

Contents

	Page
Organizing Committee	xxi
Message from the Vice Chancellor	xxvi
Message from the Director, Center for Research and Knowledge Dissemination	xxviii
Message from the Conference Chair - ICSUSL2021	xxix
Message from the Conference Co-Chairs	xxxi
Keynote Address by Professor Lian Pin Koh	xxxii
Keynote Address by Professor Chen Xiangjun	xxxiii
Address by the Guest of Honour	xxxiv
The 2nd China-Sri Lanka Communication and Cooperation Forum	1
Keynote Address by Professor Ye Hailin	2
Keynote Address by Professor SUN Jisheng	3
New Challenges and Opportunities for China - Sri Lanka Exchanges and Cooperation in the Post - Epidemic Era	4
The Development of Sri Lankan English Drama in the 20 th Century and the Enlightenment <i>Yan Weiwei</i>	5
Study on the Image Construction of China's Aid Construction by Chinese and Foreign Media under the Background of Belt and Road Initiative - Take Sri Lanka Port Project for Example <i>Xiong Jingjing</i>	6
On the Localization of Chinese Textbooks in Sri Lanka <i>Zhan Xiaoyan</i>	7
Strategies of China-Sri Lanka Higher Educational Cooperation Under "the Belt and Road Initiative" <i>Zhang Huifang</i>	8

An Assessment of the Contemporary China-Sri Lanka Socio-Economic and Cultural Relationship During the Pandemic Era <i>AMKM Aththanayaka and RARP Maduwanthi</i>	9
A Study on Cultural, Educational and Economic Changes in Sri Lanka due to the Influence of Sino-Sri Lanka Bilateral Ties <i>RMCJ Rathnayaka</i>	10
A Study on China-Sri Lanka Education Exchange and Cooperation: With Specific Reference to Teaching Chinese at Confucius Classroom of Sabaragamuwa University of Sri Lanka <i>RMPP Rathnayake</i>	11
Main Characteristics of Sri Lanka's Vocational Education System and Its Enlightenment <i>Shen Shenglin</i>	12
The Chinese Experience in Tourism Poverty Alleviation in Sri Lanka Is to Be Learned From <i>Ting Gan and Jiaxin Li</i>	13
Research on the Impact of Sri Lankan Language Policy on Its Ethnic Relations <i>Duan Ping</i>	14
The Impact of Business Environment on High Quality Economic Development: A Cross-country Panel Data Approach <i>YANG Qiao</i>	15
A Study on the Issues of Translating Chinese into Sinhala <i>SAMC Silva and DANSY Dassanayake</i>	16
A Study on the Impacts of Social and Culture Exchanges between China and Sri Lanka through BRI on Sri Lankan Tourism <i>YBND Premachandra and RARP Maduwanthi</i>	17
A Study on the Contribution of China for Enhancing Quality of Chinese Language Degree Program in Sabaragamuwa University of Sri Lanka <i>RARP Maduwanthi and GMTS Ranathunga</i>	18
Conquer the Challenges in Agriculture for Global Food Demand	19
Plenary Speech by Professor Md Solaiman Ali Fakir	20

Agribusiness Management and Extension **21**

Comparison of Agricultural Activities of Old and Young Vegetable Farmers in Polgahawela Divisional Secretariat Division in Sri Lanka
KRM Dulanjani and SHP Malkanthi 22

Customer Perception and Attitude towards Value-added Products of Potato Varieties Grown in Sri Lanka
KNMHH Kosgahakumbura, P Jayalath, SHP Malkanthi, R Sabaragamuwa, JWA Sajiwanie and SMGS Bandara 23

Effects of Sample Volume on Sensory Perception of Soya Milk
Menaka Sivakaran 24

Evaluation of Effectiveness of Training Programmes for Technicians in Land Preparation of Rubber Farming: A Case Study in Kegalle District
PKKS Gunarathne, DMAP Dissanayake and KKI Jayasundara 25

Factors Affecting for Potential to Adopt Five-Star Certification: Case Study of CDA Registered Small and Medium Scale Oil Millers in Kurunegala District
RC Prasad, SS Purasinghe, MPM Arachchige, NE Wedamulla and AMC Amarakoon 26

Marketing Methods and Chains of the Maldive-Fish Processors: A Case Study in Matara District
PSSL Wickrama, AL Sandika, PVS Harshana and SANP Hansani 27

Need of Agricultural Information and their Accessibility for Women Farmers in Imbulpe DS Division in Sri Lanka
SDD Rathnachandra, SHP Malkanthi and P Sivashankar 28

Sri Lanka's Potential Vegetable Export Flow and Its Determinants: The Gravity Model Approach
HML Nayanajith and JC Edirisinghe 29

Total Factor Productivity Growth in Sri Lankan Tea Estates: A Stochastic Frontier Approach
KRHM Ranjan, JC Edirisinghe, HMLK Herath and UK Jayasinghe Mudalige 30

Tragedy of the Commons: The Case of Irrigation Water in Sri Lanka
AA Shantha, KPLN Patabandi, AD Ampititiyawatte and HSR Rosairo 31

Agricultural Engineering **32**

An Android Application Based Mobile Phone Camera Colorimeter For Determining Soil Nitrate And Phosphorus
MDP Kumarathunga and CC Kadigamuwa 33

Assessment of Drought Impact on Paddy Production in Ampara District using Standardized Precipitation Index (SPI) <i>UI Maduranga and HASL Jayasinghe</i>	34
Elevated Arsenic in Soil Affects the Trace Elements in Rice (<i>Oryza Sativa L.</i>) Grains <i>KS Manawasinghe, Rohana Chandrajith and Saman Seneweera</i>	35
Crop Production Technology	36
Alternative for Polypropylene Bags in Oyster Mushroom (<i>Pleurotus ostreatus</i>) Cultivation in Sri Lanka <i>IJA Ruhunuge, HNK BT Chandrasiri, DTS De Silva, ARDD Priyashadeera and JP Kirthisinghe</i>	37
Eco-Friendly Approach For Rice Weevil (<i>Sitophilus oryzae</i>) Management Using Clove (<i>Syzygium aromaticum</i>) Stem And Leaf Essential Oils <i>Pramod Bandara and Mahinda Senevirathne</i>	38
Effect of Spacing, Gibberellic Acid and N: P2O5: K2O Ratio on Growth, Yield and Tuber Shape of Potato Variety Royal <i>CH Ruwanpathirana, RBHK Wanigasekara, SRWMCJK Ranawana and HMSK Herath</i>	39
Evaluation of Growth and Yield Performances of Two Potato Varieties, CONNECT and MASAI under Different Levels of Nitrogen Fertilizer <i>WGCP Dharmasena, RBHK Wanigasekara, HMSK Herath and SRWMCJK Ranawana</i>	40
Optimizing the Composition of Biological Yield to Enhance the Productivity of Cinnamon Plants <i>HN Aluthgamage, DLCK Fonseka and CK Benaragama</i>	41
Future Research Direction of Rooftop Agriculture in South and South East Asia: A Desk Review through Urban Sustainability Approach <i>EGI Sevandi</i>	42
Livestock Production	43
Assessing Farmer Attitude on Dry-Cow Welfare in Selected Veterinary Divisions in Kandy District of Sri Lanka <i>RGDP Ranthethge, RMAS Bandara, WPCG Weerasinghe and TS Samarakone</i>	44
Effect of Incandescent Bulbs Emitted Light Colours on Performance, Gathering Density and Behaviour of Broiler Chicks during Brooding Period <i>D Senaratna, RMSS Manewa, MGNC Thilakarathne and NSBM Atapattu</i>	45

Effect of Routine Management Practices on Welfare of Broiler Breeder Chicks and Growers: A Behaviour Assessment <i>DRAU Debatapitiya and RMAS Bandara</i>	46
Implications of <i>Hermetia illucens</i> Larvae on Fish Histomorphology, Gut microbiota and Haematology; A Review <i>MKC Priyadarshana, CN Walpita, HAD Ruwandeepika and MPS Magamage</i>	47
Management Practices and Attitudes of Buy-Back Farmers towards Broiler Chicken Welfare; Gampaha District, Sri Lanka <i>GGULB Senevirathna, RMAS Bandara, WPCG Weerasinghe and TS Samarakone</i>	48
Potency of <i>Hermetia illucens</i> Linnaeus, 1758 Larvae to Replace Fishmeal in <i>Labeo rohita</i> Hamilton, 1822 Diets <i>MKC Priyadarshana, CN Walpita, HAD Ruwandeepika, MPS Magamage and PM Withanage</i>	49
Prevalence of Footpad Dermatitis and Carcass Defects in Broiler Chickens Reared in Closed and Open-sided House Systems <i>SMANS Senanayake, RMAS Bandara, TS Samarakone, MWRC Premasiri and MHD Kavinda</i>	50
The First Ever Induced Breeding and Larval Rearing of Critically Endangered, Endemic Freshwater Fish <i>Labeo lankae</i> <i>AR Mudalige, CN Walpita, SJ Perera, HMUKPB Herath and ARSB Athauda</i>	51
Antimicrobial Resistance Profiles and Knowledge among General Public Regarding Antibiotics from a Rural Ecosystem in Sri Lanka <i>Yasodhara Gunasekara, Thilini Nisansala, Tierney Kinnison, Isuru Wijewickrama, Yasodha Basnayake, Sanda Kottawatta, Ayona Silva-Fletcher and Ruwani Kalupahana</i>	52
Post-harvest Processing Storage and Technology	53
Development of an Edible Fruit & Vegetable Coating from Refined Rice Bran Wax <i>LS Jayawardena, MHTK Chandrasiri, JKH Sampath, KB Wijesekara and NC Gangodavila</i>	54
Estimation of Total Polyphenol and Nitrogen Contents in Three Different Cultivars of Tea (<i>Camellia sinensis</i>) Grown in Matara District by Near-Infrared Technique <i>PKSH Disanayaka, HAE Nalaka Ariyasinghe and GARR Perera</i>	55
Evaluation of Physicochemical Properties of Tomato (<i>Solanum lycopersicum</i>) varieties Grown in Uva Region, Sri Lanka and their Suitability for Value Addition <i>HAGN Madhushani, MPM Arachchige, NE Wedamulla, WAJP Wijesinghe and PW Jeewanthi</i>	56

Evaluation of Powder Properties of Hot-air Dried Bael Fruit (<i>Aegle marmelos</i>) Powder <i>SYSM Senevirathne, Shammi U Hettiarachchi and Narmada YDS Weerakkody</i>	57
Extension of Shelf Life of Fresh Mushroom (<i>Pleurotus ostreatus</i>) Using Gamma Irradiation and Determination of Physicochemical and Microbiological Parameters Associated <i>SMDRR Senarathne, AAG Madurakanthi, NE Wedamulla and WAJP Wijesinghe</i>	58
Extraction of Natural Flavor from Mango (<i>Mangifera indica L.</i>) for Food Applications <i>SPNP Subasinghe, NE Wedamulla, PW Jeewanthi, MPM Arachchiand and WAJP Wijesinghe</i>	59
Applied Science Approaches for Combating Global Challenges	60
Plenary Speech by Professor Balachandran Jayadevan	61
Food Science and Technology	63
Biofilms of <i>Salmonella</i> , <i>E. coli</i> , <i>Proteus</i> and Their Combinations; A Time Scale Investigation <i>SU Pathiranaage, KVDM Hasintha, HC Nadishani, DNN Madushanka, JLPC Randika, GCP Fernando, TSP Jayaweera and HAD Ruwandeepika</i>	64
Development and Characterization of <i>Ulva fasciata</i> Incorporated Pie Crust <i>NL Rathmasinghe, MPG Vanniarachchy and I Wijesekara</i>	65
Development of Dragon Fruit (<i>Hylocereus polyrhizus</i>) Incorporated Novel Set Yoghurt <i>MKA Shanika, WAJP Wijesinghe and NE Wedamulla</i>	66
Evaluation of the Effect of UV treatment on Shelf Life and Physicochemical Properties of Coconut Water as an Alternative to Thermal Pasteurization <i>HHN Perera, JAEC Jayawardena and MPG Vanniarachchy</i>	67
Food Tourism to Aid Sri Lankan Economy after Covid-19: An Assessment on the Gastronomic Satisfaction of Young Adult Tourists <i>KND Perera and MA Jayasinghe</i>	68
Chemical and Physical Sciences and Technology	69
Adsorption of Heavy Metals on Na-Montmorillonite: Effect of pH and Adsorbent Dosage <i>SMMGHD Abeyratna and ACA Jayasundera</i>	70

Comparison of Dropping Points of Conventional Grease against Modified Grease with Graphite <i>HCDP Colombage, RCL De Silva, D Samarawickrama, HMBI Gunathilaka, P Subramaniam and HPPS Somasiri</i>	71
Development of PVP Based Electrolytes and Their Applications in Electrochromic Devices <i>HMBI Gunathilaka, VA Seneviratne and HNM Sarangika</i>	72
Fabrication of Polydimethylsiloxane Using Atmospheric Pressure Plasma Jet: An Alternative Approach to Low pressure plasma Fabrication <i>WT Leon S Fernando, Ryo Kobayashi, Kazumasa Takahashi, Takashi Kikuchi, Kiyoshi Ohnuma and Toru Sasaki</i>	73
Identification of Residues of Kerosene in Fire Debris Evidence in the Presence of Poly Vinyl Chloride Interfering Compounds In an Arson Investigation <i>ACWWMNP Koswatta, S Malavipathirana and NIK Fernando</i>	74
Natural Sciences & Environmental Conservation	75
Assessment of Marine Water Quality for Recreation and Bathing Purposes in Charty Beach, Jaffna, Sri Lanka <i>MS Usgoda, S Gobiraj and S Kuganathan</i>	76
Biodegradation of Lignocellulose by Microbial Biofilms Developed From White Rot Fungi and Soil Bacteria <i>KPD Perera and AP Henagamage</i>	77
Population Dynamics of Sambar Deer (<i>Rusa unicolor unicolor</i>) in Horton Plains National Park, Sri Lanka <i>DS Weerasekera, SJ Perera and KB Ranawana</i>	78
The Environmental Impacts of Unauthorized Activities in Maragala Mountain Range Environmental Protection Area in Monaragala Divisional Secretariat <i>HMSS Herath and KPL Nishantha Patabandi</i>	79
Feeding Habits and Seed Dispersal Potential of the Indian Crested Porcupine (<i>Histrix indica</i>) at Udawattekele Reserve Forest, Kandy, Sri Lanka <i>SSKS Thadhani, DS Weerasekera and KB Ranawana</i>	80
Functional Properties of Bioactive Peptides Produced from Crude Water Extract of <i>Ulva lactuca</i> Collected from Southern Coast of Sri Lanka <i>CS Hamit and EDNS Abeyrathne</i>	81

Global Challenges, Geo-spatial Applications, and Sustainable Solutions 83

Plenary Speech by Professor Walter Timo de Vries 84

Invited Speech by Professor Jagath Munasinghe 85

Invited Speech by Professor Thilantha Dammalage 86

Invited Speech by Dr. Lisa Maria Rebelo 87

Invited Speech by Professor Zhenfeng Shao 88

Air and Ground Based Imaging for Earth Observation 89

An Automatic Method for Archaeological Site Detection Using Drone Imagery
ITP Jayaratne and S Koswatte 90

Assessment of Sugarcane Growth and Development Parameters using Vegetation Indices Derived From UAV-based Imagery
PP Ruwanpathirana, MDS Samaraweera, PLA Madushanka, GY Jayasinghe, WMCJ Wijekoon, ACP Priyankara and S Kazuhitho 91

Automatic Thinning of Bare Earth Lidar Point Clouds
HKC Hettiarachchi and GSN Perera 92

Automatic Window Boundary Extraction from TLS Point Clouds
IM Jabris and GSN Perera 93

Feasibility Study on Implementation of Videogrammetry for Road Surveying
DC Wickramasinghe and KDH Upendra 94

Implications of Unmanned Aerial Vehicles for Identification of the *Oidium* Leaf Disease of Rubber Plantations - A Review
JSR De Silva, NMPM Piyasena, CA Karadana, PADV Vithanage and SL Witharana 95

GIS and Mapping 96

Assess Elephant Habitat Suitability using Remote Sensing in Sri Lanka
E Vinojan and HA Nalani 97

Automatic Symbol Generating from AutoCAD Civil3D
KP Manuranga, HMI Prasanna, AH Lakmal and NV Wickramathilaka 98

GIS and Remote Sensing Assisted Land Degradation Analysis in the Wilpattu Area, Sri Lanka <i>S Sujean and HA Nalani</i>	99
Risk and Spatial Pattern Analysis of CKDu in Sri Lanka: A Case Study in Monaragala District <i>RWDM Kumara and S Koswatte</i>	100
Space Borne Imaging for Urban and Rural Environments	101
An Analysis of Surface Green Cover Change and Urban Expansion in the Major Cities of Colombo, Kandy, and Galle <i>NW Srimalee Nanayakkara and KWG Rekha Nianthi</i>	102
Evaluation of Machine Learning Algorithms in Classifying Multispectral Imagery on Waterbody Extraction <i>K Brinthan, T Thanujan, S Thiruchittampalam and CL Jayawardena</i>	103
Quantification of Greenhouse Gas Emission from Construction Materials Used in Urban Cultural Heritage Buildings in Sri Lanka <i>SS Ranasinghe, MKM Prabodani, GY Jayasinghe and RU Halwatura</i>	104
Spatial Variability of NDVI and LST in Colombo District, Sri Lanka <i>GN Kaushalya</i>	105
Use of Satellite Images for Urban Form Detection: A Case Study of Ratnapura MC Area <i>NV Wickramathilaka, DS Munasinghe, KP Manuranga and KSLS Hasara</i>	106
Positioning and Navigation	107
A Geometrical Perspective of the Elliptical Movement of the Planets a Consequence of Two Circular Forces Directed towards the Foci <i>P Thunendran, DR Welikanna and HMI Prasanna</i>	108
Assessment of CORS Real-time Kinematics (RTK) Measurements on Geodetic GNSS Receiver and Unmanned Aerial Vehicle (UAV) in Sri Lankan Survey Perspective <i>Rajavarathan Jenan, Weerakkody Sachitha and Jayani Nadunika</i>	109
Detection of GPS-Levelling Datum Variation using Heterogeneous Data: A Case Study in Sri Lanka <i>HMI Prasanna and MDEK Gunathilaka</i>	110
Rapid Assessment of the Channel Clearance for Safe Navigation due to Fire-stricken 'MV X PRESS PEARL' Colombo Port, Sri Lanka <i>MDEK Gunathilaka and BMKAK Basnayake</i>	111

Managing Global Challenges through Fostering Innovation and Creativity 112

Plenary Speech by Professor WMC Bandara Wanninayake 113

Education, Marketing, Tourism and Environmental Management 115

A Review: Critical Analysis of the Impact of Global Warming on Business Innovations
KWMUP Gunasekara, Aruna Adhikari, Yasodhara Gunasekara and KABI Kuruppu 116

Current Status of Aqua-based Tourism Activities in the Southern Coastal Regions of Sri Lanka
AGK Gayashan, PCB Dias and EPDN Thilakarathne 117

Evaluating Tourist Expectations, Perceived Value, and Satisfaction of Tourists in Sri Lanka
Ruchira Ashain Vansanden, RAM Madhuwanthi and Asanka D Dharmawansa 118

Prediction of Construction and Demolition Waste Generation of Residential Projects in Sri Lanka
RGIMK Jayarathne and KHJ Imalka 119

The Status of Kite Surfing Industry in Kalpitiya Lagoon, Sri Lanka: Issues and Challenges
KPUT Egodauiyana, EPDN Thilakarathne, AP Abeygunawardena, WASW Lakmini and GAJ Sandamali 120

General Management, Information Technology and Administration 121

The Experiences and Reactions to Greenwashing from The Perspective of Green Consumers in Sri Lanka:
A Qualitative Research
MLM Mahawithana and HPR Priyankara 122

Influence of Social Media Advertising on Customer's Purchase Intention
SMF Shafnaz 123

An Evaluation of E-Government Applications in Sri Lanka
WN Sellaheewa and TD Samarasinghe 124

Indigenous Knowledge and Sri Lankan Models to Address Global Health Challenges 125

Plenary Speech by Professor Kamani Tennekoon 126

Advances and Challenges in Diagnostics, Therapeutics and Medical Education	127
Analysis on <i>Dashāngalepaya</i> (An Ayurveda medicinal paste) for Swelling of Joint Disorders – A Review <i>SNL Narathota and YSG Wimalasiri</i>	128
Conceptual Study on Modern Applicability of <i>Viruddha Ahara</i> (Incompatible Foods) in Ayurveda WSR to <i>Charaka Samhita</i> <i>WKT Dushmantha, MNF Naleefa and YSG Wimalasiri</i>	129
Critical Analysis of a Selected Herbal Hair Application Applicable as a Herbal Hair Dye for <i>Palithya</i> Relation to Premature Greying of Hair <i>MDP Ishara, YSG Wimalasiri and LMTID Gunathilaka</i>	130
Development of Pasteurized Milk Incorporated with Ginger, Turmeric and Pomegranate Pee Lextracts <i>PAL Jayathilake, MA Jayasinghe, J Walpita, MM Weerasekara and WDSA Wickrama</i>	131
Evaluating the Long Case Components of Final MBBS Clinical Assessment <i>Champika Gamakaranage, Yumal Chathurange and Saroj Jayasinghe</i>	132
Hepatoprotective Effects of Curcumin-Piperin-Nano-Conjugate against Chemically Induced Hepatocellular Carcinomain Rats <i>EDCT Chandrasekara, K Wijesundera, M Gunawardane, S Bogahawaththa and SP Kodithuwakku</i>	133
The Efficacy of the Newly Designed First Page for the Bed Head Ticket Compared to the Conventional First Page <i>Champika Gamakaranage and Saroj Jayasinghe</i>	134
Emerging Infections, Tropical Diseases and Health Hazards	135
Health Impacts of Gem Mining and Related Industrial Work in Sri Lanka : A Systematic Review <i>Champika Gamakaranage, Udayangani Ramadasa, Chamali Suboda Wijerathna, Uditha Udumulla and Saroj Jayasinghe</i>	136
Literature Review of <i>AJITA AGADA</i> for Poisoning Conditions <i>SMMD Keerthisnghe and YSG Wimalasiri</i>	137
Systemic Manifestations and Long-term Effects of Hump-nosed Pit Viper (<i>Hypnale</i> spp.) Envenoming in Sri Lanka: Need of Efficacious Antivenom <i>RMMKN Rathnayaka, PEAN Ranathunga and SAM Kulartne</i>	138

The First Identification of Multidrug Resistant Uropathogenic <i>Enterobacter hormaechei</i> Subsp. <i>Steigerwaltii</i> St93 from Sri Lanka <i>PDVM Perera, S Gamage, HSM de Silva, SK Jayatilleke, N de Silva, A Aydin, VI Enne and EM Corea</i>	139
Public Health Models and Challenges Facing Sri Lanka	140
Towards Developing a Model to Sustain Rehabilitation and Intervention Services for Children during the Pandemic <i>MGU Sampath, SR Vithana and SP Sumanasena</i>	141
Energy Availability of Sport Sciences and Physical Education Undergraduates in Sri Lanka <i>WAWS Rupasinghe, TSH Perera and MN Wickramaratne</i>	142
Establishing Trained Palliative Care Teams to initiate Palliative Care Services in Referral Hospitals in Sri Lanka : A Pilot Programme <i>Sankha Randenikumara, Udayangani Ramadasa, Dilhar Samaraweera, Suraj Perera, Gamini Pathirana, Ravini Karunatillake and Panduka Karunanayake</i>	143
Evolving Sri Lankan Model for Delivery of Palliative Care: 2010-2019 <i>Suraj Perera, Udayangani Ramadasa, Irosha Nilaweera, Janaki Vidanapathirana, Ruchira Ekanayake and Sankha Randeni Kumara</i>	144
Identifying Risk Factors of Total Cholesterol Level of Patients in Kegalle District, Sri Lanka <i>N Varathan and JL Keshini</i>	145
Envisioning the Future of Social Sciences and Humanities	146
Plenary Speech by Professor Liyanage Amarakeerthi	147
E-Learning in the Era of Pandemic	149
A Study of Reliability and Validity of Online Assessments During The Covid 19 Pandemic <i>HMSC Wijerathna and HMMP Wijerathna</i>	150
An Analysis of the Issues Faced by Local Chinese Language Teachers in Online Chinese Teaching During the COVID – 19 Pandemic Situation in Sri Lanka <i>TK Asela Prabath Kumara</i>	151
E-Class Diary as an Integrated Activity for Continuing Writing Skills in ESL Classes Through Padlet During Covid-19 <i>SA Gurusinghe and AS Karunarathne</i>	152

Parent's Perceptions towards E-Learning in Covid-19 Pandemic in Sri Lanka <i>LAMHP Liyadipita</i>	153
Study the Effort of Adopting to Online Learning in State Universities during the Covid-19 Pandemic in Sri Lanka <i>WN Sellahewa, TD Samarasinghe and NK Samarasinghe</i>	154
The Impact of Computer Assisted Language Learning in Learner Psychology During Covid-19 Global Pandemic: A Study with Reference to The Attitudes and Motivation Among Sri Lankan Intermediate Learners of English as a Second Language <i>DGK Amunugama, EMAN Ekanayake, NN Welgama, NP Wickramage and WADDU Wickramasinghe</i>	155
Economics	156
Decentralization of Power and Its Impact on Regional Development and Rural Development in Sri Lanka: A Case Study of Sabaragamuwa Provincial Council <i>Pradeep Uluwaduge, Piyuji Rasanja Mendis and Ruchira Perera</i>	157
Gig Economy and the Labour Law of Sri Lanka: A Proposal for a Safety Net for Workers <i>NKK Mudalige and AA Edirisinghe</i>	158
New Global Challenges on International Maritime Law <i>PKB Isuru Premarathna</i>	159
The Influence of Central Government Debt on Inflation Rate in the Sri Lankan Economy <i>AMK Weerakoon</i>	160
English Language Teaching	161
A Need Analysis Approach: An Investigation of Needs in an English for Specific Context <i>JDK Ruwandika</i>	162
A Statistical Analysis of Test Scores of Young Sri Lankan English as a Second Language (ESL) Learners in Onsite Summative and Online Summative Examinations <i>WKN Udara, CM Arsakulasuriya and GGC Madushika</i>	163
A Needs Analysis Seeking the Baseline for a Language Skills Curriculum :A Case of Non-Starter Engineering Apprentices <i>WMPYB Rathnayake</i>	164

Impact of Explicit Reading Strategy Instruction on Literal Reading Comprehension of ESL Learners in a State School in Sri Lanka <i>KW Yenushka and S Amarasiri</i>	165
Teaching Grammar Not a Fiasco Anymore: The Exploitation of the Inductive Approach to Teach Grammar in a University Context <i>Ruwan Gunawardane, Shavindra Chandradasa and HH Senevirathne</i>	166
The Effectiveness of the Compulsory English Language Program (CEP) of a State University in Sri Lanka <i>RA Kasun D Ramanayake and DMS Fernando</i>	167
Validity of an Online Reading Assessment: A Survey Among Sri Lankan University Students <i>Mohamed Ismail Fouzul Kareema and Ainol Madziah Bt Zubairi</i>	168
Linguistics and Language Studies	169
A Content Analysis on the Syntactic Features of Sri Lankan English Identifiable in Selected Sri Lankan English Dramas <i>CTD Chandranath</i>	170
A Study on the Impact of Task Based Language Teaching on Improving Chinese Writing Skills <i>GMTS Ranathunga</i>	171
Intangible Cultural Heritage and Cultural Untranslatability in English Translations of Sinhalese Literary Texts: A Comparative Study of the Trilogy by Martin Wickramasinghe and its English Translation <i>PS Manthirathna, SDGD Kalpage and NSDAB Siriwardena</i>	172
Literature, Feminism and Film Studies	173
An Exploration of the Impact of Male Gaze on the Feminine Identity and Sexuality in Sri Lankan Cinema: A Case Study of Asoka Handagama's Selected Works <i>NKHT Sankalpani and HAMA Hapugoda</i>	174
Does the Pursuit of Desire Elevate Womanhood into Emancipation and Self-Annihilation? Psychoanalysing "Madame Bovary" <i>DDD Mannapperuma</i>	175
Kazuo Ishiguro's Acclamation of British Self as the Authentic Place of Belonging - In relation to the Remains of the Day <i>JMAK Jayakody and HAMA Hapugoda</i>	176

Representation of Post - Colonialism and the Crisis of Identity through Salim's Character in the Novel <i>A Bend in the River</i> by V.S. Naipaul <i>DMTA Dissanayaka, GGCA Jayasooriya and HH Dahanayake</i>	177
Synchronization in Dubbing and the Responses of Different Age Groups <i>Amaya Nanayakkara</i>	178
Conceptualizing "De-territorialization" via Selected Literary Texts of Shyam Selvadurai and Nayomi Munaweera <i>WLRC Lekamge and HAMA Hapugoda</i>	179
"Uncaged Cage-Birds in The Storm": Convention and Feminine Individuality in Kate Chopin's <i>The Awakening</i> and Angela Carter's <i>The Bloody Chamber</i> <i>DCMS Dissanayake, GPH Pabodha, MMA Thasneem and WKR Tharindi</i>	180
Research and Education	181
A Comparative Study on Scientific and Literature Based Thematic Analysis in Social Science and Humanities Researches: A Case of University of Sri Jayewardenepura Sri Lanka <i>SD Jayarathne, MJRS Fernando and NLK Sandunika</i>	182
A Textual Analysis of the Pedagogical Framework of Poetry in <i>The Appreciation of English Literary Texts</i> at the G.C.E. O/L in the Sri Lankan Context in Relation to the Overtly Specified Thematic Prescription(s) <i>RM Wijayawardhana, SVW Udugahapattuwa, R Jayaratne and R Weerakoon</i>	183
Characteristics Associated with the Metacognitive Awareness of Mathematics Teachers at the Junior Secondary Level of Education in Sri Lanka <i>Kavinda Wijethunga and Subhashine Wijesundara</i>	184
Factors Affecting to the Motivation of Female Academics on their career: A Case Study at University of Sri Jayewardenepura, Sri Lanka <i>WN Sellaheewa and TD Samarasinghe</i>	185
Nudging in Online Education: Interventions on Undergraduate Students' Level of Engagement, Sri Lanka <i>RMMP Rathnayaka and HMISK Herath</i>	186
Perception of the Impact of Grade Five Scholarship Examination on Tertiary Education in Sri Lanka <i>HSV Fernando, GLNPK Silva and RPCK Jayasinghe</i>	187

Sociology	188
Anthropology of Structural Transformations of Modern Chena Cultivation in Sri Lanka <i>AS Ananda, AA Shantha, HS Senevi and KPLN Patabandi</i>	189
Criminal Behavior of Drug users in urban Sri Lanka: With Special Reference to Colombo District <i>SWP Kumara</i>	190
Parental Knowledge About Early Childhood Development in Estate Sector in Sri Lanka <i>Kumari Thoradeniya</i>	191
Tackling Environmental Degradation as a Global Challenge: An “Egbe Bere Ugo Bere” Philosophical Approach <i>Linus Oluchukwu Akudolu</i>	192
Eco-friendliness and Sustainability of Shifting Cultivation in Sri Lanka: A Review of Current Management Practices of Shifting Cultivation in the Dry Zone <i>KPLN Patabandi, AA Shantha, S Ananda and HS Senevi</i>	193
Innovative Technologies for Sustainable Development	194
Plenary Speech by Dr. Rajitha Gunarathne	195
Bio-systems Technologies	197
Evaluation of Accuracy in Hand Grading Technique of Corpora Lutea in Recipient Cows at Multiple Ovulation and Embryo Transfer <i>GDRK Perera, YK Jayawardana, GM Vidura and PBD Alexander</i>	198
Investigating the Potential of Bioethanol Production using Different Palmyrah Products <i>RF Rosana, GAAR Perera, EA Lakmini Lochana, Arumham Vengadaramana and Robika Pathmaraj</i>	199
Transfection of MCF-7 Cells for Targeted Knockout of PFK-2 Using CRISPR/Cas9 System <i>LWN Madhusanka, SPE Jayaweera, KOT Jayasinghe and GN Silva</i>	200
Data Science Application & Computational Technology	201
Hate Speech Detecting In Social Media (Twitter) Using Text Mining <i>KR Hingurage and DS Vithanage</i>	202
Information Systems Applications in Quality Assurance of State Universities in Sri Lanka <i>HMC Pushpakumara, Prasad M Jayaweera and MK Wanniarachchige</i>	203

Strengthening the Technovation Generation and Dissemination Links among the Key Stakeholders of Internationalized Public Private Partnership Extension Approach: Lessons Learnt from Internationalized Tech-based Tea SMEs in Matara and Rathnapura Districts of Sri Lanka <i>WMSN Fernando, SWSB Dasanayaka and D Mudalige</i>	204
Engineering Technology	205
Investigation of Frequency Evolution of Gravitational Waves From Core Collapse Supernova by Hilbert-Huang Transform <i>LMM De Silva, Toru Sasaki, Katsuko T Nakahira and Hirotaka Takahasi</i>	206
Reliability Comparison of Weather Data of PVGIS, NREL and Solcast for PV Solar Energy Generation Forecasting <i>DKA Induranga and Geekiyanage Viduruwan</i>	207
A Method for Warning with Visually Impaired People Using the Vibrational Technology in Smart Phones <i>KVHC Dharmapriya and JKDBG Jayaneththi</i>	208
Thermal Conductivity Measuring Sensor Using Arduino Microcontroller <i>MKNJ Kumarage and NRAM Ruwangika</i>	209
A Sustainability Assessment Model for Prefabricated Building Construction Projects in Sri Lanka <i>AAF Aqsha, Harshini Mallawaarachchi, Dimuthu Vijerathne and R Dilakshan</i>	210
Design and Fabrication of a Single Belt Dual Purpose Telescopic Conveyor <i>MBUM Wijayagama and HL Subhasinghe</i>	211
Development of Novel Activated Carbon Composite Material Derived from Coconut Shell and Natural Clay for Water Purification <i>GSM Perera, HMJC Pitawala and GBS Gunawardana</i>	212
Film Properties of Pre - vulcanized Natural Rubber Latex Films Produced out of Creamed Latex <i>WMDS Lakshani, UMS Priyanka, S Siriwardana, EAL Lochana and AMWK Senevirathna</i>	213
Machine Learning	214
Classification of Letters for Sri Lankan Universities Using Text Mining <i>MDAV Gunathilaka and KHJ Imalka</i>	215
Convolutional Neural Network Based Approach for Identification of Black Ruby Barb <i>LLG Chathuranga, KAA Chathuragi and RMKT Rathnayaka</i>	216

Data Mining in Education: An Approach in Predicting Employability of Undergraduates using Naïve bayes classification Algorithm <i>WSCS Premathilaka and KHJ Imalka</i>	217
Predictive Analysis of Ceylon Cinnamon Market Price Fluctuations Using Artificial Neural Networks <i>RHMGU Alawathugoda and KHJ Imalka</i>	218
Guidance on Selecting Promising Business Ideas through Machine Learning <i>DD Sahan Thiranjaya and CR Liyanage</i>	219
Panel of Reviewers	220
Author Index	228
The Sabaragamuwa University Journal	233
‘Sabaragamuwa Viśvavidyāliya Śāstrīya Samgrahaya’	234