The University of Texas Health Science Center at Houston The University of Texas M. D. Anderson Cancer Center Graduate School of Biomedical Sciences

Core Tenets of Graduate Training*

GSBS Commitment

The mission of The University of Texas Graduate School of Biomedical Sciences (GSBS) at Houston is to train scientists, to generate new knowledge in the biomedical sciences, and to increase public understanding of science. The GSBS is committed to maintaining the highest standards of training and to providing a program for the graduate student to learn to function independently as a scientific professional. GSBS Office of Academic Affairs provides oversight for terms of appointment, grievance procedures, and other matters relevant to the support of its graduate students.

Quality Training

Individuals should be trained to independently formulate meaningful hypotheses, design and conduct interpretable experiments, adhere to good laboratory practices, analyze results critically, understand the broad significance of their research findings, and uphold the highest ethical standards in research. The development of additional skills—including oral and written communication, grant writing, and laboratory management—are considered integral to this training.

Importance of Mentoring

Effective mentoring is critical for graduate education and requires that the primary mentor dedicate time to ensure personal and professional development. A good mentor builds a relationship with the student that is characterized by mutual respect and understanding. Attributes of a good mentor include being approachable, available, and willing to share his/her knowledge; listening effectively; providing encouragement and constructive criticism; and offering expertise and guidance.

^{*}Adapted from the <u>Compact Between Postdoctoral Appointees and Their Mentors</u>, developed by the American Association of Medical Colleges' Group on Graduate Research, Education, and Training (GREAT Group)

Commitments of Graduate Student

I acknowledge that I have the primary responsibility for the completion of my degree.

I recognize that I must realistically consider training opportunities and my career goals to help me identify a path that matches my individual skills, values, and interests.

I will develop a mutually defined research project with my mentor that includes well-defined goals and timelines. Ideally, this project should be outlined and agreed upon at the time of the initial appointment.

I will perform my research activities conscientiously, maintain good research records, and catalog and maintain all tangible research materials that result from the research project. This includes ensuring that my advisor and colleagues can readily access and comprehend my research records and materials.

I will respect all ethical standards when conducting my research including compliance with all institutional and governmental regulations as they relate to responsible conduct in research, privacy and human subjects research, animal care and use, laboratory safety, and use of radioisotopes.

I recognize that this commitment includes asking my advisor for guidance when presented with ethical or compliance uncertainties and when reporting on breeches of ethical or compliance standards by me and/or others.

I will show respect for and will work collegially with my coworkers, support staff, and other individuals with whom I interact. I recognize that this includes being a 'team player' with all involved in our research group.

I will endeavor to assume progressive responsibility and management of my research project(s) as it matures. I recognize that assuming responsibility for the conduct of research projects is a critical step on the path to independence.

I will seek regular feedback on my performance from my advisor as well as seek a formal evaluation from members of my advisory/supervisory committees.

I recognize that I have embarked on a career requiring "lifelong learning." To meet this obligation I must stay abreast of the latest developments in my specialized field through reading the literature, regular attendance at relevant seminar series, and attendance at scientific meetings.

I will actively seek opportunities outside the laboratory (e.g. professional development seminars and workshops in oral communication, scientific writing, and teaching) to develop the full set of professional skills necessary to be successful in my graduate training.

At the end of my appointment, in accordance with institutional policy, I will leave behind all original notebooks, computerized files, and tangible research materials so that other individuals can carry on related research. I will also work with my mentor to submit the research results for publication in a timely manner. I can make copies of my notebooks and computerized files, and have access to tangible research materials which I helped to generate during my graduate training according to institutional policy.

Commitments of Advisors

I acknowledge that the training and educating of graduate students is intended for them to develop the skills needed to become an independent research scientist and scientist educator.

I will ensure that a mutually agreed upon set of expectations and goals are in place at the outset of the training period and assessed periodically, and I will work with the graduate student to create an individual project and training plan.

I will strive to maintain a relationship with the graduate student that is based on trust and mutual respect. I acknowledge that open communication and periodic formal performance reviews, conducted at least semi-annually, will help provide for the expectations of both parties are met.

I will promote all ethical standards for conducting research including compliance with all institutional and federal regulations as they relate to responsible conduct in research, privacy and human subjects research, animal care and use, laboratory safety, and use of radioisotopes. I will clearly define expectations for conduct of research in my lab and make myself available to discuss ethical concerns as they arise.

I will ensure that the graduate student has sufficient opportunities to acquire the skills necessary to become an expert in an agreed upon area of investigation.

I will provide the graduate student with the required guidance and mentoring and will seek the assistance of other faculty and GSBS resources when necessary to support the student's career development.

I will provide a training environment that is suited to the individual needs of the graduate student for his/her personal and professional growth. I will encourage a progressive increase in the level of responsibility and independence to facilitate the completion of their degree.

I will encourage the interaction of the graduate student with fellow scientists both intra- and extramurally and provide the student the opportunity to present research findings.

I will acknowledge appropriately the contributions that the graduate student may make in intellectual developments, research, and scholarship. If I deem the graduate student's research as meriting publishing, I will work with the student to publish the student's work in a timely manner to support their career development.