Yayin Fang Ph.D.
Department of Biochemistry and Molecular Biology
College of Medicine, Howard University

Junior Faculty Forum
Nov. 3rd 2016
Key Points for Achieving Your Goal(s)

- Be clear of the criteria and timelines
- Know your situation
- Concentrate on and constantly work towards your goals
- Prepare your application along the way
Be clear of the criteria and calendar

OFFICE OF THE PROVOST, HOWARD UNIVERSITY

ACADEMIC YEAR 2015-2016 REVIEW SCHEDULE FOR APPLICATIONS
FROM CANDIDATES FOR PROMOTION AND/OR TENURE

TUESDAY, SEPTEMBER 1, 2015: Suggested deadline for candidates for promotion and/or tenure to submit completed applications and supporting documentation\(^1\) to the department chairperson. (At their discretion, deans may require an earlier submission deadline to allow adequate time for the evaluation of the application.) Each file must be evaluated by four external reviewers.\(^2\) The candidate must submit the names of two external reviewers. The committee of all tenured departmental faculty and the department

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\(^1\) Documentation includes but is not limited to a curriculum vitae, a statement of research goals, and a list of publications.

\(^2\) External reviewers can be faculty members from other universities or experts in the field.
Be clear of the criteria and calendar

Criteria

- Research productivity:
  1. Research Grants (grant(s) sufficient to support your research)
  2. Publications (peer reviewed journal or edited volume contributions)
  3. Scholarship (invited book chapters, published abstracts, posters)
  4. Creative Activities (invited talks, seminars, invitations, media presentations, etc.)
- Teaching:
  1. Student evaluations
  2. Peer evaluations
  3. Teaching award(s)
  4. Coordinatorships
- Professional development:
  As deemed suitable by your department and field-distinguished societies
- Service:
  1. Department
  2. College
  3. University
  4. Extramural

Calendar
Know your situation

- Advantages
- Challenges
Assistant Professor of Biochemistry and Molecular Biology

http://www.gs.howard.edu/graduateprograms/biochemistry/faculty.html
Graduate Program in Biochemistry & Molecular Biology

Department of Biochemistry & Molecular Biology

Dr. Yayin Fang, Ph.D.
Assistant Professor

Dr. Yayin Fang joined the Department of Biochemistry and Molecular Biology at Howard University’s College of Medicine as a tenure-track Assistant Professor in 2012. She received her B.S. degree in general chemistry from Beijing Normal University, China in 1989. She received her M.S. and Ph.D. degrees, both in Physical Chemistry, from Nankai University, China in 1998 and 2001 respectively. From 2001 to 2004, she was a postdoctoral researcher with Professor Eric C. Long of Indiana University-Purdue University Indianapolis, focusing on theoretical studies of DNA recognition by metalloproteins. Then she joined the RCMI program at Howard University in 2005. She has been working on theoretical studies of interactions between low molecular weight compounds and their targets, which include macromolecules, polymers, nucleic acids, and proteins. She has authored over 30 peer-reviewed scientific papers. Dr. Fang also serves as co-director of the RCMI Center of Computational Biology and Bioinformatics.

Contact Information
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Education
Doctor of Philosophy, Physical Chemistry (07/2001)
Nankai University, Tianjin, China
Master of Science, Physical Chemistry (07/1998)
Nankai University, Tianjin, China
Bachelor of Science, Chemistry (07/1985)
Beijing Normal University, Beijing, China

Research Interests
Computational Biology
Bioinformatics
Biomedical Informatics
Systems Biology

Honors and Awards
- HUMAA (Howard University Medicine Alumni Association) Endowed Founder's Chair in Basic Science, Howard University, College of Medicine, July 2015.
- HU ADVANCE-IT Achievement Award, Howard University, May 4, 2015.
Co-Director of the Center for Computational Biology and Bioinformatics

https://ccbb.howard.edu/content/our-team
YAYIN FANG, PH.D.

Dr. Yayin Fang, joined the Department of Biochemistry and Molecular Biology at Howard University’s College of Medicine is tenure track Assistant Professor in 2012. She received her BS degree in general chemistry from Beijing Normal University, China in 1985. She received her MS and Ph.D. degrees, both in Physical Chemistry, from Nankai University, China in 1998 and 2001 respectively. From 2001 to 2004, she was a postdoctoral researcher with Professor Eric C. Long of Indiana University Purdue University at Indianapolis, focusing on theoretical studies of DNA recognition by metallopeptides. Then she joined the RCMI program at Howard University in 2005. She has been working on theoretical studies of interactions between low molecular weight compounds and their targets, which include macromolecules, polymers, nucleic acids, and proteins. She has authored over 30 peer-reviewed scientific papers. Dr. Fang also serves as co-director of the RCMI Center of Computational Biology and Bioinformatics.

- Molecular Design, Synthesis and Biological Studies of Small Organic Molecule for Curing Chagas Disease.
- MD simulation and 3D-QSPR studies on chiral recognition of molecular micelle polymeric dipeptide surfactants in aqueous solution.
- Theoretical investigations of DNA-targeted peptides, metallopeptides and anti-tumor agents through their interactions with nucleic acids
- Development of a multi-specific recombinant immunotoxin for cancer therapy.
- Molecular modeling and docking of a major component in DANSHEN (one of the most popular herbal traditional Chinese medicines in China) – SAL-B as a selective inhibitor of COX-2 in head and neck cancer cell lines.

ｙfang@howard.edu
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- Professional development:
  As deemed suitable by your department and field-distinguished societies

- Service:
  1. Department
  2. College
  3. University
  4. Extramural
Work on it constantly and stay focused

- Work on achieving your goals, constantly
- Maintain an open mind for all possible research opportunities
- Communicate with your colleagues and your mentor
Prepare your application along the way

- Prepare your application early
- Prepare your application according to the criteria
- Submit your application on time
Examples of my efforts

- **5 Ongoing Research Activities**
  1. Endowed Founder’s Co-Chair of Basic Science Recipient sponsored by the HUMAA Endowed Founder’s Chair Award;
  2. Co-director on the CCBB of the RCMI grant from NIH;
  3. PI on HU ADVANCE-IT mini grant from NSF and BFPSAP grant;
  4. Consultant on a 1R15DE025138-01 and an RCMI-P3 grant;
  5. Co-Investigator on two funded ORNL Infrastructure Grants.

- **5 Completed Research Grants**

- **8 Submitted, but not Funded Grant Proposals**