
Cryptanalysis of Permutation Ciphers

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INTRODUCTION

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REFERENCES

Anand, U., 2010. The Elusive Free Radicals, *The Clinical Chemist*, [e-journal] Available at:<<http://www.clinchem.org/content/56/10/1649.full.pdf>> [Accessed 2 November 2013]

Biology Forums, 2012. *Normal glomerulus. Acute glomerulonephritis*. [online] Available at: <<http://biology-forums.com/index.php?action=gallery;sa=view;id=9284>> [Accessed 23 October 2013].

Budisavljevic, M., Hodge, L., Barber, K., Fulmer, J., Durazo-Arvizu, R., Self, S., Kuhlmann, M., Raymond, J. and Greene, E., 2003. Oxidative stress in the pathogenesis of experimental mesangial proliferative glomerulonephritis, *American Journal of Physiology - Renal Physiology*, 285(6), pp. 1138-1148.

Chien, C., Lee, P., Chen, C., Ma, M., Lai, M. and Hsu, S., 2001. De Novo Demonstration and Co-localization of Free-Radical Production and Apoptosis Formation in Rat Kidney Subjected to Ischemia/Reperfusion, *Journal of the American Society of Nephrology*, 12(5), pp. 973-982.

Couser, W., 1993. Pathogenesis of glomerulonephritis, *Kidney International Supplements*, 42, pp. 19-26.

De Gasparo, M., 2002. Angiotensin II and nitric oxide interaction, *Heart Failure Reviews*, [e-journal] Available at:<<http://www.ncbi.nlm.nih.gov/pubmed/12379820>> [Accessed 26 October 2013]

Edinburgh Renal Education Pages, 2012. *Glomerulonephritis* [online] Available at: <<http://www.edrep.org/pages/textbook/glomerulonephritis.php>> [Accessed 25 October 2013].

Forbes, J., Coughlan, M. and Cooper, M., 2008. Oxidative Stress as a Major Culprit in Kidney Disease in Diabetes, *Diabetes*, 57(6), pp. 1446-1454.

Geeky Medics, 2010. *Glomerulonephritis* [online] Available at: <<http://geekymedics.com/2010/10/27/glomerulonephritis/>> [Accessed 25 October 2013].

Gryglewski, R., Palmer, R., Moncada, S., 1986. Superoxide anion is involved in the breakdown of endothelium derived relaxing factor, *Nature*, 320, pp. 454-456.

Halliwell, B., 2001. Free Radicals and other reactive species in Disease, *Encyclopedia of Life Sciences*, [e-journal] Available at:<http://web.sls.hw.ac.uk/teaching/level4/bcm1_2/reading/oxidative_stress/files/Oxidative_stress.pdf> [Accessed 19 October 2013]

Huang, H., Patel, P. and Salahudeen, A., 2001. Lazaroid compounds prevent early but not late stages of oxidant-induced cell injury: potential explanation for the lack of efficacy of lazarooids in clinical trials, *Pharmacological Research*, 41(1), pp. 55-61.

Klinger, J., Abman, S. and Gladwin, M., 2013. Nitric Oxide Deficiency and Endothelial Dysfunction in Pulmonary Arterial Hypertension, *American Journal of Respiratory and Critical Care Medicine*, 188(6), pp. 639-646.

Lindemann, I., Boettcher, J., Oertel, K., Pasternack, R., Heine, A. and Klebe, G. 2012. Inhibitors of Transglutaminase 2: A therapeutic option in celiac disease, *To be Published*, [e-journal + PDB structure] Available at:<<http://www.ebi.ac.uk/pdbe-srv/view/entry/3s3s/summary>> [Accessed 24 October 2013]

Mayo Clinic, 2011. *Glomerulonephritis* [online] Available at: <<http://www.mayoclinic.com/health/glomerulonephritis/DS00503/>> [Accessed 20 October 2013].

McCord, J., Roy, R. and Schaffer, S., 1985. Free radicals and myocardial ischemia. The role of xanthine oxidase, *Advances in myocardiology*, [e-journal] Available at:<<http://www.ncbi.nlm.nih.gov/pubmed/2982206>> [Accessed 24 October 2013]

National Health Service, 2012. *Causes of glomerulonephritis* [online] Available at: <<http://www.nhs.uk/Conditions/Glomerulonephritis/Pages/Causes.aspx>> [Accessed 20 October 2013].

Niaudet, P., 2013. *Overview of the pathogenesis and causes of glomerulonephritis in children*. [online] Available at: <<http://www.uptodate.com/contents/overview-of-the-pathogenesis-and-causes-of-glomerulonephritis-in-children>> [Accessed 21 October 2013].

Ronco, P., 2013. *Mechanisms of glomerular crescent formation*. [online] Available at: <<http://www.uptodate.com/contents/mechanisms-of-glomerular-crescent-formation>> [Accessed 21 October 2013].

Rutchik, J., 2013. *Toxic Neuropathy Clinical Presentation*. [online] Available at: <<http://emedicine.medscape.com/article/1175276-clinical#a0216>> [Accessed 26 October 2013].

R&D Systems, 2013. *Technical Information. Ischemia/Reperfusion Injury*. [online] Available at: <http://www.rndsystems.com/cb_detail_objectname_SP96_Ischemia.aspx> [Accessed 28 October 2013].

Salahudeen, A., 1999. Free Radicals in Kidney Disease and Transplantation, *Saudi Journal of Kidney Diseases and Transplantation*, 10(2), pp. 137-143.

Sarma, A., Mallick, A. and Ghosh, A., 2010. Free Radicals and Their Role in Different Clinical Conditions: An Overview, *International Journal of Pharma Sciences and Research*, 1(3), pp. 182-192.

Shah, S., Baliga, R., Rajapurkar, M. and Fonseca, V., 2007. Oxidants in Chronic Kidney Disease, *Journal of the American Society of Nephrology*, 18(1), pp. 16-28.

The University of Utah, Unknown. *Glomerulonephritis* [online] Available at: <<http://library.med.utah.edu/WebPath/RENAHTML/RENALIDX.html#8>> [Accessed 25 October 2013].

Wang, C. and Salahudeen, A., 1994. Cyclosporine nephrotoxicity: attenuation by an antioxidant -inhibitor of lipid peroxidation in-vitro and in-vivo, *Transplantation*, 58, pp. 940-946.

Wang, C. and Salahudeen, A., 1995. Lipid peroxidation accompanies cyclosporine nephrotoxicity: effects of vitamin E, *Kidney International*, 47, pp. 927-934.

Weiss, S., 1989. Tissue Destruction by Neutrophils, *New England Journal of Medicine*, 320, pp. 365-376.