

## DAFTAR PUSTAKA

1. O'Gara PT, Kushner FG, Ascheim DD, Casey DE, Chung MK, De Lemos JA, et al. 2013 ACCF/AHA guideline for the management of ST-elevation myocardial infarction: executive summary: a report of the American College of Cardiology Foundation/American Heart Association Task Force on Practice Guidelines. *Journal of the American College of Cardiology*. 2013;61(4):485-510.
2. Ahmed KMT, Herson S, Mohamed S, Tubassum M, Newell M, Walsh SR. Remote Ischemic Pre-conditioning in the Management of Intermittent Claudication: A Pilot Randomized Controlled Trial. *Ann Vasc Surg*. 2019;55:122-30.
3. Bates ER, Tamis-Holland JE, Bittl JA, O'Gara PT, Levine GN. PCI strategies in patients with ST-segment elevation myocardial infarction and multivessel coronary artery disease. *Journal of the American College of Cardiology*. 2016;68(10):1066-81.
4. Adamowicz M, Morgan CC, Haubner BJ, Nosedá M, Collins MJ, Abreu Paiva M, et al. Functionally Conserved Noncoding Regulators of Cardiomyocyte Proliferation and Regeneration in Mouse and Human. *Circ Genom Precis Med*. 2018;11(2):e001805.
5. Amin AP, Salisbury AC, McCullough PA, Gosch K, Spertus JA, Venkitachalam L, et al. Trends in the incidence of acute kidney injury in patients hospitalized with acute myocardial infarction. *Archives of internal medicine*. 2012;172(3):246-53.
6. Neves D, Belo A, Damasio AF, Carvalho J, Santos AR, Picarra B, et al. Acute kidney injury in acute coronary syndromes—An important multifactorial consequence. *Revista Portuguesa de Cardiologia (English Edition)*. 2016;35(7-8):415-21.
7. Schmucker J, Fach A, Becker M, Seide S, Bünger S, Zabrocki R, et al. Predictors of acute kidney injury in patients admitted with ST-elevation myocardial infarction—results from the Bremen STEMI-Registry. *European Heart Journal: Acute Cardiovascular Care*. 2018;7(8):710-22.

8. Fang L, Moore X, Dart A, Wang L. Systemic inflammatory response following acute myocardial infarction. *J Geriatr Cardiol* 12: 305–312. Link: <https://tinyurl.com/reev2qs>. 2015.
9. Talukder MH, Yang F, Shimokawa H, Zweier JL. eNOS is required for acute in vivo ischemic preconditioning of the heart: effects of ischemic duration and sex. *American Journal of Physiology-Heart and Circulatory Physiology*. 2010;299(2):H437-H45.
10. Cziráki A, Lenkey Z, Sulyok E, Szokodi I, Koller A. L-arginine-nitric oxide-asymmetric dimethylarginine pathway and the coronary circulation: translation of basic science results to clinical practice. *Frontiers in pharmacology*. 2020;11:569914.
11. Parenica J, Kala P, Mebazaa A, Littnerova S, Benesova K, Tomandl J, et al. Activation of the nitric oxide pathway and acute myocardial infarction complicated by acute kidney injury. *Cardiorenal Medicine*. 2020;10(2):85-96.
12. Xie Q-w, Cho HJ, Calaycay J, Mumford RA, Swiderek KM, Lee TD, et al. Cloning and characterization of inducible nitric oxide synthase from mouse macrophages. *Science*. 1992;256(5054):225-8.
13. Chartrain NA, Geller D, Koty P, Sitrin N, Nussler A, Hoffman E, et al. Molecular cloning, structure, and chromosomal localization of the human inducible nitric oxide synthase gene. *Journal of biological chemistry*. 1994;269(9):6765-72.
14. Forstermann U, Münzel T. Endothelial nitric oxide synthase in vascular disease: from marvel to menace. *Circulation*. 2006;113(13):1708-14.
15. Moncada S, Palmer R, Higgs E. Nitric oxide: physiology, pathophysiology, and pharmacology. *Pharmacological reviews*. 1991;43(2):109-42.
16. Papapetropoulos A, Hobbs AJ, Topouzis S. Extending the translational potential of targeting NO/cGMP-regulated pathways in the CVS. *British journal of pharmacology*. 2015;172(6):1397-414.
17. Mount P, Power DA. Nitric oxide in the kidney: functions and regulation of synthesis. *Acta physiologica*. 2006;187(4):433-46.

18. Mount PF, Kemp BE, Power DA. Regulation of endothelial and myocardial NO synthesis by multi-site eNOS phosphorylation. *Journal of molecular and cellular cardiology*. 2007;42(2):271-9.
19. Zamora R, Vodovotz Y, Billiar TR. Inducible nitric oxide synthase and inflammatory diseases. *Molecular medicine*. 2000;6(5):347-73.
20. Baylis C. Arginine, arginine analogs and nitric oxide production in chronic kidney disease. *Nature Clinical Practice Nephrology*. 2006;2(4):209-20.
21. Baylis C. Nitric oxide deficiency in chronic kidney disease. *American Journal of Physiology-Renal Physiology*. 2008;294(1):F1-F9.
22. Lundberg JO, Gladwin MT, Weitzberg E. Strategies to increase nitric oxide signalling in cardiovascular disease. *Nature reviews Drug discovery*. 2015;14(9):623-41.
23. Farah C, Michel LY, Balligand J-L. Nitric oxide signalling in cardiovascular health and disease. *Nature Reviews Cardiology*. 2018;15(5):292-316.
24. Eissa NT, Strauss AJ, Haggerty CM, Choo EK, Chu SC, Moss J. Alternative splicing of human inducible nitric-oxide synthase mRNA: tissue-specific regulation and induction by cytokines. *Journal of biological chemistry*. 1996;271(43):27184-7.
25. Saur D, Paehge H, Schusdziarra V, Allescher HD. Distinct expression of splice variants of neuronal nitric oxide synthase in the human gastrointestinal tract. *Gastroenterology*. 2000;118(5):849-58.
26. Lu D, Fu Y, Lopez-Ruiz A, Zhang R, Juncos R, Liu H, et al. Salt-sensitive splice variant of nNOS expressed in the macula densa cells. *American Journal of Physiology-Renal Physiology*. 2010;298(6):F1465-F71.
27. Jarry A, Renaudin K, Denis MG, Robard M, Buffin-Meyer B, Karam G, et al. Expression of NOS1 and soluble guanylyl cyclase by human kidney epithelial cells: morphological evidence for an autocrine/paracrine action of nitric oxide. *Kidney international*. 2003;64(1):170-80.
28. Goligorsky MS, Brodsky SV, Noiri E. Nitric oxide in acute renal failure: NOS versus NOS. *Kidney international*. 2002;61(3):855-61.
29. Yoo KH, Thornhill BA, Forbes MS, Chevalier RL. Inducible nitric oxide synthase modulates hydronephrosis following partial or complete unilateral



- ureteral obstruction in the neonatal mouse. *American Journal of Physiology-Renal Physiology*. 2010;298(1):F62-F71.
30. Heemskerk S, Pickkers P, Bouw MP, Draisma A, van der Hoeven JG, Peters WH, et al. Upregulation of renal inducible nitric oxide synthase during human endotoxemia and sepsis is associated with proximal tubule injury. *Clinical journal of the American Society of Nephrology*. 2006;1(4):853-62.
  31. Udi S, Hinden L, Ahmad M, Drori A, Iyer MR, Cinar R, et al. Dual inhibition of cannabinoid CB1 receptor and inducible NOS attenuates obesity-induced chronic kidney disease. *British journal of pharmacology*. 2020;177(1):110-27.
  32. Carlström M, Wilcox CS, Arendshorst WJ. Renal autoregulation in health and disease. *Physiological reviews*. 2015;95(2):405-511.
  33. Persson AEG, Lai EY, Gao X, Carlström M, Patzak A. Interactions between adenosine, angiotensin II and nitric oxide on the afferent arteriole influence sensitivity of the tubuloglomerular feedback. *Frontiers in physiology*. 2013;4:187.
  34. Garvin JL, Herrera M, Ortiz PA. Regulation of renal NaCl transport by nitric oxide, endothelin, and ATP: clinical implications. *Annual review of physiology*. 2011;73:359-76.
  35. Ortiz PA, Garvin JL. Role of nitric oxide in the regulation of nephron transport. *American Journal of Physiology-Renal Physiology*. 2002;282(5):F777-F84.
  36. Satoh N, Nakamura M, Suzuki A, Tsukada H, Horita S, Suzuki M, et al. Effects of nitric oxide on renal proximal tubular Na<sup>+</sup> transport. *BioMed Research International*. 2017;2017.
  37. Kleschyov AL. The NO-heme signaling hypothesis. *Free Radical Biology and Medicine*. 2017;112:544-52.
  38. Bahadoran Z, Carlström M, Mirmiran P, Ghasemi A. Nitric oxide: To be or not to be an endocrine hormone? *Acta Physiologica*. 2020;229(1):e13443.
  39. Boron WF, Boulpaep EL. *Medical physiology E-book*: Elsevier Health Sciences; 2016.

40. Broere A, Van Den Meiracker A, Boomsma F, Derkx F, Man In'T Veld A, Schalekamp M. Human renal and systemic hemodynamic, natriuretic, and neurohumoral responses to different doses of l-NAME. *American Journal of Physiology-Renal Physiology*. 1998;275(6):F870-F7.
41. Bech J, Nielsen C, Pedersen E. Effects of systemic NO synthesis inhibition on RPF, GFR, UNa, and vasoactive hormones in healthy humans. *American Journal of Physiology-Renal Physiology*. 1996;270(5):F845-F51.
42. Schiffer TA, Lundberg JO, Weitzberg E, Carlström M. Modulation of mitochondria and NADPH oxidase function by the nitrate-nitrite-NO pathway in metabolic disease with focus on type 2 diabetes. *Biochimica et Biophysica Acta (BBA)-Molecular Basis of Disease*. 2020;1866(8):165811.
43. Raitakari OT, Celermajer DS. Flow-mediated dilatation. *British journal of clinical pharmacology*. 2000;50(5):397-404.
44. Mudau M, Genis A, Lochner A, Strijdom H. Endothelial dysfunction: the early predictor of atherosclerosis. *Cardiovascular journal of Africa*. 2012;23(4):222-31.
45. Schwartz B, Economides C, Mayeda G, Burstein S, Kloner R. The endothelial cell in health and disease: its function, dysfunction, measurement and therapy. *International journal of impotence research*. 2010;22(2):77-90.
46. Yang Z, Ming X-F. Recent advances in understanding endothelial dysfunction in atherosclerosis. *Clinical medicine & research*. 2006;4(1):53-65.
47. Blanco-Rivero J, Cachafeiro V, Lahera V, Aras-Lopez R, Márquez-Rodas I, Salices M, et al. Participation of prostacyclin in endothelial dysfunction induced by aldosterone in normotensive and hypertensive rats. *Hypertension*. 2005;46(1):107-12.
48. Forstermann U, Munzel T. Endothelial nitric oxide synthase in vascular disease: from marvel to menace. *Circulation*. 2006;113(13):1708-14.
49. Theofilis P, Sagris M, Oikonomou E, Antonopoulos AS, Siasos G, Tsioufis C, et al. Inflammatory Mechanisms Contributing to Endothelial Dysfunction. *Biomedicines*. 2021;9(7):781.

50. Carlström M. Nitric oxide signalling in kidney regulation and cardiometabolic health. *Nature reviews nephrology*. 2021;17(9):575-90.
51. Li J, Yang Z, Wu S, Kong J. Relationship between endothelial nitric oxide synthase, insulin resistance and macrovascular disease in patients with acute myocardial infarction. *Journal of International Medical Research*. 2012;40(2):687-93.
52. Taşolar H, Eyyüpkoca F, Aktürk E, Karakuş Y, Cansel M, Yağmur J, et al. Endothelial nitric oxide synthase levels and their response to exercise in patients with slow coronary flow. *Cardiovascular journal of Africa*. 2013;24(9-10):355-9.
53. Subramani J, Kundumani-Sridharan V, Das KC. Chaperone-mediated autophagy of enos in myocardial ischemia-reperfusion injury. *Circulation research*. 2021;129(10):930-45.
54. Dignat-George F, Boulanger CM. The many faces of endothelial microparticles. *Arteriosclerosis Thrombosis and Vascular Biology*. 2011;31(1):27-33.
55. Schillaci G, Pirro M. Endothelial microparticles and arterial stiffness: casual coincidence or causative culprit? *American Journal of Hypertension*. 2007;20(9):965-6.
56. Chironi GN, Boulanger CM, Simon A, Dignat-George F, Freyssinet J-M, Tedgui A. Endothelial microparticles in diseases. *Cell and tissue research*. 2009;335(1):143-51.
57. Angolano C, Kaczmarek E, Essayagh S, Daniel S, Choi LY, Tung B, et al. A20/TNFAIP3 Increases ENOS Expression in an ERK5/KLF2-Dependent Manner to Support Endothelial Cell Health in the Face of Inflammation. *Frontiers in Cardiovascular Medicine*. 2021;8.
58. Larsen FJ, Ekblom B, Sahlin K, Lundberg JO, Weitzberg E. Effects of dietary nitrate on blood pressure in healthy volunteers. *New England Journal of Medicine*. 2006;355(26):2792-3.
59. Webb AJ, Patel N, Loukogeorgakis S, Okorie M, Aboud Z, Misra S, et al. Acute blood pressure lowering, vasoprotective, and antiplatelet properties of dietary nitrate via bioconversion to nitrite. *Hypertension*. 2008;51(3):784-90.



60. Jackson JK, Patterson AJ, MacDonald-Wicks LK, Oldmeadow C, McEvoy MA. The role of inorganic nitrate and nitrite in cardiovascular disease risk factors: a systematic review and meta-analysis of human evidence. *Nutrition reviews*. 2018;76(5):348-71.
61. Li D, Nishi SK, Jovanovski E, Zurbau A, Komishon A, Mejia SB, et al. Repeated administration of inorganic nitrate on blood pressure and arterial stiffness: a systematic review and meta-analysis of randomized controlled trials. *Journal of Hypertension*. 2020;38(11):2122-40.
62. Sacks FM, Svetkey LP, Vollmer WM, Appel LJ, Bray GA, Harsha D, et al. Effects on blood pressure of reduced dietary sodium and the Dietary Approaches to Stop Hypertension (DASH) diet. *New England journal of medicine*. 2001;344(1):3-10.
63. Appel LJ, Moore TJ, Obarzanek E, Vollmer WM, Svetkey LP, Sacks FM, et al. A clinical trial of the effects of dietary patterns on blood pressure. *New England journal of medicine*. 1997;336(16):1117-24.
64. Reddy Y, Kiranmayi V, Bitla A, Krishna G, Rao PS, Sivakumar V. Nitric oxide status in patients with chronic kidney disease. *Indian Journal of Nephrology*. 2015;25(5):287.
65. Hughan KS, Levine A, Helbling N, Anthony S, DeLany JP, Stefanovic-Racic M, et al. Effects of oral sodium nitrite on blood pressure, insulin sensitivity, and intima-media arterial thickening in adults with hypertension and metabolic syndrome. *Hypertension*. 2020;76(3):866-74.
66. Tojo A, Onozato ML, Fujita T. Role of macula densa neuronal nitric oxide synthase in renal diseases. *Medical molecular morphology*. 2006;39:2-7.
67. Carlstrom M, Montenegro M. Therapeutic value of stimulating the nitrate-nitrite-nitric oxide pathway to attenuate oxidative stress and restore nitric oxide bioavailability in cardiorenal disease. *Journal of internal medicine*. 2019;285(1):2-18.
68. Miller WG, Kaufman HW, Levey AS, Straseski JA, Wilhelms KW, Yu HY, et al. National Kidney Foundation Laboratory Engagement Working Group recommendations for implementing the CKD-EPI 2021 race-free equations

- for estimated glomerular filtration rate: practical guidance for clinical laboratories. *Clinical chemistry*. 2022;68(4):511-20.
69. Celik T, Iyisoy A, Yuksel CU, Kilic S, Yilmaz MI, Akgul EO, et al. Impact of admission glomerular filtration rate on the development of poor myocardial perfusion after primary percutaneous intervention in patients with acute myocardial infarction. *Coronary Artery Disease*. 2008;19(8):543-9.
  70. Bruetto RG, Rodrigues FB, Torres US, Otaviano AP, Zanetta DM, Burdmann EA. Renal function at hospital admission and mortality due to acute kidney injury after myocardial infarction. *PLoS One*. 2012;7(4):e35496.
  71. Darkuthni FR, Nasution SA, Lydia A, Abdullah M, Antono D, Rumende CM, et al. Pengaruh Fungsi Ginjal Sebelum Intervensi Koroner Perkutan Primer Terhadap Perbedaan Kesintasan 30 Hari Pasien Infark Miokard Elevasi Segmen ST. *eJournal Kedokteran Indonesia*. 2022;10(3):204-11.
  72. Elfi EF. Analisis Kadar Endothelial Microparticles, Endothelial Nitric Oxyde Synthase, dan Endothelin-1 Dengan Diabetes Mellitus Pada Infark Miokard Akut Program Studi S3 Biomedik 2021.
  73. Sastroasmoro S. *Dasar-dasar metodologi penelitian klinis*. Edisi 5 ed. Jakarta: Sagung Seto; 2016.
  74. Ibanez B, James S. The 2017 ESC STEMI Guidelines. *European heart journal*. 2018;39(2):79-82.
  75. Arikunto S. *Prosedur penelitian suatu pendekatan praktik*. 2019.
  76. Bloos SM, Kaur K, Lang K, Gavin N, Mills AM, Baugh CW, et al. Comparing the Timeliness of Treatment in Younger vs. Older patients with ST-segment elevation myocardial infarction: a multi-center cohort study. *The Journal of Emergency Medicine*. 2021;60(6):716-28.
  77. N'Guetta R, Ekou A, Kouamé I, Boni RY, Ehouman E, Yao H. Primary PCI in the management of STEMI in sub-Saharan Africa: insights from Abidjan Heart Institute catheterisation laboratory. *Cardiovascular Journal of Africa*. 2020;31(4):201-4.
  78. Duraes AR, Bitar YS, Freitas ACT, Ivan Filho M, Freitas BC, Fernandez AM. Gender differences in ST-elevation myocardial infarction (STEMI) time



- delays: experience of a public health service in Salvador-Brazil. *American Journal of Cardiovascular Disease*. 2017;7(5):102.
79. Park IH, Cho HK, Oh JH, Chun WJ, Park YH, Song YB, et al. Old age and myocardial injury in ST-segment elevation myocardial infarction. *The American Journal of the Medical Sciences*. 2021;362(6):592-600.
80. Aminuddin A, Cheong SS, Roos NAC, Ugasman A. Smoking and Unstable Plaque in Acute Coronary Syndrome: A Systematic Review of The Role of Matrix Metalloproteinases. *International Journal of Medical Sciences*. 2023;20(4):482.
81. Ardiana M, Santoso A, Hermawan HO, Nugraha RA, Pikir BS, Suryawan IGR. Acute effects of cigarette smoke on Endothelial Nitric Oxide synthase, vascular cell adhesion molecule 1 and aortic intima media thickness. *F1000Res*. 2023;10:396.
82. El-Mahdy MA, Abdelghany TM, Hemann C, Ewees MG, Mahgoup EM, Eid MS, et al. Chronic cigarette smoke exposure triggers a vicious cycle of leukocyte and endothelial-mediated oxidant stress that results in vascular dysfunction. *American Journal of Physiology-Heart and Circulatory Physiology*. 2020;319(7):H51-H65.
83. Hsu H-P, Jou Y-L, Lin S-J, Charng M-J, Chen Y-H, Lee W-S, et al. Comparison of in-hospital outcome of acute ST elevation myocardial infarction in patients with versus without diabetes mellitus. *Acta Cardiologica Sinica*. 2011;27(3):145-51.
84. Alabas O, Hall M, Dondo T, Rutherford MJ, Timmis A, Batin P, et al. Long-term excess mortality associated with diabetes following acute myocardial infarction: a population-based cohort study. *J Epidemiol Community Health*. 2017;71(1):25-32.
85. Li Q, Yon J-Y, Cai H. Mechanisms and consequences of eNOS dysfunction in hypertension. *Journal of hypertension*. 2015;33(6):1128.
86. Tran N, Garcia T, Aniq M, Ali S, Ally A, Nauli SM. Endothelial nitric oxide synthase (eNOS) and the cardiovascular system: In physiology and in disease states. *American journal of biomedical science & research*. 2022;15(2):153.

87. Forbes MS, Thornhill BA, Park MH, Chevalier RL. Lack of endothelial nitric-oxide synthase leads to progressive focal renal injury. *The American journal of pathology*. 2007;170(1):87-99.
88. Yang Z, Li J, Kong J, Wu S. Impairment of vascular endothelial function following reperfusion therapy in patients with acute myocardial infarction. *Journal of international medical research*. 2013;41(4):1074-8.
89. Lee J, Bae EH, Ma SK, Kim SW. Altered nitric oxide system in cardiovascular and renal diseases. *Chonnam medical journal*. 2016;52(2):81-90.
90. Wever R, Boer P, Hijmering M, Stroes E, Verhaar M, Kastelein J, et al. Nitric oxide production is reduced in patients with chronic renal failure. *Arteriosclerosis, thrombosis, and vascular biology*. 1999;19(5):1168-72.

