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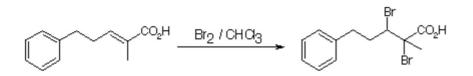
## 2,3-Dibromo-2-methyl-5-phenylpentanoic Acid

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The general part of the experimental section [1] has been presented elsewhere. To a stirred solution of (E)-2-methyl-5-phenyl-2-pentenoic acid (1.255 g, 6.6 mmol) in dry chloroform (15 ml) was added a solution of bromine (0.38 ml, 7.4 mmol) in dry chloroform (5 ml) dropwise. The mixture was stirred at room temperature for 6 hours and the chloroform solution was washed with sodium bisulfite solution (5%, 20 ml), brine (10 ml), dried (Na<sub>2</sub>SO<sub>4</sub>), filtered and evaporated under reduced pressure to yield 2,3-dibromo-2-methyl-5-phenyl-2-pentanoic acid (1.95 g, 84%) as yellow plates from chloroform/light petroleum.

M.p. 68-70° (resolidified and melted again at 86-8°)

Anal. calc. for C<sub>12</sub>H<sub>14</sub>Br<sub>2</sub>O<sub>2</sub> (350.05): C 41.2, H 4.0; found: C 41.0, H 4.2.

IR (CDCl<sub>3</sub>) 3500-2800(bs, OH), 2954, 1722 (s, C=O), 1497, 1455, 1054 cm<sup>-1</sup>.

<sup>1</sup>H-NMR (400 MHz, CDCl<sub>3</sub>) 1.98 (3H, s, CH<sub>3</sub>), 2.04 (1H, m, 1/2 of CH<sub>2</sub>), 2.73 (2H, m, 1/2 of CH<sub>2</sub> and 1/2 of Ph-CH<sub>2</sub>), 3.09 (1H, m, 1/2 of Ph-CH<sub>2</sub>), 4.56 (1H, m, -CHBr), 7.18-7.49 (5H, m, ArH), 8.10 (1H, bs, COOH).

<sup>13</sup>C-NMR (15 MHz, CDCl<sub>3</sub> + DMSO-d<sub>6</sub>) 21.56 (CH<sub>3</sub>), 33.05, 34.35 (CH<sub>2</sub>), 58.31 (CHBr), 62.40 (C2), 125.5, 127.8, 127.8 (ArCH), 139.3 (quat, C1'), 169.7 (quat, C1).

EI-MS 352(M<sup>+</sup>+4, 3%), 350(M<sup>+</sup>+2, 6), 348 (M<sup>+</sup>, 3), 189(27), 143(41), 91(100), 65(19).

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## **References and Notes**

1. Moloney, M.G.; Pinhey, J.T.; Stoermer, M.J. "Vinyl Cation Formation by Decomposition of Vinyl-lead Triacetates. The reactions of Vinylmercury and Vinyltin Compounds with Lead Tetraacetate." *J. Chem. Soc. Perkin Trans. 1* 1990, *10*, 2645.

Sample Availability: No sample available.

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