REFERENCES

- Allen, J., Browne, M., Hunter, A., Boyd, J. and Palmer, H. (1998) "Logistics management and costs of biomass fuel supply", *Int. J. Physical Distribution* & Logistics Management, 28(6): 463-477.
- Arjharn, W. (2009). Study of a small-scale biomass power plant for rural
 Communities. Research Report, Suranaree University of Technology (SUT),
 Thailand.
- Assanee, N. and Boonwan, C., 2011, "State of The Art of Biomass Gasification Power Plants in Thailand", 9th Eco-Energy and Materials Science and Engineering Symposium, Chiang Rai, Thailand.
- Bank of Thailand (BOT). 2012. "Loan Rates of Commercial Banks as of July 2012." [Online]. Available http://www.bot.or.th/english/statistics/financialmarkets/ interestrate/_layouts/application/interest_rate/IN_Rate.aspx. (23 july 2012).
- Basu, P. (2006). Combustion and Gasification in Fluidized Beds. CRC Press.
- Blank, L. and Tarquin, A. (1998). *Engineer Economy* 4th ed., New York : McGraw-Hill.
- Boonnasa, S., 2007, "The effect of recovery efficiency on cost reduction of the electric generation fueled by a paddy husk", 6th Heat and mass conference, Thermal system research Unit, Chiang Mai University, Chiang Mai, Thailand.
- Caputo, A.C., Palumbo, M., Pelagagge, P.M. and Scacchia, F., (2005) "Economics of biomass energy utilization in combustion and gasification plants: effects of logistic variables", *Biomass and Bioenergy*, 28(2005), 35-51.
- Charunroch, J. and Sukkasham, S., Chawingrum, T, Khammeang, C and Kheawlad,
 K. 2011. "Acacia crushed production plant to supply animal feed by
 farmers in the Nakhon Ratchasima province." Narathiwat Animal Nutrition
 Research And Development Center, Department of Livestock Development,
 [Online]. Available http://www.dld.go.th/ncna_nak/index/katin.pdf(10
 September 2011).

Demirbas, A., (2003) "Fuelwood Characteristics of Six Indigenous Wood Species from the Eastern Black Sea Region", *Energy Sources*, 25, 309–316.

- Demirbas A., (2005) "Potential applications of renewable energy sources, biomass combustion problems in boiler power systems and combustion related environmental", *Prog Energy Combust Sci.*, 31, 171–92.
- Department of agricultural. 2006. "Plantation potential map of rubber in the north and northeast of Thailand (2004-2006)." [Online]. Available http://it.doa.go.th/rrit/web/index.php?p=p3&id=1483&PHPSESSID=9fe27aa e75dd562e2a9699d4bbcc2677 (1 Mar 2011).
- Department of Energy Development and Promotion (DEDP). 2008. "Feasibility of biomass gasification power plant at Cambodia." [Online]. Available <u>http://www2.dede.go.th/acmecs/summary%202550/THAI/kppart/4.htm</u> (17 Oct 2010).
- Dwivedi, P. and Alavalapati, Janaki R.R. (2009). "Economic feasibility of electricity production from energy plantations present on community-managed forestlands in Madhya Pradesh, India", *Energy Policy*, (37), 352–360.
- Electricity Generating Authority of Thailand (EGAT). 2010. "Corporate social responsibility Report 2010." [Online]. Available
 http://www.egat.co.th/images/stories/social/pdf/CSR-Annual-2553-en.pdf (1 May 2010)
- El-Kordy, M.N., Badr, M.A., Abed, K.A. and Ibrahim, S.M.A. (2001). "Economical evaluation of electricity generation considering externalities", *Renewable Energy*, 25(2), 317-328.
- Energy For Environment Foundation (EforE). (2004). The study of supported production of electricity from wind power and solar energy. Final report present to National Energy Policy Office (NEPO).

Energy For Environment Foundation (EforE). 2012. "Biomass's calendar." [Online]. Available <u>http://www.efe.or.th</u> (4 Mar 2010)

Energy Policy and Planning Office (EPPO). 2012. "VSPP data." [Online]. Available http://www.eppo.go.th/power/index.html (1 Mar 2012).

Energy For Environment Foundation (EforE). 2012 "biomass's Price." [Online]. Available <u>http://www.efe.or.th</u> (4 Feb 2012). Energy Policy and Planning Office (EPPO). 2011. "Energy Statistics of Thailand 2011." [Online]. Available http://www.eppo.go.th/info/cd-2011/index.html (17 Feb 2011).

Energy Research and Development Institute – Nakornping (ERDI). 2012. "Energy data." [Online]. Available http://www.thaienergydata.in.th/province/51/(5 April 2012).

Environmental Systems Research Institute(ESRI). 2005. "ArcGis. ESRI technical paper."[Online]. Available <u>www.esri.com</u> (20 July 2010)

European commission (EC). (2005). ExternE Externalities of Energy Methodology 2005 Update. Institute for Energy wirtschaft and Rationelle Energieanwendung(IER), University Stuttgart, Germany.

Fiedler, P., Lange, M., Schultze, M., 2007, "Supply Logistics for the Industrialized
Use of biomass – Principles and Planning Approach", International
Symposium on Logistics and Industrial Informatics, Wildau, Germany.

Forestry Industrial Organization. 2012. "Eucalyptus wood purchased price." [Online]. Available http://www.fio.co.th/marketing/Web/Market006.htm (30 July 2012)

Geo-Informatics Center for Thailand (GISTHAI). 2008. "Learning GIS." [Online]. Available http://www.gisthai.org/about-gis/gis.html (1 May 2008).

George A. Olah, Alain Goeppert and G. K. Surya Prakash. (2009) "Chemical Recycling of Carbon Dioxide to Methanol and Dimethyl Ether: From Greenhouse Gas to Renewable, Environmentally Carbon Neutral Fuels and Synthetic Hydrocarbons" J. Org. Chem., 74 (2), 487–498.

Great Agro. 2010. "Electricity product with gasification."[Online]. Available http://www.dede.go.th/dede/index.php?option=com_content&view=category &layout=blog&id=143&Itemid=350&lang=en&limitstart=665(13 Oct 2010)

 Guoxing, D. Lianbai, G. and Zhendeng, Z. 2003, "Study on Drying Strategies for Eucalyptus Lumber with 25mm Thickness", 8th International IUFRO Wood Drying Conference, Brasov-Romania.

Henrik W., Michael H. and Leo A. (1997). *Environmental Assessment of Products*. Volume 1, Chapman & Hall.

- Hofbauer, H. (2005) "Thermo-Chemical Biomass Conversion for the Provision of Heat Electricity and fuel" *Renewable Energy Network*, Austria.
- Hubert E. Stasen. (1995). Small-scale Biomass Gasification for Heat and Power a Global review. World blank Technical paper.
- International Organization for Standardization(ISO). 2006. "ISO14040 standard." [Online]. Available <u>www.iso.org</u> (7 July 2006).
- Jayasinghe, N.R., Rupananda, W. and Hettigama, M., (2006) "Socio-economic impacts of dendrothermal power generation in rural Sri Lanka: a case-study", *Energy for Sustainable Development*, 10(3), 64-67.
- Jirakajohnkool, S. (2009). *Learning GIS with software ArcGIS Desktop 9.3.1*. S.R. Printing mass product, Bangkok.
- Jungmeier, G., 2000, "LCA for Comparison of Greenhouse Gas Emissions of Bioenergy and Fossil Energy System", 8th Meeting of cost E9-Working Group3, Montpellier, French.
- Junthon, W and YhouMeaung, S. (2002). *GIS in Government*. Geographic Information for Resources and Environment Research Institute.
- Annamalai, K and Puri, I. (2007). *Combustion Science and Engineering*. USA:CRC Press.
- Kanitpong, T and Promkutkeo, S., (2010) "Price and Income Elasticity of Export and Import: Case of Thailand", J.NIDA Business, 7, 143-156.
- Kasetsart Agricultural and Agro-Industrial Product Improvement Institute (KAPI). (2007). *The feasibility of the use of biomass in the region to generate electricity*. final report, Kasetsart University.
- Khamboonrueng, D., Jindaruk, S. and Dussadee, N., 2006, "Survey on the use and source of sustainable energy resource at village scale", Proceeding of 7 th
 Maejo University Annual Conference: Oral section, The Office of Agricultural Research and Extension Maejo University, Chiang mai, Thailand.

Khompis, V., Arjharn, W., Viriyanbcha, C., Oonsivisai, A., Taepean, V.,

Arkornchee, W., Junyusen, P., Liplap, P., Ngernyen, Y., Jirakkakun, P.,
Kongkapee, N., Chanaroke, P, Prpakarn, N., Hinsui, T., Khomhom, S.,
Pansripong, S., Chaohuimak, P. and Nuyam, S. 2009. *Study of a small-scale biomass power plant for rural communities (Phase II)*. Final report present to National Research Council of Thailand (NRCT), Suranaree University of Technology (SUT), Thailand.

Koomey, J. and Krause, F. (1997). *Introduction to Social Externality costs*, *Hand book of Energy Efficiency*, Edited by Frank Kreith and Ronald E. West. CRC Press.

Kopetz, H., (2007) "Biomass – a burning" Policies needed to spark the biomass heating market, Refocus, 8(2), 52-58.

- Krukanont, P. and Prasertsan, S., (2004) "Geographical distribution of biomass and potential sites of rubber wood fired power plants in Southern Thailand". *Int. J. Biomass and Bioenergy*, 26, 47-59.
- Kuntong, H. (2002). *Potential of Short Rotation trees*. Department of Alternative Energy Development and Efficiency (DEDE), Ministry of Energy, Thailand.

Laemsak, N., Hanwongjirawat, W., Watcharinrat, C., Teejunuk, S., Kunruttanasiri,W.
 Tanasombat, M. and Haruthaithanasan, K. (2007). *The Utilization of fast Growing Trees for Renewable Energy to Produce Electricity and Fuel Gas*.
 Research Report presented to National Research Committee Office, Thailand.

Law Reform Commission Office of the Council of state (TLRC). 2012. "Land Transportation Act. (BE 2551)." [Online]. Available <u>http://www.lawreform.</u> <u>go.th</u> (May, 2012).

Leung, Dennis ,Y.C., Yin, X.L. and Wu, C.Z., (2004) "A review on the development and commercialization of biomass gasification technologies in China", *Renewable and Sustainable Energy Reviews*, 8(6), 565-580.

Mahapatra, S. and Dasappa, S., (2012) "Rural electrification: Optimizing the choice between decentralized renewable energy sources and grid extension", *Energy for Sustainable Development*, (16), 146–154.

McKendry, P., (2002) "Energy production from biomass (part 2): conversion technologies", *Bioresource Technology*, (83), 47–54.

- Ministry of Energy. 2009. "Potential energy assessment." [Online]. Available http://www.thaienergydata.in.th/ (14 Oct Feb 2009).
- Ministry of Finance. 2012. "draft of Act of economic instruments for Environmental management". [Online]. Available http://infofile.pcd.go.th/waste/waste_531201_L3.pdf?CFID=9851331& CFTOKEN=46389277(21 Jan 2011).
- Minnesota Public Utilities Commission. 2012. "2012 Environmental Externalities Notice", [Online]. Available http://www.puc.state.mn.us/puc/electricity/ ReportsandStudies/NoticesofInterest/index.html (13 Jun 2012).
- National Metal and Materials Technology Center (MTEC). 2010. "Emission Factor." [Online]. Available <u>http://thaicarbonlabel.tgo.or.th/filedownlaod/</u> 1326646501-12.pdf (4 Oct 2011).
- Natural Resources Conservation Service United States Department of Agriculture (NRCS). (2005). Biomass-Fired District Energy: A Source of Economic Development and Energy Security. Final Report, Local Energy, Santa Fe, New Mexico.
- Nuntaphan, A., Kiatsiriroat, T. and Dussadee, N., (2006) "Performance Testing of Tray-type Desiccant Unit for Longan Drying Process" *J. engineering*, Chiang mai University, 13(1):8-18.
- Pamela L. Spath, Margaret K. Mann and Dawn R. Kerr. (1998) Life Cycle Assessment of Coal-fired Power Production. National Renewable Energy Laboratory, Colorado.
- Parker, A. N. (1995). Decentralization: *The Way Forward for Rural Development*, Policy Research Working Paper, World Bank, Agriculture and Natural Resources Department-Sector Policy and Water Resources Division, Washington DC, USA.
- Pearce D.W. (2003) *The role of "property rights" in determining economic values for environmental costs and benefits*. Report to the UK Environmental Agency, Bristol.

Perpina, C., Alfonso, D., Perez-Navarro, A., Penalvo, E., Vargas, C. and Cardenas, R., (2009) "Methodology based on Geographic Information Systems for biomass logistics and transport optimization.", *Renewable Energy*. (34), 555-565.

Pheomphanbun, P and Emaruji, B, 2008, "Application of GIS to locating of the power plant by using maize and used cooking oil Case study Phayao", The 1stThailand Renewable Energy Community Configuration Conference(TREC), School of Renewable Energy Technology, Naresuan University, Phitsanulok.

Pian C.C. and Yoshikawa K., (2001) "Development of a high-temperature airblown gasification system", *Bioresource Technology*, 79(3), 231-241.

Rajvanshi, Anil K. (1986) "Biomass gasification" book of Alternative Energy in Agriculture (pp.83-pp.102) Vol. II, Ed. D. Yogi Goswami, CRC Press,.
[Online]. Available <u>http://www.nariphaltan.org/gasbook.pdf (3</u> Jan 2010).

Rattansriwong, S. et al. (2006). *Potential of sugarcane production in Roi-Et province*. Final report. Department of Agriculture library.

Rentizelas, A.A., Tatsiopoulos I.P. and Tolis A. (2008) "An optimization model for multi-biomass tri-generation energy supply", *biomass and bioenergy*, 33, (223 – 233).

Richard C. Porter. (2002). *The Economics of Waste*. Resource for the Future Press, Washington DC., USA.

 Rubsombut, K., Mukkhun, T., Nouyim, S and Arjharn, W., 2012, "Combustion Efficiency Improvement of Eucalyptus Bark Fuel Used In Boiler By Densification Process", The 13th Annual conference of the Thai Society of Agricultural, Chiangmai, Thailand.

Rukvichian, W. (1999). Evaluation of Photovoltaic Systems in Thailand.
Research Report presented to National Research Committee Office, Thailand.
Sadamichi, Y. (2006). An Assessment Method of Consolidated Life Cycle Impact and its Application to Electricity Generating Processes in Japan. Doctor's Thesis.
Mie University, Japan.

Saidura, R., Abdelaziz, E.A., Demirbas, A., Hossain, M.S. and Mekhilef, S., (2011)
"A review on biomass as a fuel for boilers", *Renewable and Sustainable Energy Reviews*, (15), 2262–2289.

- Sajjakulnukit, B., Yingyuada, R., Maneekhao, V., Pongnarintasut, V., Bhattacharya, S.C. and Abdul Salam, P., (2005) "Assessment of sustainable energy potential of non-plantation biomass resources in Thailand", *Biomass and Bioenergy*. (29), 214–224.
- Sakulniyomporn, S., Kubaha, K. and Chullabodhi, C., (2011) "External costs of fossil electricity generation: Health-based assessment in Thailand", *Renewable and Sustainable Energy Reviews*, (15), 3470–3479.
- Senelwa, K. and Ralph, E.H.S., (1999) "Fuel characteristics of short rotation forest biomass", *Biomass and Bioenergy*, (17), 127 – 140.
- Singh ,V. and Torky ,O.P. (1994). Biomass and net primary productivity in Lucacena,Acacia and Eucalyptus, Short Rotation high density (energy) plantation in arid in India. Department of Forestry, Haryana Agricultural University.
- Sniedovich, M. 2009. "Dijkstra's Algorithm revisited: the OR/MS Connexion" Department of Mathematics and Statistics, The University of Melbourne. Parkville, VIC 3052, Australia [Online]. Available http://www.ifors.ms.unimelb.edu.au/tutorial/dijkstra_new/index.html.
- Solantausta, Y. and Kurkela, E. (1995). *Feasibility of Electricity Production from Biomass by Gasification Systems.* VTT Energy, Technical Research Center.
- Sorawut, V and Rattansriwong, S. (2006). *Potential of Cassava production*. Khon Kaen Field Crops Research Center, Department of Agriculture.
- Sukkasem, C., Chalothorn, C., Manajuti, D., Aoungsawad, K., (1994) "Growth and Production of Acacia and Leucaena in Chiang Mai", J. Agriculture, 10(3), 226-234.
- Sundqvist, T. (2002). Power generation choice in the Present of Environmental Externality. Doctor's Thesis, Department of Business Administration and Social Sciences, Division of Economic. California.
- Sundqvist, T. and Soderholm, P., (2002) "Valuing the Environmental Impacts of Electricity Generation: A Critical Survey", *J. Energy Literature*, 8(2), 3-41.
 Suramaythangkoor, T., and Gheewala Shabbir, H., (2008) "Potential of practical implementation of rice straw-based power generation in Thailand", *Energy Policy*, (36), 3193–3197.

- Thanes, U., Soontornrangson, W. and Piyakundumrong, P., 2007, "Energy potential of biomass in Thailand", 3 rd Conference on Energy Technology Network of Thailand (E-NETT), Baiyoke Sky hotel, Bangkok.
- The Energy and Environmental Engineering Center (EEEC). (2011). *Design and construction of three stages biomass gasifier 400 kW*. Final report, Kasetsart University.
- Todorovic, M., and Steduto, P., (2003) "A GIS for irrigation management" *Physics* and Chemistry of the Earth, 28(4–5), 163-174.
- Tudsri, S., Sripichitt, P., Nakmanee, G. and Wongsuwan, N., 2007, "Giant Leucaena for Energy and Ruminant Animal Feeding", Proceeding of Study of Small Scale Biomass Power Plant for Rural Communities, Nakhonratchasima.
- Velez. D.A, Torres and Valle. J.I, Del., (2007) "Growth and yield modeling of Acacia magium in Columbia", New Forests, 34:293–305.
- Viriyabancha, C., Boonsermsuk, S., Arjharn, W., Kamhom, S., Prapakan, N., Hinsui, T. and Wongmasjan, J. (2007). *Study of Small Scale Biomass Power Plant for Rural Communities; Study of a Short Forest Plantation for Rural Electricity Production*. Final report, Office of the National Research Council of Thailand.
- Vorayos, N. (2005). Performance analysis of continuous solar ethanol distillation system including environmental impact. Doctor 's Thesis. The joint graduate school of energy and environment at Kingmongkut's University of Technology Thonburi.
- Vorayos, N., Kiatsiriroat, T., Tipayawong, N., Vorayos, N., Dussadee, N., Thararux, C., and Nuntaphan, A., (2008). *Feasibility Study of Community-Scale Electricity Generation from Fast-Growth Wood Energy*. Research Report presented to National Research Committee Office, Chiang mai University.
- Waewsak, J., Mani, M., Buaphet, P. and Panichayunon, P., 2007. "A Biomass Gas Engine System for Power Generation of OTOP Building in Southern Thailand", IEEE Conference Publications.
- Wade A.Amos. (1998), Report on Biomass Drying Technology. Midwest research Institute for the U.S. Department of Energy.

- Walter E. Westman, (1985). Ecology, Impact Assessment and Environmental Planning, Wiley-Interscience, New York, USA.
- Widiyanto, A., Kato, S., and Maruyama, N. (2002). "A LCA/LCC Optimized Selection of Power Plant System with Additional Facilities Options", J. Energy Resources Technology, (124), 290-299.
- Varela, M., Lechoan, Y. and Saez, R., (1999) "Environmental and socioeconomic aspects in the strategic analysis of a biomass power plant integration", *Biomass and Bioenergy*, (17), 405-413.
- Yamane, T. (1967). *Statistics: An introductory analysis*. New York: Harper and Row.

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