JOURNAL OF THE CHEMICAL SOCIETY

Perkin Transactions 1

Organic and Bio-organic Chemistry

CONTENTS

Perkin Communications

165 Enzyme-catalysed carbon-carbon bond formation: use of transketolase from Escherichia coli

Gordon R. Hobbs, Malcolm D. Lilly, Nicholas J. Turner, John M. Ward, Andrew J. Willets and John M. Woodley POH OH OH CO.

Transketolase has been obtained in large quantities from *E. coli*. The enzyme shows a relaxed substrate specificity

167 Selective Friedel-Crafts reaction of 26,28dimethoxycalix[4] arene

Zhi-Tang Huang and Guo-Qiang Wang

Reagents: i, RCOCŁ or $C(O)CH_2CH_2C(O)$, AlCl₃, room temp. R = Me, Et, CH_2CH_2Cl , $(CH_2)_3CH_2Cl$, $CH=CH_2$, Ph. $CH_2CH_2CO_2H$.

Articles

169 Triterpenoid total synthesis. Part 3. Synthesis of meso- and (\pm) -limatulone, defensive metabolites of the limpet Collisella limatula

Kenji Mori, Hirosato Takikawa and Masaru Kido

meso -Limatulone

(±)-Limatulone

The synthesis of the two isomers shown above is described

181	Regioselective alkoxydehalogenation of 2,4-dihalogenoquinolines and a reinvestigation of the bromination of 2-methoxyquinoline	NaOR (s) NaOR (s) N OR X = CI, Br
	Alan G. Osborne and Luke A. D. Miller	It is proposed that the observed selectivity arises from a surface reaction. ¹ H and ¹³ C NMR spectroscopic data are presented
185	Further radical induced cyclisations of unsaturated sulfones	Arso ₂ — — — — — — — — — — — — — — — — — — —
	Iain W. Harvey and Gordon H. Whitham	Arso ₂ So ₂ Ar
191	Radical induced cyclisations of unsaturated allylic sulfones containing an activating electron withdrawing group	Arso ₂ ConhPh ConhPh
·	Iain W. Harvey and Gordon H. Whitham	SO ₂ Ar CONHPh
197	Synthesis of rigidly linked donor-acceptor systems designed to test the effect of orbital symmetry on the dynamics of long-range intramolecular electron transfer processes	3 MeC CN CN CN
	Donald C. Craig, Anna M. Oliver and Michael N. Paddon-Row	The synthesis of 3 and 4 is described
205	Syntheses and spectral characterizations of tricarbonylchromium complexes of calix[4]arenes	OPr CH ₂ Cr(CO) ₃ source heat Cr(CO) ₃ Cr(CO) ₃
	Hideshi Iki, Taketoshi Kikuchi and Seiji Shinkai	Arenetricarbonylchromium complexes were synthesised from four conformational isomers of calix[4]arene and 1:2, 1:3 and 1:4 complexes of cone conformers were also synthesized
211	Studies of phthalazine-5,8-quinone, a ring contraction, and some novel and potentially useful fluorescent phthalimides	NR1 18 R1 = H, R2 = Me 19 R1 = NH ₂ , R2 = H
	John Parrick and Ramanaranjinie Ragunathan	The phthalazinequinone 3 and some potentially useful derivatives of the novel fluorescent phthalimides 18 and 19 are described

217	Synthesis of secotrinervitanes, unique bicyclic diterpenes from termites	Aco		
	Toshifumi Hirukawa, Toshiyuki Shudo and Tadahiro Kato	A total synthesis of (\pm) -3α-acetoxy-5β-hydroxy-7,16-secotrinervita-7,11-diene was performed		
227	Photochemical reactions of phenylphosphinic azides having <i>ortho</i> alkyl substituents: diminution of Curtius-like rearrangement; intramolecular nitrene insertion into C-H bonds	P.Ar.		
	Martin J. P. Harger and P. Andrew Shimmin			
233	Novel formation of 4-methylthiopyrene in a Hofmann elimination reaction directed toward the synthesis of 17,19-dioxa[2.2.3]-(1,2,3)cyclophanediene	Me ₂ S ⁺ Me ₂ SMe		
	Yee-Hing Lai and Hong-Leng Eu			
239	Total synthesis of three eudesman-12,8-olides, (\pm) -isoalantolactone, (\pm) -dihydrocallitrisin and (\pm) -septuplinolide; structure revision of septuplinolide	OMe HOZC		
	Masahiro Tada, Hirokazu Yamada, Akira Kanamori and Kazuhiro Chiba	R1 = OH, R2 = Me R1 = Me, R2 = OH R1 = Me, R2 = OH		
249	Structural elucidation of trikoningins KA and KB, peptaibols from <i>Trichoderma koningii</i>	From a <i>Trichoderma koningii</i> strain, the antibiotic and membraneactive peptides trikoningins KA V, KB I and KB II were isolated. Their sequences were elucidated by FAB MS and ¹ H NMR		
	Catherine Auvin-Guette, Sylvie Rebuffat, Isabelle Vuidepot, Marcel Massias and Bernard Bodo	spectroscopy. KA V was a 19-residue peptaibol and KB I and KB II were 11-residue lipopeptaibols.		
257	Nitration of 5-fluoro-2,1,3-benzoselenadiazoles, and the synthesis of 4-fluoro-3-nitro-, 4-fluoro-6-nitro-, 5-fluoro-3-nitro-o-phenylenediamines and 3,4-diamino-2-nitrophenols by subsequent deselenation	Se N H, Me + Se N H NO2 R = H, Me H NO2 HI NO2		
	Wei Tian, Spiros Grivas and Kjell Olsson	$\begin{array}{cccccccccccccccccccccccccccccccccccc$		

263	Synthesis of squaric acid derivatives by Lewis acid-catalysed reaction of its dichloride, methyl ester chloride, diethylamide chloride, and ethyl
	diester with unsaturated organosilanes: new
	method for C-C bond formation on cyclobutenedione

Masatomi Ohno, Yoshihiko Yamamoto, Yuhichi Shirasaki and Shoji Eguchi

273 General methods for synthesizing 2,4diacylpyrroles and their precursors containing one or two masked acyl groups

Silvano Cadamuro, Iacopo Degani, Stefano Dughera, Rita Fochi, Antonella Gatti and Laura Piscopo

A thorough study on the synthesis of 2,4-diacylpyrroles by direct acylation of pyrrole, 2- and 3-acylpyrroles is reported

285 Modifications and extensions of the Pschorr reaction in pyrazole series. Access to the [2]benzopyrano[4,3-c]pyrazole system of pharmaceutical interest

Giuseppe Daidone, Salvatore Plescia, Benedetta Maggio, Vincenzo Sprio, Franco Benetollo and Gabriella Bombieri

The Pschorr reaction performed under non-classical reaction conditions on the diazonium chloride 9 afforded the epimers 4a, b

293 A convenient synthesis of some arylated phenylsulfonylacetonitriles and ethyl cyanoacetates using organo-iron complexes

Alaa S. Abd-El-Aziz and Christine R. de Denus

R = H, Me, Cl NuT = CH(CN)SO2Ph, CH(CN)CO2Et

299 Sequential pericyclic reactions of unsaturated xanthates. One-pot synthesis of hydrobenzo[c]thiophenes

Kazunobu Harano, Masashi Eto, Kikuma Ono, Keisuke Misaka and Takuzo Hisano

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