

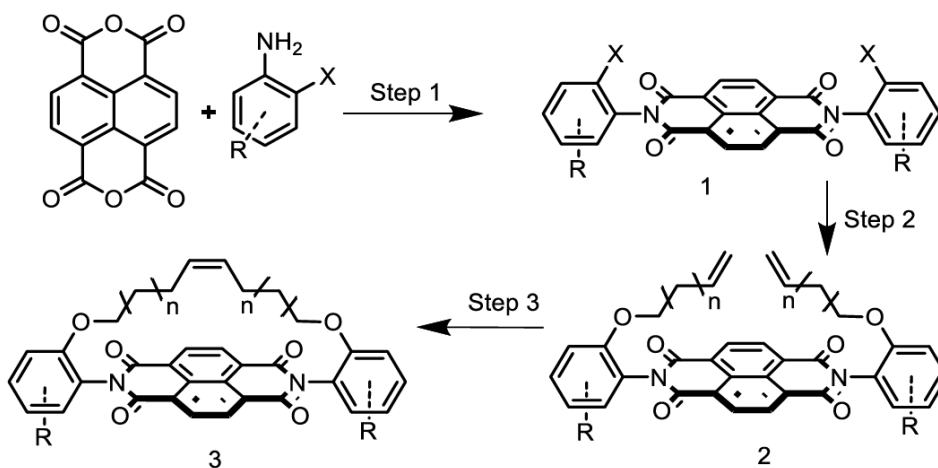
**SYNTHESIS OF NDI MODEL COMPOUNDS POSSESING STRAPPED – ALKENE
MOIETY TO EXAMINE ARYL – ALKENE $\pi - \pi$ INTERACTION**

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Derivatives, that contain naphthalene diimide (NDI) frameworks, are considered to be the strongest organic π - acids. [1] This unique property, together with their characteristic to assemble multilayered structures, make NDI derivatives to be promising materials for bioactivatable cross-linking agents [2], π - acid organocatalysts, anion sensors [3] and new molecular optoelectronic and electronic devices [4]. Our research group synthesized and characterized few symmetric aromatic NDI derivatives that contains cyclic alkene fragments with expectation to explore the highly electron deficient aromatic system of NDIs for the modulation of the electron density of alkene double bonds, located on top of the NDI's π -acidic surface.



The starting NDIs **1** were synthesized from corresponding aniline derivatives and commercially available 1,4,5,8-naphthalenetetracarboxylic dianhydride. Experiments were carried out under various conditions to obtain desired products. Lately, phenols were modified to alkoxy groups that contain alkene fragments. Obtained derivatives **2** were used for olefin metathesis on purpose to synthesize model compound **3**.

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