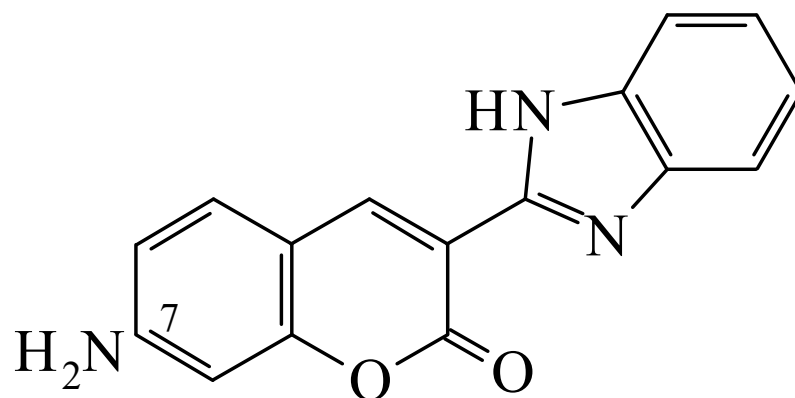




>>Entry Name: 7-Amino-3-(1*H*-benzimidazol-2-yl)-2*H*-1-benzopyran-2-one

Synonym(s): 7-Amino-3-(2-benzimidazolyl)coumarin



Molecular Formula: C₁₆H₁₁N₃O₂

Molecular Weight: 277.282

Accurate Mass: 277.085127

Percentage Composition: C 69.31%; H 4.00%; N 15.15%; O 11.54%

Physical Description: Yellow cryst. (DMF)

Melting Point: Mp 320-325°

>>Derivative: *N*⁷,*N*⁷-Di-Et

Synonym(s): Coumarin 7. Coumarin 535

CAS Registry Number: 27425-55-4

Molecular Formula: C₂₀H₁₉N₃O₂

Molecular Weight: 333.389

Accurate Mass: 333.147727

Percentage Composition: C 72.05%; H 5.74%; N 12.60%; O 9.60%

Use/Importance: Laser dye

Physical Description: Brown cryst. (PhCl/C₆H₆)

Melting Point: Mp 232-234°

Aldrich: 41654-1

Rare Chemicals Library: S27193-4

Sigma: C3086

>>Derivative: *N*⁷,*N*⁷-Di-Et, *N*¹-Me

Synonym(s): 7-(Diethylamino)-3-(1-methyl-1*H*-benzimidazol-2-yl)coumarin. Coumarin 30. Coumarin 515

CAS Registry Number: 41044-12-6

Molecular Formula: C₂₁H₂₁N₃O₂

Molecular Weight: 347.416

Accurate Mass: 347.163377

Percentage Composition: C 72.60%; H 6.09%; N 12.10%; O 9.21%

Use/Importance: Laser dye

Physical Description: Yellow cryst. (C₆H₆)

Melting Point: Mp 213-214°

Rare Chemicals Library: S27192-6

References:

Ger. Pat., 1959, 1 098 125; *CA*, **56**, 10158d, (*synth*)

Japan. Pat., 1973, 73 80 122; *CA*, **80**, 84703u, (*synth*)

Park, S.M. *et al.*, *J. Electroanal. Chem. Interfacial Electrochem.*, 1977, **77**, 137, (*props*)

Politzer, I.R. *et al.*, *Talanta*, 1992, **39**, 953, (*chromatog*)