



# FELLOWSHIP AND RESIDENCY RESEARCH PROGRAM FACULTY OF MEDICINE



We're transforming medicine  
through research.

## PROGRAM GUIDE

**Last updated: November, 2018**

**American University of Beirut**

Beirut, Lebanon

**Tel: (01) 350-000 ext. 5776**

***Email: [frp-fm@aub.edu.lb](mailto:frp-fm@aub.edu.lb)***

<b>PROGRAM TITLE</b>	<b>FELLOWSHIP AND RESIDENCY RESEARCH PROGRAM - FRRP</b>
<b>PROGRAM DURATION</b>	<b>3 years</b>
<b>PROGRAM DIRECTOR</b>	<b>Dr. Hani Tamim</b>
<b>PROGRAM ADMINISTRATOR</b>	<b>Ms. Pamela Abi Khalil</b>
<b>FRRP COMMITTEE</b>	<b>Dr. Hani Tamim</b>  <b>Dr. Marwan Refaat</b> <b>Dr. Mohamad Issam Khatib</b> <b>Dr. Mazen Kurban</b> <b>Dr. Roula Hourany</b> <b>Dr. Ralphe Bou Chebl</b> <b>Dr. Joumana Antoun</b> <b>Dr. Ahmad Beydoun</b> <b>Dr. Fadi Mirza</b> <b>Dr. Ziad Bashour</b> <b>Dr. Rami Mahfouz</b> <b>Dr. Ghassan Dbaibo</b> <b>Dr. Salman Mroueh</b> <b>Dr. Farid Talih</b> <b>Dr. Bassem Youssef</b> <b>Dr. Walid Faraj</b> <b>Ms. Abeer Dakik</b>

## TABLE OF CONTENT

	Page
INTRODUCTION	4
PROCESS	6
1. Filling out the FRRP questionnaires	6
2. Matching	6
○ Self-matching	6
○ Matching through the FRRP Departmental Committee	7
3. Deciding on a project/topic	7
○ “Physician-in-Training”-initiated research project	7
○ Faculty-initiated research project	7
4. Letter of Intent	8
5. Full Proposal	8
6. Project data	8
7. First and Second Progress Presentations	9
8. Final Report	9
9. Final Presentation	9
10. Evaluation Questionnaire	10
DURATION	10
GENERAL GUIDELINES	10
RULES	11
ROLES AND RESPONSIBILITIES	12
1. “Physician-in-Training”	12
2. Advisor	13
3. FRRP Committee	15
4. FRRP Departmental Committees	15
“PHYSICIAN-IN-TRAINING” EVALUATION	16
FRRP- RESEARCH DAY	16
APPENDICES	
1. List of FRRP Committee members	17
2. List of FRRP Departmental Committees members	18
3. “Physician-in-Training” Interest Questionnaire	22
4. Advisor’s Questionnaire	25
5. Letter of Intent form	27
6. Letter of Intent Evaluation Sheet	29
7. Full Proposal Form	30
8. Full Proposal Rating Sheet	43
9. First and Second Progress Presentations Form	44
10. First and Second Progress Presentations Rating Sheet	45
11. Final Report Form	46
12. Final Report Rating Sheet	56
13. Final Presentation Form	58
14. Final Presentation Rating Sheet	59
15. Resident’s evaluation questionnaire	60
16. FRRP - “Physician-in-Training” Time Table - 3 years period	67
FRRP - “Physician-in-Training” Time Table - 2 years period	68
FRRP - “Physician-in-Training” Time Table - 1 year period	69

## INTRODUCTION

The Fellowship and Residency Research Program (FRRP) is a required component of the fellowship and residency program at the American University of Beirut – Medical Center (AUB – MC) and the Faculty of Medicine. The medical fellows and the categorical residents are required to carry out one research project throughout their fellowship or residency period. Its purpose is to provide short, in-depth research projects in order to nurture fellows and residents individuality. Moreover, the FRRP may give fellows and residents the opportunity to become familiar with research methodology. The program provides fellows and residents with the opportunity to explore the world of biomedical research, ranging from basic, community-oriented research to the more sophisticated clinical sciences.

For the purpose of this guide and from now on, we will use the term “Physicians-in-Training” which correspond to Medical Fellows and Categorical Residents.

This program will enable “Physicians-in-Training” to:

- Develop a deeper understanding of the scientific basis of medicine that goes beyond what is offered in the core curriculum.
- Achieve a greater understanding of the process and methods of scientific research.
- Gain further experience in communicating advances in biomedical research.
- Appreciate the opportunities and challenges that exist in academic medicine.
- Recognize the way in which scientific research translates into major advances in the health of a society.

The FRRP emphasis is on delineating the limits of what we do and do not understand about a particular problem in medicine, proposing research hypotheses based on existing knowledge, and designing scientific approaches to rigorously test these hypotheses.

The FRRP is designed to accommodate “Physicians-in-Training” who have no prior experience in research as well as those with extensive research backgrounds. A diverse array of research opportunities exists, where a number of dedicated advisors will be supervising “Physicians-in-Training” to achieve the objective of the program. More specifically, the advisor will help the individual “Physician-in-Training” to learn more about the process of scientific investigation and to convey the knowledge, skills, and attitudes that are required for this aspect of the practice of medicine.

In the FRRP, the “Physicians-in-Training” are expected to choose or propose a research project with careful consideration to educational need and opportunity. Thus, the “Physicians-in-Training” are encouraged to seek out the area of medical research they find most exciting and promising, and to work with a faculty member who they feel will provide the best educational experience.

The FRRP will be used to overcome a weakness or a gap in knowledge or skill to broaden understanding through a project in a specific area of medical science. The primary prerequisites are a sincere interest in learning about research and a serious commitment to fulfilling all the components of the FRRP.

FRRP will include the following steps:

- Filling out the FRRP questionnaires.
- Matching between “Physicians-in-Training” and advisors.
- Deciding on a project.
- Preparing a Letter of Intent and getting FRRP Departmental Committee approval.
- Preparing a Full Proposal and getting FRRP Departmental Committee approval.
- Carrying out the research project, including data collection (if applicable), data analysis, results interpretation and comparison to the literature.
- Preparing two Progress Presentations during the study period and one Final Presentation at the end of the study.
- Preparing a Final Report in the form of a manuscript.

## PROCESS

Following is step-by-step points that cover the process of the FRRP program:

### **1- Filling out the FRRP questionnaires**

Two questionnaires will be filled up at the initiation of the process, mainly one by the “Physicians-in-Training” and another by the potential advisors.

The “Physicians-in-Training” questionnaire will include “Physicians-in-Training” information, theoretical and research background, personal evaluation on different research steps and research interest (research field, topic and potential(s) research advisor(s)). This is done to collect information on the “Physicians-in-Training” research interests and expertise (Appendix 3).

For the advisors, the questionnaire will include advisor’s information, research field, interests and ongoing research projects. This is done to gather information about the advisors’ research area (Appendix 4).

### **2- Matching:**

Matching is where the “Physician-in-Training” and advisor mutually agree to work together on the FRRP program. This matching can be performed in two ways:

#### **○ Self-matching:**

“Physicians-in-Training” will identify the advisor they will work with based on interests and on personal communication. The “Physician-in-Training” will identify an advisor who is a good match for the specific research question in mind. The “Physician-in-Training” then discusses research issues with the potential advisor. If the discussions lead to a mutual agreement on pursuing the project, the “Physician-in-Training” and the advisor will follow the same procedure indicated

for the FRRP. If the discussion does not lead to agreement, the “Physician-in-Training” will look for another matching advisor, or eventually seek the help of the FRRP Departmental Committee.

- **Matching through the FRRP Departmental Committee:**

If a “Physician-in-Training” was unable to match him/herself with an advisor, the FRRP Departmental Committee will carry out the matching based on the interests from both parts.

### **3- Deciding on a project / topic:**

There are two types of research projects which may be pursued in order to satisfy the requirements of the FRRP. These are either a “Physician-in-Training”-initiated research project, or a faculty-initiated research project.

- **“Physician-in-Training”-initiated research project:**

This type of project will be initiated by the “Physician-in-Training”. A specific research question is identified by the “Physician-in-Training” and then pursued through the proper guidelines of the FRRP. This step could take place either before or after the matching process. In other words, the “Physician-in-Training” could initiate the project with an already matched advisor, or he/she would decide on the research question after which he/she will look for a matching advisor.

- **Faculty-initiated research project**

This type of project will be directed towards those “Physicians-in-Training” who do not have a specific research question in mind. Thus, as the name implies, it is the faculty member whose work may provide a project for the “Physician-in-Training” to work on. Nevertheless, the “Physician-in-Training” will not act passively in this regard. The “Physician-in-Training” will have to contribute in formulating the research question to be addressed.

#### **4- Letter of Intent**

The Letter of Intent will include information on the “Physician-in-Training” and the advisor. A brief description about the project will be provided, such as the title, objectives, overall methodology and significance. The form will be signed by the “Physician-in-Training”. The Letter of Intent will be submitted on the corresponding form (Appendix 5) and will be evaluated by the FRRP Departmental Committee according to the corresponding evaluation sheet (Appendix 6).

#### **5- Full Proposal**

The Full Proposal will include detailed information about the proposal, such as: the “Physician-in-Training” name, Proposal title, type of project, starting date, duration, information about the advisor and the “Physician-in-Training”, abstract, specific aim(s), background and significance, research design and methods (including study area, study subjects, study design, sample size, sampling technique, data collection methods, data management and analysis plan), literature cited (Vancouver or APA format), time frame for the study. The form will be signed by the advisor. The Full Proposal will be submitted on the corresponding form (Appendix 7) and will be rated by the FRRP Departmental Committee according to the corresponding rating sheet (Appendix 8).

#### **6- Project data:**

Once the proposal approved, the “Physician-in-Training” would start working either on the already existing data (if applicable) or will have to carry out the data collection.

#### **7- First and Second Progress Presentations**

The Progress Presentations will be carried out for 5 minutes and the discussion will take up to 5 minutes. The name of the “Physician-in-Training”, the advisor and the

presentation date will be indicated. The following parts are to be developed each on one slide: Title, objective(s), methods, current status, challenges and issues to discuss. A template (Appendix 9) has been prepared which highlights the recommended topics to be covered. The Progress Presentations will be rated by one of the FRRP Departmental Committee according to the corresponding rating sheet (Appendix 10).

## **8- Final Report**

The following sections are to be developed: The “Physician-in-Training” information, advisor information, project title, abstract, introduction/background, methodology, results, discussion, conclusion/ recommendation, references, tables/graphs. The report will be within 2000 - 3000 words excluding the abstract, references, and tables/graphs. An “extra page template” has been prepared and could be used for extra pages needed. Tables and graphs collectively will be within four to eight in number where possible. A maximum of 30 references is advised (Vancouver or APA format). The form will be signed by the “Physician-in-Training” and the advisor. The Final Report will be submitted on the approved form (Appendix 11). The Final Report will be rated by the FRRP Departmental Committee according to the corresponding rating sheet (Appendix 12).

## **9- Final Presentation**

The Final Presentation will be carried out for 10 minutes during the FRRP open house (see page 16). The following parts are to be developed: Title, introduction, objective(s), methods, results, discussion, conclusion, references, tables and Graphs. A template (Appendix 13) has been prepared which highlights the recommended topics to be covered. The Final Presentation will be evaluated by the FRRP Committee according to the corresponding rating sheet (Appendix 14).

## 10- Evaluation questionnaire

At the end of their residency period, “Physicians-in-Training” will fill out an evaluation questionnaire in order to assess the program (Appendix 15).

### DURATION

The program starts at the beginning of the academic year, usually in June. The duration of the FRRP will be 1, 2 or 3 years according to the fellowship or residency program and that ends usually by June.

The details of the deadlines and tasks to be carried out by the “Physicians-in-Training” are summarized in the time table (Appendix 16).

Although, these deadlines will be followed, the FRRP Departmental Committee will accommodate any submission prior to those deadlines. More specifically, if a “Physician-in-Training” is interested in covering the different FRRP steps in a more condensed manner, the FRRP Departmental Committee will accommodate this and will provide approvals and evaluations based on dates of submission by “Physicians-in-Training”.

### GENERAL GUIDELINES

The FRRP general guidelines are:

- Complete electronic forms are to be filled and submitted on the FRRP portal <https://frp.aub.edu.lb/> for processing.
- Deadlines should be met for submission of different forms.
- Word limit to be followed wherever applicable.

- The Reports (except presentations) including tables, references, and figure legends, must be typewritten, double-spaced in Times New Roman, 12-font size on the provided templates.
- Pages to be numbered consecutively.
- Vancouver reference style to be followed for citation  
([http://www.nlm.nih.gov/bsd/uniform\\_requirements.html](http://www.nlm.nih.gov/bsd/uniform_requirements.html))
- Plagiarism will result in disciplinary action in accordance with Institutional policies.

## RULES

The FRRP rules are:

- The “Physician-in-Training” is required to complete one Research Project during the FRRP period (which is dependent on individual programs)
- Each “Physician-in-Training” is allowed to work with only one advisor, who has to be from the American University of Beirut – Medical Center.
- Only one “Physician-in-Training” is allowed to work on each project. Although not advisable, exceptions might be considered where two “Physicians-in-Training” might be working on one project, on conditional on FRRP Departmental Committee approval.
- All AUB-MC faculty members who are interested in supervising “Physicians-in-Training” in the conduct of their research projects are considered as potential advisors.
- If the FRRP project is not finalized prior to graduation and if for any reason the “Physician-in-Training” stops working on the project, his advisor has the right to pursue the research project. Having the “Physician-in-Training” name on the paper as a co-author will depend on how much he contributed to the project.
- Both “Physicians-in-Training” and advisors are required to have a certificate of the CITI courses. (<http://www.citiprogram.org>)

- The “Physician-in-Training” is expected to follow the research guidelines of the American University of Beirut – Medical Center, specifically in terms of ethical guidelines. ([http://www.aub.edu.lb/irb/Documents/irb\\_manual.pdf](http://www.aub.edu.lb/irb/Documents/irb_manual.pdf) )

## ROLES AND RESPONSABILITIES

The success of the FRRP depends on four key players:

- 1- The “Physician-in-Training”
- 2- The advisor
- 3- The FRRP Committee
- 4- The FRRP Departmental Committees

In the following section, a brief description of the roles and responsibilities are provided.

### **1- “Physician-in-Training”**

As mentioned earlier, the FRRP is directed towards the “Physician-in-Training”. Thus, the “Physician-in-Training” has the major responsibility to carry out the research project in a satisfactory manner.

If the project is “Physician-in-Training”-initiated, the “Physician-in-Training” is responsible to identify the topic. If the project is faculty-initiated, the faculty member is the one who provides the topic, but the “Physician-in-Training” will have significant contribution in formulating the research question to be addressed.

After defining the objective of the project, the “Physician-in-Training” is responsible to carry out an appropriate literature review around the topic to be covered in the research project. The “Physician-in-Training” is expected to find the best relevant

resources (articles, books, etc.), retrieve them (from the library, internet, etc.), and summarize them in a satisfactory scientific manner.

The “Physician-in-Training” is then required to prepare the Letter of Intent, which will be reviewed and approved by the FRRP Departmental Committee. Upon approvals, the “Physician-in-Training” shall prepare and submit a Full Proposal to the FRRP Departmental Committee.

The “Physician-in-Training” will work on identifying the best methodology to carry out the study. This includes data collection and instruments to be used (questionnaires, abstraction forms, etc.), data entry, data analysis, results interpretation, comparison with the literature. During the study period, the “Physician-in-Training” will present two Progress Presentations and a Final Presentation at the end of the study. The “Physician-in-Training” will write a Final Report in a form of manuscript.

Moreover, “Physicians-in-Training” are highly encouraged to submit the prepared report for publication in peer-reviewed journals, as well as presentation in national and international conferences.

Note: Overall, the “Physician-in-Training” is responsible for performing the entire project.

## **2- Advisor**

The major responsibility of the advisor is to supervise the “Physician-in-Training” in the conduct of his/her project. The advisor has to ensure that the “Physician-in-Training” is carrying out the FRRP in a satisfactory manner, with the most appropriate scientific methods being incorporated.

If the project is faculty-initiated, the advisor has to help the “Physician-in-Training” in identifying an individual project which is within the scope of the FRRP. The advisor might provide the “Physician-in-Training” with different potential hypotheses to act as a starting point. On the other hand, if the project is “Physician-in-Training”-initiated,

the advisor has to help the “Physician-in-Training” in transforming his/her idea into an appropriate scientific project.

In general, the advisor is expected to provide supervision to the “Physician-in-Training” at each of the different stages of carrying out the research project. More specifically, the advisor has to be involved in decision-making at each of the following steps: hypothesis formulation, methodology selection, Letter of Intent and Full Proposal preparation, data collection, data analyses, results summarization and interpretation, report finalization, and presentations organization. In addition, the advisor is expected to encourage and support the “Physician-in-Training” to publish the work in peer-reviewed journals, as well as present it at national and international conferences. The advisor is not expected to provide any of the above mentioned tasks; on the contrary, the “Physician-in-Training” is expected to perform all these tasks, but under the supervision of the advisor.

The advisor is expected to meet with the “Physician-in-Training”, as appropriate, to overlook the conduct and progress of the FRRP. The frequency of such meetings is to be decided upon mutually by the “Physician-in-Training” and advisor and may depend on the nature of the project itself. On the other hand, the advisor is expected to make sure that the “Physician-in-Training” is performing the task in a satisfactory manner, and progressing in an acceptable manner. Moreover, the advisor is expected to evaluate the “Physician-in-Training” performance during the FRRP process by filling out the advisor’s evaluation form (Appendix 16).

The FRRP is an educational exercise. Thus, the advisor’s diligence in addressing all the issues noted above in the interests of maintaining a vibrant and rewarding educational activity is crucial.

### **3- FRRP Committee**

The FRRP committee includes representatives from all the departments of the AUBMC.

The roles and responsibilities of the FRRP Committee are to ensure the efficient implementation of the FRRP to all AUB-MC departments and to oversee the flow of the program.

The FRRP Committee will meet on a regular basis and upon need to ensure that all aspects of the program are running smoothly. Also, the FRRP Committee will schedule, organize and deliver different educational sessions related to the different research topics in parallel with the sessions given by the Research Educational Unit (REU) at the Clinical Research Institute (CRI). Finally, the FRRP Committee will address different issues related to the progress of the FRRP as they arise.

For a full list of FRRP Committee members names and coordinates, please refer to Appendix 1.

### **4- FRRP Departmental Committees**

At each department, a committee is formed and includes faculty members who have different expertise in related fields as well as fellows' program directors and who will work on the successful accomplishment of the program.

The FRRP Departmental Committees responsibilities are to identify potential advisors to supervise "Physicians-in-Training" throughout the completion of their research projects. If a "Physician-in-Training" is unable to match him/herself with an advisor, the FRRP Departmental Committee will carry out the matching based on the interests from both parts. The FRRP Departmental Committees will evaluate the different documents submitted by the "Physicians-in-Training", as well as approve, recommend changes, or reject these documents. Such documents include (Letter of Intent, Full Proposal, and Final Report). Also, the FRRP Departmental Committees will evaluate the different presentations carried out by the "Physicians-in-Training", such as both Progress Presentations and the Final Presentation.

The FRRP Departmental Committees will have to maintain the process in accordance with the “Physician-in-Training” time tables specified (Appendix 17) and to update the FRRP Committee of the progresses or complications faced in their departments.

For a full list of FRRP Departmental Committee members names and coordinates, please refer to Appendix 2.

## **“PHYSICIAN-IN-TRAINING” EVALUATION**

FRRP will be evaluated on six components

- Letter of Intent
- Full proposal
- First Progress Presentation
- Second Progress Presentation
- Final Presentation
- Final Report

“Physicians-in-Training” need to complete all the FRRP steps in order to graduate from their residency or fellowship program.

## **FRRP- RESEARCH DAY**

In recognition to the efforts carried out by the “Physicians-in-Training”, advisors, FRRP committee and FRRP departmental committee members, an FRRP Research day will be scheduled before “Physicians-in-Training” graduation. During this activity, “Physicians-in-Training” will be presenting their work to members of the Faculty of Medicine at the American University of Beirut Medical Center. Prizes will be awarded to the best presentations which will be announced during graduation.



Fellowship and Residency Research  
Program  
Faculty of Medicine  
American University of Beirut  
Beirut, Lebanon  
Tel: (01) 350-000 ext. 5776  
Email: [frp-fm@aub.edu.lb](mailto:frp-fm@aub.edu.lb)

## APPENDIX 1

### LIST OF FRRP COMMITTEE MEMBERS

Name	Department	e-mail	Extension
Dr. Hani Tamim	Internal Medicine (Director)	<a href="mailto:htamim@aub.edu.lb">htamim@aub.edu.lb</a>	5453
Dr. Hazem Assi	Internal Medicine	<a href="mailto:ha157@aub.edu.lb">ha157@aub.edu.lb</a>	5147
Dr. Marwan Refaat	Internal Medicine	<a href="mailto:mr48@aub.edu.lb">mr48@aub.edu.lb</a>	5353
Dr. Mohamad Issam Khatib	Anesthesiology		
Dr. Mazen Kurban	Dermatology	<a href="mailto:oa09@aub.edu.lb">oa09@aub.edu.lb</a>	7915
Dr. Roula Hourany	Diagnostic Radiology	<a href="mailto:rh64@aub.edu.lb">rh64@aub.edu.lb</a>	5029
Dr. Ralphe Bou Chebl	Emergency Medicine	<a href="mailto:ga66@aub.edu.lb">ga66@aub.edu.lb</a>	
Dr. Joumana Antoun	Family Medicine	<a href="mailto:ja46@aub.edu.lb">ja46@aub.edu.lb</a>	3039
Dr. Johnny Salameh	Neurology	<a href="mailto:ab29@aub.edu.lb">ab29@aub.edu.lb</a>	5387
Dr. Fadi Mirza	Obstetrics & Gynecology	<a href="mailto:fmirza@aub.edu.lb">fmirza@aub.edu.lb</a>	5600
Dr. Ziad Bashour	Ophthalmology	<a href="mailto:zb00@aub.edu.lb">zb00@aub.edu.lb</a>	5581
Dr. Rami Mahfouz	Pathology & Laboratory medicine	<a href="mailto:rm11@aub.edu.lb">rm11@aub.edu.lb</a>	5167
Dr. Ghassan Dbaibo	Pediatrics	<a href="mailto:gdbaibo@aub.edu.lb">gdbaibo@aub.edu.lb</a>	4881
Dr. Salman Mroueh	Pediatrics	<a href="mailto:smroueh@aub.edu.lb">smroueh@aub.edu.lb</a>	5513
Dr. Fadi Maalouf	Psychiatry	<a href="mailto:fm38@aub.edu.lb">fm38@aub.edu.lb</a>	5650
Dr. Bassem Youssef	Radiation Oncology	<a href="mailto:by04@aub.edu.lb">by04@aub.edu.lb</a>	
Dr. Walid Faraj	Surgery	<a href="mailto:wf07@aub.edu.lb">wf07@aub.edu.lb</a>	5850

## APPENDIX 2

### LIST OF FRRP DEPARTMENTAL COMMITTEES MEMBERS

Following is a list of the different departmental FRRP committees. Note that continuous update will be performed on a regular basis.

#### Department: Anesthesiology

Name		e-mail	Extension
Dr. Sahar Sayyid	Chair	<a href="mailto:ss01@aub.edu.lb">ss01@aub.edu.lb</a>	6380/1
Dr. Carine Zeeni	Member	<a href="mailto:cz07@aub.edu.lb">cz07@aub.edu.lb</a>	6380/1
Dr. Chakib Ayoub	Member	<a href="mailto:ca04@aub.edu.lb">ca04@aub.edu.lb</a>	6380/1
Dr. Ghassan Kanazi	Member	<a href="mailto:gk05@aub.edu.lb">gk05@aub.edu.lb</a>	5310
Dr. Marie Aouad-Maroun	Member	<a href="mailto:mm01@aub.edu.lb">mm01@aub.edu.lb</a>	6380/1
Dr. Mohamad Khatib	Member	<a href="mailto:mk05@aub.edu.lb">mk05@aub.edu.lb</a>	5315
Dr. Roland Kaddoum	Member	<a href="mailto:rk16@aub.edu.lb">rk16@aub.edu.lb</a>	6380/1

#### Department: Dermatology

Name		e-mail	Extension
Dr. Ossama Abbas	Chair	<a href="mailto:oa09@aub.edu.lb">oa09@aub.edu.lb</a>	7915
Dr. Abdul Ghani Kibbi	Member	<a href="mailto:agkibbi@aub.edu.lb">agkibbi@aub.edu.lb</a>	5330
Dr. Mazen Kurban	Member	<a href="mailto:mk104@aub.edu.lb">mk104@aub.edu.lb</a>	7919
Dr. Samer Ghosn	Member	<a href="mailto:sg03@aub.edu.lb">sg03@aub.edu.lb</a>	5333

#### Department: Diagnostic Radiology

Name		e-mail	Extension
Dr. Roula Hourany	Chair	<a href="mailto:rh64@aub.edu.lb">rh64@aub.edu.lb</a>	5029
Dr. Ali Haydar	Member	<a href="mailto:ah24@aub.edu.lb">ah24@aub.edu.lb</a>	5027
Dr. Aghiad Al Kutoubi	Member	<a href="mailto:mk00@aub.edu.lb">mk00@aub.edu.lb</a>	5020
Dr. Nabil Houry	Member	<a href="mailto:nk01@aub.edu.lb">nk01@aub.edu.lb</a>	5026

**Department: Emergency Medicine**

Name		e-mail	Extension
Dr. Gilbert Abou Dagher	Chair	<a href="mailto:ga66@aub.edu.lb">ga66@aub.edu.lb</a>	
Dr. Mazen El Sayed	Member	<a href="mailto:melsayed@aub.edu.lb">melsayed@aub.edu.lb</a>	
Dr. Rasha Sawaya	Member	<a href="mailto:rs139@aub.edu.lb">rs139@aub.edu.lb</a>	

**Department: Family Medicine**

Name		e-mail	Extension
Dr. Joumana Antoun	Chair	<a href="mailto:ja46@aub.edu.lb">ja46@aub.edu.lb</a>	3039
Dr. Najla Lakkis	Member	<a href="mailto:ne23@aub.edu.lb">ne23@aub.edu.lb</a>	
Dr. Sani Hlais	Member	<a href="mailto:sh95@aub.edu.lb">sh95@aub.edu.lb</a>	

**Department: Internal medicine**

Name		e-mail	Extension
Dr. Marwan Refaat	Chair	<a href="mailto:mr48@aub.edu.lb">mr48@aub.edu.lb</a>	5430
Dr. Asma Arabi	Member	<a href="mailto:aa22@aub.edu.lb">aa22@aub.edu.lb</a>	5461
Dr. Elie Akl	Member	<a href="mailto:ea32@aub.edu.lb">ea32@aub.edu.lb</a>	5490
Dr. Fady Daniel	Member	<a href="mailto:fd21@aub.edu.lb">fd21@aub.edu.lb</a>	5791
Dr. Hazem Assi	Member	<a href="mailto:ha157@aub.edu.lb">ha157@aub.edu.lb</a>	5147
Dr. Mira Merashli	Member	<a href="mailto:mm116@aub.edu.lb">mm116@aub.edu.lb</a>	5353
Dr. Pierre Bou khalil	Member	<a href="mailto:pb05@aub.edu.lb">pb05@aub.edu.lb</a>	5244
Dr. Sahar Koubar	Member	<a href="mailto:sk62@aub.edu.lb">sk62@aub.edu.lb</a>	7400
Dr. Zeina Kanafani	Member	<a href="mailto:zk10@aub.edu.lb">zk10@aub.edu.lb</a>	5321

**Department: Neurology**

Name		e-mail	Extension
Dr. Ahmad Beydoun	Chair	<a href="mailto:ab29@aub.edu.lb">ab29@aub.edu.lb</a>	5387
Dr. Johnny Salameh	Member	<a href="mailto:js73@aub.edu.lb">js73@aub.edu.lb</a>	
Dr. Samia Khoury	Member	<a href="mailto:sk88@aub.edu.lb">sk88@aub.edu.lb</a>	5800
Dr. Wassim Nasreddine	Member	<a href="mailto:wn13@aub.edu.lb">wn13@aub.edu.lb</a>	

**Department: Obstetrics & Gynecology**

Name		e-mail	Extension
Dr. Fadi Mirza	Chair	<a href="mailto:fmirza@aub.edu.lb">fmirza@aub.edu.lb</a>	5600
Dr. Abdallah Adra	Member	<a href="mailto:aa107@aub.edu.lb">aa107@aub.edu.lb</a>	
Dr. Anwar Nassar	Member	<a href="mailto:an21@aub.edu.lb">an21@aub.edu.lb</a>	5607
Dr. Dina Chamsy	Member	<a href="mailto:dc09@aub.edu.lb">dc09@aub.edu.lb</a>	5600
Dr. Elie Hobeika	Member	<a href="mailto:eh11@aub.edu.lb">eh11@aub.edu.lb</a>	5637
Dr. Joseph Nassif	Member	<a href="mailto:jn25@aub.edu.lb">jn25@aub.edu.lb</a>	5636

**Department: Ophthalmology**

Name		e-mail	Extension
Dr. Ziad Bashour	Chair	<a href="mailto:zb00@aub.edu.lb">zb00@aub.edu.lb</a>	5581/2
Dr. Haytham Salti	Member	<a href="mailto:hs06@aub.edu.lb">hs06@aub.edu.lb</a>	5560
Dr. Rola Hamam	Member	<a href="mailto:rh46@aub.edu.lb">rh46@aub.edu.lb</a>	5589
Dr. Shady Awwad	Member	<a href="mailto:sa11@aub.edu.lb">sa11@aub.edu.lb</a>	5581/2

**Department: Pathology & Laboratory medicine**

Name		e-mail	Extension
Dr. Rami Mahfouz	Chair	<a href="mailto:rm11@aub.edu.lb">rm11@aub.edu.lb</a>	5167
Dr. Ayman Tawil	Member	<a href="mailto:at04@aub.edu.lb">at04@aub.edu.lb</a>	5176
Dr. Fouad Boulos	Member	<a href="mailto:fb17@aub.edu.lb">fb17@aub.edu.lb</a>	5174
Dr. Ibrahim Khalife	Member	<a href="mailto:ik08@aub.edu.lb">ik08@aub.edu.lb</a>	5175
Dr. Rose Daher	Member	<a href="mailto:rd02@aub.edu.lb">rd02@aub.edu.lb</a>	5223

**Department: Pediatrics**

Name		e-mail	Extension
Dr. Ghassan Dbaibo	Chair	<a href="mailto:gdbaibo@aub.edu.lb">gdbaibo@aub.edu.lb</a>	4881
Dr. Salman Mroueh	Co-chair	<a href="mailto:smroueh@aub.edu.lb">smroueh@aub.edu.lb</a>	5513
Dr. Hala Tfaili	Member	<a href="mailto:ht31@aub.edu.lb">ht31@aub.edu.lb</a>	4714
Dr. Khaled Younes	Member	<a href="mailto:kayunis@aub.edu.lb">kayunis@aub.edu.lb</a>	5512
Dr. Marianne Majdalani	Member	<a href="mailto:mn40@aub.edu.lb">mn40@aub.edu.lb</a>	5511
Dr. Raya Saab	Member	<a href="mailto:rs88@aub.edu.lb">rs88@aub.edu.lb</a>	4778/8102
Dr. Rose-Mary Boustany	Member	<a href="mailto:rb50@aub.edu.lb">rb50@aub.edu.lb</a>	5640/1

**Department: Psychiatry**

Name		e-mail	Extension
Dr. Farid Talih	Chair	<a href="mailto:ft10@aub.edu.lb">ft10@aub.edu.lb</a>	5650
Dr. Joseph Khoury	Member	<a href="mailto:je47@aub.edu.lb">je47@aub.edu.lb</a>	5650

**Department: Radiation Oncology**

<b>Name</b>	<b>e-mail</b>	<b>Extension</b>
Dr. Bassem Youssef	Chair <a href="mailto:by04@aub.edu.lb">by04@aub.edu.lb</a>	
Dr. Fady Geara	Member <a href="mailto:fg00@aub.edu.lb">fg00@aub.edu.lb</a>	5091
Dr. Toufic Eid	Member <a href="mailto:te04@aub.edu.lb">te04@aub.edu.lb</a>	5093

**Department: Surgery**

<b>Name</b>	<b>e-mail</b>	<b>Extension</b>
Dr. Walid Faraj	Chair <a href="mailto:wf07@aub.edu.lb">wf07@aub.edu.lb</a>	5850
Dr. Bernard Sagherian	Member <a href="mailto:bs05@aub.edu.lb">bs05@aub.edu.lb</a>	5680
Dr. Imad Shehadi	Member <a href="mailto:is30@aub.edu.lb">is30@aub.edu.lb</a>	
Dr. Marwan Najjar	Member <a href="mailto:mn12@aub.edu.lb">mn12@aub.edu.lb</a>	5255
Dr. Ramzi Alami	Member <a href="mailto:ra204@aub.edu.lb">ra204@aub.edu.lb</a>	
Dr. Yaser El-Hout	Member <a href="mailto:yelhout@aub.edu.lb">yelhout@aub.edu.lb</a>	5261



○ Did you have publications related to your research work?  No  Yes, reference:

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

• Since starting your fellowship or residency program, have you been involved in a research project?

No  Yes. If yes, indicate:

○ Type of project:

Clinical Research     Chart Review     Prospective     Basic Science     Systematic Review

○ Topic: \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

Principal Investigator: \_\_\_\_\_ Department: \_\_\_\_\_

**4. Personal Evaluation**

	None	Adequate	Good	Very good	Excellent
Literature review					
Using Pubmed					
Reading articles					
Summarizing articles					
Defining research objectives					
Constructing a questionnaire					
Writing proposal					
Applying for research approval					
Data collection					
Data entry					
Data analyses					
Data summarization					
Writing a report: Introduction					
Writing a report: Methods					
Writing a report: Results					
Writing a report: Discussion					
Writing a report: Tables/ graphs					
Writing a report: References					
Submission for publication					
Study presentation					

5. Research Interest:

a. Research Field: (Please list as many as possible)

<input type="checkbox"/> Clinical	<input type="checkbox"/> Basic Science; specify: _____	
<input type="checkbox"/> Anesthesiology	<input type="checkbox"/> Dermatology	
<input type="checkbox"/> Diagnostic Radiology	<input type="checkbox"/> Emergency Medicine	
<input type="checkbox"/> Family Medicine		
<input type="checkbox"/> Internal Medicine:		
__ Cardiology	__ Endocrinology	__ Gastroenterology
__ Hematology-Oncology	__ Infectious Diseases	__ Nephrology
__ Pulmonary	__ Rheumatology	
<input type="checkbox"/> Neurology		
__ Epilepsy and Clinical Neurophysiology		
<input type="checkbox"/> Obstetrics-Gynecology	<input type="checkbox"/> Ophthalmology	
<input type="checkbox"/> Otolaryngology & Head & Neck Surgery		
__ Orthodontics		
<input type="checkbox"/> Pathology & Laboratory Medicine		
<input type="checkbox"/> Pediatrics:		
__ Cardiology	__ Hematology-Oncology	__ Infectious Diseases
__ Intensive care	__ Neonatology	__ Neurology
<input type="checkbox"/> Psychiatry	<input type="checkbox"/> Radiation Oncology	
<input type="checkbox"/> Surgery:		
__ General surgery	__ Neurosurgery	__ orthopedic surgery
__ Plastic & Reconstructive surgery	__ Urology	
<input type="checkbox"/> Others, specify: _____		

b. Research Topic: Please list research topic that are of interest to you:

---

---

---

c. Potential Research Advisor:

(Please list the name of any potential advisor by preference)

1- Name: _____	Department: _____	Did you contact him/her: _____
2- Name: _____	Department: _____	Did you contact him/her: _____
3- Name: _____	Department: _____	Did you contact him/her: _____
4- Name: _____	Department: _____	Did you contact him/her: _____



Fellowship and Residency Research  
 Program  
 Faculty of Medicine  
 American University of Beirut  
 Beirut, Lebanon  
 Tel: (01) 350-000 ext. 5776  
 Email: [frp-fm@aub.edu.lb](mailto:frp-fm@aub.edu.lb)

## APPENDIX 4

**FRRP**  
  
**ADVISOR'S  
 QUESTIONNAIRE**

### 1. Advisor's Information

Name:	Department:
Tel #:	Email:

### 2. Research Field (Please list as many as possible)

<input type="checkbox"/> Clinical  <input type="checkbox"/> Anesthesiology  <input type="checkbox"/> Diagnostic Radiology  <input type="checkbox"/> Family Medicine  <input type="checkbox"/> Internal Medicine: __ Cardiology __ Hematology-Oncology __ Pulmonary  <input type="checkbox"/> Neurology __ Epilepsy and Clinical Neurophysiology  <input type="checkbox"/> Obstetrics & Gynecology  <input type="checkbox"/> Otolaryngology & Head & Neck surgery __ Orthodontics  <input type="checkbox"/> Pathology & Laboratory Medicine  <input type="checkbox"/> Pediatrics: __ Cardiology __ Intensive care	<input type="checkbox"/> Basic Science; specify: _____  <input type="checkbox"/> Dermatology  <input type="checkbox"/> Emergency Medicine  __ Endocrinology __ Infectious Diseases __ Rheumatology  <input type="checkbox"/> Ophthalmology  __ Gastroenterology __ Nephrology  __ Hematology-Oncology __ Neonatology __ Infectious Diseases __ Neurology
---	--

<input type="checkbox"/> Psychiatry
<input type="checkbox"/> Radiation Oncology
<input type="checkbox"/> Surgery:
__ General surgery                      __ Neurosurgery                      __ Orthopedic surgery
__ Plastic & Reconstructive surgery    __ Urology
<input type="checkbox"/> Others, specify: _____

**3. Research Interest**

---

---

---

---

**4. Ongoing Research**

---

---

---

---

Signature: \_\_\_\_\_ Date: \_\_\_\_\_



**Fellowship and Residency Research Program**  
**Faculty of Medicine**  
**American University of Beirut**  
 Beirut, Lebanon  
 Tel: (01) 350-000 ext. 5776  
 Email: [frrp-fm@aub.edu.lb](mailto:frrp-fm@aub.edu.lb)

**APPENDIX 5**

**FRRP**  
**LETTER OF INTENT FORM**

(To be completed by the “Physician-in-Training”)

Date			
Type	<input type="checkbox"/> Faculty Initiated	<input type="checkbox"/> “Physician-in-training” Initiated	

<b>“PHYSICIAN-IN-TRAINING” DETAILS</b>			
<input type="checkbox"/> Medical fellow		<input type="checkbox"/> Resident	
Name		FRRP#	
Email		Department	
Mobile #		Division	

<b>ADVISOR’S DETAILS</b>			
Advisor’s name			
Title		Specialty	
Mobile #		Email	
Department		Pager	

<b>CO- ADVISOR’S DETAILS</b>			
Name			
Title		Specialty	
Mobile #		Email	
Department		Pager	

<b>RESEARCH DETAILS</b>	
<b>TITLE</b>	
<b>OBJECTIVES</b> (List Primary and Secondary objectives.)	
<b>METHODOLOGY</b> (Provide a plan of design, implementation and analysis.)	
<b>RESEARCH SIGNIFICANCE</b> (How will the proposed research contribute to science?)	
<b>LOGISTICS</b>	
Time required for proposal completion	
Time required for conducting study	
Work Plan: (Provide a detailed plan in terms of tasks to be done and time needed for each.)	

<b>"Physician-in-Training" signature</b>	
<b>Date</b>	



**Fellowship and Residency Research Program**  
**Faculty of Medicine**  
**American University of Beirut**  
 Beirut, Lebanon  
 Tel: (01) 350-000 ext. 5776  
 Email: [frp-fm@aub.edu.lb](mailto:frp-fm@aub.edu.lb)

**APPENDIX 6**

**FRRP**

**LETTER OF INTENT EVALUATION SHEET**

<input type="checkbox"/> Medical fellow	<input type="checkbox"/> Resident	
<b>Name:</b>		<b>FRRP #:</b>
<b>Department:</b>	<b>Division:</b>	<b>Date of receipt:</b>
<b>Advisor's name:</b>		
<b>Project title:</b>		

Please indicate whether each of the following aspects of the Letter of Intent is satisfactory or not.

<b>I. Title</b>	<input type="checkbox"/> Satisfactory	<input type="checkbox"/> Not satisfactory
<b>II. Objectives</b>	<input type="checkbox"/> Satisfactory	<input type="checkbox"/> Not satisfactory
<b>III. Methodology</b>	<input type="checkbox"/> Satisfactory	<input type="checkbox"/> Not satisfactory
<b>IV. Research significance</b>	<input type="checkbox"/> Satisfactory	<input type="checkbox"/> Not satisfactory
<b>V. Logistics</b>		
<b>Time for proposal completion</b>	<input type="checkbox"/> Satisfactory	<input type="checkbox"/> Not satisfactory
<b>Time for conducting the study</b>	<input type="checkbox"/> Satisfactory	<input type="checkbox"/> Not satisfactory
<b>Work plan</b>	<input type="checkbox"/> Satisfactory	<input type="checkbox"/> Not satisfactory
<b>Note:</b> To grant approval for this Letter of Intent, each of the above will be satisfactory.		
<b>Overall comments:</b>		
<b>Evaluator's name:</b>		



**APPENDIX 7**

**FRRP**  
**FULL PROPOSAL FORM**

<input type="checkbox"/> <b>Medical fellow</b>		<input type="checkbox"/> <b>Resident</b>	
<b>Name:</b> _____		<b>Department:</b> _____	<b>Division:</b> _____
<b>FRRP #:</b> _____		<b>Date:</b> _____	
<b>1. Title of Proposal:</b> (Instructions: Fill all appropriate boxes apply to your project) _____ _____			
<b>2. Type of Project:</b> (please check all applicable options)			
Chart Review <input type="checkbox"/>	Diagnostic <input type="checkbox"/>	Qualitative Research <input type="checkbox"/>	Quantitative Research <input type="checkbox"/>
Human <input type="checkbox"/>	Laboratory <input type="checkbox"/>	Msc Project <input type="checkbox"/>	Therapeutic <input type="checkbox"/>
Basic Science <input type="checkbox"/>	Other <input type="checkbox"/>	_____	
<b>3. Starting Date:</b> _____	<b>4. Duration:</b> _____	<b>5. Total Fund Requested (US dollars):</b> _____	
<b>6. Advisor:</b>			
Name: _____ Extension: _____ Mobile No.: _____			
Department: _____			
Title/Position: _____ E-mail: _____			
<b>7. Advisor's Assurance:</b>			
The undersigned agrees to accept responsibility for the scientific and technical conduct of the proposed research.			
_____		_____	
<u>Advisor's Name and Signature</u>		<u>Date</u>	

**8. Abstract:** (up to 200 words)

**9. Specific aim(s):** (up to one page)

**10. Background and significance:** (1 to 3pages)

(Instructions: Literature review of previous studies on the subject; and justification of the study by stating the problem and its importance). **Please attach additional pages if needed.**

**11. Research design and Methods:** (up to 5 pages)

**11.1 - Study Area/Setting:** (Instructions: Describe the area or setting where the study will be conducted. This description will cover the details relevant to the study topic)

**11.2 - Study Subjects:** (Instructions: Inclusion and exclusion criteria of the study subjects)

**11.3 - Study Design:** (Instructions: Mention the type of study design e.g. cross-sectional, case-control, intervention study, etc.)

**11.4 - Sample Size:** (Instructions: Mention the input criteria for sample size estimation)

**11.5 - Sampling Technique:** (Instructions: Mention the sampling technique, (e.g. randomization) that will be used in order to obtain a representative sample for your target population)

**11.6 - Data Collection methods, instruments used measurements:**

(Instructions: Describe the instruments used for data collection (questionnaire, observation recording from, etc.) and studied variables included in these instruments, as well as the methods used to test for the validity and reliability of the instrument. Techniques used will be briefly described and referenced. Study definitions [e.g., case definition] will be mentioned)

**11.7 - Data Management and Analysis Plan:** (Instructions: Describe the analysis plan, tests used for data analysis and statistical package(s) used)

**12. Ethical Considerations:**

**13. Literature cited:** (Vancouver or APA format)

**14. Budget:** (Please use the attached documents for the price list of equipments used in the project if applicable)

<b>Budget Breakdown</b>	<b>Unit Cost (US dollars)</b>	<b>Total Cost (US dollars)</b>	<b>Remarks</b>
<b>Personnel</b>			
<i>Total</i>			
<b>Supplies and Equipment</b>			
<i>Total</i>			
<b>Patients Cost</b>			
<i>Total</i>			
<b>Others (please, specify and justify briefly)</b>			
<i>Total</i>			
<b>GRAND TOTAL</b>			

**15. Time frame for the study:** (Instructions: Please use this form as a template for the timeline of your project)

Task	MONTH											
	1	2	3	4	5	6	7	8	9	10	11	12
<b>Progress report</b>												

**16. Time commitment and funds available:**





## APPENDIX 9

**FRRP**  
**FIRST AND SECOND**  
**PROGRESS**  
**PRESENTATIONS FORM**

[http://www.aub.edu.lb/fm/medicalresearch/ClinicalandTranslationalResearch/FRRP/Pages/  
FRRPForms.aspx](http://www.aub.edu.lb/fm/medicalresearch/ClinicalandTranslationalResearch/FRRP/Pages/FRRPForms.aspx)



APPENDIX 10

FRRP

FIRST AND SECOND PROGRESS PRESENTATIONS RATING SHEET

<input type="checkbox"/> Medical fellow		<input type="checkbox"/> Resident			
Name:		FRRP#:			
Department:		Division:			
Date of receipt:		Date of receipt:			
Project Title:					
Please give a score of 0 - 4 for each item					
<b>I - OBJECTIVES</b>					
Stated objectives properly	0	1	2	3	4
Provided relevant justification / rationale					
<b>II - METHODS</b>					
Used appropriate study design	0	1	2	3	4
Used appropriate sample size and sampling technique					
Explained data collection adequately	0	1	2	3	4
Explained data management and analysis adequately					
<b>III - CURRENT STATUS</b>					
Presented data appropriately in tables and graphs	0	1	2	3	4
Provided relevant summary of descriptive data					
<b>IV - CHALLENGES</b>					
Listed clearly	0	1	2	3	4
<b>V - ISSUES TO DISCUSS</b>					
Listed clearly	0	1	2	3	4
<b>VI - PRESENTATION SKILLS</b>					
Followed right sequence of presentation	0	1	2	3	4
Delivered material effectively					
<b>VII - PREPARATION</b>					
Answered questions confidently	0	1	2	3	4
Demonstrated adequate knowledge of the subject					
<b>OVERALL SCORE:</b>					
EVALUATOR'S NAME				EVALUATOR'S SIGNATURE	
Comments:					



**APPENDIX 11**

**FRRP**  
**FINAL REPORT FORM**

Date:	
Type:	<input type="checkbox"/> Faculty Initiated <input type="checkbox"/> "Physician-in-Training" Initiated

<b>"PHYSICIAN-IN-TRAINING" DETAILS:</b>			
<input type="checkbox"/> Medical fellow		<input type="checkbox"/> Resident	
Name		FRRP#	
Email		Department	
Mobile #		Division	

<b>ADVISOR'S DETAILS:</b>			
Advisor's name			
Title		Specialty	
Phone		Email	
Department			

<b>SIGNATURES</b>	
<b>"Physician-in-Training" signature</b>	
Date	
<b>Advisor's signature</b>	
Date	

**Fellowship and Residency Research Project**

Note: Please follow the guidelines for Fellowship or Residency Research Final Report. Attach copies of extra pages as required from the template at the end of the document.

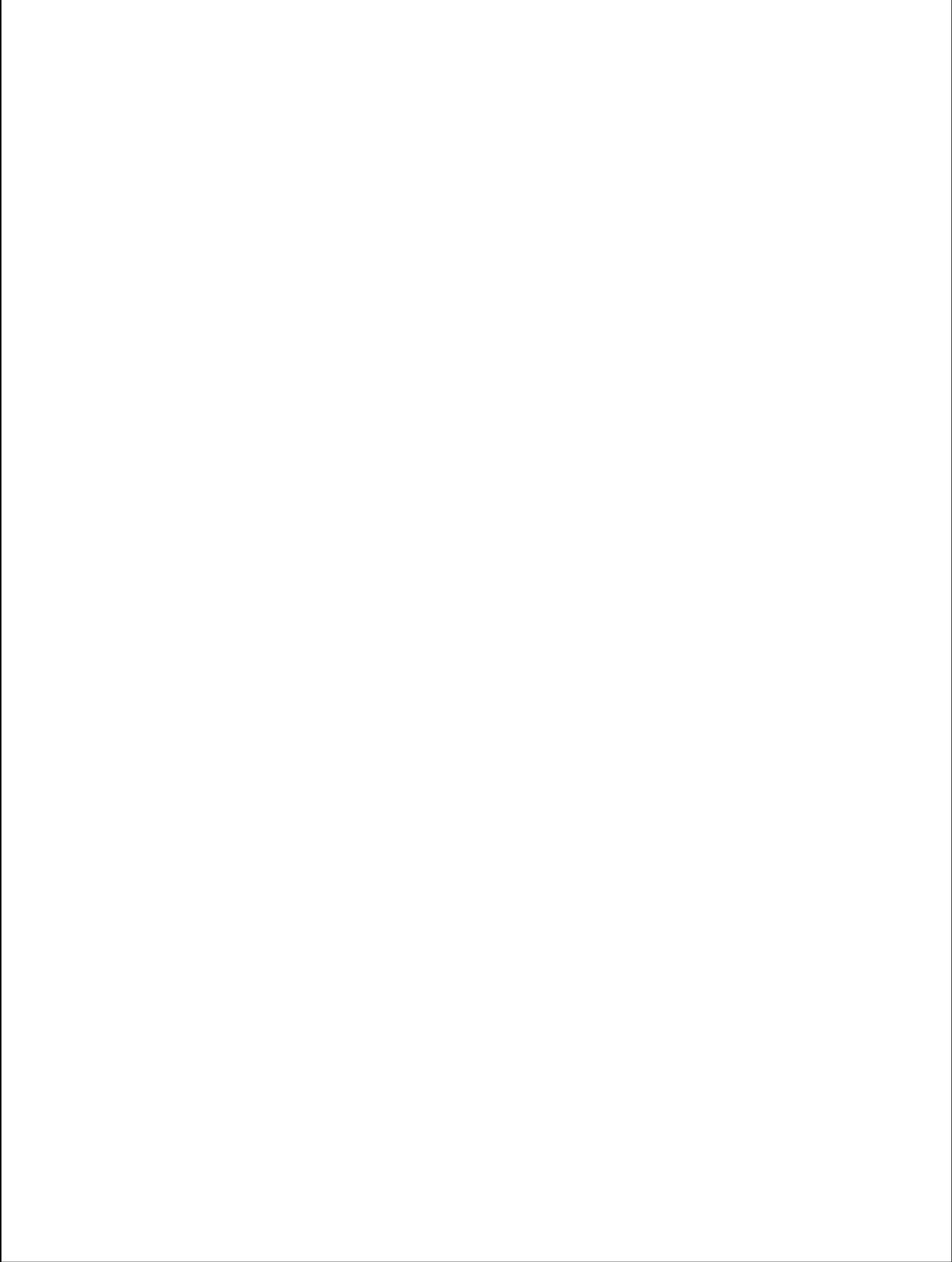
**Title**

**Abstract** (*Word count 200 – 250 words). Structured format. 1 - 1½ pages*)

Empty rectangular box for content.

**Methodology** 2 – 4 *pages*

**Results** *Tables and graphs to be added on separate pages at the end of the paper (after references) 2 – 5 pages*

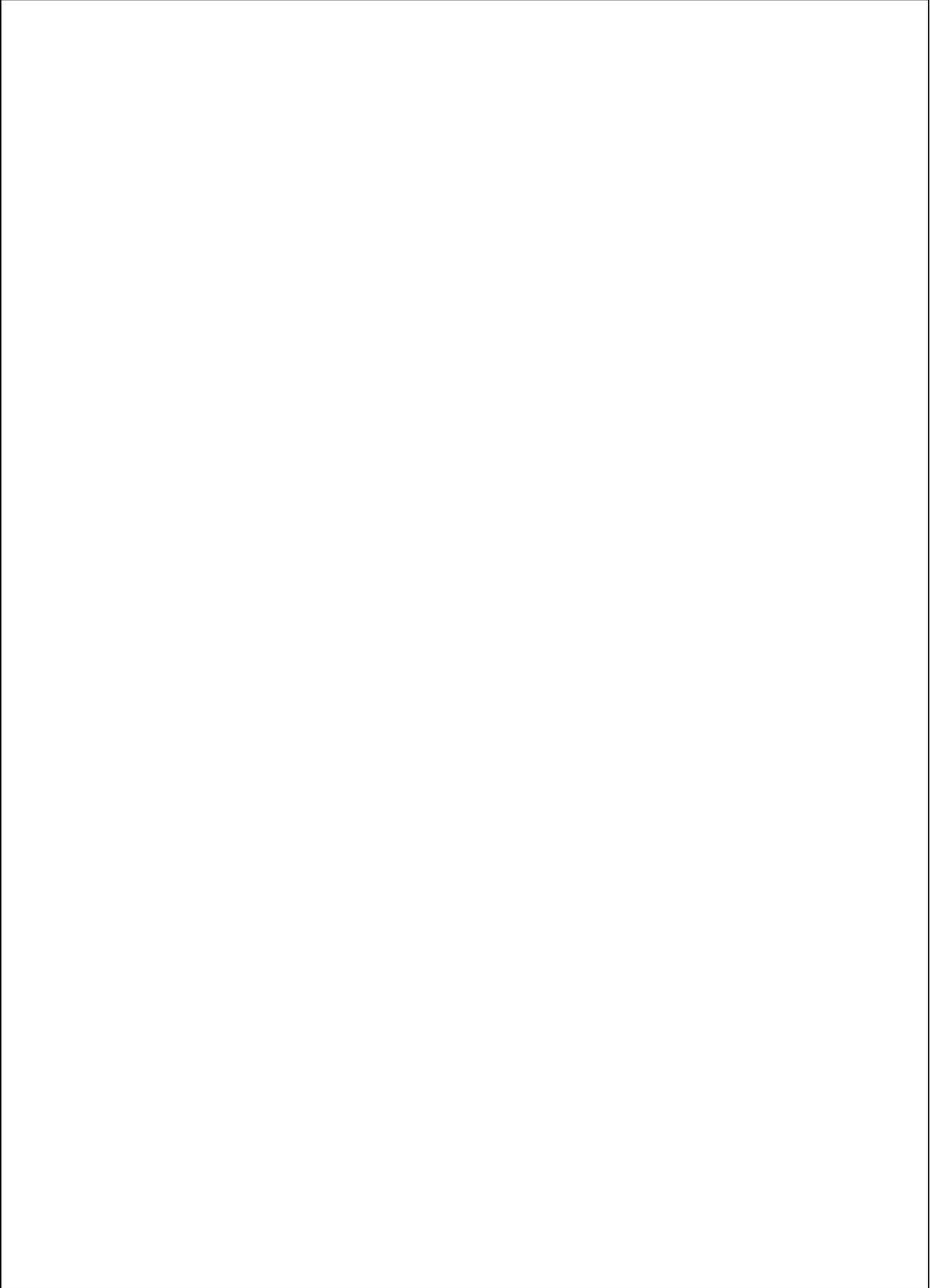


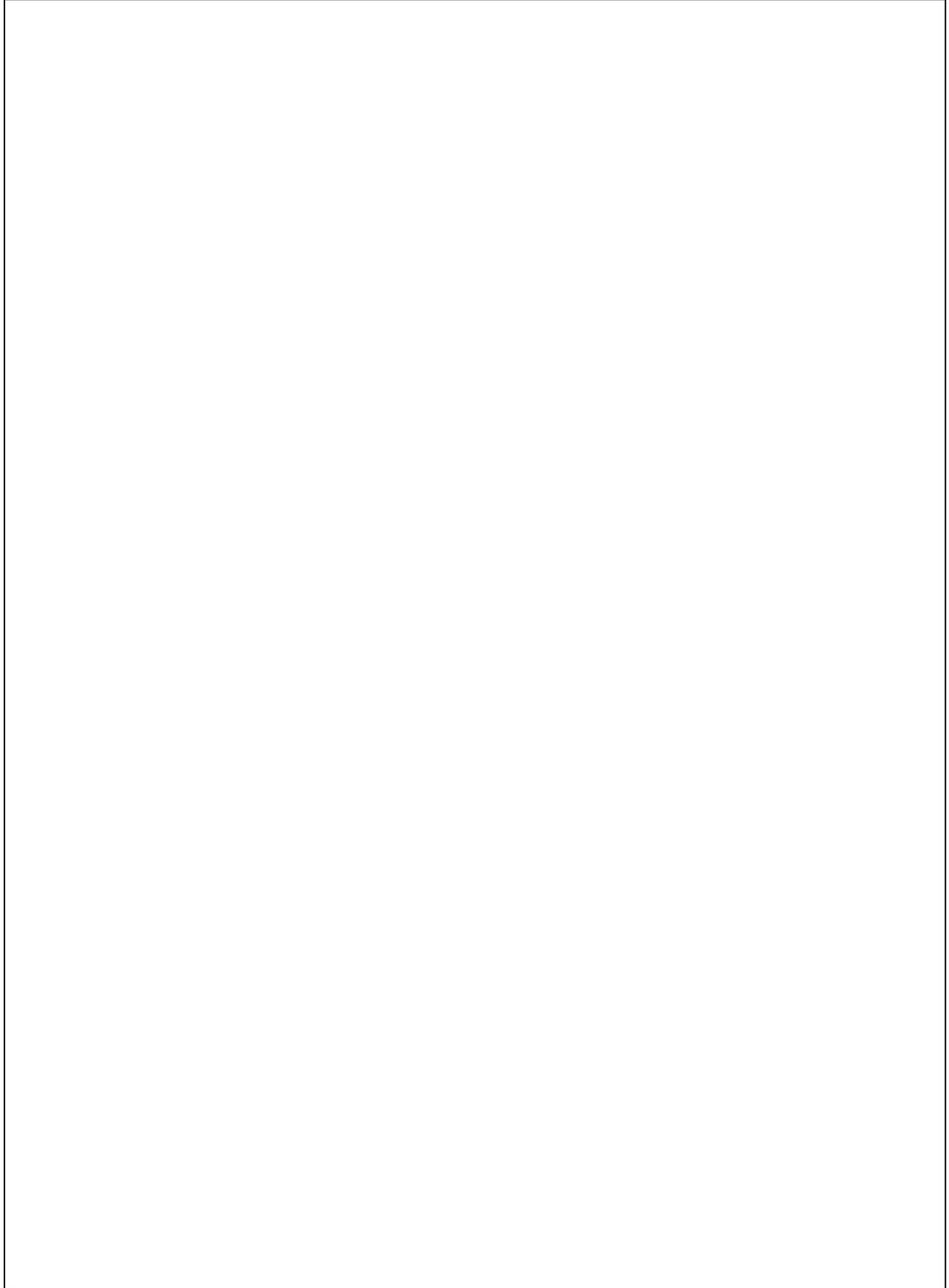
Empty rectangular box for discussion content.

**Conclusion/ Recommendation** *½ - 1 page*

**References** (Vancouver or APA format)

**Tables / Graphs**





## APPENDIX 12

FINAL REPORT RATING SHEET						
<input type="checkbox"/> Medical fellow			<input type="checkbox"/> Resident			
Name:			Department:		Division:	
FRRP #:			Date of receipt:			
Project Title:						
	0	1	2	3	4	Rating
<b>I. Abstract</b>	Poorly concise/ specific and self-contained. Information incomplete or absent.	Moderately concise/ specific and self-contained. Missing key information or description.	Moderately concise/ specific and self-contained. Provides some information but not overly informative.	Concise / specific and self-contained. Provides the majority of key information.	Highly concise/ specific and self-contained. Informative and comprehensive.	
<b>II. Introduction</b>	Fails to provide adequate context, rationale, purpose, and terms. Fails to provide adequate statement of research questions, hypothesis, significance, and limitations.	Poor statement of context supporting rationale for proposed study, statement of why study is needed, statement of purpose, list of term. Poor statement of research questions, hypothesis, significance, and limitations.	Adequate statement of context supporting rationale for proposed study, statement of why study is needed, statement of purpose, list of term. Adequate statement of research questions, hypothesis, significance, and limitations.	Provides clear context supporting rationale for proposed study; clear statement of why study is needed; clear purpose; comprehensive list of terms. Clear statement of research questions, hypothesis, significance, and limitations.	Provides clear context supporting rationale for proposed thesis; clear statement of why study is needed; clear purpose; comprehensive list of terms. Research questions, hypothesis, significance, and limitations clearly stated.	
<b>III. Background</b>	Fails to provide empirical research supporting topic. Synthesis and organization is based on limited information. There is little or poor link to the thesis question. No mention of diversity (e.g., gender, culture, religion, language, etc.).	Minimal review of the literature and little mention of empirical sources. Poor synthesis and organization of the literature, which minimally links it to the thesis question. Minimal or no mention of diversity (e.g., gender, culture, religion, language, etc.).	Adequate review of the literature and empirical sources. Good synthesis and organization of the literature, which is clearly linked to the thesis question. Mention of diversity (e.g., gender, culture, religion, language, etc.), but not clearly linked to the topic.	Good review of relevant and empirical sources. Good synthesis and organization of literature that is clearly linked to thesis question. Some attention to diversity issues pertaining to the topic (e.g., gender, culture, religion, language, etc.).	Thorough review of relevant and empirical sources, citing seminal works in the field. Exemplary synthesis and organization of literature that is clearly linked to thesis question. Specific attention to diversity issues pertaining to topic (e.g., gender, culture, religion, language, etc.).	
<b>IV. Methodology</b>	Fails to provide statement of research design, sample, instruments, and/or procedures. No mention of diversity (e.g., gender, culture, religion, language, etc.).	Provides poor statement of research design, sample, instruments, analysis and procedures with large degree of vagueness. Minimal or no mention of diversity (e.g., gender, culture, religion, language, etc.).	Provides adequate statement of research design, sample, instruments, analysis, and procedures with some degree of vagueness. Mention of diversity (e.g., gender, culture, religion, language, etc.), but not clearly linked to the topic.	Provides good statement of research design, sample, instruments, analysis, and procedures with little degree of vagueness. Some attention to diversity issues pertaining to topic (e.g., gender, culture, religion, language, etc.).	Provides clear and descriptive statement of research design, sample, instruments, analysis, procedures (recipe style). Specific attention to diversity issues pertaining to topic (e.g., gender, culture, religion, language, etc.).	

	0	1	2	3	4	Rating
<b>V. Results</b>	Statistics are inadequate to research question. Reporting of results is not related to research question and hypothesis. Minimal to no use of diagrams and tables.	Provides only descriptive statistics. Reporting of results is clearly related to research question and hypothesis. Adequate and minimal use of diagrams and tables.	Appropriate and adequate analysis and descriptive reporting of results that are clearly related to research question and hypothesis. Adequate and minimal use of diagrams and tables.	Appropriate and good analysis and descriptive reporting of results that are clearly related to research question and hypothesis. Good use of diagrams and tables.	Excellent, appropriate and advanced analysis and descriptive reporting of results that are clearly related to research question and hypothesis. Excellent use of diagrams and tables.	
<b>VI. Discussion</b>	Fails to demonstrate creative, critical, or reflective thinking/practice while interpreting and discussing the results. Lacks mature judgment and sufficient coping abilities.	Poor creative, critical, and reflective thinking/practice. Problems with mature judgment and coping abilities.	Adequate creative, critical, and reflective thinking/practice. Adequate judgment and coping abilities.	Good creative, critical, and reflective thinking/practice. Mature judgment; good coping abilities.	Exemplary creative, critical, and reflective thinking/practice. Mature judgment; good coping abilities.	
<b>VII. Conclusion</b>	Fails to provide adequate summary, recommendation and/conclusions.	Poor summary, critic, and recommendations for implementation and further research.	Adequate summary, critic, and recommendations for implementation and further research.	Good summary, critic, and recommendations for implementation and further research.	Sophisticated summary, critic, and recommendations for implementation and further research.	
<b>VIII. References</b>	Little or no conformation to referencing standards.	Many substantial consistent referencing errors.	Some minor consistent referencing errors.	Few referencing errors, none consistent.	Exemplary referencing format / style throughout.	
<b>IX. Written Communication</b>	Writing does not flow well, is not clear, concise, comprehensive, nor does it use proper transitions. Poor use of proper grammar and spelling.	Poor writing that does not flow well: is not clear, concise, comprehensive nor does it use proper transitions. Uses proper grammar and spelling.	Adequate writing that flows well: clear, concise, and comprehensive, and clear transitions. Uses proper grammar and spelling.	Good writing that flows well: clear, concise, comprehensive, and uses clear transitions. Uses proper grammar and spelling.	Exemplary writing that flows well: clear, concise, comprehensive, and uses clear transitions. Uses proper grammar and spelling.	
<b>X. Ethical and Legal Standards</b>	Little or no application of standards. Failed to submit/gain for Human Subjects Approval appropriate.	Substantial misapplication of ethical & legal standards. Submit appropriate forms for Human Subjects Approval.	Some misapplication of ethical or legal standards. Submit adequate request for Human Subjects Approval.	Adequate application of all ethical & legal standards. Submit proper request for Human Subjects Approval.	Exemplary application of all ethical & legal standards. Submit exemplary request for Human Subjects Approval.	
<b>FINAL RATING (Add Items I - X and divide by 10)</b>						
<b>Evaluator's Name &amp; Signature:</b>						
<b>Additional Comments (if any):</b>						



**Fellowship and Residency Research  
Program**  
Faculty of Medicine  
American University of Beirut  
Beirut, Lebanon  
Tel: (01) 350-000 ext. 5776  
*Email: [frrp-fm@aub.edu.lb](mailto:frrp-fm@aub.edu.lb)*

## **APPENDIX 13**

**FRRP**  
**FINAL PRESENTATION**  
**FORM**

[http://www.aub.edu.lb/fm/medicalresearch/ClinicalandTranslationalResearch/FRRP/Pages/  
FRRPForms.aspx](http://www.aub.edu.lb/fm/medicalresearch/ClinicalandTranslationalResearch/FRRP/Pages/FRRPForms.aspx)



APPENDIX 14

FRRP  
FINAL PRESENTATION RATING SHEET

<input type="checkbox"/> Medical fellow		<input type="checkbox"/> Resident	
Name:		FRRP#:	
Department:	Division:	Date of receipt:	
Project Title:			
<b>Please give a score of 0 - 4 for each item</b>			
<b>I - INTRODUCTION</b>			
Covered adequately literature around topic	0	1	2 3 4
Provided adequate / relevant references			
<b>II - OBJECTIVES</b>			
Stated objectives properly	0	1	2 3 4
Provided relevant justification / rationale			
<b>III - METHODS</b>			
Used appropriate study design	0	1	2 3 4
Used appropriate sample size and sampling technique			
Explained data collection adequately	0	1	2 3 4
Explained data management and analysis adequately			
<b>IV - RESULTS</b>			
Presented data appropriately in tables and graphs	0	1	2 3 4
Provided relevant summary of descriptive data			
Applied appropriate statistical tests			
Used p-values/confidence intervals/OR /RR/other measure appropriately			
<b>V - DISCUSSION / INTERPRETATION</b>			
Interpreted significant results appropriately	0	1	2 3 4
Compared results with other similar studies			
<b>VI - CONCLUSION</b>			
Applied results according to the objectives of the study	0	1	2 3 4
Provided a final message from the study			
<b>VII - PRESENTATION SKILLS</b>			
Followed right sequence of presentation	0	1	2 3 4
Delivered material effectively			
<b>VIII - PREPARATION</b>			
Answered questions confidently	0	1	2 3 4
Demonstrated adequate knowledge of the subject			
<b>OVERALL SCORE:</b>			
EVALUATOR'S NAME		EVALUATOR'S SIGNATURE	
Comments:			



## APPENDIX 15

### American University of Beirut Medical Center (AUB-MC) Faculty of Medicine

### Fellowship and Residency Research Program (FRRP) Resident's FRRP Evaluation Questionnaire

---

Dear Residents,

We hope the Fellowship and Residency Research Program (FRRP) added considerably to your medical education.

Nevertheless, like any other newly initiated program, it is crucial to evaluate the process and identify any gaps in the program.

Thus, we would like to ask you to take the time to fill this questionnaire, which will help in further understanding this important educational experience.

If you have any questions, comments, or suggestions, please do not hesitate to contact us.

Thank you in advance,

**Fellowship and Residency Research Program (FRRP)**

**Faculty of Medicine**

**American University of Beirut**

**Beirut, Lebanon**

**Tel: (01) 350-000 ext. 5776**

**[Email: frrp-fm@aub.edu.lb](mailto:frrp-fm@aub.edu.lb)**

<b>Resident-Graduation Year</b> _____		
<b>Name:</b>	<b>Email:</b>	<b>Department:</b>
<b>Mobile</b>	<b>Pager:</b>	<b>Division:</b>

**Research Background**

○ Since joining the Fellowship and Residency Research Program (FRRP), have you been involved in a research project outside the program?

No    Yes. If yes, indicate:

- Type of project:

Clinical Research       Chart Review       Prospective       Basic Science

Basic Science

- What was your role in the project:

Data collection                       Patient recruitment

Literature Review                       Other; specify: \_\_\_\_\_

○ Did you have publications related to your research work?  No    Yes, reference:

\_\_\_\_\_

\_\_\_\_\_

Principal Investigator: \_\_\_\_\_

Dept.: \_\_\_\_\_

**The following questions are related to the period after Fellowship and Residency Research Program (FRRP)**

Currently, how do you perceive your skills and knowledge in the following areas?

	None	Adequate	Good	Very good	Excellent
Literature review					
Using PubMed					
Reading articles					
Summarizing articles					
Defining research objectives					
Constructing a questionnaire					
Writing proposal					
Applying for research approval					
Data collection					
Data entry					
Data analyses					
Data summarization					
Writing a report: Introduction					
Writing a report: Methods					
Writing a report: Results					
Writing a report: Discussion					

Writing a report: Tables/graphs					
Writing a report: References					
Submission for publication					
Study presentation					

**The following questions are related to the specific project you worked on to satisfy the FRRP requirements:**

The study design is: Cross sectional (survey): [ ]

Chart review: [ ]

Other: [ ]

Did you collect the data: No: [ ] Yes: [ ]

Did you analyze the data: No: [ ] Yes: [ ]

How many months did it take you to finish the project (from start to end): \_\_\_\_\_ months

Please indicate the level of agreement with the following statement relating to your supervisor(s):

Your supervisor:	Strongly disagree	Disagree	Neither / Nor	Agree	Strongly agree
Has adequate research expertise					
Was helpful during the process					
Allocated enough time					
Was easy to be reached					
Provided important advice					
Provided constructive feedback					
Reviewed documents promptly					
Supported you					

What were the things you liked about your supervisor? Please elaborate.

---



---

What were the things you did not like about your supervisor? Please elaborate.

---



---

Please indicate the level of agreement to the problems you have faced during the FRRP process. (Please specify “NA” for Not Applicable where appropriate)

**I had problems with the following:**

	Strongly disagree	Disagree	Neither / Nor	Agree	Strongly agree
Identifying a topic					
Identifying a supervisor					
Writing proposal					
Getting approval					
Data collection					
Data entry					
Data analyses					
Data summarization					
Report writing					
Time management					
Supervisor relationship					
Time frame for the project					
Lack of knowledge					

What other problems have you faced throughout the process? Please elaborate.

---



---

Please indicate the level of agreement to the following statements

	Strongly disagree	Disagree	Neither / Nor	Agree	Strongly agree
FRRP enhanced my interest in research					
The FRRP is an important component of the curriculum					
I will carry out research in the future					
I have the expertise to initiate a research project					
I have the expertise to finalize a research project					
I have the expertise to publish in medical journals					
I have the expertise to present in national and international conferences					
The FRRP was a waste of my time					
The time allocated for the FRRP could have been utilized for better purposes					

Please specify any modifications you would suggest to enhance the Fellowship and Residency Research Program (FRRP):

---



---



---

Please add any additional comments you might have:

---



---



---

Please indicate the level of agreement to the following statements

**For future medical students (residents and fellows), I would recommend that:**

	Strongly disagree	Disagree	Neither / Nor	Agree	Strongly agree
The FRRP is cancelled from the curriculum					
The FRRP is made an optional part of the curriculum					
The FRRP should be kept as it is					
More time is given to do the FRRP project					
A dedicated time is given to do the FRRP					
More teaching in data analysis is required					
More teaching in paper writing is required					
Supervisors are to be made more aware and committed to the projects					

Thank you

**APPENDIX 16**

**“PHYSICIAN-IN-TRAINING” TIME TABLE**

**Period: 3 years**

**First Year**

June	Interest questionnaire
July	CITI courses certificate
August	Letter of Intent
September	
October	
November	
December	
January	
February	Full Proposal
March	
April	
May	



**Second Year**

June	Department presentations for methodology feedback
July	IRB Approval
August	
September	Data Collection
October	
November	
December	
January	
February	
March	
April	
May	



**Third Year**

June	Data Collection
July	Data Analysis
August	
September	Department presentations for results feedback
October	
November	
December	Manuscript write-up
January	
February	Final Department presentations
March	Poster creation
April	OPEN HOUSE
May	

**"PHYSICIAN-IN-TRAINING" TIME TABLE**

**Period: 2 years**

<i>First Year</i>			<i>Second Year</i>	
June	Interest questionnaire	➔	June	Data Collection
July	CITI courses certificate		July	
August	Letter of Intent		August	
September			September	
October	Full Proposal		October	Data Analysis
November			November	
December			December	Manuscript write-up
January			January	
February	IRB Approval		February	Final Department presentations
March			March	
April	Data Collection		April	Poster creation
May			May	<b>OPEN HOUSE</b>

"PHYSICIAN-IN-TRAINING" TIME TABLE

Period: 1 year

<i>One Year Timeline</i>	
June	Interest questionnaire
July	CITI courses certificate
August	Letter of Intent
September	Proposal
October	IRB approval
November	Data Collection
December	
January	Data Analysis
February	
March	Manuscript write-up
April	Poster creation
May	<b>OPEN HOUSE</b>