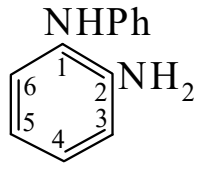
>>**Entry Name: 2-Aminodiphenylamine**
Synonym(s): *N*-Phenyl-1,2-benzenediamine, 9Cl. *N*-Phenyl-*o*-phenylenediamine. *o*-Semidine



CAS Registry Number: 534-85-0

Molecular Formula: $C_{12}H_{12}N_2$
Molecular Weight: 184.24
Accurate Mass: 184.100048
Percentage Composition: C 78.23%; H 6.56%; N 15.20%
Use/Importance: Used as 1% soln. in 1*M* $HClO_4$ for extraction-photometric detn. of Se (λ_{max} 352 nm, ε 18100, hexanol, PhCl)
Physical Description: Needles (H_2O)
Melting Point: Mp 79-80°
Solubility: Sol. acids, C_6H_6, cyclohexane

Aldrich: P2835-2
Fluka: 7900

>>**Derivative:** Hydrochloride

Melting Point: Mp 115.5-117 dec.°

>>**Derivative:** 2-*N*-Ac

Molecular Formula: $C_{14}H_{14}N_2O$
Molecular Weight: 226.277
Accurate Mass: 226.110613
Percentage Composition: C 74.31%; H 6.24%; N 12.38%; O 7.07%
Melting Point: Mp 121°

>>**Derivative:** 2-*N*-Benzoyl

Molecular Formula: $C_{19}H_{16}N_2O$
Molecular Weight: 288.348
Accurate Mass: 288.126263
Percentage Composition: C 79.14%; H 5.59%; N 9.72%; O 5.55%
Melting Point: Mp 136°

References:

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Ariyoshi, H. *et al.*, *Talanta*, 1960, **5**, 112, *(detn, Se)*
Ger. Pat., 1972, 2 213 895; *CA*, **78**, 85944, *(use)*
Kalyanaraman, V. *et al.*, *J.O.C.*, 1973, **38**, 507, *(bibl)*
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