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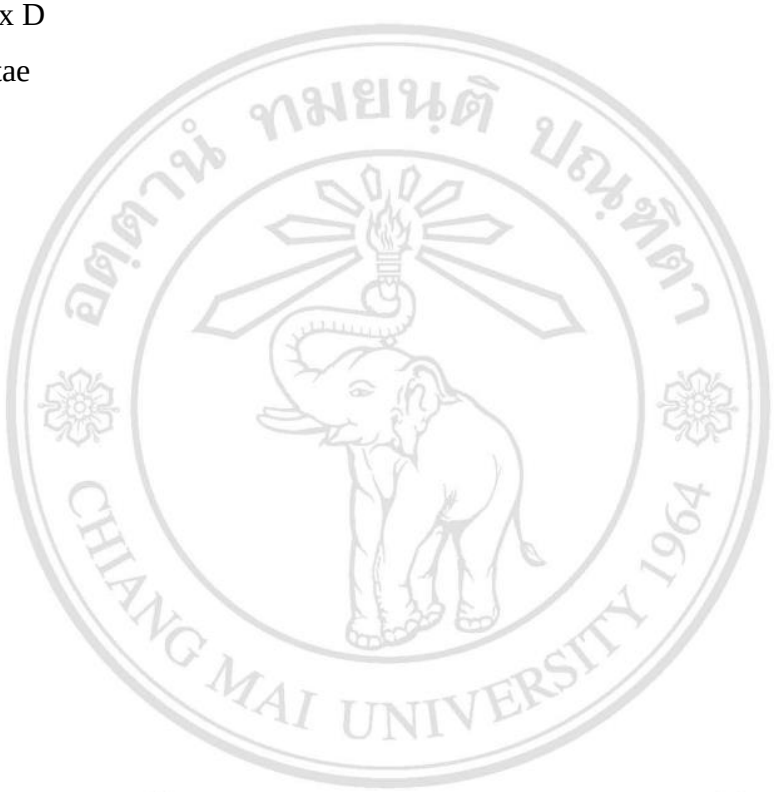

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LIST OF FIGURES

LIST OF ABBREVIATIONS

+ dP/dt	Maximum slope of the systolic pressure increment
- dP/dt	Minimum slope of the systolic pressure increment
Akt	Serine/threonine-specific protein kinase
ATP	Adenosine triphosphate
Bax	BCL2 Associated X Protein
BCA	Bicinchoninic acid
BHT	Butyrate hydroxytoluene
BP	Blood pressure
BSA	Bovine serum albumin
CFU	Colony forming unit
CHE	Cholesterol esterase
CHO	Cholesterol oxidase
CVD	Cardiovascular disease
CRP	C-reactive protein
DBP	Diastolic blood pressure
DCF	Fluorescent 2,7-dichlorofluorescein
DCFDA	Dichlorohydrofluorescein diacetate
DCFH	De-esterification to 2,7-dichlorodihydrofluorescein
DM	Diabetes mellitus
FFA	Free fatty acid
ECG	Electrocardiogram
EGTA	Ethylene glycol bis (2-amino ethylether)-N,N,N,N-tetraacetic acid
ETC	Electron transport chain
g	Gram
GOD	Glucose oxidase
H_2O_2	Hydrogen peroxide
H_3PO_4	H_3PO_4

HDL	High-density lipoprotein
HF	High frequency
HFD	High-fat diet
HEPES	4-(2-hydroxyethyl)-1-piperazineethanesulfonic acid
HOMA	Homeostasis model assessment
HPLC	High-performance liquid chromatography
HRV	Heart rate variability
IL-6	Interleukin-six
IL-10	Interleukin-ten
IL-12	Interleukin-twelve
IL-17	Interleukin-seventeen
I/R	Ischemia/reperfusion
IRS	Insulin receptor substrate
JC-1	The dye 5, 5', 6, 6'-tetrachloro-1, 1', 3, 3'-tetraethylbenzimidazolcarbocyanine iodide
KCl	Potassium chloride
KH_2PO_4	Potassium dihydrogen phosphate
L	Liter
LAL	Limulus amebocyte lysate
LDL	Low-density lipoprotein cholesterol
LF	Low frequency
LPS	Lipopolysaccharides
LV	Left ventricular
LVEDP	Left ventricular end-diastolic pressure
LVESP	Left ventricular end-systolic pressure
LVIDd	Left ventricular internal diameter during diastole
LVIDs	Left ventricular internal diameter during systole
MAP	Mean arterial pressure
MAPK	Mitogen-activated protein kinase
MDA	Malondialdehyde
Mets	Metabolic syndrome

mg	Milligram
min	Minute
ml	Milliliter
mm	Millimeter
mM	Milimolar
mmHg	Millimeter of mercury
mmol	Millimole
NaCl	Sodium chloride
$Na_2CO_3.H_2O$	Sodium carbonate monohydrate
NaF	Sodium fluoride
NAFLD	Non-alcoholic fatty liver disease
$NaHCO_3$	Sodium bicarbonate
Na_2HPO_4	Di-sodium hydrogen phosphate
NaOH	Sodium hydroxide
$NaHCO_3$	Sodium bicarbonate
NF-kB	Nuclear factor kappa-light-chain-enhancer of activated B cells
ND	Normal diet
nm	Nanometer
O-cuff	Occlusion cuff
OGTT	Oral glucose tolerance test
ox-LDL	Oxidized low density lipoprotein
p38	tumor protein 38
PAI-1	Plasminogen activator inhibitor-1
PBS	Phosphate Buffer Saline
PI3K	Phosphatidylinositol 3-kinase
PKB	Protein kinase B
PV-loop	Pressure-volume loop
R/O	Reverse osmosis drinking water
ROS	Reactive oxygen species
SDS	Sodium dodecyl sulfate
SBP	Systolic blood pressure

SOD	Superoxide dismutase
SV	Stroke volume
SW	Stroke work
SWR	Standard working reagent
TBA	Thiobabituric acid
TC	Total cholesterol
TG	Triglyceride
TCA	Trichloroacetic acid
TLR-4	Toll-like receptor 4
TNF-α	Tumor necrosis factor-alpha
VLDL	Very low-density lipoprotein
VPR	Volume pressure recording
WHO	World health organization

LIST OF SYMBOLS

%	Percentage
%FS	Fractional shortening
%E	Percent of total energy
%EF	Ejection fraction
°C	Degrees in Celsius
ΔΨ	Mitochondrial membrane depolarization
β	Beta
µl	Microliter