Product Name: (-)-Bicuculline methiodide
CAS Number: 40709-69-1
IUPAC Name: \[R^-{(R^*,S^*)}-5-(6,8-Dihydro-8-oxofuro[3,4-e]-1,3-benzodioxol-6-yl)-5,6,7,8-tetrahydro-6,6-dimethyl-1,3-dioxolo[4,5-g]isoquinolinium iodide\]

1. PHYSICAL AND CHEMICAL PROPERTIES

   Batch Molecular Formula: \(C_{21}H_{20}INO_6.\frac{1}{4}H_2O\)
   Batch Molecular Weight: 531.82
   Physical Appearance: Yellow solid
   Solubility: water to 20 mM
   DMSO to 50 mM
   Storage: Store at RT

2. ANALYTICAL DATA

   TLC: \(R_f = 0.1\) (Dichloromethane:Methanol [95:5])
   HPLC: Shows 99.5% purity
   \(^1\)H NMR: Consistent with structure
   Mass Spectrum: Consistent with structure
   Microanalysis:
   
<table>
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<th>Carbon</th>
<th>Hydrogen</th>
<th>Nitrogen</th>
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Caution - Not Fully Tested • Research Use Only • Not For Human or Veterinary Use

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Product Information

Product Name: (-)-Bicuculline methiodide
Catalog No.: 2503
Batch No.: 10
CAS Number: 40709-69-1
IUPAC Name: \([R-(R^*,S^*)]-5-(6,8-Dihydro-8-oxofuro[3,4-e]-1,3-benzodioxol-6-yl)-5,6,7,8-tetrahydro-6,6-dimethyl-1,3-dioxolo[4,5-g]isoquinolinium iodide\)

Description:
Methiodide form of classical GABA receptor antagonist (+)-bicuculline (Cat. No. 0130). More water-soluble and stable. Non-GABA receptor-mediated actions reported, including actions on calcium-dependent potassium channels.

Physical and Chemical Properties:
Batch Molecular Formula: \(C_{21}H_{20}NO_6\cdot1\frac{1}{4}H_2O\)
Batch Molecular Weight: 531.82
Physical Appearance: Yellow solid
Minimum Purity: >99%

Storage: Store at RT
CAUTION - This product is light sensitive and we recommend that the solid material and any solutions obtained are protected from exposure to light.

Solubility & Usage Info:
water to 20 mM
DMSO to 50 mM

Stability and Solubility Advice:
Some solutions can be difficult to obtain and can be encouraged by rapid stirring, sonication or gentle warming (in a 45-60°C water bath).
Information concerning product stability, particularly in solution, has rarely been reported and in most cases we can only offer a general guide. Our standard recommendations are:
SOLIDS: Provided storage is as stated on the product label and the vial is kept tightly sealed, the product can be stored for up to 6 months from date of receipt.
SOLUTIONS: We recommend that stock solutions, once prepared, are stored aliquoted in tightly sealed vials at -20°C or below and used within 1 month. Wherever possible solutions should be made up and used on the same day.

References: