Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah
Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

DAFTAR PUSTAKA

Acharya, T. and Deedwania, P.C. (2018). The role of newer anti-diabetic drugs in cardiovascular disease. *Am Coll of Cardiol*

Admin. (2014). *Sejarah: Departemen Kardiologi dan Pembuluh Darah*. Departemen Kardiologi dan Kedokteran Vaskular Universitas Gadjah Mada. Available from: https://kardiologi.fk.ugm.ac.id/sejarah/ [Accessed 6 July 2022]

Admin. (2018). *Tentang Kami*. Pusat Jantung Nasional Harapan Kita. Available from: https://www.PJN Harapan Kita.go.id/profil/tentang-kami [Accessed 6 July 2022]

Admin. (2022). Sejarah. RSUD Abdoel Wahab Sjahranie. Available from: https://www.rsudaws.co.id/?q=Sejarah [Accessed 6 July 2022]

Afilalo, J., Rasti, M., Ohayon, S.M., Shimony, A., & Eisenberg, M.J. (2012). *Off pump* vs on pump coronary artery bypass surgery: a maetanalysis and meta regression of randomized clinical trials. *Eur Heart J*, 33(10), 1257-67. http://dx.doi.org/10.1093/eurheartj/ehr307

Ahmad, Y., Howard, J.P., Arnold, A.D., Cook, C.M., Prasad, M., Ali, Z.A., *et al*. (2020). Mortality after drug eluting stent vs coronary artery bypass grafting for left main coronary artery disease: a meta-analysis of randomized controlled trials. *Eur Heart J*, 41: 3228-3235.

Ahmed, O.F., Kakamad, F.H., Almudhaffar, S.S., Hachim, R.H., Najar, K.A., Salih, A.M., *et al*. (2021). Combined operation for coronary artery bypass graft and mitral valve replacement; risk and outcome. *Int J of Surg Open*. 35: 100393, https://doi.org/10.1016/j.ijso.2021.100393.

Ahmed, O.F., Kakamad, F.H., Al-Neaimy, S.Y., Salif, R.Q., Mohammed, S.H., Salih, A.M. (2019). Outcome of combined coronary artery bypass grafting and aortic valve replacement: A case series. *Int J of Surg Open*, 21: 48-51.

Akca, B., Donmez, K., Disli, O.M., Erdil, F.A., Colak, M.C., Aydemir, I.K., *et al*. (2015). The effects of pulmonary hypertension on early outcomes in patients undergoing coronary artery bypass surgery. *Turkish J of Medical Sciences*, 46: 1162-1167.

Allison, D.B., Faith, M.S., Heo, M., Townsend-Butterworth, D., Williamson, D.F. (1999). Meta-analysis of the effect of excluding early deaths on the estimated relationship between body mass index and mortality, 7(4): 342-345.

Al-Ruzzeh, S., George, S., Bustami, M., Wray, J., Isley, C., Athanasiou, T., Amrani, M. (2006). Effect of off-pump coronary artery bypass surgery on clinical, angiographic, neurocognitive, and quality of life outcomes: Randomised controlled trial. *BMJ*, 332(7754): 1365

Al-Sarraf, N., Thalib, L., Hughes, A., Houlihan, M., Tolan, M., Young, V., & McGovern, E. (2011). Cross-clamp time is an independent predictor of mortality and morbidity in low- and high-risk cardiac patients. *Int J of Surgery (London, England)*, 9(1): 104–109. https://doi.org/10.1016/j.ijsu.2010.10.007

Amundson, D.E., Djurkovic, S., Matwiyoff, G.N. (2010). The obesity paradox. *Crit Care Clin*, 26: 583–596.

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Anderson, R.E., Klerdal, K., Ivert, T., Hammar, N., Barr, G., Öwall, A. (2005). Are even impaired fasting blood glucose levels preoperatively associated with increased mortality after CABG surgery? *Eur Heart J,* 26(15): 1513–1518.

Angelini, G.D., Taylor, F.C., & Reeves, B. C. (2002). Early and midterm outcome after off-pump and on-pump surgery in Beating Heart Against Cardioplegic Arrest Studies (BHACAS 1 and 2): A pooled analysis of two randomised controlled trials. *Lancet,* 359: 1194-9. http://dx.doi.org/10.1016/S0140-6736(02)08216-8

Argenziano, M., Spotnitz, H.M., Whang, W., Bigger, J.T., Jr, Parides, M., Rose, E.A. (1999). Risk stratification for coronary bypass surgery in patients with left ventricular dysfunction: Analysis of the coronary artery bypass grafting patch trial database. *Circulation*. 100(suppl): II119–II124

Ariaty, G., Sudjid, R. *and* Sitanggang, R. (2017). Angka mortalitas pada pasien yang menjalani bedah pintas koroner berdasar usia, jenis kelamin, left ventricular ejection fraction, cross clamp time, cardio pulmonary bypass time, dan penyakit penyerta. *Jurnal Anestesi Perioperatif,* 5(3): 155-162.

Aronow W.S., (2017). Management of hypertension in patients undergoing surgery. *Annals of translational medicine*, 5(10): 227. https://doi.org/10.21037/atm.2017.03.54

Arthur, C., Mejía, O., Lapenna, G.A., Brandão, C., Lisboa, L., Dias, R.R., Dallan, L., Pomerantzeff, P., & Jatene, F.B., (2018). Perioperative management of the diabetic patient referred to cardiac surgery. *Brazilian J of Surg*, 33(6): 618–625. https://doi.org/10.21470/1678-9741-2018-0147

Awan, N.I., Jan, A., Ur Rehman, M., Ayaz, N. (2020). The effect of ejection fraction on mortality in coronary artery bypass grafting (CABG) patients. *Pak J Med Sci*, 36 (7): 1454-1459.

Azarfarin, R., Ashouri, N., Totonchi, Z., Bakhshandeh, H., & Yaghoubi, A. (2014). Factors influencing prolonged ICU stay after open heart surgery. *Research in cardiovascular medicine*, 3(4): e20159. https://doi.org/10.5812/cardiovascmed.20159

Banack, H.R., Kaufman, J.S. (2014). The obesity paradox: understanding the effect of obesity on mortality among individuals with cardiovascular disease. *Prev Med,* 62 : 96–102.

Bano, T., Mishra, S.K., Kuchay, M.S., Mehta, Y., Trehan, N., Sharma, P., Singh, M.K., & Mithal, A. (2019). Continuation of metformin till night before surgery and lactate levels in patients undergoing coronary artery bypass graft surgery. *Indian J of endocrinology and metabolism*, 23(4): 416–421. https://doi.org/10.4103/ijem.IJEM

Baskett, R.J., O'Connor, G.T., Hirsch, G. M., Ghali, W.A., Sabadosa, K.A., Morton, J.R., *et al*. (2005). The preoperative intraaortic balloon pump in coronary bypass surgery: a lack of evidence of effectiveness. *Am Heart J,* 150: 1122-1127

Basnet, S., Kozikowski, A., Sun, H., Troup, M., Urrutia, L. E., & Pekmezaris, R., (2017). Metformin therapy and postoperative atrial fibrillation in diabetic patients after cardiac surgery. *J of Intensive Care*, 5: 60. https://doi.org/10.1186/s40560-017-0254-8

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Bayfield, N.G.R., Pannekoek, A., & Tian, D. H., (2018). Preoperative cigarette smoking and short-term morbidity and mortality after cardiac surgery: a meta-analysis. *Heart Asia*, 10(2): e011069. doi:10.1136/heartasia-2018-011069

Benedetto, U., Danese, C., Codispoti, M. (2014). Obesity paradox in coronary artery bypass graft: myth or reality? *J Thorac Cardiovasc Surg*, 147: 1517–1523

Benetis, R. (2005). Surgical treatment of congestive heart failure in coronary artery disease. *Roczniki Akademii Medycznej w Bialymstoku*, 50, 45–49.

Berg, K.S., Stenseth, R., Pleym, H., Wahba, A., Videm, V. (2011). Mortality risk prediction in cardiac surgery: Comparing a novel model with the EuroSCORE. *Acta anaesthesiologica Scandinavica*, 55: 313-21

Berger, A.K., Breall, J.A., Gersh, B.J., Oetgen, W.J., Marciniak, T.A., Schulman, K.A. (2001). Effect of diabetes mellitus and insulin use on survival after acute myocardial infarction in the elderly. *The Cooperative Cardiovasc Project*., 87(3): 272-277.

Bhamidipati, C.M., Lapar, D.J., Stukenborg, G.J., Morrison, C.C., Kern, J.A., Kron, I.L., Ailawadi, G. (2011). Superiority of moderate control of hyperglycemia to tight control in patients undergoing coronary artery bypass graft. *J of Thoracic and Cardiovasc Surg*, 141(2): 543–551.

Bhukal, I., Solanki, S.L., Ramaswamy, S., Yaddanapudi, L.N., Jain, A., Kumar, P. (2012). Perioperative predictors of morbidity and mortality following cardiac surgery under cardiopulmonary bypass. *Saudi J of Anesthesia*. 6(3): 242-247

Biancari, F., Juvonen, T., Onorati, F., Faggian, G., Heikkinen, J., Airaksinen, J., *et al*. (2014). Meta-analysis on the performance of the EuroSCORE II and the Society of Thoracic Surgeons Scores in patients undergoing aortic valve replacement. *J Cardiothorac Vasc Anesth.* 28: 1533–1539. https://doi.org/10.1053/j.jvca.2014.03.014

Bjessmo, S., Ivert, T., Flink, H., Hammar, N., (2001). Early and late mortality after surgery for unstable angina in relation to Braunwald class. *Am Heart J*, 141 (1): 9-14. doi: 10.1067/mhj.2001.111955

Blasberg, J.D., Schwartz, G.S., & Balaram, S.K. (2011). The role of gender in coronary surgery. *Eur. J. Cardiothorac. Surg*. https://doi.org/10.1016/j.ejcts.2011.01.003

Bonaros, N., Hennerbichler, D., Friedrich, G., Kocher, A., Pachinger, O., Laufer, G., Bonatti, J. (2009). Increased mortality and perioperative complications in patients with previous elective percutaneous coronary interventions undergoing coronary artery bypass surgery. *J Thorac Cardiovasc Surg*, 137 : 846–852. doi: 10.1016/j.jtcvsberbanding.2008.09.041

Bootsma, I. T., de Lange, F., Koopmans, M., Haenen, J., Boonstra, P. W., Symersky, T., Boerma, E.C. (2017). Right ventricular function after cardiac surgery is a strong independent predictor for long-term mortality. *J of Cardiothorac and Vasc Anesthesia*, 31: 1656-1662.

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Borde, D., Gandhe, U., Hargave, N., Pandey, K., Khullar, V. (2013). The application of European system for cardiac operative risk evaluation II (EuroSCORE II) and Society of Thoracic Surgeons (STS) risk-score for risk stratification in Indian patients undergoing cardiac surgery. *Ann Card Anaesth,* 16: 163-6

Bridgewater, B., Kinsman, R., Walton, P., Gummert, J., & Kappetein, A.P. (2011). The 4th European Association for Cardio-thoracic Surgery adult cardiac surgery database report. *Interact. Cardiovasc. Thorac. Surg*. 12: 4–5. https://doi.org/10.1510/icvts.2010.251744

Brown, J.M., Everett, B.M. (2019). Cardioprotective diabetes drugs: what cardiologists need to know. *Cardiovasc Endocrinol and Metabolism,* 8(4): 96–105. https://doi.org/10.1097/XCE.0000000000000181

Butler, J., Rocker, G.M., Westaby, S. (1993). Inflammatory response to cardiopulmonary bypass. *Ann Thorac Surg,* 55: 552-559

Capes, S.E., Hunt, D., Malmberg, K., Gerstein, H.C. (2000). Stress hyperglycaemia and increased risk of death after myocardial infarction in patients with and without diabetes: a systematic overview, *The Lancet*, 355(9206): 773–778.

Carabello, C., Desai, N.R., Mulder, H., Alhanti, B., Wilson, F.P., Fiuzat, M., Felker, M., Pina, I.L., O'Connor, C.M., Lindenfelf, J., Januzzi, J.L., Sohen, L.S., Ahmad, T. (2019). Clinical implications of the New York Heart Association. *J Am Heart Assoc*

Carr, J.A., Haithcock, B.E., Paone, G., Bernabei, A.F., Silverman, N.A. (2002). Long-term outcome after coronary artery bypass graft in patients with severe left ventricular dysfunction. *Ann Thorac Surg*, 74(5): 1531–1536. doi: 10.1016/s0003-4975(02)03944

Chai, P.J., Williamson, J.A., Lodge, A.J., Daggett, C.W, Scarborough, J.E., *et al*. (1999). Effect of ischemia on pulmonary dysfunction after cardiopulmonary bypass. *Ann Thorac Surg*, 156(1): 932-8

Chan, K.M.J., Punjabi, P.P., Flather, M., Wage, R., Symmonds, K., Roussin, I., *et al*. (2012). Coronary artery bypass surgery with or without mitral valve annuloplasty in moderate functional ischemic mitral regurgitation. *Circulation,* 126: 2502-2510.

Chand, M., Armstrong, T., Britton, G., & Nash, G.F., (2007). How and why do we measure surgical risk? *J Res Soc Med*, 100: 508–512. https://doi.org/10.1258/jrsm.100.11.508

Chertow, G. H., Levy, E. M., Hammermeister, K. E., Grover, F., Daley, J. (1998). Independent association between acute renal failure and mortality following cardiac surgery.*Am J of Medicine,* 104: 343-348.

Chocron, S., Baillot, R., Rouleau, J. L., Warnica, W. J., Block, P., Johnstone, D., Myers, M. G., Calciu, C. D., Nozza, A., Martineau, P., van Gilst, W. H., & IMAGINE Investigators. (2008). Impact of previous percutaneous transluminal coronary angioplasty and/or stenting revascularization on outcomes after surgical revascularization: insights from the imagine study. *Eur Heart J*, 29(5): 673-679. https://doi.org/10.1093/eurheartj/ehn026

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ad/

Christakis, G. T., Weisel, R. D., Fremes, S. E., Ivanov, J., David, T. E., Goldman, B. S., Salerno, T. A. (1992). Coronary artery bypass graft in patients with poor ventricular function. Cardiovascular Surgeons of the University of Toronto. *J Thorac Cardiovasc Surg*, 103: 1083–1091.

Christenson, J. T., Sionet, F., Schmuziger, M. (1997). The effect of preoperative intraaortic balloon pump support in high risk patients requiring myocardial revascularisation. *J of Cardiovasc Surg*, 38: 397-402.

Cladellas, M., Bruguera, J., Comin, J., Vila, J., De Jaime, E., Marti, J., Gomez, M. (2006). Is preoperative anaemia a risk markermarker for in-hospital mortality and morbidity after valve replacement? *Eur Heart J*, 27: 1093-1099.

Cleveland, J.C. Jr., Shroyer, A.L., Chen, A.Y., Peterson, E., & Grover, F.L. (2001). Off-pump coronary artery bypass grafting decreases risk-adjusted mortality and morbidity. *Ann Thorac Surg*, 72(4): 1282-8.

Cockburn, J., Singh, M. S., Rafi, N. H. M., Dooley, M., Hutchinson, N., Hill, A., … Hildick-Smith, D., (2015). Poor mobility predicts adverse outcome better than other frailty indices in patients undergoing transcatheter aortic valve implantation. *Catheterization and Cardiovascular Interventions*, 86(7): 1271–1277. doi: 10.1002/ccd.25991

Cornell, T.T., Sun, L., Hall, M.W., Gurney, J.G., Ashbrook, M.J., Ohye, R.G., Shanley, T.P. (2012). Clinical implications and molecular mechanisms of immunoparalysis following cardiopulmonary bypass. *J Thorac Cardiovasc Surg*, 143(5): 1160-1166

Cragg, J. J., Noonan, V. K., Krassioukov, A., & Borisoff, J. (2013). Cardiovascular disease and spinal cord injury: results from a national population health survey. *Neurology*, 81(8): 723–728. https://doi.org/10.1212/WNL.0b013e3182a1aa68

Curtis, J.J., Walls, J. T., Salam, N. H., Boley, T. M., Nawarong, W., Schmaltz, R. A., *et al*., (1991). Impact of unstable anginaunstable angina on operative mortality with coronary revascularization at varying time intervals after myocardial infarction, *J Thorac Cardiovasc Surg*. 102: 867-73

D'Agostino, R.S., Jacobs, J.P., Badhwar, V., Fernandez, F.G., Paone, G., Wormuth, D.W., *et al*., (2018). The Society Of Thoracic Surgeons adult cardiac surgery database: 2018 update on outcomes and quality. *Ann. Thorac. Surg.* 105: 15–23. https://doi.org/10.1016/j.athoracsur.2017.10.035

DaCosta, R.L., Lamas, C. C., Azevedo, V. M. P., Cardoso, E. M. S. C., Duarter, L. P., Weksler, C. (2016). Impact of pulmonary hypertension on surgical mortality and 3-year survival after aortic valve replacement. *Int J of Cardiovasc Sciences*, 29: 2359-4802.

Dalén, M., Lund, L. H., Ivert, T., Holzmann, M. J., & Sartipy, U., (2016). Survival after coronary artery bypass grafting in patients with preoperative heart failure and preserved vs reduced ejection fraction. *JAMA Cardiol*, 1(5): 530. doi: 10.1001/*JAMA*cardio.2016.1465

Damy, T., Viallet, C., Lairez, O., Deswarte, G., Paulino, A., Maison, P., *et al*. (2009). Comparison of four right ventricular systolic echocardiographic parameters to predict adverse outcomes in chronic heart failure. *Eur J Heart Fail*, 11: 818-824. doi: 10.1093/eurjhf/hfp111

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Dasgupta, M., Rolfson, D. B., Stolee, P., Borrie, M. J., Speechley, M. (2009) Frailty is associated with postoperative complications in older adults with medical problems. *Arch Gerontol Geriatr*, 48: 78–83.

Dayan, V., Arocena, M. J., Fernandez, A., Silva, E., & Zerpa, D. P., (2019). Previous cardiac surgery: a predictor of mortality in aortic valve replacement? *Brazilian J of Cardiovasc Surg*, 34(2): 173–178. https://doi.org/10.21470/1678-9741-2018-0251

Dekerlegand, J., (2007). Congestive heart failure. *Physical Rehabilitation*, 669-688

Denault, A., Deschamps, A., Tardif, J.C., Lambert, J., & Perrault, L. (2010). Pulmonary hypertension in cardiac surgery. *Current Cardiol reviews*, 6(1), 1–14. https://doi.org/10.2174/157340310790231671

Di Carli, M.F., Maddahi, J., Rokhsar, S., Schelbert, H.R., Bianco-Batlles, D., Brunken, R.C., Fromm, B. (1998). Long-term survival of patients with coronary artery disease and left ventricular dysfunction: implications for the role of myocardial viability assessment in management decisions. *J Thorac Cardiovasc Surg*, 116: 997–1004.

Dixon-Ibarra, A., & Horner-Johnson, W. (2014). Disability status as an antecedent to chronic conditions: National Health Interview Survey 2006-2012. *Preventing chronic disease*, 11: 130251. https://doi.org/10.5888/pcd11.130251

Doenst, T., Borger, M. A., Weisel, R. D., Yau, T. M., Maganti, M., & Rao, V. (2008). Relation between aortic cross-clamp time and mortality--not as straightforward as expected. *Euro J of Cardiothorac Surgery: Official Journal of the Euro Assoc for Cardiothorac Surg*, 33(4): 660–665. https://doi.org/10.1016/j.ejcts.2008.01.001

Duncan, A.E., Abd-Elsayed, A., Maheshwari, A., Xu, M., Soltesz, E., Koch, C.G. (2010). Role of intraoperative and postoperative blood glucose concentrations in predicting outcomes after cardiac surgery. *Anesthesiology*. 112(4): 860–871.

Dupuis, J.Y., Wang, F., Nathan, H., Lam, M., Grimes, S., & Bourke, M., (2001). The Cardiac Anesthesia Risk Evaluation score: a clinically useful predictor of mortality and morbidity after cardiac surgery. *Anesthesiology*, 94: 194–204.

Edwards, F.H., Peterson, E.D., Coombs, L.P., DeLong, E.R., Jamieson, R.E., Shroyer, L.W., Grover, F.L. (2001). Prediction of operative mortality after replacement surgery. *J of the Am Coll of Cardiol*, 37(3): 885-92.

Edwards, F.H., Clark, R.E., & Schwartz, M., (1994). Coronary artery bypass grafting: the Society of Thoracic Surgeons National Database experience. *Ann Thorac Surg*, 57: 12–19.

Eifert, S., Mair, H., Boulesteix, A. L., Kilian, E., Adamczak, M., Reichart, B., *et al*. (2010). Mid-term outcomes of patients with PCI prior to CABG in comparison to patients with primary CABG. *Vasc Health Risk Manag*, 6: 495–501. doi: 10.2147/vhrm.s8560

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

El Messaoudi, S., Nederlof, R., Zuurbier, C.J., van Swieten, H.A., Pickkers, P., Noyez, L., Dieker, H.J., Coenen, M.J., Donders, A. R., Vos, A., Rongen, G. A., & Riksen, N. P. (2015). Effect of metformin pretreatment on myocardial injury during coronary artery bypass surgery in patients without diabetes (MetCAB): a double-blind, randomised controlled trial. *The Lancet. Diabetes & endocrinology*, 3(8): 615–623. https://doi.org/10.1016/S2213-8587(15)00121-7

El Shafey, W.E.D.H., Elnagar, T.M.A., Kamal, A.A.M., Kamal, A.M. (2020). Early results of coronary artery bypass graft artery bypass graft (CABG) in patients with low ejection fraction. *World J of Cardiovasc Diseases*, 10(5): 319—328.

Essianda, V., Nurcahyo, W.I., & Ismail, A. (2015). *Mortalitas operasi jantung ganti katup di RSUP Dr Kariadi Semarang periode Januari 2014-Desember 2014*. Media Med. Muda, 4: 1569–1575.

Evans, R. (2020). *Akaike Information Criterion: When & How to Use It*. Scribbr. Available from: https://www.scribbr.com/statistics/akaike-information-criterion/ [Accessed 23 May 2022]

Ezekowitz, J. A., McAlister, F. A., Armstrong, P. W. (2003). Anemia is common in heart failure and is associated with poor outcomes: insight from a cohort of 12 065 patients with new-onset heart failure. *Circulation*, 107: 223–225.

Fakhri, D., Busro, P.W., Rahmat, B., Purba, S., Mukti, A.A.P., Caesario, M., *et al*. (2016). Risk factors of sepsis after open congenital cardiac surgery in infants: a pilot study. *Med J of Indonesia*, 25: 182-9

Febrianti, S.R., (2018). *Validasi European System for Cardiac Operative Risk Evaluation (EuroSCORE) II sebagai Prediktor Lama Perawatan Intensive Care Unit (ICU) pada Pasien Operasi Bedah Jantung (Kelainan Katup dan Kongenital) di RSUP Dr. Sardjito*. Universitas Gadjah Mada, Yogyakarta.

Ferdiansyah, G.R., (2014). *Perbandingan antara EuroSCORE dan Parsonnet score sebagai analisis faktor risiko dan mortalitas pada pasien yang menjalani operasi perbaikan katup mitral di pusat pelayanan jantung terpadu Rumah Sakit DR. Cipto Mangunkusumo tahun 2010-2012.* Universitas Indonesia, Jakarta.

Ferguson, J. J., Cohen, M., Freedman, R. J, Stone, G. W., Miller, M. F., Joseph, D. C., *et al*. (2001). The current practice of intra-aortic balloon counterpulsion: results from the Benchmark Registry. *J Am Coll of Cardiol*, 38: 1456-1462.

Filion, K. B., Azoulay, L., Platt, R. W., Dahl, M., Dormuth, C. R., Clemens, K. K., Hu, N., Paterson, J. M., Targownik, L., Turin, T. C., Udell, J. A., Ernst, P., & CNODES Investigators (2016). A multicenter observational study of incretin-based drugs and heart failure. *The New England J of Medicine*, 374(12): 1145–1154. https://doi.org/10.1056/NEJMoa1506115

Foo, K., Cooper, J., Deaner, A., Knight, C., Suliman, A., Ranjadayalan, K, Timmis, A.D. (2003). A single serum glucose measurement predicts adverse outcomes across the whole range of acute coronary syndromes. *Heart*, 89(5): 512–516.

Formularium Nasional. (2019). Kementerian Kesehatan Republik Indonesia

Formularium Nasional. (2021). Kementerian Kesehatan Republik Indonesia

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Frost, J. (2022). *Overfitting Regression Models: Problems, Detection, and Avoidance*. Statistics by Jim. Available from: https://statisticsbyjim.com/regression/overfitting-regression-models/ [Accessed on 4 August 2022]

Furnary, A. P., Gao, G., Grunkemeier, G. L., Wu Y.X., Zerr, K. J., Bookin, S. O., *et al*. (2003). Continuous insulin infusion reduces mortality in patients with diabetes undergoing coronary artery bypass graft. *J of Thoracic and Cardiovasc Surg*, 125(5): 1007–1021.

Gabrielle, F., Roques, F., Michel, P., Bernard, A., de Vicentis, C., Roques, X., (1997), Is the Parsonnet's score a good predictive score of mortality in adult cardiac surgery: assessment by a French multicentre study. *Eur J of Cardiothorac Surg*, 11: 406-414

Gall, H., Yogeswaran, A., Fuge, J., Sommer, N., Grimminger, F., Seeger, W., *et al*. (2021). Validity of echocardiographic Tricuspid regurgitation gradient to screen for new definition of pulmonary hypertension. *E Clinical Medicine*., 34: 100822.

Gandhi, G.Y., Nuttall, G.A., Abel, M.D., Mullany, C.J., Schaff, H.V., Williams, B.A., … McMahon, M.M. (2005). Intraoperative hyperglycemia and perioperative outcomes in cardiac surgery patients. *Mayo Clinic Proceedings*, 80(7): 862–866. doi: 10.4065/80.7.862

Gandhi, G.Y., Nuttall, G.A., Abel, M.D., Mullany, C.J., Schaff, H.V., O'Brien, P.C., *et al*. (2007). Intensive intraoperative insulin therapy versus conventional glucose management during cardiac surgery: a randomized trial. *Ann of Int Med*. 146(4): 233–243.

Gassmann, N.N., van Elteren, H.A., Goos, T.G., Morales, C.R., Rivera-Ch, M., Martin, D.S., *et al*. (2016). Pregnancy at high altitude in the Andes leads to increased total vessel density in healthy newborns. *J Appl Physiol*, 121: 709–15. doi: 10.1152/japplphysiol.00561.2016

Genuardi, M.V., Shpilsky, D., Handen, A., VanSpeybroeck, G., Canterbury, A., Lu, M., *et al*. (2021) Increased mortality in patients with preoperative and persistent postoperative pulmonary hypertension undergoing mitral valve surgery for mitral regurgitation: A cohort study. *J of the Am Heart Assoc*, 10: e018394.

George, T.J., Beaty, C.A., Kilic, A., Haggerty, K.A., Frank, S.M., Savage, W.J., *et al*. (2012). Hemoglobin Drift After Cardiac Surgery. *The Annals of Thoracic Surgery*, 94(3): 703–9.

Gilbert-Kawai, E., Coppel, J., Court, J., van der Kaaij, J., Vercueil, A., Feelisch, M., *et al*. (2017). Sublingual microcirculatory blood flow and vessel density in Sherpas at high altitude. *J Appl Physiol*, 122: 1011–8. doi: 10.1152/japplphysiol.00970.2016

Glance, L. G., Osler, T. M., Mukamel, D. B., Dick, A. W. (2007). Effect of complications on mortality after coronary artery bypass graft surgery : Evidence from New York State. *J of Thoracic and Cardiovasc Surg*, 134(1): 53-58.

Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah
Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Gonzales, R., Urbano, J., Solana, M. J., Hervias, M., Pita, A., Perez, R., *et al*. (2019). Microcirculatory differences in children with congenital heart disease according to cyanosis and age. *Front Pediatr*, 7(264): 1-9 https://doi.org/10.3389/fped.2019.00264

Greiner, S., Jud, A., Aurich, M., Hess, A., Hilbel, T., Hardt, S., *et al*. (2014). Reliability of noninvasive assessment of systolic pulmonary artery pressure by Doppler echocardiography compared to right heart catheterization: analysis in a large patient population. *J Am Heart Assoc*, 3(4): 1-8.

Gunay, R., Sensoz, Y., Kayacioglu, I., Tuygun, A. K., Balci, A. Y., Kisa, U., *et al*. (2009). Is the aortic valve pathology type different for early and late mortality in concomitant aortic valve replacement and coronary artery bypass surgery. *Interact Cardiovasc and Thoracic Surg*, 9: 630-634.

Haddad, F., Couture, P., Tousignant, C., Denault, A. Y. (2009). The right ventricle in cardiac surgery, a perioperative perspective : ii. pathophysiology, clinical importance and management. *Anesth Analg*, 108: 422-33.

Hallward, G., Balani, N., McCorkell, S., Roxburgh, J., Cornelius, V. (2016). The relationship between preoperative hemoglobin concentration, use of hospital resources, and outcomes in cardiac surgery. *J of Cardiothorac and Vasc Anesthesia*, 30(4): 901–8.

Hannan, E. L. (2003). Predictors of readmission for complications of coronary artery bypass graft surgery. *JAMA*, 290(6): 773. doi: 10.1001/*JAMA*.290.6.773

Harahap, G., Nurcahyo, W. and Ismail, A. (2016). Mortalitas operasi jantung coronary artery bypass graft di RSUP Dr Kariadi Semarang periode Januari 2014 - Desember 2014. *Jurnal Kedokteran Diponegoro*, 5(2): 160-166

Hashemzadeh, K., Hashemzadeh, S., & Dehdilani, M., (2012). Risk factors and outcomes of acute renal failure after open cardiac surgery. *Asian Cardiovasc. Thorac. Ann*. 20: 275–280. https://doi.org/10.1177/0218492312436402

Hassan, A., Buth, K.J., Baskett, R.J., Ali, I.S., Maitland, A., Sullivan, J.A., Ghali, W.A., & Hirsch, G.M. (2005). The association between prior percutaneous coronary intervention and short-term outcomes after coronary artery bypass grafting. *Am Heart J*, 150(5): 1026–1031. https://doi.org/10.1016/j.ahj.2005.03.035

Hausmann, H., Topp, H., Siniawski, H., Holz, S., Hetzer, R. (1997). Decision-making in end-stage coronary artery disease:revascularization or heart transplantation? *Ann Thorac Surg*, 64: 1296–1302

Head, S.J., Osnabrugge, R.L.J., Howell, N.J., Freemantle, N., Bridgewater, B., Pagano, D., *et al*., (2013). A systematic review of risk prediction in adult cardiac surgery: considerations for future model development. *Eur J Cardiothorac Surg*, 43: e121–e129. https://doi.org/10.1093/ejcts/ezt044

Heijmans, J.H., Maessen, J.G., & Roekaerts, P.M.H.J., (2005). Risk stratification for adverse outcome in cardiac surgery. *Eur J Anaesthesiol*, 20: 515–527. https://doi.org/10.1017/S0265021503000838

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Herlitz, J., Wognsen, B., Caidahl, K., Haglid, M., Karlsson, B. W., Karlsson, T., *et al*. (1997). Mortality and morbidity among patients who undergo combined valve and coronary artery bypass surgery early and late results. *Eur J of Cardiothorac Surg*, 12: 836-846.

Hess, N., Sultan, I., Wang, Y., Thoma, F., Kilic, A. (2021). Outcomes of cardiac surgery with very prolonged cardiopulmonary bypass times. *Authorea*, https://doi.org/10.22541/au.161486705.54871224/v1

Higgins, T.L., Estafanous, F.G., Loop, F.D., Beck, G.J., Blum, J.M., & Paranandi, L. (1992). Stratification of morbidity and mortality outcome by preoperative risk factors in coronary artery bypass patients. *A clinical severity score*. *JAMA*, 267: 2344–2348.

Home, P. D., Pocock, S. J., Beck-Nielsen, H., Gomis, R., Hanefeld, M., Jones, N. P., Komajda, M., McMurray, J. J., & RECORD Study Group. (2007). Rosiglitazone evaluated for cardiovascular outcomes--an interim analysis. *The New England J of Medicine*, 357(1): 28–38. https://doi.org/10.1056/NEJMoa073394

Hote, M., (2018). Cardiac surgery risk scoring systems: In quest for the best. *Heart Asia*, 10. https://doi.org/10.1136/heartasia-2018-011017

Howell, N. J., Keogh, B. E., Bonser, R. S., Graham, T. R., Mascaro, J., Rooney, S. J., *et al*. (2008). Mild renal dysfunction predicts in hospital mortality and post-discharge survival following cardiac surgery. *Eur J of Cardiothorac Surg*, 34 : 390-395.

Hu, J., Sun, P., Ruan, X., Chao, A., Lin, Yu., Li, X. Y. (2005). Mechanism of myocardial microvessel formation in cyanotic congenital heart disease. *Circ J*, 69: 1089-1093.

Hukmas. (2022). *Jantung Terpadu*. RSUP Dr. Kariadi. Available from: https://www.rskariadi.co.id/layanan/3/Jantung-Terpadu [Accessed 6 July 2022]

Hung, M., Besser, M., Sharples, L.D., Nair, S.K., Klein, A.A. (2011). The prevalence and association with transfusion, intensive care unit stay and mortality of pre-operative anaemia in a cohort of cardiac surgery patients: Pre-operative anaemia in a cohort of cardiac surgery patients. *Anaesthesia*, 66(9): 812–8.

Imran, S. A., Ransom, T. P. P., Buth, K. J., Clayton, D., Al-Shehri, B., Ur, E., Ali, I. S. (2010). Impact of admission serum glucose level on in-hospital outcomes following coronary artery bypass graft surgery. *Canadian J of Cardiol*, 26(3): 151–154.

Inamdar, A. K., Shende, S. P., Inamdar, S. A. (2022). Outcome of coronary artery bypass graft in patients with low ejection fraction. *Medical J of Dr D.Y. Patil University*, 10: 162-166.

Indrasusanto, T.E and Boom, C.E. (2017). Prinsip proteksi sel otot jantung dalam mesin pintas jantung paru pada prosedur pembedahan jantung terbuka. *Jurnal Anestesiologi Indonesia*, 9(2)

Islam, M.Y, Umer, A., Arshad, M.H. (2014). On pump coronary artery bypass graft surgery versus *off pump* coronary artery bypass surgery: A review. *Global J of Health Sci*

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Islamoglu, F., Apaydin, A. Z., Posacioglu, H., Ozbaran, M., Hamulu, A., Buket, S., Telli, A., Durmaz, I., (2002). Coronary artery bypass grafting in patients with poor left ventricular function. *Jpn Heart J*. 43: 343–356.

Ivanov, J., Borger, M. A., Tu, J. V., Rao, V., & David, T. E. (2008). Mid-term outcomes of off-pump berbanding on-pump coronary artery bypass graft surgery. *Can J Cardiol*, 24(4): 279-84. http://dx.doi.org/10.1016/S0828-282X(08)70177-6

Jabagi, H., Boodhwani, M., Tran, D.T., Sun, L., Wells, G., Rubens, F.D. (2019). The effect of preoperative anemia on patients undergoing cardiac surgery: a propensity-matched analysis. *Seminars in Thoracic and Cardiovascular Surgery*, 31(2): 157–63.

Jiang, L., Wei, X. B., He, P. C., Feng, D., Liu, Y. H., Liu, J., Chen, J. Y., Yu, D. Q., & Tan, N. (2017). Value of pulmonary artery pressure in predicting in-hospital and one-year mortality after valve replacement surgery in middle-aged and aged patients with rheumatic mitral disease: an observational study. *BMJ open*, 7(5): e014316. https://doi.org/10.1136/bmjopen-2016-014316

Johnson, A. P., Parlow, J. L., Whitehead, M., Xu, J., Rohland, S., & Milne, B. (2015). Body mass index, outcomes, and mortality following cardiac surgery in ontario, canada. *J of the Am Heart Assoc*, 4(7): e002140 . https://doi.org/10.1161/JAHA.115.002140

Jones, R. H., Hannan, E. L., Hammermeister, K. E., Delong, E. R., O'Connor, G. T., Luepker, R. V., Parsonnet, V., Pryor, D. B. (1996). Identification of preoperative variables needed for risk adjustment of short-term mortality after coronary artery bypass graft. The Working Group Panel on the Cooperative CABG Database Project. *J Am Coll Cardiol*, 28: 1478–1487.

Kacila, M., Tiwari, K. K., Gran0v, N., Omerbasic, E., Straus, S., (2010), Assessment of the initial and modified Parsonnet score in mortality prediction of the patients operated in the Sarajevo Heart Center. *Bosnian Journal of Basic Medical Sciences*, 10(2): 165-168

Kar, P., Geeta, K., Gopinath, R., & Durga, P., (2017). Mortality prediction in Indian cardiac surgery patients: Validation of European system for cardiac operative risk evaluation II. *Indian J Anaesth*, 61: 157–162. https://doi.org/10.4103/ija.IJA_522_16

Karkouti, K, Wijeysundera, D.N., Beattie, W.S. (2008). Risk associated with preoperative anemia in cardiac surgery: a multicenter cohort study. *Circulation*, 117(4): 478–84.

Karkouti, K., Wijeysundera, D. N., Beattie, S. (2008). The reducing bleeding in cardiac surgery (RBC) investigators: Risk associated with preoperative anemia in cardiac surgery. A multicenter cohort study. *Circulation*, 117: 478-484.

Kennedy, J. I., LaPar, D. J., Kern, J. A., Kron, I. I., Bergin, J. D., Kamath, S., Ailawadi, G. (2013). Does the Society of Thoracic Surgeon risk score accurately predict operative mortality for patients with pulmonary hypertension? *J Thorac Cardiovasc Surg*, 146: 631-637.

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Kim, C., Connell, H., McGeorge, A., Hu, R. (2015). Prevalence of preoperative anaemia in patients having first-time cardiac surgery and its impact on clinical outcome. A retrospective observational study. *Perfusion*, 30(4): 277–83.

Kim, D.H., Kim, C.A., Placide, S., Lipsitz, L.A., Marcantonio, E.R. (2016). Preoperative frailty assessment and outcomes at 6 months or later in older adults undergoing cardiac surgical procedures a systematic review. *Ann of Int Med*, 165(9): 650-660. doi: 10.7326/M16-0652

Kinoshita, T., Asai, T., Murakami, Y., Takashima, N., Hosoba, S., Nishimura, O., *et al*. (2009). Impact of previous PCI on hospital mortality after off-pump coronary artery bypass graft in diabetic patients with multivessel disease. *Innovations (Phila)*, 4(6): 334–9. doi: 10.1097/IMI.0b013e3181c47194

Klein, A.A., Collier, T.J., Brar, M.S., Evans, C., Hallward, G., Fletcher, S.N., *et al*. (2016). The incidence and importance of anaemia in patients undergoing cardiac surgery in the UK - the first Association of Cardiothoracic Anaesthetists national audit. *Anaesthesia*, 71(6): 627–35.

Klváček, A., Šantavý, P., Zuščich, O., Konečný, J., Hájek, R., & Lonský, V., (2015). Five-year experience with cardiac surgery prosedurs in dialysis-dependent patients. *Cor Vasa*, 57: e86–e90. https://doi.org/10.1016/j.crvasa.2015.03.004

Koch, C.G., Khandwala, F., Nussmeier, N., Blackstone, E.H. (2003). Gender differences in outcomes after hospital discharge from coronary artery bypass grafting: A prospensity-matched comparison. *J Thorac Cardiovasc Surg*, 126: 2032-2043

Kolh, P., (2006). Importance of risk stratification models in cardiac surgery. *Eur Heart J*, 27: 768–769. https://doi.org/10.1093/eurheartj/ehi792

Kulier, A., Levin, J., Moser, R., Rumpold-Seitlinger, G., Tudor, I. C., Snyder-Ramos, S. A., Moehnle, P., Mangano, D. T. (2007). Investigators of the Multicenter Study of Perioperative Ischemia Research Group; Ischemia Research and Education Foundation: Impact of preoperative anemia on outcome in patients undergoing coronary artery bypass graft. *Circulation*, 116: 471–479.

Kuplay, H., Erdoğan, B.S., Baştopçu, M., Karpuzoğlu, E., Er, H. Performance of the EuroSCORE II and the STS score for cardiac surgery in octogenarians. (2021). *Turk Gogus Kalp Damar Cerrahisi Dergisi*, 29(2): 174-182. doi: 10.5606/tgkdc.dergisi.2021.21403

Kurniawaty, J. and Widyastuti, Y. (2019). Outcome of adult congenital heart disease patients undergoing cardiac surgery: Clinical experience of dr. Sardjito hospital. *BMC Proceedings*, 13: 16

Kurniawaty, J., Widyastuti, Y., Boom, C.E., & Parmana, I.A.M., (2017). EuroSCORE II and ACEF score prediction for in-hospital mortality after coronary artery bypass graft. Presented at the *Annual Scientific Meeting in Anesthesiology 2017*, Hong Kong.

Launcelott, S., Ouzounian, M., Buth, K.J., Legare, J.F. (2012). Predicting in-hospital mortality after redo cardiac operations: development of a preoperative scorecard, *Original Article Adult Cardiac*. 94(3) : 778-784, https://doi.org/10.1016/j.athoracsur.2012.04.062

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Lavie, C.J., De Schutter, A., Patel, D. A., Romero-Corral, A., Artham, S.M., Milani, R.V. (2012). Body composition and survival in stable coronary heart disease: Impact of lean mass index and body fat in the "obesity paradox". *J Am Coll Cardiol*, 60: 1374–1380.

Lazar, H. L. (2012). Glycemic control during coronary artery bypass graft. *International Scholarly Research Network,* 14: 1-12, https://doi.org/10.5402/2012/292490

Lee, D.H., Buth, K.J., Martin, B.J., Yip, A.M.Y., Hirsch, G.M. (2010). Frail patients are at increased risk of mortality and prolonged institutional care after cardiac surgery. *Circulation*, 121: 973-978.

Levy, E. M., Viscoli, C. M., Horwitz, R. I. (1996). The effect of acute renal failure on mortality: A cohort analysis. *JAMA*, 275: 1489-1494.

Li, F., Xin, H., Zhang, J., Fu, M., Zhou, J., & Lian, Z. (2021). Prediction model of in-hospital mortality in intensive care unit patients with heart failure: machine learning-based, retrospective analysis of the MIMIC-III database. *BMJ open*, *11*(7): e044779. https://doi.org/10.1136/bmjopen-2020-044779

Lisboa, A.L.F., Mejia, O.A., Dallan, L.A., Moreira, L.F., Puig, L.B., Jatene, F.B., Stolf, N.A. (2012). Previous percutaneous coronary intervention as risk factor for coronary artery bypass graft. *Arq Bras Cardiol*, 99(1): 586-595, https://doi.org/10.1590/S0066-782X2012005000057

Lorenzati, B., Zucco, C., Miglietta, S., Lamberti, F., & Bruno, G. (2010). Oral hypoglycemic drugs: pathophysiological basis of their mechanism of action. *Pharmaceuticals* (Basel, Switzerland), 3(9): 3005–3020. https://doi.org/10.3390/ph3093005

Lytle, B. W., Cosgrove, D. M., Gill, C. C., Stewart, R. W., Golding, L. A. R., Goormastic, M., *et al*. (1985). Mitral valve replacement combined with myocardial revasculatization : early and late results for 300 patients, 1970 to 1983. *Circulation*, 71(6): 1179-1190

Ma, X., Wang, Y., Shan, L., Cang, Z., Gu, C., Qu, N., *et al*., (2017). Validation of SinoSCORE for isolated CABG operation in East China. *Sci Rep*, 7. https://doi.org/10.1038/s41598-017-16925-x

Mannacio, V., Di Tommaso, L., De Amicis, V., Lucchetti V., Pepino, P., Musumeci, F., *et al*. (2012). Previous percutaneous coronary interventions increase mortality and morbidity after coronary surgery. *Ann Thorac Surg.*, 93(6): 1956-1962. doi: 10.1016/j.athoracsur.2012.02.067

Mariscalco, G., Rosato, S., Serraino, G. F., Maselli, D., Dalen, M., Airaksinen, J. K. E. (2018). Prior percutaneous coronary intervention and mortality in patients undergoing surgical myocardial revascularization. *Circulation*: *Cardiovasc Interventions*, 11(2). https://doi.org/10.1161/CIRCINTERVENTIONINTERVENTIONS.117.005650

Mariscalco, G., Wozniak, M. J., Dawson, A. G., Serraino, G. F., Porter, R., Nath, M., Klersy, C., Kuar, T., Murphy, G. (2016). Body mass index and mortality among adults undergoing cardiac surgery. *Circulation*, 135: 850-863.

Marso, S. P. (2018). Revascularization approaches. *Chronic Coronary Artery Disease*, 337–354.

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Marwali, E.M., Lopolisa, A., Sani, A.A., Rayhan, M., Roebiono, P.S., Fakhri, D., *et al*. (2022). Indonesian study: triiodothyronine for infants less than 5 months undergoing cardiopulmonary bypass. *Pediatr Cardiol*, 43(4): 726-734

Maslow, A. D., Regan, M. M., Panzica, P., Heindel, S., Mashikian, J., Comulae, M. E., (2002). Precardiopulmonary bypass right ventricular function is associated with poor outcome after coronary artery bypass grafting in patients with severe left ventricular systolic dysfunction, *Anesth Analg*, 95: 1507-1518

Massad, M. G., Prasad, S. M., Chedrawy, E. G., & Lele, H. (2008). A perspective on the surgical management of congestive heart failure. *World J of Surg*, 32(3): 375–380. https://doi.org/10.1007/s00268-007-9417-4

Massoudy, P.,Thielmann, M., Lehmann, N., Marr, A., Kleikamp, G., Maleszka, A., *et al*. (2009). Impact of prior percutaneous coronary intervention on outcome of coronary artery bypass surgery: a multicenter analysis. *J Thorac Cardiovasc Surg*, 137(4): 840-5. doi: 10.1016/j.jtcvsberbanding.2008.09.005

Mazzeffi, M., Zivot, J., Buchman, T., & Halkos, M., (2014). In-hospital mortality after cardiac surgery: patient characteristics, timing, and association with postoperative length of intensive care unit and hospital stay. *Ann. Thorac. Surg.* 97: 1220–1225. https://doi.org/10.1016/j.athoracsur.2013.10.040

McAuley, P. A., Blair, S. N. (2011). Obesity paradoxes. *J Sports Sci*, 29: 773–782.

Medvedofsky, D., Aronson, D., Gomberg-Maitland, M., Thomeas, V., Rich, S., Spencer, K., *et al*. (2017). Tricuspid regurgitation preogression and regression in pulmonary arterial hypertension: Implications for right ventricular and tricuspid valve apparatus geometry and patients outcome. *Eur Heart J*, 18: 86-94.

Mehta, G. S., LaPar, D. J., Bhamidipati, C. M., Kern, J. A., Kron, I. L., Upchurch, G. R., Ailawadi, G. (2012). Previous percutaneous coronary intervention increases morbidity after coronary artery bypass graft. *Surg*, 152: 5–11. doi: 10.1016/j.surg.2012.02.013

Mehta, S. R. (2005). Effect of glucose-insulin-pottasium infusion on mortality in patients with acute ST segment elevation myocardial infarction: the CREATE-ECLA randomized controlled trial. *The J Am Med Assoc*, 293(4): 437-446.

Meier, J. J., Deifuss, S., Klamann, A., Launhardt, V., Schmiegel, W. H., Nauck, M.A. (2005). Plasma glucose at hospital admission and previous metabolic control determine myocardial infarct size and survival in patients with and without type 2 diabetes: The Langendreer Myocardial Infarction and Blood Glucose in Diabetic Patients Assessment (LAMBDA). *Diabetes Care*, 28(10): 2551–2553.

Miceli, A., Fiorani, B., Danesi, T. H., Melina, G., Sinatra R. (2009). Prophylactic intra-aortic balloon pump in high-risk patients undergoing coronary artery bypass graft : a propensity score analysis. *Interact Cardiovasc and Thorac Surg*, 9: 291-295, doi : 10.1510/ictvsberbanding.2008.196105

Miceli, A., Romeo, F., Glauber, M., de Siena, P.M., Caputo, M., & Angelini, G.D. (2014). Preoperative anemia increases mortality and postoperative morbidity after cardiac surgery. *J Cardiothorac Surg*, 9. https://doi.org/10.1186/1749-8090-9-137

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Michalopoulos, A., Tzelepis, G., Dafni, U., & Geroulanos, S. (1999). Determinants of hospital mortality after coronary artery bypass grafting. *Chest*, 115(6): 1598–1603. https://doi.org/10.1378/chest.115.6.1598

Miguel Sousa-Uva, Stuart J Head, Milan Milojevic, Jean-Philippe Collet, Giovanni Landoni, Manuel Castella, Joel Dunning, Tómas Gudbjartsson, Nick J Linker, Elena Sandoval, Matthias Thielmann, Anders Jeppsson, Ulf Landmesser. (2017). EACTS Guidelines on perioperative medication in adult cardiac surgery, *Eur J of Cardio-Thoracic Surg*, 53(1): 5–33. https://doi.org/10.1093/ejcts/ezx314

Miguel, G.S.V., Sousa, A.G., Silva, G.S., Colosimo, F.C., Stolf, N.A.G., (2020). Does prior percutaneous coronary intervention influence the outcomes of coronary artery bypass surgery. *Braz J Cardiovasc Surg*, 35(1). https://doi.org/10.21470/1678-9741-2019-0234

Monami, M., Balzi, D., Lamanna, C., Barchielli, A., Masotti, G., Buiatti, E., Marchionni, N., & Mannucci, E. (2007). Are sulphonylureas all the same? A cohort study on cardiovascular and cancer-related mortality. *Diabetes/metabolism research and reviews*, 23(6): 479–484.

Morricone, L., Ranucci, M., Denti, S., Cazzaniga, A., Isgrò, G., Enrini, R., & Caviezel, F. (1999). Diabetes and complications after cardiac surgery: comparison with a non-diabetic population. *Acta diabetologica*, 36(1-2): 77–84. https://doi.org/10.1007/s005920050149

Mortasawi, A., Arnrich, B., Rosendahl, U., Frerichs, I., Albert, A., Walter, J., Ennker, J. (2002). Is age an independent determinant of mortality in cardiac surgery as suggests by the EuroSCORE. *BioMed Central Surg*, 2(8): 1-8.

Moutakiallah, Y., Boulahya, A., Seghrouchni, A., Mounir, R., Atmani, N., Drissi, M. (2019). Coronary artery bypass surgery in type 2 diabetic patients: Predictors of mortality and morbidity. *The Cardiothoracic Surgeon,* 27: 6, https://doi.org/10.1186/s43057-019-0009-5.

Mullen, M.G., Michaels, A.D., Mehaffey, J.H., Guidry, C.A.; Turrentine, F.E., Hedrick, T.L., Friel, C.M. (2017). Risk associated with complications and mortality after urgent surgery vs elective and emergency surgery. *JAMA Surg*, doi: 10.1001/JAMAsurg.2017.0918

Musa, A.F., Cheong, X.P., Dillon, J., & Nordin, R.B. (2018). Validation of EuroSCORE II in patients undergoing coronary artery bypass grafting (CABG) surgery at the National Heart Institute, Kuala Lumpur: a retrospective review. *F1000Research*. 7: 534. https://doi.org/10.12688/f1000research.14760.1

Mustika, A. (2018). *Validasi European System For Cardiac Operative Risk Evaluation (EuroSCORE) II sebagai prediktor terjadinya morbiditas mayor* pascaoperasi *bedah jantung (kelainan katup dan kongenital) di RSUP Dr. Sardjito.* Universitas Gadjah Mada, Yogyakarta.

Nakamura, K., Hamasaki, A., Uchida, T., Kobayashi, K., Sho, R., Kim C. (2019). The use of prophylactic intra-aortic balloon pump in high-risk patients undergoing coronary artery bypass graft. *PLos ONE*, 14(10): 1-10, https://doi.org/10.1361/J.pone.224273

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Nakasuji, M., Matsushita, M., Asada, A. (2005). Risk factors for prolonged ICU stay in patients following coronary artery bypass grafting with a long duration of cardiopulmonary bypass. *J Anesth*, 19: 118-123

Nashef, S.A.M., Roques, F., Sharples, L.D., Nilsson, J., Smith, C., Goldstone, A.R., *et al*., (2012). EuroSCORE II. *Eur J Cardiothorac Surg*, 41: 734–744; discussion 744-745. https://doi.org/10.1093/ejcts/ezs043

Nazer, R.I., & Alburikan, K.A. (2017). Metformin is not associated with lactic acidosis in patients with diabetes undergoing coronary artery bypass graft surgery: a case control study. *BMC pharmacology & toxicology*, 18(1): 38. https://doi.org/10.1186/s40360-017-0145-6

Ngaage, D. L., Cowen, M. E., Cale, A. R. (2009). Cardiopulmonary bypass and left ventricular systolic dysfunction impacts operative mortality differently in elderly and young patients. *Eur J of Cardio-thoracic Surg*, 35(2): 235-240.

Ngaage, D.L., Schaff, H.V., Barnes, S.A., Sundt, T.M., Mullany, C.J., Dearani, J.A., *et al*. (2006). Prognostic implications of preoperative atrial fibrillation in patients undergoing aortic valve replacement: Is there an argument for concomitant arrhythmia surgery? *Ann Thorac Surg.* 82: 1392–1399. https://doi.org/10.1016/j.athoracsur.2006.04.004

Nilsson, J., Algotsson, L., Höglund, P., Lührs, C., & Brandt, J. (2006). Comparison of 19 pre-operative risk stratification models in open-heart surgery. *Eur. Heart J*. 27: 867–874. https://doi.org/10.1093/eurheartj/ehi720

Nissinen, J., Biancari, F., Wistbacka, J.O. (2009). Safe time limits of aortic cross-clamping and cardiopulmonary bypass in adult cardiac surgery. *Perfusion*, 24(5): 297-305. doi: 10.1177/0267659109354656

Niwa, K., Perloff, J.K., Bhuta, S.M., Laks, H., Drinkwater, D.C., Child, J.S., *et al*. (2001). Structural abnormalities of great arterial walls in congenital heart disease: light and electron microscopic analyses. *Circulation*, 103: 393–400. doi: 10.1161/01.CIR.103.3.393

O'Brien, S.M., Feng, L., He, X., (2018). The Society of Thoracic Surgeons 2018: Adult cardiac surgery risk models: Part 2 statistical methods and results. *Ann Thorac Surg*, 105: 1419-28

Oechslin, E., Kiowski, W., Schindler, R., Bernheim, A., Julius, B., La Rocca, H.P. B.L. (2005). Systemic endothelial dysfunction in adults with cyanotic congenital heart disease. *Circulation*, 112: 1106-1112

Ogawa, S., Ishiki, M., Nako, K., Okamura, M., Senda, M., Mori, T., Ito, S., (2011). Sitagliptin, a dipeptidyl peptidase-4 inhibitor, decreases systolic blood pressure in japanese hypertensive patients with type 2 diabetes, *J-Stage*, 223(2): 133-135

Ogundimu, E.A.D.C.G., 2016. Adequate sample size for developing prediction models is not simply related to events per variable. *J of Clin Epidemiol*, 76: 175-182.

Padmanabhan, H., Aktuerk, D., Brookes, M.J., Nevill, A.M., Ng, A., Cotton, J., *et al*. (2016). Anemia in cardiac surgery: next target for mortality and morbidity improvement? *Asian Cardiovasc Thorac Ann*, 24(1): 12–7.

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Padmanabhan, H., Siau, K., Curtis, J., Ng, A., Menon, S., Luckraz, H., *et al*. (2019). Preoperative anemia and outcomes in cardiovascular surgery: systematic review and meta-analysis. *The Ann of Thorac Surg*, 108(6): 1840–8.

Palanzo, D.A. (2005). Perfusion safety: Defining the problem. *Perfusion*, 20: 195-203

Palazzuoli, A., Ceccarelli, E., Ruocco, G., & Nuti, R. (2018). Clinical impact of oral antidiabetic medications in heart failure patients. *Heart Failure Reviews*, 23(3): 325–335. https://doi.org/10.1007/s10741-018-9669-0

Parsonnet, V., Dean, D., & Bernstein, A.D. (1989). A method of uniform stratification of risk for evaluating the results of surgery in acquired adult heart disease. *Circulation,* 79: I3-12.

Patra, C., Chamaiah G.P., & Panigrahi, A. (2019). Morbidity after cardiac surgery under cardiopulmonary bypass and associated factors: A retrospective observational study. *Indian heart J*, 71(4): 350–355. https://doi.org/10.1016/j.ihj.2019.07.004

Peduzzi, P., Concato, J., Kemper, E., Holford, T.R., & Feinstein, A.R., (1996). A simulation study of the number of events per variabel in logistik regression analysis. *J Clin Epidemiol.* 49: 1373–1379.

Pengpid, S., Pelzer, K. (2017). The Prevalence of BMI < 18,5, overweight/obesity and their related lifestyle factors in Indonesia 2014-2015. *Public Health,* 4(6): 633-649

Perkeni. (2019). *Pedoman Terapi Insulin pada Pasien Diabetes Mellitus*.

Pieri, M., Belletti, A., Monaco, F., Pisano, A., Musu, M., Dalessandro, V., *et al*., (2016). Outcome of cardiac surgery in patients with low preoperative ejection fraction. *BMC Anesthesiol*. 16: 97-103. https://doi.org/10.1186/s12871-016-0271-5

Pinna-Pintor, P., Bobbio, M., Colangelo, S., Veglia, F., Giammaria, M., Cuni, D., *et al*., (2002). Inaccuracy of four coronary surgery risk-adjusted models to predict mortality in individual patients. *Eur J Cardiothorac Surg*. 21: 199–204.

Pinzani, A., Pinzani, V., Ninet, J., Milon, H., Delahaye, J.P. (1993). Pre- and postoperative right cardiac insufficiency in patients with mitral or mitral-aortic valve diseases. *Arch Mal Coeur Vaiss*, 86: 27–34

Pitkänen, O., Niskanen, M., Rehnberg, S., Hippeläinen, M., & Hynynen, M., (2000). Intra-institutional prediction of outcome after cardiac surgery: comparison between a locally derived model and the EuroSCORE. *Eur. J. Cardio-Thorac. Surg*. 18: 703–710.

Pliam, M.B., Zapolanski, A., Anastassiou, P., Ryan, C.J., Manila, L.L., Shaw, R.E., *et al*. (2007). Influence of prior coronary stenting on the immediate and mid-term outcome of isolated coronary artery bypass surgery. *Innovations (Phila)*, 2(5): 217-25. doi: 10.1097/IMI.0b013e31815bdbc1

Ponomarev, D., Kamenskaya, O., Klinkova, A., Loginova, I., Vedernikov, P., Kornilov, I., … Karaskov, A. (2017). Chronic lung disease and mortality after cardiac surgery: A prospective cohort study. *J of Cardiothorac and Vascular Anesthesia*. doi: 10.1053/j.jvca.2017.12.016

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Pons, J.M.V., Espinas, J.A., Borras, J.M., Moreno, V., Martin, I., & Granados, A. (1998). Cardiac surgical mortality: comparison among different additive risk-scoring models in a multicenter sample. *Arch. Surg*. 133. https://doi.org/10.1001/archsurg.133.10.1053

Pramodana, B. (2016). *Kesahihan EuroSCORE II Sebagai Prediktor Mortalitas Pascabedah Jantung di RSCM*. Universitas Indonesia, Jakarta.

Preiser, J., Provenzano, B., Mongkolpun, W., Halenarova, K., Cnop, M. (2020). Perioperative management of oral glucose-lowering drugs in the patient with type 2 diabetes. *Anesthesiology*, 133: 430–438 doi: https://doi.org/10.1097/ALN.0000000000003237

Price, S., Jaggar, S.I., Jordan, S., Trenfield, S., Khan, M., Shore, D., Evans, T.W. (2007). Adult congenital heart disease: intensive care management and outcome prediction. *Intensive Care Med*, 33(4): 652-659.

Prins, C., de Villiers Jonker, I., Botes, L., & Smit, F.E., (2012). Cardiac surgery risk-stratification models. *Cardiovasc J Afr*. 23: 160–164. https://doi.org/10.5830/CVJA-2011-047

Puruhito. (2013). *Buku Ajar Primer: Ilmu Bedah Toraks, Kardiak, dan Vaskuler*. Surabaya: Airlangga University Press, 247-248

Putman, L.M., Van Gameren, M., Meijboom, F.J., de Long, P.L., Ross-Hesselink, J.W., Witsenburg, M., *et al*. (2009). Seventeen years of adult congenital heart surgery: a single centre experience. *Eur J of Cardiothorac Surg*, 36(1): 96-104.

Quader, M.A., McCarthy, P.M., Gillinov, A.M., Alster, J.M., Cosgrove, D.M., Lytle, B.W., *et al*., (2004). Does preoperative atrial fibrillation reduce survival after coronary artery bypass grafting? *Ann Thorac Surg*, 77: 1514–1522; discussion 1522-1524. https://doi.org/10.1016/j.athoracsur.2003.09.069

Quinn, D.W., Pagano, D., Bonser, R.S., Rooney, S.J., Graham, T.R., Wilson, I.C., *et al*. (2006). Improved myocardial protection during coronary artery surgery with glucose-insulin-potassium: a randomized controlled trial. *J of Thoracic and Cardiovasc Surg*, 131(1): 34–42.

Rabbani, M.S., Qadir, I., Ahmed, Y., Gul, M., & Sharif, H., (2014). Heart valve surgery: EuroSCORE berbanding. EuroSCORE II berbanding. Society of Thoracic Surgeons score. *Heart Int*, 9: 53–58. https://doi.org/10.5301/heartint.5000214

Raffa, G., Agnello, F., Occhipinti, G., Miraglia, R., Lo Re, V., Marrone, G., Tuzzolino, F., Arcadipane, A., Pilato, M. Luca, A. (2019). Neurological complications after cardiac surgery: a retrospective case-control study of risk factors and outcome. *J Cardiothorac Surg*, 14: 23. https://doi.org/10.1186/s13019-019-0844-8

Rahman, F.A. (2016). *Validasi EuroSCORE II sebagai predictor mortalitas pasien* pascaoperasi *jantung (kelainan katup dan kongenital) di RSUP Dr Sardjito*. Yogyakarta: Universitas Gadjah Mada

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Ranucci, M., Biagioli, B., Scolletta, S., Grillone, G., Cazzaniga, A., Cattabriga, I., Isgrò, G., Giomarelli, P. (2006). Lowest hematocrit on cardiopulmonary bypass impairs the outcome in coronary surgery; an Italian Multicenter Study from the National Cardioanesthesia Database. *Tex Heart Inst J*, 33: 300-305.

Ranucci, M., Di Dedda, U., Castelvecchio, S., Menicanti, L., Frigiola, A., Pelissero, G. (2012). Impact of preoperative anemia on outcome in adult cardiac surgery: a propensity-matched analysis. *Ann. Thorac. Surg*, 94: 1134–1141. https://doi.org/10.1016/j.athoracsur.2012.04.042

Ranucci, M., Pavesi, M., Pistuddi, V., Baryshnikova, E. (2021). Preoperative anemia correction in cardiac surgery: a propensity-matched study. *J of Cardiothorac and Vasc Anesthesia*, 35(3): 874–81.

Reichert, H.A., Rath, T. E. (2017). Cardiac surgery in developing countries. *J Extra Corpor Technol*, 49(2): 98-106.

Riley, R.D., Ensor, J., Snell, K.I.E., Harrell, F.E., Martin, G.P., Reitsma, J.B., Moons, K.G.M., Collins, G., van Smeden, M. (2020). Calculating the sample size required for developing a clinical prediction model. *BMJ*

Rios, R., Miller, R., Hu, L. H., Otaki, Y., Singh, A., Diniz, M., Sharir, T., Einstein, A. J., Fish, M. B., Ruddy, T. D., Kaufmann, P. A., Sinusas, A. J., Miller, E. J., Bateman, T. M., Dorbala, S., DiCarli, M., Van Kriekinge, S., Kavanagh, P., Parekh, T., Liang, J. X., Slomka, P. (2022). Determining a minimum set of variables for machine learning cardiovascular event prediction: results from REFINE SPECT registry. *Cardiovascular Research*, 118(9): 2152–2164. https://doi.org/10.1093/cvr/cvab236

Rodríguez-Capitán, J., Becerra-Muñoz, V. M., Pérez-Villardón, B., Sánchez-Espín, G., Such-Martínez, M., Flores-Marín, A., Fernández-Pérez, I., García-Bellón, A., Porras-Martín, C., Mataró-López, M. J., Melero-Tejedor, J. M., Rodríguez-Caulo, E., Otero-Forero, J. J., Cordero-Aguilar, A., López-Salguero, R., Gómez-Doblas, J. J., & de Teresa-Galván, E. (2020). Clinical outcomes after tricuspid surgery : The role of previous cardiac surgery. Klinische Ergebnisse nach Tricuspidalklappenoperationen : Bedeutung früherer Herzoperationen. *Herz*, 45(6): 586–593. https://doi.org/10.1007/s00059-018-4761-8

Roger, V. L. (2013). Epidemiology of heart failure. *Circulation Research*, 113(6): 646–659. https://doi.org/10.1161/CIRCRESAHA.113.300268

Roques, F., Michel, P., Goldstone, A.R., Nashef, S. a. M., (2003). The logistic EuroSCORE. *Eur Heart J*, 24: 881–882.

Roques, F., Nashef, S.A., Michel, P., Gauducheau, E., de Vincentiis, C., Baudet, E., Cortina, J., David, M., Faichney, A., Gabrielle, F., Gams, E., Harjula, A., Jones, M.T., Pintor, P.P., Salamon, R., Thulin, L. (1999). Risk factors and outcome in European cardiac surgery: analysis of the EuroSCORE multinational database of 19030 patients. *Eur J Cardiothorac Surg*, 15: 816–822; discussion 822-823.

Rumah Sakit Jantung dan Pembuluh Darah Harapan Kita. (2017). *Laporan tahunan badan layanan umum rumah sakit jantung dan pembuluh darah harapan kita tahun 2016*.

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Sabatine, M.S., Morrow, D.A., Giugliano, R.P., Burton, P.B., Murphy, S.A., McCabe, C.H., Gibson, C.M., Braunwald, E. (2005). Association of hemoglobin levels with clinical outcomes in acute coronary syndromes. *Circulation,* 111: 2042-2049.

Sakaguchi, G., Shimamoto, T., Komiya, T. (2011). Impact of repeated percutaneous coronary intervention on long-term survival after subsequent coronary artery bypass surgery. *J of Cardiothorac Surg*, 6: 107. doi: 10.1186/1749- 8090-6-107

Sakornpant, P., Kojaranjit, V. (2014). *First nasional congenital cardiac surgical database report*. Bangkok: The Society of Thoracic Surgeons of Thailand

Sakornpant, P., Kojaranjit V. (2014). First National Congenital Cardiac Surgical Database Report: Demonstrating "Practice of Congenital Cardiac Surgery in Thailand: Analysis of Performance and Outcome". Bangkok, Thailand: *The Society of Thoracic Surgeons of Thailand*.

Sarkar, S.K., Midi, H., Rana, S. (2011). Detection of outliers and influential observations in binary logistic regression: An empirical study. *J of Applied Sci*, 11(1): 26-35

Schopper, M., Irnich, D. (2012). Gender and its implications for cardiothoracic perioperative care and anesthesia. *Thorac Cardiovasc Surg,* 61: 007–014. https://doi.org/10.1055/s-0032-1331038

Schwartz, J.P., Bakhos, M., Patel, A., Botkin, S., Neragi-Miandoab, S. (2008). Repair of aortic arch and the impact of cross-clamping time, New York Heart Association stage, circulatory arrest time, and age on operative outcome. *Interactive Cardiovasc and Thorac Surg*, 7(3): 425-429. doi: 10.1510/icvts.2007.164871

Seese, L., Sultan, I., Gleason, T., Wang, Y., Thoma, F., Navid, F., Kilic, A. (2020). Outcomes of conventional cardiac surgery in patients with severely reduce ejection fraction in the modern era. *Ann Thorac Surg*, 109: 1409-18.

Sembiring, Y., Ginting, A., Puruhito, Budiono. (2021). Validation of EuroSCORE II to predict mortality in post-cardiac surgery patients in East Java tertiary hospital. *Medical Journal of Indonesia*, 30(1): 54-9.

Senni, M., Tribouilloy, C.M., Rodeheffer, R.J., Jacobsen, S.J., Evans, J.M., Bailey, K.R., Redfield, M.M. (1998). Congestive heart failure in the community. *Circulation*, 98: 2282–2289.

Sepehripour, A.H., Lo, T.T., McCormack, D.J., Shipolini, A.R. (2012). Is there benefit in smoking cessation prior to cardiac surgery*? Interact Cardiovasc and Thoracic Surg*, 15(4): 726–732. doi: 10.1093/icvts/ivs177

Shahian, D.M, Jacobs, J.P., Badhwar, V., Kurlansky, P.A., Furnary, A.P., Cleveland, J.C., Lobdell, K.W., Vassileva, C., Wyler von Ballmoos, M.C., Thourani, V.H., Edgerton, J.R., D'Agostino, R.S., Desai, N.D., Feng, L., He, X., O'Brian, S.M. (2018). The Society of Thoracic Surgeons 2018 Adult cardiac risk models: Part 1 background, design considerations, and model development. *The Society of Thoracic Surgeons*

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Siregar, S., Groenwold, R.H.H., de Mol, B.A.J.M., Speekenbrink, R.G.H., Versteegh, M.I.M., Brandon Bravo Bruinsma, G.J., *et al*., (2013). Evaluation of cardiac surgery mortality rates: 30-day mortality or longer follow-up? *Eur. J. Cardiothorac. Surg*., 44: 875–883. https://doi.org/10.1093/ejcts/ezt119

Spinner, E.M., Lerakis, S., Higginson, J., Pernetz, M., Howell, S., Veledar, E., Yoganathan, A.P. (2012). Correlates of tricuspid regurgitation regurgitation as determined by 3D echocardiography: pulmonary arterial pressure, ventricle geometry, annular dilatation, and papillary muscle displacement. *Circ Cardiovasc Imaging*, 5: 43-50.

Srilata, M., Padhy, N., Padmaja, D., Gopinath, R. (2015). Does Parsonnet scoring model predict mortality following adult cardiac surgery in India?. *Annals of cardiac anaesthesia*, 18(2): 161–169. https://doi.org/10.4103/0971-9784.154468

Ssentongo, P., Ssentongo, A.E., Ba, D.M., Ericson, J.E., Na, M., Gao, X., Fronterre, C., Chinchilli, V.M., Schiff, S.J. (2021). Global, regional and national epidemiology and prevalence of child stunting, wasting and BMI < 18,5 in low and middle income countries 2006-2018. *Open Access*, 11: 5204

Stamou, S.C., Nussbaum, M., Stiegel, R.M., Reames, M.K., Skipper, E.R., Robicsek, F., Lobdell, K.W. (2011). Effect of body mass index on outcomes after cardiac surgery: is there an obesity paradox? *Ann Thorac Surg*, 91: 42–47.

Stevens, L.-M., Khairy, P., Agnihotri, A. K. (2010). Coronary artery bypass grafting after recent or remote percutaneous coronary intervention in the Commonwealth of Massachusetts. *Circulation: Cardiovascular Interventions*, 3(5): 460–467. doi: 10.1161/circinterventions.109

Steyerberg, E.W., Harrell, F.E., Borsboom, G.J.J., Erjkemans, M.J.C., Yergouwe, Y., Habbema, J.D.F. (2001). Internal validation of predictive models: Efficiency of some procedures for logistic regression analysis. *J of Clin Epid*, 54: 774-781

Sullivan, P.G., Wallach, J.D., Ioannidis, J.P.A. (2016). Meta-analysis comparing established risk prediction models (EuroSCORE II, STS Score, and ACEF Score) for perioperative mortality during cardiac surgery. *Am J Cardiol*, 118: 1574–1582. https://doi.org/10.1016/j.amjcard.2016.08.024

Surgenor, S.D., O'Connor, G.T., Lahey, S.J., Quinn, R., Charlesworth, D.C., Dacey, L.J., Clough, R., Leavitt, B., Defoe, G., Fillinger, M., Nugent, W. C. (2001). Predicting the risk of death from heart failure after coronary artery bypass graft surgery. *Anesthesia & Analgesia*, 92(3): 596–601. doi: 10.1097/00000539-200103000-00008

Suwa, Y., Miyasaka, Y., Taniguchi, N., Harada, S., Nakai, E., Shiojima, I. (2020). Predictors of in-hospital mortality in patients with infective endocarditis. *Acta Cardiologica, 1–8.* doi: 10.1080/00015385.2020.1767368

Syrakas, C.A., Neumaier-Prauser, P., Angelis, I., Kiask, T., Kemkes, B.M., Gansera, B. (2007). Is extreme obesity a risk factor for increased in-hospital mortality and postoperative morbidity after cardiac surgery? Results of 2251 obese patients with BMI of 30 to 50. *Thorac Cardiovasc Surg*, 55: 491–493.

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Székely, A., Levin, J., Miao, Y., Tudor, I. C., Vuylsteke, A., Ofner, P., Mangano, D. T. (2011). Impact of hyperglycemia on perioperative mortality after coronary artery bypass graft. *J of Thoracic and Cardiovasc Surg*, 142(2): 430–437.

Szylińska, A., Kotfis, K., Listewnik, M., Brykczyński, M., Marra, A., Rotter, I. (2020). The burden of chronic obstructive pulmonary disease in open heart surgery-a retrospective cohort analysis of postoperative complications: STROBE compliant. *Medicine*, 99(13): e19675. https://doi.org/10.1097/MD.0000000000019675

Te Velthuis, H., Jansen, P. G., Oudemans-van Straaten, H. M., Sturk, A.,Eijsman, L., Wildevuur, C. R. (1995). Myocardial performance in elderly patients after cardiopulmonary bypass is suppressed by tumor necrosis factor. *J Thorac Cardiovasc Surg*, 110(6): 1663—9.

Thakar, C. V., Worley, S., Arrigain, S., Yared, J. P., Paganini, E. P. (2005). Influence of renal dysfunction on mortality after cardiac surgery : modifying effect of preoperative renal function. *Kidney International*, 67: 1112-1119.

Thalji, N.M., Suri, R.M., Greason, K.L., Schaff, H.V. (2014). Risk assessment methods for cardiac surgery and intervention. *Nat Rev Cardiol*, 11: 704–714. https://doi.org/10.1038/nrcardio.2014.136

The Society of Thoracic Surgeons. (2018). *Online STS Adult Cardiac Surgery Risk Calculator: New Version (4.20)*. Available from: https://riskcalc.sts.org/stswebriskcalc/calculate [Accessed 2 June 2022]

Theologgou, T., Bashir, M., Rengarajan, A., Khan, O., Spyt, T., Richens, D., Field, M. (2011). Preoperative intra aortic balloon pumps in patients undergoing coronary artery bypass graft. *Cochrane Database Syst Review*, 1: 1-28. doi: 10.1002/14651858.CD004472.pub3

Thielmann, M., Neuhäuser, M., Knipp, S., Kottenberg-Assenmacher, E., Marr, A., Pizanis, N., Hartmann, M., Kamler, M., Massoudy, P. Jakob, H. (2007). Prognostic impact of previous percutaneous coronary intervention in patients with diabetes mellitus and triple-vessel disease undergoing coronary artery bypass surgery. *J of Thoracic and Cardiovasc Surg*, 134(2): 470-476. doi: 10.1016/j.jtcvs.2007.04.019

Thielmann, M., Leyh, R., Massoudy, P., Neuhäuser, M., Aleksic, I., Kamler, M., Herold, U., Piotrowski, J., Jakob, H. (2006). Prognostic significance of multiple previous percutaneous coronary interventions in patients undergoing elective coronary artery bypass surgery. *Circulation*, 114(1): I441-7. doi: 10.1161/ *CIRCULATION*AHA.105.001024

Toll, D.B., Janssen, K.J.M., Vergouwe, Y., Moons, K.G.M. (2008). Validation, updating and impact of clinical prediction rules: a review. *J Clin Epidemiol.*, 61: 1085–1094. https://doi.org/10.1016/j.jclinepi.2008.04.008

Topilsky, Y., Khanna, A., Le Tourneau, T., Park, S., Michelena, H., Suri, R., Mahoney, D.W., Enriquez-Sarano, M. (2012). Clinical context and mechanism of functional tricuspid regurgitation in patients with and without pulmonary hypertension. *Circ Cardiovasc Imaging*, 5: 314-23.

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Topkara, V. K., Cheema, F. H., Kesavaramunajam, S., Mercanado, M. L., Cheema, A. F., Namerow, P. B. (2005). Coronary artery bypass graft in patients with low ejection fraction, *Circulation*, 112: 344-350.

Towheed, A., Sabbagh, E., Gupta, R., Assiri, S., Chowdhury, M. A., Moukarbel, G. V., Khuder, S.A., Schwann, T.A., Bonnell, M.R., Cooper, C.J., Khouri, S. (2021). Right ventricular dysfunction and short-term outcomes following left sided valvular surgery: An echocardiographic study. *J of Am Heart Assoc*, 10(4): 1-11, e016283.

Tran, H.A., Barnett, S.D., Hunt, S.L., Chon, A., Ad, N. (2009). The effect of previous coronary artery stentstenting on short- and intermediate-term outcome after surgical revascularization in patients with diabetes mellitus. *J Thorac Cardiovasc Surg*, 138(2): 316-23. doi: 10.1016/j.jtcvs.2009.03.004

Tzamalis, P., Herzberger, V., Bergmann, J. (2019). The association of diabetes mellitus treated with oral antidiabetic drugs and insulin with mortality after transcatheter valve implantation: a 3-year follow-up of the TAVIK registry. *Cardiovasc Diabetol*, 18: 63. https://doi.org/10.1186/s12933-019-0873-6

Van den Brule, J.M.D., Noyez, L., Verheugt, F.W.A. (2004). Risk of coronary surgery for hospital and early morbidity and mortality after initially successful percutaneous intervention. *Interact Cardiovasc and Thorac Surg*, 4: 96-100, doi: 10.1510/icvts.2004.093104

Vassileva, C.M., Telila, T., Markwell, S., Hazelrigg, S. (2015). Magnitude of negative impact of preoperative heart failure on mortality during aortic valve replacement in the Medicare population. *The Ann of Thoracic Surg*, 99(5): 1503–1510. doi: 10.1016/j.athoracsur.2014.12

Vida, V.L., Berggren, H., Brawn, W.J., Daenen, W., DiCarlo, D., Di Donato, R., Lindberg, H.L., Corno, A.F., Fragata, J., Elliott, M.J., Hraska, V., Kiraly, L., Lacour-Gayet, F., Maruszewski, B., Rubay, J., Sairanen, H., Sarris, G., Urban, A., Van Doorn, C., Ziemer, G., Stellin, G. (2007). Risk of surgery for congenital heart disease in the adult : A multicentered European study. *Ann Thorac Surg*, 83: 161-8.

Vida, V.L., Zanotto, L., Triglia, L.T., Zanotto, L., Maruszewski, B., Tobota, Z., Bertelli, F., Cattapan, C., Ebels, T., Bottigliengo, D., Gregori, D., Sarris, G., Horer, J., Stellin, G., Padalino, M.A., Di Salvo, G. (2020). Surgery for adult patients with congenital heart disease: Results from the European database. *J Clin Med*., 9(8): 2493.

Vijayaraghavan, M., Prins, K.W., Prisco, S.Z., Duval, S., John, R., Archer, S.L., Weir, E.K., Voeller, R., Shaffer, A.W., Thenappan, T. (2020). Hemodynamic characteristics and outcomes of pulmonary hypertension in patients undergoing tricuspid valve repair or replacement. *CJC open*, 3(4): 488–497. https://doi.org/10.1016/j.cjco.2020.12.008

Volkmann, M.A., Behr, P.E., Burmeister, J.E., Consoni, P.R., Kalil, R.A., Prates, P.R., Nesralla, I.A., Sant'Anna, J.R. (2011). Hidden renal dysfunction causes increased in-hospital mortality risk after coronary artery bypass graft. *Rev Bras Cir Cardiovasc*., 26(3): 319–25.

UNIVERSITAS GADJAH MADA
Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Wang, C., Tang, Y., Zhang, J., Bai, Y., Yu, Y., Zhang, G., Han, L. (2016). Comparison of four risk scores for in-hospital mortality in patients undergoing heart valve surgery: A multicenter study in a Chinese population. *Heart Lung J. Acute Crit. Care*, 45: 423–428. https://doi.org/10.1016/j.hrtlng.2016.06.002

Wang, T.K.M., Choi, D.H.M., Stewart, R., Gamble, G., Haydock, D., Ruygrok, P., (2015). Comparison of four contemporary risk models at predicting mortality after aortic valve replacement. *J. Thorac. Cardiovasc. Surg*., 149: 443–448. https://doi.org/10.1016/j.jtcvsberbanding.2014.04.032

Wang, T.K.M., Ramanathan, T., Choi, D.H.M., Gamble, G., Ruygrok, P., (2014). Preoperative atrial fibrillation predicts mortality and morbidity after aortic valve replacement. *Interact Cardiovasc Thorac Surg*., 19: 218–222. https://doi.org/10.1093/icvts/ivu128

Wang, W., Bagshaw, S. M., Norris, C. M., Zibdawi, R., Zibdawi, M., MacArthur, R. (2014). Association between older age and outcome after cardiac surgery: a population-based cohort study. *J of Cardiothorac Surg*, 19(177): 1-9.

Webb, G.D. (2001). Care of adults with congenital heart diseases—a challenge for the new millenium. *Thorac Cardiovasc Surg*, 49: 30 – 4.

Wencker, D., Borer, J. S., Hochreiter, C., Devereux, R. B., Roman, M. J., Kligfield, P., Supino, P., Krieger, K., Isom, O.W. (2000). Preoperative predictors of late postoperative outcome among patients with nonischemic mitral regurgitation with 'high risk' descriptors and comparison with unoperated patients. *Cardiology*, 93: 37–42.

Whang, W., Bigger, T. (2000). Diabetes and outcomes of coronary artery bypass graft in patients with severe left ventricular dysfunction : Results from the CABG Patch Trial Database. *J Am Coll of Cardio*, 36(4): 1166-72.

WHO. (2022). *Hypertension*. World Health Organization. Available from: https://www.who.int/news-room/fact-sheets/detail/hypertension [Accessed 23 May 2022]

Widyastuti, Y., Boom, C.E., Parmana, I.A.M., Kurniawaty, J.,& Hanafy, D.A. (2016). EuroSCORE II for prediction of in-hospital mortality after open heart surgery in Indonesia. Presented at the *PCS 3rd world congress of cardiothoracic-renal disease*, Morocco.

Wiernsperger, N. (2015). Metformin as a cellular protector; a synoptic view of modern evidences. *J of Nephropharmacology*, 4(1): 31–36. https://doi.org/28197472

Wilby M.L. (2019). Physical mobility impairment and risk for cardiovascular disease. *Health equity*, 3(1): 527–531. https://doi.org/10.1089/heq.2019.0065

World Health Organization. (2019). *Prevalence of anemia among women*. Available from: https://data.worldbank.org. [Accessed 2 July 2022]

World Health Organization. (2022). Obessity Prevention and control noncommunicable disease. *WHO European Regional Obesity Report 2022*. Available from: https://apps.who.int [Accessed 2 July 2022]

Wu, W.C., Schifftner, T.L., Henderson, W.G., Eaton, C.B., Poses, R.M., Uttley, G., *et al.* (2007). Preoperative hematocrit levels and postoperative outcomes in older patients undergoing noncardiac surgery. *JAMA*, 297: 2481-2491.

Pengembangan Model Skor Baru sebagai Prediktor Mortalitas di dalam Rumah Sakit pada Pasien Bedah
Jantung Dewasa dan Perbandingan Performanya dengan EuroSCORE II: Penelitian Multisenter di Indonesia
JUNI KURNIAWATY, 1. Prof. Dr. dr. Budi Yuli Setianto, Sp.PD., K-KV., Sp.JP(K); Dr. dr. Supomo, Sp.B., Sp.BTKV(K
Universitas Gadjah Mada, 2022 | Diunduh dari http://etd.repository.ugm.ac.id/

Wynne-Jones, K., Jackson, M., Grotte, G., & Bridgewater, B. (2000). Limitations of the Parsonnet score for measuring risk stratified mortality in the north west of England, The North West Regional Cardiac Surgery Audit Steering Group. *Heart Br Card Soc*. 84: 71–78.

Xu, J., Yu, J., Xu, X., Shen, B., Wang, Y., Jiang, W., *et al*. (2019). Preoperative hidden renal dysfunction add an age dependent risk of progressive chronic kidney disease after cardiac surgery. *J of Cardiothorac Surg*, 14: 151-160.

Yamaoka, H., Kuwaki, K., Inaba, H., Yamamoto, T., Kato, T.S., Dohi, S., *et al*., (2016). Comparison of modern risk scores in predicting operative mortality for patients undergoing aortic valve replacement for aortic stenosis. *J. Cardiol*, 68: 135–140. https://doi.org/10.1016/j.jjcc.2015.08.017

Yap, C.H., Sposato, L., Akowuah, E., Theodore, S., Dinh, D.T., Shardey, G.C. (2009). Contemporary results show repeat coronary artery bypass graft remains a risk factor for operative mortality. *Ann Thorac Surg*, 87: 1386-91.

Zangrillo, A., Pappalardo, F., Dossi, R., Di Prima, A. L., Sassone, M.E., Greco, T., *et al*. (2015). Preoperative intra-aortic balloon pump to reduce mortality in coronary artery bypass graft artery bypass graft: A meta-analysis of randomized controlled trials. *Crit Care*, 19(1): 10-15.

Zapolanski, A., Mak, A.W.C., Ferrari, G., Johnson, C., Shaw, R.E., Brizzio, M.E. (2012). Impact of New York Heart Association classification, advanced age and patient-prosthesis mismatch on outcomes in aortic valve replacement surgery, *Interact Cardiovasc and Thorac Surg*, 15: 371-376

Zehender, M., Kasper, W., Kauder, E., Schonthaler, M., Geibel, A., Olschewski, M., Just, H. (1993). Right ventricular infarction as an independent predictor of prognosis after acute inferior myocardial infarction. *N Engl J Med*, 328: 981-988.

Zhang, G.X., Wang, C., Wang, L., Lu, F.L., Li, B.L., Han, L. (2013). Validation of EuroSCORE II in Chinese patients undergoing heart valve surgery. *Heart Lung Circ*, 22: 606–611. https://doi.org/10.1016/j.hlc.2012.12.012

Zhang, X., Zhang, W., Lou, H., Luo, C., Meng, Y., Wu, X., Zhang, M., Du, Q. (2021). Risk factors for prolonged intensive care unit stays in patients after cardiac surgery with cardiopulmonary bypass: A retrospective observational study. *Int J of Nursing Science*, 8: 388-93

Zindrou, D., Taylor, K. M, Bagger, J.P. (2002). Perioperative transfusion in anaemic patients undergoing coronary artery bypass. *The Lancet*, 360(9343): 1427-1428.

Zindrou, D., Taylor, K.M., Bagger, J.P. (2002). Preoperative haemoglobin concentration and mortality rate after coronary artery bypass surgery. *The Lancet*, 359(9319): 1747–8.