and determination of yield of product were done by ^{19}F NMR spectroscopy.

6,6-Difluoro-1-phenylbicyclo[3.1.0]hexane. A 250-mL, three-necked, round-bottom flask was equipped with an N_2 inlet, a rubber septum, and a pressure-equalizing addition funnel with a nitrogen outlet. The system was flushed with N_2, and the apparatus was flame-dried. A stirring bar was added to the flask.

To the flask were added 50 mL of dry THF, 7.45 g (0.114 mol) of activated zinc dust, a small crystal of iodine, and 5.48 g (0.0380 mol) of 1-phenylcyclopentene.[21] To the stirred mixture was added a solution of 23.92 g (0.114 mol) of dibromodifluoromethane in 75 mL of anhydrous THF over a period of 3.5 h. The reaction was slightly exothermic. The zinc dust dissolved to give a clear, pale amber solution, which was stirred at ambient temperature overnight (20.5 h). To the reaction mixture was added 100 mg (0.5375 mmol) of hexafluorobenzene as internal standard, and the ^{19}F NMR spectrum was taken. Integration of the fluorine spectrum indicated the yield of the product to be 84%.

The reaction mixture was poured into 200 mL of 10% aqueous HCl containing 50 mL of crushed ice. The mixture was extracted three times with 50-mL portions of CH_2Cl_2. The combined organic extracts were washed with 50 mL of 10% aqueous $NaHCO_3$ and dried over anhydrous Na_2SO_4. The solution was concentrated by rotary evaporation at reduced pressure to give a clear, colorless liquid. Purification by fractional distillation at reduced pressure with a 15-cm Vigreux column gave 2.36 g (32%) of clear, colorless liquid product, bp 75 °C/1.0 mm. Analysis by GC (10 ft by 0.125 in. 20% QF-1 at 150 °C): IR (film) 3031, 2941, 2868, 1604 (w), 1500, 1452, 1433 (s), 1304, 1253, 1201 (s), 1149, 1119, 1060, 995 cm^{-1}; ^{1}H NMR ($CDCl_3$, 300 MHz) δ 7.22–7.34 (m, 5 H), 2.46 (m, 1 H), 2.06–2.20 (m, 4 H), 1.7–1.9 ppm (m, 2 H); ^{19}F NMR ($CDCl_3$, 282 MHz) ϕ −127.1 (dm, J_{FF} = 154.6 Hz, 1 F) and −141.6 ppm (dm, J_{FF} = 154.6 Hz, 1 F); ^{13}C NMR ($CDCl_3$, 75 MHz) δ 136.9 (t, J_{CF} = 2.4 Hz, quat), 128.3 (s, CH), 128.2 (d, J_{CF} = 1.7 Hz, CH), 127.0 (s, CH), 116.5 (dd, J_{CF} = 280.2 and 306.4 Hz, CF_2), 42.9 (dd, J_{CF} = 8.6 and 12.5 Hz, quat), 34.3 (d, J_{CF} = 1.6 Hz, CH_2), 33.5 (dd, J_{CF} = 9.3 and 11.6 Hz, CH) 26.6 (s, CH_2), 24.1 (dd, J_{CF} = 1.4 and 10.2 Hz, CH_2); HRMS gave M^+ = 194.09011 ± 0.0006 (3.2 ppm), dev = −0.0006 (3.1 ppm); MS 194 (100), 143 (38), 129 (33), 115 (76), 91 (35), 77 (35), 51 (34).

Competition Experiment between α-Methylstyrene and 2,3-Dimethyl-2-butene. To a similarly equipped, 100-mL, round-bottom flask were added 2.5 mmol of zinc (165 mg), THF (20 mL), and 25 mmol each of olefins (2.96 g of α-methylstyrene and 2.10 g of 2,3-dimethyl-2-butene). The flask was placed in a water bath, and then a solution of 3.75 mmol of dibromodifluoromethane (787 mg) in THF (5 mL) was added during a period of 25 min. The reaction was not exothermic. The mixture was stirred overnight. Hexafluorobenzene (50 mg) was added to the mixture, and the products were analyzed by ^{19}F NMR spectroscopy for 1,1-difluoro-2,2,3,3-tetramethylcyclopropane (ϕ −148.6 ppm (s)) and for 1,1-difluoro-2-methyl-2-phenylcyclopropane (ϕ −132.8 (dd, J_{FF} = 150 Hz, J_{FH} = 13 Hz), −137.8 ppm (dd, J_{FF} = 150 Hz, J_{FH} = 12 Hz)). The yields of the products were 51.3% and 14.5%, respectively, with a ratio of 3.5.

Acknowledgment. The support of this research in part by the National Science Foundation is gratefully acknowledged.

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[21] Garbisch, E. W., Jr. *J. Org. Chem.* **1961**, *26*, 4165.

Additions and Corrections

Vol. 55, 1990

Peter J. Garratt* and Andrew Tsotinis. Preparation and Reactions of Some (Trimethylsilyl)cyclopropenes. Synthesis of In–Out Tricyclic [*n*.3.2.0^{2,4}] Compounds, Potential Precursors to Cyclopropaparacyclophanes.

Page 84, column 2. The statement that the authors cited in ref 5 (Dent, B. R.; Halton, B.; Smith, A. M. F. *Aust. J. Chem.* **1986**, *39*, 1621) had prepared compound **5b** from compound 4 is incorrect. These workers prepared **5b** from compound 15, as we did. We thank Professor Halton for bringing this error to our attention.

Ernest L. Eliel* and Xu-Chang He. Highly Stereoselective Syntheses Involving *N*-Alkyl-4,4,7α-trimethyl-*trans*-octahydro-1,3-benzoxazine Intermediates. 2.

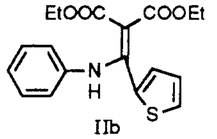
Page 2115, column 2, Scheme IV: 10% Pd/C should replace 1% Pd/C.

Page 2117, column 1, last line: 22.2 should replace 2.22.

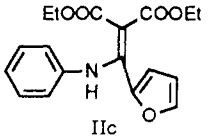
Page 2119, column 1, line 39: 2 mL should replace 2 mg.

Osmo E. O. Hormi,* Carita Peltonen, and Laila Heikkilä. 2-Aryl-4-quinolones and Fused Quinolines from β-Chloroarylidenemalonates and Related Chloro Esters.

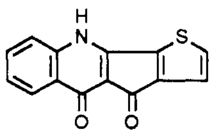
Page 2513, structures IIb, IIc, III, and IVb should be drawn as shown below.



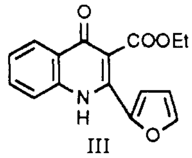
IIb



IIc



IVb



III