

Heart Research Institute Select Publications 2021



Authors	Title	Year	Source Title	DOI	Research Group
Agten, S.M. Watson, E.E. Ripoll-Rozada, J. Dowman, L.J. Wu, M.C.L. Alwis, I. Jackson, S.P. Pereira, P.J.B. Payne, R.J.	Potent Trivalent Inhibitors of Thrombin through Hybridization of Salivary Sulfopeptides from Hematophagous Arthropods	2021	Angewandte Chemie - International Edition	10.1002/anie.202015127	Thrombosis
Attard C, Monagle PT, d'Udekem Y, Mackay MT, Briody J, Cordina R, Hassan EB, Simm P, Rice K, Ignjatovic V	Long-term outcomes of warfarin versus aspirin after Fontan surgery	2021	The Journal of Thoracic and Cardiovascular Surgery	10.1016/j.jtcvs.2020.12.102	Clinical Research
Ayer, A. Fazakerley, D.J. Suarna, C. Maghzal, G.J. Sheipouri, D. Lee, K.J. Bradley, M.C. Fernández-del-Río, L. Tumanov, S. Kong, S.M. van der Veen, J.N. Yang, A. Ho, J.W.K. Clarke, S.G. James, D.E. Dawes, I.W. Vance, D.E. Clarke, C.F. Jacobs, R.L. Stocker, R.	Genetic screening reveals phospholipid metabolism as a key regulator of the biosynthesis of the redox-active lipid coenzyme Q	2021	Redox Biology	10.1016/j.redox.2021.102127	Arterial Inflammation and Redox Biology
Benjamin, E.J. Go, A.S. Desvigne-Nickens, P. Anderson, C.D. Casadei, B. Chen, L.Y. Crijs, H.J.G.M. Freedman, B. Hills, M.T. Healey, J.S. Kamel, H. Kim, D.-Y. Link, M.S. Lopes, R.D. Lubitz, S.A. McManus, D.D. Noseworthy, P.A. Perez, M.V. Piccini, J.P. Schnabel, R.B. Singer, D.E. Tieleman, R.G. Turakhia, M.P. Van Gelder, I.C. Cooper, L.S. Al-Khatib, S.M.	Research Priorities in Atrial Fibrillation Screening: A Report from a National Heart, Lung, and Blood Institute Virtual Workshop	2021	Circulation	10.1161/CIRCULATIONAHA.120.047633	Heart Rhythm and Stroke Prevention
Boriani, G. Palmisano, P. Malavasi, V.L. Fantecchi, E. Vitolo, M. Bonini, N. Imberti, J.F. Valenti, A.C. Schnabel, R.B. Freedman, B.	Clinical factors associated with atrial fibrillation detection on single-time point screening using a hand-held single-lead ECG device	2021	Journal of Clinical Medicine	10.3390/jcm10040729	Heart Rhythm and Stroke Prevention
Bortolussi, G. Shi, X. Bloemendaal, L.T. Banerjee, B. De Waart, D.R. Baj, G. Chen, W. Oude Elferink, R.P. Beuers, U. Paulusma, C.C. Stocker, R. Muro, A.F. Bosma, P.J.	Long-term effects of biliverdin reductase a deficiency in ugt1-/- mice: impact on redox status and metabolism	2021	Antioxidants	10.3390/antiox10122029	Arterial Inflammation and Redox Biology
Brieger, D. Freedman, B.	Decoding stroke risk scores in atrial fibrillation: Still more work to do	2021	European Heart Journal	10.1093/eurheartj/ehaa1111	Heart Rhythm and Stroke Prevention
Bubb, K.J. Harmer, J.A. Finemore, M. Aitken, S.J. Ali, Z.S. Billot, L. Chow, C. Golledge, J. Mister, R. Gray, M.P. Grieve, S.M. Hamburg, N. Keech, A.C. Patel, S. Puttaswamy, V. Figtree, G.A.	Protocol for the Stimulating β 3 -Adrenergic Receptors for Peripheral Artery Disease (STAR-PAD) trial: A double-blinded, randomised, placebo-controlled study evaluating the effects of mirabegron on functional performance in patients with peripheral arterial disease	2021	BMJ Open	10.1136/bmjopen-2021-049858	Coronary Disease
Bubb, K.J. Ravindran, D. Cartland, S.P. Finemore, M. Clayton, Z.E. Tsang, M. Tang, O. Kavurma, M.M. Patel, S. Figtree, G.A.	β 3 Adrenergic Receptor Stimulation Promotes Reperfusion in Ischemic Limbs in a Murine Diabetic Model	2021	Frontiers in Pharmacology	10.3389/fphar.2021.666334	Vascular Complications
Bubb, K.J. Tang, O. Gentile, C. Moosavi, S.M. Hansen, T. Liu, C.-C. Di Bartolo, B.A. Figtree, G.A.	FXD1 Is Protective against Vascular Dysfunction	2021	Hypertension	10.1161/HYPERTENSIONAHA.120.16884	Vascular Immunology
Cao JY, Marathe SP, Zannino D, Celermajer DS, Justo RN, Alphonso N, d'Udekem Y, Winlaw DS	Fontan operation at less than 3 years of age is not a risk factor for long-term failure	2021	Eur J Cardiothorac Surg	10.1093/ejcts/ezab355	Clinical Research
Chami, J. Nicholson, C. Strange, G. Cordina, R. Celermajer, D.S.	National and regional registries for congenital heart diseases: Strengths, weaknesses and opportunities	2021	International Journal of Cardiology	10.1016/j.ijcard.2021.05.007	Clinical Research

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Chami, J. Strange, G. Nicholson, C. Celermajer, D.S.	Towards a unified coding system for congenital heart diseases	2021	Circulation: Cardiovascular Quality and Outcomes	10.1161/CIRCOUTCOMES.121.008216	Clinical Research
Chan NY, Orchard J, Agbayani M, Boddington D, Chao TF, Johar S, John B, Joung B, Krishinan S, Krittayaphong R, Kurokawa S, Lau CP, Lim TW, Linh PT, Long VH, Naik A, Okumura Y, Sasano T, Yan B, Raharjo SB, Hanafy DA, Yuniadi Y, Nwe N, Awan ZA and Freedman B	2021 Asia Pacific Heart Rhythm Society (APHRS) practice guidance on atrial fibrillation screening	2021	Journal of Arrhythmia	10.1002/joa3.12669	Heart Rhythm and Stroke Prevention
Chau, K. Welsh, M. Makris, A. Hennessy, A.	Progress in preeclampsia: the contribution of animal models	2021	Journal of Human Hypertension	10.1038/s41371-021-00637-x	Vascular Immunology
Chen, H. Chhor, M. Rayner, B.S. McGrath, K. McClements, L.	Evaluation of the diagnostic accuracy of current biomarkers in heart failure with preserved ejection fraction: A systematic review and meta-analysis	2021	Archives of Cardiovascular Diseases	10.1016/j.acvd.2021.10.007	Inflammation Group
Chen, W. Tumanov, S. Fazarkalev, D. Cantley, J. James, D.E. Dunn, L.L. Shaik, T. Suarna, C. Stocker, R.	Bilirubin deficiency renders mice susceptible to hepatic steatosis in the absence of insulin resistance	2021	Redox Biology	10.1016/j.redox.2021.102152	Arterial Inflammation and Redox Biology
Davanzo, R.H. Alarcón, A.F. Calquín, J.Q. Varela, P.S. Sepúlveda, A.M. Herrerros, R.C. Patel, S. Rodríguez, G.M.	Antiplatelet therapy and percutaneous coronary interventions	2021	Current Cardiology Reviews	10.2174/1573403X16666200615144423	Coronary Disease
Di Bartolo, B.A. Cartland, S.P. Genner, S. Manuneechi Cholan, P. Vellozzi, M. Rye, K.-A. Kavurma, M.M.	HDL Improves Cholesterol and Glucose Homeostasis and Reduces Atherosclerosis in Diabetes-Associated Atherosclerosis	2021	Journal of Diabetes Research	10.1155/2021/6668506	Vascular Complications
Dunn, L.L. Kong, S.M.Y. Tumanov, S. Chen, W. Cantley, J. Ayer, A. Maghzal, G.J. Midwinter, R.G. Chan, K.H. Ng, M.K.C. Stocker, R.	Hmox1 (Heme Oxygenase-1) Protects against Ischemia-Mediated Injury via Stabilization of HIF-1 α (Hypoxia-Inducible Factor-1 α)	2021	Arteriosclerosis, Thrombosis, and Vascular Biology	10.1161/ATVBAHA.120.315393	Arterial Inflammation and Redox Biology
Dupuy, A. Hagimola, L. Mgaith, N.S.A. Houlahan, C.B. Preketes-Tardiani, R.E. Coleman, P.R. Passam, F.H.	Thromboinflammation model-on-a-chip by whole blood microfluidics on fixed human endothelium	2021	Diagnostics	10.3390/diagnostics11020203	Haematology
Dutta, S. Li, D. Wang, A. Ishak, M. Cook, K. Farnham, M. Dissanayake, H. Cistulli, P. Hunyor, I. Liu, R. Wilcox, I. Koay, Y.C. Yang, J. Lal, S. O'Sullivan, J.F.	Metabolite signatures of heart failure, sleep apnoea, their interaction, and outcomes in the community	2021	ESC Heart Failure	10.1002/ehf2.13631	Cardiovascular Neuroscience and Cardiometabolic Disease Groups
Femia G, Zhu D, Choudhary P, Ross SB, Muthurangu V, Richmond D, Celermajer DS, Semsarian C, Puranik R	Long term clinical outcomes associated with CMR quantified isolated left ventricular non-compaction in adults		International Journal of Cardiology	10.1016/j.ijcard.2020.12.017	Clinical Research
Ferguson, C. Lowres, N. Freedman, B.	Stroke Risk in Adults With Atrial Fibrillation According to Sex	2021	Heart Lung and Circulation	10.1016/j.hlc.2021.04.006	Heart Rhythm and Stroke Prevention
Freda H Passam, Gang Chen, Vivien M Chen, Miao Qi, Steven A Krilis, Bill Giannakopoulos	Beta-2-glycoprotein I exerts antithrombotic function through its domain V in mice	2021	Journal of Autoimmunity	10.1016/j.jaut.2021.102747	Haematology
Freedman, B. Hindricks, G. Banerjee, A. Baranchuk, A. Ching, C.K. Du, X. Fitzsimons, D. Healey, J.S. Ikeda, T. Lobban, T.C.A. Mbakwem, A. Narasimhan, C. Neubeck, L. Noseworthy, P. Philbin, D.M. Pinto, F.J. Rwebembera, J. Schnabel, R.B. Svendsen, J.H. Aguinaga, L. Arbelo, E. Böhm, M. Farhan, H.A. Richard Hobbs, F.D. Martínez-Rubio, A. Millitello, C. Naik, N. Noubiap, J.J. Perel, P. Piñero, D.J. Ribeiro, A.L. Stepinska, J.	World Heart Federation roadmap on atrial fibrillation – A 2020 update	2021	Global Heart	10.5334/GH.1023	Heart Rhythm and Stroke Prevention

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Freedman, B. Kamel, H. van Gelder, I.C. Schnabel, R.B.	Atrial fibrillation: Villain or bystander in vascular brain injury	2021	European Heart Journal, Supplement	10.1093/EURHEARTJ/SUAA166	Heart Rhythm and Stroke Prevention
Freedman, B. Lowres, N.	High-intensity atrial fibrillation screening to prevent stroke	2021	The Lancet	10.1016/S0140-6736(21)01785-2	Heart Rhythm and Stroke Prevention
Fusco-Allison, G. Li, D.K. Hunter, B. Jackson, D. Bannon, P.G. Lal, S. O'Sullivan, J.F.	Optimizing the discovery and assessment of therapeutic targets in heart failure with preserved ejection fraction	2021	ESC Heart Failure	10.1002/ehf2.13504	Cardiometabolic Disease
Gibbs, H. Freedman, B. Rosenqvist, M. Virdone, S. Mahmeed, W.A. Ambrosio, G. Camm, A.J. Jacobson, B. Jerjes-Sanchez, C. Kayani, G. Oto, A. Panchenko, E. Ragy, H. Kakkar, A.K.	Clinical Outcomes in Asymptomatic and Symptomatic Atrial Fibrillation Presentations in GARFIELD-AF: Implications for AF Screening	2021	American Journal of Medicine	10.1016/j.amjmed.2021.01.017	Heart Rhythm and Stroke Prevention
Giskes, K. Lowres, N. Li, J. Orchard, J. Hespe, C. Freedman, B.	Atrial fibrillation self screening, management and guideline recommended therapy (AF SELF SMART): A protocol for atrial fibrillation self-screening in general practice	2021	IJC Heart and Vasculature	10.1016/j.ijcha.2020.100683	Heart Rhythm and Stroke Prevention
Giudicatti LC, Burrows S, Playford D, Strange G, Hillis G	Markers of Elevated Left Ventricular Filling Pressure Are Associated with Increased Mortality in Nonsevere Aortic Stenosis	2021	Journal of the American Society of Echocardiography	https://pubmed.ncbi.nlm.nih.gov/33388447/	Clinical Research
Guan, I. Williams, K. Pan, J. Liu, X.	New Cysteine Covalent Modification Strategies Enable Advancement of Proteome-wide Selectivity of Kinase Modulators	2021	Asian Journal of Organic Chemistry	10.1002/ajoc.202100036	Cardioprotective Signalling and Drug Discovery
Gwynn, J. Gwynne, K. Rodrigues, R. Thompson, S. Bolton, G. Dimitropoulos, Y. Dulvari, N. Finlayson, H. Hamilton, S. Lawrence, M. MacNiven, R. Neubeck, L. Rambaldini, B. Taylor, K. Wright, D. Freedman, B.	Atrial Fibrillation in Indigenous Australians: A Multisite Screening Study Using a Single-Lead ECG Device in Aboriginal Primary Health Settings	2021	Heart Lung and Circulation	10.1016/j.hlc.2020.06.009	Heart Rhythm and Stroke Prevention
Hall, L. Guo, C. Tandy, S. Broadhouse, K. Dona, A.C. Malle, E. Bartels, E.D. Christoffersen, C. Grieve, S.M. Figtree, G. Hawkins, C.L. Davies, M.J.	Oral pre-treatment with thiocyanate (SCN ⁻) protects against myocardial ischaemia–reperfusion injury in rats	2021	Scientific Reports	10.1038/s41598-021-92142-x	Free Radical Group and Cardiac Imaging Group
Hywood, J.D. Sadeghipour, S. Clayton, Z.E. Yuan, J. Stubbs, C. Wong, J.W.T. Cooke, J.P. Patel, S.	Induced endothelial cells from peripheral arterial disease patients and neonatal fibroblasts have comparable angiogenic properties	2021	PLoS ONE	10.1371/journal.pone.0255075	Coronary Disease
Julianne Chong, Colin Curtain, Fady Gad, Freda Passam, Garry Soo, Russell Levy, Scott Dunkley, Nicole Wong Doo, Michelle Cunich, Rosemary Burke, Vivien Chen	Development and implementation of venous thromboembolism stewardship across a hospital network	2021	Int J Med Inform	10.1016/j.ijmedinf.2021	Haematology
Karimi Galougahi, K. Chadban, S. Mehran, R. Bangalore, S. Chertow, G.M. Ali, Z.A.	Invasive Management of Coronary Artery Disease in Advanced Renal Disease	2021	Kidney International Reports	10.1016/j.ekir.2021.02.041	Clinical Research
Karimi Galougahi, K. Patel, S. Shlofmitz, R.A. Maehara, A. Kereiakes, D.J. Hill, J.M. Stone, G.W. Ali, Z.A.	Calcific Plaque Modification by Acoustic Shock Waves: Intravascular Lithotripsy in Coronary Interventions	2021	Circulation: Cardiovascular Interventions	10.1161/CIRCINTERVENTIONS.120.009354	Coronary Disease
Karimi Galougahi, K. Shlofmitz, E. Jeremias, A. Gogia, S. Kirtane, A.J. Hill, J.M. Karpaliotis, D. Mintz, G.S. Maehara, A. Stone, G.W. Shlofmitz, R.A. Ali, Z.A.	Therapeutic Approach to Calcified Coronary Lesions: Disruptive Technologies	2021	Current Cardiology Reports	10.1007/s11886-021-01458-7	Clinical Research

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Karimi Galougahi, K. Shlofmitz, E. Jeremias, A. Petrossian, G. Mintz, G.S. Maehara, A. Shlofmitz, R. Ali, Z.A.	Optical Coherence Tomography in Acute Coronary Syndromes	2021	Interventional Cardiology Clinics	10.1016/j.iccl.2021.03.004	Clinical Research
Karimi Galougahi, K. Soukas, P.A. Kolski, B. Tayal, R. Parikh, S.A. Armstrong, E.J. Petrossian, G. Kaki, A. Rosenfield, K. Gray, W.A. Ali, Z.A.	Acoustic shock waves to modify calcific plaques – Intravascular lithotripsy in the peripheral circulation	2021	Cardiovascular Revascularization Medicine	10.1016/j.carrev.2021.06.118	Clinical Research
Kearney, K. Zentner, D. Cordina, R.	Management of Maternal Complex Congenital Heart Disease During Pregnancy	2021	Current Heart Failure Reports	10.1007/s11897-021-00534-x	Clinical Research
Khandkar, C. Madhavan, M.V. Weaver, J.C. Celermajer, D.S. Karimi Galougahi, K.	Atherothrombosis in acute coronary syndromes—from mechanistic insights to targeted therapies	2021	Cells	10.3390/cells10040865	Clinical Research
Khandkar, C. Patel, S. Arnott, C.	Procedural Volumes in the Era of COVID: The Risk Versus Benefit Trade-Off	2021	Heart Lung and Circulation	10.1016/j.hlc.2021.07.012	Coronary Disease
Khandkar, C. Patel, S. Galougahi, K.K.	Intravascular imaging and novel techniques to disrupt severely calcified lesions	2021	Postępy w Kardiologii Interwencyjnej	10.5114/AIC.2021.112523	Clinical Research
Khandkar, C. Vaidya, K. Karimi Galougahi, K. Patel, S.	Low bone mineral density and coronary artery disease: A systematic review and meta-analysis	2021	IJC Heart and Vasculature	10.1016/j.ijcha.2021.100891	Coronary Disease
Kim A Dora, Lyudmyla Borysova, Xi Ye, Chloe Powell, Timea Z Beleznai, Christopher P Stanley, Vito D Bruno, Tobias Starborg, Errin Johnson, Anna Pielach, Michael Taggart, Nicola Smart, Raimondo Ascione	Human coronary microvascular contractile dysfunction associates with viable synthetic smooth muscle cells	2021	Cardiovascular Research	10.1093/cvr/cvab218	Microvascular Research
Kim, T. Tang, O. Vernon, S.T. Kott, K.A. Koay, Y.C. Park, J. James, D.E. Grieve, S.M. Speed, T.P. Yang, P. Figtree, G.A. O'Sullivan, J.F. Yang, J.Y.H.	A hierarchical approach to removal of unwanted variation for large-scale metabolomics data	2021	Nature Communications	10.1038/s41467-021-25210-5	Cardiometabolic Disease
Koay, Y.C. Chen, Y.-C. Wali, J.A. Luk, A.W.S. Li, M. Doma, H. Reimark, R. Zaldivia, M.T.K. Habtom, H.T. Franks, A.E. Fusco-Allison, G. Yang, J. Holmes, A. Simpson, S.J. Peter, K. O'Sullivan, J.F.	Plasma levels of trimethylamine-N-oxide can be increased with 'healthy' and 'unhealthy' diets and do not correlate with the extent of atherosclerosis but with plaque instability	2021	Cardiovascular Research	10.1093/cvr/cvaa094	Cardiometabolic Disease
Koay, Y.C. Stanton, K. Kienzle, V. Li, M. Yang, J. Celermajer, D.S. O'Sullivan, J.F.	Effect of chronic exercise in healthy young male adults: A metabolomic analysis	2021	Cardiovascular Research	10.1093/cvr/cvaa051	Cardiometabolic Disease
Koo, K. Inglis, S.C. Freedman, B. Thijs, V. Ferguson, C.	Implantable cardiac monitors compared with conventional methods for the detection of atrial high-rate episodes in individuals with embolic stroke of undetermined source	2021	Cochrane Database of Systematic Reviews	10.1002/14651858.CD013464.pub2	Heart Rhythm and Stroke Prevention
Kurup, R. Galougahi, K.K. Figtree, G. Misra, A. Patel, S.	The Role of Colchicine in Atherosclerotic Cardiovascular Disease	2021	Heart Lung and Circulation	10.1016/j.hlc.2020.11.010	Coronary Disease
Lau, K. Waterhouse, A. Akhavan, B. Gao, L. Kim, H.N. Tang, F. Whitelock, J.M. Bilek, M.M. Lord, M.S. Rnjak-Kovacina, J.	Biomimetic silk biomaterials: Perlecan-functionalized silk fibroin for use in blood-contacting devices	2021	Acta Biomaterialia	10.1016/j.actbio.2021.02.014	Cardiovascular Medical Devices
Li, J. Lowres, N. Koo, F.K. Gallagher, R.	A systematic review of quantitative and qualitative literature on health professionals' experiences communicating with Chinese immigrants	2021	International Journal of Nursing Practice	10.1111/ijn.12960	Heart Rhythm and Stroke Prevention
Lim MS, Cordina R, Kotchetkova I, Celermajer DS	Late complication rates after aortic coarctation repair in patients with or without a bicuspid aortic valve	2021	Heart	10.1136/heartjnl-2021-319969	Clinical Research

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Lim, M.S. Celermajer, D.S. Bannon, P.G.	Bicuspid aortic valve disease – the influence of valve morphotype on age at and types of surgical treatment	2021	IJC Heart and Vasculature	10.1016/j.ijcha.2021.100786	Clinical Research
Lim, M.S. Strange, G. Playford, D. Stewart, S. Celermajer, D.S.	Characteristics of bicuspid aortic valve disease and stenosis: The national echo database of Australia	2021	Journal of the American Heart Association	10.1161/JAHA.121.020785	Clinical Research
Lin, A. Peiris, N.J. Dhaliwal, H. Hakim, M. Li, W. Ganesh, S. Ramaswamy, Y. Patel, S. Misra, A.	Mural cells: Potential therapeutic targets to bridge cardiovascular disease and neurodegeneration	2021	Cells	10.3390/cells10030593	Atherosclerosis and Vascular Remodelling
Liu, C.-C. Zhang, Y. Makris, A. Rasmussen, H.H. Hennessy, A.	S-glutathionylation of the Na ⁺ -K ⁺ -ATPase: A Novel Redox Mechanism in Preeclampsia	2021	Journal of Clinical Endocrinology and Metabolism	10.1210/clinem/dgaa918	Vascular Immunology
Lowres, N. Freedman, B.	Searching for atrial fibrillation post-stroke with prolonged monitoring: Do it early, but should we be looking for something else?	2021	IJC Heart and Vasculature	10.1016/j.ijcha.2021.100819	Heart Rhythm and Stroke Prevention
Lowres, N. Freedman, B.	Population screening for atrial fibrillation to prevent stroke	2021	The Lancet	10.1016/S0140-6736(21)01750-5	Heart Rhythm and Stroke
Lowres, N. Giskes, K. Freedman, B.	Next frontier in management of atrial fibrillation	2021	Heart	10.1136/heartjnl-2021-318961	Heart Rhythm and Stroke Prevention
Lowres, N. Giskes, K. Freedman, B.	Next frontier for stroke prevention in atrial fibrillation: Ensuring anticoagulant persistence	2021	Heart	10.1136/heartjnl-2020-318392	Heart Rhythm and Stroke Prevention
Lowres, N. Suwanwela, N.C. Chutinet, A. Freedman, B.	Response to letter to the editor regarding: "Atrial fibrillation prevalence and risk profile from novel community-based screening in Thailand: A prospective multi-centre study"	2021	IJC Heart and Vasculature	10.1016/j.ijcha.2021.100752	Heart Rhythm and Stroke Prevention
Mak, H.Y. Ouyang, Q. Tumanov, S. Xu, J. Rong, P. Dong, F. Lam, S.M. Wang, X. Lukmantara, I. Du, X. Gao, M. Brown, A.J. Gong, X. Shui, G. Stocker, R. Huang, X. Chen, S. Yang, H.	AGPAT2 interaction with CDP-diacylglycerol synthases promotes the flux of fatty acids through the CDP-diacylglycerol pathway	2021	Nature Communications	10.1038/s41467-021-27279-4	Arterial Inflammation and Redox Biology
Malavasi, V.L. Zoccali, C. Brandi, M.C. Micali, G. Vitolo, M. Imberti, J.F. Mussi, C. Schnabel, R.B. Freedman, B. Boriani, G.	Cognitive impairment in patients with atrial fibrillation: Implications for outcome in a cohort study	2021	International Journal of Cardiology	10.1016/j.ijcard.2020.08.028	Heart Rhythm and Stroke Prevention
Marijon E, Mocumbi A, Narayanan K, Jouven X, Celermajer DS	Persisting burden and challenges of rheumatic heart disease	2021	Eur Heart J	10.1093/eurheartj/ehab407	Clinical Research
Misra, A. Fisher, E.A.	Tipping the cap away from danger	2021	Nature Metabolism	10.1038/s42255-021-00353-3	Atherosclerosis and Vascular Remodelling
Molitor, M. Rudi, W.-S. Garlapati, V. Finger, S. Schöler, R. Kossmann, S. Lagrange, J. Nguyen, T.S. Wild, J. Knopp, T. Karbach, S.H. Knorr, M. Ruf, W. Münzel, T. Wenzel, P.	Nox2+myeloid cells drive vascular inflammation and endothelial dysfunction in heart failure after myocardial infarction via angiotensin II receptor type 1	2021	Cardiovascular Research	10.1093/cvr/cvaa042	Thrombosis
Morris P, Lal S, Bao S, Dennis M, Hunyor I, O'Sullivan J, Grieve SM, Puranik R	Relationship of Myocardial Gadolinium Enhancement to Late Clinical Outcomes: Implications for the COVID-19 era	2021	Heart Lung Circ	10.1016/j.hlc.2021.08.010	Cardiometabolic Disease
Nedoboy, P.E. Cohen, M. Farnham, M.M.-J.	Slow but steady—the responsiveness of sympathoadrenal system to a hypoglycemic challenge in ketogenic diet-fed rats	2021	Nutrients	10.3390/nu13082627	Cardiovascular Neuroscience

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Nedoboy, P.E. Houlahan, C.B. Farnham, M.M.J.	Pentobarbital Anesthesia Suppresses the Glucose Response to Acute Intermittent Hypoxia in Rat	2021	Frontiers in Physiology	10.3389/fphys.2021.645392	Cardiovascular Neuroscience
Ngo, L. Do, T.D. Van, B.V. Hoang, K. Le, D.T. Nguyen, H.C. Nguyen, T.T. Freedman, B. Lowres, N.	Incidence of New Onset Atrial Fibrillation After Cardiovascular Surgery in Vietnam: Results From A Novel Screening Strategy	2021	Journal of Atrial Fibrillation	10.4022/JAFIB.20200503	Heart Rhythm and Stroke Prevention
Nundlall, N. Playford, D. Strange, G. Davis, T.M.E. Davis, W.A.	Prevalence, incidence and associates of pulmonary hypertension complicating type 2 diabetes: Insights from the fremantle diabetes study phase 2 and national echocardiographic database of Australia	2021	Journal of Clinical Medicine	10.3390/jcm10194503	Clinical Research
Orchard, J.J. Orchard, J.W. Toresdahl, B. Asif, I.M. Hughes, D. La Gerche, A. Semsarian, C.	Cardiovascular Screening of Elite Athletes by Sporting Organizations in Australia: A Survey of Chief Medical Officers	2021	Clinical journal of sport medicine : official journal of the Canadian Academy of Sport Science Reports	10.1097/JSM.0000000000000798	Heart Rhythm and Stroke Prevention
Parvaneh, M. Witting, P.K. Ku, J. Moradi, T. Eroglu, E. Freedman, B. Sutherland, G.T. McCorkindale, A. Guennewig, B. Choowong, P. Bell-Anderson, K. Cooney, G. Thomas, S.R. Eberhard, J.	Periodontitis induces endothelial dysfunction in mice	2021	Scientific Reports	10.1038/s41598-021-94418-8	Heart Rhythm and Stroke
Peng, K.-Y. Salim, M. Pelle, J. Ramirez, G. Boyd, B.J.	TAILOR-MS, a Python Package that Deciphers Complex Triacylglycerol Fatty Acyl Structures: Applications for Bovine Milk and Infant Formulas	2021	Analytical Chemistry	10.1021/acs.analchem.0c04373	Haematology
Pijning, A.E. Blyth, M.T. Coote, M.L. Passam, F. Chiu, J. Hogg, P.J.	An alternate covalent form of platelet α IIb β 3 integrin that resides in focal adhesions and has altered function	2021	Blood	10.1182/blood.2021012441	Haematology
Poh CL, Cordina RL, Iyengar AJ, Zannino D, Grigg LE, Wheaton GR, Bullock A, Ayer J, Alphonso N, Gentles TL, Celermajer DS, d'Udekem Y	Pre- and Post-operative determinants of transplantation-free survival after Fontan. The Australia and New Zealand experience	2021	Int J Cardiol Heart Vasc	10.1016/j.ijcha.2021.100825	Clinical Research
Queiroz, R.F. Stanley, C.P. Wolhuter, K. Kong, S.M.Y. Rajivan, R. McKinnon, N. Nguyen, G.T.H. Roveri, A. Gutzzeit, S. Eaton, P. Donald, W.A. Ursini, F. Winterbourn, C.C. Ayer, A. Stocker, R.	Hydrogen peroxide signaling via its transformation to a stereospecific alkyl hydroperoxide that escapes reductive inactivation	2021	Nature Communications	10.1038/s41467-021-26991-5	Arterial Inflammation and Redox Biology and Microvascular Research
Queiroz, R.F. Suarna, C. Corcilius, L. Sergeant, G.E. Shengule, S. Payne, R.J. Ayer, A. Stocker, R.	Preparation, validation and use of a vasoactive tryptophan-derived hydroperoxide and relevant control compounds	2021	Nature Protocols	10.1038/s41596-021-00541-1	Arterial Inflammation and Redox Biology
Rahman, A.A. Stojanovska, V. Pilowsky, P. Nurgali, K.	Platinum accumulation in the brain and alteration in the central regulation of cardiovascular and respiratory functions in oxaliplatin-treated rats	2021	Pflugers Archiv European Journal of Physiology	10.1007/s00424-020-02480-4	High Blood Pressure Group
Ratwatte S, Hyun K, D'Souza M, Barraclough J, Chew D, Shetty P, Patel S, Amos D, Brieger D on behalf of the CONCORDANCE Registry	Relation of Body Mass Index to Outcomes in Acute Coronary Syndrome	2021	American Journal of Cardiology	10.1016/j.amjcard.2020.09.059	Coronary Disease
Ravindran, D. Karimi Galougahi, K. Tan, J.T.M. Kavurma, M.M. Bursill, C.A.	The multiple roles of chemokines in the mechanisms of stent biocompatibility	2021	Cardiovascular Research	10.1093/cvr/cvaa072	Vascular Complications
Rehan R, Kempler, McMaster, Larnach G, Amos D, Elder A, Arnold R, Juergens C, Patel S, Weaver J, Ng M, Roy P, Yong, Brieger D, Kritharides L, Adams M, Lowe HC	In Hospital Outcomes For High-Risk Percutaneous Coronary Intervention (PCI) in Patients Referred From a Rural Centre to Metropolitan Sites	2021	Heart Lung Circulation	10.1016/j.hlc.2021.07.015	Coronary Disease

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Rehan, R. Kotchetkova, I. Cordina, R. Celermajer, D.	Adult Congenital Heart Disease Survivors at Age 50 Years: Medical and Psychosocial Status	2021	Heart Lung and Circulation	10.1016/j.hlc.2020.05.114	Clinical Research
Rubenis, I. Tran, D. Bullock, A. Wijesekera, V. Baker, D. d'Udekem, Y. du Plessis, K. Katz, D. Lowy, M. Zentner, D. Celermajer, D. Cordina, R.	Sexual Function in Men Living With a Fontan Circulation	2021	Frontiers in Pediatrics	10.3389/fped.2021.765380	Clinical Research
Ruhoff, A.M. Hong, J.K. Gao, L. Singh, J. Tran, C. Mackie, G. Waterhouse, A.	Biomaterial Wettability Affects Fibrin Clot Structure and Fibrinolysis	2021	Advanced Healthcare Materials	10.1002/adhm.202100988	Cardiovascular Medical Devices
Schnabel, R.B. Wallenhorst, C. Engler, D. Blankenberg, S. Pfeiffer, N. Spruenker, N.A. Buettner, M. Michal, M. Lackner, K.J. Münzel, T. Wild, P.S. Martinez, C. Freedman, B.	Refined atrial fibrillation screening and cost-effectiveness in the German population	2021	Heart	10.1136/heartjnl-2020-318882	Heart Rhythm and Stroke Prevention
Schumann, T. König, J. von Loeffelholz, C. Vatner, D.F. Zhang, D. Perry, R.J. Bernier, M. Chami, J. Henke, C. Kurzbach, A. El-Agroudy, N.N. Willmes, D.M. Pesta, D. de Cabo, R. O'Sullivan, J.F. Simon, E. Shulman, G.I. Hamilton, B.S. Birkenfeld, A.L.	Erratum: Publisher Correction: Deletion of the diabetes candidate gene Slc16a13 in mice attenuates diet-induced ectopic lipid accumulation and insulin resistance (Communications biology (2021) 4 1 (826))	2021	Communications biology	10.1038/s42003-021-02425-2	Cardiometabolic Disease
Schumann, T. König, J. von Loeffelholz, C. Vatner, D.F. Zhang, D. Perry, R.J. Bernier, M. Chami, J. Henke, C. Kurzbach, A. El-Agroudy, N.N. Willmes, D.M. Pesta, D. de Cabo, R. O'Sullivan, J.F. Simon, E. Shulman, G.I. Hamilton, B.S. Birkenfeld, A.L.	Deletion of the diabetes candidate gene Slc16a13 in mice attenuates diet-induced ectopic lipid accumulation and insulin resistance	2021	Communications Biology	10.1038/s42003-021-02279-8	Cardiometabolic Disease
Sharma VJ, Iyengar AJ, Zannino D, Gentles T, Justo R, Celermajer DS, Bullock A, Winlaw D, Wheaton G, Burchill L, Cordina R, d'Udekem Y	Protein-losing enteropathy and plastic bronchitis after the Fontan procedure	2021	The Journal of Thoracic and Cardiovascular Surgery	10.1016/j.jtcvs.2020.07.107	Clinical Research
Shen, B. Tasdogan, A. Ubellacker, J.M. Zhang, J. Nosyreva, E.D. Du, L. Murphy, M.M. Hu, S. Yi, Y. Kara, N. Liu, X. Guela, S. Jia, Y. Ramesh, V. Embree, C. Mitchell, E.C. Zhao, Y.C. Ju, L.A. Hu, Z. Crane, G.M. Zhao, Z. Syeda, R. Morrison, S.J.	A mechanosensitive peri-arteriolar niche for osteogenesis and lymphopoiesis	2021	Nature	10.1038/s41586-021-03298-5	Thrombosis
Snir, A.D. Ng, M.K. Strange, G. Playford, D. Stewart, S. Celermajer, D.S.	Prevalence and outcomes of low-gradient severe aortic stenosis—from the national echo database of Australia	2021	Journal of the American Heart Association	10.1161/JAHA.121.021126	Clinical Research
Snir, A.D. Ng, M.K. Strange, G. Playford, D. Stewart, S. Celermajer, D.S.	Cardiac Damage Staging Classification Predicts Prognosis in All the Major Subtypes of Severe Aortic Stenosis: Insights from the National Echo Database Australia	2021	Journal of the American Society of Echocardiography	10.1016/j.jecho.2021.05.017	Clinical Research
Stanley, C.P. Stocker, R.	Regulation of vascular tone and blood pressure by singlet molecular oxygen in inflammation	2021	Current Opinion in Nephrology and Hypertension	10.1097/MNH.0000000000000679	Arterial Inflammation and Redox Biology
Stavrakis, S. Elkholey, K. Lofgren, M.M. Asad, Z.U.A. Stephens, L.D. Freedman, B.	Screening for atrial fibrillation in american indian adults in a tribal primary care clinic	2021	Journal of the American Heart Association	10.1161/JAHA.120.020069	Heart Rhythm and Stroke Prevention
Stewart S, Chan Y, Playford D, Strange GA	Mild pulmonary hypertension and premature mortality among 154 956 men and women undergoing routine echocardiography	2021	European Respiratory Journal	10.1183/13993003.00832-2021	Clinical Research
Stocks, B. Ashcroft, S.P. Joannise, S. Dansereau, L.C. Koay, Y.C. Elhassan, Y.S. Lavery, G.G. Quek, L.-E. O'Sullivan, J.F. Philp, A.M. Wallis, G.A. Philp, A.	Nicotinamide riboside supplementation does not alter whole-body or skeletal muscle metabolic responses to a single bout of endurance exercise	2021	Journal of Physiology	10.1113/JP280825	Cardiometabolic Disease

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Strange, G. Scalia, G.M. Playford, D. Simon, S.	Uncovering the treatable burden of severe aortic stenosis in Australia: current and future projections within an ageing population	2021	BMC Health Services Research	10.1186/s12913-021-06843-0	Clinical Research
Suwanwela, N.C. Chutinet, A. Autjimanon, H. Ounahachok, T. Decha-umphai, C. Chockchai, S. Indrabhakti, S. Kijpaisalratana, N. Akarathanawat, W. Travanichakul, S. Kitjavijitre, T. Vongvasinkul, P. Kanacharoen, I. Bunlikitkul, T.O. Charnwut, S. Lowres, N. Freedman, B.	Atrial fibrillation prevalence and risk profile from novel community-based screening in Thailand: A prospective multi-centre study	2021	IJC Heart and Vasculature	10.1016/j.ijcha.2020.100709	Heart Rhythm and Stroke Prevention
Thomson, S. Waters, K.A. Hennessy, A. Machaalani, R.	The unfolded protein response and apoptotic regulation in the human placenta due to maternal cigarette smoking and pre-eclampsia	2021	Reproductive Toxicology	10.1016/j.reprotox.2021.09.001	Vascular Immunology
Tran DL, Celermajer DS, Ayer J, Grigg L, Clendenning C, Hornung T, Justo R, Davis GM, d'Udekem Y, Cordina R	The "Super-Fontan" Phenotype: Characterizing Factors Associated with High Physical Performance	2021	Frontiers in Cardiovascular Medicine	10.3389/fcvm.2021.764273	Clinical Research
Tran, D.L. Maiorana, A. Davis, G.M. Celermajer, D.S. d'Udekem, Y. Cordina, R.	Exercise Testing and Training in Adults With Congenital Heart Disease: A Surgical Perspective	2021	Annals of Thoracic Surgery	10.1016/j.athoracsur.2020.08.118	Clinical Research
Tran, D.L. Rodrigues, C. du Plessis, K. Zannino, D. Davis, G.M. Celermajer, D.S. d'Udekem, Y. Cordina, R.	Decline Is Not Inevitable: Exercise Capacity Trajectory in an Australian and New Zealand Fontan Cohort	2021	Heart Lung and Circulation	10.1016/j.hlc.2021.01.004	Clinical Research
Tucker, B. Sawant, S. McDonald, H. Rye, K.-A. Patel, S. Ong, K.L. Cochran, B.J.	The association of serum lipid and lipoprotein levels with total and differential leukocyte counts: Results of a cross-sectional and longitudinal analysis of the UK Biobank	2021	Atherosclerosis	10.1016/j.atherosclerosis.2020.12.016	Coronary Disease
Tucker, B. Vaidya, K. Cochran, B.J. Patel, S.	Inflammation during percutaneous coronary intervention—prognostic value, mechanisms and therapeutic targets	2021	Cells	10.3390/cells10061391	Coronary Disease
Turrell, G. Nathan, A. Burton, N.W. Brown, W.J. McElwee, P. Barnett, A.G. Pachana, N.A. Oldenburg, B. Rachele, J.N. Giskes, K. Giles-Corti, B.	Cohort Profile: HABITAT - A longitudinal multilevel study of physical activity, sedentary behaviour and health and functioning in mid-to-late adulthood	2021	International Journal of Epidemiology	10.1093/ije/dyaa175	Heart Rhythm and Stroke Prevention
Vaidya, K. Tucker, B. Kurup, R. Khandkar, C. Pandzic, E. Barraclough, J. Machet, J. Misra, A. Kavurma, M. Martinez, G. Rye, K.-A. Cochran, B.J. Patel, S.	Colchicine inhibits neutrophil extracellular trap formation in patients with acute coronary syndrome after percutaneous coronary intervention	2021	Journal of the American Heart Association	10.1161/JAHA.120.018993	Coronary Disease and Atherosclerosis and Vascular Remodelling
Vaidya, K. Tucker, B. Patel, S. Ng, M.K.C.	Acute coronary syndromes (Acs)—unravelling biology to identify new therapies—the microcirculation as a frontier for new therapies in acs	2021	Cells	10.3390/cells10092188	Coronary Disease
Vernon, S.T. Tang, O. Kim, T. Chan, A.S. Kott, K.A. Park, J. Hansen, T. Koay, Y.C. Grieve, S.M. O'sullivan, J.F. Yang, J.Y. Figtree, G.A.	Metabolic signatures in coronary artery disease: Results from the bioHEART-CT study	2021	Cells	10.3390/cells10050980	Cardiometabolic Disease
Wachter, R. Freedman, B.	Subclinical Atrial Fibrillation and the Risk of Recurrent Ischemic Stroke	2021	Thrombosis and Haemostasis	10.1055/s-0041-1726403	Heart Rhythm and Stroke Prevention

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Wali, J.A. Milner, A.J. Luk, A.W.S. Pulpitel, T.J. Dodgson, T. Facey, H.J.W. Wahl, D. Kebede, M.A. Senior, A.M. Sullivan, M.A. Brandon, A.E. Yau, B. Lockwood, G.P. Koay, Y.C. Ribeiro, R. Solon-Biet, S.M. Bell-Anderson, K.S. O'Sullivan, J.F. Macia, L. Forbes, J.M. Cooney, G.J. Cogger, V.C. Holmes, A. Raubenheimer, D. Le Couteur, D.G. Simpson, S.J.	Impact of dietary carbohydrate type and protein-carbohydrate interaction on metabolic health	2021	Nature Metabolism	10.1038/s42255-021-00393-9	Cardiometabolic Disease
Wang, C. Cheng, D. Jalali Motlagh, N. Kuellenberg, E.G. Wojtkiewicz, G.R. Schmidt, S.P. Stocker, R. Chen, J.W.	Highly Efficient Activatable MRI Probe to Sense Myeloperoxidase Activity	2021	Journal of Medicinal Chemistry	10.1021/acs.jmedchem.1c00038	Arterial Inflammation and Redox Biology
Wild, J. Jung, R. Knopp, T. Efentakis, P. Benaki, D. Grill, A. Wegner, J. Molitor, M. Garlapati, V. Rakova, N. Markó, L. Marton, A. Mikros, E. Münzel, T. Kossmann, S. Rauh, M. Nakano, D. Kitada, K. Luft, F. Waisman, A. Wenzel, P. Titze, J. Karbach, S.	Aestivation motifs explain hypertension and muscle mass loss in mice with psoriatic skin barrier defect	2021	Acta Physiologica	10.1111/apha.13628	Thrombosis
Woldendorp, K. Doyle, M.P. Black, D. Ng, M. Keech, A. Grieve, S.M. Bannon, P.G.	Subclinical valve thrombosis in transcatheter aortic valve implantation: A systematic review and meta-analysis	2021	Journal of Thoracic and Cardiovascular Surgery	10.1016/j.jtcvs.2020.01.084	Cardiac Imaging
Woo KS, Chook P, Hu YJ, Lao XQ, Lin CQ, Lee P, Kwok C, Wei AN, Guo DS, Yin YH, Lau K, Leung KS, Leung Y, Celermajer DS	The impact of particulate matter air pollution (PM2.5) on atherosclerosis in modernizing China: a report from the CATHAY study	2021	International Journal of Epidemiology	10.1093/ije/dyaa235	Clinical Research
Yuasa, H.J. Stocker, R.	Methylene blue and ascorbate interfere with the accurate determination of the kinetic properties of IDO2	2021	FEBS Journal	10.1111/febs.15806	Arterial Inflammation and Redox Biology
Zhang, J.Q.J. Saravanabavan, S. Cheng, K.M. Raghubanshi, A. Chandra, A.N. Munt, A. Rayner, B. Zhang, Y. Chau, K. Wong, A.T.Y. Rangan, G.K.	Long-term dietary nitrate supplementation does not reduce renal cyst growth in experimental autosomal dominant polycystic kidney disease	2021	PLoS ONE	10.1371/journal.pone.0248400	Inflammation Group
Zhang, W. Chen, Y. Miao, C.-Y. Huang, Q.-F. Sheng, C.-S. Shao, S. Wang, D. Xu, S.-K. Lei, L. Zhang, D. Chen, Y.-L. Hu, L.-X. Xia, J.-H. Ye, X.-F. Cheng, Y.-B. Wang, Y. Guo, Q.-H. Li, Y. Lowres, N. Freedman, B. Wang, J.-G.	Quarterly versus annual ECG screening for atrial fibrillation in older Chinese individuals (AF-CATCH): a prospective, randomised controlled trial	2021	The Lancet Healthy Longevity	10.1016/S2666-7568(21)00138-0	Heart Rhythm and Stroke Prevention
Zhao, Y.C. Vatankhah, P. Goh, T. Michelis, R. Kyanian, K. Zhang, Y. Li, Z. Ju, L.A.	Hemodynamic analysis for stenosis microfluidic model of thrombosis with refined computational fluid dynamics simulation	2021	Scientific Reports	10.1038/s41598-021-86310-2	Cardiovascular Medical Devices and Thrombosis
Zhao, Y.C. Vatankhah, P. Goh, T. Wang, J. Chen, X.V. Kashani, M.N. Zheng, K. Li, Z. Ju, L.A.	Computational fluid dynamics simulations at micro-scale stenosis for microfluidic thrombosis model characterization	2021	MCB Molecular and Cellular Biomechanics	10.32604/MCB.2021.012598	Cardiovascular Medical Devices and Thrombosis
Zink, M.D. Mischke, K.G. Keszei, A.P. Rummey, C. Freedman, B. Neumann, G. Tolksdorf, A. Frank, F. Wienströer, J. Kuth, N. Schulz, J.B. Marx, N.	Screen-detected atrial fibrillation predicts mortality in elderly subjects	2021	Europace	10.1093/europace/eaab190	Heart Rhythm and Stroke Prevention