



Contents

Volume 26

Editorial	1
Research potential of doctoral studies on environmental sciences and engineering A.S. Ciggin, I. Pala, T. Katipoglu (Istanbul, Turkey), E. Dulekgurgen (Denizli, Turkey), S. Meric (Fisciano, SA, Italy) and D. Orhon (Ankara, Turkey).....	3
Meteorological drought analysis case study: Central Anatolia Ü.G. Bacanlı, F. Dikbaş (Denizli, Turkey) and T. Baran (İzmir, Turkey)	14
Effect of sonication on the treatment of polycyclic aromatic hydrocarbons (PAHs) in a petrochemical industry wastewater and toxicity evaluations R. Oztekin and D.T. Sponza (İzmir, Turkey)	24
Application of UV disinfection in municipal wastewater treatment plants for agricultural use of reclaimed wastewater in Turkey S. Evcimen and A. Kerc (Istanbul, Turkey)	39
Modelling inactivation rates of indicator microorganisms based on laboratory determinations of T_{90} for different temperature and salinity levels O.B. Yalcin and A. Muhammetoglu (Antalya, Turkey)	45
Performance of a flat-sheet submerged membrane bioreactor during long-term treatment of municipal wastewater M. Turan (Istanbul), O. Ozdemir (Kayseri), A.Z. Turan (Istanbul), O. Ozkan (Kayseri), H. Bayhan (Istanbul) and E. Aykar (Kayseri, Turkey)	53
Effects of sludge retention time (SRTs) on the removals of polycyclic aromatic hydrocarbons (PAHs), chemical oxygen demand (COD), and toxicity in a petrochemical industry wastewater O. Gok and D.T. Sponza (Izmir, Turkey).....	57
Treatment and recycling facilities of highly polluted water-based paint wastewater M. Mamadiev and G. Yilmaz (Istanbul, Turkey)	66
Removal of heavy metal ions from aqueous solution by azocalix[4]arene Ö.Ö. Karakuş, S. Elçin (Denizli), M. Yilmaz (Konya) and H. Deligöz (Denizli, Turkey)	72
Estimation of hazardous waste factors Ö. Karahan, R. Taşlı (Istanbul), E. Dulekgurgen (Denizli) and E. Görgün (Istanbul, Turkey)	79
Remediation of oily wastewater from an interceptor tank using a novel photocatalytic drum reactor O.A. Salu, M. Adams, P.K.J. Robertson (Aberdeen, Scotland, UK), L.S. Wong (Blackdog, Aberdeenshire, UK) and C. McCullagh (Aberdeen, Scotland, UK)	87
Waste characterization at mixed municipal solid waste composting and recycling facility units K. Sezer and O. Arikan (Istanbul, Turkey)	92
EROD and metallothionein in <i>Limnodrilus profundicola</i> (Oligochaeta: Tubificidae) as an indicator of pollution exposure in the Curuksu stream of Menderes River, Denizli, Turkey A. Ozdemir, M. Duran, G.K. Akyildiz and A. Sen (Denizli, Turkey)	98
Conceptual basis for the appropriate design of biological wastewater treatment systems: drawbacks of existing prescriptions G. Insel (Istanbul), E. Dulekgurgen (Denizli), S. Sözen and D. Orhon (Istanbul, Turkey)	104
Current practices in hazardous waste management in Turkey O. Yilmaz, B. Dogru and U. Yetis (Ankara, Turkey)	111
The impacts of operational conditions on phenol removal by nanofiltration membranes H. Koseoglu, B.I. Harman, N.O. Yigit (Isparta), N. Kabay (İzmir) and M. Kitis (Isparta, Turkey)	118
Fouling characteristics of microfiltration membranes during the filtration of jet loop membrane bioreactor (JLMBR) activated sludge D.Y. Imer-Koseoglu, A. Karagunduz and B. Keskinler (Kocaeli, Turkey)	124
The treatment of wastewaters by supercritical water oxidation O.Ö. Söğüt, E.K. Yildirim and M. Akgün (Istanbul, Turkey)	131

Application of photo-Fenton-like oxidation for the degradation and detoxification of commercial naphthalene sulphonates: a case study with H-acid model pollutant N. Ayten, İ. Arslan-Alaton and T. Ölmez-Hanci (Istanbul, Turkey)	139
Decreasing water resources and a comprehensive approach to seawater reverse osmosis (SWRO): Case study – Cost analysis of a sample SWRO system R.S. Timur, G. Demir, A. Çoban, A. Çorum and T. Bozbura (İstanbul, Turkey)	145
Hazardous waste management in Turkey: Current legislative requirements and future challenges C. Yigit, G. Maden, N. Disa, O. Yılmaz, A. Ogutverici, E. Alp, K. Unlu, C.F. Gokçay, F.B. Dilek (Ankara, Turkey), O. Dogan (Kocaeli, Turkey), T. Karanfil (Anderson, SC, USA) and U. Yetis (Ankara, Turkey)	152
Investigation of color and COD removal by Fenton reagent from aqueous solutions containing acid and reactive dyestuffs Ö. Gökkuş and M. Oğuz (Kayseri, Turkey)	160
A comparative study on the control of disinfection by-products (DBPs) and toxicity in drinking water H. Selcuk (Istanbul, Turkey), S. Meric (Fisciano, SA, Italy), A.D. Nikolaou (Mytilene, Greece) and M. Bekbolet (Istanbul, Turkey)	165
Cost analysis of large scale membrane treatment systems for potable water treatment P.H. Ari, H. Ozgun, M.E. Ersahin and I. Koyuncu (Istanbul, Turkey)	172
Innovative self-cleaning and antibacterial cotton textile: no water and no detergent for cleaning S. Palamutcu, G. Acar, A.H. Çon, T. Gültekin (Denizli), B. Aktan and H. Selçuk (Istanbul, Turkey).....	178
Evaluation of efficiency analysis of wastewater treatment plants and applications in Denizli M. Güngör, S. Yildiz and E. Demýrcý (Denizli, Turkey)	185
Effect of organic and inorganic matters on the oxidation of Fe(II) in raw water from Ömerli Dam A. Unal, N. Tufekci, M. Cakmakci and C. Kinaci (Istanbul, Turkey)	194
Validation of thermal models to predict the heat and mass transfer coefficients for indoor simulation M.K. Gaur, G.N. Tiwari and S. Kumar (New Delhi, India)	201
Uptake of anionic surfactants from aqueous medium by using porous anionic clays with tailored properties G. Carja, A. Vieru, S. Dranca, G. Ciobanu and E. Husanu (Iasi, Romania)	211
Numerical error analysis of mass transfer measurements in batch dialyzer Z. Palatý and H. Bendová (Pardubice, Czech Republic)	215
Mass and heat transport resistance in pervaporation process A. Noworyta, M. Kubasiewicz-Ponitka and A. Koziol (Wroclaw, Poland)	226
Effect of gradually varying baffled-ring distance on ultrafiltration in tubular membranes inserted concentrically with a ring rod H.-M. Yeh, C.-H. Li and C.-C. Lin (Tamsui, Taiwan)	236
Efficiency of perlite as a low cost adsorbent applied to removal of Pb and Cd from paint industry effluent M. Malakootian (Kerman), N.-A. Jaafarzadeh (Ahvaz) and H. Hossaini (Tehran, Iran)	243
A mathematical model of single basin solar still with an external reflector A.A. El-Sebaei (Tanta, Egypt) and M. Al-Dossari (Jeddah, Saudi Arabia).....	250
Performance of honeycomb double exposure solar still K. Arshad, B. Janarthanan and S. Shanmugan (Coimbatore, India)	260
Acid-base and adsorptive properties of Tunisian smectite S. Gammoudi (Hammam-Lif, Tunisia), N. Frini-Srasra (El Manar, Tunisia), M.A. Goncalves (Lisbon, Portugal) and E. Srasra (Hammam-Lif, Tunisia)	266
Removal of chromium by adsorption on activated alumina I. Marzouk (El Manar, Tunisia and Thiais, France), C. Hannachi (El Manar, Tunisia), L. Dammak (Thiais, France) and B. Hamrouni (El Manar, Tunisia).....	279
Experimental validation of the theoretical correlation for calculation of mass transfer in simple and hybrid solar stills K. Hidouri, N. Hidouri, R.B. Slama, S. Gabsi and A.B. Brahim (Gabès, Tunisia)	287
Preparation and characterization of mesoporous ZnO by polystyrene microemulsion Y. Liu, L. Hua, S. Li and G. Xi (Henan, China)	297
Electrochemical degradation of some organic dyes by electrochemical oxidation on a Pb/PbO ₂ electrode M.S. Morsi (Cairo), A.A. Al-Sarawy and W.A.S. El-Dein (Mansoura, Egypt)	301
Erratum to "Preparation of agriculture residue based adsorbents for heavy metal removal" [Desalination and Water Treatment, Volume 22 (2010) 363–370] T.M. Zewail and S.A.M. El-Garf (Alexandria, Egypt)	309
Author Index.....	310