

# The Twenty-Sixth International Conference on Solid Waste Technology and Management

**Philadelphia, PA, USA**

**March 27 - 30, 2011**

## **AGENDA**

(updated March 17, 2011)

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Susan Finan  
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**Widener  
University**

The Journal of Solid Waste Technology and Management



**Scientific Committee:**

- Haluk Akgun, Middle East Technical University, Turkey
- Giuseppe Bonifazi, Sapienza – Università di Roma, Italy
- Shouu-Yuh Chang, North Carolina A&T State University, USA
- Thomas Coskeran, Scottish Government, UK
- Ruby Mejía de Gutiérrez, Universidad del Valle - Escuela de Ingeniería de Materiales, Colombia
- Mervat El-Hoz, University of Balamand, Lebanon
- Toru Furuichi, Graduate School of Engineering, Hokkaido University, Japan
- Kasturi Gadgil, I.I.T. Delhi, India
- Noah Galil, Technion-Israel Institute of Technology, Israel
- William L. Magette, Civil Engineering, University College Dublin, Ireland
- Ilan Nissim, Ministry of the Environment, Israel
- Sara Ojeda-Benitez, Autonomous University of Baja California Engineering Institute, México
- Chukwu Onu, Southern University and A & M College, USA
- Paul S. Phillips, University of Northampton, UK
- Eva Pongrácz, University of Oulu, Finland
- Jason Scott, The University of New South Wales, Australia
- Alfred H. Stiller, Monongalia County Solid Waste Authority, USA
- Jerry Uhuo, National Assembly, Abuja, Nigeria
- Bruce G. Wilson, University of New Brunswick, Canada
- Anita Závodská, Barry University, USA

# CONFERENCE SUMMARY

## SUNDAY, MARCH 27, 2011

Pre-Conference Tour of Philadelphia  
Opening Reception

## MONDAY, MARCH 28, 2011

Opening Plenary

### Oral Presentations

- 1A Biological and Chemical Treatment 1
- 1B Energy Recovery
- 1C Recycling 1
- 1D Landfill 1
  
- 2A Use of Agricultural Wastes
- 2B Construction and Demolition Wastes
- 2C Recycling 2
- 2D Landfill 2
  
- 3A Contaminated Sites
- 3B Integrated Management
- 3C Use of Waste Materials 1
- 3D Biological and Chemical Treatment 2
  
- 4A Environmental Education
- 4B Industrial Wastes Management
- 4C Landfill 3
- 4D Ash Management
- 4E Case Studies 1

Poster Session 1

## TUESDAY, MARCH 29, 2011

### Oral Presentations

- 5A Workshop on The W2 Plastic Project:  
Part 1
- 5B Landfill Improvement
- 5C Use of Waste Materials 2
  
- 6A Workshop on The W2 Plastic Project:  
Part 2
- 6B Case Studies 2
- 6C Environmental Topics

Poster Session 2

### Oral Presentations

- 7A Policy, Economics and Regulations
- 7B Medical Wastes
- 7C Waste Collection
- 7D Research Advances 1
- 7E Case Studies 3
  
- 8A Waste Generation and Composition
- 8B Waste Minimization
- 8C Research Advances 2
- 8D Use of Waste Materials 3

Closing Reception

## WEDNESDAY, MARCH 30, 2011

Technical Field Trips

# DETAILED AGENDA

## SUNDAY, MARCH 27

12:00 p.m. - 6:00 p.m.

Conference check-in and registration

1:00 p.m. - 5:00 p.m.

Tour of Philadelphia  
(additional fee)

5:00 p.m. - 6:00 p.m.

Welcome Reception

## MONDAY, MARCH 28

8:00 a.m. - 5:30 p.m.

Conference check-in and registration

8:00 a.m. - 9:00 a.m.

Coffee

8:50 a.m. - 9:20 a.m.

Opening Plenary

9:20 a.m. - 10:55 a.m.

**Sessions 1**

### SESSION 1A

#### *Biological and Chemical Treatment 1*

The Impact Of Compaction, Moisture Content And Particle Size On Initial Physical Properties Of Organic Solid Wastes Before Composting. *Joachim Huet*, Student, Cemagref, *Céline Druilhe*, Research Engineer, Cemagref, *Anne Tremier*, Research Engineer, Cemagref, *Gérald Debenest*, **France**

Stabilize Nickel and Copper in Ceramic Matrix: Phase Transformation and Product Leachability. *Kaimin Shih*, The University of Hong Kong & Hong Kong Waste Management Association, *Yuanyuan Tang*, *Changzhong Liao*, *Yuanyuan Tang* and *Changzhong Liao*, **Hong Kong SAR China**

Vermicomposting: An Ample Trend To Desire The Value Of Soil. *Dr. Rakhi Chaudhary*, Associate Professor, Haryana Engineering College, Jagadhri, *Dr. Shelly*, Sr. Lecturer, Haryana Engineering College, Jagadhri, *Er. Hitesh Kumar*, B. Tech Final Year, Haryana Engineering College, Jagadhri, **India**

### SESSION 1B

## ***Energy Recovery***

Organic Rankine Cycle Integration Into LFG Engine And Efw Facility For Energy Efficiency Improvement, *Heping Cui*, Principal Engineer, Covanta Energy Corporation, *Thomas Hart*, Plant Engineer, Covanta Energy Corporation, *David Mcquillan*, Senior Project Engineer, Covanta Energy Corporation, Joseph Becker, **USA**

Renewable Energy from Wastes in Queensland: A Policy Overview, *Dr Georgina Davis*, Adjunct Lecturer, Griffith University, **Australia**

Design And Mathematical Modelling Of Low LCV Municipal Solid Waste Incinerator, *M.Ben OUMAROU*, Ph. D Student, University Of Maiduguri, *A. Tijani SULAIMAN*, Professor, Bayero University, Kano, *M. DAUDA*, LECTURER, University Of Maiduguri, **Nigeria**

Recycling And Utilization Of Submerged Arc Welding Slag Waste, *Anjani Kumar*, Professor And Director, Hindu College Of Engineering, *Dalgobind Mahto*, Professor, Green Hills Engineering College, **India**

Numerical Modeling Of Waste Gasification In Plasma Gasification Melting Process, *Qinglin Zhang*, Phd Candidate, Division Of Energy And Furnace Technology, Royal Institute Of Technology, *Liran Dor*, CTO, EER-Environmental Energy Resources, *Dikla Fenigshtein*, Environmental Engineer, EER-Environmental Energy Resources, Weihong, Yang, Wlodzimierz Blasiak, **Sweden/Israel**

## **SESSION 1C**

### ***Recycling 1***

Analysis of Correlation between Demographic Variables and Recycling Efficiency in the Town of Brookhaven, Long Island, New York, *Omkar Aphale*, PhD Student, Stony Brook University, *Ed Hubbard*, Commissioner, Waste Management, Town of Brookhaven, *David Tonjes*, Assistant Professor, Stony Brook University, **USA**

Active Management of Solid Waste Provides Maximum Diversion and Cost Benefit, *Sue Beets*, Sue Beets LEED AP, Corporate Sustainability Manager, SBM Management, *Randy Van Winkle*, LEED GA, Assistant Corporate Sustainability Manager, SBM Management, **USA**

Quantification of Recyclability Potential Index (RPI) for Textile Fibers, *Subramanian Senthilkannan Muthu*, Research Student (PhD), Institute of Textiles & Clothing, The Hongkong Polytechnic University, *Yi Li*, Professor, Institute of Textiles & Clothing, The Hongkong Polytechnic University, *Junyan Hu*, Project Manager, Institute of Textiles & Clothing, The Hongkong Polytechnic University, *P.Y. Mok*, **Hong Kong**

Development Of An Estimation Method For The Collectable Bio-Wastes As Inputs Of

Regional Biogasification Systems, *Kazuei Ishii*, Associate Professor, Graduate School of Engineering, Hokkaido University, *Toru Furuichi*, Professor, Graduate School of Engineering, Hokkaido University, *Sho Watanabe*, Master student, Graduate School of Engineering, Hokkaido University, **JAPAN**

MSW and Recycling Disposal Trends and Consumer Behavior Analysis Within the City of Spokane., *Geoffrey D. Glenn*, Disposal Superintendent, City of Spokane, Solid Waste Management, *Stephanie P Noren*, *Dr. Vikas K. Gumbhir*, Assistant Professor, Gonzaga University, N/A, **USA**

**SESSION 1D**  
***Landfill 1***

Hydraulic Conductivity Of Bagasse Ash Treated Tropical Black Clay. *Kolawole Osinubi*, Professor, Ahmadu Bello University, *Thomas Ijimdiya*, Lecturer, Ahmadu Bello University, Ijimdiya, T. S., **Nigeria**

Effects Of Biochar On Methanotrophic Activity Within Landfill Cover Soil. *Krishna R. Reddy*, Professor, University Of Illinois, *Dongbei Yue*, Assistant Professor, Tsinghua University, *Poupakyaghoubi*, Graduate Research Assistant, University Of Illinois, **USA**

Reuse Of Fishery Wastes For Chromium Removal From Wastewater. *Massimiliano Fabbicino*, Professor, University Of Naples Federico Ii, *Biagio Naviglio*, Director, Ssip, *Gelsomina Toratora*, Researcher, Ssip, **Italy**

Pollution Characteristics And Detoxification Treatment Of The Chromium-Contaminated Soil Around A Non-Standard Chromium Waste Landfill. *Wang Li'ao*, Professor, Key Laboratory For Exploitation Of Southwestern Resources And The Environmental Disaster Control Engineering, Ministry Of Education, Chongqing University and College Of Resources And Environmental Science, Chongqing University, *Yang Wei*, Post-Graduate Student, College Of Resources And Environmental Science, Chongqing University, *Chen Dayong*, Post-Graduate Student, College Of Resources And Environmental Science, Chongqing University, *Zeng Fantao*, **China**

Distribution And Bioavailability Of Metals In Gasoline Contaminated Sites In Lagos, Nigeria. *Phd. Adebola A. Oketola*, Assistant Professor, University Of Ibadan, Ibadan, *Adebisi, Abimbola A.*, Postgraduate Student, University Of Ibadan, **Nigeria**

10:55 a.m. - 11:10 a.m.

Break

11:10 a.m. – 1:10 p.m.

**Sessions 2**

**SESSION 2A**  
*Use of Agricultural Wastes*

Study Of The Potential Of Biomass Like Leaves, Cattle Dung And Wood For Production Of Renewable Energy, *Naveen Kumar Kaushley*, Assistant Professor, Sant Longowal Institute Of Engineering & Technology Longowal, Punjab, India, *Tamal Mandal*, Associate Profesor, National Institute Of Technology, Durgapur, **India**

Crosslinking of Collagen Nanofibrils, *Gennaro J Maffia*, Professor of Chemical Engineering, Manhattan College, *Kathryn Scherpf*, Grad Student, Manhattan College, **USA**

Recycling Of Date-Palm Wastes For Phosphate Removal, *Zianab Z. Ismail*, Phd, University Professor, Dept. Of Environmental Engineering, Univesity Of Baghdad, **Iraq**

Comparison Of Different Technologies For Disposing Palm Oil Waste Using Life Cycle Assessment – A Case Study Of Malaysia, *Yoon Lin Chiew*, Ph.D. Student, Graduate School Of Frontier Sciences, The University Of Tokyo, *Tomoko Iwata*, Dr, Environment Research Group, Building Research Institute, *Sohei Shimada*, Associate Prof. Dr., The University Of Tokyo, **Japan**

Effect Of Mentha Spent & Neem Coating, Planting Methods And Nitrogen Doses On Crop Yield And Soil Properties Under Direct Seeded Rice, *Avijit Sen*, Professor, Banaras Hindu University, *B.R.Bazaya*, Assistant Professor, SKUAST, Jammu, *V.K.Srivastava*, Professor, Banaras Hindu University, **India**

Gluconic Acid Production From Breadfruit Peel Hydrolysate Using Filamentous Fungus Aspergillus Niger, *Dr. Eriola Betiku*, Senior Lecturer, Obafemi Awolowo University, *Olalekan Saheed Alade*, Lecturer Ii, Bells University Of Technology, *Adebayo Fetuga*, Student, Obafemi Awolowo University, Sherif Jabar, Morufat Adenekan, Opeyemi Adedoyin, **Nigeria**

Valorization Of Wine Industry Wastes By Mesophilic Anaerobic Reaction, *Andrea Fabbri*, Phd Student, Department Of Chemical Engineering, Materials And Environment, Sapienza-Università Di Roma, *Giuseppe Bonifazi*, Full Professor, Department Of Chemical Engineering, Materials And Environment, Sapienza-Università Di Roma, *Silvia Serranti*, Researcher, Department Of Chemical Engineering, Materials And Environment, Sapienza-Università Di Roma, **Italy**

Preparation Of Cellulose Nanoparticles From Sesame Husk, *Dipa Ray*, Assistant Professor, University Of Calcutta, **India**

Energy From Waste: Sugarcane Solid Residues Energy Use In Brazil., *Walfrido Alonso Pippo*, Posdoc/Senior Researcher, State University Of Campinas (Unicamp), *Carlos A. Luengo*, Coordinator Alternative Fuels Group/Dfa/Ifgw/Unicamp, State University Of

Campinas (Unicamp), Pietro Garzone And Giacinto Cornacchia, **Brazil**

## **SESSION 2B**

### ***Construction and Demolition Wastes***

A Review of Building Deconstruction as the Alternative to Building Demolition, *G. Bradley Guy*, Assistant Professor, The Catholic University of America, **USA**

Heterogeneous Construction And Demolition Waste As Raw Material For The Production Of Lightweight Aggregates, *Alexander Schnell*, Scientific Assistant, Bauhaus-University Weimar, Chair Of Processing Of Building Materials And Reuse, *Prof. Anette Mueller*, Professor, Bauhaus-University Weimar, Chair Of Processing Of Building Materials And Reuse, **Germany**

Innovative In-Situ Sensing Techniques For Demolition Waste Quality Assessment, *Giuseppe Bonifazi*, Full Professor, Dicma - Sapienza, Università Di Roma, *Silvia Serranti*, Assistant Professor, Dicma - Sapienza, Università Di Roma, **Italy**

Upgrade Of Mixed C&Dw Recycled Aggregates Quality By Automatic Sorting, *Thomas Schnellert*, Scientific Assistant, Bauhaus-University Weimar, *Dr. Sérgio C. Angulo*, Usp Sao Paulo, *Prof. A. Müller*, S. First Author, **Germany**

Construction And Demolition Debris: Where We've Been And Where We Should Go, *Joseph Laquatra*, Professor, Cornell University, *Mark Pierce*, Extension Assoc. Cornell University, **USA**

Influence Of Recycled Concrete Aggregates On Specific Gravity And Absorption Rates Of Mixes, *Vahid Ayan*, Phd Student, Kingston University, *Seyed Masoud Nasr Azadani*, Associated Professor, Iran University Of Science & Technology, *Mukesh C Limbachiya*, Professor, Kingston University London, **United Kingdom**

## **SESSION 2C**

### ***Recycling 2***

Recycling In Developing Countries: The Case Of Ghana And Malaysia, *Jayanthi Sothirajah*, Graduate Student, Southern University, *Millicent Addo*, Graduate Student, Southern University, **USA**

Recycling in the Southeast Region of the United States: An Overview of Regulations and Programs, *Millicent Addo*, Ph.D Candidate, Southern University, *Patrick Tandoh-Offin*, Graduate Student, Clemson University, **USA**

Aspects Of The Resource Recovery From Mixed Municipal Solid Wastes, *Dipl.-Ing. Nico Schmalbein*, Scientific Staff, Department Of Processing And Recycling I.A.R. At Rwth Aachen University, *Prof. Th. Pretz*, Professor, Department Of Processing And Recycling I.A.R. At Rwth Aachen University, **Germany**

Novel Materials From Recycled Polypropylene And Fly Ash, *Dipa Ray*, Assistant Professor, University Of Calcutta, *Shubhalakshmi Sengupta*, Research Scholar, University Of Calcutta, *Suparna Sengupta*, Research Associate, Indian Association For The Cultivation Of Science, Tanusree Kar, **India**

Waste Minimisation And The Challenges Experienced, *Elaine Prosper*, Business Analyst, Sasol Chemcity, **South Africa**

Distribution of Precious and Rare Earth Metals in Processed Printed Circuit Boards, *Dipl.-Ing. Bastian Wens*, Scientific Staff, Department Of Processing And Recycling I.A.R. At RWTH Aachen University, *Prof. Th. Pretz*, Professor, Department Of Processing And Recycling I.A.R. At RWTH Aachen University, **Germany**

Material Recycling Vs. Tire-Derived Fuel Combustion For Scrap Tire Treatment: Comparative Attributional And Consequential Life Cycle Assessments, *Rebe Feraldi*, LCA & Sustainability Analyst, Franklin Associates, A Division Of ERG, *Melissa Huff*, Senior Chemical Engineer, Franklin Associates, A Division Of ERG, *Sarah Cashman*, LCA & Sustainability Analyst, Franklin Associates, A Division Of ERG, **USA**

## **SESSION 2D**

### ***Landfill 2***

Determination of the Natural Attenuation Process at a Disposal Site in the State of Mexico, *Edgar Carlos García Maya*, M.D. Student, Instituto Tecnológico de Toluca, *Ma. Guadalupe Macedo Miranda*, Research Profesor, Instituto Tecnológico de Toluca, *Sonia Mireya Martínez Gallegos*, Research Profesor, Instituto Tecnológico de Toluca, Guillermo Pedro Morales Reyes, Beatriz Barrientos Becerra, **México**

Survey On The Effect Of Landfill Leachate Of Shahrood City On Ground Water Quality, *Dr. Amir Hossein Mahvi*, Ass. Prof., School Of Public Health And Center For Environmental Research, Tehran University Of Medical Sciences **Iran**

Toxicity Assessment Of The Landfill Leachate Treated By Rotating Biological Contractor Unit, *Dr. Saleh Al-Muzaini*, Researcher, Kuwait Institute For Scientific Research, Dr. Saleh Al-Muzaini, **Kuwait**

Comparative Study Six Leachate Recycling Volumes On Municipal Solid Waste, *Hernández-Berriel, Ma.C.*, Professor, Instituto Tecnológico De Toluca, *Márquez-Benavides, L.*, Professor, Iiaf De La Universidad Michoacana De San Nicolás De Hidalgo, *E.A. Mendoza-Chávez*, Student Phd, Iiaf De La Universidad Michoacana De San Nicolás De Hidalgo, O. Buenrostro-Delgado, **México**

Use Of Catalysts For Enhancing Of Cod And Nh<sub>3</sub>-N Removal From Landfill Leachate By Ultrasound Method, *Dr. Amir Hossein Mahvi*, Ass. Prof., School Of Public Health And Center For Environmental Research, Tehran University Of Medical Sciences **Iran**

On the Modeling and Simulation of Biological Methane Oxidation - A Multiphase Continuum Approach for Landfill Cover Layers, *Tim Ricken*, Assistant Professor, University of Duisburg-Essen, Computational Mechanics, *Renatus Widmann*, Prof. Dr.-Ing., University of Duisburg-Essen, Institute of Waste Management, *Torsten C. Schmidt*, Prof. Dr.-Ing., University of Duisburg-Essen, Instrumental Analytical Chemistry, Manuel Gruyters, **Germany**

The Remedial Works On Old Sanitary Landfills With The Use Of Waste Materials, *Eugeniusz Koda*, Associate Professor, Warsaw University Of Life Sciences, Eugeniusz Koda, **Poland**

1:10 p.m. - 2:00 p.m.

**Awards Luncheon**

**Presentation of the Russell Ackoff Award, Roy F. Weston Award and Iradj Zandi Award**

2:00 p.m. – 3:55 p.m.

**Sessions 3**

### **SESSION 3A**

#### ***Contaminated Sites***

Surfactant Enhanced High Vacuum Dual Phase Extraction (HVDPE) Remediation Of Petroleum Contaminated Bedrock Aquifer (In-Situ Case Study), *George Ivey*, President, Ivey International Inc., *Galen Kenoyer*, RMT, *Chris D'Sa*, RMT, Gene McInn, **Canada**

Surfactant Enhanced Soil Washing Of Oil And Gas Wastes Tank Bottom Sludge, Drilling Cuttings, Oil Sands And Impacted Soils With Associated Oil Recovery Opportunities - North And South American Case Studies, *George Ivey*, President, Ivey International Inc., **Canada**

Heavy Metal Contamination Of Soil By The Leachate Of Damps, *Recep Bakis*, Assoc. Prof. Dr., Anadolu University, *Gulgun Yilmaz*, Assoc. Prof. Dr., Anadolu University, *Hasan Arman*, Prof. Dr., United Arab Emirates University, *E. Aytug Ozsoy*, **Turkey**

Green And Sustainable Remediation, *Krishna R. Reddy*, Professor, University Of Illinois, **USA**

Phytoremediation For Hazardous Liquid Industrial Waste Site – Al-Wafra Project, Kuwait, *Mohammad Abdulrahman Al-Sarawi*, Professor, Kuwait University, *Alia Saleh Baduo*, Geologist, Kuwait Oil Company, **Kuwait**

### **SESSION 3B**

## *Integrated Management*

Cost Recovery Systems And Financial Mechanisms For Municipal Solid Waste Management In Calumput, Bulacan, *Reynaldo C. Cruz*, Research Director, University Of Regina Carmeli, Malolos City, **Philippines**

Solid Waste Management in the Arab Contries, *Prof Faraj EL Mabrouk*, Professor, Garyounis University, *Farag A EL Mabrouk*, Professor, **Libya**

Assessment of the Status and Strategies of Municipal Solid Waste Management in Twin Cities of Hyderabad and Secunderabad (India), *M. Vikram Reddy*, Senior Professor, *Srikanth Srigiri*, Pondicherry University, **India**

Littering and Its Role in Municipal Solid Waste Management – A Case Study: The Czech Republic, *Anita Zavodska*, Associate Professor, Barry University, *Libuse Benesova*, **USA/Czech Republic**

Characteristics of Municipal Solid Waste in the Czech Republic, *Dr. Libuše Benešová*, Assistant Professor, Charles University - Prague, *Dr. Anita Závodská*, Assistant Professor, Barry University, *Marketa Dolezalova, M.Sc.*, Ph.D. Candidate, Charles University - Prague, *Petra Hnatukova, Ph.D.*; *Bohumil Cernik, M.Sc.*; *Kotoulova Zdenka, M.Sc.*, **Czech Republic**

European Experiences Towards The Zero Landfill Targets. Integration Among Traditional Businesses, Existing Waste Facilities And New Technologies Can Trigger Environmental And Economic Benefits., *Pietro Cella Mazzariol*, Ceo, Entsorga Italia S.P.A., *Paolo Carollo*, Executive Vice President, Chemtex International, *Jure Svetcic*, Technical Director, Simbio D.O.O., **Italy**

Administration Of Production With Focus On Social Technology Sustainable In Amazon *Prof. Flávio De São Pedro Filho*, Doctor, Professor Adjunto I, Fundação Universidade Federal De Rondônia, *Profa. Estela Pitwak Rossoni*, Professor Assistente, Fundação Universidade Federal De Rondônia, *Geni Aparecida Da Silva Multiplicadora Social Em Colorado Do Oeste*, Estado De Rondônia **Brazil**

Designing A Collaborative System For Socio-Environmental Management Of Industrial Waste, *Marisa Soares Borges*, Student, Ufsc , **Brazil**

## **SESSION 3C**

### *Use of Waste Materials 1*

Field Performance Of Pervious Rubberized Concrete, *Ashraf Ghaly*, Professor, Union College, **USA**

Finding Benefits On Production Of Charcoal From Waste Construction Wood Treated

With Citric Acid–Analysis Physico-Chemical Property Of Charcoal, *Masafumi Tateda*, Associate Professor, Toyama Prefecture University, *Masaru Okura*, Student, Toyama Prefecture University, *Youngchul Kim*, Professor, Hanseo University, B.C. Liyanage Athapattu, **Japan**

Method To Extract Water-Soluble Collagen From Induced Bi-Phasic Commercial Gel, *Matthew Mastauskas*, Graduate Student, Widener University, **USA**

Experimental And Finite Element Analysis Of Geocell Reinforced Fly Ash Retaining Wall, *B. Ram Rathan Lal*, Research Scholar, Indian Institute Of Technology Bombay, *V.B.Deshmukh*, Asst.Professor, Datta Meghe College Of Engineering, *J.N.Mandal*, Professor, Indian Institute Of Technology Bombay, *T. Mandal*, *J.J.Tank*, *B.Bhagat*, *R.Jadhav*, Under Graduate Students, Datta Meghe College Of Engineering, **India**

Development Of Sustainable Concrete Using Marginal Materials, *Dr. Radhakrishna*, Assistant Professor, R V College Of Engineering, *Dr. Renukadevi*, Asst. Professor, RVCE, *Prof. G S Manjunath*, Professor, KLS Gogte Institute Of Technology, *Dr. B C Udayashankar*, **India**

Test For Leaching Degradation Of Cement Hydration Products In Lo-Level Radioactive Waste Disposal, *Yu-Kuan Cheng*, Ph.D. Candidate, National Central University, *Wei-Hsing Huang*, Professor, National Central University, **Taiwan (R.O.C)**

Insulated Glass Ceramic From Tft-Lcd Waste Glass And CaF<sub>2</sub> Sludge By Thermal Treatment, *Chen-Shiuan*, *Fan*, Phd Candidate, National Taiwan University Graduate Institute Of Environmental Engineering, *Kung-Cheh Li*, Professor, National Taiwan University Graduate Institute Of Environmental Engineering *Kung-Cheh Li*, **Taiwan (R.O.C)**

Considerations Regarding Geotechnical Testing of Solid Waste Materials, *Dr. Dorairaja Raghu*, Professor, *Swamy Basim*, Assoc Professor, Central Connecticut State University, *Swamy Basim*, **USA**

### **SESSION 3D**

#### ***Biological and Chemical Treatment 2***

Comparative Study on Indigenous and Exotic Earthworms During Integrated Waste Management Through Vermitechnology, *Ankur Rajpal*, Research fellow, Indian Institute of technology Roorkee, *Dr. Renu Bhargava*, Professor, Indian Institute of technology Roorkee, *Dr. A.K.Chopra*, Professor, Gurukula Kangari University, Haridwar, **India**

Phytoremediation Of Cyanide By A Common Fern: Azolla Pinnata, *Neha Gupta*, Research Scholar, Iit Roorkee, *Dr C. B Majumder*, Assisiate Professor, Iit Roorkee, *Dr V. K Agrawal*, Professor, Iit Roorkee **India**

Simultaneous Adsorption And Bio-Degradation Of Cyanide Containing Water In A Packed Bed Column Reactor, *Neha Gupta*, Research Scholar, Iit Roorkee, *Dr C. B Majumder*, Assisiate Professor, Iit R Oorkee, *Dr V. K Agrawal*, Professor, Iit Roorkee, **India**

Sensitizing Women Towards Eco-friendly Composting Technology, *Chitra Prakash*, *M.Sc., B.Ed., M.Phil., Ph.D.*, Professor, Avinashilingam Deemed University for Women, Coimbatore - 641 043., *V.P. Thanooja*, Dietitian, VLCC, **India**

Environmental Management System And Recycling Of Cutting Oils Used In Industries, *Anjani Kumar*, Professor And Director, Hindu College Of Engineering, *Dipak Ranjan Jana*, Director, Durgapur Institute Of Advanced Technology And Management, **India**

3:55 p.m. - 4:10 p.m.

**Break**

4:10 p.m. – 6:00 p.m.

**Sessions 4**

#### **SESSION 4A**

##### ***Environmental Education***

Solid Waste Presentation On Developing Nations, *Nwachuku Uche Godstime*, Teourchman Integrated Services Nigeria, Director, **Nigeria**

Importance of Social Capital in Solid Waste Management in Sri Lanka, *Thanuja Dharmasena*, Programme Assistant, United Nations Human Settlements Programme, **Sri Lanka**

Pollution And Waste Management Regulation In Developing Countries: Nigeria And Guyana Compared, *Mr. Jerry U. Uhuo*, Assistant Chief Research Officer, National Assembly, *Dr. Anita Závodská*, Associate Professor, Barry University, **Nigeria/USA**

Education Towards Holistic Approaches Through Peace Education And Environmental Studies, *Cecile Clarinda D. Pasino*, *Ph.D.*, Associate Professor, Ateneo De Davao University, *Mylene D. Samonte*, *M.D.*, Part-Time Faculty, Ateneo De Davao University, *Victoria T. Pre*, *Ph.D.*, Faculty, Ateneo De Davao University, **Philippines**

Waste Segregation Compliance Among The Residents Of Elenita Heights Subdivision, Davao City, Philippines, *Cecile Clarinda D. Pasino*, *Ph.D.*, Associate Professor, Ateneo De Davao University, *Mylene D. Samonte*, *M.D.*, Part-Time Faculty, Ateneo De Davao University, *Victoria T. Pre*, *Ph.D.*, Faculty, Ateneo De Davao University, **Philippines**

Depletion Of Earth's Natural Resources And Associated Environmental Damage, *Ashraf*

*Ghaly*, Professor, Union College, **USA**

## **SESSION 4B**

### ***Industrial Wastes Management***

Toxicity Of 245-3'4'-Pentachlorobiphenyl In Anaerobic Systems, *Devrim Kaya*, Ph.D Student, Middle East Technical University, *Ipek Imamoglu*, Associate Professor/Faculty Member, Middle East Technical University, *F. Dilek Sanin*, Associate Professor/Faculty Member, Middle East Technical University, **Turkey**

Use Of Low-Grade Mgo To Stabilise Heavy Metals In Steel Electric Arc Furnace Waste, *Beste Cubukcuoglu*, Phd Student, University Of Surrey, *Sabeha Ouki*, Reader In Environmental Engineering, University Of Surrey, **United Kingdom**

Industrial And Household Solid Waste Management Practices In Bulacan And Its Relationship To Public Health, *Alvin V. Nuqui*, Researcher, University Of Regina Carmeli, Malolos City, **Philippines**

Characteristics And Management Strategies Of Industrial Solid Waste In Chongqing, China, *Huang Chuan*, Professor, Key Lab For The Exploitation Of Southwestern Resource And The Environmental Disaster Control Engineering, Ministry Of Education China, Department Of Resource And Environmental Science, Chongqing University, Chongqing, China, *Wang Li'ao*, Professor, Key Lab For The Exploitation Of Southwestern Resource And The Environmental Disaster Control Engineering, Ministry Of Education China, Department Of Resource And Environmental Science, Chongqing University, Chongqing, China, *Zhu Ying*, Graduate Student, Department Of Resource And Environmental Science, Chongqing University, Chongqing, China, Li Dong, **China**

Evolution Of Industrial Solid Waste On A Site In Central Cheshire, England, *Kinan Ibrahim*, Phd Student, The University Of Manchester, *Colin Hughes*, Prof., The University Of Manchester, *Alastair Martin*, Dr., The University Of Manchester, **United Kingdom**

Overview Of Waste Management In Brazil – Offshore Oil And Gas Exploration And Production Activities, *Decio Maia*, Manager, Aecom, **Brazil**

Use Of Circulating Fluidized Bed Combustion Fly Ash And Slag In Autoclaved Brick, *Zhiwei Zhang*, Student, Chongqing University, *Jueshi Qian*, Prof, Chongqing University, *Zhi Wang*, Prof, Chongqing University, Yingchun Wei, **China**

Comparison Of Treatment Technologies Of Sediments Polluted By The Polychlorinated Biphenyls With Best Available Techniques, *Mariana Meave*, Ph. D Candidate, Ecole Nationale Supérieure Des Mines De Saint-Etienne, Centre Site, *Valérie Laforest*, Professor, Ecole Nationale Supérieure Des Mines De Saint-Etienne, Centre Site, *Jacques Méhu*, Associate Professor, Institut Nationale Des Sciences Appliquées, Mariana Meave, **France**

Application Of Cement For Stabilization Of Electroplating Waste Mixed With Flyash, *Syed Salahuddin Shah*, Professor, Aligarh Muslim University, Aligarh, **India**

#### **SESSION 4C**

##### ***Landfill 3***

Site Selection And Prioritizing Proper Landfill Sites For Hazardous Wastes In Fars Province, Iran, *Nasser Talebbeydokhti*, Professor, Department Of Civil And Environmental Engineering, *Ayoub Karimi Jashni*, Assistant Professor, Department Of Civil And Environmental Engineering, *Saeed Ghaffari*, Student, Department Of Civil And Environmental Engineering, **Iran**

Investigation Of The Influence Of Clay Thickness On Waste Disposal Damping Site's Impermeability, *Hayrullah Akyildiz*, Graduate Student, Sakarya University, *Hasan Arman*, Prof. Dr., United Arab Emirates University, **Turkey**

Experimental Study On Anaerobic Degradation Of Mbt Waste, *Asif A. Siddiqui*, Phd Student, Waste Management Research Group, University Of Southampton, Uk, *W. Powrie*, Professor, Waste Management Research Group, University Of Southampton, Uk, *D. J. Richards*, Professor, Waste Management Research Group, University Of Southampton, Uk, *Asif A. Siddiqui*, **United Kingdom**

An Improved Model To Predict Gas Generation From Landfills Based On Waste Composition, Rainfall And Ambient Temperatures, *Richa Karanjekar*, Student, Department Of Civil Engineering, University Of Texas At Arlington, *Melanie Sattler*, Faculty, Department Of Civil Engineering, University Of Texas At Arlington, *MD Sahadat Hossain*, Faculty, Department Of Civil Engineering, University Of Texas At Arlington, *Victoria Chen*, *Arpita Gandhi*, **USA**

Predicting Methane Generation In A Landfill, *Shoou-Yuh Chang*, Professor, North Carolina A&T State University, *Linkel Boateng*, Graduate Assistant, North Carolina A&T State University, **USA**

Satellite Remote Sensing Of Landfill Gas In Developing Countries, *Samuel A. Vigil*, Professor, Civil And Environmental Engineering Dept., Cal Poly, **USA**

#### **SESSION 4D**

##### ***Ash Management***

Impact Studies Of Fly-Ash Management As Carrier For Bio-Pesticides Formulation, *Dr. Vipin Kumar*, Assistant Professor, Ism, Dhanbad Jharkhand, India, *Avantika Chandra*, Patna Science College, *Dr. Gurdeep Singh*, Professor & Head, Ism, Dhanabad, India, **India**

Effect of Leachate of a Dump on Nearby Sources of Water, *Otoniel Buenrostro Delgado*,

*Ph.D.*, Professor, Instituto De Investigaciones Agropecuarias Y Forestales. Universidad Michoacana De San Nicolás De Hidalgo, *Márquez-Benavides, L.*, Professor, IIAF de la Universidad Michoacana de San Nicolás de Hidalgo, *Ruth Alfaro-Cuevas, Ph.D.*, Professor, Instituto De Investigaciones Químico Biológicas. Universidad Michoacana De San Nicolás De Hidalgo, *Isabel Israde Alcantar, Ph.D.*, *María Del Consuelo Hernandez Berriel*, Student, **México**

Potential Beneficial Uses of Water Treatment Sludge Incineration Ash in Hong Kong, *Kaimin Shih*, The University of Hong Kong & Hong Kong Waste Management Association, *Yuanyuan Tang, Changzhong Liao, Yuanyuan Tang* and *Changzhong Liao*, **Hong Kong SAR China**

Potential Reuse Of Heavy Oil Fly Ash Generated In The Power Plant, *Abdullah Mofarrah*, Graduate Student, Memorial University, *Dr. Tahir Husain*, Profesor, Memorial University, *Dr. Ekram Y. Danishto*, Assistant Professor, King Abdulaziz Univesity/Chemistry Department **Canada**

Experimental Studies On The Behavior Of Fly Ash-Soil Mixture Reinforced With Geofibre, *Dr. Fareed Mahdi*, Reader/Associate Professor, Department of Civil Engg., Z.H. College of Engg. & Tech., Aligarh Muslim University, Aligarh-India, *Malik Shoeb Ahmad*, Reader/Associate Professor, Department of Civil Engg., Z.H. College of Engg. & Tech., Aligarh Muslim University, **India**

Utilization of Fly Ash Mixed With Cement and Electroplating Waste Sludge for Highway Application, *Malik Shoeb Ahmad*, Reader/Associate Professor, Department of Civil Engg., Z.H. College of Engg. & Tech., Aligarh Muslim University, Aligarh-India, **India**

Physical Properties Of Some Indian Pond Ashes: A Comparative Study, *Sarvesh Chandra*, Bijayanand Mohanty And N.R. Patra, **India**

#### **SESSION 4E** **Case Studies 1**

A Comprehensive Assessment Of New York City's Materials Exchange And Reuse Sector, *Vasil Diyamandoglu, Phd*, Assistant Professor, The City College Of New York, *Benjamin Barber Rose*, Project Manager, Materials Exchange Development Program, *None*, Vasil Diyamandoglu, **USA**

Integrated Planning For Solid Waste Management In Jaipur: Prospective And Opportunities, *Archana gupta*, Research Student Rajasthan University, *Dr. D.C Sharma*, Ass. Prof, Central University, **India**

Hope Never Gives Up Protection Of Environment In The Midst Of Human Conflict In Sri Lanka, *Ajantha Perer*anational Program On Recycling Of Solid Waste, Dr. (Mrs) Ajantha Perera, **Sri Lanka**

Web Based Gis – Mis – Gps Integrated System For Waste Management Department Of Dhaka City Corporation, Mohammad Ali, Student, Bangladesh University of Engineering and Technology (BUET), *Dr. Md. Mafizur Rahman*, Professor, Bangladesh University of Engineering and Technology (BUET), *Abul Hasnat Md. Asraful Alam*, Executive Engineer (Transport & collection), Dhaka City Corporation, *Dr. Tariq Bin Yousuf*, Executive Engineer & Project Director of Landfill Improvement Project, Waste Management Department, **Bangladesh**

Mathematical Model For Evaluating The Municipal Solid Waste Planning Capability Of Local Authorities In Thailand, Miss Jareerat Sakulrat, Lecturer, Assistant Professor, Civil Engineering Faculty, Prince Of Songkla University, *Mr. Rotchanatch Darnsawadi*, Lecturer, Assistant Professor, Environmental Management Faculty, Prince Of Songkla University Jareerat Sakulrat, **Thailand**

Sources Of Electronic Waste And Need Of Electronic Waste Management In India, P. M Mathur, Asso. Prof, Mdsu, *Kriti Sharma*, Scholar, Mdsu, *Anand Shobhawat*, Scholar, Mdsu, Anand, **India**

The Redi Index: Penn State's "Apples To Apples" Answer To The Zero Waste Questions, Al Matyasovsky, Supervisor - Central Support Services, The Pennsylvania State University, *Brendan Bagley*, Computer Support, The Pennsylvania State University, *Lloyd Rhoades*, Manager, Central Support Services, The Pennsylvania State University **USA**

Technology Enhancement In The Management And Recycling Of E-Waste, Oseghale Sunday Dalton, Phd Research Student, Faculty Of Social Sciences And Humanities, School Of Social Development And Environmental Studies, University Kebangsaan Malaysia., *John Babington Chibunna*, Phd Research Student, Institute For Environment And Development, Universiti Kebangsaan Malaysia, *Prof Chamhuri Siwar*, Research Fellow, Institute For Environment And Development, Universiti Kebangsaan Malaysia, Oseghale Sunday Dalton, **Malaysia**

Integrated Waste Management In Nigeria And It's Consequences, Dr. Oguamah Felix Ognld International, **Nigeria**

6:00 p.m. – 7:00 p.m. \_\_\_\_\_ 6:30 p.m. – 7:30 p.m

**Posters 1**

**Reception**

## **POSTER SESSION 1**

Strength-Deformation Properties of Florida's Recycled Asphalt Pavement, Paul Cosentino, Professor, Florida Institute of Technology, *Edward H. Kalajian*, Professor

Associate Dean, Florida Institute of Technology, *Tomas Montemayor*, Engineering, P, Bruce Doig, David Horhota, **USA**

Determination of the Natural Attenuation Process at a Disposal Site in the State of Mexico, *Edgar Carlos García Maya*, M.D. Student, Instituto Tecnológico de Toluca, *Ma. Guadalupe Macedo Miranda*, Research Profesor, Instituto Tecnológico de Toluca, *Sonia Mireya Martínez Gallegos*, Research Profesor, Instituto Tecnológico de Toluca, Guillermo Pedro Morales Reyes, Beatriz Barrientos Becerra, **México**

Assessment of the Status and Strategies of Municipal Solid Waste Management in Twin Cities of Hyderabad and Secunderabad (India), *M. Vikram Reddy*, Senior Professor, *Srikanth Srigiri*, Pondicherry University, **India**

ApplieDs of Biomass Power Plants in Disposal of Electricity, *Amin Amraei*, Student, Omidieh Society Science Of Petroleum Engineers Of Islamic Azad University Omidieh-Branch, *Shahab Shafayyan*, Student, Omidieh Society Science Of Petroleum Engineers Of Islamic Azad University Omidieh-Branch, *Mohammad Amin Gholamzadeh*, Master, Omidieh Society Science Of Petroleum Engineers Of Islamic Azad University Omidieh-Branch, Farid Amraei, **Iran**

Economic Evaluation Of Bio-Gas And Bio-Methane From Animal Manure, *Shahab Shafayyan*, Student, Omidieh Society Science Of Petroleum Engineers Of Islamic Azad University Omidieh-Branch, *Abas Ali Changalvai*, Master, Omidieh Society Science Of Petroleum Engineers Of Islamic Azad University Omidieh-Branch, *Amin Amraei*, Student, Omidieh Society Science Of Petroleum Engineers Of Islamic Azad University Omidieh-Branch, Mostafa Narimani, **Iran**

Aspects of the recovery of metals from mixed MSW – Mechanical-Biological Treatment vs. Incineration, *Dipl.-Ing. Ronald Gillner*, Scientific Staff, Department Of Processing And Recycling I.A.R. At RWTH Aachen University, *Prof. Th. Pretz*, Professor, Department Of Processing And Recycling I.A.R. At RWTH Aachen University, *Dipl.-Ing. Bastian Wens*, Scientific Staff, Department Of Processing And Recycling I.A.R. At RWTH Aachen University, Dipl.-Ing. Nico Schmalbein, **Germany**

Phytoremediation Of Cyanide By A Common Fern: Azolla Pinnata, *Neha Gupta*, Research Scholar, Iit Roorkee, *Dr C. B Majumder*, AssisiatE Professor, Iit Roorkee, *Dr V. K Agrawal*, Professor, Iit Roorkee **India**

Simultaneous Adsorption And Bio-Degradation Of Cyanide Containing Water In A Packed Bed Column Reactor, *Neha Gupta*, Research Scholar, Iit Roorkee, *Dr C. B Majumder*, AssisiatE Professor, Iit Roorkee, *Dr V. K Agrawal*, Professor, Iit Roorkee **India**

Analysis Of Correlation Between Demographic Variables And Recycling Efficiency In The Town Of Brookhaven, Long Island, New York, *Omkar Aphale*, Phd Student, Stony Brook University, *Ed Hubbard*, Commissioner, Waste Management, Town Of

Brookhaven, *David Tonjes*, Assistant Professor, Stony Brook University, **USA**

Designing A Collaborative System For Socio-Environmental Management Of Industrial Waste, *Marisa Soares Borges*, Student, UFSC, **Brazil**

Physical And Chemical Properties Of Wood Ash From Burning And Gasification Processes, *Sari Kilpimaa*, Researcher, University Of Oulu, *Toivo Kuokkanen*, Docent, University Of Oulu, *Ulla Lassi*, Professor, University Of Oulu **Finland**

Recycling Of Date-Palm Wastes For Phosphate Removal, *Zianab Z. Ismail*, Phd, University Professor, Dept. Of Environmental Engineering, Univesity Of Baghdad, **Iraq**

A Study Of CO<sub>2</sub> Reduction Potential By Applying Sewage Sludge At The Energy Plant, *Sangwon Park*, Student (Ph. D Course), Yonsei University, *Min-Gu Lee*, Student (Ms Course), Yonsei University, *Ho-Yong Jo*, Student (Ms Course), Yonsei University, Jin-Won Park, Professor, Yonsei University, 134, Shinchon Dong, Seodaemun Ku, Seoul, **Republic Of Korea**

Adsorption Of Heavy Metals By Biosolids With Admixtures, *Lakshika Goonewardena*, Ph.D. Student, University Of Melbourne, *Roger Wrigley*, Honorary Fellow, University Of Melbourne, *Robert Edis*, Principal Honorary Fellow, University Of Melbourne, Kithsiri Dassanayake, Augustine Doronila, **Australia**

Assessment Of Environmental Effects Of Leachate Generated From Wood Recycling Facilities, *Sarat Kannepalli*, Graduate Student, Rutgers University, *Peter F. Strom*, Professor, Rutgers University, *Uta Krogmann*, Associate Professor, Rutgers University, **USA**

Comparison Of The Effects Of Organic Amendments On The Chemical, Physical And Microbial Properties Of Coal Fly As A Plant Growth Medium, *Oxana Belyaeva*, Research Scientist, University Of QLD, *Richard Haynes*, Professor, University Of QLD,, **Australia**

Cd (II) Ions Sorption On The Modified Sawdust, *Rasim Alosmanov*, Associate Professor, Baku State University, *I.A. Bunyad-Zadeh*, Scientific Researcher, Baku State University, *A.A. Azizov*, Professor, Baku State University, A.M. Maharramov, **Azerbaijan**

Environmental Non Governmental Organizations (Ngos) In Chennai – A Study Of Issues, Actions And Impacts, *Reeni Samuel*, Former Senior Lecturer, National Institute For Technical Teachers Training And Research, Chennai, India, *V. Thanikachalam*, Professor And Head, Correspondence Courses, National Institute For Technical Teachers Training And Research, **USA**

Exploring Empirical Methods Of Tackling Waste Soil After Construction And Field Around Urban Districts In Taiwan, *Jyh-Dong Lin*, Professor, National Central University, *Jr-Hung Peng*, Ph.D. Candidate, National Central University, *Kuang-Yi Wei*, Ph.D.

Student, National Central University, **Taiwan**

Growth And Cu/Zn Uptake Of Two Pastures Affected By Application Of Vermicompost With Different Cu And Zn Contents, *Cheng Haixiang*, Student, Zhejiang University, *Tian Guangming*, Professor, Zhejiang University, *Zhu Weiqin*, Associate Professor, Hangzhou Normal University, **China**

New Bioestimulants For Plants From Microbiological Biohydrolysis Of Cow Byproducts, *M<sup>a</sup> Dolores Coll*, Contracted Researcher, Cebas-Csic, *Luisa M<sup>a</sup> López*, Contracted Researcher, Cebas-Csic, *I. Garcia*, Contracted Researcher, Zurco Bioreseach, Teresa Hernandez, M<sup>a</sup> Pilar De Castro, Juan-Ramón Muñoz, Carlos Garcia, **Spain**

Production Of High Value Product From Category 3 Animal Byproducts, *Luisa M<sup>a</sup> Lopez*, Contracted Researcher, Cebas-Csic, *M<sup>a</sup> Dolores Coll*, Contracted Researcher, Cebas-Csic, *I. Garcia*, Contracted Researcher, Zurco Bioreseach, Teresa Hernandez, M<sup>a</sup> Pilar De Castro, Juan-Ramón Muñoz, Carlos Garcia, **Spain**

Research On The Gas Migration Regularity Of Municipal Solid Waste Landfills In The Solid - Liquid - Gas -Heat Interaction, *Xiaoli Liu*, University Professor, North China Institute Of Aerospace Engineering, *Wenjing Si*, Lecturer, North China Institute Of Aerospace Engineering, *Chunying Zhu*, Lecturer, North China Institute Of Aerospace Engineering, **P.R.C.China**

Estimation of Change in Methane Emission Rate by Analysis of Age-defined Wastes in a Landfill Site, *Kazuei Ishii*, Associate Professor, Graduate School Of Engineering, Hokkaido University, *Toru Furuichi*, Professor, Graduate School Of Engineering, Hokkaido University, *Hidetoshi Kamio*, Master Student, Graduate School Of Engineering, Hokkaido University, **JAPAN**

Study On Dissolution And Recovery Of Polystyrene Waste In Plant-Derived Oils, *Ren-Bin Lin*, Assistant Professor, Department Of Chemical And Materials Engineering, Chinese Culture University, *Shin-Hung Chen*, M.S. Student, Department Of Chemical Engineering, National Taiwan University, *Shin-Min Shih*, Professor, Department Of Chemical Engineering, National Taiwan University, **Taiwan**

Survey Of Housekeeper Women Knowledge About Solid Waste Disposal In Coastal Villages Of Bushehr Province, Iran, *Sina Dobaradaran*, Phd Student, Bushehr University Of Medical Sciences/ Tehran University Of Medical Sciences, *Abdollah Tahmasebi*, Phd, Bushehr University Of Medical Sciences, *Narges Gholamian*, BS, Bushehr University Of Medical Sciences, **Iran**

Temporal Analysis Of Microbial Biomass C And Enzyme Activities In Soils Amended With Municipal Waste Compost Under No-Tillage And Moldboard Plow Systems, *I. Haller*, *E.G. López-de-Sa*, *P. Soler-Rovira*, *A. Polo*, *J.C. García-Gil* Instituto de Ciencias Agrarias (CSIC), **Spain**

The Effect Of Adding Different Type Of Ca On Emission Of Heavy Metal During Agglomeration/Defluidization Process In Fluidized Bed Incineration, *Chiou-Liang Lin*, Associate Professor, Department Of Civil And Environmental Engineering, National University Of Kaohsiung, *Jing-Dong Chou*, Postdoctoral Fellow, Department Of Civil And Environmental Engineering, National University Of Kaohsiung, *Ming-Chih Tsai*, Student, Department Of Civil And Environmental Engineering, National University Of Kaohsiung, **Taiwan**

Utilization Of Olive Waste Ash In Mortar Mixes, *Mohanad Yaseen Abdulwahid Abdulwahid*, Erbil, University Of Koya, *N. M. Al-Akhras*, Irbid, Jordan University Of Science And Technology, **Iraq**

Satellite Remote Sensing Of Landfill Gas In Developing Countries, *Samuel A. Vigil*, Professor, Civil And Environmental Engineering Dept., Cal Poly, **USA**

Best Management Practices And Cost Implementation For Construction Waste Diversion To Support Goal Of 75% Reduction By 2020, *Dr. James Sullivan*, Professor, University Of Florida, **USA**

## **TUESDAY, MARCH 29**

8:00 a.m. - 5:30 p.m.  
Conference check-in and registration

7:30 a.m. – 8:00 a.m.  
Coffee

8:00 a.m. - 10:10 a.m.  
**Sessions 5**

### **SESSION 5A**

#### ***Workshop on The W2Plastic Project: Part 1***

The W2Plastics Project Halfway Achievements, *Francesco Di Maio*, Assistant Professor, Delft University Of Technology, *Bin Hu*, Phd Student, Delft University Of Technology, *Norbert Fraunholz*, Director, Recycling Avenue BV, *Silvia Serranti*, *Giuseppe Bonifazi*, **The Netherlands**

LabVIEW in Ultrasound Plastic Materials Measurement, *Doru Ursutiu*, Professor, University Transilvania of Brasov, *Cornel Samoil*, Profesor, University Transilvania of Brasov, *Liana Baltas*, Professor, University Transilvania of Brasov, **Romania**

Investigation on Energy Density of Plastic Waste Materials, *L. Costiuc*, As. Prof., University Transilvania of Brasov, *S.Patachia*, Prof., University Transilvania of Brasov, *L.Baltas*, Prof., University Transilvania of Brasov, *M.Tierean*, **Romania**

Composition Determination Of The Romanian Municipal Plastics Wastes, *Silvia Patachia*, Professor, Transilvania University Of Brasov, *Alina Moldovan*, Phd Student, Transilvania University Of Brasov, *Mircea Tierean*, Professor, Transilvania University Of Brasov, Liana Baltes, **Romania**

Design Of An Hyperspectral Imaging Platform For Quality Control In The MDS-Based Recycling Process Of Polyolefins, *Giuseppe Bonifazi*, Prof, Sapienza - Università Di Roma, *Alberto Dall'Ava*, CEO, DV Srl, *Silvia Serranti*, Assistant Professor, Sapienza - Università Di Roma, **Italy**

The Use of HyperSpectral Imaging for Quality Control in the MDS-based Recycling Process of Polyolefins, *Silvia Serranti*, Assistant Professor, Sapienza University Of Rome - DICMA, *Aldo Gargiulo*, Research Assistant, Sapienza University Of Rome - DICMA, *Giuseppe Bonifazi*, Full Professor, Sapienza University Of Rome - DICMA, **Italy**

Development Of Inverse Magnetic Density Separation Of Polyolefin Mixtures, *Bin Hu*, PHD Candidate, Delft University Of Technology (TU Delft), *Francesco Di Maio*, Assistant Prof., TU Delft, *Peter Rem*, Associate Prof., TU Delft, Guillaume Houzeaux, Hadrien Calmet, **The Netherlands**

Magnet Designs for Magnetic Density Separation of Polymers, *Domenico Lahaye*, *Henk Polinder*, *Peter Rem*, Delft University of Technology, **The Netherlands**

## **SESSION 5B**

### ***Landfill Improvement***

Geotechnical Assessment Of In-Situ Lateritic Soil From An Open Dumpsite As Liner In Modern Sanitary Landfill: A Case In Ilorin, Southwestern, Nigeria. *Dr. Olusegun O. IGE*, Lecturer II, University Of Ilorin, **Nigeria**

Solid Waste Disposal Site Selection For KMC Using Geographic Information System, *D.M.S.L B Dissanayake*, Lecturer, Rajarata University Of Sri Lanka, *D.M.L Dissanayake*, Lecturer, University Of Peradeniya, **Sri Lanka**

Improvement In Existing Municipal Solid Waste Landfill Sites Of Indore And Ujjain Cities (Comparative Study), *Abdul Saleem Khan*, Associate Professor, Civil Engineering, Ujjain Engineering College, Ujjain (M.P), *S. M. Narulkar*, Proffesor, Civil & Applied Mechanics, S.G.S.I.T.S., Indore (M.P.), **India**

An Integrative Approach For Municipal Solid Waste (MSW) Landfill Selection: A Case Study Of Oahu, Hawaii, *Sukwan Jung*, Phd Student, University Of Hawaii, *John Yanagida*, Professor, University Of Hawaii, *Tomoaki Miura*, Associate Professor, University Of Hawaii, Michael Robotham (Assistant Director For Soil Science And Natural Resource Assessments, NRCS), Greg Bruland (Assistant Prfessor, University Of Hawaii), And James Moncur (PH.D.), **USA**

Application Of Shredded Tires As Drainage Material In Enhanced Leachate Recirculation (ELR) Landfill, *Shahed Manzur*, Graduate Teaching Assistant, The University Of Texas At Arlington, *Dr. Sahadat Hossain*, Associate Professor, The University Of Texas At Arlington, *Vance Kemler*, Director Of Solid Waste, The City Of Denton, David Dugger, **USA**

Feasibility Of Improving Hydraulic Conditions In Landfills In India, *Sapna Sethi*, Research Scholar, NIT, Jalandhar, *Dr. A.K.Nema*, Associate Professor, IIT, Delhi, *Dr.N.C.Kothiyal*, Professor, NIT, Jalandhar, **India**

Compatibility Of Compacted Abandoned Dumpsite Soils With Municipal Solid Waste Leachate, *Kolawole Osinubi*, Professor, Ahmadu Bello University, *Afeez Bello*, Lecturer, Osun State University, **Nigeria**

In Situ Recirculation-Fenton Oxidation Treatments For Leachate From A Closed MSW Landfill, *Xiaolan Zeng*, Associate Professor, Chongqing University, *Wenchuan Ding*, Professor, Chongqing University, *Tengrui Long*, Professor, Chongqing University, Leilei Zhang, Chengbao Lin, **R.P.China**

Application Of Anaerobic MBR For Removal Of COD And Hormone Compounds In Young Landfill Leachate, *Anh Do*, Phd Student, Department Of Civil And Environmental Engineering university Of South Florida, *Daniel Yeh*, Assistant Professor, Department Of Civil And Environmental Engineering university Of South Florida,, **USA**

Temporal And Spatial Distribution Of Humic Substances In Municipal Solid Waste Landfill Leachate, *Dongbei Yue*, Assistant Professor, Tsinghua University, *Yinglong Guan*, Student, Tsinghua University, *Guangxia Qi*, Graduate Assistant, Tsinghua University, **China**

Configuration Of Resistance Type Moisture Sensor, *Philip T. Mccreanor*, Associate Professor, Mercer University - School Of Engineering, **USA**

## **SESSION 5C**

### ***Use of Waste Materials 2***

Evaluation of Lime-stabilized Biosolids as a Soil Amendment, *Mingxin Guo*, Associate Professor, Delaware State University, **USA**

Triaxial Determination of Shear Strength of Tire Chips-Sand-Geotextile Mixtures, *Mahmoud Ghazavi*, Associate Professor, Civil Engineering Department of K. N. Toosi University of Technology, *Javad Ghaffari*, PhD Student, Civil Engineering Department of K. N. Toosi University of Technology, **Iran**

Effective Reuses And Recycle Of Pet Bottles, *Er.S.Jothi Venkatraman*, Lecturer, Excel College Of Engineering For Women, *Dr.S.Jayanthi*, Associate Professor, Government

College Of Technology, **India**

Utilization of By-Products in Concrete Manufacturing, *Rafat Siddique*, Senior Professor & Dean, Thapar University, *Gurpreet Singh*, Assistant Professor, RIMT, **India**

Scrap Tire Management System In Iran: Challenges And Insights, *A. A. Towfigh, Ph.D.*, Materials and Energy Research Centre, Meshkin-Dasht, Karaj *F. Ghavipankeh, Ph.D.*, Environment group, Energy Department, Materials and Energy Research Centre, Meshkin-Dasht, Karaj, **Iran**

Using Demolition Materials In Pavement, *Manal Abd Alla Ahmed*, Assoc. Prof. Construction & Utility Department, Faculty Of Engineering, Zagazig University, **Egypt**

Pretreatment And Effective Utilization Of Softwood Waste Material Using Steam Explosion With Super High Temperature And Pressure, *Chkako Asada*, Research Assistant, Department Of Life System, Institute Of Technology And Science, The University Of Tokushima, *Chizuru Sasaki*, Assistant Professor, Department Of Life System, Institute Of Technology And Science, The University Of Tokushima, *Yoshitoshi Nakamura*, Professor, Department Of Life System, Institute Of Technology And Science, The University Of Tokushima, **Japan**

Estimating Curing Time Effect Of Soil Stabilisation With Fly Ash, Marble Dust And Disposal Sand For Road Subbase Fill, *Dr. Seyhan Firat*, Head Of Geotechnical Division, Sakarya University, *Associate Prof. Gulgun Yimaz*, Anadolu University, *Ahmet T Comert*, Bilecik, Mansur Sümer, **Turkey**

Engineering Characteristics Of Pond Ash For Embankment Construction, *Bijayananda Mohanty*, Research Scholar, Iit Kanpur, *Sarvesh Chandra*, Professor, Iit Kanpur, *Nihar Ranjan Patra*, Associate Professor, Iit Kanpur, *Dr. Sarvesh Chandra*, **India**

Utilization Of Industrial By-Products In Road Pavements, *Satyajit Patel*, Assistant Professor, Sardar Vallabhbhai National Institute Of Technology, Surat, India, *Dr. J. T. Shahu*, Associate Professor, Indian Institute Of Technology, Delhi, New Delhi, India, **India**

10:10 a.m. - 10:25 a.m.

**Break**

10:25 a.m. – 12:15 p.m.

**Sessions 6**

## **SESSION 6A**

### ***Workshop on The W2Plastic Project: Part 2***

**Moderator:** *Giuseppe Bonifazi*, Full Professor, Sapienza University Of Rome - DICMA, **Italy**

## SESSION 6B

### *Case Studies 2*

Using Life Cycle Assessment As A Tool For Analysing Household Waste In Dublin, Ireland. *Dr. Anne Morrissey*, Lecturer, Dublin City University, **Ireland**, *Esben Andersen*, Researcher, *Thomas H Christensen*, Professor, Technical University Of Denmark, **Denmark**

A Comparative Study Of Solid Waste Source Segregation In Tertiary Institution And Residential Areas In Nigeria. *Dr. Dennis Iyeye Igbinomwanhia*, Senior Lecturer, University Of Benin, *Nefisat Jessica Alao*, Student, University Of Benin, **Nigeria**

Spatial Management Plan For Municipal Solid Waste Of University Of The Punjab Lahore, Pakistan. *Syeda Adila Batool*, Assistant Professor, University Of The Punjab, *Dr. Muhammad Nawaz Chaudhry*, Professor Emeritus, University Of The Punjab, *Irfan Ashraf*, WWF, **Pakistan**

Municipal Solid Waste Management In Pakistan. *Sardar Mohazzam*, Assistant Professor, Department Of Government And Public Policy, National Defence University, *Mr. Obaid Ullah*, Student, Department Of Government And Public Policy, National Defence University, **Pakistan**

Municipal Solid Waste Management Diagnosis Of Rapidly Growing Cities: The Case Of Mwanza City, Tanzania. *Fredrick Salukele*, Phd Candidate, Ardhi University/Wageningen University, *Gabor Szanto*, Provide-Coordinator, Environmental Policy Group – Wageningen University, *Shaaban Mgana*, Senior Lecturer, Ardhi University, *Joost Van Buuren*, *Wim H. Rulkens*, **Tanzania**

Community Participation In Waste Management In Kathmandu Metropolitan City, Nepal. *Er. Rabindra Kumar Rai*, Section Chief, Solid Waste Management Section, Environment Management Department, Kathmandu Metropolitan City, **Nepal**

## SESSION 6C

### *Environmental Topics*

Environmental Performance of an Innovative Waste Refinery Based on Enzymatic Treatment. *Davde Tonini*, Phd, Technical University Of Denmark (DTU), *Thomas Astrup*, Associate Professor, Technical University Of Denmark (DTU), **Denmark**

Solid Waste Management For Clean Water Provision: The Prospects Of Water-Ways Restoration In Nigeria. *Okoji Fidelia U.*, *Loveday Edoghogho*, **Nigeria**

Potential Of Water Hyacinth (Eichhornia Crassipes Mart. Solms - Laubach) In Ruminant Production To Curtail Its Environmental Hazards On Nigerian Water Ways. *A. A Mako*, Lecturer 2, Tai Solarin University Of Education, Ijagun, Ijebu - Ode, *Akinwande*,

V. O, Senior Lecturer, Tai Solarin University Of Education, *Abiola - Olagunju, O. I*, Asst. Lecturer, Universty Of Ibadan, Abegunde, T. O, **Nigeria**

Waste Products And Building Materials Management In Natural Disasters, *Azadeh Arbabi*, 1-Climatology Professor And Academic Board Member Of Islamic Azad University- Branch Of Islamshahr, *Mohammadreza Arbabi Nia*, Architecture Uni-Student Islamic Azad University , Branch Of Tehran Central, *Alireza Arbabi Nia*, Student Of Civil Engineering In Islamic Azad University , Branch Of Tehran Central, **Iran**

The Climate Relevance Of Waste Management In Addis Ababa – Baseline And Potential Optimisation Approaches, *Mike Speck*, Deputy Head Of Biomass And Material Flow Management Division, IZES Ggmbh, *Michael Porzig*, Scientific Officer Biomass And Material Flow Management Division, IZES Ggmbh, *Manuel Trapp*, Scientific Officer Biomass And Material Flow Management Division, IZES Ggmbh, **Germany**

Reduction Of Carbon Dioxide Emmission In A Developing Economy Using Energy Efficient Lightning Systems, *Igwe Emmanuel Eberechukwu*, General Manager, Flora Truworths Ltd., *Oladiji Gbeminiyi Gabriel*, Project Manager, Vista Matrix And Synergy Ltd., *Kingsley Bamidele Okonkwo*, General Manager, De Crone Investment And Services Nig. Ltd, **Nigeria**

Responsible Stewardship Of Spent Materials And Production Wastes: Supply Chain Management Options For Global Enterprises, *Jeffrey Sacre*, Executive Director, CHWMEG, Inc, **USA**

Sustainable Environmental Management For Olive Mill Waste In Rural Areas, *Mervat El-Hoz*, Associate Professor, The University Of Balamand **Lebanon**

Sustainability Assessment of Solid Waste Management, *Rabia Batagarawa*, Researcher, University of Portsmouth, *John Williams*, Associate Dean (Research); Research Coordinator; Principal lecturer, University of Portsmouth, *Jonathan Potts*, Senior Lecturer, University of Portsmouth, Julia Brown, **United Kingdom**

Increasing Mercury Removal Efficiency of a Wet FGD in a Power Plant, *Mark Ehrnschwender*, Director of Business Development and Plant Services, Evonik Energy Services LLC, **USA**

12:15 p.m. – 1:15 p.m.

**Poster Session 2**

## **POSTER SESSION 2**

An Improved Model To Predict Gas Generation From Landfills Based On Waste Composition, Rainfall And Ambient Temperatures, *Richa Karanjekar*, Student, Department Of Civil Engineering, University Of Texas At Arlington, *Melanie Sattler*,

Faculty, Department Of Civil Engineering, University Of Texas At Arlington, *Md Sahadat Hossain*, Faculty, Department Of Civil Engineering, University Of Texas At Arlington, *Victoria Chen, Arpita Gandhi*, **USA**

Web Based Gis – Mis – Gps Integrated System For Waste Management Department Of Dhaka City Corporation, *Mohammad Ali*, Student, Bangladesh University of Engineering and Technology (BUET), *Dr. Md. Mafizur Rahman*, Professor, Bangladesh University of Engineering and Technology (BUET), *Abul Hasnat Md. Asraful Alam*, Executive Engineer (Transport & collection), Dhaka City Corporation, *Dr. Tariq Bin Yousuf*, Executive Engineer & Project Director of Landfill Improvement Project, Waste Management Department, **Bangladesh**

Using Coffee's Husk Ash Reject into Ceramic Tile, *Wilson Acchar*, Professor, Federal University of Rio Grande do Norte, *Eduardo Dultra*, PhD Student, Federal University of Rio Grande do Norte, *Ana Maria Segadaes*, , Universidade de Aveiro, **Brazil**

Tests On Mixtures Of Sand-Tire Shreds Reinforced With Geogrid, *Mahmoud Ghazavi*, Associate Professor, K.N. Toosi University Of Technology, *Amir Farshadfar*, Master Of Science, K.N. Toosi University Of Technology, *Dr. Ghazavi, Dr Vahid Ayan*, **Iran**

Identifying Stakeholders' Practices and Concerns About Pharmaceuticals: A Qualitative Study, *Julie Becker, Ph.D., MPH*, President and Founder, Women's Health & Environmental Network,, **USA**

Application Of Shredded Tires As Drainage Material In Enhanced Leachate Recirculation (Elr) Landfill, *Shahed Manzur*, Graduate Teaching Assistant, The University Of Texas At Arlington, *Dr. Sahadat Hossain*, Associate Professor, The University Of Texas At Arlington, *Vance Kemler*, Director Of Solid Waste, The City Of Denton, David Dugger, **USA**

Assessment Of State Composting Regulations In The United States, *Nazli Yesiller*, Director, Global Waste Research Institute - Cal Poly, *Sam Vigil*, Professor, Civil And Environmental Engineering Dept., Cal Poly State Univ., *Jim Hanson*, Professor, Civil And Environmental Engineering Department - Cal Poly, **USA**

Recovery of indium from waste-LCD by chemical extraction method, *Satoshi MIZUTANI*, Associate Professor, Osaka City University, *Yoshinori KANJO*, Professor, Osaka City University, *Hiroshi HASEGAWA*, Associate Professor, Kanazawa University, **Japan**

Studies for Reuse of Solid Waste Generated In Production Catalyst for Fluid Catalytic Cracking Unit (Fcc), *Marco Figueiredo*, Professor, Universidade Do Estado Do Rio De Janeiro, *Wallace Souza*, Chem Eng, Universidade do Estado do Rio de Janeiro, *Jose Paulo Miguens*, Student, Universidade do Estado do Rio de Janeiro, **Brasil**

Evolution Of Industrial Solid Waste On A Site In Central Cheshire, England, *Kinan*

*Ibrahim*, Phd Student, The University Of Manchester, *Colin Hughes*, Prof., The University Of Manchester, *Alastair Martin*, Dr., The University Of Manchester, **United Kingdom**

Feasibility Study Of The Use Of Clay Capstone In Confection Of Soil-Binders Block In Plaster Pole Of Araripe., *Marcondes Ricardo De Barros*, Master's, Federal University Of Pernambuco, *Thomaz Lira*, Graduating, Federal University Of Pernambuco, *Arnaldo Manoel Pereira Carneiro*, Adjunct Professor, Federal University Of Pernambuco, **Brazil**

In Situ Recirculation-Fenton Oxidation Treatments For Leachate From A Closed Msw Landfill, *Xiaolan Zeng*, Associate Professor, Chongqing University, *Wenchuan Ding*, Professor, Chongqing University, *Tengrui Long*, Professor, Chongqing University, *Leilei Zhang*, *Chengbao Lin*, **P.R.China**

Industrial And Household Solid Waste Management Practices In Bulacan And Its Relationship To Public Health, *Alvin V. Nuqui*, Researcher, University Of Regina Carmeli, Malolos City, **Philippines**

Overview Of Waste Management In Brazil – Offshore Oil And Gas Exploration And Production Activities, *Decio Maia*, Manager, Aecom, **Brazil**

The Effect Of Sodium Silicate And Pulp Density On The Physical Property Of Gelfill, *Mehrdad Kermani*, Phd Candidate, McGill University, *Ferri Hassani*, Professor, McGill University, *Michelle Nokken*, Professor, Concordia University, *Ike Isagon*, Fimm Vale, Ontario Operations, Nickel, Copper Cliff, Ontario, Canada, **Canada**

Use Of Low-Grade Mgo To Stabilise Heavy Metals In Steel Electric Arc Furnace Waste, *Beste Cubukcuoglu*, Phd Student, University Of Surrey, *Sabeha Ouki*, Reader In Environmental Engineering, University Of Surrey, **United Kingdom**

Utilization Of Bio-Medical Incineration Ash In Soil Improvement, *Jawaid, Syed*, Assoc. Prof, M M M Engg College, **India**

Chemically Stabilised Biosolids As Compacted Landfill Liners, *Lakshika Goonewardena*, Ph.D. Student, University Of Melbourne, *Roger Wrigley*, Honorary Fellow, University Of Melbourne, *Robert Edis*, Principal Honorary Fellow, University Of Melbourne, *Kithsiri Dassanayake*, **Australia**

Cost Effective Dnapl Remediation Case Study Contaminated Soils And Groundwater At Refinery Site Montreal, Canada, Using Ivey-Sol Surfactant Technology, *George Ivey*, President, Ivey International Inc., *Martin Beaudoin*, Senior Environmental Engineer, Arcadis Canada, Inc., **Canada**

Development of Geopolymers from Coal Bottom Ash by Alkaline Activation, *Rozineide A. Antunes Boca Santa*, student, Santa Catarina Federal University, *Adriano Michael Bernardin*, Professor, Santa Catarina Extreme South University, *Humberto Gracher*

*Riella*, Professor, Santa Catarina Federal University, **Brazil**

Disposal of syringes by individuals with diabetes mellitus, in Ribeirão Preto of São Paulo, Brazil, *Silvia Carla da Silva André*, Pós-graduando, Escola de Enfermagem de Ribeirão Preto - Universidade de São Paulo, *Tatiane Bonametti Veiga*, Pós-graduanda, Universidade de São Paulo, *Ana Paula Milla dos Santos*, Pós-graduanda, Universidade de São Paulo, Angela Maria Magosso Takayanagui, **Brasil**

Efficient Conversion Of Waste Wooden Chopsticks Into Biofuel, *Chkako Asada*, Research Assistant, Department Of Life System, Institute Of Technology And Science, The University Of Tokushima, *Chizuru Sasaki*, Assistant Professor, Department Of Life System, Institute Of Technology And Science, The University Of Tokushima, *Yoshitoshi Nakamura*, Professor, Department Of Life System, Institute Of Technology And Science, The University Of Tokushima, Azusa Kita, Ai Asakawa, **Japan**

Importance Of Signage In Hospital For Biomedical Waste Transportation From Site Of Generation To Final Disposalsite: Case Study,” *DR Shishir*, Med Supdt, Apollo Hospitals, **India**

Long Island Municipal Recycling Programs Assessment, *Krista Greene*, Phd Student, Dept. Of Technology And Society, Stony Brook University, *Omkar Aphale*, Phd Student, Dept. Of Technology And Society, Stony Brook University, *General Ntshalintshali*, Phd Student, Dept. Of Technology And Society, Stony Brook University, *Prateek Nayak*, *David J. Tonjes*, *R. Lawrence Swanson*, **USA**

Landfill Site Selection For Municipal Solid Waste Disposal Using Remote Sensing And GIS Technique For Bhopal City, M.P., India, *Deepak Kumar Tripathi*, Student, Awadhesh Pratap Singh University, *J.P.Shukla*, Scientist, AMPRI, CSIR, **India**

Influence of soil management and thermally-dry sewage sludge amendment on soil labile C pools, microbial biomass C and CO<sub>2</sub> fluxes, *J.C. Garcia-Gil*, Staff Scientist, Instituto de Ciencias Agrarias (CSIC), *Isabel Haller*, Ph. D. Student, Instituto de Ciencias Agrarias (CSIC), *E.G. Lopez-de-Sa*, Staff Scientist, Instituto de Ciencias Agrarias (CSIC), A. Polo, Instituto de Ciencias Agrarias (CSIC), **Spain**

The Study on Solar Energy Assisted Calescence Compost Effect of Vegetable and Flower Straws, *Zhang Naiming*, Professor, Yunnan Agricultural University, *Qin Taifeng*, Researcher, Yunnan Agricultural University, *Shi Jing*, Lecturer, Yunnan Agricultural University, **China**

1:15 p.m. – 2:15 p.m.

**Luncheon**

2:15 p.m. – 4:15 p.m.

**Sessions 7**

**SESSION 7A**

## ***Policy, Economics and Regulations***

International Trade in E-wastes, *Masaaki Fuse*, Researcher, National Institute of Advanced Industrial Science and Technology, *Kiyotaka Tsunemi*, senior researcher, National Institute of Advanced Industrial Science and Technology, **Japan**

Renewable Energy From Wastes: A Workforce Planning Case Study From Queensland, *Dr Georgina Davis*, Workforce Planning Manager, Energy Skills Queensland, **Australia**

E-Waste Management In Bangladesh, *M. Habibur Rahman*, Pro-Vice Chancellor, Bangladesh University Of Engineering And Technology (BUET), *Abdullah Al-Muyeed*, Assistant Professor, Ahsanullah University Of Science And Technology (AUST), *Zuena Aziz*, Joint Secretary (WS), Local Government Division, Ministry Of Local Government Rural Development & Cooperatives, **Bangladesh**

Solid Waste Management In Ijebu Ode City, Ogun State, Nigeria, *Taiwo Odumosu, LL.B., B.L. LL.M*, Faculty Of Law, **Nigeria**

More! – Partnering For Sustainability To Address Our Desire For “More”!, *David Iacono, P.E.*, Sustainability Partnership Manager, US EPA Mid-Atlantic Region, **USA**

Assessment Of State Composting Regulations In The United States, *Nazli Yesiller*, Director, Global Waste Research Institute - Cal Poly, *Sam Vigil*, Professor, Civil And Environmental Engineering Dept., Cal Poly State Univ., *Jim Hanson*, Professor, Civil And Environmental Engineering Department - Cal Poly, **USA**

Factors Influencing The Formulation Of Emission Limit Values For Waste Incinerators In The EU, *Paulina Ramirez-Monsalve*, Phd Candidate, Aalborg Universitet, **Denmark**

## **SESSION 7B** ***Medical Wastes***

Safer Pharmaceutical Disposal Practices Through A Pilot Program For Consumers, *Julie Becker, Ph.D., MPH*, President and Founder, Women's Health & Environmental Network, *Teresa Mendez-Quigley, MSW, LSW*, Director, Women's Health & Environmental Network, *Kelly Anderson*, Water Specialist, Philadelphia Water Department, Paula Conolly, **USA**

Assessment And Status Of Municipal & Bio-Medical Waste Management In Kanpur City: A Case Study, *Dr. Alok Sinha*, Assistant Professor, Indian School Of Mines, Dhanbad, India, *Dr. Gurdeep Singh*, Professor & Head, Indian School Of Mines, Dhanbad, India, *Priyanka Gulati, Pratyush Kr. Verma*, B. Tech Students, HBTI, Kanpur, India, **India**

Final Disposal Of Expired Arvs In Nigeria, *Isa Iyortim*, HIV Prevention Manager, United States Agency For International Development, *Kelechi Enweruzo-Amaefule*, Health Care

Waste Management Advisor, AIDSTAR One Injection Safety Project, John Snow Incorporated., *Ugbede-Ojo Abu*, Pharmaceutical Manager, United States Agency For International Development, *Kalada Green.*, *Abimbola Sowande*, **Nigeria**

Performance Of Anaerobic Digestion Of Infectious Biomedical Waste With Alternative Disinfection Treatments, *Dr. S. Jayanthi*, Associate Professor In Civil Engg, Government College Of Technology, *Prof.E.Sarojini*, Assistant Professor In Civil Engg, Ramakrishna College Of Engg,*E.Sarojini*, **India**

### **SESSION 7C** ***Waste Collection***

The Effect Of Sodium Silicate And Pulp Density On The Physical Property Of Gelfill, *Mehrdad Kermani*, Phd Candidate, McGill University, *Ferri Hassani*, Professor, McGill University, *Michelle Nokken*, Professor, Concordia University, *Ike Isagon*, *Fimm Vale*, Ontario Operations, Nickel, Copper Cliff, **Canada**

The Price Of Private And Public Service In The Collection Of Household Waste: A Case-Study Of The Flemish Region Of Belgium, *Xavier Gellynck*, Professor, Ghent University, *Ray Jacobsen*, Phd Candidate, Ghent University, **Belgium**

Municipal Waste Management Status Of Dhaka City, *Abdullah Al-Muyeed*, Assistant Professor, Department Of Civil Engineering, Ahsanullah University Of Engineering And Technology, *Anik Talukder*, Student, Department Of Civil Engineering, Ahsanullah University Of Engineering And Technology, *Sanjiban Majumder*, Student, Department Of Civil Engineering, Ahsanullah University Of Engineering And Technology, *Anik Talukder*, *Sanjiban Majumder And Md. Shariful Alam*, **Bangladesh**

### **SESSION 7D** ***Research Advances I***

Biohythane Production From OFMSW: A Simple Way Of Implementation In Existing Plants, *Cristina Cavinato*, Phd, University Of Venice, *David Bolzonella*, Phd, University Of Verona, *Francesco Fatone*, Phd, University Of Verona, Prof. Franco Cecchi, Prof. Paolo Pavan, **Italy**

Sudy Of Cellulose Derivatives Obtained From Sugarcane Straw, *Adilson Roberto Gonçalves*, Professor, Engineering College At Lorena, *Rafael Garcia Candido*, Msc Student, Engineering College At Lorena, **Brazil**

Developing New Methods Of Disposal Municipal Solid Waste Worked Sulfuric Acid And Neutralization By Dolomite, *Sevda B.Gasimova*, Engineer, Department Of Chemical Problems Of National Academy Of Science Of Azerbaijan, *Academic, Professor, D. Agadadash M. Aliyev*, Assistant Of Director, Department Of Chemical Problems Of

National Academy Of Science Of Azerbaijan, *Sevinc A.Sakmanli*, Assistant Of Science Chair, Azerbaijan State University Of Economics, *Mirali S.Alosmanov* Professor, Dr., **Azerbaijan**

Disposal Municipal Solid Waste By Worked Fluorosilicichydrogenic Acid And Neutralization Of Serpentinite To Obtain Fertilizers., *Mirsalam B. Gambarov*, Engineer Of Chemical Technology, *Ma*, Department Of Chemical Problems Of National Academy Of Science Of Azerbaijan, *Professor, D. Mireli S. Alosmanov*, Direktor Of The 15th Laboratory, Department Of Chemical Problems Of National Academy Of Science Of Azerbaijan, *Sevinc A.Sakmanli*, Assistant Of Science Chair, Azerbaijan State University Of Economics, Academic, Professor, *D. Agadadash M. Aliyev*, **Azerbaijan**

Consolidation Of Kaolinite Mixed With Nano-Silica And Lime. *Mahmoud Ghazavi*, Associate Professor, Civil Engineering Department, K.N.Toosi University Of Technology, *Mohammad Bolhassani*, Graduate Student, Civil Engineering Department,, **Iran**

Production Of Phosphate - Rich Biofertiliser Using Vermicompost And Anaerobic Digester Sludge. *Prof.(Dr.)C.M.Narayanan*, Professor Of Chemical Engineering, National Institute Of Technology, **India**

Competitive Adsorption of Cadmium and Zinc on Zeolite Tuffs. *Sama Alkarmy*, Research Assistant, Jordan University of Science and Technology, *Lua'y Zeatoun*, Associate Professor, Jordan University of Science and Technology, **Jordan**

Biochemical Treatment Of Coke Oven Wastewater By Alcaligenes Faecalis And In Combination With Advanced With Oxidation And Membrane Separation Process. *Dr.Tamal Mandal*, Associate Professor, Nit, Durgapurdr. Tamal Mandal, **India**

Microbial Enzyme Assay As A Surrogate Measure Of Soil Microbial Activity In Jharia Coal Field, India. *Dr. Anshumali*, Assistant Professor, Indian School Of Mines, *Chitralekha Sengupta*, Research Scholar, Indian School Of Mines, *Prof G. Singh*, Professor, Indian School Of Mines, Dr. Anshumali, **India**

Decentralized Treatment of Slaughter House Solid Waste and Its Economic Review in India. *Er.S.Jothi Venkatraman*, Lecturer, Excel College of Engineering for Women, *Dr.S.Jayanthi*, Associate Professor, Government College of Technology, **India**

## **SESSION 7E**

### ***Case Studies 3***

Municipal Solid Waste Management In The Medium Size Indian Cities: Practice And Challenges. *Nadeem Khalil*, Assistant Professor, Department of Civil Engineering, Aligarh Muslim University (AMU), *Himanshu Sharma*, PG Student, AMU, *Atul Kumar Mittal*, Associate Professor, Department of Civil Engineering, Indian Institute of Technology Delhi (IIT Delhi), *Absar A Kazmi*, IIT Roorkee, **India**

Municipal Solid Waste Recycling, its Market and Practice: a Case of Medium Size Indian city, Aligarh, Nadeem Khalil, Assistant Professor, Department of Civil Engineering, Aligarh Muslim University (AMU), Parvez Alam, PG Student, AMU, Zeeshan Aslam, PG Student, Department of Civil Engineering, AMU, Atul Kumar Mittal (IIT Delhi), Mubashra Khan (UrbanPlan Consulting & Engineering Private Ltd., India)

The Role Of Informal Sector In The Delivery Of Sustainable Waste Management Services In Kaduna Metropolis, Abdullahi, Y.A., Senior Lecturer, Kaduna Polytechnic, Jiriko, K.G., Chief Lecturer, Kaduna Polytechnic, Akunna, J.C., Associate Proff, University Of Abertay Dundee **Nigeria**

Tales Of Two Cities: Municipal Solid Waste Management In Singapore And Berlin, Germany, Dongqing Zhang, Senior Research Fellow, DHI-NTU Centre, Nanyang Environment & Water Research Institute, Nanyang Technological University, Soon Keat Tan, Associate Professor, School Of Civil & Environmental Engineering, Richard, M. Gersberg, Professor, Graduate School Of Public Health, San Diego State University, **Singapore**

The State Of Solid Waste Management In West Africa: The Case Of Ghana, Mr. Emmanuel Kwaku Oteng, Director Of Programmes, Green Earth Organization (GEO), **Ghana**

4:15 p.m. – 4:30 p.m.

**Break**

4:30 p.m. – 6:40 p.m.

**Sessions 8**

## **SESSION 8A**

### ***Waste Generation and Composition***

A Case Study On Solid Waste Composition In Sagarmatha National Park And Its Buffer Zone (Snpbz), Solukhumbu, Nepal, Gyanendra Chaudhary, Kathmandu University, Sanjay Nath Khanal, Professor, Kathmandu University, Rijan B. Kayestha, Associate Professor, Kathmandu University, Kumud R. Kafle, **Nepal**

Quantities And Characteristics Of Discarded Produce From Supermarkets And Hypermarkets In Kuwait, M.F. Hamoda, Professor, Cfw, Kuwait University, **Kuwait**

Municipal Solid Waste Management In Moradabad City, India, Dr. Lubna Siddiqui, Assistant Professor, Department Of Geography, Jamia Millia Islamia University, Dr. Masood Ahsan Siddiqui, Associate Professor, Department Of Geography, Jamia Millia Islamia University, S.M. Rashid, Professor, Department Of Geography, Jamia Millia Islamia University, Dr. Shahzad Ali Ansari, **India**

Iso 14001 Certification And The Influence On Solid Waste Generation Rates For Manufacturing Organizations In The US, *Matthew J. Franchetti*, Assistant Professor Of Industrial Engineering, The University Of Toledo, **USA**

Health Care Waste Generation And Mangement, *Godwill Agyare Peprah*, Student, Kwame Nkrumah University Of Science And Technology, **Ghana**

Practice of SWM and Proposed system of WSM in Nepal, *Sumitra Amatya*, SWMRMC, **Nepal**

## **SESSION 8B**

### ***Waste Minimization***

A Systems Approach To Achieving Zero Landfill Status And Case Study, *Matthew J. Franchetti*, Assistant Professor Of Industrial Engineering, The University Of Toledo, **USA**

A Critical Review Of A Key Waste Strategy Initiative In England: Zero Waste Places, *Prof Paul Phillips*, Prof., University Of Northampton, *Roy Fairweather*, Visiting Fellow, University Of Northampton, *Terry Tudor*, Lecturer, University Of Northampton, **UK**

An Evaluation Of The Largest Resource Efficiency Club Programme In England (2005-2008), *Prof Paul Phillips Prof.*, Prof., University Of Northampton, *Roy Fairweather*, Visiting Fellow, University Of Northampton, **UK**

## **SESSION 8C**

### ***Research Advances 2***

Physico – Chemical Research And Development Of Methods Of Disposal Municipal Solid Waste By Nitrogen Compounds And Neutralizing By Shellrock Stone, *Sevinc A. Sakmanli*, Assistant of Science Chair, Azerbaijan State University of Economics, **Azerbaijan**

Study of Soil Co<sub>2</sub> Flux in a Tropical Forest and Grassland Area in Perspective of Determining Ecosystem Carbon Balance, *Sanjoy Kumar*, Research Scholar, Indian School of Mines, Dhanbad, *S.Chudhuri*, Proffesor, Indian School of Mines, Dhanbad, *S.K.Maiti*, Proffesor, Indian School of Mines, Dhanbad, **India**

Simultaneous Oxidative Reductive Chemical Treatment Of PAH Contaminated Soils At A Former Manufactured Gas Plant (MGP) Site Using A New Innovative Green Remediation Technology, *George Ivey*, President, Ivey International Inc., *Andrew Wollen*, ERR - Environmental Remediation Resources Pty Ltd, **Canada**

Bioremediation For Hazardous Liquid Industrial Waste Site – Al-Wafra Project, Kuwait,  
*Mohammad Abdulrahman Al-Sarawi*, Professor, Kuwait University, *Sharifa Al-Suwaidan*, Researcher, Kuwait Municipality, **Kuwait**

Characteristics Of Biochars Developed From Hydrothermal Treatment Of Waste Biomass, *Fu-Shen ZHANG*, Professor, Research Center For Eco-Environmental Sciences, Chinese Academy Of Sciences, **China**

Physico – Chemical Research And Development Of Methods Of Disposal Municipal Solid Waste By Nitrogen Compounds And Neutralizing By Shellrock Stone, *Sevinc A. Sakmanli*, Assistant Of Science Chair, Azerbaijan State University Of Economics, *Academic, Professor, D. Agadadash M. Aliyev*, Assistant Of Director, Department Of Chemical Problems Of National Academy Of Science Of Azerbaijan, *Professor, Dr., Mirali S. Alosmanov*, Direktor Of The 15th Laboratory, Department Of Chemical Problems Of National Academy Of Science Of Azerbaijan, **Azerbaijan**

Solar Photocatalytic Degradation Of Reactive Yellow 81 And Reactive Violet 1 In Aqueous Solution Containing Semiconductor Oxides, *A. Giwa*, Lecturer I (Ph.D), University, *P. O. Nkeonye*, Professor, University, *K. A. Bello*, Professor, University, *E. G. Kolawole, A. M. F. Oliveira Campos*, **Nigeria**

Research Works On Smelting Waste Materials In A Fluidized Bed System In Lagos, Nigeria, *Engr. Abdulwahab Ogunbiyi*, Chief Mechanical Engineer, Lagos State Government, *Engr. Olasunkanmi Morenikeji Ojowuro*, Principal Mechanical Engineer, Lagos State Government, **Nigeria**

## **SESSION 8D**

### ***Use of Waste Materials 3***

Utilization Of Bio-Medical Incineration Ash In Soil Improvement, *Jawaid, Syed*, Assoc. Prof, M M M Engg College, **India**

Feasibility Study Of The Use Of Clay Capstone In Confection Of Soil-Binders Block In Plaster Pole Of Araripe, *Marcondes Ricardo De Barros*, Master's, Federal University Of Pernambuco, *Thomaz Lira*, Graduating, Federal University Of Pernambuco, *Arnaldo Manoel Pereira Carneiro*, Adjunct Professor, Federal University Of Pernambuco, **Brazil**

Inertization Of Lead (Pb) By Recycling Of A High Pb Slag From Automobile Battery Manufacturing Into Building Bricks In Nigeria, *Gilbert Umaye Adie*, Lecturer, Redeemer's University, *Oladele Osibanjo*, Professor, University Of Ibadan, **Nigeria**

Utilization of Composted Municipal Solid Waste for Growing Apple Tree in Sandy soil, *Dr. Rawia El-Motaium*, Professor, Head of Plant Nutrition Unit, Plant Research Department, Atomic Energy Authority, **Egypt**

Phosphate Cement with Large Volume of Fly Ash, *DING Zhu*, Prof., Shenzhen University, *XING F*, Vice President, Nanhai Ave 3688, Shenzhen , Guangdong, *Zhang Min*, Engineer, Shenzhen University, **China**

Diagnosis and Control of Rice Straw Building Elements Degradation due to Fungal and Bacterial Infection, *Gihan L.K.Garas*, Associate Prof. (Dr. Eng.)Civil Engineering Department - Director of the Rice Straw Project in Construction, National Research Center, *Mostafa E. Allam*, Associate Prof. (Dr.Eng.) Civil Engineering Department, National Research Center, *Mohamed Abd El Kader*, Prof. Head of Plant Pathology Department, National Research Center, **Egypt**

6:45 p.m. – 7:45 p.m.  
**Closing Reception**

### **WEDNESDAY MARCH 30**

8:00 a.m. – 10:00 a.m.  
Conference check-in and registration

8:00 a.m. – 9:00 a.m.  
Coffee

9:00a.m. – 2:00 p.m.  
Technical Field Trips (choose 1)

#### **FIELD TRIP 1 – Environmental Landfill**

Delaware Solid Waste Authority's Central Solid Waste Management Center (CSWMC) is an 834-acre active landfill site located in Felton, Kent County, Delaware. CSWMC receives approximately 300 vehicles with 910 tons of waste per day. Current features of interest include:

- collection of landfill gas yielding production of approximately 3 MW of electricity – enough to meet the annual power needs of over 1,500 homes.
- construction of a new 60-acre cell, including a double liner and hydrostatic leak protection.
- installation of 2.24 acres of final capping providing for protection and revegetation.
- Solar power generation on capped section, consisting of 42 poly crystalline solar panels with inverters yielding a current capacity 7.5 kW with the capability to expand to 15 kW.
- wetlands treatment of leachate.

#### **FIELD TRIP 2 – Waste-to-Energy, Transfer and WEEE Recycling**

### **Covanta Delaware Valley Energy-from-Waste Facility**

The Covanta Delaware Valley Energy-from-Waste facility, located in Chester, Pennsylvania is capable of processing up to 3,348 tons of municipal and commercial solid waste each day. The facility originally opened for commercial operation in 1992. The plant not only meets the municipal solid waste disposal of Delaware County, but also provides capacity for up to 800,000 tons of additional waste each year from surrounding counties. Advanced control systems constantly monitor combustion performance, energy output and emissions at the Delaware Valley facility.

Utilizing six boilers, each with a rated capacity of 558 tons per day, the Delaware Valley facility has the ability to process up to 3,348 tons of municipal and commercial waste which, in turn, generates up to 90 MW of clean, renewable power. Additionally, the facility recovers approximately 40,000 tons per year of ferrous and non ferrous metal for recycling that would otherwise be lost in landfills. This operation conserves valuable landfill space by reducing the waste processed into an inert ash residue that is approximately 10% of its original volume.

A tour of the facility will include a brief overview by operations staff followed by a walking tour through the facility. The walking tour will allow visitors to see:

- Tipping floor – the location where municipal solid waste is unloaded from transfer trailers
- Control room – the command center of the facility
- Turbine Deck – the power generating equipment
- Boiler Floor – the combustion and steam generation equipment

### **Covanta Energy 58<sup>th</sup> St Transfer Station**

The 58th St Transfer Station is permitted as a solid waste & recycling transfer station. It is located in South West Philadelphia & zoned for industrial use & has rail access to CSX line. The site accepts commercial, municipal & demolition type waste as well as cardboard & office paper for recycling purposes.

The facility is in the process of installing an electronic scrap recycling process. The process will be on line in June of 2011. Visitors to the facility will take a tour of the operations including the new electronic recycling project.