

Supporting Information

General. IR: Perkin-Elmer 257 Infracord. - ^1H NMR: Bruker AC 250 (250 MHz); $^1\text{H}/^{13}\text{C}$ NMR AM 400 (400/100 MHz) and Bruker DRX 500 (500/125 MHz); CDCl_3 as solvent and TMS as internal standard. - MS: Finnigan MAT 44 S (70 eV) with Datasystem MAT SS 200. - Elemental analyses: Perkin-Elmer Elemental Analyzer 240.-

Characterization data of compounds 10a-o and 16

2-Methyl-1,2-dihydro-3H-2-benzazepin-3-one (10a): mp 132-133 °C (ethanol). - IR (CCl_4): 1650 (CO) cm^{-1} . - ^1H NMR (250 MHz): δ = 3.11 (s, 3 H, NCH_3), 4.24 (s, 2 H, 1-H), 6.41 (d, J = 12.2 Hz, 1 H, 4-H), 7.08 (d, J = 12.2 Hz, 1 H, 5-H), 7.25-7.44 (m, 4 H, Ar-H). - ^{13}C NMR (100 MHz): δ = 35.0 (NCH_3), 53.4 (C-1), 127.3 (C-4), 127.6 (Ar-C), 128.4 (Ar-C), 129.2 (Ar-C), 129.3 (Ar-C), 135.4 (Ar- C_q), 136.2 (Ar- C_q), 136.3 (C-5), 166.3 (C-3). - MS (EI): m/z (%) = 173 (100) [M^+]. - $\text{C}_{11}\text{H}_{11}\text{NO}$ (173.21): calcd. C 76.28, H 6.40, N 8.09; found C 76.29, H 6.51, N 8.15.

2-Phenyl-1,2-dihydro-3H-2-benzazepin-3-one (10b): mp 109-110 °C (diethyl ether, decomp.). - IR (CCl_4): 1650 (CO) cm^{-1} . - ^1H NMR (250 MHz): δ = 4.66 (s, 2 H, 1-H), 6.55 (d, J = 12.2 Hz, 1 H, 4-H), 7.20 (d, J = 12.2 Hz, 1 H, 5-H), 7.21-7.50 (m, 9 H, Ar-H). - ^{13}C NMR (100 MHz): δ = 54.8 (C-1), 126.4 (C-4), 126.9 (Ar-C), 127.5 (Ar-C), 127.7 (Ar-C), 128.6 (Ar-C), 129.2 (Ar-C), 129.4 (Ar-C), 129.5 (Ar-C), 135.5 (Ar- C_q), 136.7 (Ar- C_q), 136.8 (C-5), 143.1 (C-1'), 165.8 (C-3). - MS (EI): m/z (%) = 235 (100) [M^+]. - $\text{C}_{16}\text{H}_{13}\text{NO}$ (235.28): calcd. C 81.68, H 5.57, N 5.95; found C 81.70, H 5.62, N 5.87.

2-tert-Butyl-1,2-dihydro-3H-2-benzazepin-3-on (10c): mp 146-147 °C (ethanol). - IR (CCl_4): 1640 (CO) cm^{-1} . - ^1H NMR (250 MHz): δ = 1.48 (s, 3 H, CH_3), 3.96-4.40 (2 H, 1-H), 6.36 (d, J = 12.1 Hz, 1 H, 4-H), 6.98 (d, J = 12.1 Hz, 1 H, 5-H), 7.30-7.39 (m, 4 H, Ar-H). - ^{13}C NMR (100 MHz): δ = 29.0 (CH_3), 47.2 (C-1), 58.1 (CMe_3), 126.8 (C-4), 128.1 (Ar-C), 129.0 (Ar-C), 129.4 (Ar-C), 130.3 (Ar-C), 135.0 (C-5), 135.8 (Ar- C_q), 138.7 (Ar- C_q), 167.6 (C-3). - MS (EI): m/z (%) = 215 (54) [M^+], 159 (100) [$\text{M}^+ - t\text{Bu} + 1$]. - $\text{C}_{14}\text{H}_{17}\text{NO}$ (215.29): calcd. C 78.10, H 7.96, N 6.51; found C 78.14, H 7.83, N 6.31.

2-Methyl-4-trimethylsilyl-1,2-dihydro-3H-2-benzazepin-3-one (10d): mp 104-106 °C (ethanol). - IR (CCl₄): 1625 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 0.30 (s, 9 H, TMS), 3.06 (s, 3 H, NCH₃), 4.12 (s, 2 H, 1-H), 7.20 (s, 1 H, 5-H), 7.21-7.40 (m, 4 H, Ar-H). - ¹³C NMR (100 MHz): δ = -0.7 (TMS), 34.5 (NCH₃), 53.1 (C-1), 126.9 (Ar-C), 128.3 (Ar-C), 128.7 (Ar-C), 129.0 (Ar-C), 136.7 (C_q), 137.0 (C_q), 141.5 (C-5), 144.0 (C-5a), 169.2 (C-3). - MS (EI): *m/z* (%) = 245 (12) [M⁺], 230 (100) [M⁺-CH₃]. - C₁₄H₁₉NOSi (245.40): calcd. C 68.52, H 7.80, N 5.71; found C 68.49, H 7.81, N 5.87.

2-Phenyl-4-trimethylsilyl-1,2-dihydro-3H-2-benzazepinone (10e): mp 111-112 °C (ethanol). - IR (CCl₄): 1635 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 0.34 (s, 9 H, TMS), 4.55 (br s, 2 H, 1-H), 7.16-7.46 (m, 10 H, 5-H, Ar-H). - ¹³C NMR (100 MHz): δ = 0.0 (TMS), 55.1 (C-1), 127.3 (Ar-C), 127.5 (Ar-C), 127.8 (Ar-C), 129.1 (Ar-C), 129.7 (Ar-C), 129.8 (Ar-C), 129.9 (Ar-C), 137.8 (C_q), 137.9 (C_q), 142.5 (C-5), 144.0 (Ar-C_q), 144.7 (Ar-C_q), 169.6 (C-3). - MS (EI): *m/z* (%) = 307 (16) [M⁺], 194 (100). - HRMS (C₁₉H₂₁NOSi): calcd. 307.1392; found 307.1393. - C₁₉H₂₁NOSi (307.47): calcd. C 74.22, H 6.88, N 4.56; found C 73.85, H 7.10, N 4.58.

2,4-Dimethyl-1,2-dihydro-3H-2-benzazepin-3-one (10f): mp 114-115 °C (ethanol). - IR (CCl₄): 1645 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 2.20 (d, *J* = 1.5 Hz, 3 H, CH₃), 3.01 (s, 3 H, NCH₃), 4.10 (br s, 2 H, 1-H), 6.89 (qu, *J* = 1.5 Hz, 1 H, 5-H), 7.12-7.31 (m, 4 H, Ar-H). - ¹³C NMR (100 MHz): δ = 21.7 (CH₃), 34.7 (NCH₃), 53.2 (C-1), 126.8 (Ar-C), 128.1 (Ar-C), 128.2 (Ar-C), 128.9 (Ar-C), 132.3 (C-5), 135.9 (C_q), 136.0 (C_q), 136.1 (C_q), 167.5 (C-3). - MS (EI): *m/z* (%) = 187 (100) [M⁺]. - C₁₂H₁₃NO (187.24): calcd. C 76.98, H 7.00, N 7.48; found C 76.73, H 6.98, N 7.37.

2-Phenyl-4-methyl-1,2-dihydro-3H-2-benzazepin-3-one (10g): mp 128-130 °C (ethanol). - IR (CCl₄): 1650 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 2.34 (d, *J* = 1.2 Hz, 3 H, CH₃), 4.57 (br s, 2 H, 1-H), 7.06 (qu, *J* = 1.2 Hz, 1 H, 5-H), 7.15-7.44 (m, 9 H, Ar-H). - ¹³C NMR (100 MHz): δ = 21.9 (CH₃), 54.5 (C-1), 126.7 (Ar-C), 126.8 (Ar-C), 126.9 (Ar-C), 128.3 (Ar-C), 128.4 (Ar-C), 129.0 (Ar-C), 129.1 (Ar-C), 133.0 (C-5), 135.7 (C_q), 136.0 (C_q), 136.4 (C_q), 143.3 (C-1'), 167.1 (C-3). - MS (EI): *m/z* (%) = 249 (77) [M⁺], 194 (100). - HRMS (C₁₇H₁₅NO): calcd. 249.1154; found 249.1155. - C₁₇H₁₅NO (239.31): calcd. C 81.90, H 6.06, N 5.62; found C 81.47, H 6.11, N 5.49.

2-Methyl-4-phenyl-1,2-dihydro-3H-2-benzazepin-3-one (10h): mp 116 °C (ethanol). - IR (CCl₄): 1645 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 3.13 (s, 3 H, NCH₃), 4.29 (br s, 2 H, 1-H), 7.29-7.46 (m, 8 H, Ar-H/5-H), 7.64-7.68 (m, 2 H, Ar-H). - ¹³C NMR (100 MHz): δ = 34.4 (NCH₃), 53.2 (C-1), 126.9 (Ar-C), 128.0 (Ar-C), 128.2 (Ar-C), 128.4 (Ar-C), 128.6 (Ar-C), 129.6 (Ar-C), 131.7 (C-5), 135.9 (C_q), 136.1 (C_q), 139.1 (C_q), 139.7 (C_q), 166.6 (C-3). - MS (EI): *m/z* (%) = 249 (77) [M⁺], 132 (100). - C₁₇H₁₅NO (249.31): calcd. C 81.90, H 6.06, N 5.62; found C 81.93, H 6.03, N 5.48.

2,4-Diphenyl-1,2-dihydro-3H-2-benzazepin-3-one (10i): mp 154-156 °C (diethyl ether). - IR (CCl₄): 1655 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 4.72 (br s, 2 H, 1-H), 7.23-7.59 (m, 13 H, Ar-H/5-H), 7.78 (m_c, 2 H, Ar-H). - ¹³C NMR (100 MHz): δ = 54.7 (C-1), 126.7 (Ar-C), 127.0 (Ar-C), 127.1 (Ar-C), 128.1 (Ar-C), 128.3 (Ar-C), 128.4 (Ar-C), 128.6 (Ar-C), 129.0 (Ar-C), 129.2 (Ar-C), 129.9 (Ar-C), 132.6 (C-5), 136.0 (C_q), 136.7 (C_q), 139.3 (C_q), 139.4 (C_q), 143.0 (C-1'), 166.3 (C-3). - MS (EI): *m/z* (%) = 311 (24) [M⁺], 194 (100) [M⁺-NPhCO]. - C₂₂H₁₇NO (311.38): calcd. C 84.86, H 5.50, N 4.50; found C 84.78, H 5.54, N 4.44.

2-(tert-Butyl)-4-phenyl-1,2-dihydro-3H-2-benzazepin-3-one (10j): mp 130-131 °C (ethanol). - IR (CCl₄): 1640 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 1.50 (s, 9 H, *t*Bu), 4.24 (d, *J* = 15.3 Hz, 1 H, 1-H_a), 4.53 (d, *J* = 15.3 Hz, 1 H, 1-H_b), 7.20 (s, 1 H, 5-H), 7.26-7.45 (m, 7 H, Ar-H), 7.61 (m_c, 2 H, Ar-H). - ¹³C NMR (100 MHz): δ = 29.3 (CH₃), 47.3 (C-1), 58.4 (CMe₃), 126.5 (Ar-C), 127.7 (Ar-C), 128.0 (Ar-C), 128.2 (Ar-C), 128.3 (Ar-C), 128.4 (Ar-C), 129.6 (Ar-C), 130.2 (C-5), 136.2 (C_q), 138.3 (C_q), 140.0 (C_q), 141.8 (C_q), 167.5 (C-3). - MS (EI): *m/z* (%) = 291 (47) [M⁺], 235 (100). - HRMS (C₂₀H₂₁NO): calcd. 291.1623; found 291.1624.

2-Methyl-4-(4'-methylphenyl)-1,2-dihydro-3H-2-benzazepin-3-one (10k): mp 99-100 °C (ethanol). - IR (CCl₄): 1645 (CO) cm⁻¹. - ¹H NMR (500 MHz): δ = 2.37 (s, 3 H, Ar-CH₃), 3.13 (s, 3 H, NCH₃), 4.28 (br s, 2 H, 1-H), 7.20 (m_c, 2 H, Ar-H), 7.28 (s, 1 H, 5-H), 7.29 (m_c, 1 H, Ar-H), 7.32 (m_c, 1 H, Ar-H), 7.37 (m_c, 1 H, Ar-H), 7.42 (m_c, 1 H, Ar-H), 7.56 (m_c, 1 H, Ar-H). - ¹³C NMR (125 MHz): δ = 21.2 (Ar-CH₃), 34.4 (NCH₃), 53.8 (C-1), 126.8 (Ar-C), 128.0 (C-2'/6'), 128.3 (Ar-C), 129.1 (C-2'/6'), 129.5 (Ar-C), 130.8 (Ar-C), 136.9 (C-5), 136.1 (Ar-C_q), 137.9 (Ar-C_q), 139.6 (Ar-C_q), 166.7 (C-3). - MS (EI): *m/z* (%) = 263 (44) [M⁺], 132 (100). - HRMS (C₁₈H₁₇NO): calcd. 263.1310; found 263.1309.

7,8-Dimethoxy-2-methyl-1,2-dihydro-3H-benzazepin-3-one (10l): mp 124-126 °C (ethanol). - IR (CCl₄): 1645 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 3.10 (s, 3 H, NCH₃), 3.90 (s, 3 H, OCH₃), 3.94 (s, 3 H, OCH₃), 4.18 (s, 2 H, 1-H), 6.33 (d, *J* = 12.2 Hz, 1 H, 4-H), 6.81 (s, 1 H, Ar-H), 6.86 (s, 1 H, Ar-H), 6.99 (d, *J* = 12.2 Hz, 1 H, 5-H). - ¹³C NMR (100 MHz): δ = 35.0 (NCH₃), 53.0 (C-1), 56.1 (OCH₃), 110.5 (C-6/9), 112.0 (C-6/9), 126.0 (C-4), 128.3 (C-5a/9a), 129.6 (C-5a/9a), 136.2 (C-5), 148.8 (C-7/8), 149.8 (C-7/8), 166.5 (C-3). - MS (EI): *m/z* (%) = 233 (100) [M⁺]. - HRMS (C₁₃H₁₅NO₃): calcd. 233.1052; found 233.1052.

7,8-Dimethoxy-2-phenyl-1,2-dihydro-3H-benzazepin-3-one (10m): mp 143-144 °C (ethanol). - IR (CCl₄): 1650 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 3.88 (s, 3 H, OCH₃), 3.91 (s, 3 H, OCH₃), 4.58 (s, 2 H, 1-H), 6.44 (d, *J* = 12.2 Hz, 1 H, 4-H), 6.74 (s, 1 H, 6/9-H), 6.91 (s, 1 H, 6/9-H), 7.09 (d, *J* = 12.2 Hz, 1 H, 5-H), 7.26 (m_c, 3 H, Ar-H), 7.38 (m_c, 2 H, Ar-H). - ¹³C NMR (100 MHz): δ = 54.5 (OCH₃), 56.1 (C-1), 110.5 (C-6/9), 112.2 (C-6/9), 125.9 (C-4), 126.4 (Ar-C), 126.9 (Ar-C), 128.4 (C5a/9a), 129.2 (Ar-C), 130.0 (C-5a/9a), 136.9 (C-5), 143.1 (C-1'), 149.0 (C-7/8), 150.0 (C-7/8), 166.1 (C-3). - MS (EI): *m/z* (%) = 295 (71) [M⁺], 57 (100). - HRMS (C₁₈H₁₇NO₃): calcd. 295.1208; found 295.1206.

7,8-Dimethoxy-2-methyl-4-trimethylsilyl-1,2-dihydro-3H-2-benzazepin-3-one (10n): mp 134-135 °C (diethyl ether). - IR (CCl₄): 1620 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 0.29 (s, 9 H, TMS), 3.06 (s, 3 H, NCH₃), 3.90 (s, 3 H, OCH₃), 3.93 (s, 3 H, OCH₃), 4.08 (s, 2 H, 1-H), 6.76 (s, 1 H, Ar-H), 6.86 (s, 1 H, Ar-H), 7.13 (s, 1 H, 5-H). - ¹³C NMR (100 MHz): δ = -0.6 (TMS), 34.6 (NCH₃), 52.8 (C-1), 56.2 (OCH₃), 110.1 (C-6/9), 111.9 (C-6/9), 130.0 (C_q), 130.1 (C_q), 141.4 (C-5), 142.0 (C_q), 148.1 (C-7/8), 149.5 (C-7/8), 169.4 (C-3). - MS (EI): *m/z* (%) = 305 (15) [M⁺], 290 (100) [M⁺-CH₃]. - HRMS (C₁₆H₂₃NO₃Si): calcd. 305.1447; found 305.1450..

7,8-Dimethoxy-2-methyl-4-(4'-methylphenyl)-1,2-dihydro-3H-2-benzazepin-3-one (10o): mp 181-182 °C (ethanol). - IR (CCl₄): 1640 (CO) cm⁻¹. - ¹H NMR (400 MHz): δ = 2.36 (s, 3 H, Ar-CH₃), 3.13 (s, 3 H, NCH₃), 3.90 (s, 3 H, OCH₃), 3.93 (s, 3 H, OCH₃), 4.22 (br s, 2 H, 1-H), 6.80 (s, 1 H, 6/9-H), 6.92 (s, 1 H, 6/9-H), 7.19 (m_c, 2 H, Ar-H), 7.21 (s, 1 H, 5-H), 7.54 (m_c, 2 H, Ar-H). - ¹³C NMR (100 MHz): δ = 21.2 (Ar-CH₃), 34.5 (NCH₃), 53.0 (OCH₃), 56.2 (C-1), 110.1 (C-6/9), 112.3 (C-6/9), 127.9 (Ar-C), 128.9 (C_q), 129.1 (Ar-C), 129.4 (C_q), 130.9 (C-5),

136.4 (C_q), 137.6 (C_q), 138.2 (C_q), 148.9 (C-7/8), 149.3 (C7/8), 166.9 (C-3). - MS (EI): *m/z* (%) = 324 (22) [M⁺], 323 (100). - C₂₀H₂₁NO₃ (323.39): calcd. C 74.28, H 6.55, N 4.33; found C 74.30, H 6.33, N 4.13.

1-Methyl-3,5-diphenyl-1,3-dihydro-2H-azepin-2-one (16): IR (CCl₄): 1680 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 3.23 (s, 3 H, NCH₃), 3.80 (d, *J* = 6.3 Hz, 1 H, 3-H), 5.99 (d, *J* = 6.3 Hz, 1 H, 4-H), 6.17 (d, *J* = 8.9 Hz, 1 H, 6-H), 6.50 (d, *J* = 8.9 Hz, 1 H, 7-H), 7.28-7.43 (m, 10 H, Ar-H). - ¹³C NMR (125 MHz): δ = 36.3 (NCH₃), 52.7 (C-3), 115.3 (C-6/7), 124.9 (C-6/7), 127.1 (Ar-C), 127.3 (Ar-C), 127.9 (C-Ar-C), 128.4 (Ar-C), 128.5 (Ar-C), 129.7 (Ar-C), 132.6 (C-4), 138.1 (C_q), 138.2 (C_q), 138.7 (C_q), 166.7 (C-2). - MS (EI): *m/z* (%) = 275 (77) [M⁺], 274 (100). - HRMS (C₁₉H₁₇NO): calcd. 275.1310; found 275.1310.

Characterization data of compounds 6a, d, e, i

1-Methyl-1a,6-dihydroindeno[1,2-*b*]azirene-6a(1H)-carbaldehyde (6a): IR (CCl₄): 1715 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 2.03 (s, 3 H, N-CH₃), 2.75 (dd, *J* = 18.6 Hz, *J* = 1.8 Hz, 1 H, 6-H_a), 3.60 (d, *J* = 18.6 Hz, 1 H, 6-H_b), 4.01 (d, *J* = 1.8 Hz, 1 H, 1a-H), 7.18-7.30 (m, 3 H, Ar-H), 7.35-7.45 (m, 1 H, Ar-H), 9.19 (s, 1 H, CHO). - ¹³C NMR (100 MHz): δ = 15.9 (C-6), 30.8 (NCH₃), 52.8 (C-1a), 57.5 (C-6a), 124.5 (Ar-C), 126.0 (Ar-C), 127.1 (Ar-C), 128.3 (Ar-C), 134.5 (Ar-C_q), 143.5 (Ar-C_q), 199.7 (CHO). - MS (EI): *m/z* (%) = 173 (38) [M⁺], 144 (100) [M⁺-NCH₃]. - HRMS (C₁₁H₁₁NO): calcd. 173.0841; found 173.0836.

[1-Methyl-1a,6-dihydroindeno[1,2-*b*]azirene-6(1H)-yl]trimethylsilyl-methanone (6d): mp 63-64 °C (diethyl ether). - IR (CCl₄): 1630 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 0.19 (s, 9 H, TMS), 1.90 (s, 3 H, NCH₃), 2.50 (dd, *J* = 18.6 Hz, *J* = 1.5 Hz, 1 H, 6-H_a), 3.58 (d, *J* = 18.6 Hz, 1 H, 6-H_b), 3.80 (d, *J* = 1.5 Hz, 1 H, 1a-H), 7.10-7.19 (m, 3 H, Ar-H), 7.22-7.31 (m, 1 H, Ar-H). - ¹³C NMR (100 MHz): δ = -2.1 (TMS), 25.9 (C-6), 30.5 (NCH₃), 53.6 (C-1a), 63.2 (C-6a), 124.5 (Ar-C), 125.8 (Ar-C), 126.8 (Ar-C), 128.0 (Ar-C), 135.5 (Ar-C_q), 143.7 (Ar-C_q), 199.6 (CO). - MS (EI): *m/z* (%) = 245 (10) [M⁺], 73 (100) [TMS⁺]. - C₁₄H₁₉NOSi (245.40): calcd. C 68.52, H 7.80, N 5.71; found C 68.63, H 7.89, N 5.67.

[1-Phenyl-1a,6-dihydroindeno[1,2-*b*]azirene-6(1*H*)-yl]trimethylsilyl-methanone (6e): mp 132-133 °C (diethyl ether, decomp.). - IR (CCl₄): 1630 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 0.31 (s, 9 H, TMS), 2.72 (dd, *J* = 18.3 Hz, *J* = 0.6 Hz, 1 H, 6-H_a), 3.74 (d, *J* = 18.3 Hz, 1 H, 6-H_b), 4.33 (d, *J* = 0.6 Hz, 1 H, 1a-H), 6.59 (m_c, 2 H, Ar-H), 6.80 (m_c, 1 H, Ar-H), 6.87 (m_c, 1 H, Ar-H), 6.99-7.10 (m, 3 H, Ar-H), 7.16 (m_c, 1 H, Ar-H), 7.50 (m_c, 1 H, Ar-H). - ¹³C NMR (100 MHz): δ = -2.1 (TMS), 27.0 (C-6), 53.7 (C-1a), 64.2 (C-6a), 120.7 (Ar-C), 121.9 (Ar-C_q), 125.6 (Ar-C), 126.0 (Ar-C), 126.4 (Ar-C), 128.0 (Ar-C), 128.5 (Ar-C), 137.0 (Ar-C_q), 141.6 (Ar-C_q), 143.9 (Ar-C_q), 201.2 (CO). - MS (EI): *m/z* (%) = 307 (10) [M⁺], 73 (100) [TMS⁺]. - HRMS (C₁₉H₂₁NOSi): calcd. 307.1392; found 307.1390. - C₁₉H₂₁NOSi (307.47): calcd. C 73.22, H 6.88, N 4.56; found C 73.69, H 6.93, N 4.62.

Phenyl[1-phenyl-1a,6-dihydroindeno[1,2-*b*]azirene-6(1*H*)-yl]methanone (6i): mp 143-144 °C (ethanol, decomp.). - IR (CCl₄): 1665 (CO) cm⁻¹. - ¹H NMR (250 MHz): δ = 3.21 (d, *J* = 18.3 Hz, 1 H, 6-H_a), 3.79 (d, *J* = 18.3 Hz, 1 H, 6-H_b), 4.37 (s, 1 H, 1a-H), 6.70 (m_c, 2 H, Ar-H), 6.82 (m_c, 1 H, Ar-H), 6.92 (m_c, 1 H, Ar-H), 7.00-7.13 (m, 3 H, Ar-H), 7.20 (m_c, 1 H, Ar-H), 7.42 (m_c, 2 H, Ar-H), 7.53 (m_c, 2 H, Ar-H), 8.06-8.12 (m, 2 H, Ar-H). - ¹³C NMR (125 MHz): δ = 31.3 (C-6), 54.9 (C-1a), 57.7 (C-6a), 120.7 (Ar-C), 122.0 (Ar-C), 125.5 (Ar-C), 126.2 (Ar-C), 126.7 (Ar-C), 128.1 (Ar-C), 128.3 (Ar-C), 128.5 (Ar-C), 129.4 (Ar-C), 132.9 (Ar-C), 136.3 (Ar-C_q), 137.4 (Ar-C_q), 141.7 (Ar-C_q), 143.8 (Ar-C_q), 197.3 (CO). - MS (EI): *m/z* (%) = 311 (73) [M⁺], 310 (100). - HRMS (C₂₂H₁₇NO): calcd. 311.1310; found 311.1307. - C₂₂H₁₇NO (311.38): C 84.86, H 5.50, N 4.50; found C 84.41, H 5.54, N 4.35.