

**4-[(2,4-Dichlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2a).**

Calc'd for  $C_{18}H_{13}Cl_2N_3O_2 \cdot 0.5 H_2O$ : C, 56.41; H, 3.68; N, 10.96.

Found: C, 56.38; H, 3.39; N, 11.12.

**4-[(2,4-Dichlorophenyl)amino]-3-quinolinecarbonitrile (2b).**

Calc'd for  $C_{16}H_9Cl_2N_3$ : C, 61.17; H, 2.89; N, 13.37.

Found: C, 60.84; H, 3.14; N, 13.01.

**4-[(2,4-Dichlorophenyl)amino]-5-methoxy-3-quinolinecarbonitrile (2c).**

Calc'd for  $C_{17}H_{11}Cl_2N_3O$ : C, 59.32; H, 3.22; N, 12.21.

Found: C, 59.14; H, 3.38; N, 12.07.

**4-[(2,4-Dichlorophenyl)amino]-6-methoxy-3-quinolinecarbonitrile (2d).**

Calc'd for  $C_{17}H_{11}Cl_2N_3O$ : C, 59.32; H, 3.22; N, 12.21.

Found: C, 59.09; H, 3.36; N, 12.14.

**4-[(2,4-Dichlorophenyl)amino]-7-methoxy-3-quinolinecarbonitrile (2e).**

Calc'd for  $C_{17}H_{11}Cl_2N_3O \cdot 0.2 H_2O$ : C, 58.70; H, 3.29; N, 12.21.

Found: C, 58.82; H, 3.42; N, 12.10.

**4-[(2,4-Dichlorophenyl)amino]-8-methoxy-3-quinolinecarbonitrile (2f).**

Calc'd for  $C_{17}H_{11}Cl_2N_3O \cdot 0.5 H_2O$ : C, 57.80; H, 3.43; N, 11.90.

Found: C, 57.79; H, 3.58; N, 11.77.

**4-[(2,4-Dichlorophenyl)amino]-5,7-dimethoxy-3-quinolinecarbonitrile (2g).**

Calc'd for  $C_{18}H_{13}Cl_2N_3O_2$ : C, 57.77; H, 3.50; N, 11.23.

Found: C, 57.43; H, 3.72; N, 11.10.

**4-[(2,4-Dichlorophenyl)amino]-6,7-dihydroxy-3-quinolinecarbonitrile (2h).**

Calc'd for  $C_{16}H_9Cl_2N_3O_2 \cdot 0.8 H_2O$ : C, 53.29; H, 2.95; N, 11.65.

Found: C, 53.44; H, 3.00; N, 11.54.

**4-[(2,4-Dichlorophenyl)amino]-6,7-diethoxyquinoline-3-carbonitrile (2i).**

Calc'd for  $C_{20}H_{17}Cl_2N_3O_3 \cdot 0.2 H_2O$ : C, 59.18; H, 4.31; N, 10.35.

Found: C, 59.47; H, 4.58; N, 9.98.

**4-[(2,4-Dichlorophenyl)amino]-6,7-diethoxy-3-quinolinecarbonitrile (2j).**

Calc'd for  $C_{24}H_{25}Cl_2N_3O_2$ : C, 62.89; H, 5.50; N, 9.17.

Found: C, 62.56; H, 5.70; N, 8.79.

**4-(2-Chlorophenylamino)-6,7-dimethoxyquinoline-3-carbonitrile (2k).**

Calc'd for  $C_{18}H_{14}ClN_3O_2 \cdot 0.17 CH_2Cl_2$ : C, 61.16; H, 4.08; N, 11.86.

Found: C, 61.34; H, 4.14; N, 11.48.

**4-[(4-Chlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2l).**

Calc'd for  $C_{18}H_{14}ClN_3O_2$ : C, 63.63; H, 4.15; N, 12.37

Found: C, 63.46; H, 4.21; N, 12.02

**4-[(2,3-Dichlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2m).**

Calc'd for  $C_{18}H_{13}Cl_2N_3O_2 \cdot 0.5 EtOAc$ : C, 57.43; H, 4.10; N, 10.05.

Found: C, 57.04; H, 3.94; N, 9.90.

**4-[(2,5-Dichlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2n).**

Calc'd for  $C_{18}H_{13}Cl_2N_3O_2 \cdot 0.05 Et_2O$ : C, 57.84; H, 3.66; N, 11.12.

Found: C, 57.80; H, 3.56; N, 11.16.

**4-[(2,6-Dichlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2o).**

Calc'd for  $C_{18}H_{13}Cl_2N_3O_2$ : C, 57.77; H, 3.50; N, 11.23.

Found: C, 57.64; H, 3.76; N, 11.10.

**4-[(3,5-Dichlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2p).**

Calc'd for  $C_{18}H_{13}Cl_2N_3O_2$ : C, 57.77; H, 3.50; N, 11.23.

Found: C, 57.54; H, 3.69; N, 10.82.

**4-[(3,4-Dichlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2q).**

Calc'd for  $C_{18}H_{13}Cl_2N_3O_2 \cdot 0.25 H_2O$ : C, 57.08; H, 3.59; N, 11.09.

Found: C, 56.97; H, 3.65; N, 10.74.

**4-[(4-Chloro-2-fluorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2r).**

Calc'd for  $C_{18}H_{13}ClFN_3O_2$ : C, 60.43; H, 3.66; N, 11.74.

Found: C, 60.52; H, 3.78; N, 11.48.

**4-[(2-Bromo-4-chlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2s).**

Calc'd for  $C_{18}H_{13}BrClN_3O_2$ : C, 51.64; H, 3.13; N, 10.04.

Found: C, 51.24; H, 3.12; N, 9.89.

**4-[(4-Chloro-2-iodophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2t).**

Calc'd for  $C_{18}H_{13}ClIN_3O_2$ : C, 46.43; H, 2.81; N, 9.02.

Found: C, 46.42; H, 2.83; N, 9.19.

**4-[(2-Chloro-4-iodophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2u).**

Calc'd for  $C_{18}H_{13}ClIN_3O_2 \cdot 0.2 EtOAc$ : C, 46.72; H, 3.04; N, 8.69.

Found: C, 46.52; H, 3.15; N, 8.59.

**4-[(4-Bromo-2-chlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbonitrile (2v).**

Calc'd for  $C_{18}H_{13}BrClN_3O_2$ : C, 51.64; H, 3.13; N, 10.04.

Found: C, 51.62; H, 3.24; N, 9.88.

**7-(3-Chloropropoxy)-4-[(2,4-dichlorophenyl)amino]-6-methoxy-3-quinolinecarbonitrile (2y).**

Calc'd for  $C_{20}H_{16}Cl_3N_3O_2 \cdot 0.25 H_2O$ : C, 54.43; H, 3.76; N, 9.52.

Found: C, 54.23; H, 3.66; N, 9.25.

**4-[(2,4-Dichlorophenyl)amino]-6,7-dimethoxyquinazoline (3).**

Calc'd for  $C_{16}H_{13}Cl_2N_3O_2$ : C, 54.88; H, 3.74; N, 12.00.

Found: C, 54.71; H, 3.73; N, 12.05.

**4-Chloro-5,7-dimethoxy-3-quinolinecarbonitrile (4g).**

Anal. ( $C_{12}H_9ClN_2O_2 \cdot 0.1 H_2O$ ) C, H, N

Calc'd for  $C_{12}H_9ClN_2O_2 \cdot 0.1 H_2O$ : C, 57.40; H, 3.69; N, 11.18.

Found: C, 57.25; H, 3.67; N, 11.44.

**(2,4-Dichlorophenyl)-(6,7-dimethoxyquinolin-4-yl)-amine (6).**

Calc'd for  $C_{17}H_{14}Cl_2N_2O_2$ : C, 58.47; H, 4.04; N, 8.02.

Found: C, 58.50; H, 4.14; N, 8.02.

**4-(2,4-Dichlorophenoxy)-6,7-dimethoxy-3-quinolinecarbonitrile (8).**

Calc'd for  $C_{18}H_{12}Cl_2N_2O_3 \cdot 0.25 H_2O$ : C, 56.93; H, 3.32; N, 7.38.

Found: C, 56.79; H, 3.46; N, 7.14.

**4-(2,4-Dichlorophenylsulfanyl)-6,7-dimethoxy-3-quinolinecarbonitrile (9).**

Calc'd for  $C_{18}H_{12}Cl_2N_2O_2S \cdot 0.70 H_2O$ : C, 53.52; H, 3.33; N, 6.94.

Found: C, 55.25; H, 3.05; N, 6.95.

**4-[(2,4-Dichlorophenylamino)methyl]-6,7-dimethoxy-3-quinolinecarbonitrile (10).**

Calc'd for  $C_{19}H_{15}Cl_2N_3O_2 \cdot 0.70 H_2O \cdot 0.6 DMF$ : C, 56.17; H, 4.43; N, 11.34.

Found: C, 56.03; H, 4.57; N, 11.47.

**4-(2,4-Dichlorophenylmethylamino)-6,7-dimethoxy-3-quinolinecarbonitrile (11).**

Calc'd for  $C_{19}H_{15}Cl_2N_3O_2 \cdot 0.5 H_2O$ : C, 57.44; H, 4.06; N, 10.58.

Found: C, 57.47; H, 3.79; N, 10.36.

**2,4-Dichloro-N-(3-cyano-6,7-dimethoxyquinolin-4-yl)benzamide (12).**

Calc'd for  $C_{19}H_{13}Cl_2N_3O_3 \cdot 0.25 H_2O$ : C, 56.10; H, 3.35; N, 10.33.

Found: C, 56.11; H, 3.35; N, 10.25.

**4-(2,4-Dichlorophenylimino)-6,7-dimethoxy-1-methyl-1,4-dihydro-3-quinolinecarbonitrile (13).**

Calc'd for  $C_{19}H_{15}Cl_2N_3O_2$ : C, 58.78; H, 3.89; N, 10.82.

Found: C, 58.39; H, 3.82; N, 10.65.

**Ethyl 4-[(2,4-dichlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarboxylate (15).**

Calc'd for  $C_{20}H_{18}Cl_2N_2O_4 \cdot 0.2 H_2O$ : C, 56.53; H, 4.37; N, 6.59.

Found: C, 56.83; H, 4.50; N, 6.30.

**[4-[(2,4-Dichlorophenyl)amino]-6,7-dimethoxy-3-quinoliny]methanol (16).**

Calc'd for  $C_{18}H_{16}Cl_2N_2O_3$ : C, 57.01; H, 4.25; N, 7.39.

Found: C, 56.76; H, 4.15; N, 7.32.

**4-[(2,4-Dichlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarbaldehyde (17).**

Calc'd for  $C_{18}H_{14}Cl_2N_2O_3$ : C, 57.31; H, 3.74; N, 7.43.

Found: C, 57.02; H, 3.61; N, 7.26.

**4-[(2,4-Dichlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarboxylic acid - hydrochloride (18).**

Calc'd for  $C_{18}H_{14}Cl_2N_2O_4 \cdot HCl$ : C, 50.31; H, 3.52; N, 6.52.

Found: C, 50.30; H, 3.02; N, 6.31.

**4-[(2,4-Dichlorophenyl)amino]-6,7-dimethoxy-3-quinolinecarboxamide (19).**

Calc'd for  $C_{18}H_{15}Cl_2N_3O_3 \cdot 0.4 H_2O$ : C, 54.12; H, 3.99; N, 10.52.

Found: C, 54.14; H, 3.82; N, 10.15.

**4-Hydroxy-5-methoxy-3-quinolinecarbonitrile (20).**

Calc'd for  $C_{11}H_8N_2O_2 \cdot 0.1 H_2O$ : C, 65.40; H, 4.09; N, 13.87.

Found: C, 65.23; H, 3.92; N, 13.86.

**5,7-Dimethoxy-4-hydroxy-3-quinolinecarbonitrile (21).**

Calc'd for  $C_{12}H_{10}N_2O_3 \cdot 0.25 H_2O$ : C, 61.39; H, 4.50; N, 11.94.

Found: C, 61.19; H, 4.30; N, 12.31.

**4-[(2,4-Dichlorophenyl)amino]-6,7-bis(3-morpholin-4-ylpropoxy)-3-quinolinecarbonitrile (23).**

Calc'd for  $C_{30}H_{35}Cl_2N_5O_4 \cdot 1.0 H_2O$ : C, 58.25; H, 5.70; N, 11.32.

Found: C, 58.49; H, 5.98; N, 11.23.

**4-[(2,4-Dichlorophenyl)amino]-7-methoxy-6-(3-morpholin-4-ylpropoxy)-3-quinolinecarbonitrile (24).**

Calc'd for  $C_{24}H_{24}Cl_2N_4O_3 \cdot 0.3 H_2O$ : C, 58.49; H, 5.02; N, 11.31.

Found: C, 58.73; H, 4.92; N, 10.97.

**4-[(2,4-Dichlorophenyl)amino]-6-methoxy-7-(3-morpholin-4-ylpropoxy)-3-quinolinecarbonitrile (25).**

Calc'd for  $C_{24}H_{24}Cl_2N_4O_3 \cdot 0.6 H_2O$ : C, 57.86; H, 5.10; N, 11.25.

Found: C, 57.46; H, 5.09; N, 10.96.

**4-[(2,4-Dichlorophenyl)amino]-6-methoxy-7-[-(4-methyl-1-piperazinyl)propoxy]-3-quinolinecarbonitrile (26).**

Calc'd for  $C_{25}H_{27}Cl_2N_5O_2 \cdot 1.0 H_2O$ : C, 57.91; H, 5.64; N, 13.51.

Found: C, 57.73; H, 5.94; N, 13.32.

**4-[(2,4-Dichlorophenyl)amino]-7-[3-(4-hydroxy-1-piperidinyl)propoxy]-6-methoxy-3-quinolinecarbonitrile (27).**

Calc'd for  $C_{25}H_{26}Cl_2N_4O_3 \cdot 1.0 H_2O$ : C, 57.80; H, 5.43; N, 10.78.

Found: C, 57.57; H, 5.59; N, 10.70.