Novel 3-(Benzylidene)indolin-2-one Derivatives as Cyclin-Dependent Kinase (CDK) Inhibitors with Potential Anticancer Activity

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CDKs have a key role in cell cycle progression and in transcription process with 4- to 20-fold higher activity in mammary carcinomas compared to normal tissues. Structure based design of novel CDKs inhibitors with 3-(benzylidene)indolin-2-one scaffold as potential anticancer agents were synthesized. (E)- and (Z)- diastereomers of the synthesized molecules were resolute and identified. *In silico* studies using MOE software package revealed better docking on the targeted enzyme(s) for the (Z)- diastereomers compared to (E)-ones which is consistent with the biological data.