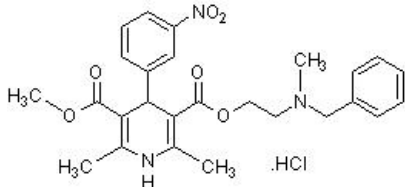


## Product datasheet

# Nicardipine hydrochloride, L-type Ca<sup>2+</sup> channel antagonist ab120531

2 Images

### Overview

<b>Product name</b>	Nicardipine hydrochloride, L-type Ca <sup>2+</sup> channel antagonist
<b>Description</b>	L-type Ca <sup>2+</sup> channel antagonist
<b>Biological description</b>	Selective, L-type Ca <sup>2+</sup> channel blocker (IC <sub>50</sub> = 24.1 μM). Dihydropyridine derivative. Potent coronary and cerebral vasodilator.
<b>Purity</b>	> 97%
<b>CAS Number</b>	54527-84-3
<b>Chemical structure</b>	

### Properties

<b>Chemical name</b>	1,4-Dihydro-2,6-dimethyl-4-(3-nitrophenyl)methyl-2-[methyl(phenylmethyl)amino]-3,5-pyridinedicarboxylic acid ethyl ester hydrochloride
<b>Molecular weight</b>	515.99
<b>Molecular formula</b>	C <sub>26</sub> H <sub>29</sub> N <sub>3</sub> O <sub>6</sub> ·HCl
<b>Storage instructions</b>	Store at +4°C. Store under desiccating conditions. The product can be stored for up to 12 months.
<b>Solubility overview</b>	Soluble in DMSO to 100 mM
<b>Handling</b>	<p>Wherever possible, you should prepare and use solutions on the same day. However, if you need to make up stock solutions in advance, we recommend that you store the solution as aliquots in tightly sealed vials at -20°C. Generally, these will be useable for up to one month. Before use, and prior to opening the vial we recommend that you allow your product to equilibrate to room temperature for at least 1 hour.</p> <p>Toxic, refer to SDS for further information.</p> <p>Need more advice on solubility, usage and handling? Please visit our <a href="#">frequently asked questions (FAQ) page</a> for more details.</p>

Source

Synthetic

## Applications

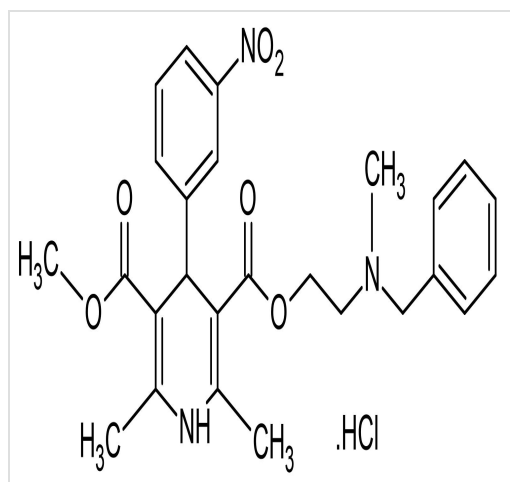
### The Abpromise guarantee

Our **Abpromise guarantee** covers the use of ab120531 in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

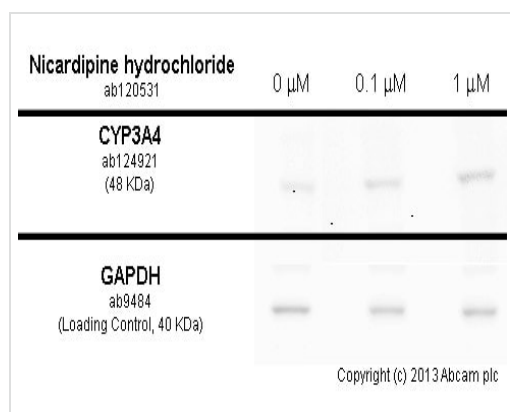
Application	Abreviews	Notes
Functional Studies		Use at an assay dependent concentration.

## Images



2D chemical structure image of ab120531, Nicardipine hydrochloride, L-type Ca<sup>2+</sup> channel antagonist

Chemical Structure - Nicardipine hydrochloride, L-type Ca<sup>2+</sup> channel antagonist (ab120531)



Western blot - Nicardipine hydrochloride, L-type Ca<sup>2+</sup> channel antagonist (ab120531)

HepG2 cells were incubated at 37°C for 48h with vehicle control (0 μM) and different concentrations of nicardipine hydrochloride (ab120531) in DMSO. Increased expression of cytochrome P450 3A4 (**ab124921**) correlates with an increase in nicardipine hydrochloride concentration, as described in literature.

Whole cell lysates were prepared with RIPA buffer (containing protease inhibitors and sodium orthovanadate), 10 μg of each were loaded on the gel and the WB was run under reducing conditions. After transfer the membrane was blocked for an hour using 5% BSA before being incubated with **ab124921** at 1/10000 dilution and **ab9484** at 1 μg/ml overnight at 4°C. Antibody binding was detected using an anti-rabbit antibody conjugated to HRP (**ab97051**) at 1/10000 dilution and visualised using ECL development solution.

**Please note:** All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES, NOT FOR USE IN HUMANS"

### **Our Abpromise to you: Quality guaranteed and expert technical support**

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- Response to your inquiry within 24 hours
  
- We provide support in Chinese, English, French, German, Japanese and Spanish
- Extensive multi-media technical resources to help you
- We investigate all quality concerns to ensure our products perform to the highest standards

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