Validation Report: ELISA

PSA/SRA 46400 · Bean pod mottle virus (BPMV)



Test Characteristics

Capture Antibody Polyclonal (Rabbit) Test Name Bean pod mottle virus Catalog Number 46400 **Detection Antibody** Polyclonal (Rabbit)

Format DAS-ELISA Acronym BPMV Diluents GEB/ECI Genus Comovirus

Sample Dilution 1:10

Summary

This ELISA test is a qualitative serological assay for the detection of Bean pod mottle virus (BPMV) in bean leaves, soybean leaves and seeds, and beetles. BPMV is a member of the Comovirus genus known for their non-enveloped, icosahedral-shaped virus particles.

Diagnostic Sensitivity

Analytical Sensitivity

True Positives 38 Limit of Detection: 1:194,400 dilution of infected tissue (pathogen titer unknown)

Correct Diagnoses 38 Percent 100%

Analytical Specificity

Inclusivity:

This assay was designed to detect all strains and isolates of BPMV. Thirty-eight distinct samples of BPMV have been experimentally proven to be detected.

Exclusivity:

Cross-reacts With:

None known

Does Not Cross-react With:

Cowpea mosaic virus (CPMV) Soybean mosaic virus (SMV)

Diagnostic Specificity

True Negatives 31 Correct Diagnoses 31

Percent 100%

Selectivity:

No Matrix Effect Observed With:			
Bean leaves	Beetles	Soybean leaves	Soybean seeds



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