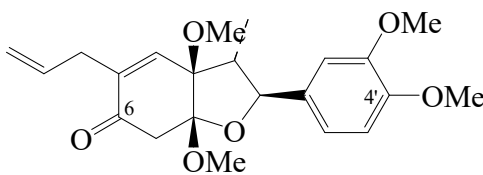




**>>Entry Name: Piperenone**

**Synonym(s):** 2-(3,4-Dimethoxyphenyl)-3,3*a*,7,7*a*-tetrahydro-3*a*,7*a*-dimethoxy-3-methyl-5-(2-propenyl)-6(2*H*)-benzofuranone, 9CI



**CAS Registry Number:** 57625-31-7

**Related CAS Registry Numbers(s):** 61307-69-5 128397-58-0 128515-14-0

**Molecular Formula:** C<sub>22</sub>H<sub>28</sub>O<sub>6</sub>

**Molecular Weight:** 388.46

**Accurate Mass:** 388.18859

**Percentage Composition:** C 68.02%; H 7.26%; O 24.71%

**Biological Source:** Isol. from *Piper futokadsura*

**Use/Importance:** Antifeedant

**Melting Point:** Mp 86-88°

**Optical Rotation:** [ $\alpha$ ]<sub>D</sub> -129 (c, 1.16 in MeOH)

**UV:** [neutral]  $\lambda_{\max}$  231 (); 280 (); 285 () (MeOH)

**>>Derivative:** 4'-O-De-Me

**Synonym(s):** Liliflone

**CAS Registry Number:** 87402-80-0

**Molecular Formula:** C<sub>21</sub>H<sub>26</sub>O<sub>6</sub>

**Molecular Weight:** 374.433

**Accurate Mass:** 374.17294

**Percentage Composition:** C 67.36%; H 7.00%; O 25.64%

**Biological Source:** Constit. of *Magnolia liliflora*

**Physical Description:** Viscous oil

**>>Derivative:** 6 $\alpha$ -Alcohol

**Synonym(s):** 2-(3,4-Dimethoxyphenyl)-2,3,3*a*,6,7,7*a*-hexahydro-3*a*,7*a*-dimethoxy-3-methyl-5-(2-propenyl)-6-benzofuranol, 9CI

**CAS Registry Number:** 61307-70-8

**Molecular Formula:** C<sub>22</sub>H<sub>30</sub>O<sub>6</sub>

**Molecular Weight:** 390.475

**Accurate Mass:** 390.20424

**Percentage Composition:** C 67.67%; H 7.74%; O 24.58%

**Biological Source:** Constit. of *Piper wightii*

**Melting Point:** Mp 72.5-73.5° (semisynthetic)

**Optical Rotation:** [ $\alpha$ ]<sub>D</sub><sup>22</sup> -228 (c, 0.3 in MeOH)

**References:**

Matsui, K. *et al.*, *Agric. Biol. Chem.*, 1976, **40**, 1113-1118, (*isol, struct, ms, uv, pmr, synth*)

Matsui, K. *et al.*, *Bull. Chem. Soc. Jpn.*, 1976, **49**, 62, (*cryst struct*)

Iida, T. *et al.*, *Phytochemistry*, 1983, **22**, 763, (*Liliflone*)

Tyagi, O.D. *et al.*, *Acta Chem. Scand.*, 1994, **48**, 1007-1011, (*6-alcohol, isol, pmr, cmr, ms*)

Koul, J.L. *et al.*, *Phytochemistry*, 1996, **41**, 1097, (*isol, uv, ir, pmr, cmr*)