



# Effect of PHYTOCEE® on Survivability of WSSV Challenged Shrimps

## OBJECTIVE

To evaluate the effect of PHYTOCEE® on survivability of white leg shrimp *Litopenaeus vannamei* challenged with white spot syndrome virus (WSSV).

## MATERIALS AND METHODS

The experimental shrimps were reared in pond (9.6\*40\*1.2 m) under standard rearing conditions. The shrimps were divided in to 4 groups having 210 shrimps per group distributed in three replicates in each group. G1 served as normal control and supplemented with basal Stay C (500 g/ton), G2 served as positive control, and supplemented with basal + top-up Stay C (500+1000 g/ton). G3, and G4 groups were supplemented with PHYTOCEE® at 100% replacement of top-up Stay C and 50% of top-up Stay C respectively. Shrimps in all group were challenged with WSSV by oral inoculation of Thai-1 strain. The duration of treatment was 42 days. The survivability assessment parameter viz. final mortality percentage of shrimp and median lethal time were evaluated.

## RESULTS

Effect of PHYTOCEE® on survival parameters of shrimps

Groups	Final Mortality (%)	Median Lethal Time (Hours)
G1-STC (500 g/ton)	50.000 ± 1.491	144
G2-STC (1500 g/ton)	63.333 ± 1.303	87
G3-STC + PHY (500+1000 g/ton)	43.333 ± 0.801	-
G4-STC + PHY (500+500 g/ton)	60.000 ± 1.387	90

Values are expressed as Mean ± SEM; n=3; p>0.05 based on one-way ANOVA; STC, Stay C; PHY, PHYTOCEE®

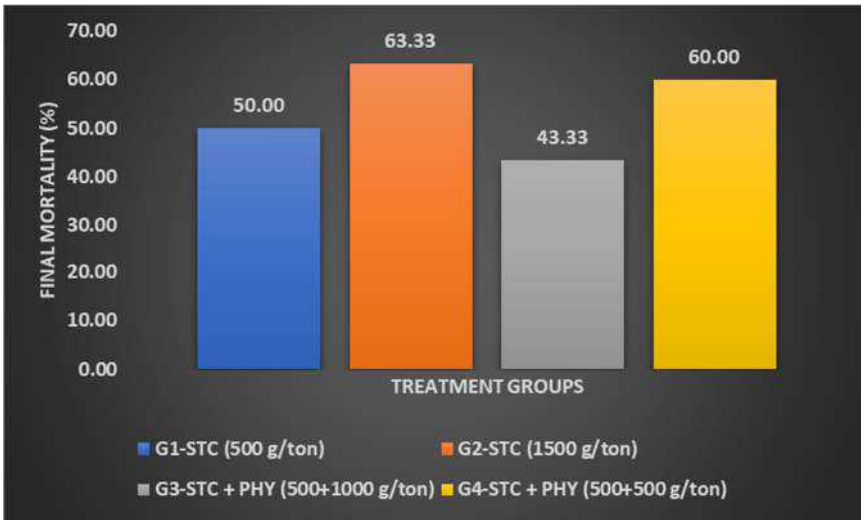


Figure : Effect of PHYTOCEE® on final mortality (%)

**CONCLUSIONS**  
100% replacement of top-up Stay C with PHYTOCEE® resulted in better survivability of shrimps challenged with WSSV.

**OUTCOME**  
Hence, supplementation of PHYTOCEE® (1000 g/ton) along with Stay C (500 g/ton) could be suggested for better survivability of shrimps infected with WSSV.