Detection of pathogen flavescence dorée phytoplasma in some grapevine varieties using ELISA test

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Flavescence dorée (FD) is an economically important quarantine disease of grapevine in Europe. It is caused by different strains of phytoplasma belonging to the 16S ribosomal group V. They are transmitted from one grapevine to another by Scaphoideus titanus, a leafhopper of american origin widespread in European vineyards. ELISA (with DAS-,TAS- and DAS- biotin variants) is the most used method both for diagnosis and studies regarding the sampling strategy for different viruses (detection of the most reliable source of antigen and period of the year in which the analyze is performed). The aim of this study was to identify the presence of FD in various varieties of vines from Ampelographic collection of USAMV Iasi. Propagation material of 30 grapevine varieties was tested for presence of Flavescence dorée phytoplasma. The test was performed on 30 grapevines varieties, only 6 showed infections with Grapevine Flavescence dorée phytoplasma, extinction values that exceed the blank value.