

## Peer-reviewed Research Papers Published in 2012

During the year 2012, the NIT has contributed 6 papers in the peer-reviewed medical and bioscience literature that were published in 2012. There are also 12 papers submitted in 2012 that have been published or will appear in press in 2013. These papers represent the research of NIT-affiliated scientists and doctors (in bold type), either at the NIT or in collaboration with other centers including USC and UCLA. The papers are listed below.

1. **Chen Y, Sampaio MS, Yang JW, Min D, Hutchinson IV.** Genetic Polymorphisms of the Transcription Factor NFATc4 and Development of New-Onset Diabetes After Transplantation in Hispanic Kidney Transplant Recipients. *Transplantation.* 2012; 93: 325-30.
2. Fong TL, Khemichian S, Shah T, **Hutchinson IV, Cho YW.** Combined liver-kidney transplantation is preferable to liver transplant alone for cirrhotic patients with renal failure. *Transplantation.* 2012; 94: 411-6.
3. **Sampaio MS, Cho YW,** Shah T, Bunnapradist S, **Hutchinson IV.** Impact of Epstein-Barr virus donor and recipient serostatus on the incidence of post-transplant lymphoproliferative disorder in kidney transplant recipients. *Nephrology Dialysis Transplantation.* 2012; 27: 2971-92012.
4. **Sampaio MS, Cho YW,** Shah T, Bunnapradist S, **Hutchinson IV.** Association of immunosuppressive maintenance regimens with posttransplant lymphoproliferative disorder in kidney transplant recipients. *Transplantation.* 2012; 93: 73-81.
5. **Sampaio MS, Cho YW,** Qazi Y, Bunnapradist S, **Hutchinson IV,** Shah T. Post-transplant malignancies in solid organ adult recipients: an analysis of the U.S. National Transplant Database. *Transplantation.* 2012; 94: 990-998.
6. Kiefer EM, Shi Q, Hoover D, Kaplan R, Tracy R, Augenbraun M, Liu C, **Nowicki M,** Tien P, Cohen M, Golub E, Anastos K. Association Of Hepatitis C With Markers Of Hemostasis In HIV-Infected and Uninfected Women in the Women's Interagency HIV Study (WIHS). *Journal of Acquired Immune Deficiency Syndromes.* 2012 Dec 6. [Epub ahead of print] PubMed PMID: 23221984; PubMed Central PMCID: PMC3652915.
7. Sarkar M, Bacchetti P, Tien P, Mileti E, French AL, Edlin BR, Keller M, Seaberg E, **Nowicki MJ,** Young M, Peters MG. Racial/Ethnic Differences in Spontaneous HCV Clearance in HIV Infected and Uninfected Women. *Digestive Diseases and Sciences.* 2013 May; 58(5):1341-8. doi: 10.1007/s10620-012-2486-8. Epub 2012 Nov 24. PubMed PMID: 23179159; PubMed Central PMCID: PMC3663918.
8. Shlipak MG, Scherzer R, Abraham A, Tien PC, Grunfeld C, Peralta CA, Devarajan P, Bennett M, Butch AW, Anastos K, Cohen MH, **Nowicki M,** Sharma A, Young MA, Sarnak MJ, Parikh CR. Urinary markers of kidney injury and kidney function decline in HIV-infected women. *Journal of Acquired Immune Deficiency Syndromes.* 2012 Dec

15; 61(5):565-73. doi: 10.1097/QAI.0b013e3182737706. PubMed PMID: 23023103; PubMed Central PMCID: PMC3509242.

9. Villacres MC, Kono N, Mack WJ, **Nowicki MJ**, Anastos K, Augenbraun M, Liu C, Landay A, Greenblatt RM, Gange SJ, Levine AM. Interleukin 10 responses are associated with sustained CD4 T-cell counts in treated HIV infection. *Journal of Infectious Diseases*. 2012 Sep 1 ;206(5):780-9. doi: 10.1093/infdis/jis380. Epub 2012 Jun 12. PubMed PMID: 22693231; PubMed Central PMCID: PMC3491747.
10. Sarkar M, Bacchetti P, French AL, Tien P, Glesby MJ, **Nowicki M**, Plankey M, Gange S, Sharp G, Minkoff H, Peters MG; Women's Interagency HIV Study (WIHS). Lower liver-related death in African-American women with human immunodeficiency virus/hepatitis C virus coinfection, compared to Caucasian and Hispanic women. *Hepatology*. 2012 Nov;56(5):1699-705. doi: 10.1002/hep.25859. Epub 2012 Aug 27. PubMed PMID: 22618868; PubMed Central PMCID: PMC3440547.
11. Weinberg A, Allshouse AA, Mawhinney S, Canniff J, Benning L, Wentz EL, Minkoff H, Young M, **Nowicki M**, Greenblatt R, Cohen MH, Golub ET. Responses to hepatitis A virus vaccine in HIV-infected women: effect of hormonal contraceptives and HIV disease characteristics. *Journal of Acquired Immune Deficiency Syndromes*. 2012 May 1; 60(1):e15-8. doi: 10.1097/QAI.0b013e31824d30bd. PubMed PMID: 22517417; PubMed Central PMCID: PMC3332075.
12. Voutila J, Sætrom P, Mintz P, Sun G, Alluin J, Rossi JJ, Habib NA, **Kasahara N**. Gene Expression Profile Changes After Short-activating RNA-mediated Induction of Endogenous Pluripotency Factors in Human Mesenchymal Stem Cells. *Molecular Therapy - Nucleic Acids*. 2012 Aug 7; 1:e35. doi: 10.1038/mtna.2012.20. PubMed PMID: 23344177; PubMed Central PMCID: PMC3437803.
13. Mintz PJ, Sætrom P, Reebye V, Lundbæk MB, Lao K, Rossi JJ, Gaensler KM, **Kasahara N**, Nicholls JP, Jensen S, Haoudi A, Emara MM, Gordon MY, Habib NA. MicroRNA-181a\* Targets Nanog in a Subpopulation of CD34(+) Cells Isolated From Peripheral Blood. *Molecular Therapy - Nucleic Acids*. 2012 Aug 7; 1:e34. doi: 10.1038/mtna.2012.29. PubMed PMID: 23344176; PubMed Central PMCID: PMC3437805.
14. Janson C, **Kasahara N**, Prendergast GC, Colicelli J. RIN3 is a negative regulator of mast cell responses to SCF. *PLoS One*. 2012; 7(11):e49615. doi: 10.1371/journal.pone.0049615. Epub 2012 Nov 20. PubMed PMID: 23185384; PubMed Central PMCID: PMC3502454.
15. Yamahira A, Narita M, Ishii K, Jayathilake RM, Iwabuchi M, Satoh N, Uchiyama T, Taniguchi T, Hashimoto S, **Kasahara N**, Faure E, Bogan B, Takizawa J, Sone H, Takahashi M. Enhancement of antigen presenting ability in the leukemic plasmacytoid dendritic cell line (PMDC05) by lentiviral vector-mediated transduction of CD80 gene. *Leukemia Research*. 2012 Dec; 36(12):1541-6. doi: 10.1016/j.leukres.2012.09.002. Epub 2012 Oct 3. PubMed PMID: 23040531.

16. **Lemp NA**, Hiraoka K, **Kasahara N**, Logg CR. Cryptic transcripts from a ubiquitous plasmid origin of replication confound tests for cis-regulatory function. *Nucleic Acids Research*. 2012 Aug; 40(15):7280-90. doi: 10.1093/nar/gks451. Epub 2012 May 22. PubMed PMID: 22618870; PubMed Central PMCID: PMC3424574.
17. Perez OD, Logg CR, Hiraoka K, Diago O, Burnett R, Inagaki A, Jolson D, Amundson K, Buckley T, Lohse D, Lin A, Burrascano C, Ibanez C, **Kasahara N**, Gruber HE, Jolly DJ. Design and selection of Toca 511 for clinical use: modified retroviral replicating vector with improved stability and gene expression. *Molecular Therapy*. 2012 Sep; 20(9):1689-98. doi: 10.1038/mt.2012.83. Epub 2012 May 1. Erratum in: Mol Ther. 2013 Feb;21(2):494. PubMed PMID: 22547150; PubMed Central PMCID: PMC3437576.
18. Logg CR, Robbins JM, Jolly DJ, Gruber HE, **Kasahara N**. Retroviral replicating vectors in cancer. *Methods in Enzymol*. 2012; 507:199-228. doi: 10.1016/B978-0-12-386509-0.00011-9. PubMed PMID: 22365776.
19. Cronin M, Akin AR, Collins SA, Meganck J, Kim JB, Baban CK, Joyce SA, van Dam GM, Zhang N, van Sinderen D, O'Sullivan GC, **Kasahara N**, Gahan CG, Francis KP, Tangney M. High resolution in vivo bioluminescent imaging for the study of bacterial tumour targeting. *PLoS One*. 2012; 7(1):e30940. doi: 10.1371/journal.pone.0030940. Epub 2012 Jan 25. PubMed PMID: 22295120; PubMed Central PMCID: PMC3266281.
20. Collins SA, Hiraoka K, Inagaki A, **Kasahara N**, Tangney M. PET imaging for gene & cell therapy. *Current Gene Therapy*. 2012 Feb 1; 12(1):20-32. Review. PubMed PMID: 22263921.
21. Ostertag D, Amundson KK, Lopez Espinoza F, Martin B, Buckley T, Galvão da Silva AP, Lin AH, Valenta DT, Perez OD, Ibañez CE, Chen CI, Pettersson PL, Burnett R, Daublebsky V, Hlavaty J, Gunzburg W, **Kasahara N**, Gruber HE, Jolly DJ, Robbins JM. Brain tumor eradication and prolonged survival from intratumoral conversion of 5-fluorocytosine to 5-fluorouracil using a nonlytic retroviral replicating vector. *Neuro-Oncology*. 2012 Feb; 14(2):145-59. doi: 10.1093/neuonc/nor199. Epub 2011 Nov 9. PubMed PMID: 22070930; PubMed Central PMCID: PMC3266384.
22. Nitsche C, Edderkaoui M, Moore RM, Eibl G, **Kasahara N**, Treger J, Grippo PJ, Mayerle J, Lerch MM, Gukovskaya AS. The phosphatase PHLPP1 regulates Akt2, promotes pancreatic cancer cell death, and inhibits tumor formation. *Gastroenterology*. 2012 Feb;142(2):377-87.e1-5. doi: 10.1053/j.gastro.2011.10.026. Epub 2011 Oct 29. PubMed PMID: 22044669.
23. Hacke K, Szakmary A, Cuddihy AR, Rozengurt N, **Lemp NA**, Aubrecht J, Lawson GW, Rao NP, Crooks GM, Schiestl RH, **Kasahara N**. Combined preconditioning and in vivo chemoselection with 6-thioguanine alone achieves highly efficient reconstitution of normal hematopoiesis with HPRT-deficient bone marrow. *Experimental Hematology*. 2012 Jan; 40(1):3-13.e3. doi: 10.1016/j.exphem.2011.09.009. Epub 2011 Oct 12. PubMed PMID: 22001673.

**Published in 2013:**

1. **Corrales-Tellez E, Vu D**, Shah T, Naraghi R, **Hutchinson IV**, Min D. Gene Polymorphisms of UGT1A8, UGT1A9 and HNF-1 $\alpha$  are associated with Gastrointestinal Symptoms in Renal Transplant Recipients taking Mycophenolic acid. *Transplant Immunology* 2013; (May) [Epub in 2012 ahead of print].
2. **Corrales- Tellez E, Vu D**, Shah T, **Hutchinson IV**, Min D. Association between Granzyme B and Perforin I Polymorphisms and Allograft Outcomes in Hispanic Kidney Transplant Recipients. *Transplant Immunology.* 2013; (May) [EPub in 2012 ahead of print].
3. Gaber AO, Moore LW, Alloway RR, Woodle ES, Pirsch J, Shihab F, Henning A, Fitzsimmons W, Holman J, Reisfield R, First MR; Astellas Corticosteroid Withdrawal Study Group (including **Mendez R**). Acute rejection characteristics from a prospective, randomized, double-blind, placebo-controlled multicenter trial of early corticosteroid withdrawal. *Transplantation.* 2013; 95: 573-9. [Epub in 2012 ahead of print].
4. Shah T, **Vu D, Corrales-Tellez E, Cicciarelli J, Hutchinson I**, Naraghi R, Min DI. Effects of mycophenolic acid on highly sensitized patients awaiting kidney transplant. *Transplant Immunology.* 2013; 28: 32-37. [Epub in 2012 ahead of print].
5. Shihab FS, Lee ST, Smith LD, Woodle ES, Pirsch JD, Gaber AO, Henning AK, Reisfield R, Fitzsimmons W, Holman J; M. R. First for the Astellas Corticosteroid Withdrawal Group (including **Mendez R**). Effect of corticosteroid withdrawal on tacrolimus and mycophenolate mofetil exposure in a randomized multicenter study. *American Journal of Transplantation.* 2013; 13: 474-84. {Epub in 2012 ahead of print}.
6. **Vu D**, Sakharkar P, **Tellez-Corrales E**, Shah T, **Hutchinson I**, Min DI. Association of vitamin D binding protein polymorphism with long-term kidney allograft survival in Hispanic kidney transplant recipients. *Molecular Biology Reports.* 2013; 40: 933-9. [Epub in 2012 ahead of print].
7. **Vu D, Tellez-Corrales E**, Sakharkar P, Kissen MS, Shah T, **Hutchinson I**, Min DI. Impact of NF- $\kappa$ B gene polymorphism on allograft outcome in Hispanic renal transplant recipients. *Transplant Immunology.* 2013; 28: 18-23. [Epub in 2012 ahead of print].
8. Kuniholm MH, Parrinello CM, Anastos K, Augenbraun M, Plankey M, **Nowicki M**, Peters M, Golub ET, Lurain N, Landay AL, Strickler HD, Kaplan RC. Hepatitis C Viremia Is Associated with Cytomegalovirus IgG Antibody Levels in HIV-Infected Women. *PLoS One.* 2013 Apr 17; 8(4):e61973. doi: 10.1371/journal.pone.0061973. Print 2013. PubMed PMID: 23613990; PubMed Central PMCID: PMC3629158.
9. Herold BC, Keller MJ, Shi Q, Hoover DR, Carpenter CA, Huber A, Parikh UM, Agnew KJ, Minkoff H, Colie C, **Nowicki MJ**, D'souza G, Watts DH, Anastos K. Plasma and Mucosal HIV Viral Loads Are Associated with Genital Tract Inflammation In HIV-

Infected Women. *Journal of Acquired Immune Deficiency Syndromes*. 2013 Apr 15. [Epub ahead of print] PubMed PMID: 23591635.

10. Yin D, Zhai Y, Gruber HE, Ibanez CE, Robbins JM, Kells AP, **Kasahara N**, Forsayeth J, Jolly DJ, Bankiewicz KS. Convection-enhanced delivery improves distribution and efficacy of tumor-selective retroviral replicating vectors in a rodent brain tumor model. *Cancer Gene Therapy*. 2013 May 24. doi:10.1038/cgt.2013.25. [Epub ahead of print] PubMed PMID: 23703472.
11. Lam P, Khan G, Stripecke R, Hui KM, **Kasahara N**, Peng KW, Guinn BA. The innovative evolution of cancer gene and cellular therapies. *Cancer Gene Therapy*. 2013 Mar; 20(3):141-9. doi: 10.1038/cgt.2012.93. Epub 2013 Feb 1. PubMed PMID: 23370333.

***In press:***

12. **Vu D**, Shah T, Naraghi R, **Hutchinson IV**, Min D. Efficacy of Intravenous Immunoglobulin in the treatment of BK Virus Nephropathy. *Pharmacotherapy*, 2013; In press
13. **Vu D**, Shah T, **Hutchinson IV**, Min D. Impact of Interferon- $\gamma$  Cytokine Gene Polymorphism on BK Virus Nephropathy in a Large Cohort of Kidney Transplant Recipients. *American Journal of Transplantation*, 2013; In press

***Submitted:***

14. Shah T, Qazi YA, **Vu D**, Cho Y, Mateo R, Huang E, Romero C, Hutchinson C, **Hutchinson IV**, Min D. Drug tolerability and outcomes in kidney transplant recipients treated with two formulations of mycophenolic acid. *Transplant Immunology*, 2012. (Submitted).
15. **Vu D**, Shah T, **Hutchinson IV**, Min D. TaqI polymorphism of the vitamin D receptor and risk of new-onset diabetes after transplantation in Hispanic kidney transplant recipients. *Molecular Biology Reports*, 2012. (Submitted).
16. **Vu D**, Shah T, Qazi Y, Naraghi R, Poulsen J, **Hutchinson IV**, Min DI. Interferon-gamma gene polymorphism+874 A/T is associated with an increased risk of cytomegalovirus infection among Hispanic renal transplant recipients. *American Journal of Transplantation*.