NAME OF THE ORGANISM: Tobacco etch virus (TEV000)

GENERAL INFORMATION ON THE PEST

Name as submitted in the project specification (if different to the preferred name):

Pest category:

Viruses and viroids **1- Identity of the pest/Level of taxonomic listing:**
Is the organism clearly a single taxonomic entity and can it be adequately distinguished from other entities of the same rank?

Yes
Is the pest defined at the species level or lower?:

Yes
Can listing of the pest at a taxonomic level higher than species be supported by scientific reasons or can species be identified within the taxonomic rank which are the (main) pests of concern?

* Not relevant: Vegetable propagating and planting material (other than seeds) sector

Is it justified that the pest is listed at a taxonomic rank below species level?

Not relevant
Conclusion:

* Candidate: Vegetable propagating and planting material (other than seeds) sector

**2 – Status in the EU:**

Is this pest already a quarantine pest for the whole EU?

No
Presence in the EU:

Yes
Conclusion:

candidate
Justification (if necessary):

The Tobacco etch virus is common in North and South America. It was reported from Canada, USA (inc. Hawaii), Mexico, Puerto Rico and Venezuela (Purcifull & Hiebert, 1982) and also Cyprus, France and Hungary (CABI, 2010).

HOST PLANT N°1: Capsicum annuum (CPSAN) for the Vegetable propagating and planting material (other than seeds) sector.

Origin of the listing:

RNQP Questionnaire
Plants for planting:

Plants intended for planting **3 - Is the pest already listed in a PM4 standard on the concerned host plant?**

No
Conclusion:

Evaluation continues **4 - Are the listed plants for planting the main\* pathway for the "pest/host/intended use" combination? (\*: significant compared to others):**

No
Conclusion:

Not candidate

Justification:

TEV is transmitted mechanically, and by several aphid species in a non-persistent manner. Symptoms in pepper include systemic mottling, dark green mosaic and distortion of leaves, distortion of fruit, and stunting however, resistant cultivars have been developed (Purcifull & Hiebert, 1982).
TEV also infects many perennial weed species that can act as virus reservoirs for susceptible agricultural crops. Its many aphid vectors (including Myzus persicae) are widespread, which makes it uncertain whether measures on transplants would have a significant effect on preventing infections in practice. Plants for planting are not considered to be a significant pathway. **CONCLUSION ON THE STATUS:**

Disqualified: Plants for planting are not considered to be a significant pathway due to the presence perennial weed species that can act as virus reservoirs for susceptible agricultural crops. A 'substantially free from' requirement would be sufficient. **8 - Tolerance level:**
Is there a need to change the Tolerance level:

No
Proposed Tolerance levels:

Not recommended for the RNQP status. **9 - Risk management measures:**
Is there a need to change the Risk management measure:

No
Proposed Risk management measure:

Not recommended for the RNQP status. **REFERENCES:**

* CABI (2010) Distribution map for Tobacco etch virus. Distribution Maps of Plant Diseases 2010 No.October 2010 (Edition 1) Map No. 1094;
* Laird E F & DIckson R C (1963) Tobacco etch virus and potato virus Y in pepper, their host plants and insect vectors in southern California. Phytopathology 53, pp.48-52;
* John F, Murphy and Tolulope Morawo (2017) Comparative Evaluation of Disease Induced by Three Strains of Tobacco etch virus in Capsicum annuum L. Plant Disease 101, 217-223;
* Purcifull D E & Hiebert E (1982) Descriptions of Plant Viruses. Tobacco etch virus. DPV 258 (revised version of DPV 55). Association of Applied Biologists. Available at <http://www.dpvweb.net/dpv/showdpv.php?dpvno=258>;