

**EFFECT OF SALICYLIC ACID AND
BENZOTHIADZOLE (BTH) ON CONTROL OF
TEA BLISTER BLIGHT**

A dissertation submitted to the
Faculty of Animal Science and Export Agriculture of
Uva Wellassa University
in partial fulfillment of the requirements for the award of the degree of
Bachelor of Science in Tea Technology and Value Addition

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2013

ABSTRACT

Blister blight caused by the obligate parasitic fungus *Exobasidium vexans* Masee is the most destructive foliar disease in tea which seriously affects the production by reducing quality and the quantity. Control of blister blight heavily depends on synthetic fungicides. Large- scale application of pesticides pollutes the environment and their residues can cause various health hazards to human beings. Therefore, use of low toxic or environmentally friendly chemical in disease control strategies is gaining importance. Elicitors of plant systemic resistance are such chemicals that can be integrated into blister blight disease management programmes.

The effect of 2, 1, 3-Benzothadiazole (BTH) and Salicylic acid against blister blight diseased caused by *E. vexans* Masee, was studied. TRI 2024, a susceptible cultivar to blister blight was treated with five treatments (1000 ppm Salicylic acid, 1000 ppm (BTH), 0.1% Copper hydroxide (Champ DP 37.5%), 0.05% Hexaconazole and untreated control) at seven day intervals for four weeks under field conditions. Blister blight severity was lower in fungicide treatments followed by the elicitor treatments. Germination of basidiospores was significantly inhibited by the all the chemicals at the above tested concentrations. Total polyphenol content was higher in both fungicide and elicitor treatments which may contribute to the less diseases severity. Thearubigin / Theaflavin ratio was more than 10 in all the treatments showing that there is no effect of these chemical on made tea quality. This study suggests the possibility of incorporating plant defense elicitors in blister blight disease management.

(Key words: *Exobasidium vexans*, Blister blight disease, Induce defense, Elicitors, Disease severity