

Resident Research – Project Criteria

The Resident Research Advisory Committee has developed Project (and Supervision) criteria to help ensure that Resident research projects are feasible, can be completed before the end of residency, have a high likelihood of being presented at conferences or published, and enable the Resident to meet their required learner milestones.

APOG recommends that the Resident research project consist of two parts

- Study development
 - Research Hypothesis,
 - Research Protocol and
 - Ethics Submission (if not part of a previously approved project)
- Data collection and analysis
 - Data collection and
 - Data analysis

This two part compartmentalization of research projects is meant to enable a Resident to start and finish different research projects i.e., carry out Study development but not Data collection and analysis or vice versa.

APOG suggests the following types of study as being appropriate for a Resident research project:

- One retrospective study (i.e. chart review) and a case report (with review of the literature), or
- Two retrospective studies (different research questions), or
- One prospective Study, or
- One meta-analysis of published data, or
- One basic science study, or
- One Randomized-Controlled Trial (RCT)

Some useful guidelines for research projects are listed below (Source: Directed Studies Research Project Course in Medical Genetics):

- Must pertain to a clinically relevant topic (in Obstetrics & Gynaecology)
- May focus on a small series of cases which illustrates a novel concept or answers a specific question.
- Can include the evaluation of an innovative educational tool, screening tool, or counselling strategy.
- May involve analysis and interpretation of data from an existing research project or database that answers a new question.
- May require generation of new data followed by analysis and interpretation in order to answer an original question.
- May include analysis of data obtained from a survey (of patients or allied health professionals) carried out by the Resident.

If a Resident is involved with a project where others have completed part of the project, proper recognition and acknowledgement must be given to the previous contributors. Plagiarism, in any form, will not be tolerated, will be reported to the appropriate University officials and may result in significant penalties.

Considerations

Consider the following to determine if the project is appropriate for Resident research

- 1) **Sample size** – is the sample size feasible and reasonable (given Residency time constraints) and is it sufficient to produce meaningful results (i.e. large enough to contribute to knowledge on the topic and/or clinical care and to detect a statistically and clinically significant effect)?
- 2) **Data access and availability** – is it possible to collect data on the topic of interest? Are data routinely collected as part of the medical chart? Is data documentation required, are the data accessible via the existing hospital records system or are further applications for data access required (i.e. through Data Access Requests to Perinatal Service BC or to the Health Authority)? Have privacy and confidentiality policies been addressed?
- 3) **Time requirements/Timeline** – can the project be finished within 3 to 4 years of residency; with limited protected research time available to the Resident.
- 4) **Ethics** – has UBC research ethics approval been obtained for the research project?

Resident Responsibilities

The Resident is responsible for designing, implementing and completing the project. This includes reaching out to their Supervisor and/or Mentor or other Resident Research Advisory Committee members if they need guidance, clarification or run into any challenges. There may be considerable variability in how much previous experience residents have with research, so when in doubt, please ask for assistance.

Supervisor Responsibilities

The Supervisor(s) is responsible for providing guidance and input to the Resident on all aspects of the project. The primary Supervisor is expected to meet with the Resident on a regular basis (i.e., at least monthly) to discuss the progress of the project and provide guidance. Ideally, the Supervisor should also be involved in guiding the Resident regarding developing and submitting an abstract to a national meeting. When appropriate, the primary Supervisor should also guide the process of submitting the paper for publication.

Advisory Group Mentor Responsibilities

Members of the Resident Research Advisory Committee will provide general guidance to Residents with regard to their research project. Their role will be secondary to that of the Supervisor in the typical circumstance when adequate progress is being made on the Resident Project. Please refer to the Terms of Reference for Mentorship.

Resident Research Requirements

1. Complete training in research design
2. Complete one research project by the end of Residency
3. Present (at least twice) at Research-in-Progress Academic Half-day
4. Present (at least once) at the Annual Department Academic Day or at a national or international conference
5. Consider submitting the written manuscript for publication.

Recommended Resident Research Timeline

PGY1

- Identify your area of interest

PGY1/2

- Select a potential project and Supervisor

PGY2

- Meet with the Supervisor to discuss the research question and study design, which may include submission for ethical approval
- Present your research idea at the Research-in-Progress Academic Half-Day

PGY3/4

- REB approval must be obtained prior to the start of the research block
- Present an update/progress report on the research project at the Research-in-Progress Academic Half Day

PGY3/4

- Present completed work at the annual Department Academic Day and/or national and international conference

PGY5

- Publish your work

NB: The only protected time for research is in PGY3 (4weeks) – therefore it is recommended that you make time to work on your research throughout your Residency.