

www.ascpalm2016.org

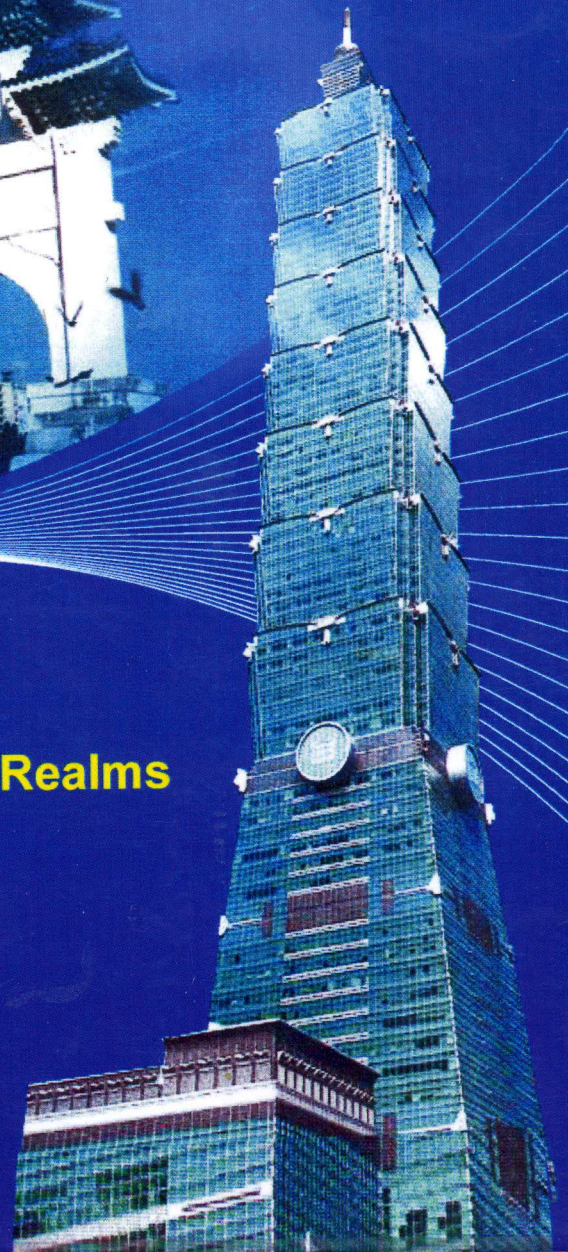
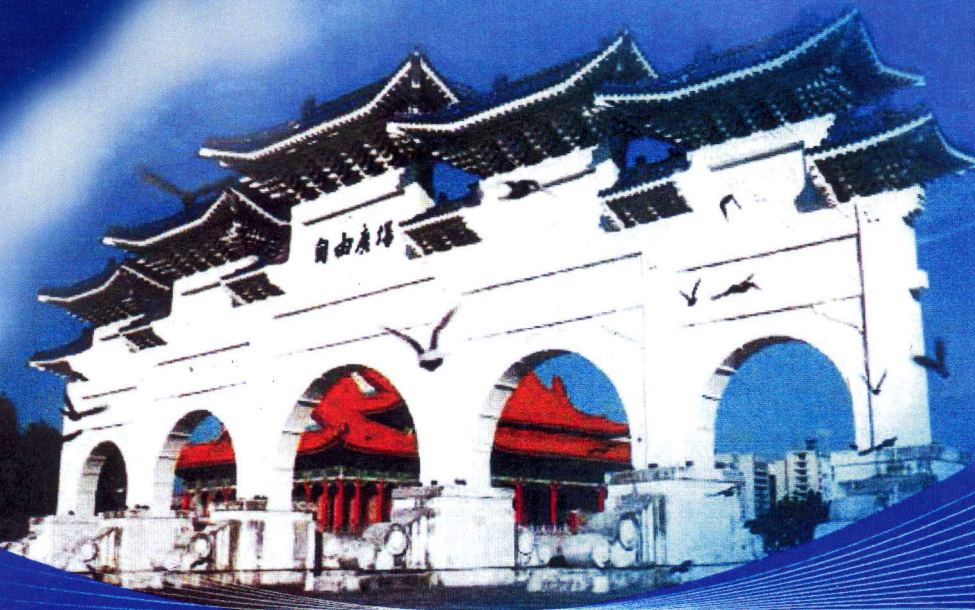
2016
ASCPaLM

The 14th Asian Society for Clinical Pathology and Laboratory Medicine Congress (2016)

TAIPEI, TAIWAN

March 25-27, 2016

Advanced Program



Laboratory Medicine: New Frontiers and Future Realms

Hosted by:



Taiwan Society of Clinical Pathology and
Laboratory Medicine (TSCPALM)



Asian Society for Clinical Pathology and
Laboratory Medicine (ASCPALM)

Congress Venue: NTUH International Convention Center

www.ascpalm2016.org

2016
ASCPaLM

The 14th Asian Society for Clinical Pathology and Laboratory Medicine Congress (2016)

TAIPEI, TAIWAN


March 25-27, 2016


Advanced Program



Laboratory Medicine: New Frontiers and Future Realms

Hosted by:

 Taiwan Society of Clinical Pathology and
Laboratory Medicine (TSCPalm)

 Asian Society for Clinical Pathology and
Laboratory Medicine (ASCPalm)

Congress Venue: NTUH International Convention Center

Sunday, March 27, 2016

10:00-10:30

Room 101 & Room 102

- PS-039 **Correlation between Levels of MDA and LDL-C with Grade of Coronary Artery Stenosis in Coronary Heart Disease**
Purwanto Ap (Indonesia)
- PS-040 **Misleading A1C Reporting due to Lack of Hemoglobin A in Taiwan**
Shu Chen Lee (Taiwan)
- PS-041 **Performance Evaluation of Cartridge-type Blood Gas Analyzer, i-Smart 300**
Ahram Yi (South Korea), Yeo-Min Yun (South Korea)
- PS-042 **Unusual Hypercholesterolemia in a Clinical Chemistry Laboratory**
Ting-Fu Su (Taiwan), Tzong-Shi Chiueh (Taiwan)
- PS-043 **Distribution of Soluble Suppression of Tumorigenicity 2 (sST2), N-terminal Pro-brain Natriuretic Peptide (NT-proBNP), High Sensitive Troponin I, and High-sensitive Troponin T in Umbilical Cord Blood**
Ahram Yi (South Korea), Mina Hur (South Korea)
- PS-044 **Association between Work Stress with Oxidative Stress and Inflammatory Biomarkers among Foreign Nursing Assistants**
Ko-Hung Chen (Taiwan), Ching-Huang Lai (Taiwan)
- PS-045 **Role of Troponin T in Ischemic Diagnosis in Stable Coronary Heart Disease**
Purwanto Ap (Indonesia)
- PS-046 **Diagnostic Value of Tumor Markers in Lung Adenocarcinoma-associated Cytologically Negative Pleural Effusions**
Cheng-Chuan Su (Taiwan), Tsung-Cheng Hsieh (Taiwan), Chun-Liang Lai (Taiwan), Shih-Ming Tsao (Taiwan)
- PS-047 **Therapeutic Drug Monitoring of Vancomycin in Neutropenic Patients**
Min Hyuk Choi (South Korea), Jooyoung Cho (South Korea), Jeong-Ho Kim (South Korea), Sang-Guk Lee (South Korea)
- PS-048 **Atypical Primary Hyperparathyroidism Presented as Marked Body Weight Loss and Vitamin D Deficiency – A Case Report**
Chung-Kuang Chen (Taiwan), Huo-Mu Chen (Taiwan), Po-Chi Huang (Taiwan)
- PS-049 **Diagnostic Performance of HbA1c for Diabetes Mellitus in Population at Risk**
Windarwati Windarwati (Indonesia), Yuni Kusumahartatik (Indonesia), Setyawati Setyawati (Indonesia)
- PS-050 **Therapeutic Drug Monitoring of Tacrolimus after Voriconazole Administration in a Recipient of Allogeneic Peripheral Blood Stem Cell Transplantation, a Case Report**
Wern-Cherng Cheng (Taiwan), Chao-Wei Liu (Taiwan), Shih-Ying Huang (Taiwan)
- PS-051 **Effect of a Rosmarinic Acid Supplemented Hemodialysis Fluid on Inflammation of Human Vascular Endothelial Cells**
Wei-Jie Wang (Taiwan), Ching-Sung Weng (Taiwan)
- PS-052 **Effectiveness Test of Green Tea (*Camellia sinensis*) Extract for Decreasing LDL Cholesterol Blood in Vitro**
Linda Rosita (Indonesia)

Sunday, March 27, 2016

Effectiveness Test of Green Tea (*Camellia sinensis*) Extract for Decreasing LDL Blood *In Vitro*

*Linda Rosita¹, Dewa Gede Andi K², Sufi Desrini³

^{1,2}Department of Clinical Pathology, Medical Faculty, Indoneisa Islamic University, Indonesia,

^{1,2}Department of Farmakology, Medical Faculty, Indoneisa Islamic University, Indonesia,

*lindarosita25@yahoo.co.id

Introduction: Green tea is one of the plant that often consumed by people. Tea is not only a drink for pleasure, but tea is also have some advantages and used widely in medical field, katekin or polifenol in green tea can decrease the risk of cardiovascular disease, prevent diabetes mellitus, anti cancer. prevent soul small from mouth an the others, this polifenol in human body help enzim superoxide dismutase (SOD) that elimtate free radical so it can prevent atherosclerosis. The aim of this study is to know the effectivity of green tea (*Camellia sinensis*) extract to decrease LDL and how much the concentration of green tea (*Camellia sinensis*) extract that can decrease LDL level.

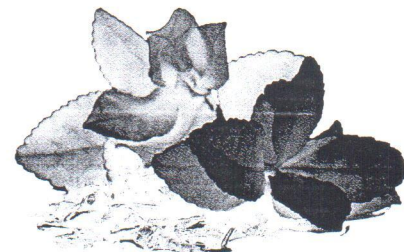
Method: This study is experimental design, In this study, wistar rat age 2-3 month and 150-200 grams in weight was used. research was done for 14 days with 24 wistar rat as the subject sample was clasifield into 6 groups contain 4 rats. Group 1 as the negative control, key get aquadest and BR2 standart diet. Every times, 0,2 ml aquadest per oral was given by intragastric canula. The blood was taken for sample do measure the LDL level. Blood sample was taken 2 times in 14 days. before research and the end of research. Group II, III, IV, V, dan VI. Are the research group with green tea extract given orally at dose 0,2 ml with concretion 20%, 40%, 60%, 80%, 100%. Extract was given in different time.

Result: Green tea (*Camellia sinensis*) extract given for 14 days on wistar rat didn't show significant decrease in LDL level for every groups, but only LDL level decrease at some groups (K-III. 2 & B) and (K-V.2). this increase and decrease is not significant statistically.

Conclusion: Green tea (*Camellia sinensis*) extract with concretion 40% and 80% can decrease LDL level plasma, but only limited in some population: (K-III.2/ 0,2 ml Green tea extract and K-III.3/ 0.2 ml Green tea extract) and (K-V.2/ 0,2 ml Green tea extract), which is not significant staticifically.

Keywords: Green tea extract – *Camellia sinensis* – LDL cholesterol

EFFECTIVENESS TEST OF GREEN TEA (*Camellia sinensis*) EXTRACT FOR DECREASING LDL BLOOD IN VITRO



*Linda Rosita¹, Dewa Gede Andi K², Sufi Desrini³

²Clinical Pathology Departement, Medical Faculty, Indonesia Islamic University, Indonesia,

³ Farmakology Departement, Medical Faculty, Indonesia Islamic University, Indonesia

*lindarosita25@yahoo.co.id

Introduction: Green tea is one of the plant that often consumed by people. Tea is not only a drink for pleasure, but tea is also have some advantages and used widely in medical field. Katekin or polifenol in green tea can decrease the risk of cardiovas-kuler disease, prevent diabetes mellitus, anti cancer, prevent soul small from mouth an the others. The aim of this study is to know the effectivity of green tea extract to decrease LDL Cho and how much the concentration of green tea extract that can decrease LDL level.

Method: This study is experimental design on wistar rat age 2-3 month and 150-200 grams in weight was used. This study was done for 14 days with 24 wistar rat as the subject sample was clasifield into 6 groups contain 4 rats. Group 1 as the negative control, key get aquadest and BR2 standart diet. Every times, 0,2 ml aquadest per oral was given by intragastric canula. The blood was taken for sample do measure the LDL level. Blood sample was taken 2 times in 14 days, before research and the end of research. Group II, III, IV, V, dan VI. Are the research group with green tea extract given orally at dose 0,2 ml with concretation 20%, 40%, 60%, 80%, 100%. Extract was given in different time.

Result: Green tea extract given for 14 days on wistar rat didn't show significant decrease in LDL level for every groups, but only LDL Cho level decrease at some groups (K-III. 2 & B) and (K-V.2).

Conclusion: Green tea (*Camellia sinensis*) extract with concretation 40% and 80% can decrease LDL level plasma.

LDL Levels Before Treatment:

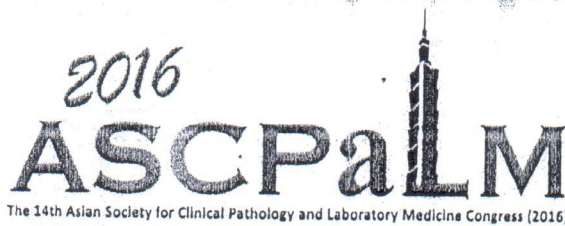
	wistar	Group 1	Group 2	Group 3	Group 4	Group 5	Group 6
LDL	1	38.91	37.90	35.46	27.15	27.15	20.25
Cholesterol (mg/dl)	2	34.05	33.03	38.91	8.48	37.90	39.93
	3	20.25	37.90	37.50	40.33	37.90	39.93
	4	58.99	32.01	32.01	55.54	32.01	19.23
Mean		38,05	35,21	35,97	32,87	33,74	29,83

LDL Levels After Treatment

	wistar	Group 1	Group 2	Group 3	Group 4	Group 5	Group 6
LDL	1	58.60	59.61	57.58	56.16	47.85	29.18
Cholesterol (mg/dl)	2	47.85	52.71		44.40		57.58
	3	45.81	51.70		41.97	40.95	52.71
	4	50.68	47.85	44.40	34.05	34.05	62.44
Mean		50,73	52,96	41,30	44,14	39,22	50,47

REFERENCES:

- Athaus *et al.*, 1994. *epigallocatechin gallate and green tea can protect human cellular DNA from ultraviolet*. www.springerlink.com/index/u111305w9n58052.pdf
- Bruneman, K., 1991. *Teas and Tea Components as Inhibitors of Carcinogen Formation in Model System and Man.*, Symp. Phs. And Pahrm. Effects of Camellia Sinensis. New York.
- Chung *et al.*, 1997. *Effect of green and black teas (Camellia sinensis L.) on the characteristic microflora of yogurt during fermentation and refrigerated storage* <http://dmd.aspetjournals.org/cgi/reprint/dmd.104.000083v1.pdf>
- Diepvens *et al.*, 2006: *Metabolic Effects Of Green Tea And Of Phases of Weight Loss. Physiol. Behav.* 87(1): 185-191
- Fujiki, H., 1991. *Anti Carcinogenic effect of Tea and Its Components on Lung Tumorigenesis Induced by Tobacco-specific Mitrosamine*, *ibid.*
- Geissman, T. A., 1999, *The Chemistry of Flavonoid Compounds*, The Macmillan Company, New York, 3-4, 51, 301-303
- Grosvenor., 1997. *Antimutagenic Effects Of Tea Polyphenols*. Int. Symp. Phys and Pharm. Effects of C. Sinensis. New York
- Graham HN., 1984. *Green Tea Composition, Consumption, And Polyphenol Chemistry*. *Prev Med - 01-MAY-1992*; 21(3): 334-50 MEDLINE
- McKenna DJ, Hughes K, Jones K., 2000. *Green tea monograph*. *Alt Ther.*; 6(3):61-84
- Sasazuki S, Kodama H, Yoshimasu K *et al.*, 2000. *Relation Between Green Tea Consumption And The Severity Of Coronary Atherosclerosis Among Japanese Men And Women*. *Ann Epidemiol.* ;10:401-408
- Steenis Van CGGJ., 1987. *On the Nature of the Enzyme Catechol Oxidase in Tea Qouart.*, 36. 103-111
- Smaolin, A & Grosvenor M.B., 1997. *Nutrition Science and Applications*. 2nd Edition. Saunders College Publishing.
- Tijburg, L.B., *et al.*, *Tea Flavonoids And Cardiovascular Disease: a review*. *Crit Rev Food Sci Nutr*, 1997. 37(8): p. 771-85.



The 14th Asian Society for Clinical Pathology and
Laboratory Medicine Congress (2016)
March 25-27, 2016, TAIPEI, TAIWAN

Certificate of Attendance

This is to certify that

Linda Rosita

has attended the 14th Asian Society of Clinical Pathology and Laboratory Medicine Congress (2016)
held at National Taiwan University Hospital International Convention Center
Taipei, Taiwan, March 25-27, 2016.

Jang-Jih Lu, MD, PhD
Chairman,
Organizing Committee, ASCPaLM 2016

Po-Ren Hsueh, MD
Chairman,
Program Committee, ASCPaLM 2016