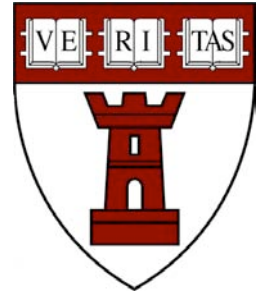


HSDM OFFICE OF RESEARCH BULLETIN



Sept/Oct 2005

GRANT FUNDING:

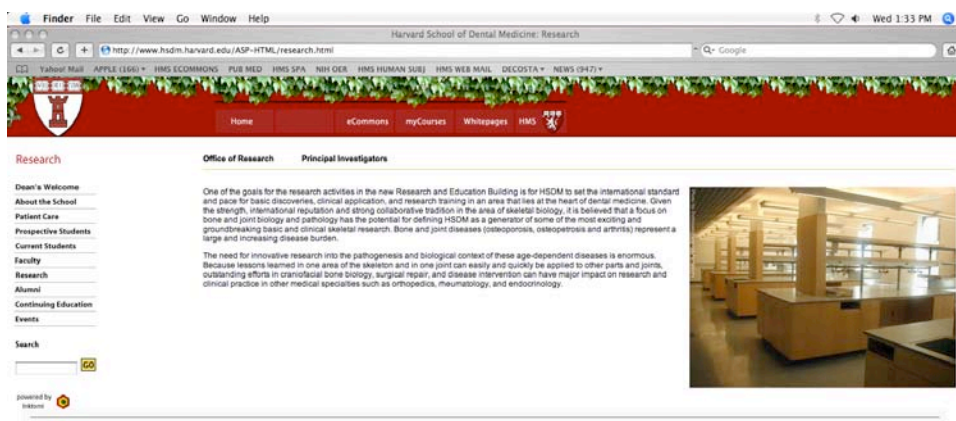


Congratulations to **Theodora Danciu, DMD, DMSc** for her recent NIH K22 grant entitled, **The Role of FoxC1 in BMP-Mediated Msx2 Induction**. Dr. Danciu is a graduate of HSDM and a Postdoctoral Fellow in the Whitman Lab on the 5th floor of the REB. Preliminary data for this project was obtained under the guidance of her primary mentor Dr. Malcolm Whitman, and her DMSc thesis advisor, Dr. Peter Hauschka (Children's Hospital & HSDM). The co-mentor on the project is Dr. Bjorn Olsen.

Congratulations to **Beate Lanske, PhD** for her recent NIH R01 grant entitled, **Role of Indian Hedgehog in Endochondral Bone Formation**. Dr. Lanske is Associate Professor of Developmental Biology and her Lab is located on the 3rd floor of the REB.



Congratulations to **Bjorn Olsen, MD, PhD** for his recent NIH R21 grant entitled, **Primary Cilia/Ciliary Transport in Bone Patterning, Growth and Mechanosensing**. Dr. Olsen, Professor of Developmental Biology is working with **Elona Kolpakova, MS, PhD**, Co-Investigator on the project. Dr. Koplakova has been a Postdoctoral Fellow in the Olsen Lab since 2003.



Visit the updated Office of Research website at
<http://www.hsdm.harvard.edu/asp-html/research.html>

GRAND ROUNDS 12-1^{PM} REB AUDITORIUM

12/12/05
RAKESH JAIN, PHD
Professor of Tumor Biology, HMS &
Director, Steele Lab of Tumor Biology, MGH

02/27/06
JOHN MULLIKEN, MD
Director, Craniofacial Center, Children's Hospital
& Professor of Surgery, HMS

04/17/06
DAVID MOONEY, PHD
Professor of Bioengineering, Harvard University

06/05/06
BEATE LANSKE, PHD
Associate Professor of Developmental Biology,
Harvard School of Dental Medicine

RECENT PUBLICATIONS:

- Albertson RC, Payne-Ferreira TL, Postlethwait J, Yelick PC. **Zebrafish *acvr2a* and *acvr2b* exhibit distinct roles in craniofacial development.** *Dev Dyn* 2005;233(4):1405-1418.
- Bader H. **Immediate extraction site grafting: materials and clinical objectives.** *Dent Today* 2005;24(7):86-89.
- Bartlett J, Dwyer S, Beniash E, Skobe Z, Payne-Ferreira T. **Fluorosis: A new model and new insights.** *J Dental Res* 2005;84(9):832-836.
- Blicher B, Joshipura K, Eke P. **Validation of self-reported periodontal disease: A systematic review.** *J Dent Res* 2005;84(10):881-890.
- Chuang SK, Hatch JP, Rugh J, Dodson TB. **Multi-center randomized clinical trials in oral and maxillofacial surgery: modeling of fixed and random effects.** *Int J Oral Maxillofac Surg* 2005;34(4):341-344.
- Evans CS, Viana G, Anderson NK, Giddon DB. **Tolerance of deviations in eye and mouth position.** *Orthod Craniofac Res* 2005;8(2):75-84.
- Gamer LW, Nove J, Levin M, Rosen V. **BMP-3 is a novel inhibitor of both activin and BMP-4 signaling in *Xenopus* embryos.** *Dev Biol* 2005;285(1):156-168.
- Giddon DB, Anderson NK. **Attitudes toward expanded roles for paramedical personnel.** *Am J Health Studies* 2005;19(4):220-225.
- Haskell HD, Butt KM, Woo SB. **Pleomorphic adenoma with extensive lipometaplasia: Report of three cases.** *Am J Surg Pathol* 2005;29(10):1389-1393.
- Hernandez-Diaz S, Wu XF, Hayes C, Werler MM, Ashok TD, Badovinac R, Kelsey KT, Mitchell AA. **Methylenetetrahydrofolate reductase polymorphisms and the risk of gestational hypertension.** *Epidemiology* 2005;16(5):628-634.
- Hopfer U, Fukai N, Hopfer H, Wolf G, Joyce N, Li E, Olsen BR. **Targeted disruption of *Col8a1* and *Col8a2* genes in mice leads to anterior segment abnormalities in the eye.** *FASEB J* 2005;19(10):1232-1244.
- Karima M, Kantarci A, Ohira T, Hasturk H, Jones VL, Nam BH, Malabanan A, Trackman PC, Badwey JA, Van Dyke TE. **Enhanced superoxide release and elevated protein kinase C activity in neutrophils from diabetic patients: association with periodontitis.** *J Leukoc Biol* 2005;78(4):862-870.
- Kobayashi T, Soegiarto DW, Yang Y, Lanske B, Schipani E, McMahon AP, Kronenberg HM. **Indian hedgehog stimulates periarticular chondrocyte differentiation to regulate growth plate length independently of PTHrP.** *J Clin Invest* 2005;115(7):1734-1742.
- Lee JH, Frias V, Lee KW, Wright RF. **Effect of implant size and shape on implant success rates: A literature review.** *Journal of Prosthetic Dentistry* 2005;94(4):377-381.
- Mejia-Maidel M, Evans CA, Viana G, Anderson NK, Giddon DB. **Preferences for Mexican facial profiles between Mexican Americans and Caucasians.** *Angle Orthod* 2005;75(6):763-768.
- Mustonen TK, Spencer SM, Hoskinson RA, Sachs DP, Garvey AJ. **The influence of gender, race, and menthol content on tobacco exposure measures.** *Nicotine Tob Res* 2005;7(4):581-590.
- Nevins ML, Camelo M, Rebaudi A, Lynch SE, Nevins M. **Three-dimensional micro-computed tomographic evaluation of periodontal regeneration: a human report of intrabony defects treated with Bio-Oss collagen.** *Int J Periodontics Restorative Dent* 2005;25(4):365-373.
- Nielsen-Marsh CM, Richards MP, Hauschka PV, Thomas-Oates JE, Trinkaus E, Pettitt PB, Karavanic I, Poinar H, Collins MJ. **Osteocalcin protein sequences of Neanderthals and modern primates.** *Proc Natl Acad Sci USA* 2005;102(12):4409-4413.
- Qiu D, Cheng SM, Wozniak L, McSweeney M, Perrone E, Levin M. **Localization and loss-of-function implicates ciliary proteins in early, cytoplasmic roles in left-right asymmetry.** *Dev Dyn* 2005;234(1):176-189.
- Razzaque MS, St-Arnaud R, Taguchi T, Lanske B. **FGF-23, vitamin D and calcification: the unholy triad.** *Nephrol Dial Transplant* 2005;20(10):2032-2035.
- Samet N, Shohat M, Livny A, Weiss EI. **A clinical evaluation of fixed partial denture impressions.** *J Prosthet Dent* 2005;94(2):112-117.
- Susarla SM, Lam NP, Donoff RB, Kaban LB, Dodson TB. **A comparison of patient satisfaction and objective assessment of neurosensory function after trigeminal nerve repair.** *J Oral Maxillofac Surg* 2005;63(8):1138-1144.
- Treister NS, Woo SB, O'holleran EW, Lehmann LE, Parsons SK, Guinan EC. **Oral chronic graft-versus-host disease in pediatric patients after hematopoietic stem cell transplantation.** *Biol Blood Marrow Transplant* 2005;11(9):721-731.
- Tseng CC, Chen YH, Pang IC, Weber HP. **Peri-implant pathology caused by periapical lesion of an adjacent natural tooth: a case report.** *Int J Oral Maxillofac Implants* 2005;20(4):632-625.
- Whitman M, Raftery L. **TGF β signaling at summit.** *Development* 2005;132(19):4205-4210.
- Zimmermann CE, Thurmuller P, Troulis MJ, Perrott DH, Rahn B, Kaban LB. **Histology of the porcine mandibular distraction wound.** *Int J Oral Maxillofac Surg* 2005;34(4):411-419.

AWARDS & OTHER NEWS:



Congratulations to **Theodoros Kapos, DMD** (left), (HSDM '05) and first year Prosthodontics Resident for his award for outstanding research presentation at the 7th Annual Research Symposium at Tufts Medical School on September 24th. The Award was given to Dr. Kapos by The New England Hellenic Medical and Dental Society for the following presentations: **Examining the Significance of the Facial Ligaments, Septae, and Ahhesions; The Clinical Anatomy of Auricalotemporal Nerve; The Morphology and Location of the Buccal Fat Pad.**

Congratulations to **Yi-Ping Li, PhD**, Assistant Professor in Developmental Biology and Associate Member of the Staff in Cytokine Biology at The Forsyth Institute for his recent grant funded by the HMS Fund for Women's Health Research. Dr. Li's is Co-Investigator on a project is entitled, **Function of PDEF Ets Transcription In Mammary Gland Development and Breast Cancer Oncogenesis** and the PI on the project is Xuesong Gu, PhD of Beth Israel Deaconess Medical Center.



Congratulations to **Howard Howell, DDS** (left), **Joe Fiorellini, DMD**, and **Myron Nevins, DDS** for their manuscript entitled, **Randomized Study Evaluating Recombinant Human Bone Morphogenetic Protein-2 for Extraction Socket Augmentation** that was published in the April 2005 Journal of Periodontology. This paper received the 2005 Tarrson Reserach Award in Plastic Surgery from The American Academy of Periodontology. At the same meeting, **David Kim, DMSc, DDS**, Instructor in Oral Medicine, Infection & Immunity received the Balint Urban Memorial Prize for his project, **Genetic Expression Profiles in Refractory Periodontitis Patients.**

Taru Kinnunen PhD, Assistant Professor in Oral Health Policy and Epidemiology and member of the Tobacco Dependence and Treatment Research Group was recently featured in a press release entitled, **Harvard Researchers Gather More Evidence Implicating Menthol in Health Disparities Between White and Black Smokers.** Dr. Kinnunen examined the relationships among race, gender, menthol, and tobacco exposure measures, including cotinine (a chemical produced by the body from the nicotine in cigarettes that can be measured in saliva) among a group of 307 Boston-area smokers. She suggest that the relationship between number of cigarettes consumed and the level of salivary cotinine, often used to help understand and measure patients' exposure to cigarette toxins and their success at quitting, is more complex than previously believed. Dr. Kinnunen's research is featured in the August 2005 Journal of Nicotine and Tobacco Research, and is funded by her NIDA R01.



NEW CORE EQUIPMENT

Laser Capture Microdissection (Arcturus PixCell II)

This Laser Capture Microdissection system can be used to dissect single cells or cell populations, isolate nucleic acids or proteins by utilizing a low-power infrared laser to melt a special thermoplastic film over the cells or tissue areas of interest. It is located in the REB Microscope Core in room 516.

NEW COURSE FOR HSDM MMSc STUDENTS - HOW TO WRITE A COMPETITIVE RESEARCH PROPOSAL

This course (IDP601.IN) will guide MMSc students through the basic steps of creating their own research proposal and assist them in navigating each phase of the proposal writing process: planning, organizing, formatting and writing. Seasoned researchers will share tips from personal experiences with successful grant writing and will answer questions that students have regarding challenges that they are facing in their own processes. The Office of Research will develop a packet of hand-outs including a successful NIH R01 grant application and other guides for proposal writing. This course is mandatory for all HSDM MMSc students, and attendance to all 4 classes is required to pass this course. This course should be taken in MMSc students' first year of study. Grades for this course will be pass/fail and will be based on class attendance and participation. This course consists of a total of 4 classes. The following is a list that includes the date, time, location and instructor for each course.

DATE	TIME	LOCATION	INSTRUCTOR
October 18, 2005	6:30 - 8:30 p.m.	REB 109	Bjorn Olsen, MD, PhD
November 17, 2005	6:30 - 8:30 p.m.	REB 109	Howard Howell, DDS
February 7, 2006	6:30 - 8:30 p.m.	REB 109	Chester Douglass, PhD, DDS
March 21, 2006	6:30 - 8:30 p.m.	REB 109	Vicki Rosen, PhD

SAVE THE DATE: APRIL 7, 2006

Harvard Forsyth Research Symposium

BONES & TEETH: DEVELOPMENT, GROWTH, AND REPAIR

Dr. Hans-Peter Weber
Planning Committee Chair

**DO YOU HAVE QUESTIONS ABOUT EVENTS,
OR INFORMATION IN THIS BULLETIN?**

If so, please contact Dawn DeCosta

617-432-1121 (or)

dawn_decosta@hsdm.harvard.edu