

Auxinole: Auxin Inhibitor & Reagent for Auxin Inducible Degron Experiments

30-001 50 mg

30-001-5 50 mg x 5

Shipping and Storage: Ship at ambient temperature or at 4 °C and store at –20 °C.

Product name: auxinole

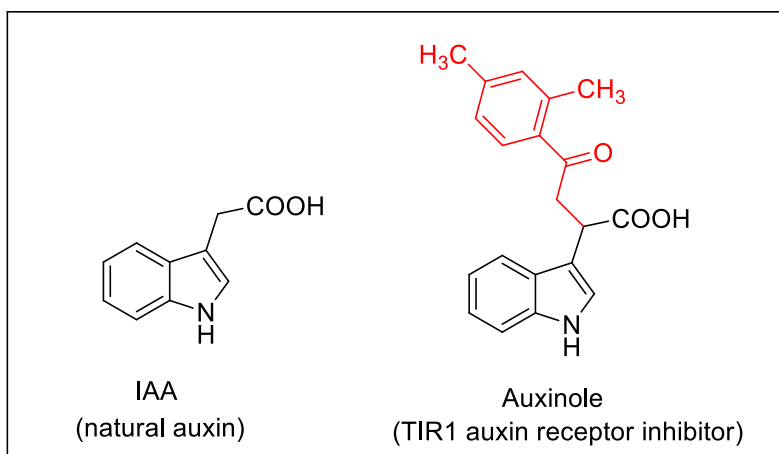
Chemical name: 1H-Indole-3-acetic acid, alpha-[2-(2,4-dimethylphenyl)2-oxoethyl]-

CAS Registry Number: 86445-22-9

Chemical Formula: C₂₀H₁₉NO₃

Molecular Weight: 321.37

Molecular structure of Auxinole, a competitive inhibitor of the TIR1 auxin receptor



To make a 200mM stock solution, dissolve 50 mg of auxinole in 0.77 ml of DMSO. Store the stock solution below –20 °C until use. See Ref 1 for details.

References: The use of auxinole to control human proteins by the AID technology is shown in Ref 1. The use of auxinole for plants and the synthesis method are described in Ref. 2.

1. Yesbolatova A et al. Generation of conditional auxin-inducible degron (AID) cells and tight control of degron-fused proteins using the degradation inhibitor auxinole. [Methods](#). 2019 Apr 24. pii: S1046-2023(18)30331-1. PMID: [31026591](#)
2. Hayashi K et al. Rational design of an auxin antagonist of the SCF(TIR1) auxin receptor complex. [ACS Chem Biol](#). 2012 Mar 16;7(3):590-8. PMID: [22234040](#)

MATERIAL SAFETY DATA SHEET

1. IDENTIFICATION

Product name: auxinole

Chemical name: 1H-Indole-3-acetic acid, alpha-[2-(2,4-methylphenyl)2-oxoethyl]-

Product code: 30-001

Supplier: BioAcademia Inc.

Address: North Building, Research Institute for Microbial Diseases, Osaka University, 3-1 Yamadaoka, Suita, Osaka 565-0871, Japan

Telephone: 81-6-6877-2335 **Fax:** 81-6-6877-2336

E-mail: info@bioacademia.co.jp

2. HAZARDS IDENTIFICATION

Classification of the substance or mixture: Substance

PHYSICAL HAZARDS: Not classified

HEALTH HAZARDS: Not classified

ENVIRONMENTAL HAZARDS: Not classified

Label elements

Pictograms or hazard symbols: None

Signal word: No signal word

Hazard statements: None

Precautionary statements: None

3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance/mixture: Substance

CAS Registry Number: 86445-22-9

Chemical Formula: C₂₀H₁₉NO₃

Molecular Weight: 321.37

Notice Through Official Gazettes Reference Number

ENCS: Not Listed

4. FIRST-AID MEASURES

Inhalation: Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical advice/attention if you feel unwell.

Skin contact: Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower. If skin irritation or rash occurs: Get medical advice/attention.

Eye contact: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.

Ingestion: Get medical advice/attention if you feel unwell. Rinse mouth.

Protection of first-aiders: A rescuer should wear personal protective equipment, such as rubber gloves and air-tight goggles.

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media: Dry chemical, foam, water spray, carbon dioxide.

Specific hazards arising from the chemical: Take care as it may decompose upon combustion or in high temperatures to generate poisonous fume.

6. HANDLING AND STORAGE

Precautions for safe handling

Handling is performed in a well ventilated place. Wear suitable protective equipment.

Prevent dispersion of dust. Wash hands and face thoroughly after handling.

Use a local exhaust if dust or aerosol will be generated.

Advice on safe handling: Avoid contact with skin, eyes and clothing

7. EXPOSURE CONTROLS / PERSONAL PROTECTION

Engineering controls: Install a closed system or local exhaust as possible so that workers should not be exposed directly. Also install safety shower and eye bath

Control parameters: Not set up

Personal protective equipment

Respiratory protection: Dust respirator. Follow local and national regulations.

Hand protection: Protective gloves.

Eye protection: Safety glasses.

Skin and body protection: Protective clothing.

8. PHYSICAL AND CHEMICAL PROPERTIES

Physical state (20°C): Solid

Form: Crystal- Powder

Color: hite

Odor: No data available

pH: No data available

Flammability or explosive limits:

Lower: No data available

Upper: No data available

Relative density: No data available

Solubility(ies): [Water] No data available,

[Other solvents] Soluble: methanol, acetone, DMSO, DMF

9. STABILITY AND REACTIVITY

Chemical stability:	Stable under proper conditions.
Possibility of hazardous reactions:	No special reactivity has been reported.
Incompatible materials:	Oxidizing agents
Hazardous decomposition products:	Carbon monoxide, Carbon dioxide, Nitrogen oxides (NO _x)

10. TOXICOLOGICAL INFORMATION

Acute Toxicity:	No data available
Skin corrosion/irritation:	No data available
Serious eye damage/irritation:	No data available
Germ cell mutagenicity:	No data available
Carcinogenicity:	
IARC =	No data available
NTP =	No data available
Reproductive toxicity:	No data available

11. ECOLOGICAL INFORMATION

Ecotoxicity:	
Fish:	No data available
Crustacea:	No data available
Algae:	No data available
Persistence / degradability:	No data available
Bioaccumulative potential(BCF):	No data available
Mobility in soil	
Log Pow:	No data available
Soil adsorption (K_{oc}):	No data available
Henry's Law constant(PaM³/mol):	No data available

12. DISPOSAL CONSIDERATIONS

Recycle to process, if possible. Consult your local regional authorities. You may be able to dissolve or mix material with a combustible solvent and burn in a chemical incinerator equipped with an afterburner and scrubber system. Observe all federal, state and local regulations when disposing of the substance.

13. TRANSPORT INFORMATION

Hazards Class: Does not correspond to the classification standard of the United Nations

UN-No: Not listed

14. REGULATORY INFORMATION

No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302, or have known CAS numbers that exceed the threshold reporting levels established by SARA Title III, Section 313.

10. OTHER INFORMATION

This MSDS is correct to the best of our knowledge at the date of publication but does not purport to be all inclusive and shall be used only as a guide. It must only be handled by suitably qualified experienced scientists in appropriately equipped and authorized facilities. The burden of safe use of this material rests entirely with the user. Bioacademia Inc. shall not be held liable for any injury or damage resulting from handling or from contact with the above product.

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