

HETEROCYCLES 36. SINGLE WALLED CARBON NANOTUBES BOUND *N,N*-DIETHYLETHANOLAMINE AS MILD AND EFFICIENT RACEMIZATION AGENT IN THE ENZYMATIC DKR OF 2-ARYLTHIAZOL-4-YL-ALANINE

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Abstract:

In this paper we describe the chemoenzymatic synthesis of enantiopure L-2-arylthiazol-4-yl alanines starting from their racemic *N*-acetyl derivatives, by combining the lipase catalyzed dynamic kinetic resolution of oxazol-5(4*H*)-ones with a chemical and an enzymatic enantioselective hydrolytic step. The developed procedure exploits the utility of the single walled carbon nanotubes bound triethylamine as mild and efficient racemisation agent for the dynamic kinetic resolution of the corresponding oxazolones, affording the desired products in good yields (55-58%) and high enantiopurities ($ee > 99\%$).

