

## DAFTAR PUSTAKA

1. Pusdatin RI. 2017. Situasi Penyakit Ginjal Kronis. *Infodatin*. Jakarta. p1–12.
2. Siddiqui MA, Ashraff S, Santos D, et al. Development of prognostic model for fistula maturation in patients with advanced renal failure. *Ren Replace Ther*. 2018;4(1):1–9.
3. Indonesia Renal Registry. 2017. *11 th Report Of Indonesian Renal Registry 2017*. Jakarta. p 1-46.
4. KDIGO 2012 Clinical Practice Guideline for the Evaluation and Management of Chronic Kidney Disease. Vol 3.; 2013.
5. Toussaint ND, Pedagogos E, Tan SJ, et al. Phosphate in early chronic kidney disease: Associations with clinical outcomes and a target to reduce cardiovascular risk. *Nephrology*. 2012;17(5):433-444.
6. Zhou C, Shi Z, Ouyang N, et al. Hyperphosphatemia and Cardiovascular Disease. *Front Cell Dev Biol*. 2021;9(March):1-11.
7. Gutiérrez OM. The connection between dietary phosphorus, cardiovascular disease, and mortality: Where we stand and what we need to know. *Adv Nutr*. 2013;4(6):723-729.
8. Chang AR, Anderson C. Dietary Phosphorus Intake and the Kidney. *Annu Rev Nutr*. 2017;37:1-26.
9. Dhingra R, Sullivan LM, Wang TJ. Relations of Serum Phosphorus and Calcium Levels to the Incidence of Cardiovascular Disease In the community. *Arch Intern Med*. 2007;167:879-885.
10. Yamazaki M, Ozono K, Okada T, et al. Both FGF23 and extracellular phosphate activate Raf/MEK/ERK pathway via FGF receptors in HEK293 cells. *J Cell Biochem*. 2010;111(5):1210-1221.
11. Van Der Vaart A, Yeung SMH, Van Dijk PR, et al. Phosphate and fibroblast growth factor 23 in diabetes. *Clin Sci*. 2021;135(14):1669.
12. Sprague SM, Martin KJ, Coyne DW. Phosphate Balance and CKD–Mineral Bone Disease. *Kidney Int Rep*. 2021;6(8):2049-2058.
13. Kritmetapak K, Losbanos L, Berent TE, et al. Hyperphosphatemia with elevated serum PTH and FGF23, reduced 1,25(OH)2D and normal FGF7 concentrations characterize patients with CKD. *BMC Nephrol*. 2021;22(1):21-28.
14. Liu Z, Zhou H, Chen X, et al. Relationship between cFGF23/Klotho ratio and phosphate levels in patients with chronic kidney disease. *Int Urol Nephrol*. 2019;51(3):503-507.
15. Gutierrez O, Isakova T, Rhee E, et al. Fibroblast growth factor-23 mitigates hyperphosphatemia but accentuates calcitriol deficiency in chronic kidney disease. *J Am Soc Nephrol*. 2005;16(7):2205-2215.

16. Isakova T, Wahl P, Vargas GS, et al. Fibroblast growth factor 23 is elevated before parathyroid hormone and phosphate in chronic kidney disease. *Kidney Int.* 2011;79(12):1370-1378.
17. Hruska KA, Seifert M, Sugatani T. Pathophysiology of the chronic kidney disease - Mineral bone disorder. *Curr Opin Nephrol Hypertens.* 2015;24(4):303-309.
18. Lederer E. Regulation of serum phosphate. *J Physiol.* 2014;592(18):3985-3995. d
19. Koumakis E, et al. *The Causes of Hypo- and Hyperphosphatemia in Humans.* Vol 108. Springer US; 2021.
20. NICE. *Hyperphosphataemia in Chronic Kidney Disease.*; 2013.
21. KDIGO 2017 Clinical Practice Guideline Update for the Diagnosis, Evaluation, Prevention, and Treatment of Chronic Kidney Disease–Mineral and Bone Disorder (CKD-MBD). Vol 7.; 2017.
22. Hruska KA, et al. Hyperphosphatemia of chronic kidney disease. *Kidney Int.* 2008;74(2):148-157.
23. Rastogi A, et al. Management of Hyperphosphatemia in End-Stage Renal Disease: A New Paradigm. *J Ren Nutr.* 2021;31(1):21-34.
24. McCullough PA. Phosphate control: The next frontier in dialysis cardiovascular mortality. *CardioRenal Med.* 2021;11(3):123-132.
25. Kuro-O M. Phosphate and klotho. *Kidney Int.* 2011;79(SUPPL. 121):3-6.
26. Carfagna F, Del Vecchio L, Pontoriero G, et al. Current and potential treatment options for hyperphosphatemia. *Expert Opin Drug Saf.* 2018;17(6):597-607.
27. García Martín A, Varsavsky M, Cortés Berdonces M, et al. Phosphate disorders and clinical management of hypophosphatemia and hyperphosphatemia. *Endocrinol Diabetes y Nutr.* 2020;67(3):205-215.
28. O'Seaghdha CM, Hwang SJ, Muntner P, et al. Serum phosphorus predicts incident chronic kidney disease and end-stage renal disease. *Nephrol Dial Transplant.* 2011;26(9):2885-2890.
29. Caravaca F, Villa J, García de Vinuesa E, et al. Asociación entre fósforo sérico y progresión de la enfermedad renal crónica avanzada. *Nefrologia.* 2011;31(6):707-715.
30. McGovern AP, de Lusignan S, van Vlymen J, et al. Serum Phosphate as a Risk Factor for Cardiovascular Events in People with and without Chronic Kidney Disease: A Large Community Based Cohort Study. *PLoS One.* 2013;8(9).
31. Tonelli M, Sacks F, Pfeffer M, et al. Relation between serum phosphate level and cardiovascular event rate in people with coronary disease. *Circulation.* 2005;112(17):2627-2633.

32. Vogt I, Haffner D, Leifheit-Nestler M. FGF23 and phosphate cardiovascular toxins in ckd. *Toxins (Basel)*. 2019;11(11).
33. Bundy JD, Chen J, Yang W, et al. Risk factors for progression of coronary artery calcification in patients with chronic kidney disease: The CRIC study. *Atherosclerosis*. 2018;271:53-60.
34. Cozzolino M, Ciceri P, Galassi A, et al. The key role of phosphate on vascular calcification. *Toxins (Basel)*. 2019;11(4):1-13.
35. Adeney KL, Siscovick DS, Ix JH, et al. Association of serum phosphate with vascular and valvular calcification in moderate CKD. *J Am Soc Nephrol*. 2009;20(2):381-387.
36. Hisamatsu T, Miura K, Fujiyoshi A, et al. Serum magnesium, phosphorus, and calcium levels and subclinical calcific aortic valve disease: A
37. Tabibzadeh N, Mentaverri R, Daroux M, et al. Differential Determinants of Tubular Phosphate Reabsorption: Insights on Renal Excretion of Phosphates in Kidney Disease. *Am J Nephrol*. 2018;47(5):300-303.
38. Disthabanchong S. Phosphate and Cardiovascular Disease beyond Chronic Kidney Disease and Vascular Calcification. *Int J Nephrol*. 2018.
39. Nadin C. Sevelamer as a phosphate binder in adult hemodialysis patients: An evidence-based review of its therapeutic value. *Core Evid*. 2005;1(1):43-63.
40. Kestenbaum B, Sampson JN, Rudser KD, et al. Serum phosphate levels and mortality risk among people with chronic kidney disease. *J Am Soc Nephrol*. 2005;16(2):520-528.
41. Chartsrisak K, Vipattawat K, Assanatham M, et al. Mineral metabolism and outcomes in chronic kidney disease stage 2-4 patients. *BMC Nephrol*. 2013;14(1).
42. Cozzolino M, Bruschetta E, Cusi D, et al. Phosphate handling in CKD-MBD from stage 3 to dialysis and the three strengths of lanthanum carbonate. *Expert Opin Pharmacother*. 2012;13(16):2337-2353.
43. Fouque D, Vervloet M, Ketteler M. Targeting Gastrointestinal Transport Proteins to Control Hyperphosphatemia in Chronic Kidney Disease. *Drugs*. 2018;78(12):1171-1186.
44. Wojcicki JM. Hyperphosphatemia is associated with anemia in adults without chronic kidney disease: Results from the National Health and Nutrition Examination Survey (NHANES): 2005-2010. *BMC Nephrol*. 2013;14(1).
45. Rabbani SA, S. SB, Rao PG, et al. Hyperphosphatemia in End Stage Renal Disease: Prevalence and Patients Characteristics of Multiethnic Population of United Arab Emirates. *Int J Pharm Sci*. 2017;9(12):283.
46. Bellasi A, Mandreoli M, Baldrati L, et al. Chronic kidney disease progression and outcome according to serum phosphorus in mild-to-

- moderate kidney dysfunction. *Clin J Am Soc Nephrol*. 2011;6(4):883-891.
- 47. Ye X, Kooman JP, van der Sande FM, et al. Relationship between serum phosphate levels and survival in chronic hemodialysis patients: interactions with age, malnutrition and inflammation. *Clin Kidney J*. 2021;14(1):348-357.
  - 48. Uemura H, Irahara M, Yoneda N, et al. Close Correlation between Estrogen Treatment and. *J Clin Endocrinol Metab*. 2000;85(3):1215-1219.



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Keputusan Protokol Amandemen  
No.698/UN4.6.4.5.31/PP36/2021

Nomor Protokol : UH20120701

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|--|--|-----------|---|---|---|---|
| Judul Protokol :   |  |           |   |   |   |   |
| Hubungan Laju Filtrasi Glomerulus Dengan Kadar Fosfat Pada Penyakit Ginjal Kronik                  |  |           |   |   |   |   |
| Nama Peneliti  | : dr. Akbar  |           |   |   |   |   |
| Institusi  | : Interna  |           |   |   |   |   |
| Review Protokol Amandemen<br>Ya <input checked="" type="checkbox"/> Tidak <input type="checkbox"/> | Tanggal review sebelumnya 3 Mei 2021   |           |   |   |   |   |
| Keputusan  | <input checked="" type="checkbox"/> Disetujui<br><input type="checkbox"/> Disetujui dengan Modifikasi amandemen dan informed consent<br><input type="checkbox"/> Dihentikan, sambil menunggu informasi lanjut (3)<br><input type="checkbox"/> Butuh informasi lanjut, tetap berjalan dengan protokol sebelumnya (4)<br><input type="checkbox"/> Ditolak, bisa lanjut dengan persetujuan sebelumnya (5) |           |   |   |   |   |
| Tempat Penelitian :  | RS Dr. Wahidin Sudirohusodo Makassar   |           |   |   |   |   |
| No. Versi Protokol   | 02   |           |   |   |   |   |
| No. Versi Informed Consent   | 02   |           |   |   |   |   |
| No.  | Nama Reviewer  | Keputusan |   |   |   |   |
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Makassar, 3 November 2021

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