

Product Datasheet

2-Amino benzamidoxime (orb3143466)

Catalog Number	orb3143466
Category	Small Molecules
Description	<p>2-Amino benzamidoxime (ABAO compound 6) swiftly reacts with aldehydes in aqueous solution to form a stable 1,2-dihydroquinazoline-3-oxide (dihydroquinazoline derivative). The reaction involves the formation of a Schiff base as the rate-determining step, followed by rapid intramolecular cyclization. The reaction rate is pH-dependent, indicating that protonated benzamidoxime acts as an internal general acid in Schiff base formation. Substituents on the aromatic ring can increase the basicity of the aromatic amine, accelerating the reaction. The reactive properties of 2-Amino benzamidoxime suggest its potential as a platform for developing new bioconjugation strategies, fluorescent probes, and post-translational diversification of genetically encoded libraries.</p>
Target	Others
MW	151.17
CAS Number	16348-49-5
Formula	C ₇ H ₉ N ₃ O
SMILES	<chem>N=C(NO)C=1C=CC=CC1N</chem>
Storage	-20°C
Note	For research use only
Expiration Date	12 months from date of receipt.

Biorbyt Ltd.

7 Signet Court, Swann Road
Cambridge
CB5 8LA
United Kingdom

Email: info@biorbyt.com, support@biorbyt.com

Phone: +44 (0)1223 859353 | Fax: +1 (415) 651-8558

Biorbyt LLC

68 TW Alexander Drive
Research Triangle Park
Durham
NC 27713
United States

Email: info@biorbyt.com, support@biorbyt.com

Phone: +1 (415) 906-5211 | Fax: +1 (415) 651-8558