

Specification

Benzamidine Hydrochloride *BioChemica*

A1380

Physical Description:	Solid
Product Code:	A1380
Product Name:	Benzamidine Hydrochloride <i>BioChemica</i>
Specifications:	Assay (titr.): min. 99 % Water (K.F.): max. 15 %
WGK:	1
Storage:	2-8°C
Molecular Formula:	C ₇ H ₈ N ₂ · HCl
M:	156.62 g/mol
CAS:	1670-14-0
EINECS:	216-795-4
CS:	29252900
Comment	Benzamidine is an amide derivative of benzene. It is an effective, competitive inhibitor of trypsin, thrombin, acrosin and plasmin. The <i>K_i</i> -value for trypsin is 3.5 μM, for plasmin at 350 μM and for thrombin at 220 μM (2). The working concentration in the protease inhibitor cocktails of benzamidine is 1 mM or 5 mM. A good inhibition of proteases from blood/plasma is observed at final concentrations of 50 mM. Stock solutions can be prepared as 1 M aqueous solutions (3, 4).
Bibliography	(1)Mares-Guia, M. & Shaw, E. (1965) <i>J. Biol. Chem.</i> 240 , 1579-1585Studies on the active center of trypsin. (2)Markwardt, F. <i>et al.</i> (1968) <i>Eur. J. Biochem.</i> 6 , 502-506Comparative studies on the inhibition of trypsin, plasmin and thrombin by derivatives of benzylamine and benzamidine. (3)Ensinck, J.W. <i>et al.</i> (1972) <i>J. Clin. Endocrinol. Metab.</i> 35 , 463-467Use of benzamidine as proteolytic inhibitor in the RIA of glucagon in plasma. (4)Jeffcoate, S.L. & White, N. (1974) <i>J. Clin. Endocrinol. Metab.</i> 38 , 155-157Use of benzamidine to prevent the destruction of thyrotropin-releasing hormone (TRH) by blood.

AppliChem GmbH

Ottoweg 4 • D-64291 Darmstadt • Phone +49 6151 9357 0 • Fax +49 6151 9357 11 • info.de@itwreagents.com • www.itwreagents.com
CEO Joan Roget • Commerzbank Darmstadt • Bank 508 800 50 • Account 0186989900 IBAN DE24 5088 0050 0186 9899 00 • Swiftcode DRESDEFF508 • Finanzamt Darmstadt 07 228 16476 • Register court Darmstadt HRB Nr. 7340