Discovery of monocarbonyl curcumin-BTP hybrids as STAT3 inhibitors

for drug-sensitive and drug-resistant breast cancer therapy

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Scheme1. Synthesis of the new curcumin-BTP hybrids

S1.The ¹H NMR spectrums of representative compounds

S1.Synthesis of the new curcumin-BTP hybrids

FCHO

a
b
$$R_1$$
 $1a,1b$
 $2a,2b$
 R_1
 $S=0$
 N
 R_2

Reagents and conditions: (a) $HSCH_2COOCH_3$, DMF, 60 °C, 16h; (b) 10% KOH, reflux, 3 h, 1 M HCl; (c) SO_2Cl , reflux; Et_3N , overnight; (d) m-CPBA, DCM, reflux, 8h;(e) HCl gas in MeOH, rt, 48 h; (f) HATU, Et3N, DCM, rt, overnight.

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S2.The ¹H NMR spectrums of representative compounds















