



Practicing NIH*-Standard Proposal Writing for Research on Medical Technologies

When: Feb 7- 8, 2018

Application Deadline: Jan 28, 2018

Workshop Overview: this is a **2-day** workshop comprising combination of lectures, group discussions, and hands-on practices opportunities. This workshop will provide an overview for how to write a competitive grant proposal according to the NIMAD as well as the United States' National Institute of Health (NIH) standards. It also provides an opportunity for hands-on practice to write important sections of a proposal, as well as an opportunity for research teams to receive feedback from the workshop's instructor. Please refer to accompanying document for the workshop's Agenda.

Objectives:

- a. Introduce the required minimum standards for writing a proposal set by the NIMAD and NIH
- b. Improve the research question(s), and making sure that main component of the proposal (i.e., Significance, Innovation, and Approach) are in line with those research questions.
- c. Shape up the proposal ideas into a draft that can be further developed into a standard full proposal

Eligible participants: All faculty members, researchers, engineers and clinicians, who have research ideas in following fields are eligible: medical device development for diagnosis, imaging, follow up and monitoring, implants, rehabilitation devices, sensors and detectors, telemedicine, drug delivery systems, and in general any device, technical method or technology improving medical care.

The workshop is less suitable for individuals in the field of basic science, and clinical researches.

Participation requirement: Participants should have developed a research idea in advance and attend as a research team (not individually). 4-5 core members of the research team should attend the workshop including: the Principal Investigator (PI), the co-investigator(s), and the methodologist (e.g. statistician/epidemiologist) if required for the study.

Applications selection process: 4-5 research teams will be invited from the pool of research teams who apply. Priority is given to most promising applicants who have already submitted a pre-proposal to NIMAD. Process to select research teams will be as follow:

- 1- Interested research teams must provide a brief letter of intent describing how they can benefit from this workshop, and submit following documents using [NIMAD templates](#) by **Jan 28, 2018** to nimadiran@gmail.com:
 - a. **Application form**
 - b. **CVs (for each participating team member)**
 - c. **Structured brief pre-proposal**

*NIH stands for National Institute of Health

2. Course instructor(s) will screen applications and invite 4 research teams and waitlist 2 teams.
3. Selected teams will be notified and asked to register at least **5 days** prior to the date of workshop in order to secure their seats and follow other requirements.

Workshop style: to maximize your gain from the workshop, attendees' participation will start upon registration and participants will be expected to engage with workshop material and the instructor as outlined below:

1. Participants will receive all course material (e.g., slides, proposal samples, etc.) upon registration.
2. Participants should familiarize themselves with the material, and use that knowledge to expand and refine their initial pre-proposal draft, and send a revised (max. 3-4 page) to the course instructor at least one week before the date of workshop.
3. In addition to lectures, research teams will have multiple opportunities to present their proposal to instructor and other participants throughout the workshop. Research teams are expected to work with each other to incorporate feedback from the instructor and peer participants throughout the workshop. This will be an iterative process, allowing participants to make incremental improvement of their proposal.
4. The end product of the workshop will be a bullet list of sections and key content of a full proposal that could be expanded and completed after the workshop.

Logistics:

- Daily start and end time: We will start and end the workshop on time. Participants are encouraged to be at the site and seated at least 10 min before the starting time to avoid delays.
- Refreshments and lunch: Tea, coffee, light refreshments, and lunch will be provided during the workshop.
- Workshop Language: The speaking language is Farsi and English and writing language is only English.
- Computer and software: Each team member should bring her/his own laptop team. One portable Internet gadget is favorable to bring to the workshop by the team.

Correspondence: Please send your inquires to nimadiran@gmail.com

Instructor

Seyed Ali Mousavi Shaegh, PhD, is an assistant professor of Biomedical Engineering at Mashhad University of Medical Sciences (MUMS). He completed his PhD in Mechanical Engineering at Nanyang Technological University, Singapore, in 2012. Then he joined Singapore's Agency for Science, Technology and Research (A*STAR) as a research scientist to work on microfluidic devices for point-of-care applications. He performed his postdoc fellowship at Harvard Medical School from 2014-2016 working on microfluidic systems for drug screening and drug discovery. Dr. Mousavi's research and teaching interests includes microfluidic systems for disease diagnostics and drug discovery, surgical devices and implants, and development of 3D (bio)printing techniques for patient-specific applications. His research projects have been funded by A*STAR, SMART-MIT, NIMAD and MUMS.

Workshop Agenda

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Lead	Topics	Day 1
Bitia Mesgarpour	Welcome, opening remarks	08:00
Instructor & all	Introductions and learning objectives	08:15
Instructor	Lecture 1: Overview & Specific Aims	08:30
All groups	Working Groups: Improve Specific Aims	09:30
--	Break	10:30
All groups	Groups' "Specific Aims" presentation	10:45
--	Lunch	12:15
All groups	Discussion and Q & A	13:00
All groups	Development of Specific Aims	13:15
All groups	Presentation of Specific Aims	14:00
All groups	Break	15:00
Instructor	Lecture 2: "Approach"	15:30
All groups	Development of "Approach"	16:00
All groups	Presentation of "Approach"	16:30
Instructor	Summary of what we learned and workshop Evaluation	17:30
---	Adjourn	18:00
Lead	Topics	Day 2
Instructor	Summary of what we learned in Day 1	08:00
Instructor & all	Q&A about Day 1	08:15
Instructor	Lecture 3: "Significance & Innovation"	08:30
All groups	Working Groups: "Significance & Innovation"	09:30
--	Break	10:30
All groups	Groups' "Significance & Innovation" presentation and improvement	10:45
--	Lunch	12:30
Instructor	Ideation and Team Building for NIMAD	13:00
All groups	Improving proposals and troubleshooting	13:30
All groups	Final proposal presentation	15:30
Instructor	Summary of what we learned and workshop Evaluation	16:30
--	Adjourn	17:00