

PLANT ACHIEVES

Volume 19	Supplement 1	January – 2019
TITLE	AUTHOR	PAGE NO.
The effect of agricultural fertilizer iq combi and brassinolide hormone on some growth characteristics, yield and active compounds of <i>petroselinum hortense</i> plant	Omar Ali Luaibi Al-Maliki* and Maher Zaki Faisal Al Shammari	1 – 7
The efficiency of marine algae, local fresh water algae and gibberellic acid, and their interaction in some of the growth and yield characteristics and active compounds of the <i>Anethum graveolens</i> L. plant	Roa'a Muthna Dawood and Maher Zaki Faisal Al Shammari	8 – 17
The effect of the humic acid and brassinolide and their interaction on growth, yield and active compounds of <i>trigonella Foenum-graecum</i> L. plant	MaysamIhsan Ali Al-Hassany and Maher Zaki Faisal Al Shammari	18 – 23
Extraction and estimation of some polycyclic aromatic hydrocarbons from some vegetable oils	Luma Abdalalah Sagban Alabadi and Faiq F. Karam	24 – 30
Occurrence, identification, pathogenicity and control of <i>neoscytalidium dimidiatum</i> fungus, the causal agent of sooty canker on <i>Eucalyptus camaldulensis</i> in kerbala province of Iraq	Zeinab A. M. Al-Tememe, Adnan A. Lahuf, Rajaa G. Abdalmoohsin and Alaa T. Al-Amirry	31 – 38
Evaluation of effect of zno nano-particles and their integration with the biocontrol agent <i>tricoderma harzianum</i> for control of damping off disease caused by <i>Rhizoctonia solani</i> on tomato plants	Zainab L. Hameed and Baan M. Hassan	39 – 46
Possibility of the biocontrol of <i>Meloidogyne javanica</i> using the fungus <i>Trichoderma harzianum</i> under greenhouse condition	Yaser Albehadeli, Mojtaba Mamarabadi and Esmat MahdiKhani	47 – 51
The response of cowpea plant <i>Vigna unguiculata</i> L. when exposed it to amino acids and boron and the addition of phosphorus to soil in some vegetative and productive characteristics	Khaleel Burhan Abbas and Fouad Abbas Salman	52 – 60
The effect of daily of dark hours and the number of short daylight hours in the production of flowering potted plants (<i>Zinnia elegans</i> JAC)	Lo'ayAbd-Elhameed H. Al-Rawy and HaithamMuhi M.Al- Abdaly	61 – 66
The effect of silicon, tillage and the interaction between them on some antioxidants and phytohormones during drought stress of maize (<i>Zea mays</i> L.) plants	Evan Ibrahim Merhij, Wassan Mudher Abo Al Timmen and Ali Hussain Jasim	67 – 74
Effect of the infection of <i>Callosobruchus maculatus</i> (fab.) on the proximate composition of legumes grain	Sadek J.T. and MunaAbd Al-Wahed Banian	75 – 77
Role of additive in mitigation of the negative effects of saline water on cabbage (<i>Brassica oleracea</i> var. capitata L.)	Duraid K.A.Al-Taey; Abdsrab H. Al-Janabi and Ahmed M. Rachid	78 – 85
A comparative study among three species of aquatic plants in the ability of absorption and bio-accumulation of some heavy metals on euphrates river in al-ramadi city	ShirinYasin Bdewi, Mahmoud Mustafa Al-Mahdawi and Sufyan Mohammed Shrttooh	86 – 93
Response of some traits of potato (<i>Solanum tuberosum</i> L.) to the addition of the ground palm remnants compost	Abbas Khdhair Mijwel, Adilnaser Abed Al-redha and Tarif Hashim Bresim	94 – 97
Evaluation of the effect of camel milk with or without the aqueous extract of the <i>Peganum harmala</i> plant in the treatment of <i>Entamoeba histolytica</i>	Enas Abdul Kareem Jabbar, Bassad A. AL-Aboody, Nihad H. Mutlag and Ahmed S. Abdulhadi	98 – 101
Chemical study in leaf and fruit of some species for <i>populus</i> and <i>salix</i> in diwaniyah governorate using gas chromatography-mass spectrometry(gc-ms)	Zainab Allaway Woshayih Hassan AL-Saadiy and Azhar Abd AL-Amer Susa	102 – 111
Response of several genotypes of maize (<i>Zea mays</i> L.) to organic fertilizer (humic acid)	Muhanad Hikmat Sharif and Omar Hazem AL-Rawi	112 – 117
Phytochemistry and therapeutic uses of <i>Cardaria draba</i> L. : A review	Estabraq H. Naser, Mohammed F. Abo Khthar and Salam A. Abed	118 – 125
Improving the nutritive value of common reed and rice straw by treatment with <i>Pleurotus ostreatus</i>	Anmar A. Majeed Al-Wazeer, Aqeel Yousif Alshukri and Kamel Abbas Kathem	126 – 130
Impact of water mixing areas in qualitative variations of phytoplankton algae and some physiochemical characteristics of water on a section of Tigris river, Iraq	Buthaina Abdul- Aziz Hassan, Thaier Mohamed Ibrahim, Ibrahim Mahdi AL-Salman	131 – 138
Removal of leishman's stain from aqueous solution by using natural Nile rose plant (<i>Eichhornia crassipes</i>)	Maysam AlaaBaiee, Saif Qahtan Salman, and Zeena AbdulelahAbd Ali	139 – 141

Study of certified wheat (<i>Triticum aestivum</i> L.) cultivars response to different planting dates	Ali Muaid Shaker, Mizel Mahdi Salih and Al-Salim, Salih H.F.	142 – 145
Role of rhizobia (<i>Rhizobium meliloti</i>) of alfalfa in the bioremediation of contaminated soil with hydrocarbons	Hanan Abdul Qader Abdulilah, Edham Ali Abed Al-Asafi and Ashwaq Talib Hameed	146 – 152
New record of species <i>Stephanitis hoberlandti</i> hoberlandt 2000 in Baghdad province	Haneen Sabah Hussein and Awatif Abdul-Fatah Hamodi	153 – 155
Effectiveness of some plant extracts against the biofilm of <i>Pseudomonas aeruginosa</i> bacteria isolated from burns	Wassan Rodha Hassan Al-Shakarje and Hyiam Abdalrodha Al-Awad	156 – 159
Effect of hesperidin added to the diet in physiological traits and sex hormones of males and domestic chickens	Saad Attallah Abdal Sada	160 – 164
Effect of heavy metal stress on growth characters and enzymes activity in <i>Zea mays</i> L. plant	Intedhar Abbas Marhoon and Khitam Abbas Marhoon	165 – 168
The effect of foliar fertilization and root stimulate at growth of olive's (<i>Olea europaea</i> L.) saplings (Nabali and Ashraci)	Ammar Y. Kadhom Azawi and Auasama Y. SalihMajeed	169 – 175
The growth and yield response of five potato varieties (<i>Solanum tuberosum</i> L.)	Al-Fayadh Dia Zaeim and Al-Zubaidi Ali Hassen	176 – 179
Interaction between Cd and K on plant hormones concentrations of tomato (<i>Lycopersicon esculentum</i> L.) leaves	Rihab Edan Kahdim	180 – 184
Effect of green tea extracts (<i>Camellia sinensis</i>) on alcoholic-induced liver disease in rabbits	Shihab A. Al-Bajari	185 – 191
Effect of weed control treatments on the growth, yield and quality of three cultivars of maize (<i>Zea mays</i> L.)	Ali Fadhil Salih Al-Rawi and Abdul-Lateef Mahmood Al-Kaisy	192 – 202
Combine harvester header losses as affected by reel and cutting indices	Almosawi, Abdulaziz, A.	203 – 207
Insecticidal effect of three essential oils loaded on nano against <i>Tribolium castaneum</i> (coleoptera: tenbrionidea)	Rasha Abdulrazaq Jwad; Fadhl Abd Alhussain Khalil and Hadi Mizael Al Rubaiee	208 – 213
Some effects of treated waste water of hilla textile factory on four species of cultivated plants	Shaymaa O.H. Al-Mamoori and Batool Mohammed Hassan AL-Adily	214 – 216
Molecular typing of <i>malassezia</i> species by RFLP-PCR and evaluate antifungal activities of some plant extracts	Saafa Abaas Abd.Al-Kahdum, Zaidan Khlaif Imran and Hadi Meziel Khdhier	217 – 221
Bacterial profile in patients with diabetic foot infections and its association with TNF- α	Rasha Hadi Saleh and Bara Hamid Hadi	222 – 228
Evaluation of salicylic acid solution on fungus <i>Botrytis cinerea</i> that caused strawberry gray mold	Dina Yousif and Mohammed Yousif	229 – 238
Calendar of treatment fungal antibiotic, pharmaceutical and alcoholic extract of propolis on some fungi that cause tinea capitis in children	Athraa H. Mohsen	239 – 245
Response of some broad bean (<i>Vicia faba</i> L.) varieties to bio and chemical fertilization on seed yield	Dalia Salman Khudair and Ali Hussein Jasim	246 – 251
Response of two oat (<i>Avena sativa</i> L.) genotypes to ascorbic and salicylic acids spraying and their interactions with silicon spray	Sabreen H.A. Al-Rubaiee, Ali Hussein Jassim and Taha Y. Al-Edany	252 – 259
Water quality monitoring of Al-Gharraf river southern of Iraq by using GIS mapping based water quality parameters	WisamThamerJabbar Al-Mayah, Salman Rasool Salman, MadiWamey Alaidi and Shaheen Mohamed Al-Hirmizy	260 – 267
Reducing the Heart Biochemical and Histological effect of doxorubicin by artemisinin compound	Qassim. M. Hashym, Jinan M. Abed Al-Zahra and Naser J. Kadhim	268 – 271
Removing heavy metals by diatoms <i>Nitzschia palea</i> and <i>Navicula incerta</i> in their aqueous solutions	Duaa Oday Al-Quraishi and lthar Kamil Abbas	272 – 278
The effect of substitution broken rice (<i>Oryza sativa</i>) for the yellow corn (<i>Zea mays</i>) on the performance of broiler Ross 308	Tariq S. Almrsmi, Aqeel Y. AlShukri and Ammar H. Areaaer	279 – 283
Effect of lead metal stress on antioxidant genes expression in leaves of sunflower (<i>Helianthus annuus</i> L. cv. aqmar) plants	Kamil M. AL-Jobori, Athar K. Kadhim and Amran M. AL-Erjan	284 – 292
Study of the effect of aqueous extract of (ginger) <i>Zingiber officinale rosco</i> in the histological structure of prostate gland of white male rabbits <i>Oryctolagus cuniculus</i>	Ensaf Saleh Abar and Jabbar Abadi Alaridhi	293 – 298
Toxico pathological study of copper sulfate modulate by zinc oxide and <i>Coriandrum sativum</i> plant treatment in mice	Eman Hashimyousif, Hashim M. Obaid, Abdulkarim Jafar Karim, Muna Sachit Hashim and Rajiha A. Al.Naimi	299 – 308

Impact of integrated plant nutrient management systems on soil physical properties and productivity enhancement in maize (<i>Zea mays</i> L.)	P. Sudhakar, V. Sakthivel, S. Manimaran, G. Baradhan and S.M. Suresh Kumar	309 – 313
Studies on influence of activated Em enriched composts on productivity enhancement in hybrid maize (<i>Zea mays</i> L.)	S. Manimaran, M. Saravanan, P. Sudhakar, G. Bardhan and S. M. Suresh Kumar	314 – 317
Efficiency of SSR markers system in accessing genetic variation for rice (<i>Oryza sativa</i> L.) genotypes	Balqees H. AL- Musawi , Nidhal Abd H. AL-Badeiry and Mohammed A.AL-Anbari	318 – 325
Utilizing waste materials procurement for adsorption of chromium onto bio-matrix from rice husk to minimize water contamination	Aakriti Verma, Kalpana Singh and Kushagra Rajendra	326 – 332
Changes in soil organic carbon concentration in tropical rainfed croplands : effect of changes in land use pattern and application of various soil amendments	Shriya Mehrotra and Nandita Ghoshal	333 – 338
Effect of bio- and chemical fertilizers on green pods yield of some broad bean cultivars	Dalia Salman Khudair and Ali Hussein Jasim	339 – 343
The role of priming technique with salicylic acid in the viability of melon (<i>Cucumis melo</i> L.) seeds stored for two years	Hussein J. Hussein	344 – 349
Cytotoxic, antioxidant and antibacterial activities of crude extract of <i>syzygium aromaticum</i> plant	Nehia N. Hussein, Raghad K. Maeah, Zahraa A. Sharba, Buthenia Aasoon, Ghassan M. Sulaiman, Ayad A., Ali A. Taha and Kareem H. Jwad	350 – 355
Evaluation of soil suitability for wheat using Kriging and remote sensing data	Teeba M Mubarakah and Aurass Muhi Taha AL Waeli	356 – 363
Studies on graded dose of NPK with different granular organic manures on growth attributes of lowland rice	G. Baradhan, S.M. Suresh Kumar, A. Muthumazharasi, S. Manimaran and P. Sudhakar	364 – 367
Influence of different granular organic manures with inorganic fertilizers for increasing the yield of hybrid maize (<i>Zea mays</i> L.)	S.M. Suresh Kumar, G. Baradhan, V. Saravanan, P. Sudhakar and S. Manimaran	368 – 371
Standardization of chemical seed priming treatment to improve seed quality in Maize cv CO 1	G. Sathiya Narayanan, G. Suvarna, G. Baradhan and B. Sunil Kumar	372 – 376
Effect of various seed halo-priming treatments on seed yield and quality in maize	G. Sathiya Narayanan, G. Suvarna, G. Baradhan and M. Prakash	377 – 383
Effect of dietary <i>Lentinus edodes</i> on the erythrocyte and leucocyte count of male albino wistar rats	C. Kannan	384 – 386
Growth of some oil yielding crops under moisture stress effect	Raghad M. Mirry	387 – 391
The morphological characters of growth swamp morning glory with distant from level water and effect on growth of common reed	AbbassMhson Salman Al- Hmadawi, Rasha AbdulrazzakJawad Al-Taie, Zainab RehmanJassim AL- Malikshah and Afrah Abdul Hussein Ibrahim	392 – 396
Phytochemical analysis of ethanolic extracts of leaves of some selected medicinal plants used by tribal community of Sangla valley, district Kinnaur, Himachal Pradesh	Radha and Sunil Puri	397 – 403
Effect of foliar spray with potassium humate and green tea extract on some of the vegetative characteristics of guava (<i>Psidium guajava</i> L. cv. local) seedlings	Majid Abdulhameed Ibrahim and Eman Abdulali Al-Sereh	404 – 408
Certain studies on the management of <i>P. aphanidermatum</i> causing rhizome rot of turmeric by using fungicides and bio inoculants	M. ThamaraiSelvi, L. Darwin Christdhas Henry and L. Vengadesh	409 – 412
Genetic evaluation of Indian mustard (<i>Brassica juncea</i> L.) genotypes for yield and quality parameters	M. Swetha, Harmeet Singh Janeja, Harmanpreet Singh, M. Sravani, K. Rajaneesh and A. H. Madakemohekar	413 – 417
Assessment of wild medicinal plant used by migratory shepherds in alpine area of Rakchham-Chitkul wild life sanctuary of district Kinnaur in Himachal Pradesh	Radha and Sunil Puri	418 – 429
Role of defense enzyme induced by the ecofriendly components against sheath blight (<i>Rhizoctonia solani</i>) kuhn and sheath rot (<i>Sarocladium oryzae</i>) sawada games	D.E. Kavi Newton and D. John Christopher	430 – 434
Effect of foliar concoction on growth, yield and quality of jasmine (<i>Jasminum sambac</i> ait.)	P. Sowmiya and P. Karuppaiah	435 – 440

Influence of integrated nutrient management practices on growth and yield of Rice–Greengram cropping system	G.B. Sudhagar Rao, G. Baradhan, S.M. Sureshkumar, R. Rex Immanuel and S. Ramesh	441 – 443
Physiological responses of multipurpose tree seedlings to induced water stress	Rex Immanuel, R., M. Ganapathy, M. Thiruppathi, G.B. Sudhagar Rao and J. Nambi	444 – 447
Generation mean analysis for yield and component traits in tomato (<i>Lycopersicon esculentum</i> Mill.)	R. Ebenezer Babu Rajan, C. Praveen Sampath Kumar, J.L. Joshi and Ajish Muraleedharan	448 – 451
The reasons related to the stop of farmers to adopt the technique of plastic houses in Diwaniyah province of Iraq	RanaSadeq Al-Fatlaw and HussainKhudair Al Taiy	452 – 457
Effect of different doses of nitrogen on growth and yield of chickpea (<i>Cicer arietinum</i>)	Puyam Binita Devi, Mayur S. Darvhankar, Ajeet Prakash and Diptanu Banik	458 – 460
Effect of different control methods on <i>Cuscuta campestris</i> , and growth and productivity of eggplant (<i>Solanum melongena</i>)	Bashar K.H. Al-Gburi, Fadhil H. Al-Sahaf, Fadhil A. Al-fadhal, Akeel E. Mohammed and Juan P.Del-Monte	461 – 469
Effect of certain plant products against <i>Macrophomina phaseolina</i> (Tassi) gold. causing dry root rot in sunflower	L. Darwin Christdhas Henry, M. ThamaraiSelvi and R. Sutha Raja Kumar	470 – 472
Effect of use of different levels of caraway seed (<i>Carum carvi</i> L.) powder on some physiological characteristics of Japanese quail	D.K. Seger, Khalid C.K Al-Salhi and Hatim A.J. AL-Shwilly	473 – 476
Survey of ethnomedicinal plants used by migratory shepherds in Shimla district of Himachal Pradesh	Radha and Sunil Puri	477 – 482
Determination of antioxidant activity, total phenolic content in different parts of medicinal fern, <i>Blenchum orientale</i>	Hind S. Jasim, Muhaned Mohammed Eteya and Ibtihaj Ahmed kadhim	483–489
Study of the effects of the <i>aloe vera</i> gel on soft tissue injury regeneration: an experimental study on rabbits	Sena a Malik Hussein	490–495
Sustenance of soil microbial biomass, the basis of soil fertility in the agro-ecosystems: influence of pesticide and soil amendments	Pratibha Singh and Sheo Mohan Prasad	496 – 507
Effect of osmo priming seed treatments on seed quality in certain minor millets	D.S. Balaji and G. Sathiya Narayanan	508 – 514
Chemical constituents, antimicrobial potential and antioxidant efficacy of essential oil from <i>Boesenbergia pulcherrima</i> (wall.) kuntze	Santoshkumar D. Byahatti and Devarajan Thangadurai	515 – 521
Identification of essential oil components from <i>amomum</i> species using GC-MS analysis	Santoshkumar D. Byahatti and Devarajan Thangadurai	522 – 525
Response of sunflower to integrated nutrient and weed management practices on weeds, growth and yield, quality and nutrient uptake	Kalaiyaran, C., V. Vaiyapuri, K.Suseendran and S.Jawahar	526 – 533
Effect of organic fertilizer and mycorrhiza fungi on some physical and chemical properties of soils	AlaaRaheemAtea and Falah Hasan Issa	534 – 537
Effect of atorvastatin against new castle disease virus in chicken embryo fibroblast cells	HayderAbd Al emeerZballa Almremdhly and Emad Jawad Khamas	538 – 544
The effect of storage period and heat exposure of hatching eggs before or during storing on the hatching characteristics of hatching eggs of broiler breeder (Ross 308)	Ammar H. Areaaer and Basil M. Ibrahim	545 – 551
Nano fertilizers and optimum crop productivity : A review	Ali JasimHadi AL-Tameemi, Yousif Ahmad Mahmood AL-Aloosy and Sinan Sameer Jumaa	552 – 554
The effect of planting dates and the levels of npk fertilizers on some vegetative and fruits characters of fennel <i>Foeniculum vulgare</i> L.	Noura S. M. albukhder and Shaimaa I.M. Al-Refai	555 – 561
Effects of supplementation <i>cinnamon cassia</i> and <i>Zingiber officinale</i> powder on reproductive performance of broiler breeder male	Ammar Qahtanshanoon Mohammed and Abdulrahem Mohammed Qana H Amin	562 – 567
Effects of climate factors on radioactive contamination of heavy elements	Ibtihaj Ahmed Kadhim	568 – 574
Effect of treating seed with different levels of salicylic acid in soil tolerance to salinity stress for different cultivars of wheat crop (<i>Triticum aestivum</i> L).	Saba A. Al-Zubaidi, Basim Hassan Khudair, Mustafa Jawad Neamah, Hussein Ali K. Al-Hasnawi and Hakim Razak Zagi	575 – 579

Effect of shade net, phosphorus fertilizer and banana pseudostem sap on nutrient uptake of fenugreek	N.B. Misal, R.G. Patil and Krittika	580 – 584
Studies on the cultural characters and pathogenicity studies of brown leaf spot of rice caused by <i>Helminthosporium oryzae</i> (syn: <i>Bipolaris oryzae</i>)	Jaiganesh V. and Kannan C.	585 – 587
Effect of certain macro-micro nutrients on <i>Helminthosporium oryzae</i> brenda de haan	Jaiganesh, V. and Kannan C.	588 – 592
Response of gerbera flowers to different chemicals used for increasing the vase life	Ajish Muraleedharan, K. Sha, R. Ebenezer Babu Rajan, C. Praveen Sampath Kumar and J. L. Joshi	593 – 595
Toxicity of selected medicinal plant water extracts against <i>Spodoptera litura</i> Fab. under laboratory condition	R. Ramakrishnan and T. Selvamuthukumar	596 – 598
Optimization process for the development of Soymilk-based strawberry RTS beverages	Vandana Verma, O.P. Chauhan and C. Nanjappa	599 – 607
Pharmacological and phytochemical properties of kaitha (<i>Feronia limonia</i> L.) : A review	Rashmi Srivastava, Neha Mishra, Swati Agarwal and Neetu Mishra	608 – 615
Application of remote sensing to determine spatial changes in soil properties and wheat productivity under salinity stress	Ali R.R., A.A. Abd El-Kader, E.F. Essa and Mohamed A.E. AbdelRahman	616 – 621
Crop water requirements over the Nile valley and desert fringes as a base of the optimum land use	M. Ismail and R.R. Ali	622 – 627
Effect of some environmental control parameters and retention time on biogas produced from wastes of buffalo feeding	H.A. Mansour and Sabreen Kh Pibars	628 – 635
Effect of tillage management practices and humic acid applications on some engineering properties of peanut	Sabreen Kh Pibars and H. A. Mansour	636 – 643
Adaptation of modelling to irrigation system and water management for corn growth and yield	Hani A. Mansour, Sameh K. Abd-Elmabod and B. A. Engel	644 – 651
Influence of humic and ascorbic acids on growth parameters and anthocyanin content of <i>Acalypha wilkesiana</i>	Waleed M.F. Abd-El-Hady, El-Metwally M. Selim and Naema I. El-Sayed	652 – 664
Impact of nitrogen and water status within plant on dry matter formation and nutritional values of tomatoes	Kassem A.S. Mohammed ¹ , Safaa. S. Abozed ² , Hanan H. Abdel-kader ¹ and Abdel Khalek Selim	665 – 673
The effect of drought stress condition combined with kaolin spraying application on growth and yield parameters of maize (<i>Zea mays</i>)	Ebtessam A. Youssef and Ali Mohamed Ali Hozayen	674 – 683
Study the effect of chitosan on some growth and yield parameters in wheat grown under water stress condition	Ebtessam A. Youssef and Ali Mohamed Ali Hozayen	684 – 694
Effect of physiological and chemical nano garlic supplementation on broiler chickens	Mohamed R. El-Gogary, Ayman Y. El-Khateeb and Asmaa M. Megahed	695 – 705
Impact of seedbed preparation condition on aggregates stability, yield, water and fertilizers use efficiency on maize (<i>Zea mays</i>)	Tayel, M.Y.; S.M. Shaaban and H.A. Mansour	706 – 710
Study of the effect of salinity stress and magnetized water irrigation on growth of Washington navel orange seedlings budded on sour orange rootstock	Tarek A. Mahmoud, Ebtessam A. Youssef, Sameh B. El-harouny and Manal A. M. AboEid	711 – 720
Performance analysis of pressurized irrigation systems using simulation model technique	Samir S. Attia, Abdel-Ghany M. El-Gindy Hani A. Mansour, Soha E. Kalil and Yasser E. Arafa	721 – 731
Effect of potassium fertilization and organic materials on some characteristic growth and nutrients uptake by faba bean (<i>Vicia faba</i> L.) plant	Shawer, S.S.	732 – 737
Sustainability of the soils for orchards land use of Al-Nagah area, Beheira, Egypt	A.M. Aziz, Sahar, A. Shahin E.F. Essa and M. Abd El-Hady	738 – 744
Floristic diversity of Saadia Mountain (Algerian North-West)	Hedidi Djahida, Saidi Djamel, Belhacini Fatima and Boughalia Mohammed	745 – 749
Effect of nitrogen and spacing on grain yield and nutrient uptake of rice under sri	R. Gobi, Chirom Surajkumar Singh, A. Balasubramanian, S. Sathiyamurthi and P. Stalin	750 – 752
Influence of integrated nutrient management practices on nutrient uptake and yield of irrigated sunflower	A. Balasubramanian, I. Manikandan, R. Gobi, N. Senthil Kumar and P. Stalin	753 – 756
Effect of foliar application with bioformulations on mango anthracnose incidence under pot culture condition	R. Udhayakumar, K. Rajamohan, S. Sanjaygandhi and L. Vengadeshkumar	757 – 761
Survey of mymarid parasitoids (Chalcidoidea: hymenoptera) in Kolli hills, Tamil Nadu	R. Kanagarajan, M. Ayyamperumal and K. Saravanan	762 – 763

Antimicrobial, physicochemical and sensory characteristics of honey treated cream	Ebtisam F. Mousa, Shaymaa saady lafta and Asmaa Sabah Ahmaed	764 – 772
Effect of irrigation water quality and nitrogen fertilizer in the growth of barley crop (<i>Hordeum vulgare</i> L.) and some physical and chemical soil traits in Dhi Qar province, southern Iraq	Saba Ali Al-Zubaidi	773 – 779
Biological effect of some aromatic plant oils against aphids oleander <i>Aphis nerii</i> (Aphidae : homoptera)	Amal Kamal Suleman	780 – 784
Study of wild medicinal plants used by tribal migratory shepherds in hills of Shimla district, Himachal Pradesh	Radha and Sunil Puri	785 – 790
Effect of adding different levels of organic manure and potassium fertilizer in the yield growth of wheat (<i>Triticum aestivum</i> L.)	Zaid A.Z. Ali AlJanabi, Ameer A. Jafaar, Israahikmatabd and Ali H. Abd Al Hassan	791 – 795
Effect of integrated nutrient and weed management practices on weeds, growth and yield of sunflower	Kalaiyarasan, C. and V. Vaiyapuri	796 – 801
Effect of organic inputs on yield and quality of grapes cv. Muscat	M. Rajkumar, K.P. Iswarya, R. Suresh Kumar and R. Senthilnathan	802 – 804
Combining ability analysis for quantitative traits in bottle gourd [<i>Lagenaria siceraria</i> (Mol.) Standl.]	Avnish Kumar Yadav, G.C. Yadav and R.C. Jaiswal	805 – 807
Soil moisture sensor based drip irrigation on sugarcane at different fertilizer levels	N. Ramesh, G. Baradhan and S.M. Suresh Kumar	808 – 812
Study of the movement of moisture and nitrogen concentration in soil with drip irrigation system in okra crop	Krittika, A.K. Jain and N.B. Misal	813 – 816
Response of tomato (<i>Lycopersicum esculentum</i>) to cobalt supplement	Sh.Sh, Holah, S.T. Abou Zeid, Nadia Gad and Abbas. M.M.	817 – 822
Mitigation of salinity stress and <i>Alternaria</i> leaf spot disease in faba bean by nicotinamide	Kamar M. Abd El-Hai, Abeer Abdulkhalek Ghoniem, Ayman Y. El-Khateeb and Ayman EL-Ghamry	823 – 839
Effect of antioxidants on citrus leaf anatomical structure grown under saline irrigation water	Islam, F. Hassan; Abou Leila, Bedour; Gaballah, Maybelle and H., El-Wakeel	840 – 845
First report of bacterial angular leaf spot caused by <i>Pseudomonas syringae</i> pv. <i>lachrymans</i> on cucumber in Iraq	Saba A.K. Al-Falooji, Sabah L. Al-Hasnawi and Ahlam K. Al-Yasseen	846 – 852
Effect of nitrogen source on NO_3^- accumulation, nitrate reductase activity, growth and yield in brassica plants	Wafaa Ali Hussein	853 – 858
Characteristics and classification of soil potential for agriculture in the Tash district within the dry agricultural zone in Anbar province of Iraq	Abdulkareem A. makhilif, Ali M. Rageh, Mohamed A. Hassan and Mohamed A. Aboud	859 – 869
Effect of the population density of the date palm mite of the ancient world <i>Oligonychus afrasiaticus</i> (MCGREGOR) on some dates palm trees in the orchards of central Iraq	Ahmed M. Tarek	870 – 873
New record for two species of genus <i>Autographa</i> Hübner 1821 (Lepidoptera: Noctuidae : Plusiinae) in Baghdad, Iraq	Hussein Kattan Mohammed and Awatif Abdul-fatah Hamodi	874 – 877
Food preference of red pumpkin beetle <i>Raphidopalpa foveicollis</i> (Lucas) and estimate of percentage of economic damage on some different melon varieties	Mohammed Shakir Manjy	878 – 883
The role of organic fertilizer and amino acid (proline) in the growth and production of cayenne pepper plants (<i>Capsicum annuum</i> . L) and the accumulation of their medicinal compounds (capsaicin and dihydrocapsaicin) under water stress circumstances	Kareem Meayan Rabie and Ahmed Shaker Mohsen Al-duhami	884 – 892
Supplementing probiotic in different styles effects on the digestive organs anatomical parameters of females akar putra chicken	Hasan, S.A. Jawad	893 – 897
The effect of the source and the level of residues in some of the characteristics of the soil and yield of broad bean (<i>Vicia faba</i> L.)	H.J. Mohammed, B.R. Sarheed, M.O. Salum and M.R. Alshaheen	898 – 903
Biological studies and control of cotton leaf worm <i>Sopdoptera littoralis</i> (Lep: Noctuidae) in Iraq	Musa Mahmood AL-Hasnawy	904 – 907
Effect of different ratio of addition of NaCl to the diets on some growth traits in grass carp <i>Ctenopharyngodon idella</i>	M.S. Al-Khshali	908 – 911
Detection of trichothecens chemotype produced by <i>Fusarium graminearum</i> isolated from grains using specific PCR assays	Hebat-Alla A.A. Alhamdani, Mohammed Qais Al-Ani, Salah M.A. Al-Kubaisi and A.A. Alhamdani	912 – 919

Effect of eucalyptus leaves water extract on some productive traits of broilers	Nuha T. Sh. Al Salman and Jassim K. M. Al-Gharawi	920 – 923
Effect of different levels of drinking water iron and copper on some productive traits of broilers	Hamza Gh. Habib, Ali H. Kh. Al-Hilali and Jassim K.M. Al-Gharawi	924 – 928
A study on adoption of botanical pesticides and its relationship with the characteristics of the respondents and the constraints	Darling B. Suji and C. Praveen Sampath Kumar	929 – 933
Studies on genetic variability, heritability and genetic advance in cotton (<i>Gossypium hirsutum</i> L.)	C. Praveen Sampath Kumar, S. Raju, R. Ebenezer Babu Rajan, Ajish Muraleedharan & Darling B. Suji	934 – 937
Effect of organic nutrients and bio regulators on flowering and yield attributes of celosia (<i>Celosia cristata</i> L.)	R. Sendhilnathan, E. Balaraman, M.Rajkumar and R. Sureshkumar	938 – 940
Comparative study of colonization of different human enteric pathogens on phylloplane of <i>Solanum lycopersicum</i>	Shilpi, Neha Bhadauria, P.D. Sharma and P.K. Paul	941 – 945
Study on production and value-chain aspects of carnation in Kumaun hills of Uttarakhand	Neelam Singh, Atul V. Singh and S.P. Singh	946 – 951
Empowering women dairy farmers through adoption of drudgery reducing technologies and availing government schemes	Sadhana Vaish and Smita Tripathi	952 – 955
Studies on influence bio-regulators on yield and quality of okra (<i>Abelmoschus esculentus</i> L.)	R. Sureshkumar, S. Ayyappan M. Rajkumar and R. Sendhilnathan	956 – 959
Effect of insect pathogenic fungi <i>Zoophthora radicans</i> on the growth of larvae and pupa of <i>Cnaphalocrocis medinalis</i>	Senthilkumar, M. and R. Kanagarajan	960 – 962
Survey on parasitic fauna (Chalcidoidea: hymenoptera) of Kalvarayan hills	R. Kanagarajan and G. Pudhumalar	963 – 965
Effect of irrigation with magnetic water on nitrogen fertilization efficiency of navel orange trees	Tarek A. Mahmoud, Ebtessam A. Youssef, Sameh B. El-harouny and Manal A.M. Abo Eid	966 – 975
Studies on genetic correlation and causation among seed yield and its component traits in medium duration rice (<i>Oryza sativa</i> L.) genotypes grown over six seasons under coastal eco-system	Sabarinathan, S.; S.R. Kirubhakaran; S.T. Ponsiva; A. Anandan; N. Senthilkumar and S. Thirugnanakumar	976 – 981
Studies on genetic variability in medium duration rice (<i>Oryza sativa</i> L.) for yield and yield component traits over six seasons under coastal eco-system	Kirubhakaran., S.R., S. Sabarinathan, S.T. Ponsiva, A. Anandan, N. Senthilkumar and S. Thirugnanakumar	982 – 985
Mahalanobis, D. ² and Gauch's ammi analyses in medium duration rice (<i>Oryza sativa</i> L.) genotypes grown over six seasons under coastal eco-system	Ponsiva, S.T., S. Sabarinathan, S.R. Kirubhakaran, N. Senthilkumar, A. Anandan and S. Thirugnanakumar	986 – 994
SSR based molecular characterization and diversity analysis of cowpea	Swapnil Sonker, Triveni Sharma and Neeraj Tandan	995 – 1001
Effect of pinching and foliar application of bio regulators on growth and flower yield of gomphrena (<i>Gomphrena globosa</i> L.)	R. Sendhil Nathan, R. Bharani Vijay, R. Sureshkumar and M. Rajkumar	1002–1005
The effect of adding local orange peel powder to microbial inhibition and oxidative reaction within edible film component	Iman H.A. Al-Anbari, Abbas M. DAKHEL and Ali ADNAN	1006–1012
Effect of organic nutrients on certain growth and yield characters of bitter gourd (<i>Momordica charantia</i> L.) Ecotype "Mithipagal"	R. Sureshkumar, S. Deepa, M. Rajkumar and R. Sendhilnathan	1013–1016
Economics of production and marketing of okra (<i>Abelmoschus esculentus</i>) in Bilaspur District of Chhattisgarh state of India	Ajay Tegar	1017–1022
Component analysis for grain yield in rice (<i>Oryza sativa</i> L.) under natural saline condition	M. Venkatesan, P. Karthikeyan and T. Thilagavathi	1023–1026
Quantitative analysis of rice (<i>Oryza sativa</i> L.)	M. Venkatesan, R. Elangaimannan and T. Thilagavathi	1027–1031
The effect of adding different levels of red pepper (<i>Capsicum frutescens</i>) powder in some internal and external quality traits for egg of brown Japanese quail bird	Samawal S.A. Al-Tikriti, Tariq K. Al-Gumaili and A.S. Abdalwahd	1032–1037
Bio-efficacy of ampligo 150 ZC (chlorantraniliprole 9.3% + lambda cyhalothrin 4.6%) against leaf miner (<i>Liriomyza trifolii</i>) in tomato (<i>Lycopersicum esculentum</i> Mill.)	V. Mary Floret and Ayyasamy Regupathy	1038–1040
Effect of adding fish scales in agricultural soils and some characteristics of <i>Vigna radiata</i> L.	Basim Y. Alkhafaji and Roaa Jafar Elkheralla	1041–1043
Effect of physical chemical and combination of mutagens on growth parameters of bhendi (<i>Abelmoschus esculentus</i> (L.) Moench.)	Sam Ruban J., Ebeneser Babu Rajan R. and Kader Mohideen M.	1044–1045

Determination of doses of physical, chemical and their combination of mutagens on seed germination and radicle length in okra (<i>Abelmoschus esculentus</i> (L.) Moench.)	Sam Ruban J., Ebenezer Babu Rajan R. and Kader Mohideen M.	1046–1048
Determination of chemical, physical and microbiological parameters in assessment of water quality of Alhussainia river project by GIS middle of Iraq	Mahdi Wasmey Seheib Alaidi and Hashim Haneen Kareem Aldhahi	1049–1056
The role of enzymatic and non-enzymatic antioxidants in facing the environmental stresses on plant : A Review	Yousif Ahmad Mahmood AL-Aloosy, Ali JasimHadi AL-Tameemi and Sinan Sameer Jumaa	1057–1060
Pathogenicity comparative of some Egyptian isolates and commercial Indians compounds of entomopathogenic fungi against some insect pests	Abdel-Raheem, M.A.	1061–1068
The impact of salinity water on growth and yield of two oats cultivars (<i>Avena sativa</i> L.)	Hasan N. Mansoor, Hayder H.Abbas and Mohammed S. Taleb	1069–1076
Improvement in nutritional security of tribal families through kitchen gardening in remote areas of the Dindori District (MP), India	Nidhi Verma, Renu Pathak, Megha Dubey, Satendra Kumar, Harish Dixit and Pranay Bharti	1077–1079
Study on major problem faced by SHG members and their perception towards SHGPIS	Renu Pathak, Nidhi Verma, Megha Dubey, Satendra Kumar, Pranay Bharti and Harish Dixit	1080–1082
Effect of biofertilizers on growth of different crops : A review	Megha Dubey, V.K. Verma, R.D. Barpete and Nidhi Verma	1083-1086
Impact of fertigation of nano NPK fertilizers, nutrient use efficiency and distribution in soil of potato (<i>Solanum tuberosum</i> L.)	Hayyawi W.A. Al-uthery and Qusay. M.N. Al-Shami	1087–1096
Thermodynamic parameters of well water in Babylon governorate of Iraq	Rafal Jasim Mohammed, Safa Mahdi Abdl Kadhim and Diaa Fliah Hassan	1097–1104
Estimates of genetic parameters, components of variance and their magnitude in rice (<i>Oryza sativa</i> L.)	N.K. Singh, A.K. Singh, Alok K. Singh, V.M. Misra and A.K. Mall	1105–1107
Management of alternarial blight of mustard (<i>Brassica juncea</i> L.) by botanicals, <i>Trichoderma harzianum</i> and fungicides	Mukesh Kumar, Sunil Zacharia and Abhilasha A. Lal	1108–1113
Effect of integrated weeds management for growth and yield of chilli (<i>Capsicum annuum</i> L.) cv K-2	Sha K., Ajish Muraleedharan, Gnanasekaran Seerangan and A. Prasanth	1114–1116
Effect of addition amla (<i>Phyllanthus emblica</i>) and vitamin c powder on some physiological and production performance of broiler	Tareq Khalaf Hasan Aljumaily, Yasir. M. Kamil and Ahmed Taies Taha	1117–1120
Response of <i>Anthurium andreanum</i> cv. tropical to different media and nutrients grown under shade conditions	Ajish Muraleedharan, K. Sha, G. Samlind Sujin, R. Ebenezer Babu Rajan, C. Praveen Sampath Kumar and J.L. Joshi	1121–1124
Constraints experienced by the paddy farmers in extent of adoption of cultivation practices	Balamurugan V. and J. Manikandan	1125–1126
Estimating seasons starting point time as a result of climate change impaction	Hazem H. Hussain, Hussain Abodi Nemah and Basim Abdul Sada	1127–1131
Effect of <i>Sargassum tenerrimum</i> on controlling sheath blight of rice caused by <i>Rhizoctonia solani</i> Kuhn	K. Hane Graff and T. Suthin Raj	1132–1135
Screening of bhendi [<i>Ablemoschus esculentus</i> (L.) Moench] genotypes against yellow vein mosaic virus for resistance under field condition	N. Karthika and T. Uma Maheswari	1136–1138
Effect of entomopathogenic nematode, <i>Rhabditis Blumi</i> Sudhaus (Nematoda: Rhabditid) as a biocontrol agent on the palm borer, arabian rhinoceros beetle (<i>Oryctes agamemnon arabicus</i>)	Ahmad M. Tareq, Mohammed Z. Khalaf, Falah H. Naher, Jawad B. Al-Zaidawi and Haitham S. Khalaf	1139–1143
Efficiency evaluation of some plant extracts for controlling of barley covered smut caused by <i>Ustilago hordei</i>	Thayeb A. Farhen, Jasim M. Abed and Hamood M. Saleh	1144–1147
Polymorphisms of pit 1 gene in broiler ross 308 hybrid and its association on some productive performances and body scales	Eman H. AL-Anbari	1148–1155
Effect of prawn exoskeleton supplemented smay on cultural characteristics of entomopathogenic fungi (<i>Zoopphthora radicans</i>)	M. Senthilkumar, Pazhanisamy, M. and V. Sathyaseelan	1156–1158
Seasonal incidence of leaf eating caterpillar (<i>Spodoptera litura</i> Fabricius) in groundnut ecosystem during rabi season	M. Pazhanisamy, V. Sathyaseelan and M. Senthilkumar	1159–1163

The effect of plant extracts of sage (<i>Salvia officinalis</i>) and thyme (<i>Thymus vulgaris</i>) in the cause of disease complicating the roots of nematodes <i>Meloidogyne incognita</i> on the tomato in Iraq	Y.A. Jassam and T.A. Kareem	1164–1169
Systematic study for the new record <i>cleome scaposa</i> dc. (Cleomaceae) in Iraq	Mohammed Othman Mousa	1170–1177
Effect of the treatment with acetic and lactic acid on some of the productive characteristics in strain Quail	Esraa Mobasher Towfeq	1178–1183
Investigation of the presence of parasites that contaminate some fruits and vegetables in the Samarra city in Iraq	Ouhoud Mozahim Shakir, Khadija khleaf Abdulla, Aseel Ahmed Mustafa and Mohammed Ahmed Mustafa	1184–1190
The role of proline concentrations in improving the yield of maize (<i>Zea mays</i> L.) plant under water stress conditions	Raisan Ahmed Al-Zobiady, Ahmed habeeb Al-mamoori, Karrar Falah Hadi Alkhafagi and Ahmad Jaafar Sadeq Abakah	1191–1198
Hydrocarbons removal from wastewater by green matter (rice husk as a model)	Atheer Saieb Naji Al-Azawey	1199–1202
Shoots regeneration in callus tissue of coriander plant (<i>Coriandrum sativum</i> L.) <i>In vitro</i>	Shurooq Falah Hassan	1203–1205
Photo bleaching inhibition activity of <i>Cucurbita pepo</i> fruit extract on brilliant blue dye	Mustafa S. Sharif, Mohsin, E. Aldokheily and Mohammed Turkey	1206–1213
Effect of ortho silicic acid formulations on productivity and profitability of maize	Jawahar, S., S. Ramesh, K. Suseendran, C. Kalaiyaran and S.R. Vinod Kumar	1214–1218
Effect of integrated nutrient management practices on productivity and profitability of transplanted rice	Vinod Kumar. S.R., S. Jawahar, M. Kowsalya and C. Santhana Kumar	1219–1222
Effect of organic and inorganic inputs on growth and yield of jasmine (<i>Jasminum auriculatum</i> L). Mullai	Sha. K, Ajish Muraleedharan and Gnanasekaran Seerangan	1223–1225
Determining the fruit yield of <i>Jatropha curcas</i> L. accessions found in hilly zone and southern transition zone of Chikkamagaluru and Shivamogga Districts of Karnataka, India	Ramesh Babu H.N., Rajeshwari N., and Nithish S.A.	1226–1228
The effect of supplementation different additional levels of choline to diet upon the performance of Japanese quails	Q.H. Ameen, M.I.A. AL-Neemi and M.A. Mohammed	1229–1233
Response of cultivated cabbage in plastic bags for spraying with amino acids, fertilization with humic acid and its effect on some vegetative and quality traits	Yasamin, F. Saloom Mohammad, H.A. AL- Hasane and Salah, H.J. AL-Hchami	1234–1240
Evaluation of the subsoiler tine designed and manufactured locally and its effect on some power indicators and corn yield	Hussain Th. Tahir and Nazat H. Jeejo	1241–1248
Role of organic and chemical fertilizer on growth and yield of two cultivars of pea (<i>Pisum sativum</i> L.)	Hussien J.M. AL-Bayati, Fathel F.R. Ibraheem, Waleed B.A.M. Allela and Duraid K.A. AL-Taey	1249–1253
Study the foliar times numbers and atoink stimulator on the growth and yield of cucumber (Saif cultivar) cultivated in unheated plastic houses	Heba A. Hussein Majida MH. Mhaibes and Hakeem Sh. Atallah	1254–1259
Assessment of mineral and nano-fertilizers fragmentation in wheat crop (<i>Triticum aestivum</i> L.) fertilization	Khudhair J.Y. Al-Saidan, Shaimaa I. Mahmoud and Hanaa H. Mohamed	1260–1267
Overlap influence for the process of retail of mineral and nanoparticles fertilizers and stages of addition on growth and yield of wheat (<i>Triticum aestivum</i> L.)	Khudhair J.Y. Al-Saidan, Shaimaa I. Mahmoud and Hanaa H. Mohamed	1268–1278
Impact of levels and time of foliar application of nano fertilizer (super micro plus) on some components of growth and yield of rice (<i>Oriza sativa</i> L.)	Raheem A.H. Jassim, Hanoon N. Kadhem and Ghanim. B. Noonii	1279–1283
Effect of water extract of parsley (<i>Petroselinum sativum</i>) leaves in some productive traits of broilers	Tayseer A.M. Al-Musawi, Mousa A. Hassan, Jassim K.M. Al-Gharawi and Radhi A. Al-Ziadi	1284–1287
Effect of the addition of green tea to the awassi lambs rations on some blood standards	Wafaa Hamed Al-Samaraae and Yaseen Ali Alobeidi	1288–1290
Effect of humic acid spraying on growth and yield of wheat (<i>Triticum aestivum</i> L.)	Duaa H. Mahdi, Faisal M. Madlol and Mohamed A. Hashim	1291–1293
Effect of light and aeration on the growth of <i>Sclerotium rolfsii</i> causing stem rot of cluster bean	A. Muthukumar, T. Suthinraj, R. Udhayakumar and R. Naveenkumar	1294–1296
Effect of nutritional sources on the growth of <i>Sclerotium rolfsii</i> causing stem rot of cluster bean	A. Muthukumar, R. Udhayakumar and R. Naveenkumar	1297–1300
Molecular identification and pathogenicity of <i>fusarium</i> fungi causing root rot disease of cucumber under plastic greenhouses in Egypt	Ashraf Gamil Attallah, Ahmed Farahat Sahab and El Sayed Hussein Ziedan	1301–1307

Influence of salicylic acid elicitation on secondary metabolites and biomass production in <i>in-vitro</i> cultured <i>Withania coagulans</i> (L.) Dunal	Bipin Maurya, Krishna Kumar Rai, Neha Pandey, Lakee Sharma, Niraj Kumar Goswami and Shashi Pandey Rai	1308–1316
Survey of wilt incidence of cotton and pathogenic variability of <i>Fusarium oxysporum</i> F. sp. <i>vasinfectum</i>	Sanjaygandhi, S., Vengadeshkumar, L., Udhayakumar, R., Rajamohan, K. and Thamarai Selvi, M.	1317–1323
Effect of combined application of antagonistic organisms and organic amendments on the wilt incidence of cotton incited by <i>Fusarium oxysporum</i> f. sp. <i>vasinfectum</i>	Sanjaygandhi, S., Udhayakumar, R., Vengadeshkumar, L., Rajamohan, K., and ThamaraiSelvi, M.	1324–1329
Cadmium toxicity impact on biomodal respiration of air breathing fish <i>Channa punctatus</i> (Bloch.)	P. Sangeetha and B. Aruljothi	1330–1335
Effect of different levels of humic acid, fulvic acid and N P K in some growth properties and total seed yield of sunflower plant (<i>Helianthus annuus</i> L.)	HayderAbdul husseinMohsinALmaghir, Shaimaalbraheem Al-Refai and TurkiMeften Saad	1336–1340
Repellency property of certain botanical extracts and acaricides against two spotted spider mite, <i>Tetranychus urticae</i> (Koch) on red gram (<i>Cajanus cajan</i> L.)	V. Sathyaseelan, M. Senthil Kumar and M. Pazhanisamy	1341–1343
Use of different treatments to increase the efficiency of flag leaf and the parts of the spike on the dry matter production of wheat crop <i>Triticum aestivum</i> L.	Ahmed L.J. Al-Toby and Faisal M. M. Al-Taher	1344–1348
Use of Melissa leaves water extract as a natural antibiotic on some immunological and blood traits of broilers	Reem K.A. Al-Ramahi, Jassim K.M. Al-Gharawi and Radhi A. Al-Zeadi	1349–1351
Solar along with organic amendments assisted integrated approach for the management of soil borne diseases and pest on tomato at nursery level	Mullaimaran S., Haripriya K., Barathkumar T.R. and Jaiganesh, V.	1352–1355
Role of growth regulators NAA and CPPU in growth characteristics of olive transplants	Abid-Alridha Al-Qassam and Mohammed A. Shakir	1356–1359
Role of cluster frontline demonstration in enhancement of chickpea (<i>Cicer arietinum</i>) production	R.K. Dwivedi, B.K. Tiwari, D.K. Tiwari, K.S. Baghel and A.K. Patel	1360–1362
Grain yield in raised bed planted wheat in central plain zone of Punjab	Vandna Chhabra, Amritpal Singh and Manpreet Kaur	1363–1365
Effect of irrigation practices on the growth and yield attributes and yield of rice (<i>Oryza sativa</i> L.)	Murugan, G.; M.S. Bhagavathi, K. Suseendran, P.Stalin and M.Saravana Perumal	1366–1368
Effect of gibberellic acid (GA ₃) on growth and yield of rice (<i>Oryza sativa</i> L.)	S. Ramesh, P. Sudhakar, S. Elankavi, K. Suseendran and S. Jawahar	1369–1372
Effect of cutting periods on the concentration of hydrocyanic acid for five cultivars of sorghum (<i>Sorghum bicolor</i> L.)	Ali Salim Hussein and Hussein Razzaq Nayyef	1373–1377
Effect of some plant powders on aspects of the biological performance for sawtoothed grain beetle <i>Oryzaephilus surinamensis</i> L. (Coleoptera: Silvanidae)	Ruaa Kamel Mahmood	1378–1381
Impact of hammering tool and sieve's perforations diameter on some mechanical and volumetric traits of corn grinding process	Ahmed Akbar Ali, Ali Mohammed Ali and Basim Aboud Abbas	1382–1385
Effect of bio-fertilizers, organic fertilizer and irrigation periods in the traits of yield and its components for rice plant <i>Oryza sativa</i> L. (Anbar 33 cultivar)	Ahmed Thamer Kamil AL-Sultani [*] and Hashem Rabie Latheeth	1386–1393
Antibacterial and wound healing activities of acetone <i>Cladophora glomerata</i> extract	Ahmed S. Dwaish	1394–1399
Molecular detection of AAP gene in <i>Staphylococcus aureus</i> isolated from tonsillitis	Enas Jalil Baqer Almayali and Israa Abdul Ameer AL-Kraety	1400–1402
Antimicrobial activity of some plant extracts against pathogenic bacteria	Mahammed E Jabbar Al-Defiery, Mona N. Al-Terehi, Nabaa M. Salman Cridee	1403–1409
Isolation and identification of some endophytic fungi from some local algae	Zaman Abdul Hussein Ali Ghfil and Dina Yousif Mohammed	1410–1418
Anticancer activity of <i>Spirulina platensis</i> methanolic extracts against L20B and MCF7 human cancer cell lines	Raghad J. Fayyad, Alaa N. Mohammed Ali, Ahmed S. Dwaish and Ahmed Khayoon Abed Al- Abboodi	1419–1426
Genetic relationships among <i>Plantago</i> spp. growing in Iraq using random amplified polymorphic DNA (RAPD) markers	Mohammed F. Hamdi, Dhia S. Hassawi and Athiya N. Salman	1427–1432
Anatomical study of stems for some species from caryophyllaceae family in Iraq	Mohammed Othman Mousa and Khazal Dh. Wadi Al-Jibouri	1433–1440
Effect of foliar fertilizers on growth and yield of three wheat varieties	Atab, H.A.; Merhij, M.Y. and Jasim A.H.	1441-1444
Biotechnology of waste water treatment with fungi (<i>Aspergillus niger</i> and <i>Rhizopus oligosporium</i>)	Bushra Ali Ghyadh, Ahmed Shaker Al-Ashoor and Zainab Mohsen Ibrahim	1445-1449