Scientific Program

Monday, December 3rd, 2018

Time	Speaker		Title
08:30-09:00	Opening ceremony		
Session 1			***Chairperson: Duangjai Nacapricha, Victor Cerdà***
09:00-09:30	OL	Kate Grudpan	Flow analysis: Past, Today and Beyond
09:30-10:00	PL-01	Gary D. Christian	The evolution of flow injection analysis and flow analysis conferences
10:00-10:30	PL-02	Elias A.G. Zagatto	The many facets for implementing flow analysis and projections for further development
10:30-10:50	*Coffee Break*		
Session 2			***Chairperson: Norio Teshima, Spas D. Kolev***
10:50-11:20	PL-03	Paul Worsfold	Flow injection techniques for investigating ocean biogeochemistry
11:20-11:50	PL-04	Shoji Motomizu	Flow-based chemical analysis (FCA) in Japan: its start/beginning and development, the activity on FCA in Japan and the international collaboration
11:50-12:20	PL-05	Orawan Chailapakul	Limitless applications of flow-based system for analytical method
12:30-13:30	*Lunch*		
Session 3			***Chairperson: Aristidis N. Anthemidis, Jin-Ming Lin***
13:30-13:50	KL-01	Wolfgang Frenzel	The role of FIA/SIA in solving analytical problems in environmental research: A critical stock-taking
13:50-14:10	KL-02	Norio Teshima	On-line sample pretreatments by flow-based analysis methods
14:10-14:25	IL-01	Jaroon Jakmunee	A miniaturized hydrodynamic sequential injection system: a low-cost, efficient and environmentally friendly flow analysis
14:25-14:40	IL-02	Supalax Srijaranai	Applications of surfactants in analytical Separation
14:40-14:55	OP-01	Masaki Takeuchi	Nafion tube-based on-line concentrator: preconcentration of perchlorate for ion chromatography
14:55-15:10	OP-02	Irina Timofeeva	Automated techniques for the determination of selenium in complex sample matrices
15:10-15:25	OP-03	Kamil L. Strzelak	The MCFA system for immunochemical determination of transferrin in human serum with DIY mobile phone control
15:25-16:25	*Coffee Break and Poster Session A*		
Commercial Technology & Student Oral Session 1			***Chairperson: Raquel B.R. Mesquita, Maliwan Amatatongchai***
16:25-16:40	CT-01	Thai Unique Co., Ltd.	
16:40-16:50	SOP-01	Kaewta Danchana	Multisyringe flow injection analysis for the spectrophotometric determination of uranium(IV) with 2-(5-Bromo-2-Pyridylazo)-5-Diethylaminophenol

Time	Speaker		Title
16:50-17:00	SOP-02	Elodie Mattio	MPFS system for spectrophotometric determination of mercury in water with 3D-printed grafted device
17:00-17:10	SOP-03	Rana Chehab	Multi-syringe chromatography system for the on-line analysis of inorganic chloramines
17:10-17:20	SOP-04	Natchanon Taprab	Formaldehyde screening in food samples using paper-based titration
17:20-17:30	SOP-05	Kesara Ar-sanok	In-tip monolithic solid phase micro-extraction for ractopamine and clenbuterol analysis by HPLC

Tuesday, December 4th, 2018

8:30 – 18:00 One Day Excursion in Ratchaburi Province:
1) Boat Trip at Damnoen Saduak Floating Market
2) 'Bang Lae' Coconut Farm and Sugar Processing
3) The Blooms Orchid Park

Wednesday, December 5th, 2018

Time	Speaker		Title
Session 4			***Chairperson: Paweł Kościelniak, Akhmad Sabarudin***
08:30-08:50	KL-03	Graham D. Marshall	Lessons learned using programmable Flow Injection while replicating a method for determination of traces of zinc in sea water
08:50-09:10	KL04	Aristidis N. Anthemidis	A prototype of a new idea: Dual-lab-in-syringe platform for automatic on-line pressure-assisted headspace gas-liquid microextraction
09:10-09:30	KL-05	Andrey Bulatov	Automated liquid-liquid microextraction based on flow systems: recent advances and applications
09:30-09:45	IL-03	Lukman Hakim	Development of computer-controlled flow chemical analysis
09:45-10:00	IL-04	Hong Heng See	Lab-on-a-chip device for point-of-care clinical diagnostics
10:00-10:15	IL-05	Napaporn Youngvises	Innovative green analytical chemistry methods based on miniaturized system
10:15-10:30	OP-04	Andrey Shishov	Deep eutectic solvents as a new type of green extractants. Application in flow analysis
10:30-10:50	*Coffee Break*		
Session 5			***Chairperson: Wolfgang Frenzel, Andrey Bulatov***
10:50-11:10	KL-06	Paul S. Francis	Flow analysis of short-lived reaction intermediates in chemiluminescence and photoredox catalysis systems

Time	Speaker		Title
11:10-11:30	KL-07	António O.S.S. Rangel	Exploring specially designed solid interfaces for improved detection platforms in flow and micro-flow analysis
11:30-11:45	IL-06	Susana S.M.P. Vidigal	Flow based systems coupled to separation techniques applied to wine samples
11:45-12:00	IL-07	Burkhard Horstkotte	Continuous dispersive liquid-liquid extraction of mono-nitrophenols from water samples exploiting the Lab-In-Syringe technique and a novel approach to multivariante spectrum analysis including back-extract background simulation
12:00-12:15	IL-08	Ivana H. Šrámková	Flow techniques and sample preparation – the perfect couple
12:15-12:30	OP-05	Marcin Wieczorek	3D-printed flow manifold dedicated to water analysis based on the potentiometric measurements with solid-state ion-selective electrodes
12:30-13:30	*Lunch*		
Session 6 & Commercial Technology			***Chairperson: Jaroon Jakmunee, Anastasios Economou***
13:30-13:50	KL-08	Eric Bakker	In situ sensing and flow analysis with chemicaliIon sensors
13:50-14:05	IL-09	Rasamee Chaisuksant	Low cost glucose sensor from modified pencil electrode
14:05-14:20	IL-10	Maliwan Amatatongchai	Novel molecularly imprinted polymers (MIP)-coated nanomaterials for amperometric sensing of pesticides in food analysis
14:20-14:35	OP-06	Alex D. Batista	Liquid-liquid flow-based microextraction for the determination of peroxide value in olive oils
14:35-14:50	CT-02	Bara Scientific Co., Ltd.	
14:50-15:50	*Coffee Break and Poster Session B*		
Student Oral Session 2			***Chairperson: Hong Heng See, Piyada Jittangprasert***
15:50-16:00	SOP-06	Katerina Fikarova	Automatic investigation of the bioaccessibility of phthalates and bisphenol A from microplastics in seawater under flow-through dynamic extraction conditions using an on-line switching valve HPLC system
16:00-16:10	SOP-07	Chacriya Malasuk	Novel 3D printing optical device based on silicone optical technology (SOT): application on flow injection analysis
16:10-16:20	SOP-08	Duangduean Thepnuan	Method comparison of levoglucosan analysis in ambient fine particles between GC-MS and HPAEC-PAD
16:20-16:30	SOP-09	Michał Michalec	3D-printed flow analysis systems for monitoring of experimental hemodialysis therapy.
16:30-16:40	SOP-10	Supatana Buking	Band-length detection on paper device for analysis of lead in gunshot residue on fabrics and estimation of firing distance

Time	Speaker		Title
16:40-16:50	SOP-11	Yang Zhao	A novel method for automatically quantify peroxidase activity and ascorbic acid in biological samples by using a guaiacol/peroxidase/H_2O_2 reaction system
16:50-17:00	SOP-12	Yanisa Thepchuy	Microfluidic paper-based analytical devices (μPADs) for the determination of total ammonia nitrogen in saliva
17:00-17:10	SOP-13	Nirusnee Cheboo	Three phase partitioning micro-extraction and comparison of ultra performance liquid chromatography with high performance liquid chromatography diode array detector for determination of coenzyme Q_{10} in commercial dietary supplements
17:10-17:20	SOP-14	Yumeki Tani	Acceleration mechanism of vesicles via optical pressure in the presence of gold nanoparticles

Thursday, December 6th, 2018

Time	Speaker		Title
Session 7			***Chairperson: Mirek N. Macka, Purim Jarujamrus***
08:30-08:50	KL-09	Daniel Citterio	Capillary flow-driven analytical devices for sample-in-signal-out assaying of clinically relevant analytes
08:50-09:10	KL-10	Spas D. Kolev	Microfluidic paper-based analytical device (μPAD) for inorganic arsenic speciation in water samples based on hydride generation
09:10-09:25	IL-11	Jaruwan Mettakoonpitak	Low-cost analytical devices for metals analysis of particulate matter
09:25-09:40	IL-12	Raquel B.R. Mesquita	Design of microfluidic paper-based devices as disposable, easy-to-use solutions for on-hand, real time analysis
09:40-09:55	IL-13	Takashi Kaneta	Paper-based analytical devices using chromatographic principle
09:55-10:10	IL-14	Amara Apilux	Development of a lateral flow immunochromatographic assay for rapid screening test of salivary cortisol
10:10-10:30	*Coffee Break*		
Session 8			***Chairperson: Daniel Citterio, Takashi Kaneta***
10:30-10:50	KL-11	Anastasios Economou	Gradient-elution low-pressure separations based on continuous flow rate modulation
10:50-11:05	IL-15	Purim Jarujamrus	Acid-base titration using microfluidic thread-based analytical devices (μTADs)
11:05-11:25	KL-12	Petr Solich	Separation in flow-based methods: Current status
11:25-11:40	IL-16	Akhmad Sabarudin	Preparation of monolithic adsorbent column for on-line collection/concentration of trace elements and their determination by ICP-MS

Time	Speaker		Title
11:40-11:55	IL-17	Rodjana Burakham	Sorbent materials for preconcentration of toxic residues using solid-phase extraction and liquid chromatography: Offline and online approaches
11:55-13:00	*Lunch*		
Session 9			***Chairperson: Petr Solich, Phoonthawee Saetear***
13:00-13:20	KL-13	Peter C. Hauser	Microfluidic systems assembled from miniaturized discrete components
13:20-13:40	KL-14	Mirek N. Macka	Miniaturised capillary LC as an open-source toolbox
13:40-13:55	IL-18	Leena Suntornsuk	Analytical challenges in pharmaceutical analysis
13:55-14:10	IL-19	Rattikan Chantiwas	Robust method for micellar electrokinetic chromatography with UV detection: applications to analysis of indole compounds
14:10-14:30	*Coffee Break*		
Session 10			***Chairperson: Rodjana Burakham, Ryoichi Ishimatsu***
14:30-14:50	KL-15	Jin-Ming Lin	Peroxynitrous acid induced chemiluminescence of fluorescent carbon dots for flow analysis of nitrite
14:50-15:05	IL-20	Jian Ma	Development of an integrated Syringe-pump-based Environmental-water Analyzer (iSEA)
15:05-15:20	OP-07	Hitoshi Mizuguchi	High-performance liquid chromatography with a dual-electrode detector constructed using track-etched microporous membrane electrodes
15:20-15:35	OP-08	Edgar Paski	Metrological traceability considerations for FIA/SIA based methods used in laboratories accredited to ISO/IEC 17025:2017
15:35-15:50	OP-09	Nantanit Wanichacheva	Novel Cu^{2+} and Fe^{3+}-sensitive and selective colorimetric and fluorescent Sensors: Utilizations in batch, flow analysis and living cell imaging
16:30	Leave for Banquet		
18:00-21:00	*Banquet*		

Friday, December 7th, 2018

Time	Speaker		Title
Session 11			***Chairperson: Jose L.C. Lima, Peter C. Hauser***
09:00-09:30	PL-06	Victor Cerdà	Automation of radiochemical analysis by flow techniques applied to environmental samples
09:30-09:50	KL-16	Paweł Kościelniak	Flow calibration procedures in the light of "green analytical chemistry"
09:50-10:05	IL-21	Hermin Sulistyarti	Development of flow injection-spectrophotometry for selective determination of hydroquinone in cosmetics
10:05-10:20	OP-10	Chadin Kulsing	Experimental design and multidimensional approaches for improved analysis of complex samples
10:20-10:35	OP-11	Sumonmarn Chaneam	Utilization of natural extract from orchid flower for trace analysis: Application of copper and ammonia nitrogen in environmental samples
10:35-10:55	*Coffee Break*		
Session 12			***Chairperson: António O.S.S. Rangel, Eric Bakker***
10:55-11:15	KL-17	Adisorn Tuantranont	Printed graphene sensors: From research to commercialization
11:15-11:35	KL-18	Duangjai Nacapricha	Planar configuration of capacitively coupled contactless conductivity detection for analysis on paper devices
11:35-11:50	IL-22	Atitaya Siripinyanond	Use of field-flow fractionation and atomic spectrometry for size profiling of nanoparticles
11:50-12:05	OP-12	Ryoichi Ishimatsu	Flow injection analysis for diphenylether herbicides with ELISA based on light absorption of polyaniline
12:05-12:35	CL	Purnendu K. Dasgupta	Misnamed detectors in flow analysis
12:35-12:50	Closing Remark		
12:50-14:30	*Lunch*		

List of Posters

Poster Session 1: **Odd *numbers*** on Monday, December 3rd during 15:25-16:25.

Chairperson: *Shoji Motomizu, Peter C. Hauser, António O.S.S. Rangel, Daniel Citterio, Akhmad Sabarudin, Sumonmarn Chaneam, Nuanlaor Ratanawimarnwong*

Poster Session 2: ***Even numbers*** Wednesday, December 5th during 14:50-15:50.

Chairperson: *Gary D. Christian, Victor Cerdà, Spas D. Kolev, Norio Teshima, Takashi Kaneta, Phoonthawee Saetear, Rattikan Chantiwas*

P-001 **Development of the flow multicell for optical DNA detection**
Andrey Ipatov, Portugal

P-002 **Development of the automatic system for DNA analysis**
Andrey Ipatov, Portugal

P-003 **Multisyringe flow injection analysis (MSFIA) for the automatic determination of total iron in wines**
Piyawan Phansi, Thailand

P-004 **Membraneless pervaporation - flow injection system for determination of dissolved ammonia in Saen Seap canel**
Nuanlaor Ratanawimarnwong, Thailand

P-005 **Automatic on-line ammonium determination in recycling water system in the International space station using a hybrid system**
Georgia Giakisikli, Greece

P-006 **Multipumping flow system for the automatic determination of free and total sulfites in wines with conductimetric detection**
Kaewta Danchana, Spain

P-007 **Bromate determination in natural waters and soil leachates using sequential injection analysis**
Raquel B.R. Mesquita, Portugal

P-008 **Use of solid-phase extraction in a sequential injection mode for the determination of micronutrients**
Raquel B.R. Mesquita, Portugal

P-009 **Sequential injection multi-parametric determination in urine: Iodide, Creatinine and NOx**
Raquel B.R. Mesquita, Portugal

P-010 **Photoimmobilization of sorbent disks on 3D printed stirred sorptive devices for trace metals determination**
Victor Cerdà, Spain

P-011 **Multi-pumping flow system (MPFS) for total iron determination in wine samples using spectrophotometric detection.**
Victor Cerdà, Spain

P-012 **Lab-on-valve system for ^{131}I extraction from biological and hospital waste samples previous liquid scintillation detection**
Victor Cerdà, Spain

P-013 **3D printed device for uranium extraction exploiting a SIA system**
Victor Cerdà, Spain

P-014 **Spectrofluorimetric determination of iodide in urine samples without pretreatment using a miniaturized analyzer chip in a multi-syringe flow system**
Joana L. A. Miranda, Portugal

P-015 **Novel amperometric flow injection analysis of creatinine using copper oxide nanoparticles coated with a molecularly-imprinted polymer modified carbon-paste electrode**
Nongyao Nontawong, Thailand

P-016 **Development of a flow analysis system for determination of phosphate in ground water**
António O. S. S. Rangel, Portugal

P-017 **Study on enzymatic phenol removal from water using flow-based method**
Watcharapong Wongkeaw, Thailand

P-018 **Towards sequential injection system incorporated with a 3D-printed dialyzer for automated and direct quantitation of GABA in foodstuffs and supplements**
Nathawut Choengchan, Thailand

P-019 **Monofluorophosphate – the simplest substrate for optical detection of alkaline phosphatase activity in flow analysis format**
Marta Fiedoruk-Pogrebniak, Poland

P-020 **Urease activity assay in flow analysis format**
Justyna Bzura, Poland

P-021 **Determination of total phenolic content in wines using Folin-Ciocalteu assay in flow injection analysis system**
Thinnapong Wongpakdee, Thailand

P-022 **Flow analysis strategies for determination of concentration and biological activity of two blood serum proteins - transferrin and ceruloplasmin**
Natalia Monika Rybkowska, Poland

P-023 **Flow analysis system with dedicated optoelectronic detector and 3D-printed cuvette for photometric determination of fluorides**
Justyna Bzura, Poland

P-024 **Development of full-automated flow system to evaluate oxidative potential of $PM_{2.5}$**
Chikako Cheong, Japan

P-025 **Development of a simple FIA device using an LED-based photometric detector and micro-ring pumps**
Yasutada Suzuki, Japan

P-026 **Development of chemiluminescence flow injection procedure for the determination of hydroquinone in cosmetics after extraction by magnetic solid phase nanoparticles**
Sakchai Satienperakul, Thailand

P-027 **Novel simple approaches to flow titration**
Paweł Kościelniak, Poland

P-028 **Development of a flow-based system for the determination of protein content in microbiological samples**
Susana S. M. P. Vidigal, Portugal

P-029 **Fluorometric esterase activity assays in flow analysis format**
Justyna Skoczek, Poland

P-030 **Cross injection analysis with chemiluminescence detection**
Thachkorn Somboonsuk, Thailand

P-031 **Exploring flow analysis tools for monitoring calcium and magnesium in soil leachates from laboratory scale soil columns (LSSCs)**
Carolina F.F.A. Costa, Portugal

P-032 **Automatic systems for estimating bioaccessible forms of cadmium and lead in sediment samples detected by monosegmented sequential injection greener anodic stripping voltammetry**
Autchara Paukpol, Thailand

P-033 **A Novel flow configuration design for the electrochemical polymerization of polypyrrole to be used for potentiometric titration**
Chatchalida Boonpanaid, Thailand

P-034 **Determination of paraben using simultaneous injection effective mixing flow analysis system and chemiluminescence detection**
Prapatsorn Jitthiang, Thailand

P-035 **Integrated in-house detectors with flow injection analysis system for simultaneous determination of urea and creatinine in human urine samples**
Kamparnart Kaewyai, Thailand

P-036 **Method development based on turbidimetric flow analysis for sulfite determination**
Aulia Ayuning Tyas, Thailand

P-037 **Optimization of flow injection (FI) – spectrophotometry for hydroquinone analysis**
Muhammad Iqbal Fahmi, Indonesia

P-038 **Development of membraneless vaporization unit for arsenic determination**
Nuanlaor Ratanawimarnwong, Thailand

P-039 **Flow analysis with natural materials**
Kate Grudpan, Thailand

P-040 **Flow enzymatic biosensors for amperometric determination of catecholamines**
Bohdan Josypcuk, Czech Republic

P-041 **From flow injection analysis to lateral flow analysis**
Kate Grudpan, Thailand

P-042 **Screen-printed graphene electrode devices integrated with flow injection for sensing and detection of iodide**
Wichayaporn Kamsong, Thailand

P-043 **Flow analysis employing dual detection systems**
Kate Grudpan, Thailand

P-044 **Computer-controlled mobile chemical analysis (CC-MCA) for multi-component determination: flow systems, detectors and data processing**
Shoji Motomizu, Japan

P-045 **Flow analysis with radioactivity**
Kate Grudpan, Thailand

P-046 **Flow injection amperometric sensor based on graphene nanoribbons-ionic liquid-cobalt phthalocyanine composite modified screen-printed carbon electrode for detection of fenobucarb**
Kanjana Kunpatee, Thailand

P-047 **Flow methods for titration**
Kate Grudpan, Thailand

P-048 **Cost-effective liquid core waveguide with a high refractive index modified clad core liquid for sensitivity enhancement in flow analysis system**
Wasin Somboot, Thailand

P-049 **Development of droplet-based microfluidics for second-dimension protein separations**
Nuchutha Thamsumet, Thailand

P-050 **Printed low-cost microfluidic analytical devices based on a transparent substrate**
Shogo Fujisaki, Japan

P-051 **Novel 3D lab on a chip for determination of cinnarizine in tablet dosage form**
Natthaya Siangdee, Thailand

P-052 **Mixing process of ternary mixed solutions in a tapered-microchannel and application to sensing microfluidic flow analysis**
Ryuki Mori, Japan

P-053 **Arsenic monitoring in groundwater samples with microchip spectrometric device**
Waraporn Threeprom, Thailand

P-054 **A microfabrication of double-sided microfluidic device incorporating to optical sensor for multi-analysis of some pharmaceuticals**
Hoa Thuan Nguyen, Thailand

P-055 **Determination of titratable acidity in wines in an automatic spectrophotometric analytical microsystem**
Susana S. M. P. Vidigal, Portugal

P-056 **Development of a compact size microplate reader for maintaining the cellular conditions**
Yuta Nakashima, Japan

P-057 **Use of microwave-synthesized gold nanocluster as luminescence sensor for determination of iodate by spectrofluorometric detection on microfluidic paper-based analytical devices**
Aurachat Lert-itthiporn, Thailand

P-058 **Lab on cotton swab for extraction and detection of cyanide in concrete roofing tiles and drinking waters**
Thanatcha Chaida, Thailand

P-059 **Development of microfluidic hydrodynamic sequential injection for water quality monitoring**
Wanpen Khongpet, Thailand

P-060 **In situ measurement of unbound cobalt ions in equilibrium with polyethyleneimine and its functionalized nanoparticles using chemiluminescence detection on a microfluidics system**
Prawpan Inpota, Thailand

P-061 **Paper-based analytical device for power-free zinc ion concentration and quantification in water samples**
Hiroko Kudo, Japan

P-062 **Paper-based device for naked-eye detection of urinary albumin-creatinine ratio**
Ryuya Hiraoka, Japan

P-063 **Highly sensitive and selective electrochemical paper-based device (ePAD) using graphite screen printed electrode modified with nanoparticle coated with MIP for serotonin determination**
Jirayu Sitanurak, Thailand

P-064 **Development of paper-based enzyme-linked immunosorbent assay (P-ELISA) using silver nanocomposite as enzyme mimics label for specific and sensitive determination of salbutamol (SAL)**
Nutthaporn Malahom, Thailand

P-065 **Design and assembly of microfluidic paper-based analytical devices (µPAD) for the quantification of nitrite and nitrate in saliva**
Francisca T. S. M. Ferreira, Portugal

P-066 **Microfluidic LED&Paper-based analytical tool for medical diagnostics of calcemia/phosphatemia**
Marta Fiedoruk-Pogrebniak, Poland

P-067 **A novel paper-based arsenic detection using mercaptosuccinic acid capped CdTe quantum dots.**
Oraphan Thepmanee, Thailand

P-068 **Device configurations for membraneless gas-separation: from tubular-based flow system to microfluidic paper-based analytical devices**
Thinnapong Wongpakdee, Thailand

P-069 **Microfluidic paper-based devices for arsenic(V) detection in contaminated environmental samples**
Narin Taokaenchan, Thailand

P-070 **Paper-based DPPH assay for antioxidant activity analysis**
Kitima Sirivibulkovit, Thailand

P-071 **Hollow fiber membrane liquid phase microextraction (HF-LPME) technique coupled with paper-based analytical devices for determination of hexavalent chromium in beverages samples.**
Waleed Alahmad, Thailand

P-072 **Barcode-like paper sensor using smartphone for environmental monitoring: An application of magnesium detection**
Rattapol Meelapsom, Thailand

P-073 **A simple microfluidic paper-based analytical device (μPADs) for simultaneous determination of NO_2^- and NO_3^- in Gunshot residue sample (GSRs)**
Thanakorn Pluangklang, Thailand

P-074 **Gold/Silver core shell nanoparticles on distance-based paper sensor and application for colorimetric sensing of ascorbic acid detection**
Papichaya Khatha, Thailand

P-075 **Colorimetric paper-based analytical devices for iodate quantification in iodized table salts**
Saowapak Teerasong, Thailand

P-076 **Simple fabrication of a contact-stamping microfluidic paper-based analytical devices for measurement of urinary albumin to creatinine ratio based on standard addition approach**
Arjnarong Mathaweesansurn, Thailand

P-077 **A distance-based detection of antioxidant activity using paper-based devices and nanoceria**
Benjarat Tasangtong, Thailand

P-078 **A Paper-based device for simultaneous determination of total phenolic content and antioxidant activity**
Chanoknan Puangbanlang, Thailand

P-079 **A 3D sequential microfluidic platform using paper-based analytical device**
Abdulhadee Yakoh, Thailand

P-080 **Ultrasensitive electrochemiluminescence microfluidic paper-based analytical device based on quantum dots amplification and the quenching effect by selected tertiary amines**
Nisachon Praoboon, Thailand

P-081 **A xerogel colorimetric sensor grafted lab on paper for the determination of promethazine abused in lean cocktails**
Apichai Phonchai, Thailand

P-082 **An electrochemiluminescence inhibition methods for highly sensitive detection of oxytetracycline via microfluidic paper-based analytical devices with egg white-encapsulated gold nanoclusters**
Suphawuth Siriket, Thailand

P-083 **Specially designed hydrophilic 3,4-HPO chelators to be used as chromogenic reagents for iron in a microfluidic paper-based analytical device**
Tânia Moniz, Portugal

P-084 **Improvement of efficiency for anions separation by capillary electrophoresis with conductivity detection**
Apinya Obma and Rawiwan Bumrungpuech, Thailand

P-085 **More than just pH indicator: butterfly pea tea as reagent on microfluidic paper-based analytical device for quantitation of acid.**
Bhim Kumar Kharka, Thailand

P-086 **Membraneless gas-separation microfluidic paper-based analytical devices and its applications based on colorimetric detection**
Nutnaree Fukana, Thailand

P-087 **Conception of low-cost 3D printed photometric flow cells and mixers: application to nitrite determination in waters**
Elodie Mattio, France

P-088 **Chitosan coated magnetite nanoparticle as a working electrode for determination of Cr(VI) using square wave adsorptive cathodic stripping voltammetry**
Sasithorn Muncharoen, Thailand

P-089 **Flow-through optoelectronic detectors fabricated by 3D printing.**
Michał Michalec, Poland

P-090 **Colorimetric determination of minoxidil based on aggregation of gold nanoparticles**
Chomphunud Duangdeewong, Thailand

P-091 **Iron oxide magnetic nanoparticles for antioxidant activity analysis**
Pacharaporn Thongsuk, Thailand

P-092 **SPR Immunosensor using Indirect Competitive Inhibition Immunoassay with Secondary Immunoreaction**
Kinichi Morita, Japan

P-093 **Improvement of soft scattering filter at 260 / 280 nm for portable DNA sample evaluation**
Yuji Oki, Japan

P-094 **Statistical evaluation of conventional and portable instrumentations for Cr(VI) analysis on chemistry caboratory's waste water**
Suherman, Indonesia

P-095 **Preparation and characterization of magnetic nanoparticles modified by oleic acid and chitosan loaded doxorubicin as a candidate for drug delivery agent**
Ika O Wulandari, Indonesia

P-096 **Direct potentiometric titration on pocket pH sensor**
Thitaporn Sonsa-ard, Thailand

P-097 **Molecular dynamics simulation of a reversible hydrophobic-hydrophilic functionalized surface**
Irwansyah Putra Pradana, Indonesia

P-098 **Direct voltammetric determination of sulfite based on detection of sulfur dioxide on screen-printed carbon electrodes**
Paithoon Prasertying, Thailand

P-099 **On the microscopic wetting and water droplet behaviors**
Ravi Mahesta, Indonesia

P-100 **Sensor for direct detection of Vibrio cholerae in frozen food**
Panwadee Wattanasin, Thailand

P-101 **Backscattering interferometer: A flow-through detector suitable for size-based determiantion of polysaccharides**
Phoonthawee Saetear, Thailand

P-102 **An on line LOV-μSPE coupled with HPLC-DAD for determination of flavonoids in citrus juices**
Victor Cerdà, Spain

P-103 **β-hydroxymyristic acid determination by multi-syringe chromatography for endotoxin detection in dialysis water**
Jean-Luc Boudenne, France

P-104 **Sequential injection system incorporating a magnetic solid-phase extraction unit for trace analysis of orthophosphate in water**
Kamonthip Sereenonchai, Thailand

P-105 **Identification of formaldehyde derivatized with N,N'-bis(9-anthrylmethyl)-propane-1,3-diamine**
Takashi Yokoyama, Japan

P-106 **The determination of artemisinin in drug and plant samples by high performance liquid chromatography and a developed electrochemical sensor**
Chulalak Damphathik, Thailand

P-107 **Preparation of trypsin-immobilized monolithic column for on-line protein digestion**
Akhmad Sabarudin, Indonesia

P-108 **Phase separation multi-phase flow using an aqueous two-phase polyethylene glycol/trisodium citrate mixed solution system and its application to flow analysis**
Aya Yoshioka, Japan

P-109 **Combination of a preconcentration technique with a handheld spectrometer for on-site determination of trace nickel with a-Furil Dioxime**
Hitoshi Mizuguchi, Japan

P-110 **Development of tube radial distribution chromatography based on phase separation multiphase flow created via pressure loss**
Susumu Wada, Japan

P-111 **Challenge of chemometrics versus liquid chromatography approaches for determination of combined drugs**
Chutima Matayatsuk Phechkrajang, Thailand

P-112 **Determination of bisphenol A by HPLC-UV method with pipette tip monolithic solid phase extraction.**
Patcharin Chaisuwan, Thailand

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