

CURRICULUM VITÆ



1– **Full Name:** Imad Daoud Ismail.

2– **Personal Data:**

- **Place and Date of Birth:** Al-Mozerah (Lattakia), 1/1/1956.
- **Nationality:** Syrian.
- **Languages:** English, Arabic.

3– **Scientific Qualification:**

- MCS in Agriculture, Faculty of Agriculture, Tishreen University, Lattakia, SYRIA (1981).
- PhD. in Plant Viral Diseases, Glasgow University, UK, (1988), Thesis title: Studies on a *Nicotiana* hybrid infected with a plant rhabdovirus.

4– a: **Scientific Title:** Professor.

b: **Present Occupation:** Teaching, Researching and Supervising Post Graduate Students .

4– **Experiences:**

a–**Experiences in Teaching and Training:**

1– **Teaching Experiences:**

- **Teaching in Tishreen University–Syria:**
 1. **Advanced Phytopathology (Viruses, Theoretical & Practical),** post-graduate student, Department of Plant Protection.
 2. **Bacterial and viral Diseases, (Theoretical & Practical),** 3rd year Student, Department of Plant Protection.
 3. **Diagnosis and Control of Plant Diseases:, (Theoretical & Practical),** 5th year Student,

Department of Plant Protection.

4. General Phytopathology, (Viruses, Theoretical & Practical), 3rd year Student, General Department.
 5. General Phytopathology, (Viruses, Theoretical & Practical), 4th year Student, General Department.
 6. Diseases of Vegetable and Oriental Plants, (Viruses, Theoretical & Practical), 5th year Student, Department of Plant Protection.
 7. Supervision of Graduate Research Student (Diploma and 5th year Student), Department of Plant Protection.
 8. Supervision of several Master and Doctorate thesis in plant viral diseases.
- Teaching in Botany Department, Faculty of Sciences, Sebha University–
Libya:
 1. Phytopathology and Plant Quarantine, (Theoretical & Practical).
 2. Principles of Plant Virology, (Theoretical & Practical).
 3. Plant Anatomy (Practical).
 4. Supervision of Graduate Research Student (Final term Students)

2– as a trainee:

1. Training scientific staff in “Seed potato production by tissue culture techniques, and the importance of potato viral diseases”. Organized by FAO and General Organization for Seed Multiplication GOSM, 24–28/11/2001, Aleppo, Syria.
 2. “Training potato farmers in seed potato production”. Organized by FAO and GOSM, 27–28/5/2002, Aleppo, Syria.
 3. “Training specialist and scientific staff in modern techniques of seed potato production”. Organized by FAO and GOSM, 2–6/6/2002, Aleppo, Syria.
 4. Training agricultural engineers in Lattakia and Tartous Provinces in viral diseases of Citrus Trees, TYLCV, and AFLV (*Apple flat limb virus*).
 5. Training some scientific staff in GOSM about viral diseases of potato, and training the scientific staff in GOT about viral diseases of tobacco in Lattakia, Edlib, and Darah.
- 6– Lecturing about: 1– “Viral diseases of potato in Syria”. Agricultural Research Center, Tal Amarah, Boukaa, Lebanon. 2– “Integrated management of tomato viral diseases

under green houses”. Organized by FAO and Rearing Natural Enemies Center in Lattakia during 2006 –2007. 3– “Integrated management of tomato viral diseases under green houses”. General Commission for Agricultural Scientific Research in Tartous Province.

b– Papers and Scientific Research.

- 1) Akel, E. Imad D Ismail, (2017). Distribution of *Citrus tristeza virus* in Syrian Coast. **Syrian Journal of Agricultural Research** 4(2): 160–170
- 2) Akel, E.H., I.D. Ismail, S. Al-Chaabbi and S. Fuentes. (2010). Evaluation of the Health Status of Sweet Potato in Relation to Infection with Some Viruses along the Coastal Region of Syria. *Arab Journal of Plant Protection*, 28: 33–37.
- 3) Akel, E.H., R. Hamdan, A. El-Khatib and I.D. Ismail. (2019). Indexing of three *Citrus tristeza virus* isolates from the coastal region of Syria. **Arab Journal of Plant Protection**, 37(1): 11–21.
- 4) Akel, E.H.; Darweesh, Y.; Ismail, I.D. and Al-Chaabbi, S. (2009): Comparison between the indicator plants *Ipomoea setosae* and *I. nil* for diagnoses of Sweet potato feathery mottle virus. *Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series*. 31(4)–209–..
- 5) Akel, E.H.; Ismail, I.D. and Al-Chaabbi, S. (2008): Identification of some *sweet potato feathery mottle potyvirus* isolates by using differential indicator plants. *Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series*. 30(4):59.
- 6) Akel, E.H.; Ismail, I.D.; Al-Chaabbi, S.; (2010): New natural weed hosts of Sweet potato feathery mottle virus in Syria. *Arab Journal of Plant Protection*, 28(1):100.
- 7) Akel, E.H.; Ismail, I.D.; Al-Chaabbi, S.; and Fuentes, S. (2010): Evaluation of the health status of sweet potato in relation to infection with some viruses along the Coastal region of Syria. *Arab Journal of Plant Protection*, 28(1):33.
- 8) Akel, E.H.; Ismail, I.D.; Al-Chaabbi, S.; Shadi Sonkari Yousef Abo Ahmad, (2014): Production of polyclonal antiserum for a Syrian isolate of Sweet potato feathery mottle virus (SPFMV). *Arab Journal of Plant Protection*, 32(3):260–265
- 9) Akel, E.H.; Al-Rhayeh Qusayi, Ali Nadin, Imad D Ismail, (2019). First report of a mixed infection with *Tomato yellow leaf curl virus* TYLCV and *Tomato spotted wilt virus* TSWV in some economic crops in the Syrian coastal region. **Canadian journal of Pesticides & Pest**

Management, P. 37–45

- 10) Al Shami Ramez M, **Imad D. Ismail** (2013) **The Effect of Potato Y Virus and Cucumber Mosaic Virus on the Growth of Tomato in Greenhouse. Tishreen University Journal for Research and Scientific Studies – Biological Sciences Series Vol. (35) No. (2). P 157–170.**
- 11) Al Shami Ramez M, **Imad D. Ismail** Yaser Hammad (2017), Effect of Three Species of Rhizobacteria (PGPR) in stimulating systemic resistance on tomato Plants against Cucumber mosaic virus (CMV). **International Journal of Agriculture & Environmental Science (SSRG–IJAES). ISSN; 2394–2568. WW.internationaljournalsrrg.org Page 11**
- 12) Al Shami Ramez M, **Imad D. Ismail** Yaser Hammad (2017), Effect of Rhizobacteria (PGPR) in reducing infection with *Cucumber mosaic virus* and stimulating resistance in tomato plants, **The Arab Center for the Studies of Arid Zones and Dry Lands (ACSAD) The Arab Journal for Arid Environmental–ISSN 2305–5243**
- 13) Al Shami Ramez M, **Imad D. Ismail** Yaser Hammad (2018), Effect of Three Species of Rhizobacteria (PGPR) in of Stimulating Systemic Resistance Against Cucumber Mosaic Virus (CMV) of Tomato Plants. **Syrian Journal of Agricultural Research 5(4); 227–239**
- 14) Al shami Ramez M. **Imad D. Ismail**. Yaser A. Hammad (2017). Evaluation the Effectiveness the Inoculation with Plant Growth Promoting Rhizobacteria on Reduction of Virus Effect for Cucumber Mosaic Virus on Some Growth Parameters Tomato Plants .**Al baath University Journal 39(22) –83–103.**
- 15) Al Shami, R.M., **I.D. Ismail** and Y. Hammad. (2017). Effect of some Rhizobacteria species on phenol contents and photosynthesis pigments in tomato plants inoculated with Cucumber mosaic virus (CMV). **Arab Journal of Plant Protection, 35(3): 139–144.**
- 16) Al–Agourya Hala· **Imad D Ismail**· Badea Samra· and Fahd Soheoni (2021), The effect of *Cucumber mosaic virus* infection on the light pigments of pepper plants hybrids (*Capsicum annum* L) in Lattakia governorate. **Syrian Journal of Agricultural Research 8(3)** in press.
- 17) Al–Ajourya, H.A., **I.D. Ismail** and B.M. Samra. (2016). Effect of time of inoculation with *Cucumber mosaic virus* on plant height and specifications of pepper fruits under field conditions in Lattakia, Syria. **Arab Journal of Plant Protection, 34(1): 23–29.**
- 18) Al–Jabr, K.; **Ismail, I.D.** and Al–Chaabi, S. (2010): Serological characterization of some Syrian *Apple chlorotic leaf spot virus*. **Arab Journal of Plant Protection, 28(1):20.**
- 19) Al–Jabr, Kh., **Ismail, I. D.**, and Al–Chaabi, S., (2008): Survey of *Apple Chlorotic Leaf Spot*

- Trichovirus* on Stone and Pomes Fruits in Syria. ***Arab Journal of Plant Protection***.26(1):27.
- 20) Al-Jallad, R, Kumari, S. G., and **Ismail, I. D.**, (2007): Integrated Management of Aphid-transmitted Faba Bean Viruses in the Coastal Area of Syria. ***Arab Journal of Plant Protection***.25(2):175.
- 21) Chami, R.M. and **I.D. Ismail**. (2014). The effect of single and mixed infections of *Potato virus Y* and *Cucumber mosaic virus* on yield components of tomato plants. ***Arab Journal of Plant Protection***, 32(2): 119–124.
- 22) Ekzayez, A.M.; Kumari, S. G.; and **Ismail, I. D.** (2011): First report of wheat dwarf virus and its vector (*Psammotettix pravnialis*) affecting wheat and barley in Syria. ***Plant Diseases***, 95(1):76.2.
- 23) Gasal, I. S and **Ismail, I. D.** (2007): Survey of fungal and viral diseases of banana grown under plastic houses in the Syrian coast region. ***Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series***, 29(4): 71.
- 24) Halabi Mohamad Hussam. Ensaf Akel. and **Imad D. Ismail** (2014). Survey of Tomato Spotted Wilt Tospovirus on Solanaceous Crops and Associated Weeds in Lattakia Province. ***Tishreen University Journal for Research and Scientific Studies – Biological Sciences Series Vol. (36) No. (4). P; 195–205.***
- 25) Halabi, M.H, **Imad D. Ismail** and Ensaf Akel (2014). First report of *Tomato spotted wilt virus* on Tobacco, Eggplant and some weeds in Syria. ***International Research Journal of Applied and Basic Sciences, Vol. 8(10): 1626–1627.***
- 26) Halawan, M., S.G. Kumari and **I. D. Ismail** (2013) Improve the efficiency of aphids to screen chickpea germplasm Bean leafroll virus (BLRV) and Beet western yellows virus (BWYV) resistance. ***Arab Journal of Plant Protection***, 31(3): 208–215.
- 27) Hamdan Rihab B., Georges M. Makhoul,. **Imad D. Ismail** (2014)Effect *Citrus trestiza virus* infection in Growth of Balady common orange and Satsuma trees grafted on sour orange... ***Tishreen University Journal for Research and Scientific Studies – Biological Sciences Series Vol. (36) No. (3) ;181–193***
- 28) Hamdan Rihab B., Georges M. Makhoul,. **Imad D. Ismail** (2014)Effect of *Citrus tristeza virus* infection on quality of Balady common orange and Satsuma fruits in Hraisoon, Syria, ***Arab Journal of Plant Protection***. 32(3): 254–259
- 29) Hamdan Rihab, Georges Makhoul and **Imad D. Ismail** (2013). Survey of infection by *Citrus tristeza virus* on citrus variety in Tartous governorate, Syria. ***Tishreen University Journal for***

- Research and Scientific Studies – Biological Sciences Series Vol. (35) No. (3). 101–109.**
- 30) Hamdan, R., **I.D. Ismail** and G. Makhoul. (2015). Effect of *Citrus tristeza virus* infection on growth of Balady common orange and Satsuma trees in Al–Thawraa, **Syria. Arab Journal of Plant Protection, 33(1): 36–42.**
- 31) Hasan, Z.M., **I.D. Ismail** and S.M. Al–Chaabi (2013). Occurrence of *Tomato yellow leaf curl virus* in the Syrian coastal area and serological characterization of selected isolates. **Arab Journal of Plant Protection, 31(1): 21–28.**
- 32) **Ismail Imad D.** Yaser Hammad, Ramez M. Al Sham (2017) The Effect of Some Spices of Plant Growth Promoting Rhizobacteria (PGPR) on Disease Severity and Reduction of Virus Infection of *Cucumber mosaic virus* (CMV) on Tomato Plant under Greenhouse Conditions . **Tishreen University Journal for Research and Scientific Studies – Biological Sciences Series Vol. (93) No. (9) 7102**
- 33) **Ismail Imad D.**, Badea M. Samra and Hala A. Al–ajouria (2015). Effect Of Infection Time By Cucumber Mosaic Virus In Growth And Production Pepper Field Agriculture In Lattakia Province. **Tishreen University Journal for Research and Scientific Studies – Biological Sciences Series Vol. (37) No. (3); 385–395.**
- 34) **Ismail Imad D.**, Omar Hamudi, Ahmad Ahmad and Hanan Kawas (2016). Effect of treatment of the tomato seeds with strains of PGPR for inducing systemic resistance against cucumber mosaic virus in green house. **Tishreen University Journal for Research and Scientific Studies – Biological Sciences Series Vol. (38) No. (50); 65–79.**
- 35) **Ismail Imad D.** and Nora Abbas (2014). Survey of chickpea chlorotic stunt virus on Broad bean crop in Lattakia Province. **Tishreen University Journal for Research and Scientific Studies – Biological Sciences Series Vol. (36) No. (5). P. 79–85.**
- 36) **Ismail Imad D.** and Youla Darwish (2013). Survey of natural transmission of some viruses by cowpea seeds. **Tishreen University Journal for Research and Scientific Studies – Biological Sciences Series Vol. (35) No. (5). P 47–55.**
- 37) **Ismail, I. D.** and Milner, J.J. (1988) Isolation of defective interfering particles of *Sonchus yellow net virus* from chronically infected plants. **Journal of General Virology 69.999–1006.**
- 38) **Ismail, I. D.** (2000): Preliminary survey of virus diseases of some food legumes in Lattakia province. **Tishreen University Journal for Studies and Scientific Research, Biological**

- Sciences Series*. 22(10): 127.
- 39) **Ismail, I. D.** (2003): Survey of *Turnip mosaic potyvirus* in *Matthiola incana* plants with flower breaking symptoms. *Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series*. 25(13):139.
- 40) **Ismail, I. D.** (2010): Survey of some viral diseases on faba bean crop and associated weeds and the effect of mixed infection with broad bean mottle and cucumber mosaic viruses on seed transmission in some faba bean varieties. *Minia Journal of Agricultural Research and Development*. 30(2): 283.
- 41) **Ismail, I. D.** and Hasan, M.H.M. (1995): Survey of seed-borne viruses of faba bean in Sebha region, south Libya. *Journal of Sebha University; Pure & Applied Sciences, Part B* (2): 95.
- 42) **Ismail, I. D.**, Alkai, B. F., and Yousef, R. N., (2007): Survey of some pepper virus diseases in the central and coastal region of Syria *Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series* 29(2): 97.
- 43) **Ismail, I. D.**, Hassan, Z. (2007) Weeds Hosting *Faba Bean Necrotic Yellows Nanaviru* and *Bean Yellow Mosaic Potyvirus* in Faba Bean Fields and its Surroundings in Syrian Coastal Region. *Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series* 29(1): 77.
- 44) **Ismail, I. D.**, Kumari, S. G. and Al-Jallad, R. (2006): A survey for viruses causing yellowing and stunting symptoms affecting faba bean in Syria.. *Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series* 28(3): 167.
- 45) **Ismail, I. D.**, Mohamed, R. and Abaas, N. (2007): A preliminary survey of viral diseases tobacco varieties Virginia Vk51 and white burley Br21 in Syrian Coast Region. *Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series* 29(5): 111.
- 46) **Ismail, I. D.**, Mohamed, R. and Abaas, N. (2007): The Effect of The Time of Primary Infection With *Potato Y potyvirus* on The Production of Tobacco Varieties White Burley (Br21) and Virginia (Vk51) in The Syrian Coast. *Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series* 29(2): 85.
- 47) **Ismail, I. D.**, Omar, A. A. and Mobayed, W. (2007): The Effect of Time of Primary Infection With Local Isolate of PVY on The Yield of Some Potato Varieties and on PVY-Tuber Transmission. *Tishreen University Journal for Studies and Scientific Research,*

***Biological Sciences Series* 29(2): 107.**

- 48) **Ismail, I. D.**, Omar, A. A. and Mobayed, W., (2007): The effect of PVY borne in seeds of some potato varieties on their yield and PVY– tuber transmission rate. ***Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series, 29(4): 17.***
- 49) **Ismail, I. D.**, Raae, S. Y. (2004): Survey of potato virus Y strains in potato production fields–Lattakia province, Syria. ***Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series. 26(1): 151–.***
- 50) **Ismail, I. D.**, Raae, S.Y. and Akel, E. (2004): Survey of sweet potato viruses in the Syrian coastal region “Lattakia” using tissue blot immunobinding assay (TBIA). ***Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series. 26(1): 161.***
- 51) **Ismail, I. D.**, Raae, S.Y. and Akel, E. (2006): Diagnosis of sweet potato viruses using indicator plants and serological techniques. ***Research Journal of Tishreen University, Agricultural Science Series, 28(1): 161.***
- 52) **Ismail, I. D.**, Raae, S.Y. and Ali, E. (2004): The effect of potato virus Y (PVY) on seeds of some potato cultivars used in local plantation. ***Tishreen University Journal for Studies and Scientific Research, Agricultural Sciences Series. 26(1): 181.***
- 53) **Ismail, I. D.**; Alkai, B. and Yousef, R, (2008): Transmission of *cucumber mosaic cucumovirus* and *Alfalfa mosaic alfamovirus* via pepper seeds. ***Tishreen University Journal for Research and Scientific Studies, Biological Sciences Series. 30(1): 181.***
- 54) **Ismail, I. D.**; and Milner, J.J. (1988): Isolation of defective interfering particles of sonchus yellow net virus from chronically infected plants. ***Journal of General Virology. 69: 999–.***
- 55) **Ismail, I. D.**; and Younes, H.A. (2011): Interaction between broad bean mottle and cucumber mosaic viruses in faba bean plants and their effects on productivity and seed transmission rate. ***Journal of the Advances in Agricultural Research* (Faculty of Agriculture–Saba Basha, Alexandria University, Egypt): 16(1): 184.**
- 56) **Ismail, I. D.**; Baghdade, H.A. and Homah, E.A. (1995): Survey of viruses infecting tomato and cucumber plants in plastic houses in Sebha region, south Libya. ***Journal of Sebha University; Pure & Applied Sciences, Part B(2): 45.***
- 57) **Ismail, I. D.**; Hamilton, I.D.; Robertson, E. and Milner, J.J. (1987): Movement and intracellular location of sonchus yellow net virus within infected tobacco. ***Journal of General Virology, 68: 2429.***
- 58) **Ismail, I. D.**; Makkouk, K.M. and Mouhanna, A.M. (1996): Impact of *Broad bean wilt virus*,

Broad bean stain virus and *Bean yellow mosaic virus* on Faba bean yield and transmission rate in seeds. ***Tishreen University Journal for Studies and Scientific Research, Agricultural Sciences Series***, 18(4): 249.

- 59) **Ismail, I. D.**; Hamilton, I.D., Robertson, E., and Milner, J.J. (1987) Movement and intracellular location of Sonchos yellow net virus within infected *Nicotiana edwardsonii*. *Journal of General Virology* 68:2429–2438.
- 60) Kawas Hanan, Omar Hamudi, Ahmad Ahmad, **Imad D Ismail** (2018) Effect of Seed Treatments of Tomato Variety Merel with Four PGPR Bacterial Strains on Promoting Peroxidase Enzyme Activity and Growth Improvement. ***Syrian Journal of Agricultural Research*** ,5(1): 114–124.
- 61) Kawas, H., O. Hamudi, A. Ahmad, and **I.D. Ismail** (2017). Evaluation of four strains of plant growth promoting rhizobacter to induce systemic resistance against Cucumber mosaic virus in tomato plants under greenhouse. ***International Journal of Agriculture & Environmental Science (SSRG-IJAES) Volume 4, Issue 6,***
- 62) Kawas, H., A. Ahmed, O. Hammoudi and **I. Ismail**. (2017). Effect of four strains of plant growth promoting rhizobacter (PGPR) for peroxidase enzyme activity and growth of the tomato plants under greenhouse conditions. ***Arab Journal of Plant Protection***, 35(2): 58–66.
- 63) Kawas, H., O. Hamoudi, A. Ahmad and **I.D. Ismail**. (2017). Evaluation of efficacy of four bacterial strains of plant growth promoting rhizobacter to induce systemic resistance against *Cucumber mosaic virus* in tomato plants grown in the greenhouse. ***Arab Journal of Plant Protection***, 35(1): 6–15
- 64) kel, E.H., **I.D. Ismail**, Eshrak Ali Watfa Al Ibrahem (2012) **Detection and Distribution of some Tomato viruses inside green houses in Syrian costal.** ***Tishreen University Journal for Research and Scientific Studies Biological Sciences Series Vol. (34) No. (6): 63–75.***
- 65) Kumari, S. G.; **Ismail, I. D.**, and Al-Jallad, R. (2007): The effect of the seed treatment of faba bean with Thiamethoxam and Imidacloprid pesticides on the incidence reduction of Bean leaf roll luteovirus. ***Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series***. 29(1):171.
- 66) Kumari, S.G.; Makkouk, K.M. and **Ismail, I. D.** (1993): Survey of seed-borne viruses in lentil in Syria and their effects on lentil yield. ***Arab Journal of Plant Protection***. 11(1):

28.

- 67) Kumari, S.G.; Makkouk, K.M. and **Ismail, I. D.** (1994): Seed transmission and yield loss induced in lentil by Bean yellow mosaic potyvirus. **LENS Newsletter**, 21(1): 42.
- 68) Kumari, S.G.; Makkouk, K.M. and **Ismail, I. D.** (1996): Variation among virus isolates for two viruses affecting lentil: their effect on yield and seed transmissibility. **Arab Journal of Plant Protection**. 14(2) : 81.
- 69) Makhoul, G., and., **Ismail, I. D.**, (2008). Survey of flat limb phenomenon in apple orchards in Syrian Coastal heights. **Tishreen University Journal for Research and Scientific Studies, Biological Sciences Series**. 30(5): 9.
- 70) Moalla Mai. Ahmad Ahmad. Omar Hamoode, Imad D Ismail (2020). The effect of bacterial strain *Bacillus subtilis* FZB27 in improvement pepper plants growth in green house under infection with *Cucumber mosaic virus*. **Arab Journal of Plant Protection**. 38(2) In press.
- 71) Moalla, M., A. Ahmed, O. Hammoudi and **I.D. Ismail**. 2020. Effect of the bacterial strain *Bacillus subtilis* FZB27 in controlling *cucumber mosaic virus* (CMV) in pepper plants grown under greenhouse conditions. **Arab Journal of Plant Protection**, 38(2):In press
- 72) Mobayed, W., S. Ra'ai, S.G. Kumari and **I. D. Ismail**. (2013). Effectiveness of a number of management components in reducing spread of *Potato virus Y* in northern Syria. **Arab Journal of Plant Protection**, 31(1): 38–45.
- 73) Mohamad Yousef, **Imad D Ismail**, Khaled Farid Al-Janad (2020). Influence of Plant Density and *cucumber mosaic virus* Infection on the Productivity Traits of Beans *Vicia faba* L. **Syrian Journal of Agricultural Research**. 7(1);410–424.
- 74) Mohamad, R.; **Ismail, I. D.** and Abaas, N. (2008): The effect of the time of infection with potato Y potyvirus on chemical composition of tobacco cured leaves varieties white burley (Br21) and Virginia (Vk51) in the Syrian Coast. **Tishreen University Journal for Studies and Scientific Research, Biological Sciences Series** 30(1): 231.
- 75) Mouhanna, A.M.; Makkouk, K.M. and **Ismail, I. D.** (1994): Preliminary screening of lentil genotypes for resistance to Faba bean necrotic yellows virus. **LENS Newsletter**, 21(2): 41.
- 76) Mouhanna, A.M; Makkouk, K.M. and **Ismail, I. D.** (1994): Survey of virus diseases of wild and cultivated legumes in the coastal region of Syria. **Arab Journal of Plant Protection**. 12(1): 12.
- 77) Qawwas Hanan , Ahmad Ahmad , Omar Hmoudi , **Imad Ismail** (2017). Evaluation of Four Strains of Plant Growth Promoting Rhizobacter (PGPR) to Promote Plant Growth of Tomato

Plants under the Conditions of *Cucumber Mosaic Virus* Infection in Greenhouse. **Jordan Journal of Agricultural Sciences**. 13(3). 905–917

- 78) Raae, S.Y. and Ismail, I. D. (2000): The effect of *Tobacco mosaic virus* on some tomato varieties. **Arab Journal of Plant Protection**. 18(1): 51.
- 79) Samra Badeh. Imad D. Ismail and Maha Huije (2015). Effect of salicylic acid as a Systemic acquired Resistance on growth, and productivity of cucumber Plant in plastic greenhouse. **Tishreen University Journal for Research and Scientific Studies – Biological Sciences Series Vol. (37) No. (1). P 9–15.**
- 80) Samra, B., Ismail, I. D., and Ebrahim, D. (2004): Effect of changing conditions on motivating potato tubers to produce vegetative sprouts for rapid multiplication. **Tishreen University Journal for Studies and Scientific Research, Agricultural Science Series**. 26(1): 73.
- 81) Touchan, H., Ismail, I. D., El-Beski, F., and Shehawy, F. (2004): The effect of physiological age of potato tubers and harvest time on the rate of tubers yields. **Research Journal of Aleppo University, Agricultural Science Series**, No. 49: (Acceptance No. 237, dated 20/4/2004).
- 82) Yousuf, R.; Alkai, B.; Ismail, I. D. and Khalil, H. (2008): A laboratory study of some pepper varieties and genotypes response to sap inoculation with two local isolates of cucumber mosaic cucumovirus. **Tishreen University Journal for Research and Scientific Studies, Biological Sciences Series**. 30(4): 85.

Papers presented in conference.

- (1) Akel Ensaf, Imad D, Ismail, and Salem Raii (2006). First record of the Sweet potato feathery mottle virus and Cucumber mosaic virus in sweet potato (*Ipomoea batatas*) in Syria. **9Th Arab Congress of Plant Protection, Damascus–Syria 19–23 November.V56 Page.E–106**
- (2) Al-Jabor Kh., Imad D, Ismail and S, Al-Shaabi (2006). Survey of Apple chlorotic leaf spot virus on some stone and pome fruits in Syria. **9Th Arab Congress of Plant Protection, Damascus–Syria 19–23 November.V2 Page.E–84**
- (3) Al-Jallad Rna, Safaa G.Kumari and Imad D, Ismail (2006). Integrated management of Aphid-transmitted Faba bean viruses in the coastal area of Syria. **9Th Arab Congress of Plant Protection, Damascus–Syria 19–23 November.V39 Page E–99.**
- (4) Chamsin Fedaa, Taufik Naser, Imad D. Ismail, Maher Masre (2006). The field study of the effect of insecticide GAUCHO on aphid-infested tobacco plants. **9Th Arab Congress of Plant**

Protection, Damascus–Syria 19–23 November.P 21 Page.E–146.

- (5) Ibrahim Heyiam, Maher Masre and Imad D. Ismail (2006) Soil bio–sterilization using radish oil. **9th Arab Congress of Plant Protection, Damascus–Syria 19–23 November.N26 Page.E–118.**
- (6) Ismail, I. D. and Milner, J. J. (1987): Differential accumulation and control of expression of sonchus yellow net virus. *International Congress for Virology*. Canada. Abstract No. R33–1, P.224.
- (7) Kumari, S.G.; Makkouk, K.M. and Ismail, I. D. (1995): Seed–borne viruses of lentil in Syria; distribution, economic losses, detection, seed transmission rate and thermal treatment of seed as a control measure. **5th Arab Congress of Plant Protection**. Morocco.
- (8) Masre Maher, Fedaa Chamsin, Taufik Naser and Imad D. Ismail (2006). The effect of Potato virus Y, Cucumber mosaic virus and mixed infection on some tobacco varieties under laboratory conditions. **9th Arab Congress of Plant Protection, Damascus–Syria 19–23 November.V32 Page.E–96.**
- (9) Masre, M., Chamsin, F., Naser, T., and Ismail, I. D., (2007): The effect of potato Y potyvirus, Cucumber mosaic cucumovirus and mixed infection on some tobacco varieties under laboratory conditions. **9th Arab Congress of Plant Protection, (Poster)**. Syria.
- (10) Al–Jabor Khaldon, Imad D. Ismail, Salah Al–Chaabi (2009). Serological characterization of some Syrian isolates of *Apple chlorotic leaf spot virus*. **10th Arab Congress of Plant Protection, Beirut–Lebanon 26–30 October.V32 Page.E–78.**
- (11) Ekzayez Ahmad, Safaa G. Kumari, Nouran Attar and , Imad D. Ismail (2009). *Wheat dwarf virus* in Syria. **10th Arab Congress of Plant Protection, Beirut–Lebanon 26–30 October.V54 Page.E–93.**
- (12) Halawani Mosab, Safaa G. Kumari, Imad D. Ismail (2009). Development of simple method for screening Chickpea (*Cicer arietinum* L.) germplasm for resistance against viral diseases. **10th Arab Congress of Plant Protection, Beirut–Lebanon 26–30 October.R 13 Page.E–131.**

***Papers presented in work shop.**

- 1) A–17 DEVELOPMENT AND DISTRIBUTION OF GRAPEVINE FANLEAF VIRUS IN SOME GRAPE GROWING REGIONS IN SYRIA. Ensaf Hassan Akel , Nadine Ali , Nader Asaad and Imad D. Ismai.
- 2) A–18 A NEW VIRUS, TOMATO BROWN RUGOSE FRUIT VIRUS, POSSIBLY ATTACKS

TOMATOES GROWN UNDER GREEN HOUSES IN LATTAKIA. Imad D. Ismail , Ensaf H. Akel and Zeiad Hasan

- 3) A-43 TOLERANCE OF SOME CITRUS ROOTSTOCKS TO INFECTION WITH CITRUS TRISTEZA VIRUS . R. Hamdan , E. Akel , A. Alkhateb , Imad.D. Ismail and

c- Administration and Career:

● **Administration:**

1. Head of the plant protection department in the Faculty of Agriculture, (2005–2007).
2. Member in the “Committee of Scientific Research and Higher Studies” in the Higher Education Council, (2006–2007).
3. Member in the “committee of scientific employment affairs” in the Higher Education Council, (2005–2006).
4. Member in the Council of the Faculty of Agriculture (1989–1990 and 2005–2007).
5. Member in the Council of the Department of Plant Protection.

● **Career:**

1. Team leader for “planning and conductive experiments for production of local potato varieties” organized by Ministry of Agriculture 21/10/2001.
2. Member in “National project of seed potato production free of viruses”, GOSM, Aleppo, 1997–2005.
3. Member in Syrian–Lebanese committee for seed potato production free of virus. 2000–2005.
4. Committee member in planning “The principles of seed potato production in Syria” organized by GOSM and Ministry of Agriculture.