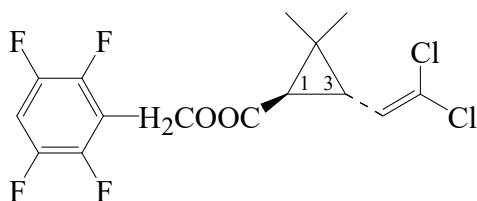




>>Entry Name: Transfluthrin, BSI

Synonym(s): (2,3,5,6-Tetrafluorophenyl)methyl 3-(2,2-dichloroethenyl)-2,2-dimethylcyclopropanecarboxylate, 9Cl. Baygon. Bayothrin. Benfluthrin. NAK 4455



CAS Registry Number: 67640-15-7

Related CAS Registry Numbers(s): 106757-84-0

Molecular Formula: C<sub>15</sub>H<sub>12</sub>Cl<sub>2</sub>F<sub>4</sub>O<sub>2</sub>

Molecular Weight: 371.158

Accurate Mass: 370.015046

Percentage Composition: C 48.54%; H 3.26%; Cl 19.10%; F 20.47%; O 8.62%

Biological Use/Importance: Effector on presynaptic voltage gate Na channels in nerve membranes. Insecticide, active against mosquitoes, flies, cockroaches and whitefly by inhalation and contact.

>>Variant: (1R,3S)-form

Synonym(s): (+)-*trans*-form

CAS Registry Number: 118712-89-3

Molecular Formula: C<sub>15</sub>H<sub>12</sub>Cl<sub>2</sub>F<sub>4</sub>O<sub>2</sub>

Molecular Weight: 371.158

Accurate Mass: 370.015046

Percentage Composition: C 48.54%; H 3.26%; Cl 19.10%; F 20.47%; O 8.62%

Physical Description: Cryst.

Melting Point: Mp 32°

Optical Rotation:  $[\alpha]_D^{29} +15.3$  (c, 0.5 in CHCl<sub>3</sub>)

Hazard & Toxicity: LD<sub>50</sub> (rat, orl) >5000 mg/kg

#### References:

Ger. Pat., 1978, Bayer, 2 658 074; CA, **89**, 129278p, (synth)

Ger. Pat., 1988, Bayer, 3 705 224; CA, **110**, 74909q, (synth, activity)

Farnham, A.W. et al., Pestic. Sci., 1995, **44**, 277-281, (activity)

Pesticide Manual, 12th edn., 2000, No. 769