

**AZADIRACHTIN, A USEFUL ALTERNATIVE FOR CONTROLLING  
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**ALBANIA****ABSTRACT**

*Tuta absoluta* is the main pest affecting tomato plants, which cause a considerable damage with high population dynamic in low coastal area for Albania. Controlling those pests needs huge plant protection products. Using chemical compounds by the farmers does not guaranty a high level of control. The azadirachtin is nowadays one of the most important natural insecticides due to a secondary compound produced by the neem tree (*Azadirachta Indica* A. Juss.; Meliaceae). Using azadirachtin as a highly selective and environmentally-friendly insecticide and integrated it in the control measures of *Tuta absoluta* was an important step of our experiment. It acts as an antifeedant, repellent, insect growth regulator and induces sterility in insects by preventing oviposition and interrupting sperm production in males. The experimental scheme was divided into 4 variants with an area of 0.5 hectare. The flies counting and their monitoring into pheromone were performed on regular weekly basis intervals. The intervention with Neem Azal S/T 0.3% for controlling of *Tuta absoluta* is based on fly dynamic and is useful for light dynamic population. Azadirachtin is used when there are 30 adults in pheromone traps. The treatments are after 14 days is done the assessment of its effectiveness in fruits and leaves. The objective of the experiment was to determinate the proper time of intervention, with Neem Azal based on dynamic population monitored by sexual pheromones.

**Keywords:** *Tuta absoluta*, azadirachtin, pheromones, effectiveness, antifeedancy.