Scholarly Curriculum for Psychiatry Residents

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PREAMBLE

The specific goals and objectives for the Scholarly Curriculum are divided into "core objectives" which are relevant to all residents and "proficiencies" which are relevant to those residents with more specific training objectives in research. It is anticipated that the former will provide the necessary background for those intending to focus primarily in clinical practice and encompass the competencies, training experiences, and entrustable professional activities mandated by the RCPSC, whereas the latter will be of particular interest to residents intending to undertake a career which includes a stronger research component such as an academic career, industry research, etc. For proficiency in research, see additional 'Research Track' guidelines.

COMPETENCIES

As per the RCPSC Psychiatry Competency document of 2020, the following CanMEDS competencies are relevant to the Scholarly curriculum: Medical Expert, Leader, Healthy Advocate, and Scholar.

MEDICAL EXPERT

1. Practise medicine within their defined scope of practice and expertise
    1.3.15. Evidence-based health care
    1.3.15.1 Critical appraisal

1.3.16 Principles of quality assurance and improvement

1.3.17 Research methodology

5. Actively contribute, as an individual and as a member of a team providing care, to the continuous improvement of health care quality and patient safety

LEADER

1. Contribute to the improvement of health care delivery in teams, organizations, and systems

1.1 Apply the science of quality improvement to systems of patient care

1.2 Contribute to a culture that promotes safety

1.2.1 Assess and manage safety/risk for staff and care providers in all settings

1.3 Analyze patient safety incidents to enhance systems of care

1.4 Use health informatics to improve the quality of patient care and optimize patient safety

2. Engage in the stewardship of health care resources

2.1 Allocate health care resources for optimal patient care

2.2 Apply evidence and management processes to achieve cost-appropriate care

3. Demonstrate leadership in health care systems

3.1 Demonstrate leadership skills to enhance health care

3.2 Facilitate change in health care to enhance services and outcomes

HEALTH ADVOCATE

2.   Respond to the needs of the communities or populations they serve by advocating with them for system-level change in a socially accountable manner

2.2   Improve clinical practice by applying a process of continuous quality improvement to disease prevention, health promotion, and health surveillance activities

2.3   Contribute to a process to improve health in the community or population they serve 2.3.1. Identify opportunities for advocacy, health promotion, and disease prevention, applying knowledge of

2.3.1.1. Major regional, national, and international advocacy groups in mental health care

2.3.1.2 Governance structures in mental health care

SCHOLAR

3. Integrate best available evidence into practice

3.1 Recognize practice uncertainty and knowledge gaps in clinical and other professional encounters and generate focused questions that can address them

3.2 Identify, select, and navigate pre-appraised resources

3.3 Critically evaluate the integrity, reliability, and applicability of health-related research and literature

3.4. Integrate evidence into decision-making in their practice

4. Contribute to the creation and dissemination of knowledge and practices applicable to health

    4.1 Demonstrate an understanding of the scientific principles of research and scholarly inquiry and the role of research evidence in health care

        4.2 Identify ethical principles for research and incorporate them into obtaining informed consent, considering potential harms and benefits, and considering vulnerable and marginalized populations

        4.2.1 Adhere to guidelines for ethical research, including: obtaining valid consent, where appropriate; lack of coercion; and avoidance of harm

        4.3 Contribute to the work of a research program

        4.4 Pose questions amenable to scholarly investigation and select appropriate methods to address them

        4.4.1 Conduct scholarly work, including research, quality assurance, and/or educational initiatives

        4.5 Summarize and communicate to professional and lay audiences, including patients and their families, the findings of relevant research and scholarly inquiry

TRAINING EXPERIENCES

The following training experiences are included within the Scholarly Curriculum as per stages of training recommended by RCPSC. All training is required, unless designated as recommended:

1.TRANSITION TO DISCIPLINE

 2.3. Orientation to program, postgraduate and institutional policies, procedures, protocols, and resources

2. FOUNDATIONS OF DISCIPLINE

2.1.21. Principles of patient safety and quality assurance and improvement
2.1.21.1. Principles of Plan-Do-Study-Act (PDSA)
2.1.22. Principles of critical appraisal and literature review

    Recommended:
    4.2. Participation in quality improvement (QI) rounds
    4.3. Scholarly activity, including research, quality assurance, or education

3. CORE OF DISCIPLINE
2.4. Participation in QI rounds
2.5. Scholarly activity, including research, quality assurance, or education

4. TRANSITION TO PRACTICE Recommended:
    4.1. Participation in a project evaluating costs of patient treatment in different settings
    4.2. Participation in a quality improvement initiative

CORE OBJECTIVES

The resident will be able to review, synthesize, and critically appraise a body of research literature concerning a clinical issue or problem in psychiatry, formulating appropriate conclusions about what is justified by the relevant literature, what are the major shortcomings in the existent research, what would be priorities for future research, and implications of the research literature for clinical practice.

The resident will be able to design, conduct, implement and report on a Quality Improvement (QI), Program Evaluation (PE), and /or patient safety project. Residents may also collaborate on a research project under the supervision of a faculty member in the department.

HOW WILL THE LEARNING EXPERIENCE TAKE PLACE?

Basic aspects of the knowledge components of core objectives will be acquired through a variety of teaching and training activities. These include formal instruction via the longitudinal courses in 'Research in Psychiatry' and 'Quality Improvement' held on weekly academic day, attending and presenting during the monthly Critical Appraisal Rounds, and attending monthly and presenting annually during the Scholarly Project Update Group. The skills component of the core competencies will be acquired through completion of a Scholarly Project and Reflective Learning Exercises, as well as additional formal instruction in optional Research Electives.

FORMAL INSTRUCTION

Longitudinal courses will be provided by synchronous or asynchronous video presentations. If an asynchronous video is available online it is hyperlinked below; otherwise please plan to attend during regularly scheduled live programming.

PGY1: Intro to Scholarly Project and Research in Psychiatry, Introduction to Continuous Quality Improvement, Randomized Controlled Clinical Trials, Reflective Exercise on Patient Safety/QI incident.

PGY2: Intro to Research Design and Key Concepts, Intro to Research Ethics and Research Ethics Board (REB) Protocol Writing, Psychometrics for Psychiatrists, Observational Studies in Psychiatry, Pharmacotherapy and Non-pharmacotherapy Clinical Trials

PGY3: Introduction to Cognitive Neuroscience Techniques in Psychiatry Research, Health Services Research, Qualitative Research Methods, Knowledge Translation, Systematic Review and Meta-Analysis, Workshop on QI/PS (Interactive 2 hour workshop).

PGY5/TTP: Reflective Exercise on Patient Safety/QI incident; **QI opportunities available locally for senior residents (1 hour session)**

CRITICAL APPRAISAL ROUNDS (CAR)

An information video on CAR is available. This takes place once a month (4th Thursday, 4.15 to 5.30pm). Attendance online by zoom at these seminars is mandatory for PGY 2, 3 and 4 residents, while the Presenting Resident attends and presents in-person, if possible, at the office of the Scholarly Lead, currently Dr. Frewen. In-person presentations will take a conversational format as a video podcast, with slide sharing only as needed. Each resident is expected to have presented at least one paper during the second year of residency. Faculty with relevant expertise in the subject areas may also be invited to attend. Dr. Paul Frewen chairs this session and completes assessments for residents regularly. Residents are expected to have an F5 or C10 EPA assessment completed after presenting at these rounds.

To further optimize the educational value of these rounds for all residents as well as to better improve residents' ability to critically evaluate the medical literature and how it applies to clinic practice, the "User's Guides to Medical Literature" series from JAMA has been incorporated into the presentations. Residents are assigned a specific reference from the "User's Guide", and they use their assigned reference to guide them in selecting an article, analyzing the article, and presenting it at rounds. Residents use the worksheet associated with each section in the JAMA Users' Guides to guide their discussion of each article. Each worksheet includes the specific questions that are important for analyzing and understanding the article that the resident plans to address.

SCHOLARLY PROJECT UPDATE GROUP (SPUG)

PGY 1 to 4 are expected to attend these meetings, which take place once a month (2nd Thursday, 12 to 1 pm) typically via video-conferencing (e.g., Zoom/Teams). The meetings are chaired by the Scholarly Portfolio Lead who makes every effort to keep the atmosphere supportive and intellectually stimulating. Residents are invited to present alone or are free to co-present with their supervisors the results of their completed scholarly projects during their fourth year of study. This group also provides a forum for junior residents to present scholarly ideas and updates for discussion and to receive early feedback in years 2-3. The Group provides residents with an opportunity to learn about Scholarly activities going on within the Department and link up with mentors. The objectives of the scholarly project itself are described below.

COMPLETION OF A SCHOLARLY PROJECT DURING RESIDENCY

A significant component of the scholarly curriculum involves completion of a mandated scholarly project under supervision of a faculty member.

Residents may participate in a scholarly research, quality improvement, or a scholarship of teaching and learning project relevant to Psychiatry, demonstrating primary responsibility for at least one of the following elements of the project:
- Development of the hypothesis, which must include a comprehensive literature review
- Development of the protocol for the scholarly project
- Preparation of a grant application
- Development of the research ethics proposal
- Interpretation and synthesis of the result
- Literature review to conduct Meta-analysis/Systematic review

The residents must start their project at the latest by PGY3 year and finish at the latest by PGY4 year. It is further expected that by Christmas of PGY2 year, the resident will identify a scholarly project that they wish to work on and choose a supervisor relevant to the area of interest. If the resident is interested the scholarly project can be started earlier, in PGY1 year.

It is expected that the project will be conducted over a period of 1 to 2 years and cannot be conducted exclusively in a research selective or elective block. The residents are required to submit a report at completion of their project and present the findings of their project at the SPUG before the end of PGY4. Additional presentations are encouraged at the annual spring departmental research day (October) as either a poster or podium presentation, or any other similar venue as agreed upon with the Scholarly Portfolio Lead.

Starting in December of PGY2, residents must submit a scholarly activity report form (self-sent and completed by resident) before the second and fourth Competence Committee (CC) meetings (typically occurring January and July) each year they are actively completing their scholarly project requirements. Starting at the end of PGY2 year they must also send an ITAR to their research project supervisor prior to the second and fourth Competency Committee meetings. It is advised that the ITARs be sent at least a month in advance to give the supervisor time to complete the ITAR prior to the Competency Committee's file review. It is also advised to follow-up with the supervisor if the ITAR has not been completed by the deadline for document submission to the Competence Committee. When a scholarly project is completed, the resident must send a final ITAR2 to their research supervisor, at the latest by end of PGY4.

Supervisors can be a faculty member from another department as long as they are willing to take the following responsibilities):
▸ Supervise and assess the resident on the basis of the observations made during the conduct of a project; the written report and the presentation during the SPUG.
▸ Provide regular communication and feedback to residents and complete the ITARs every six months (June and Dec) until the end of the project when the final assessment will be completed. The residents are expected to regularly send these ITARs on One 45 to their supervisors for completion. It will be required that residents send their supervisor Scholarly Project ITARs at least twice per year (before the December and June Competency Committee meetings).
▸ Ensure that the scholarly project is progressing as per schedule and address any challenges faced by the resident in timely completion of the project.
▸ Bring any concerns regarding the progress of the trainee to the attention of the PGE Program Director, at the earliest possible time.
▸ Note that the Department of Psychiatry provides MBR points to faculty members who supervise residents for a research/quality improvement project.

RESEARCH ELECTIVES

Research selective/elective are available in the PGY1 year (minimum 1 block/4 weeks, maximum 2 blocks/ 8 weeks) and during PGY4 or 5 (elective: minimum 2 blocks/8 weeks, maximum 6 blocks or 24 weeks).

Electives may be used to gain experience in a specific research area, which may be an extension of the project the resident has already been involved in or a new area of interest.

An elective cannot be used to complete data analysis/writing up of a paper for publication for the mandatory scholarly project. The acceptability and duration of a research elective will depend upon 1) Approval of the individual resident's proposal by the supervisor and 2) Submission of a proposal (at least 3 months in advance) detailing the rationale of the work to be carried out, time frame and the learning objectives (Elective proposal application form).

SUPPORT/RESOURCES AVAILABLE FOR RESIDENTS

▸ Half academic day (Thursdays) every 6 weeks in PGY2-4 years is available as protected time for Scholarly activities. Afternoon sessions on Thursdays are shortened to 2 hours to allow time for psychotherapy and scholarly activities.

▸ Residents have access to an academic fund of $150 per year to support their scholarly activities, which can be used yearly or can be accumulated over the 5 years to be used as and when needed. Residents are regularly made aware by e-mail of other opportunities for academic awards, announced by Schulich School of Medicine and Dentistry, Canadian Psychiatric Association, Royal College of Physicians and Surgeons of Canada and other academic organizations in North America.

▸ Dr. Arlene MacDougall, Director of Research is available to provide consultations re: research methodology/statistics or mentorship

▸ The residents' research representative works collaboratively with the Residency Program Committee to advocate for research related needs of the residents

▸ There are Annual Resident Researcher and Quality Improvement Award

▸ All PGY1s during their orientation month in July receive a 45 min session on Introduction to the Scholarly curriculum.

Residents can become familiar with opportunities available in the department in several ways:

• Look up the Research section and Annual Report at the Department of Psychiatry website, which provides details of ongoing research in various divisions of the department http://www.schulich.uwo.ca/psychiatry/research/index.html

• Watch out for the opportunities for scholarly/quality improvement projects available within the department; regular emails are sent out when such opportunities arise; also check out weekly newsletter from the office of the Research director.

• Attend the Scholarly Project Update Group, which is held once a month.

• Consult with the Scholarly Portfolio Lead and/or Director of Research to discuss appropriate mentors for any specific areas of interest that a resident may have.

LAWSON MANDATORY TRAINING REQUIREMENTS FOR CLINICAL RESEARCH

All residents are mandated to complete training requirements, developed by Lawson Health Research Institute (LHRI). Please see LHI's Training Requirement Toolkit. These requirements are designed to provide direction for education and training in accordance with Lawson's policies and Standard Operating Procedures (SOPs).

ASSESSMENT OF CORE OBJECTIVES (Overseen by Competence Committee)

Attendance is mandatory at all of the above teaching and training activities. Completion of the core objectives will also be assessed on the basis of the regular ITARs (In-Training Assessment Reports) completed by their supervisors and the 'scholarly activity report form' submitted twice each year (January and July) by the resident prior to the quarterly review by the Competence Committee. Two written reports on Reflective Learning Exercises are also completed, as is the Scholarly Project. The core objectives are expected to be completed by the end of PGY4.

PROFICIENCY IN RESEARCH: RESIDENT RESEARCH TRACK

A Resident Research Track is available for qualified candidates with previous experience in research and a clear interest in pursuing an academic career in psychiatry.

The Research Track offers residents dedicated research time and training from PGY2 to the completion of residency while ensuring the resident meets the full clinical training requirements of the Royal College of Physicians and Surgeons of Canada. When possible, clinical training placements for Research Track residents will be organized to allow integration with research.

Graduate Degree Training:

Research Track residents will have an opportunity to apply to a graduate degree program (masters or start a PhD) during their PGY4-5 years.

The Schulich School of Medicine & Dentistry offers the Royal College of Physician and Surgeons of Canada's accredited Clinician Investigator Program (CIP), which supports residents to engage in a minimum of 24 months of continuous, intensive research training. At Schulich, the CIP provides 2 years of financial support for residents to complete a graduate program offered through one of Schulich's basic science departments (e.g., Epidemiology and Biostatistics, Anatomy and Cell Biology, Medical Biophysics, etc.). As part of the CIP, residents also participate in a research seminar series focused on the development of clinical investigators. Note that the CIP is a competitive program with only 2-4 spots available per year. Applications are typically due early January. Please go to: https://www.schulich.uwo.ca/research/student_trainee_programs/clinical/clinical_investigator_program.html for more information on Schulich's CIP including contacts and the application process.

NOTE: Residents who are not part of the CIP but who want to complete a graduate degree as part of their Research Track will need to secure / self-fund their own graduate degree tuition costs.

EXPECTATIONS AND ASSESSMENT:

In addition to the expectations to achieve Core competencies detailed above, as part of the Resident Research Track, residents will be encouraged to develop greater proficiencies in various research knowledge and skills primarily by way of the resources provided by their supervisors, including:

- Developing and maintaining databases
- Elements of writing research proposals, reports and grant applications o Preparation and submission of a research ethics protocol
- Analyze data using appropriate methods and common computer programs for statistical analysis including more advanced statistical methods such as multiple and logistic regression, analysis of covariance, data reduction techniques (eg. factor analysis, cluster analysis), survival analysis and multivariate analysis.
- Formulate appropriate conclusions on the basis of the data.
- Competently use one or more advanced research methods (e.g., psychophysiology, imaging, psychometrics, genetics, formal modeling, etc.)
- Write one or more papers for publication in a peer-reviewed indexed journal

Research Track residents are expected to achieve the following deliverables:
1. At least two first author conference abstracts (national/international conferences). 2. At least one first author manuscript publication in indexed peer-reviewed journal.

Although research track residents are encouraged to engage in primary data collection for their project, secondary data analysis projects will be considered. Systematic reviews and metaanalyses are welcomed but are not considered a sufficient deliverable alone for the resident research track.

An expected timeline for the Research Track is as follows:

PGY1 – Research Elective

PGY2 – Half-day per week protected time on inpatient and outpatient (1/8 of clinical time, means that an additional 0.75 block must be made up for 6 blocks, leading to an additional block of training in each of inpatient and outpatient) 4 additional half-days may be taken over 7 blocks of each inpatient and outpatient to make a full day on those weeks.
Inpatient can be 2 x 2-block supervisors and 1 x 3 block supervisor
Outpatient can be 1 x 7-block supervisor for 2 days/wk and 1 x 3-block selective for 1.5 days/wk, 1 x 4-block supervisor for 1.5 days/wk.
Timeframe: Block 1 (July) of PGY2 year to end of block 1 in PGY3 year

PGY3 – Half-day per week, C&A and Geriatric psychiatry still 6 blocks each (means 0.75 blocks less overall training time for each of C&A and Geriatric). May have 8 additional half-days over the year to make full days as necessary.
Timeframe: Block 2 of PGY3 year to block 13 of PGY3 year

PGY4 – No protected time for research, allowing focus on exam preparation and remaining core rotations.
Timeframe: Block 1-13 of PGY4 year.
Note: Electives to be after the exam, to maximize time in relevant clinical rotations

PGY5 – Elective time, as much as needed can be used for research (with usual expectations regarding TTP, elective proposals and products from the elective time)

Residents on research track must maintain a status of progressing as expected throughout their training, including for clinical abilities and collection of EPAs and other longitudinal requirements.

Must meet longitudinal expectations (including psychotherapy, call, attendance at academic day) and meet expectations on clinical rotations. If expectations for training are not met by the adjusted end of the block, additional training time may be required for that area of practice. If there are major or repeated problems with meeting expectations in clinical training, the research track may be suspended or discontinued.

Research Track residents are expected to complete an assessment by their supervisor every 3 months beginning in PGY2 (using **Research Track Assessment** Tool).

HOW TO APPLY:

Interested candidates in the Research Track are strongly encouraged to complete a research elective (1 - 2 months) in PGY1. This elective time offers an opportunity for residents to identify, consult and work with potential Research Track Supervisors, and to prepare their Research Track proposal. The Department of Psychiatry's Scholarly Portfolio Lead, the Residents Program Committee and the Director of Research will be available to assist interested candidates in identifying and connecting with potential research supervisors.

Research Track Applications must be submitted by April 30 of the PGY1 year to the Psychiatry Postgraduate Education Office (email PGE Psychiatry). Applications will be evaluated by the PGE program director/associate director, the PGE Scholarly Portfolio Lead, the Director of Research and two senior resident representatives, and may require follow-up interviews. **Up to two Research Track positions can be accommodated annually.** Candidates will be evaluated on their prior demonstrated research activity/productivity, their interest and proposed pathway to an academic career in psychiatry, and the strength of their research proposal including the research mentor/supervisor identified. Candidates who have completed a research thesis (i.e., honors/masters/doctoral) are especially encouraged to apply. Successful candidates will be notified by May 31st of the PGY1 year.

Components of the Application: A.
        Candidate Cover Letter.
B.   Proposal (1-2 pages). The proposal should include:
  • Project Title, Name of Proposed Research Supervisor
  • Lay person summary: brief project summary that is easy to understand
  • Rationale/background: why is the topic important? What is known thus far? What are the gaps that should be addressed?
  • Purpose, aims and hypotheses: what is the overarching goal of the research? How will it advance knowledge? What aspects are novel? What are the specific hypotheses?
  • Methods: list specific aspects of study design including measures, timelines, sample characteristics, and description of analytic approach for hypothesis testing. Has the data already been collected?
  • Environment: what resources and support are in place to assist the candidate? Who are the other members of the research team, in addition to the supervisor? What is the specific role of the candidate within the project and the supervisor's program of research?
  • Graduate training: Is the candidate planning to do a graduate degree? If so, what graduate degree program? Does the candidate meet the proposed graduate program admission requirements? How does the applicant plan to fund their graduate training? Is the candidate planning to apply to Schulich's Clinician Investigator Program?
  • Anticipated deliverables including first-author conference presentations and publications (be as specific as possible)

- Anticipated challenges to project and/or role of the resident within project, and approach to mitigating these challenges

C.   Resident Candidate and Proposed Research Supervisor CVs D.

QI curriculum for Western Psychiatry Residents:

Continuous Quality Improvement (CQI) course (Thursday/academic day sessions)

PGY1: Introduction to Scholarly Competencies for Psychiatry Residents (1 hour)

Learning Objectives:
By the end of the session, learners will be able to
▸ Describe the training requirements to achieve scholarly competencies during residency
▸ Summarize the support/resources available to conduct a scholarly project in the Department of Psychiatry

PGY1: Fundamentals of Quality Improvement (2.25 hours workshop)

Learning Objectives:
By the end of this session, participants will be able to:
1. Describe the Dimensions of Quality in Healthcare
2. Understand the components of a QI initiative using a quality problem
3. Describe and Apply QI model for improvement (IHI)
4. Identify common QI Tools to analyze a problem
5. know how to publish a QI project

Session plan: Didactic mixed with interactive discussions using a case study

PGY 3: QI workshop (2 hours refresher with hands-on experience)

Learning Objectives:
By the end of this session, participants will be able to:
1. Develop an aim statement, organize a team for QI initiative, understand process mapping
2. Apply Fish bone and Driver diagram to conduct root cause analysis and identify change ideas
3. Describe measures for change and apply PDSA

Session plan:
50 min: Refresh IHI model for QI and QI methods and tools using a case study
5 min : break

60 min: Divide residents into 2 groups of 3-4 residents, each group works on one problem each for 30 min, followed by large group discussion

5 min: Feedback from residents on the session

PGY5: QI opportunities available locally for senior residents (1 hour)

Reflective learning Exercise on QI/patient safety

Residents are expected to have written reports in their portfolio on at least two incidents during their clinical experience (in PGY1 and PGY5) where they reflected on how quality of care or patient safety could have been improved using the template below. Residents are expected to submit these reports to their clinical supervisor and get assessed via one 45 using the form designed for this purpose.

Reflective Exercise template (1-2 pages)

What to reflect on? This can be anything. Most reflections are on things that go wrong. These situations stay in one's head and force us to begin to think about whether they could have done anything differently. However, reflecting on things that went well can often be more rewarding and be just as useful. It can build confidence and help you to repeat it again on another occasion.

What, where, and who—the situation Think about the situation in detail: What happened exactly and in what order, where were you at the time and who else was involved? What part did you have to play? What was the final outcome?

How did it make you feel—your emotional state What was running through your head and how did you feel about it? Be honest with yourself: were you afraid, confused, angry or scared? If you can understand how you were feeling at the time it will help Psychiatry you put together why things happened as they did, and help you to recognize similar situations in the future.

Why did it happen—making sense of the situation Now you have thought about the situation in greater detail, and probably recognized things that would have otherwise gone unnoticed, think about why things happened as they did. How did the situation, yourself, and others interact at the time. Did the situation go well or was there room for improvement?

Could you have done anything differently—critical review and development of insight With the help of hindsight how would you have managed the situation differently? Think about what factors you could have influenced: is there anything you could have tried that may have improved the situation, or is there anything you did that was particularly important in the situation? It is easy to remember the things that you did not do and it is often the things that you did well that are forgotten.

What will you do differently in the future—how will this change your practice This is arguably the most important stage in reflecting. You need to pull together everything you have thought of

before to learn, change your own practice, and improve. Do not only think about what you would do differently in that specific situation, but think whether you have thought of any transferable knowledge or skills you can utilize elsewhere. For example: if you reflect on a post-procedural complication do not only think of how you would manage this again but also how you would prevent it happening if you performed the procedure yourself. If you are a part of a well-led cardiac arrest do not think only of what you would do next to help, but also how you would lead an arrest in the future, or even how you would lead a team in any other situation.

Re-enforcement—what happens when you put this into practice Test your reflections: When comparable situations happen again, do things change as you would expect them to? This is a chance to repeat the reflective cycle to refine and develop your understanding.

(Reference: Koshy et al. International Journal of Surgery Oncology (2017) 2:e20)

Completion of a scholarly project during residency
Residents (enrolled 2011 onwards) are mandated to complete a scholarly project under supervision of a faculty member. Residents may participate in a scholarly research, **quality improvement**, or educational project relevant to Psychiatry, demonstrating primary responsibility for at least one of the following elements of the project:
- Development of the hypothesis, which must include a comprehensive literature review
- Development of the protocol for the scholarly project
- Preparation of a grant application
- Development of the research ethics proposal
- Interpretation and synthesis of the result
- Literature review to conduct meta-analysis/Systematic review.

Mortality and Morbidity Improvement (MMI) rounds
All residents are expected to attend the Department of psychiatry monthly MMI rounds held on Tuesday lunch time

Table 1: Topics covered in PGY1 QI workshop and reviewed in PGY3 workshop

Topic Number	Topic Area
1	Quality in Healthcare
2	How to distinguish between quality assurance (QA) and quality improvement (QI), and QI and Research
3	QI model for improvement (Institute for Healthcare Improvement, IHI)
4	How to choose a project or identify a problem area
5	Assembling a team
6	Writing an aim statement
7	Identifying measures and types of measure

8	Defining change, sustainability of change ideas
9	Plan-do-study-act cycles (covering data collection and analysis)
10	QI methods & tools including process mapping, fishbone (Ishikawa) and driver diagrams, 5 whys, 5W 2H (5 why and 2 how)
11	Role of ethics and publishing QI project
12	Local opportunities for QI
13	Template for reflective exercise

CanMEDS Competencies covered by the QI curriculum

Medical Expert :

1. Practise medicine within their defined scope of practice and expertise

1.3.16 Principles of quality assurance and improvement

5. Actively contribute, as an individual and as a member of a team providing care, to the continuous improvement of health care quality and patient safety

5.1 Recognize and respond to harm from health care delivery, including patient safety incidents

5.2 Adopt strategies that promote patient safety and address human and system factors

Leader:

1.Contribute to the improvement of health care delivery in teams, organizations, and systems

1.1 Apply the science of quality improvement to systems of patient care

1.2 Contribute to a culture that promotes safety

1.2.1 Assess and manage safety/risk for staff and care providers in all settings

1.3 Analyze patient safety incidents to enhance systems of care

1.4 Use health informatics to improve the quality of patient care and optimize patient safety

2. Engage in the stewardship of health care resources

2.1 Allocate health care resources for optimal patient care 2.1.

2.2 Apply evidence and management processes to achieve cost-appropriate care

3. Demonstrate leadership in health care systems

3.1 Demonstrate leadership skills to enhance health care

3.2 Facilitate change in health care to enhance services and outcomes

Health Advocate:

2. Respond to the needs of the communities or populations they serve by advocating with them for system-level change in a socially accountable manner

2.2 Improve clinical practice by applying a process of continuous quality improvement to disease prevention, health promotion, and health surveillance activities

Scholar:

3. Integrate best available evidence into practice

    3.4 Integrate evidence into decision-making in their practice

4. Contribute to the creation and dissemination of knowledge and practices applicable to health

    4.4 Pose questions amenable to scholarly investigation and select appropriate methods to address them

    4.4.1 Conduct scholarly work, including research, quality assurance, and/or educational initiatives

Training experiences covered by the QI curriculum

TRANSITION TO DISCIPLINE (TTD stage):

2.3. Orientation to program, postgraduate and institutional policies, procedures, protocols, and resources

FOUNDATIONS OF DISCIPLINE (F)

2.1.21. Principles of patient safety and quality assurance and improvement
2.1.21.1. Principles of Plan-Do-Study-Act (PDSA)
2.1.22. Principles of critical appraisal and literature review

RECOMMENDED
4.2. Participation in quality improvement (QI) rounds
4.3. Scholarly activity, including research, quality assurance, or education.

CORE OF DISCIPLINE (C)
2.4. Participation in QI rounds
2.5. Scholarly activity, including research, quality assurance, or education

TRANSITION TO PRACTICE (TTP)

2.1.5. Management of adverse events, including patient suicide (if not completed in Core)
RECOMMENDED

4.1. Participation in a project evaluating costs of patient treatment in different settings
4.2. Participation in a quality improvement initiative