



REFERENCES.

- Andrews, S., Burgess, S.J., Skaalrud, D., Kelly, J.X., and Peyton, D.H., 2010, Reversal agent and linker variants of reversed chloroquinones: Activities against *Plasmodium falciparum*, *J. Med. Chem.*, 53, 916–919.
- Baldwin, K.A., Bitman, J., Thompson, M.J., and Robbins, W.E., 1981, Effects of primary, secondary and tertiary amines on *in vitro* cellulose digestion and volatile fatty acid production by ruminal microorganisms., *J. Anim. Sci.*, 53, 226–230.
- Bloiland, P.B., 2001, Drug resistance in malaria (WHO/CDS/CSR/DRS/2001.4), http://whqlibdoc.who.int/hq/2001/WHO_CDS_CSR_DRS_2001.4.pdf, *World Heal. Organ.*, pg. 27.
- Brotzel, F., Mayr, H., and Baidya, M., 2010, Nucleophilicities of Amines , Amino Acids and Pyridines, *Org. Biomol. Chem.*, 8, 1929–1935.
- Burke, E., Deasy Jane, and Hasson Ruairi, 2003, Antimalarial Drugs from nature, *Trinity Student Med. J.*, 1–8.
- Collet, J.W., Ackermans, K., Lambregts, J., Maes, B.U.W., Orru, R.V.A., and Ruijter, E., 2018, Modular Three-Component Synthesis of 4-Aminoquinolines via an Imidoylative Sonogashira/Cyclization Cascade, *J. Org. Chem.*, 83, 854–861.
- Das, K., Mondal, A., Pal, D., and Srimani, D., 2019, Sustainable Synthesis of Quinazoline and 2-Aminoquinoline via Dehydrogenative Coupling of 2-Aminobenzyl Alcohol and Nitrile Catalyzed by Phosphine-Free Manganese Pincer Complex, *Org. Lett.*, 21, 3223–3227.
- Gallardo, I., Guirado, G., and Marquet, J., 2002, Nucleophilic aromatic substitution for heteroatoms: An oxidative electrochemical approach, *J. Org. Chem.*, 67, 2548–2555.
- Gemma, S., Camodeca, C., Sanna Coccone, S., Joshi, B.P., Bernetti, M., Moretti, V., Brogi, S. De Marcos, M.C.B., Savini, L., Taramelli, D., Basilico, N., Parapini, S., Rottmann, M., Brun, R., L., Caccia, S., Guiso, G., Summers, R.L., Martin, R.E., Saponara, S., Gorelli, B., N.E., Campiani, Gg., Butini, S., 2012, Optimization of 4-aminoquinoline/clotrimazole-based hybrid antimalarials: Further structure-activity relationships, *in vivo* studies, and preliminary toxicity profiling, *J. Med. Chem.*, 55, 6948–6957.
- Gu, Z.Y., Zhu, T.H., Cao, J.J., Xu, X.P., Wang, S.Y., and Ji, S.J., 2014, Palladium-catalyzed cascade reactions of isocyanides with enamines: Synthesis of 4-aminoquinoline derivatives, *ACS Catal.*, 4, 49–52.
- Hadanu, R., Mustofa, and Nazudin, 2012, Synthesis and Antiplasmodial Activity of 2-(4-Methoxyphenyl)-4-Phenyl-1,10-Phenanthroline Derivative Compounds, *MAKARA Sci. Ser.*, 16, 101–109.
- Hochegger, P., Faist, J., Seebacher, W., Saf, R., Mäser, P., Kaiser, M., and Weis, R., 2018, Antiprotozoal Activities of Tetrazole-quinolines with Aminopiperidine Linker, *Med. Chem. (Los. Angeles)*, 15, 409–416.



- Kondaparla, S., Manhas, A., Dola, V.R., Srivastava, K., Puri, S.K., and Katti, S.B., 2018, Design, synthesis and antiplasmodial activity of novel imidazole derivatives based on 7-chloro-4-aminoquinoline, *Bioorg. Chem.*, 80, 204–211.
- Kondaparla, S., Soni, A., Manhas, A., Srivastava, K., Puri, S.K., and Katti, S.B., 2017, Antimalarial activity of novel 4-aminoquinolines active against drug resistant strains, *Bioorg. Chem.*, 70, 74–85.
- Kulkarni, A.A., King, C., Butcher, R.J., and Fortunak, J.M.D., 2012, 4,7-Dichloroquinoline, *Acta Crystallogr. Sect. E Struct. Reports Online*, 68, .
- Kumar, A., Srivastava, K., Raja Kumar, S., Puri, S.K., and Chauhan, P.M.S., 2010, Synthesis of new 4-aminoquinolines and quinoline-acridine hybrids as antimalarial agents, *Bioorg. Med. Chem. Lett.*, 20, 7059–7063.
- Lawrence, R.M., Dennis, K.C., O'Neill, P.M., Hahn, D.U., Roeder, M., and Struppe, C., 2008, Development of a scalable synthetic route to GSK369796(*N*-tert-butyl-isoquine), a novel 4-aminoquinoline antimalarial drug, *Org. Process Res. Dev.*, 12, 294–297.
- Madrid, P.B., Sherrill, J., Liou, A.P., Weisman, J.L., DeRisi, J.L., and Guy, R.K., 2005, Synthesis of ring-substituted 4-aminoquinolines and evaluation of their antimalarial activities, *Bioorg. Med. Chem. Lett.*, 15, 1015–1018.
- Madrid, P.B., Wilson, N.T., DeRisi, J.L., and Guy, R.K., 2004, Parallel synthesis and antimalarial screening of a 4-aminoquinoline library, *J. Comb. Chem.*, 6, 437–442.
- Manohar, S., Rajesh, U.C., Khan, S.I., Tekwani, B.L., and Rawat, D.S., 2012, Novel 4-aminoquinoline-pyrimidine based hybrids with improved in vitro and in vivo antimalarial activity, *ACS Med. Chem. Lett.*, 3, 555–559.
- Maurya, S.S., Khan, S.I., Bahuguna, A., Kumar, D., and Rawat, D.S., 2017, Synthesis, antimalarial activity, heme binding and docking studies of *N*-substituted 4-aminoquinoline-pyrimidine molecular hybrids, *Eur. J. Med. Chem.*, 129, 175–185.
- McMurry, J., Cole, B., and Nelson, T., 2008, *Organic Chemistry*, 7 th ed. Graphic World Inc. (ed) Brooks/Cole Publishing Co., Belmont.
- O'Neill, P.M., Mukhtar, A., Stocks, P.A., Randle, L.E., Hindley, S., Ward, S.A., Storr, R.C., Bickley, J.F., O'Neil, I.A. Maggs, J.L., Hughes, R.H. Winstanley, P.A., Bray, P.G., Park, B. K., 2003, Isoquine and Related Amodiaquine Analogues: A New Generation of Improved 4-Aminoquinoline Antimalarials, *J. Med. Chem.*, 46, 4933–4945.
- Solomon, R., V., Haq, W., Srivastava, K., Puri, S.K., and Katti, S.B., 2007, Synthesis and antimalarial activity of side chain modified 4-aminoquinoline derivatives, *J. Med. Chem.*, 50, 394–398.
- Reddy, P.L., Khan, S.I., Ponnann, P., Tripathi, M., and Rawat, D.S., 2017, Design, synthesis and evaluation of 4-aminoquinoline-purine hybrids as potential antiplasmodial agents, *Eur. J. Med. Chem.*, 126, 675–686.



- Ruiz, R., F.A., García-Sánchez, R.N., Estupiñan, S.V., Gómez-Barrio, A., Torres Amado, D.F., Pérez-Solórzano, B.M., Nogal-Ruiz, J.J., Martínez-Fernández, A.R., Kouznetsov, V.V., 2011, Synthesis and antimalarial activity of new heterocyclic hybrids based on chloroquine and thiazolidinone scaffolds, *Bioorg Med. Chem.*, 19, 4562–4573.
- Sadowsky, D., McNeill, K., and Cramer, C.J., 2014, Dehalogenation of aromatics by nucleophilic aromatic substitution, *Environ. Sci. Technol.*, 48, 10904–10911.
- Singh, S., Agarwal, D., Sharma, K., Sharma, M., Nielsen, M.A., Alifrangis, M., Singh, A.K., Gupta, R.D., Awasthi, S.K., 2016, 4-Aminoquinoline derivatives: Synthesis, *in vitro* and *in vivo* antiplasmodial activity against chloroquine-resistant parasites, *Eur. J. Med. Chem.*, 122, 394–407.
- Surrey, A.R. and Hammer, H.F., 1946, Some 7-Substituted 4-Aminoquinoline Derivatives, *J. Am. Chem. Soc.*, 68, 113–116.
- Terrier, F., 2013, *Modern Nucleophilic Aromatic Substitution*, Wiley-VCH Verlag GmbH & Co. KGaA, Weinheim, Germany.
- Tjitra, E., Anstey, N.M., Sugiarto, P., Warikar, N., Kenangalem, E., Karyana, M., Lampah, D.A., Price, R.N., 2008, Multidrug-resistant *Plasmodium vivax* associated with severe and fatal malaria: A prospective study in Papua, Indonesia, *PLoS Med.*, 5, 0890–0899.
- Vandekerckhove, S. and D’Hooghe, M., 2015, Quinoline-based antimalarial hybrid compounds, *Bioorg. Med. Chem.*, 23, 5098–5119.
- Youngsaye, W., Vincent, B., Hartland, C.L., Morgan, B.J., Buhrlage, S.J., Johnston, S., Bittker, J.A., MacPherson, L., Dandapani, S., Palmer, M., Whitesell, L., Lindquist, S., Schreiber, S.L., Munoz, B., 2011, Piperazinyl quinolines as chemosensitizers to increase fluconazole susceptibility of *Candida albicans* clinical isolates, *Bioorg. Med. Chem. Lett.*, 21, 5502–5505.
- Zhang, H., Solomon, V.R., Hu, C., Ulibarri, G., and Lee, H., 2008, Synthesis and *in vitro* cytotoxicity evaluation of 4-aminoquinoline derivatives, *Biomed. Pharmacother.*, 62, 65–69.