## **Abstract**

Solid surface modification is a widely researched topic where there is mostly used covalent bonding. Such modifications are advantageous due to the strength of the newly formed bond but are inconvenient for their financial and material expensiveness. There were also investigated the possibilities of ionic modifications, which are using electrostatic interactions, but which are not widely used—the reason being the weak ionic bond which leads to washing out of the modifier by polar solvents. Nevertheless, new substances were designed which should be more resistant against this issue due to their structure. These substances, containing the propargyl group, were tested in solid surfaces modification. This bachelor work demonstrates the usability of procedures designed for the preparation of such substances with the allylic group.

Keywords: permanent positive charges; click reaction; electrostatic binding; ionic modification; quaternary ammonium salts; solid surface modification