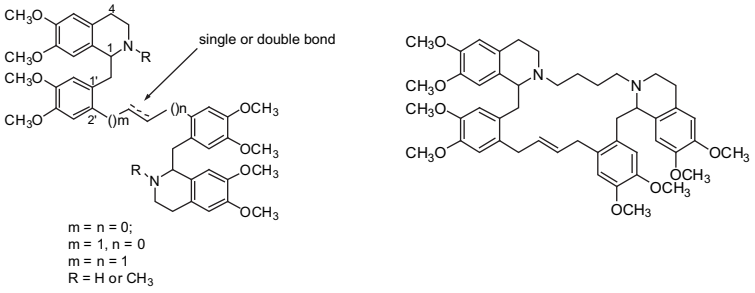


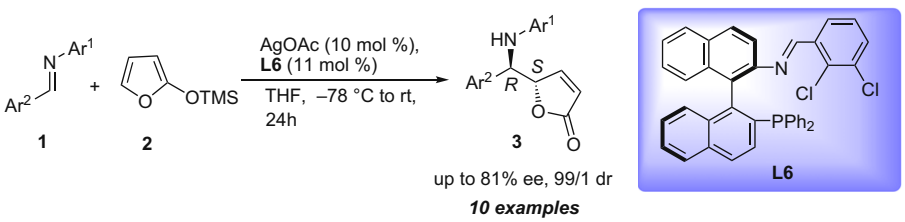


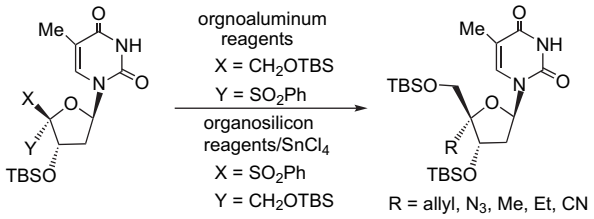


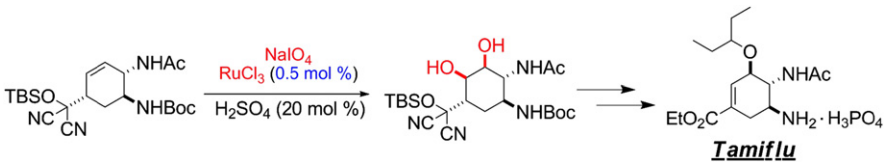




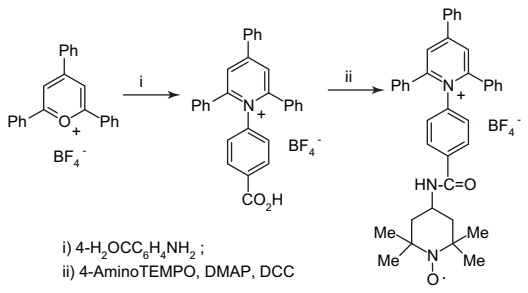


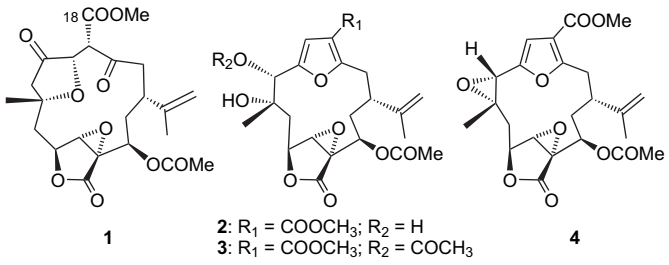


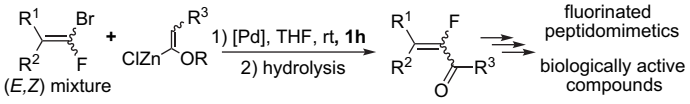


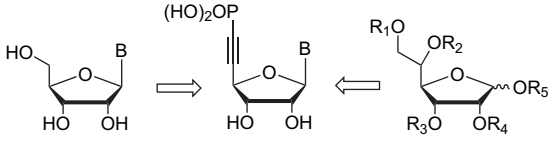


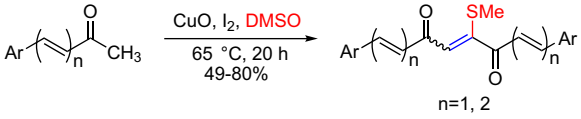
Ruthenium-catalyzed dihydroxylation successfully circumvented the need of Mitsunobu inversion of α-alcohol in our previously reported synthesis of Tamiflu®.

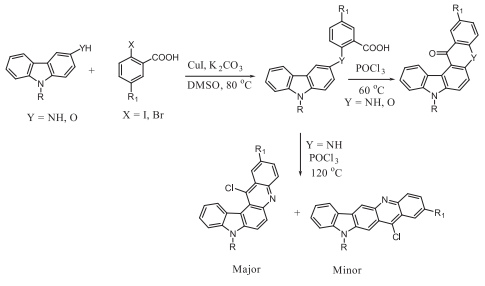


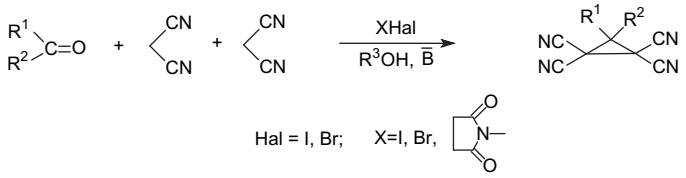


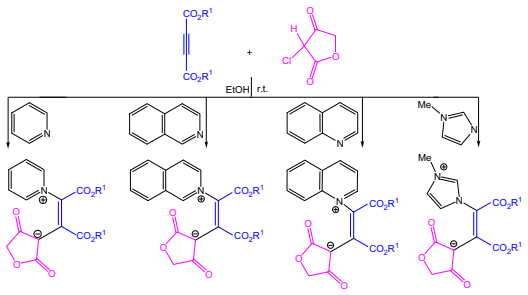


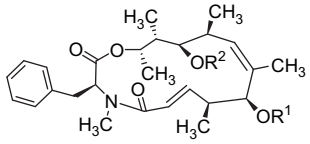






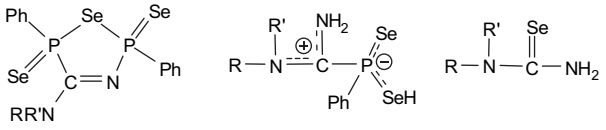




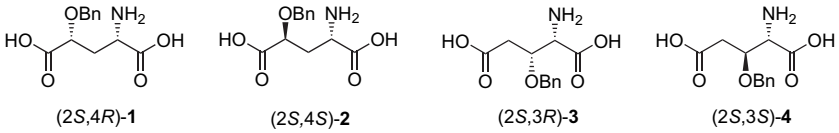


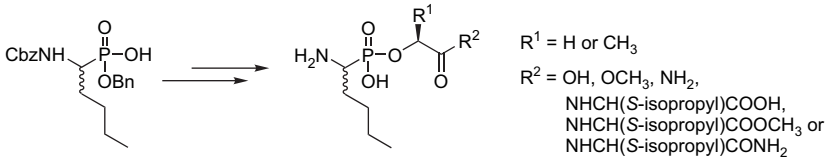
1) $R^1 = R^2 = H$
2) $R^1 = R^2 = COCH_3$
3) $R^1 = H$, $R^2 = COCH_3$

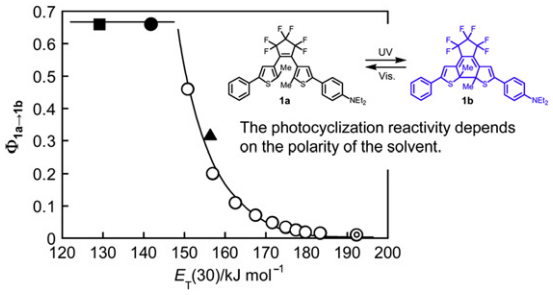
Macrocyclic torrubiellutins A–C (**1**–**3**) isolated from the insect pathogenic fungus *Torrubiella luteorostrata* BCC 12904 and their biological activities were reported.

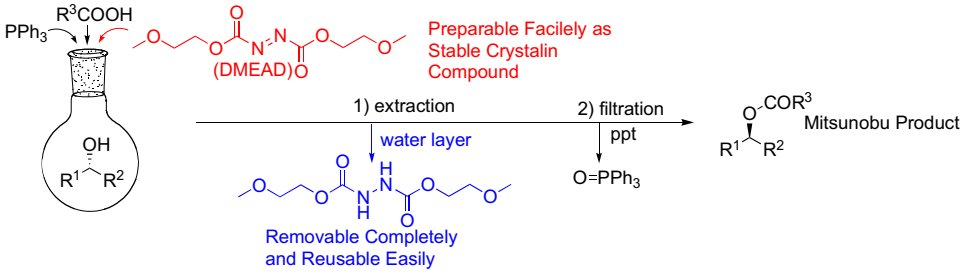


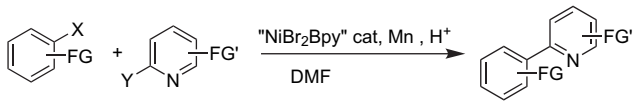
New selenium containing heterocycles and selenoureas are obtained from Woollins' reagent

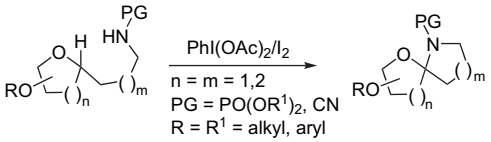


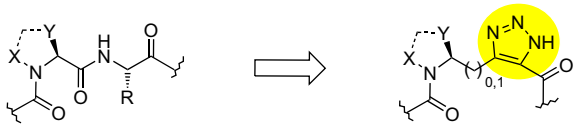


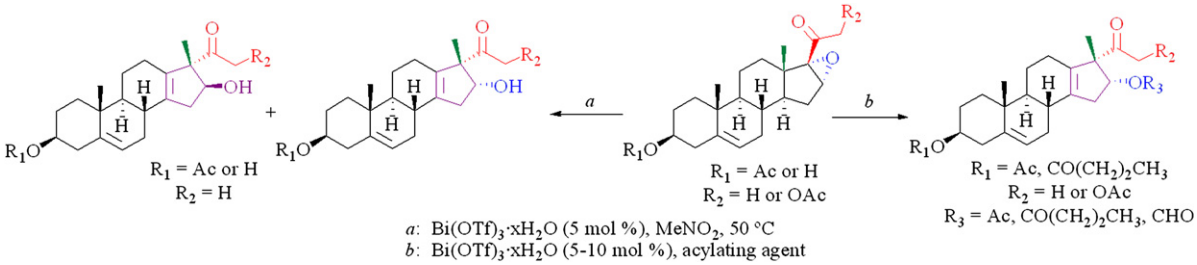


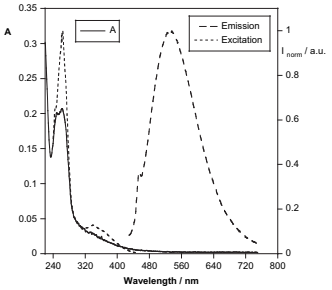




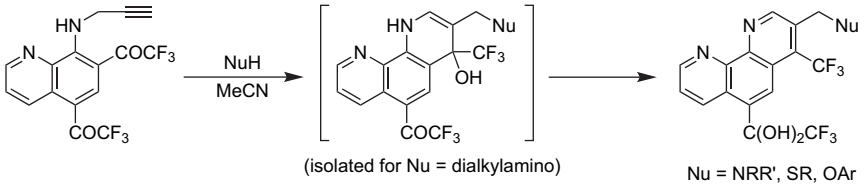


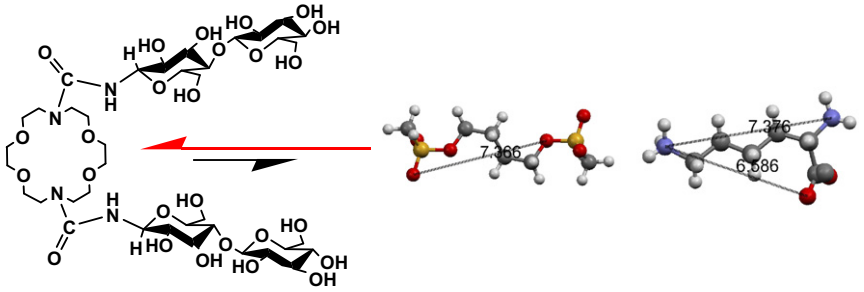


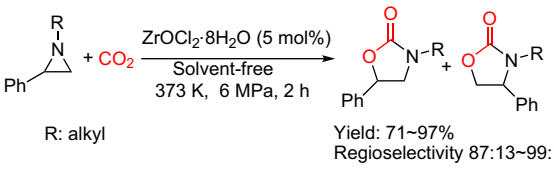




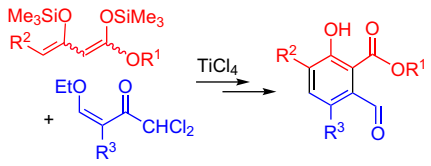
Four emissive macrocyclic ligands mono-substituted with an 8-hydroxyquinoline pendant arm are presented. The new compounds have been used for metal-ion detection, which results from the competition between PET (photo-induced electron transfer) and PPT (photo-induced proton transfer) mechanisms.

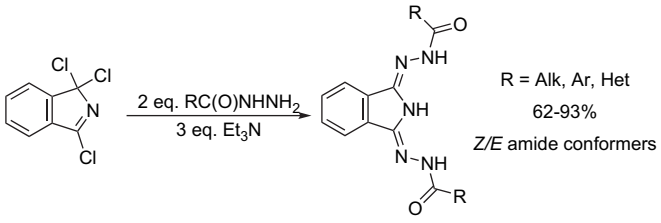


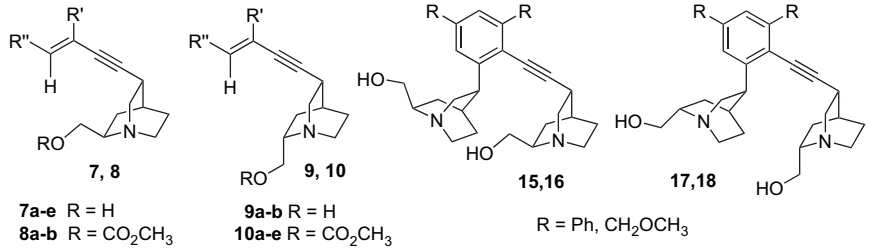


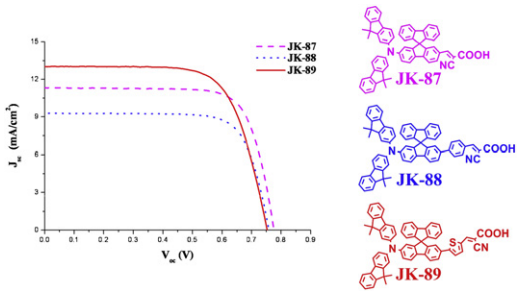


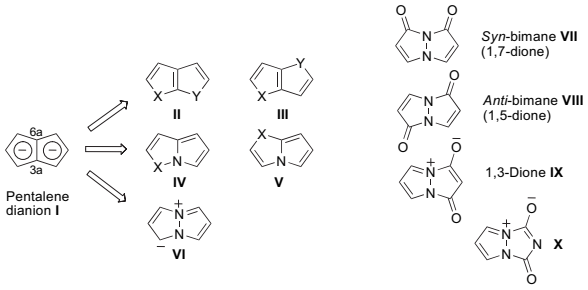
The cycloaddition reaction of aziridines with CO_2 heterogeneously catalyzed by $ZrOCl_2 \cdot 8H_2O$ smoothly proceeded, leading to the preferential formation of 5-aryl-2-oxazolidinones; and excellent yields, regio- and stereoselectivities towards the target products were reached under solvent-free conditions.

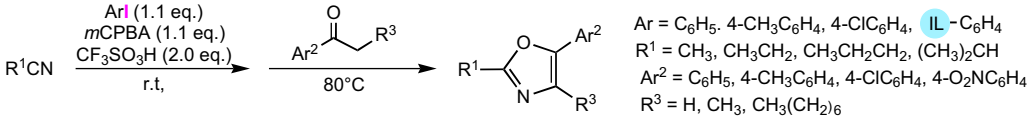


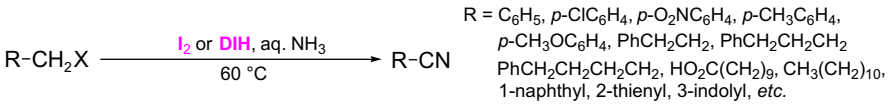












OTHER CONTENTS

*Corresponding author
Supplementary data available via ScienceDirect

Abstracted/indexed in: AGRICOLA, Beilstein, BIOSIS Previews, CAB Abstracts, Chemical Abstracts. Current Contents: Life Sciences, Current Contents: Physical, Chemical and Earth Sciences, Current Contents Search, Derwent Drug File, Ei compendex, EMBASE/Excerpta Medica, Medline, PASCAL, Research Alert, Science Citation Index, SciSearch. Also covered in the abstract and citation database SCOPUS®. Full text available on ScienceDirect®

ELSEVIER

ISSN 0040-4020