## REFERENCES

- Ahmad T. Shawaqfeh (2010) Removal of pesticides from water using anaerobic-aerobic biological treatment. <u>Chinese Journal of Chemical Engineering</u> 18(4): 672-680
- Anotai, J., Lu, M., Chewpreecha, P. (2006) Kinetics of aniline degradation by Fenton and electro-Fenton processes. <u>Water Research</u> 40: 1841-1847
- APHA (1992) <u>Standard methods for the examination of water and wastewater</u>, 18<sup>th</sup> Edition, Washington D.C.: American Public Health Association.
- Bajaj, M., Gallert, C., Winter, J. (2008) Biodegradation of high phenol containing synthetic wastewater by an aerobic fixed bed reactor. <u>Bioresource Technology</u> 99: 8376-8381.
- Cao, G. (1983) Production of phenol/acetone using cumene process. <u>The Chemical Industry Press</u>, Beijing.
- Chen, G., Hoag, G.E., Chedda, P., Nadim, F., Woody, B.A. and Dobbs, G.M. (2001) The mechanism and applicability of in situ oxidation of trichloroethelene with Fenton's reagent. <u>Journal of Hazardous Materials</u> B87: 171-186.
- Chu, Y. Y., Qian, Y., Wang, W. J., Deng, X. L. (2012) A dual-cathode electro-Fenton oxidation coupled with anodic oxidation system used for 4-nitrophenol degradation. <u>Journal of Hazardous Materials</u> 199-200: 179-185.
- EPA. (1988) Factsheet on cumene hydroperoxide (January 1988) <u>AQUIRE</u>

  <u>Database</u>, ERL-Duluth, U.S. Environmental Protection Agency.
- Hong, S., Zhang, H., Duttweiler, C. M., Lemley, A. T. (2007) Degradation of methyl *tertiary-butyl* ether (MTBE) by anodic Fenton treatment. <u>Journal of Hazardous Materials</u> 144: 29-40.
- HSDB/Hazardous Substances Data Bank. (1997) In: Tomes plus. <u>Environmental</u>
  Health and Safety Series I. Vol 32. National Library of Medicine.
- Huang, D., Han, M., Wang, J., Jin, Y. (2002) Catalytic decomposition process of cumene hydroperoxide using sulfonic resins as catalyst. <u>Chemical</u> Engineering Journal 88: 215-223.

- Kujawski, W., Warszawski, A., Ratajczak, W., Porebski, T., Capala, W., Ostrowaka, I. (2004) Application of pervaporation and adsorption to the phenol removal from wastewater. <u>Separation and Purification Technology</u> 40: 123-132
- Levin, M.E., Gonzales, N.O., Zimmerman, L.W., Yang, J. (2005) Kinetics of acid-catalyzed cleavage of cumene hydroperoxide. <u>Journal of Hazardous Materials</u> 130: 88-106.
- Lewis, R. J. (1993) <u>Hawley's Condensed Chemical Dictionary.</u> New York: Van Nostrand Reinhold.
- Li, R., Yang, C., Chen, H., Zeng, G., Yu, G., Guo, J. (2009) Removal of triazophos pesticide from wastewater with Fenton reagent. <u>Journal of Hazardous Materials</u> 167: 1028-1032.
- Liu, Q. Y., Liu, Y. X., LU X. J. (2011) Combined photo-Fenton and biological oxidation for the treatment of aniline wastewater. <u>Procedia Environmental Sciences</u> 12: 341-348.
- Lunar, L., Sicilia, D., Rubio, S., Perez-Bendito, D. and Nickel, U. (2000) Degradation of photographic developers by Fenton's reagent: condition optimization and kinetics for metal oxidation. <u>Water Research</u> 34, 6: 1791-1802.
- Malakahmad, A., Hasani, A., Eisakhani, M., Isa, M. H. (2011) Sequencing Batch Reactor (SBR) for the removal of Hg2+ and Cd2+ from synthetic petrochemical factory wastewater. <u>Journal of Hazardous Materials</u> 191:118-125.
- Martins, R. C., Rossi, A. F., Quinta-Ferreira, R. M. (2010) Fenton's oxidation process for phenolic wastewater remediation and biodegradability enhancement.

  <u>Journal of Hazardous Materials</u> 180: 716-721.
- Moussavi, G., Bagheri, A., Khavanin, A. (2012) The investigation of degradation and mineralization of high concentrations of formaldehyde in an electro-Fenton process combined with the biodegradation. <u>Journal of Hazardous Materials</u> 237-238: 147-152.
- Nidheesh, P. (2012) Trends in electro-Fenton process for water and wastewater treatment: An overview. <u>Desalination</u> 299: 1-15

- Nonglak Boonrattanakij. <u>Kinetics of 2,6-Dimethyl-aniline Degradation and Iron</u>

  <u>Crystallization in Fluidized-bed Fenton Process.</u> Doctoral dissertation,

  Inter-Department of Environmental Management, Chulalongkorn University,
  2009.
- Parsons, S. (2004) <u>Advance oxidation processes for water and wastewater treatment</u>. No.1, IWA Publishing, USA 130-145.
- Pignatello, J.J. (1992) Dark and photoassisted Fe<sup>3+</sup>-catalyzed degradation of chlorophenoxy herbicides by hydrogen peroxide. <u>Environmental Science and Technology</u> 26: 944-951.
- Radian Corporation (1991) <u>Cumene hydroperoxide</u>, NTP Chemical Repository Fact Sheet. Industrial catalytic processes-phenol production 280: 89-103.
- Sakugawa H., Hasan N., Olasehinde E. F., Takeda K., Kondo H., Applicability of solar photo-Fenton process to the remediation of water polluted with pesticides. <u>Nature and Science</u> 11(1)
- Schmidt, R. (2004) Industrail catalytic process-phenol production. <u>Applied Catalysis</u>
  <u>A</u>: General 280: 89-103
- Shin, S., Park, S., Choi, Y., Kim, H. (2001) Photodissociation Dynamics of Cumene Hydroperoxide at 248 and 193 nm. <u>The Journal of Physical Chemistry A:</u> 105: 10018-10024
- Tchobanoglous, G., Burton, F.L. and Stensel, H.D. (2003) <u>Wastewater engineering</u> treatment and reuse. 4th edition. New York: McGraw-Hill.
- USEPA (1985) Technical Support Document for Water Quality Base Toxic Control, EPA/440/485032, United States Environment Protection Agency, Washington, DC, USA.
- Vazquez, I., Rodriguez, J., Maranon, E., Castrillon, L., Fernandez, Y. (2006).
  Simultaneous removal of phenol, ammonium and thiocyanate from coke wastewater by aerobic biodegradation. <u>Journal of Hazardous Materials</u> B137: 1773-1780.
- Yadav, G., Asthana, N. (2002) Selective decomposition of cumene hydroperoxide into phenol and acetone by a novel cesium substituted heteropolyacid on clay. <u>Applied Catalysis A: General</u> 244: 341-357

Zeiger, E. (1998) Cumene hydroperoxide. <u>Review of Toxicological Literature.</u> Research Triangle Park, North Carolina 27709.

## **BIOGRAPHY**

NAME

Miss Kamonreuthai Tudthiam

DATE OD BIRTH

21<sup>th</sup> November 1988

PLACE OF BIRTH

Chantaburi, Thailand

**HOME ADDRESS** 

222/39 Sukhumvit road, Makham, Chantaburi 22150

PHONE

+66 (0) 867670693

E-MAIL

kamonreuthai.t@hotmail.com

## **EDUCATIONAL RECORD**

Bachelor Degree

Bachelor of Engineering (Environmental Engineering)

King Mongkut's University of Technology Thonburi,

Bangkok, Thailand, 2010

Master Degree

Master of Science program (Environmental

Management) International Postgraduate Program in

Environmental Management (Hazardous Waste

Management), Inter-Department of Environmental

Management Chulalongkorn University, Bangkok,

Thailand, 2012