



SZABO SCANDIC

Part of Europa Biosite

Produktinformation



Forschungsprodukte & Biochemikalien



Zellkultur & Verbrauchsmaterial



Diagnostik & molekulare Diagnostik



Laborgeräte & Service

Weitere Information auf den folgenden Seiten!
See the following pages for more information!



Lieferung & Zahlungsart

siehe unsere [Liefer- und Versandbedingungen](#)

Zuschläge

- Mindermengenzuschlag
- Trockeneiszuschlag
- Gefahrgutzuschlag
- Expressversand

SZABO-SCANDIC HandelsgmbH

Quellenstraße 110, A-1100 Wien

T. +43(0)1 489 3961-0

F. +43(0)1 489 3961-7

mail@szabo-scandic.com

www.szabo-scandic.com

[linkedin.com/company/szaboscandic](https://www.linkedin.com/company/szaboscandic) 

PRODUCT INFORMATION



BML-278

Item No. 20209

CAS Registry No.: 120533-76-8

Formal Name: 1,4-dihydro-4-phenyl-1-(phenylmethyl)-3,5-pyridinedicarboxylic acid, 3,5-diethyl ester

MF: $C_{24}H_{25}NO_4$

FW: 391.5

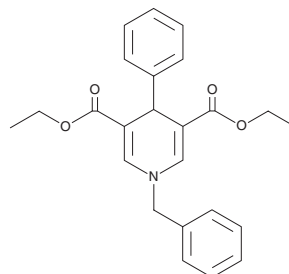
Purity: $\geq 95\%$

UV/Vis.: λ_{max} : 226, 368 nm

Supplied as: A crystalline solid

Storage: $-20^{\circ}C$

Stability: As supplied, 2 years from the QC date provided on the Certificate of Analysis, when stored properly



Laboratory Procedures

BML-278 is supplied as a crystalline solid. A stock solution may be made by dissolving the BML-278 in the solvent of choice. BML-278 is soluble in organic solvents such as DMSO and dimethyl formamide (DMF), which should be purged with an inert gas. The solubility of BML-278 in these solvents is approximately 3 and 12.5 mg/ml, respectively.

BML-278 is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, BML-278 should first be dissolved in DMF and then diluted with the aqueous buffer of choice. BML-278 has a solubility of approximately 0.25 mg/ml in a 1:3 solution of DMF:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Description

BML-278 is an activator of sirtuin 1 (SIRT1) that has an EC_{150} value (effective concentration able to increase the enzyme by 150%) of $1 \mu M$.¹ It less potently activates SIRT2 and SIRT3 ($EC_{150}s = 25$ and $50 \mu M$, respectively).¹ BML-278 induces hypoacetylation on α -tubulin in U937 cells that are pretreated with SAHA (Item No. 10009929), a histone deacetylase inhibitor. It arrests cell cycling at the G_1/S phase, reduces senescence in primary human mesenchymal cells, and significantly increases mitochondrial density in murine C2C12 myoblasts.¹

Reference

1. Mai, A., Valente, S., Meade, S., *et al.* Study of 1,4-dihydropyridine structural scaffold: Discovery of novel sirtuin activators and inhibitors. *J. Med. Chem.* **52**(17), 5496-5504 (2009).

WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the [complete](#) Safety Data Sheet, which has been sent via email to your institution.

WARRANTY AND LIMITATION OF REMEDY

Buyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website.

Copyright Cayman Chemical Company, 04/17/2017

CAYMAN CHEMICAL

1180 EAST ELLSWORTH RD
ANN ARBOR, MI 48108 · USA

PHONE: [800] 364-9897
[734] 971-3335

FAX: [734] 971-3640

CUSTSERV@CAYMANCHEM.COM
WWW.CAYMANCHEM.COM