

## **SIgN affiliated publications by Ee Chee REN**

*Last updated: 16 Nov 2023*

### **2023**

Ren EC, Zhuo NZ, Goh ZY, Bonne I, Malleret B, Ko HL. cccDNA-Targeted Drug Screen Reveals a Class of Antihistamines as Suppressors of HBV Genome Levels. *Biomolecules*. 2023 Sep 24;13(10):1438.

Tan CY, Chiew CJ, Pang D, Lee VJ, Ong B, Wang LF, Ren EC, Lye DC, Tan KB. Effectiveness of bivalent mRNA vaccines against medically attended symptomatic SARS-CoV-2 infection and COVID-19-related hospital admission among SARS-CoV-2-naive and previously infected individuals: a retrospective cohort study. *Lancet Infect Dis*. 2023 Aug 2:S1473-3099(23)00373-0.

Huan X, Zhuo N, Lee HY, Ren EC. Allopurinol non-covalently facilitates binding of unconventional peptides to HLA-B\*58:01. *Sci Rep*. 2023 Jun 9;13(1):9373

### **2022**

Goh YS, Rouers A, Fong SW, Zhuo NZ, Hor PX, Loh CY, Huang Y, Neo VK, Kam IKJ, Wang B, Ngoh EZX, Salleh SNM, Lee RTC, Pada S, Sun LJ, Ong DLS, Somani J, Lee ES; NCID Study Group; COVID-19 Study Group, Maurer-Stroh S, Wang CI, Leo YS, Ren EC, Lye DC, Young BE, Ng LFP, Renia L. Waning of specific antibodies against Delta and Omicron variants five months after a third dose of BNT162b2 SARS-CoV-2 vaccine in elderly individuals. *Front Immunol*. 2022 Nov 14;13:1031852.

Rouers A, Wong N, Goh YS, Torres-Ruesta A, Tay MZ, Chang ZW, Fong SW, Neo V, Kam IKJ, Yeo NK, Huang Y, Loh CY, Hor PX, Wong JXE, Tan YJ; COVID-19 Study Group, Macary PA, Qian X, Bei W, Ngoh EZX, Salleh SNM, Wang CI, Poh XY, Rao S, Chia PY, Ong SWX, Lee TH, Lin RJH, Lim C, Teo J, Ren EC, Lye DC, Young BE, Ng LFP, Renia L. Efficient recall of SARS-CoV-2 variant-reactive B cells and T responses in the elderly upon heterologous mRNA vaccines as boosters. *J Med Virol*. 2022 Oct 27:e28258.

Loh Z, Huan X, Awate S, Schrittwieser M, Renia L, Ren EC. Molecular Characterization of MHC Class I Alpha 1 and 2 Domains in Asian Seabass (*Lates calcarifer*). *Int J Mol Sci*. 2022 Sep 14;23(18):10688.

Ko HL, Zhuo N, Chang ZW, Santosa A, Kalimuddin S, Lim XR, Tan SY, Lye DC, Toh D, Young BE, Renia L, Lee HY, Ren EC. In vitro vaccine challenge of PBMCs from BNT162b2 anaphylaxis patients reveals HSP90 $\alpha$ -NOD2-NLRP3 nexus. *Allergy*. 2022 Sep 3. [Epub ahead of print]

Goh YS, Fong SW, Rouers A, Chang ZW, Tay MZ, Chavatte JM, Zhuo NZ, Hor PX, Loh CY, Huang Y, Wong JXE, Tan YJ, Lim DRX, Wang B, Ngoh EZX, Salleh SNM, Lee RTC, Pada S, Sun LJ, Ong DLS, Somani J, Lee ES; NCID Study Group; COVID-19 Study Group, Maurer-Stroh S, Wang CI, Leo YS, Lin RT, Ren EC, Lye DC, Young BE, Lim PL, Ng LF, Renia L. Heterologous booster vaccination with CoronaVac following prime vaccination with mRNA vaccine. *Clin Transl Immunology*. 2022 Aug 23;11(8):e1403.

Renia L, Goh YS, Rouers A, Le Bert N, Chia WN, Chavatte JM, Fong SW, Chang ZW, Zhuo NZ, Tay MZ, Chan YH, Tan CW, Yeo NK, Amrun SN, Huang Y, Wong JXE, Hor PX, Loh CY, Wang B, Ngoh EZX, Salleh SNM, Carissimo G, Dowla S, Lim AJ, Zhang J, Lim JME, Wang CI, Ding Y, Pada S, Sun LJ, Somani J, Lee ES, Ong DLS; SCOPE Cohort Study Group, Leo YS, MacAry PA, Lin RTP, Wang LF, Ren EC, Lye DC, Bertoletti A, Young BE, Ng LFP. Lower vaccine-acquired immunity in the elderly population following two-dose BNT162b2 vaccination is alleviated by a third vaccine dose. *Nat Commun*. 2022 Aug 8;13(1):4615.

Poh XY, Lee IR, Lim C, Teo J, Rao S, Chia PY, Ong SWX, Lee TH, Lin RJH, Ng LFP, Ren EC, Lin RTP, Wang LF, Renia L, Lye DC, Young BE. Evaluation of the safety and immunogenicity of different COVID-19 vaccine combinations in healthy individuals: study protocol for a randomized, subject-blinded, controlled phase 3 trial [PRIBIVAC]. *Trials*. 2022 Jun 16;23(1):498.

De Marco L, D'Orso S, Pirronello M, Verdiani A, Termine A, Fabrizio C, Capone A, Sabatini A, Guerrera G, Placido R, Sambucci M, Angelini DF, Giannessi F, Picozza M, Caltagirone C, Salvia A, Volpe E, Balice MP, Rossini A, Röttschke O, Giardina E, Battistini L, Borsellino G. Assessment of T-cell Reactivity to the SARS-CoV-2 Omicron Variant by Immunized Individuals. *JAMA Netw Open*. 2022 Apr 1;5(4):e2210871.

## 2021

Goh ZY, Ren EC, Ko HL. Intracellular interferon signalling pathways as potential regulators of covalently closed circular DNA in the treatment of chronic hepatitis B. *World J Gastroenterol*. 2021 Apr 14;27(14):1369-1391.

Karkhanis AV, Chan ECY, Ren EC. Preliminary discovery of novel markers for human cell line activation test (h-CLAT). *Toxicol in Vitro*. 2021 Mar 25. [Epub ahead of print]

Shen M, Yeoh XLA, Wang DY, Tey HL, Ren EC, Oon HH. Genetic variations in gamma-secretase and PSTPIP1 in hidradenitis suppurativa in Singaporean Chinese. *J Eur Acad Dermatol Venereol*. 2021 Jan 18. [Epub ahead of print]

## 2020

Shen M, Lim JME, Chia C, Ren EC. CD39+ regulatory T cells modulate the immune response to carbamazepine in HLA-B\*15:02 carriers. *Immunobiology*. 2020 Jan;225(1):151868.

## 2019

Shen M, Lim SWD, Tan ES, Oon HH, Ren EC. HLA Correlations with Clinical Phenotypes and Risk of Metabolic Comorbidities in Singapore Chinese Psoriasis Patients. *Mol Diagn Ther*. 2019 Dec;23(6):751-760.

Huan X, Zhuo Z, Xiao Z, Ren EC. Crystal structure of suboptimal viral fragments of Epstein Barr Virus Rta peptide-HLA complex that stimulate CD8 T cell response. *Sci Rep*. 2019 Nov 13;9(1):16660.

Ko HL, Zhuo Z, Ren EC. HNF4 $\alpha$  Combinatorial Isoform Heterodimers Activate Distinct Gene Targets that Differ from Their Corresponding Homodimers. *Cell Rep*. 2019 Mar 5;26(10):2549-2557.e3.

Zhao X, Hamidinia M, Choo JAL, Too CT, Ho ZZ, Ren EC, Bertoletti A, MacAry PA, Gould KG, Brzostek J, Gascoigne NRJ. Use of Single Chain MHC Technology to Investigate Co-agonism in Human CD8+ T Cell Activation. *J Vis Exp*. 2019 Feb 28;(144).

## 2018

Zhao X, Sankaran S, Yap J, Too CT, Ho ZZ, Dolton G, Legut M, Ren EC, Sewell AK, Bertoletti A, MacAry PA, Brzostek J, Gascoigne NRJ. Nonstimulatory peptide-MHC enhances human T-cell antigen-specific responses by amplifying proximal TCR signaling. *Nat Commun*. 2018 Jul 13;9(1):2716.

Wang B, Lam TH, Soh MK, Ye Z, Chen J, Ren EC. Influenza A Virus Facilitates Its Infectivity by Activating p53 to Inhibit the Expression of Interferon-Induced Transmembrane Proteins. *Front Immunol*. 2018 May 31;9:1193.

## 2017

Ko HL, Lam TH, Ng H, Toh J, Wang LW, Ren EC. Identification of Slug and Sox7 as transcriptional repressors binding to the Hepatitis B Virus Core Promoter. *J Hepatol*. 2017 Sep 5. [Epub ahead of print]

Lam TH, Shen M, Tay MZ, Ren EC. Unique Allelic eQTL Clusters in Human MHC Haplotypes. *G3 (Bethesda)*. 2017 Aug 7;7(8):2595-2604.

Xiao Z, Ye Z, Tadwal VS, Shen M, Ren EC. Dual non-contiguous peptide occupancy of HLA class I evoke antiviral human CD8 T cell response and form neo-epitopes with self-antigens. *Sci Rep*. 2017 Jul 11;7(1):5072.

Tan-Koi WC, Sung C, Chong YY, Lateef A, Pang SM, Vasudevan A, Aw D, Lui NL, Lee SX, Ren EC, Koay ES, Tay YK, Lim YL, Lee HY, Dong D, Loke C, Tan L, Limenta M, Lee EJ, Toh D, Chan CL. Tailoring of recommendations to reduce serious cutaneous adverse drug reactions: a pharmacogenomics approach. *Pharmacogenomics*. 2017 Jun;18(9):881-890.

Zu Y, Tan MH, Ren EC, Ying JY. Facile and Phase-Defined Determination of HLA Alleles with Morpholino-Functionalized Nanoparticle Probes. *Nanomedicine*. 2017 Feb;13(2):611-618.

## 2016

Lee HY, Shen MX, Lim YL, Tay YK, Chan MM, Pang SM, Xiao ZW, Ang SB, Ren EC. Increased risk of strontium ranelate-related SJS/TEN is associated with HLA. *Osteoporos Int*. 2016 Aug;27(8):2577-83.

Shen M, Linn YC, Ren EC. KIR-HLA profiling shows presence of higher frequencies of strong inhibitory KIR-ligands among prognostically poor risk AML patients. *Immunogenetics*. 2016 Feb;68(2):133-44.

Cao T, Shen M, Tan V, Ren EC, Tey HL. Primary Localized Cutaneous Amyloidosis and Human Leukocyte Antigen A and -B in a Chinese Population. *Skinmed*. 2016 Feb 1;14(1):75-6.

Chen Q, Shen M, Heng YK, Theng TS, Tey HL, Ren EC, Chong WS. Actinic Prurigo in Singaporean Chinese: A Positive Association with HLA-DRB1\*03:01. *Photochem Photobiol*. 2016 Mar;92(2):355-359.

## 2015

Lam TH, Tay MZ, Wang B, Xiao Z, Ren EC. Intrahaplotypic Variants Differentiate Complex Linkage Disequilibrium within Human MHC Haplotypes. *Sci Rep*. 2015 Nov 23;5:16972.

## 2014

Choo JA, Liu J, Toh X, Grotenbreg GM, Ren EC. The immunodominant Influenza A virus M158-66 CTL epitope exhibits degenerate class I MHC restriction in humans. *J Virol*. 2014 Sep 15;88(18):10613-23.

Liu JX, Xiao ZW, Ko HL, Shen MX, Ren EC. Activating killer cell immunoglobulin-like receptor 2DS2 binds to HLA-A\*11. *Proc Natl Acad Sci, USA*. 2014 Feb 18;111(7):2662-7. [Reviewed in F1000Prime].

Wang B, Niu D, Lam TH, Xiao Z, Ren EC. Mapping the p53 transcriptome universe using p53 natural polymorphs. *Cell Death Differ*. 2014; 21(4): 521-32 [with Editorial Commentary, *Cell Death Differ*, 2014; 21(4): 505-6].

## 2013

Wang B, Niu DD, Lai LY, Ren EC. p53 increases MHC Class I expression by upregulating the endoplasmic reticulum aminopeptidase ERAP1. *Nat. Commun.* 2013; 4: 2359. doi: 10.1038/ncomms3359.

Xiao ZW, Ko HL, Goh EH, Wang B, Ren EC. hnRNPK suppresses p53-independent apoptosis by maintaining high levels of endogenous caspase inhibitors. *Carcinogenesis* 2013; 34(7):1458-67.

## 2012

Shen M, Loh MF, Zulaimi MN, Chan SH, Ren EC. B\*13:50, a novel HLA-B\*13 allele, identified by sequence-based typing. *Tissue Antigens*. 2012 Jan;79(1):74-5.

Lin Z, Bei JX, Shen M, Li Q, Liao Z, Zhang Y et al. A genome-wide association study in Han Chinese identifies new susceptibility loci for ankylosing spondylitis. *Nat Genet*. 2012; 44(1):73-7.

## 2011

Ko HL and Ren EC. Novel PARP1 binding motif in hepatitis B virus core promoter impairs DNA damage repair. *Hepatology*. 2011 Oct; 54(4): 1190-8.

## 2009

Wang B, Xiao ZW, Ren EC. Redefining the p53 response element. *Proc Natl Acad Sci, USA*. 2009 Aug 25;106(34):14373-8. [Research Highlights. *Nature Reviews Cancer* 2009 Oct 9(10): 689.]

## 2005

Ng LF, Chan M, Chan SH, Cheng PC, Leung EH, Chen WN, Ren EC. Host heterogeneous ribonucleoprotein K (hnRNP K) as a potential target to suppress hepatitis B virus replication. *PLoS Med*. 2005 Jul;2(7): 673-83.

## 2004

Neo SY, Leow CY, Vinsensius B. Vega, Long PM, Amirul Islam, Lai PBS, Liu E, Ren E C. Identification of discriminators of hepatocellular carcinoma vs. non-tumor liver using expression profiling. *Hepatology*, 2004 Apr;39(4):944-53.