



Pergamon

Corrigendum

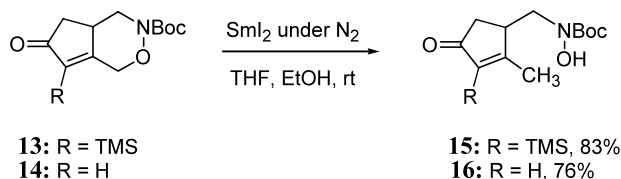
Corrigendum to “Synthesis of 3,4-substituted cyclopentenones
via an intramolecular Pauson–Khand reaction of
N–O linked enynes”

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Stefan G. Koenig, Kristi A. Leonard, Ralf S. Löwe and David J. Austin*

Department of Chemistry, Yale University, New Haven, CT 06520, USA

Recently, we discovered that the molecules described as N–O bond cleavage products, **15** and **16** in Scheme 5 of our original paper, were incorrectly assigned. A corrected Scheme 5 is shown below.



Scheme 5. Cleavage of N–O tether of cyclopentenones **13** and **14**.

Based on subsequent studies in this series, it became apparent that SmI_2 treatment of compounds **13** and **14** gives a C–O bond cleavage product. This observation is in contrast to what was expected, based on our previous studies in the SmI_2 cleavage of N–O bonds. These molecules, however, were fully saturated systems. Therefore, the observed C–O cleavage is likely due to the presence of the α,β -unsaturated ketone.

Analytical data for compound **16** is as follows, IR (thin film) 3260, 3079, 2975, 2925, 2853, 1688, 1682, 1618, 1409, 1393, 1368, 1249, 1161, 1104, 849 cm^{-1} ; ^1H NMR (CDCl_3 , 500 MHz) δ 6.41 (bs, 1H), 5.92 (s, 1H), 3.80 (dd, 1H, $J=14.4$, 4.6 Hz), 3.56 (dd, 1H, $J=14.4$, 7.1 Hz), 3.13 (m, 1H), 2.51 (dd, 1H, $J=18.6$, 6.7 Hz), 2.32 (dd, 1H, $J=18.5$, 2.5 Hz), 2.14 (s, 3H), 1.47 (s, 9H); ^{13}C NMR (CDCl_3 , 125 MHz): δ 208.4, 179.2, 157.4, 132.7, 83.2, 52.7, 44.2, 40.9, 28.8, 18.1; HRMS (FAB) m/z 242.1391 (MH^+ , 242.1392 calcd for $\text{C}_{12}\text{H}_{20}\text{NO}_4$).

The authors regret this misassignment. A full account of the cleavage selectivity for both the conjugated and unconjugated N–O bonds, with experimental details, will be published elsewhere.

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* Corresponding author.