

DAFTAR PUSTAKA

- Anny. 2010. *Sintesis dan uji kinerjafotokatalis N-TiO₂ nanotube untuk aplikasi produksi hidrogen dari gliserol dan air*. Skripsi, Departemen Teknik Kimia-FT-UI: Depok
- Anonym. 2010. *Glycerol* [Online]. Available from: <http://en.wikipedia.org/wiki/Glycerol>. [Accessed 20nd Nopember 2010]
- Anonym. 2011. *Electrochemistry* [Online]. Available from: <http://www.chemcases.com/cisplat/cisplat04.htm> [Accessed 5nd January 2011]
- Anonym. 2011. *Nanokomposit Material Superkuat dan Ringan* [Online]. Available from: <http://www.wikipedia.org/nanokomposit> [Accessed 5nd January 2011]
- Adhikari, Sushil, Fernando, Sandun D., Haryanto, Agus. 2007. *Production of hydrogen by steam reforming of glycerin over alumina-supported metal catalysts*. J. Catal., Volume 129, 355–364
- Adhikari, Sushil, Fernando, Sandun D., Haryanto, Agus. 2008. *Hydrogen production from glycerin by steam reforming over nickel catalysts*. J. Renew. Ener., Volume 33, 1097–1100
- Anpo M., Takeuchi M. 2003. *The design and development of highly reactive titanium oxide photocatalysts operating under visible light irradiation*. J. Catal., Volume 216, 505–516
- Asahi R., Morikawa T., Ohwaki T., Aoki K., Taga Y. 2001. *Visible-light photocatalysis in nitrogen-doped titanium oxides*. Science, Volume 293, 269–271
- Bamwenda G.R., Arakawa H. 2001. *The photoinduced evolution of suspension O₂ and H₂ from a WO₃ aqueous suspension in the presence of Ce⁴⁺=Ce³⁺*. Sol Energi Mater Sol Cells, Volume 70, 1–14
- Choi W.Y., Termin A., Hoffmann M.R. 1994. *The role of metal ion dopants in quantum-sized TiO₂: correlation between photoreactivity and charge carrier recombination dynamics*. J. Phys Chem., Volume 84, 13669–13679
- Cortright D.R., Dumesic J.A. 2004. *Low-temperature hydrogen production from oxygenated hydrocarbons*. US. Patent, Volume 6, 699,457 B2
- Cristallo G., Roncari E., Rinaldo A., Trifirò F. 2001. *Study of anatase–rutile transition phase in monolithic catalyst V₂O₅/TiO₂ and V₂O₅–WO₃/TiO₂*. Applied Catal. A General, Volume 209, 249–256
- Daskalaki, Vasileia M., Kondarides, Dimitris I. 2008. *Efficient production of hydrogen by photo induced reforming of glycerol at ambient conditions*. J. Catal., Volume 144, 75–80

- Fernandez Y., Arenillas A., Díez M.A., Pis J.J., Menendez J.A. 2009. *Pirolisis of glycerol over activated carbons for syngas production*. J. Anal. Appl. Pyrolysis, Volume 84, 145-150
- Gunlazuardi J., 2001. *Fotokatalisis pada permukaan TiO₂ : Aspek Fundamental dan Aplikasinya*. Prosiding Seminar Nasional Kimia Fisika II, Jakarta
- Hennek M., *Nitrogen-doped titanium dioxide: an overview of function and introduction to applications*. Alabama University
- Hadyawarman. 2008. *Fabrikasi Material Nanokomposit Superkuat, Ringan dan Transparan Menggunakan Metode Simple Mixing*. Jurnal Nanosains & Nanoteknologi, Volume 1, 14-21
- Huabing Yi, Tianyou Peng, Dingning Ke, Dai Ke, Ling Zan, Chunhua Yan. 2008. *Photocatalytic H₂ Production from methanol aqueous solution over titania nanoparticles with mesostructures*, International Journal of Hydrogen Energy, Volume 33, 672-678
- Iriondo A., Barrio V.L., Cambra J.F., Arias P.L., Güemez M.B., Navarro R.M. , Sanchez-Sanchez M.C., Fierro J.L.G. 2009. *Influence of La₂O₃ modified support and Ni and Pt active phases on glycerol steam reforming to produce hydrogen*. J Catal. Commun., xxx-xxx
- Ji-Jun Zou, Hei He, Lan Cui, Hai-Yan Du. 2007. *Highly efficient Pt/TiO₂ photocatalyst for hydrogen generation prepared by a cold plasma method*. International Journal of Hydrogen Energy, Volume 32, 1762-1770
- Jinlong Zhang, Yongmei Wu, Mingyang Xing, Leghari, Sajjad Ahmed Khan, Sajjad Shamila. 2010. *Development of modified N doped TiO₂ photocatalyst with metals, nonmetals and metal oxides*. Energy Environ. Sci., Volume 3, 715-726
- Khan M.A., Akhtar M.S.,Woo S.I, Yang O-Bong. 2008. *Enhanced photoresponse under visible light in Pt ionized TiO₂ nanotube for the photocatalytic splitting of water*. Catalysis Com., Volume 10,1-5
- Lalitha K.,Sadanandam G., Kumari D.V., Subrahmanyam M., Sreedhar B., Hebalkar N.Y.2010. *Highly stabilized and finely dispersed Cu₂O/TiO₂: a promising Visible sensitive photocatalyst for continuous production of hydrogen from glycerol, water mixtures*. J. Phys. Chem., xxx-000
- Licciulli A., Lisi D. 2002. *Self-Cleaning Glass*. Universita Degli Studio Di Lecce
- Lin Wen-Chung, Yang Wen-Duo, Huang I-Lun, Wu Tser-Son, Cung Zu-Ja. 2009. *Hydrogen production from methanol/water photocatalytic decomposition using Pt/TiO_{2-x}N_x catalyst*. Energy and Fuels, Volume 23, 2192-2196

- Li M., Li Y.X., Peng Shaoqin, Lu G.X., Li S. 2009. *Photocatalytic hydrogen generation using glycerol wastewater over Pt/TiO₂*. *Front. Chem. China*, Volume 4, Issue 1, 32–38
- Linsebigler A.L. 1995. *Photocatalysis on TiO₂ surfaces : Principles, Mechanism, and Selected Results*. *Chem. Rev.*, Volume 95, 735-758
- Li Y.X., Lu G.X., Li S.B. 2003. *Photocatalytic production of hydrogen in single component and mixture systems of electron donors and monitoring adsorption of donors by in situ infrared spectroscopy*. *Chemosphere*, Volume 52, Issue 5, 843-850.
- Merck. 2010. *Product Catalog*
- Mohamed R.M. 2009. *Characterization and catalytic properties of nano-sized Pt metal catalyst on TiO₂-SiO₂ synthesized by photo-assisted deposition and impregnation methods*. *Journal of Material Processing Technology*, Volume 209, 577-583
- Muller, Ulrich. 2006. *Inorganic Structural Chemistry*. Jhon Willey & Sons: USA
- Nada A., Barakat M.H., Hamed H.A., Mohamed N.R., Veziroglu T.N. 2005. *Studies on the photocatalytic hydrogen production using suspended modified TiO₂ photocatalysts*, *International Journal of Hydrogen Energy*, Volume 30, Issue 7, 687–691
- Nianjun Luo, Zheng Jiang, Huahong Shi, Fahai Cao, Tiancun Xiao, Edwards P.P. 2009. *Photo-catalytic conversion of oxygenated hydrocarbons to hydrogen over heteroatom-doped TiO₂ catalysts*. *J Catal.*, Volume 34, 125–129
- Ni M., Leung M., Leung D., Sumathy K. 2007. *A review and recent developments in photocatalytic water-splitting using TiO₂ for hydrogen production*. *Renewable and Sustainable Energy Rev.*, Volume 11, 401–25
- Othmer, K. 1994. *Encyclopedia of Chemical Technology*. 4th ed. Wiley Interscience: Singapore
- Park H., Vecitis C.D., Wonyong Choi, Oleh Weres, Hoffmann M.R. 2008. *Solar Powered Production of Molecular Hydrogen from Water*. *The Journal of Physical Chemistry C Letters*, Volume 112, 885 – 889
- Radecka M., Rekas M., Trenczek-Zajac A., Zakrzewsk K. 2008. *Importance of the band gap energy and flat band potential for application of modified TiO₂ photoanodes in water photolysis*. *J. Power Sources*, Volume 181, 46-55
- Richardson J.T. 1989. *Principles of Catalyst Development*. Plenum Press: New York
- Ryo baba, Seiichiro Nakabayashi, Akira Fujishima. 1985. *Investigation of the Mechanism of Hydrogen Evolution during Photocatalytic water decomposition on metal loaded semiconductor Powders*. *J. Phys Chem.*, Volume 89, 1902-1905
- Sayama K., Arakawa H., Okabe K., Kusama H. 2000. *Production of hydrogen from water using photocatalyst-electrolysis hybrid sistem*. *US. Patent*, Volume 6, 063,258

- Slamet, Hosna W., Ezza P., Kapti R., Gunlazuardi J. 2009. *Effect of Copper Species in a Photocatalytic Synthesis of Methanol from Carbon Dioxide over Copper-doped Titania Catalysts*. J. World Appl. Sci., Volume 6, Issue 1, 112-122
- Slamet, Setiadi, Eny K., Anny, Agus S.A. 2010. *Produksi Hidrogen dari Giserol dan Air Secara Fotokatalitik*. Prosiding RAPI, Volume 9, K28-K34
- Slamet, Hosna W.N., Ezza Purnama, Kapti R., Jarnuzi G. 2009. *Effect of copper species in a photocatalytic synthesis of methanol from carbon dioxide over copper-doped titania catalyst*. World Applied Sciences Journal, Volume 6, 112-122
- Smith R.J., Xiao-Gong Wang, Van Steenkist T.H. 2007. *Thermal activation of photocatalytic generation of hydrogen*. US. Patent, 0196268 B2
- Subramanian V., Wolf E., Kamat P. 2004. *Catalysis with TiO₂/gold nanocomposites: effect of metal particle size on the fermi level equilibration*. J. Am. Chem. Soc., Volume 126, 4943–4950
- Suryanarayana C., Norton M.G. 1998. *X-ray Diffraction*. Plenum Press: New York
- Syukri. 2003. *Development of a new synthetic process of metallic fine powders and films*. Dissertation, Gifu University: Japan
- Tjahjanto R.T., Gunlazuardi J. 2001. *Preparasi Lapisan Tipis TiO₂ sebagai Fotokatalisis: Keterkaitan antara Ketebalan dan Aktivitas Fotokatalisis*. Jurnal Penelitian Universitas Indonesia, Volume 5, 81-91
- Wu N.L., Lee M.S. 2004. *Enhanced TiO₂ photocatalysis by Cu in hydrogen production from aqueous methanol solution*. Volume 29, Issue 15, 1601–1605
- Xiaodong Wang, Maoshuai Li, Meihua Wang, Hao Wang, Shuirong Li, Shengping Wang, Xinbin Ma. 2009. *Thermodynamic analysis of glycerol dry reforming for hydrogen and synthesis gas production*. J. Fuel, Volume 88, 2148-2153
- Yasuro Ikuma, Hiroaki Bessho. 2007. *Effect of Pt concentration on the production of hydrogen by a TiO₂ photocatalyst*. International Journal of Hydrogen, Volume 32, Issue 14, 2689-2692