# INDIAN PSYCHIATRIC UPDATE

## **Psychiatry in Medical Education**



Editors : Dayal Narayan KTP Anil Kakunje



Indian Psychiatric Society South Zonal Branch

October 2024

**Volume – 10** 

ISBN: 978-93-341-1449-2

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### INDIAN PSYCHIATRIC UPDATE

Founder: Dr. K. Ramakrishnan, President - IPS SZB 2021

### Title: Psychiatry in Medical Education

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Web: https://ipsszb.org/publications/

Official Publication of Indian Psychiatric Society South Zonal Branch

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ISBN: 978-93-341-1449-2

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### MESSAGE FROM PRESIDENT IPS-SZB



I am extremely happy to note that the dynamic publication committee of IPSSZB is coming with a much needed book titled PSYCHIATRY IN MEDICAL EDUCATION. While psychological issues continue to plague the society it has not been adequately addressed during the training of medical students. The idea of a publication on this much needed issue is therefore most welcome.

The Mind-Body connect has long been established & their interactions at physiological & pathological levels have improved our understanding of both physical and psychological conditions. This emphasises the need to understand and manage the suffering individual as a whole rather than the disorder in the index case. Treatment now includes both psychological and pharmacological modes in all dysfunctions.

I am happy to note that the publication committee has gone an extra mile to amplify the need of psychological training & its use in most disorders be it be psychological or physical.

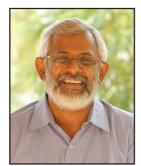
I wish the outcome of the book to have wider use among students & society at large.

Long live IPSSZB

JAI HIND

**Dr Abhay Matkar** President, IPS-SZB

### FOREWORD



It is gratifying to note that psychiatry is getting more attention in undergraduate medical education. This change was overdue and happened only after lots of efforts from our colleagues. The two weeks mandatory posting in psychiatry during internship heralded the beginning of the much needed change in MBBS training. This allowed psychiatry units attached to the medical colleges to have more meaningful engagement with the undergraduate trainees. These young doctors, now have the opportunity to work as members of the team providing mental health care. They can now gain hands on experience in psychiatric diagnosis and management. This allows them to have a broader outlook about health and view mental health as an integral part of health and well-being.

The next best thing to happen was the increase in the number of MD, DPM and DNB seats in India. This helped us by having enough faculty members with formal trining in psychiatry in medical colleges and also consultants in psychiatry in public and private health care services. We now have a fairly robust system for specialist training in psychiatry. It will be good if the institutions imparting postgraduate training promote training in areas like Public Mental Health, Child and Adolescent Psychiatry, Geriatric Psychiatry, Consultation Liaison Psychiatry ,Deaddiction Psychiatry and Forensic Psychiatry. Strengthening of these areas will add value to the existing postgraduate training in Psychiatry. We can even think of creating opportunities for optional training in the above mentioned areas after the three years of mandatory training during the MD course.

Above all, let us strive to make psychiatry education to be centered around good mentoring practices. Medical education should not be viewed as an offshoot of instructional teaching. It is not. Mentorship shall be core of medical education. Good training is all about mentoring .The quality of mentorship matters a lot ! Let our efforts on upgrading psychiatry education in India get a boost with the publication of this book. Let this book inspire a generation of psychiatrists to be good mentors!

Pro.K.S.Shaji

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### PREFACE



Psychiatry is slowly and steadily gaining it's deserved acceptance in the modern society. However, long decades of misunderstanding, stigma and neglect have done serious damage to patients and psychiatrists alike. The only effective way of overcoming this problem is through educating all stakeholders. Training of doctors (undergraduate and postgraduate) in psychiatry is a golden opportunity to achieve this ambitious goal.

Medical education in India has seen some revolutionary changes in the recent past. Introduction of Competency Based Medical Education (CBME) system is one such major step. Many individuals, academic institutions, organizations and professional bodies including Indian Psychiatric Society are doing significant work in the area of improving psychiatric training in India. With increased seats for postgraduate training, the quantitative aspect of the mental health service gap could be tackled to an extent. However, the quality of services provided by them, both primary care doctors and psychiatrists, will need to be ensured by appropriate training. This thought was behind choosing 'Psychiatry in Medical Education' as the theme for this book by the Publication Committee of Indian Psychiatric Society, South Zone for the year 2024.

Through the chapters of this book, various expert authors from South Zone and beyond have provided us with a detailed picture of the history of psychiatric teaching in the context of training doctors in India, the pros and cons of the CBME in psychiatry, and various methods and resources for undergraduate psychiatric training and assessment. It also gives us insight into the structure, and components of PG training in psychiatry, specialty training and postgraduate examination. All authors, with their specific expertise in the area of psychiatric education, have done justice to the job and we are deeply indebted to each one of them.

I thank the IPS South Zone office bearers, and the chairman and members of the Publication committee for entrusting me with this work and extending their whole hearted support.

I sincerely hope this book fills a void in the published material in this important topic 'Psychiatry in Medical Education' and encourage our fraternity to improve the quality of psychiatry training in India.

### Dr Dayal Narayan KTP

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### CHAPTER 1

### A History of Psychiatric Education in India

While the mad have always been with us, the awareness that society needs specialists to look after them is a very recent phenomenon. The formal training of such specialists, is thus an even more recent phenomenon. The specialists, and the discipline of psychiatry, arose gradually in the 18-19th century, from the experiences of the lunatic asylums. It was guided as much by the revolving door, as most people would move in and out of the asylums into their families and communities; and the few remained who had to be looked after. How these observations and experiences influenced the development of psychiatry has been described extensively<sup>1,2</sup>.

Interestingly, the gradual development of psychiatric ideas also coincided, both in space and time, with the spread of European influence through colonialism. Asylums in the widely separated British colonies of Bengal and New England were established within a few decades of each other, followed by those in Canada and Australia. What worried the doctors at either end of the globe, from their interactions with American Indians to the south Asian Indians, was that in all communities, the local doctors 'knew' the practice (or at least many aspects of it) but had no theories to explain their actions<sup>3</sup>. By early 19th century these asylums thus existed in many diverse and disparate societies and communities. In the south Asian context, "Indian medical traditions were fairly strong and epistemologically not dissimilar to those of the Europeans when they arrived. Even among the British officials, there were some who wanted the government to attempt a fusion of 'both exotic principles and local practices, European theory and Indian experience'."<sup>4</sup>

Medical education itself, at that time, had a pan-European character, defined by the 'scientific revolutions' of the preceding centuries. However, the link to antiquity was still maintained, with knowledge of Greek and Latin being considered a pre-requisite, but the ideas of Ibn-Sina and Galen, were being gradually replaced by Vesalius and Harvey and Hooke. This helped develop a notion of 'universal' psychiatry, since the classical and modern systems seemed to gradually get integrated into a whole. This was the basis of the secularization of the body, which was the basis of the Medicine itself; and it was hoped, eventually, medicine of the soul.

In India, medical services, and Asylums, were established as part of the East India Company. The Company employed many Indian doctors and surgeons for its Army, to attend to illnesses

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Molecular Genetics Laboratory, Department of Psychiatry, National Institute of Mental Health and Neurosciences (NIMHANS), Hosur Road, Bangalore 560029, INDIA. Office: 080 26995260; Lab: 080 26995263; E-mail: sjain.nimhans@gmail.com and injuries, especially on the battlefield, and its officials often commented on how the skills and knowledge of 'native surgeons' were often better than those of the European ones. However, there is scarcely a comment on how the mentally ill are to be looked after by the native doctors. In any case, a vast pharmacopeia of medicinal plants and preparations, in use in India, was available. After the first one by Garcia D'orta<sup>5</sup> (Goa, 1563), which was peppered with suggestions from Muntappa and Agnes, became a standard text for medicine in India, several indices of plants of India had been prepared, and these included drugs for treatment of melancholy, and madness. Thus, the fact of somatic treatments, at a community level, was well known. In any case, the Company had become rich by transporting spices, tea, coffee and opium (all-natural psycho-active substances to be used for modulating a sense of well-being and relaxation; and tea was widely used as a treatment for the "English Malady' of depression).

### Training psychiatrists for India: the 19th century

Gradually, as the Company settled down and expanded, dispensaries, hospitals and asylums became a part of its administrative apparatus, and began serving the local population. Company doctors were paid handsome salaries, and serving in India was a lucrative option for medical graduates from medical schools all over UK. As the field grew competitive, exams were held regularly in UK, and candidates were expected to pass a proficiency test in Hindustani, or Telugu and Tamil; and if possible, have some proficiency in either Sanskrit or Persian (to be able to read classical medical texts in use in India). By the 1830's it was also essential for all doctors desiring service to obtain a certificate of experience of having worked in an asylum, as an essential requirement<sup>6</sup>. This is the first indication one gets of specific training in mental health within the medical profession, in India.

The establishing of the first Medical College in 1835 in Calcutta was a momentous occasion, as it marked the entry of modern medicine. Of course, the politics of Orientalists and Anglicists, and the demise of the Native Medical Institution that preceded this, has been debated earlier<sup>7</sup>. It is, however, not clear whether the Native Medical school (1822-1835) had any training in psychiatry as such<sup>8</sup>, but that is a matter for further research. The Calcutta Medical College established an early footprint in psychiatry, and similar colleges in other parts of the Empire introduced ideas of contemporary psychiatry<sup>9</sup>. In Calcutta in particular, discussions about the nature of insanity were held, and the effect of cannabis on patients were described by O'Shaughnessy<sup>10</sup>. This experience was described in several reports, and by 1857 it was guoted as a reason for the use of cannabis extracts in patients in the USA, though with careful attention to personal sensitivity<sup>11</sup>. Soon afterwards, O'Shaughnessy was also to hold an enquiry into the practice of mesmerism, and its practical use with the 'nawabs and babus' of Calcutta<sup>12</sup>. This contrast between biomedical and psychological approaches was evident in the practitioners and teachers, as mesmerism was only rarely commented upon with reference to psychiatric diseases (other than hysteria). Probably the first 'text-book' of psychiatry appeared in 1857, and was supposed to be a guide for practitioners. Written by Dr TA Wise<sup>13</sup>, who was a medical doctor, and a Sanskrit scholar; it was based on his experiences at the Dacca Asylum. However, the book came in for its fair share of strong criticism, as it seemed to attribute the differences in prevalence of insanity to civilizational differences (with Indian society obviously the more backward one); which commentators in London seemed to disagree with.

In other contexts, the early medical graduates posted to various district dispensaries and asylums in the late-19th century would often describe their experiences, and ideas of treating the mentally ill. These included the use of drugs such as nitrates, psychotherapy, a better understanding of faith in treating psychological symptoms; and outcomes of psychoses etc<sup>14</sup>. These descriptions, by Chetan Shah, Ram Chunder Mitter and others suggest that Indian doctors became familiar with many ideas of contemporary psychiatry, by late 19th century. In addition, the Asylum reports of the various hospitals note the assiduous (and occasionally not so good) work by the Indian doctors who are working as Assistant Surgeons, again suggesting that training in psychiatry was part of medical education. Dr Nathu Lal, who was "peculiarly adapted for looking after the welfare of the lunatics", served at the Asylum in Delhi in 1878, followed by Saadat Ali and Gopal Das<sup>15</sup>. Undergraduate exposure to psychiatry was thus well established by the 19th century. However, in the specific Indian context, the lack of academic engagement, the lack of adequately trained specialists, and monotonous work that was full of "petty, irksome detail" was criticised by the President of the Royal Medico-Psychological Asociation in 1897<sup>16</sup>. This set the stage for changes, that began in the 20th century, but accelerated rapidly.

### The 20th Century: first half

The gradual increase in the number of asylums, with admissions running into several thousands (though still less than a tenth of those expected to need these services), necessitated greater educational efforts. Since it was widely assumed that these services would be rendered by medical graduates joining the medical establishment, several books and manuals to improve their understanding and work appeared. The first one, by GFW Ewens, was specifically directed towards the medical practitioner<sup>17</sup>, and described in detail the administrative and legal issues that come up in handling issues related to insanity. It starts with the forceful assertion that insanity in India is no different from that in the UK, though modified to some extent by the 'environment, habit and customs'. Dr Ewens spent many years in India, and the case notes described indicate sufficient appreciation of both medical issues, as well as the social circumstances that accompanied those mentally ill. The second, by Overbeck-Wright, who held a specialist diploma from the Medical Psychological Association, appeared a few years later, and was based on experiences in the United Provinces<sup>18</sup>, and again described psychiatric diseases and its general treatments, as also the rules and procedures to deal with their admission into the asylums. It is rich in detail and anecdotes, and nuanced descriptions of psychopathology and presumed aetiologies, and the situations that confront a Superintendent. As a reviewer in the British Medical Journal commented, the book "fulfils ably the objects for which it was compiled, and is well adapted to be a guide and aid in the disposal and treatment of lunatics in India"<sup>19</sup>. It is also guite evident that books like these, soon became part of regular teaching. The final year examination paper of the Royapuram Medical School of 1918 included, as the first question "Describe the signs and symptoms of acute mania. How would you treat such a case?", followed by the more typical questions on mitral regurgitation, acute bronchitis and small pox<sup>20</sup>.

As an aside, a 'full-question' in the final MBBS paper has been a plaintive demand in the recent past, and it is chastening to know that this was not the case a century ago. These two volumes thus be seen as a fore-runner of all the manuals which have been created for training district level doctors since then<sup>21</sup>, as they are concise, very medically oriented, and do not worry

#### Chapter 1

overmuch about the psychic life of the person. This lacuna itself came in for much (anonymous) criticism, as it was pointed out that the early 20th century ideas of Janet, Freud, Jung etc were conspicuous by their absence, and that psycho-social causes were totally neglected, in the book by Overbeck-Wright<sup>22</sup>. This engendered a serious rebuttal, and the arguments would have carried on, had not the First World War intervened. In any case, these lively debates reflected the churnings in psychiatry, in early 20th century, when a flurry of new ideas emerged from the works of Alzheimer, Kraepelin, Maudsley, Pavlov as much as Freud, Adler, Jung, Reich etc; and was now finally getting a make-over.

Despite all the meticulous reports, the administrative control of the medical services was firmly governed by colonial attitudes. Indian doctors would seldom get the pay, rank, or status of the European doctors; but that changed rapidly during and after the First World War, and has been described in detail elsewhere<sup>23</sup>. Psychiatry itself was changing dramatically over the early 20th century. New investigations, treatments and methods of care were emerging, and there was a growing awareness that much more needed to be done. An Institute of Psychiatry was established in Munich by Kraepelin, and the British too began efforts to develop a training centre, to provide specialists in mental health care, for the Empire. The Maudsley hospital was identified<sup>24</sup> for this purpose, and several psychiatrists from India were sent to the UK, to train in hospitals across the country, but mainly at the Maudsley. The scheme was supported by the Rockefeller foundation, and the various components of the Empire. After training, these specialists were to take over the mantle of further education, back in their home countries. Beginning in the early 1920's, psychiatrists from Agra (Banarsi Das), Madras (Purushottam), Bangalore (FXC Noronha and MV Govindaswamy), and Bombay (Dhunjibhoy) and many others were sent to London, and on their return contributed significantly to changes.

The scheme was not without its detractors. A preference was given to those who were part of the Indian Medical Service, and many who had worked in the Asylums as civilians felt discriminated against. There was also, by now, in any case a much more vigorous atmosphere in India. Practitioners like Girindrashekar Bose had popularized Freud's ideas, and introduced psychology into the medical colleges (after considerable wrangling)<sup>25</sup>. This Germanic influence, often seen as anti-British, now placed the intellectual framework of psychiatry in India on a very different footing, in a sense formulating an anti-colonial position (however tenuous)<sup>26</sup>. Others, like Dhunjibhoy and Owen Berkeley-Hill in Ranchi, Lodge-Patch in Lahore, and Banarsi Das in Agra, were, by then, publishing and participating in the civic affairs and highlighting the need to improve psychiatric services. Berkeley-Hill, guided by his enthusiasm for psycho-analysis, exhorted doctors to understand the psychological correlates of medical symptoms, and thus learn to treat the person, rather than a diseased organ<sup>26</sup>. He explored the issues in more detail a few years later, and pointed out the grave inadequacies in the teaching of psychiatry in India, with very few schools offering any training at all. There was thus an urgent need to develop this, and a course on psychology, he suggested, could conceivably be initiated in Calcutta, Lahore, Lucknow and Mysore. He also suggested that a posting to mental hospital be offered to all second-third year medical students; that general practitioner be encouraged to attend refresher courses in psychiatry, or at least be in touch with specialist doctors and read abstracts and case notes to educate themselves.

Another book, by Dr J Norman Pacheco<sup>27</sup>, an Indian doctor, who worked at both the European and the Indian mental hospital in Ranchi, trod the path that Ewens and Overbeck-Wright had done a few decades earlier. It is the first book written by an Indian psychiatrist, that offers itself as text-book titled "Modern Methods in Psychiatry". Living up to its name, it adopts a strikingly modern note, with an assertion that detection of 'early signs and symptoms' is essential to avoid 'a crash at the cross-roads of life' later. It keeps the psychoses as a major focus, but tracks the susceptibility to disease, and its progression, from childhood to old age, as a continuum. It adopts Kraepelinian definitions of dementia praecox and manic-depressive insanity (indicating that Kraepelin's ideas had already become commonplace). It ends with chapters on mental hygiene which includes advise on a school mental health program, outpatient clinics, methods for care of the incurables etc., and a summary of medico-legal issues encountered in day-to-day life (medical insurance, rights, the mentally ill as a witness) and lastly an interesting summary of general psychology, which blends Freud with Babinski, and neurobiology with psychic determinism. Dr Pacheco was an active researcher, and had also done a trial of rauwolfia extracts in acute psychosis (based on the research by Sen and Bose in 1931), but his data was disregarded, as by then 'imported' drugs like amytal, insulin etc. were considered more 'advanced' rather than these 'native' herbs<sup>28</sup>. He also commented on the increasing rates of suicide, and advocated for a suicide-prevention policy<sup>29</sup>. Having perhaps the distinction of being the first textbook of psychiatry by an Indian, it is remarkable that this effort is not more widely recognised. At the time of the writing (1935), Pacheco is both the Deputy Medical Superintendent of the European Mental Hospital, and the Officiating Superintendent of the Indian Mental Hospital.

It is thus evident that by the 1930's, there was sufficient academic engagement in the practice of psychiatry. The clamour for a more uniform system of training<sup>30</sup>, a confirmed knowledge of psychiatry as a pre-requisite for registration, wide dissemination of advances in psychiatry to medical schools, and opportunities for post-graduate training, was thus well substantiated. Perhaps as a response to all these discussions, some efforts to formalize psychiatric training were attempted, so that Bombay, Calcutta and Patna Universities began to offer some specialist training.

By the mid-1930's, there had also been enough criticism of the poor services for psychiatry in India. This was evident even to the Government in London, as scores of Indian doctors had travelled there, and commented on the disparity. The rulers were supposed to provide care, but as Edward Mapother, the eminent psychiatrist who 'created' the Maudsley (which transformed into the Institute of Psychiatry) noted caustically "it would be difficult to affirm that with respect to psychiatry, the bearing of the white man's burden has been adequate" in his report on the quality of psychiatric care. While commenting on the relative success of the training program, he also opined that given the numbers required, it would be impractical to train everyone in the UK (as was the practice then). It was therefore necessary to develop post-graduate training in India, as in any case, it would soon be independent. Of all the mental hospitals in India, those at Ranchi and Bangalore were the least bad; but Ranchi was based on a concept of 'race' which was very wrong, and was thus ruled out. The one hospital in Bangalore seemed cosmopolitan, and part of a Native Kingdom, and ahead of services in British India in many ways, and was thus recommended for situating a post-graduate school in the future<sup>31</sup>.

In short, the 1930's saw a rapid introduction of many other ideas into psychiatry. Child Guidance Centres were established in Calcutta and Bombay (Bose and Masani), an Indian Society for Mental Hygiene appeared in Bombay (Masani)<sup>32</sup>; psychoanalysis was extended to the Punjab through the work and writings of D Satyanand; and somatic treatments (malaria therapy, insulin coma, chemical and electrical convulsions, and extracts and drugs of various kinds) became commonplace. Acceptance of psychological basis of mental illness, or methods as treatment, was still viewed with considerable scepticism. MV Govindaswamy referred to it as a 'strain on one's credulity', while others expressed concern about how poorly trained or self-educated psychologists were offering treatments of dubious benefit.

The total number of qualified psychiatrists in India was, by now, much more than those in Canada and Australia combined<sup>33</sup>, and it was thus felt that it was an opportune time for India to aspire to bigger things. In 1939, at the first (and last) meeting of the Indian section of the Medical-Psychological Association in Lahore, one of the major issues of discussion was methods to improve the training of medical students in managing mental disorders. Capt. MH Shah[who had done his DPM and was the Medical Superintendent of Irwin Hospital (now LNJPN hospital)] pleaded for introducing medical psychology as part of basic medical training, establishing neuropsychiatric clinics, and beginning a diploma in psychological medicine; while Dr Rizvi suggested that special clinics for neurosis, addiction, organic brain diseases and child guidance be initiated. Many of these suggestions were to come to fruition a few decades later.

### The second half 20th century and the beginnings of psychiatry in independent India post 1950

The 1940's saw the Second World War, and the Independence and Partition of India. During the War, the Bhore Committee had submitted its report, and the section on psychiatry (drafted by Moore-Taylor after extensive discussions with Edward Mapother) provided a blueprint for further education in the soon-to-be-independent India. The Mysore Mental Hospital was, after some deliberations, chosen as a centre for establishing the All India Institute of Mental Health (AIIMH), which would focus attention on education and training of specialists<sup>34</sup>. The hospital had, as part of a post-Second World War reformes and, with the support of the World Health Organization, hosted Willi Mayer - Gross, the prominent German-British psychiatrist, to the mental hospitalin Bangalore. During this period, the basic structure of post-graduate training was laid out. Mayer-Gross delivered lectures that would form the outline of his book, and a course material that corresponded to the DPM program of the Royal Society was made. There was a heavy emphasis on medical and neurological issues, and a mental status examination that followed the traditions of Jaspers (rather than interpretative methods that were common place in the USA and UK at that time)was introduced. This was probably due to the influence of J Hoening, another faculty who was deputed to Bangalore, and who was translating Jaspers's General Psychopathology into English at that time. The phenomenological school met with much approval from Govindaswamy, Mayer-Gross and Gopalaswamy who were then part of the faculty. Unsurprisingly, special services in neurology and neuro-surgery were started almost immediately (the centre had initiated psychosurgery many years earlier); and the organic techno-scientific world of EEG, imaging, and surgery were to be included within the new academic centre; as much as biophysics, literature, and Indian philosophy. Though this was, in many ways, a mirrored

teaching program at the Maudsley, but other influences were also apparent.

An Arts-theatre was added to the AIIMH, for doing sociometry, and therapy using psychodrama in group therapy setting. This was not without its difficulties as, as Govindaswamy admitted that "diversity of language and culture (apparently meaning the sub-cultures), intergroup social distance; and wide differences in educational levels" were a stumbling block<sup>35</sup>. Efforts to work around, work through or jump across this stumbling block have continued to evade us. A few years later the All India Institute of Medical Sciences (AIIMS) was started in Delhi, and Prof D Satyanand, who became the first professor of psychiatry there, was an even more passionate proponent of psychodrama for community intervention, and wanted to develop mental health clinic-based folktheatre for improving the mental health of the nation at large<sup>36</sup>. Having dedicated many of his books to his mentor, Berkeley-Hill<sup>37</sup>, he was perhaps aware of the need to bridge social distance as the main obstacle to a healthy mental life, and to adopt radical methods to achieve the same. Deeply embedded in a wider socio-historical and dynamic framework of psychiatry, he developed a somewhat different approach of psychiatric services and training<sup>38</sup>. The newly established Christian Medical College, developed on the experience gained at the Nur Manzil Centre in Lucknow, and formulated family and culture-based assessments, interventions and understanding of psychiatric issues<sup>39</sup>. Others, like Erna Hoch, for long a visiting faculty at the AIIMS, tried to incorporate analytical and dynamic principles into the teaching of psychiatry.

The first two decades of Independence, are thus marked by bold experimentation in many areas of education. These retained many links to the suggestions first made in the 1930's, and were implemented by the new academic departments that were established in the Institutes. It was expected that these would spearhead efforts to improve the understanding of mental illness, and the care of the mentally ill, in India, and thus become a model for other de-colonizing countries and other parts of the world. Students trained at these institutes became the leaders, and teachers, as psychiatric training shifted from mental hospitals to medical colleges. Most of the ideas are congruent with developments elsewhere.

Covering all bases has meant that the many ideas of the 1930's, such as child psychiatry, organic neuro-psychiatry, modifications and adaptation of psychotherapies, occupational therapies, community care models (including district hospital and mofussil-clinic based health care), training general practitioners (using the postal system and now the internet, for regular updates), increasing the representation of psychiatry in undergraduate medical education etc. have been experimented with. Whether psychiatric services have been strengthened to apply all the lessons learnt from these models, and whether these were tested in the 'real-world' is something we need to ponder about, and interrogate.

### Conclusion

From the Diploma in Psychological Medicine granted by the AIIMH, which was the first postgraduate degree in Independent India (batch of 1954); to the MD (Doctor of Medicine) degrees being awarded by the All India Institute of Medical Sciences soon after, and gradually by many other medical colleges, it has been a slow start, but a gradual acceleration. Many of the ideas developed in the first wave of Indian specialists, between 1920-1950 have been expanded, and these in turn are closely congruent to developments in psychiatry worldwide (or at least in the English-speaking world). The trajectory of this snowballing effect, over the past half century, has been exponential. Keki Masani, drafting a plan for enhancement of psychiatric services in 1959, could count barely 50 psychiatrists in the whole of India<sup>40</sup>. By current estimates, there are more than ten thousand (a 200-fold increase); and more than a thousand psychiatrists graduate every year<sup>41</sup>, and several thousand acquire certificates of proficiency in psychiatry by attending short-term training in psychiatry at one or the other specialist centre, or via online services. This represents perhaps the single largest contribution to professional psychiatric work-force in the world.

Training in psychiatry was initiated in the 19th century, through the early medical colleges and dispensaries, and the asylums. It had a slow start, but was still quite notable. By the early 20th century, this had increased significantly, and in the late colonial period, psychiatrists in India were experimenting with all aspects of contemporary science, from psychoanalysis to psychosurgery. Post-Independence India, in the latter part of the 20th century, saw a rapid growth of teaching facilities, but that is our ongoing present. By the early 21st century, we have effectively increased the supply of psychiatrists, but the question as to how to address the need for equitable, universal and accessible services, especially in underserved populations, is perhaps something that we may want to consider. This issue has remained unaddressed from the 1850's, from the time that trained doctors began reporting on India, and who had even then estimated that 80% of those who needed help, failed to get it. Equally importantly, professional roles and responsibilities of the psychiatrists, in the absence of universal health care, remain guite restricted, despite the explosive increase in numbers. The rapid changes in social conditions, and insights provided by the advances in science and technology, often still do not find adequate space in training. The large number of psychiatrists are barely enough to fill the gap, but not at all adequate in planning for services for the future.

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### CHAPTER 2

### Psychiatry in MBBS curriculum: Scope and challenges

### Abstract

Modern medicine in India and many other countries is slowly and unknowingly turning away from the centrality of the person seeking our care. The focus is on the disease itself and not on the person with the disease. There is a growing trend of overspecialisation, commercialisation and compartmentalisation in medicine. Our mission will fail if we are treating the organ with the disease and not the person with illness. Social determinants of health and mental health needs to be a prime focus. Psychiatry has a vital role in bringing the totality of the person back to focus, but it is grossly neglected in our country. It is unfortunate, psychiatry is not getting the place it deserves in the medical curriculum. Common mental disorders are often misdiagnosed due to poor training and orientation in Psychiatry. The number of psychiatrists is too few in India. This challenge can only be met by MBBS graduates, adequately trained in Psychiatry

### Introduction

### "It is impossible for the part to be well, if the whole is notwell" Socrates

Modern medicine in India and many other countries is slowly and unknowingly turning away from the centrality of the person who isseeking our care. The focus is on the disease itself and not on the person with the disease. Unfortunately, there is a growing trend of overspecialisation, commercialisation and compartmentalisation in medicine. This is robbing medicine of its most vital component- humaneness. Our mission will fail if we are treating the organ with the disease and not the person with illness. Social determinants of health and mental health needs to be a prime focus. Psychiatry has a vital role in bringing the totality of the person back to focus, but it is grossly neglected in our country. It is unfortunate, psychiatry is not getting the place it deserves in the medical curriculum for MBBS graduates.

"There is no health without mental health." Mental health is essential to the overall health and well-being of individuals and societies. Mental health affects the individual's ability to function, to be productive, to establish and maintain positive relationships, and to experience a state of well-

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being. 14% of the global burden of disease has been attributed to psychiatric disorders, mostly due to the chronically disabling nature of these illnesses. Moreover, mental disorders increase the risk for communicable and non-communicable diseases, and contribute to unintentional and intentional injury. On the other hand, many physical conditions increase the risk for mental disorder, and comorbidity complicates help-seeking, diagnosis, and treatment, and influences prognosis.[1]

Mental disorders comprise a sizable group of non-communicable diseases which affect the lives of 1 out of 5 persons each yearrepresenting 20-40% of the burden of disability. Many factors related to mental illness can interfere with the treatment of physical illnesses and frequently co-occur with cardiac illnesses, diabetes, cancer, and other non-communicable diseases.[2]

In recent years it is realized that training inmental healthwill equip undergraduate medical students to deal with difficult and complex situations in medical practice. This will help them to develop proper communication skills and to empathize with patients and their suffering, thusempowering them to establish fruitful professional relationships with patients.

### Development of mental health services in India

Before independence in 1946, the Bhore Committee, [3] in their report emphasized the need for training in mental health to boost India's meagre mental health resources; there were only 19 mental hospitals with 10,181 beds and a few general hospital psychiatric units at that time. Committee also recommended the need of starting psychiatry departments in every general hospital and to enhance the existing curriculum and training in psychiatry for medical undergraduates. Mental health services were grossly inadequate at that time.

The period 1947-1966 was focussed on doubling of psychiatric beds, [4,5] and development of training centres to train psychiatrists, clinical psychologists, psychiatric social workers, and psychiatric nurses. Between 1960s and 1970s general hospital psychiatric units were established at several centres.[9] In August 1982, National Mental Health Programme (NMHP) [6] was launchedit was considered as the mile stone in the development of community psychiatry

### General hospital psychiatry and medical education

After independence, the number of mental hospital beds were doubled to 20,000 in India. The first General Hospital Psychiatry units (GHPUs) were established at Calcutta and Mumbai before independence. In 1960s, such units were started in Chandigarh, Delhi, Madurai, and Lucknow. The first GHPU in Kerala was started at Medical College Kottayam in 1967. The main challenge for this task was moving mental health care from isolated mental hospitals and bringing mental health care to the general medical care settings. These changes in turn led to the development of liaison psychiatry [7-11] and to training of psychiatrists and research. Establishment of General Hospital Psychiatry (GHP) is one of the biggest revolutions in mental health delivery and psychiatric education in India. Later on, several new medical colleges were started with department of psychiatry, which were part of teaching requirements. Also, during the last one or two decades, psychiatric units were started in most of the major governmenthospitals. This shifting of the place of mental health care to the general hospital setting has significantly helped in the process of destigmatization of psychiatric illnesses.[12]

### Why teaching psychiatry to undergraduates is important in India?

Several epidemiological studies conducted in India have pointed very high prevalence of wide variety of mental disorders. The World Health Survey, [13] which covered Assam, Karnataka, Maharashtra, Rajasthan, Uttar Pradesh, and West Bengal in India, showed the prevalence of depression higher than those of psychoses. But the rates demonstrated were far lower, which pointed to the low awareness about depression in the community. Moreover, psychiatric problems are very common among patients seen in general practice (about 25%) and specialty clinics (about 15%) [14].

#### The "unmet need" for mental health care in the community

WHO Atlas [18] and a recent state-wise analysis [15] point towards the low numbers of mental health professionals in India. Besides that, most of them are concentrated in urban areas. Chandigarh, Delhi, Goa, Pondicherry, Kerala, and Maharashtra are the few states where the number of psychiatrists is adequate or near adequate, even though there is a rural/urban imbalance. In most places in India, 70% of psychiatrists are working in private sector. Hence there is an urgent need for private sector-public sector collaboration for implementing various national and state mental health programs

#### Underutilization of psychiatric services

It is well accepted that India has poor mental health infrastructure. Besides that, even the existing facilities are not adequately utilized. Many of them seldom seek modern psychiatric treatment. Stigma iswidespread in Indiaand is an important barrier to seek mental health care. Both print and visual media often project mental illness as chronic, incurable, and is often a subject of ridicule. The lay public has a strong negative attitude towards mental hospitals. Majority of our patients come late for treatment after a series of consultation with quacks and spiritual healers. Many of them have to travel long distances to reach the nearest psychiatric facility in the cities and need someone to accompany. To add to their suffering, psychiatric medicinesarenot available in many government dispensaries. Lack of rehabilitation centres and administrative bottle necks to avail welfare benefits are the other added problems. National Human Rights Commission in India had reviewed the functioning of the mental hospitals in 1998 and 2008[16,17] and highlighted several inadequacies.

Community involvement in mental health care is an answer to theseproblems. [18,19] District Mental Health Program (DMHP) integrate mental health care with general health care. Implementation of DMHP in many parts of India has shown positive results. Literacy also plays a key role in theproper utilization of psychiatric services as evidenced in states like Kerala. Greater literacy levelleads to wider acceptability and utilization of psychiatric services. 70% of India's population resides in rural areas and a large majority of them dependon primary health care systemfor their treatment. By imparting knowledgeabout mental healththrough training in mental health during their undergraduate course medical officers in charge of the primary care facilities will be able to identify, manage and refer psychiatric patients.

### How can we integrate mental health care with primary health care?

Since primary care facilities are well organized in India, delivering mental health care through

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primary care will be a feasible and cost-effective affair. There are only 0.3 psychiatrists per 100,000 people in India in comparison with 6.6 psychiatrists globally. This ratio reflects the wide treatment gap in India. The average number of mental hospitals globally is 0.04 per 100,000 while it is only 0.004 in India. [20] The expected number of psychiatrists and psychiatry beds should be multiples of the present ratio which we may not accomplish in the near future. Only medical graduates having adequate training in psychiatry can fill up this huge vacuum.

### Integration of Community Psychiatry with Community Medicine

Community psychiatry is a suitable model for delivering mental health care, not only fordeveloped countries but also for low- and middle-income (LAMI) countries. Setting up of asylums for the management of the mentally ill, humane treatment, deinstitutionalization, and recognition of the rights of the mentally ill [21] are some of the revolutionary mile stones through which community psychiatry was evolved in the world. In the past six decades community psychiatry is effectively integrated into community medicine in the medical education of India.[12,19]

### International scenario

In US, Behavioural Sciencesis an important part of first year of undergraduate curriculum. First two years, theyneed 60 hours of teaching in Behavioural Sciences. In the Third year, 30 hours are allotted to practical training in psychiatry. During the Fourth year, they needeight weeks full-time posting inpsychiatry compared to eight weeks each allotted for Obstetrics and Paediatrics and 12 weeks for both Medicine and Surgery. [22]

Teaching of mental illnesses was startedearly in 1902 in Denmark and was well established in 1912. Later, it gained the status of a major clinical subject, reaching third position after Surgery and Medicine and ahead of Paediatrics and Obstetrics and Gynaecology. In their six-year course,240 hours are reserved for psychiatry, comprising about seven percent of the total teaching time. They have separate examinationin psychiatry at the end of the course. [23]

In the forties, psychiatry established its place in medical education in Britain. It went through major revisions following the General Medical Council's recommendations in 1967 regarding medical education, which re-emphasized the importance of Behavioural Sciences and Psychiatry in medical curriculum. Presently, 80 hours are allotted to the behavioural sciences during the basic medical science teaching. During the clinical posting, under graduate students have to learn interview skills and psychiatry history taking in the first 36 weeks and then have to attend full-time psychiatry clerkship for three months which is followed by university examination as in other subjects. [24]

South Asian countries like Sri Lanka and Nepal give specialimportance to psychiatry whereundergraduate students have to pass separate examination in psychiatry to qualify for medical degree. [25]

Recommendations by World Psychiatric Association (WPA) and World Federation of Medical Education (WFME)

In 1998, WPAin collaboration with WFME [26] proposed detailed guidelines for the "Core Curriculum in Psychiatry for Medical Students." The main recommendation was to make psychiatry

a major subject in the medical curriculum. They put forward three reasons for this proposal. First, the general approach of psychiatry which stresses the unity of body and mind in medical practice. Secondly, skills that are learned in psychiatry are important for all doctors: for example, the ability to form a good rapport with a patient, to assess the mental state, and to convey distressing information. Thirdly, psychiatric problems are common among patients seen in all branches of medicine. For example, among outpatients attending specialist clinics, 15% were given a diagnosis of associated psychiatric disorder and an average of 20-30% of those with no medical diagnosis will have a psychiatric disorder. Psychiatric disorders are even more frequent among patients attending general practice. Committee proposed that all future doctors should know about psychiatric problems, not only because they are common but also because their management involves much medical time and resources and gives rise to many serious incidents. [27]

The core component in curriculum stipulatesmedical studentswho after graduation, should enter further training whether they are to work as specialists or in primary care. In many countries, doctors who have chosen a career in general practice receive a further training; and this training extends their psychiatric skills

## Under graduate teaching in psychiatry: initiatives of Indian Psychiatric Society (IPS)

Strengthening undergraduate training in psychiatry with an exclusive university examination was an agenda of IPS since decades. A sub-committee was formed with this agenda in 1965 with the following members - KR Masani, KC Dube, VN Bagadia, SS Syalee, and JS Neki. These were their comments - "In India, the primary need is for physicians to take charge of rural areas, where they must be self-sufficient. More than half of the clientele of a general practitioner (GP) consists of patients who require psychiatric help;hence it is essential that theyshould be properly empowered to deal with them. Unless we teach our future doctors to elicit psychiatric problems,how to deal with them and unless we attract them by our good teaching and role model, we may lose a good number of bright students not choosingpsychiatry" They strongly suggested a compulsory examination in psychiatry as well.

Dr. BB Sethi in an editorial of Indian Journal of Psychiatry in 1978 [28] suggested better training in psychiatry at undergraduate level. Dr. Bhaskaran, the chairman of the IPS UG Psychiatric Education Committee in 1990[29] in the editorial ofIJP commented that undergraduate training in psychiatry and Behavioural Sciences in most of the medical colleges in our country is not satisfactory. Active attention is needed in training teachers of psychiatry and Behavioural Sciences more than it has done so far. Apart from these reasons, there are other compelling reasons for such a training, with special reference to our country." He also pointed the influence of cultural factors in determining attitudes to health and illness, and mentioned that doctor-patient relationships are not adequately stressed, though they are important in understanding the behaviour of the patient at the time he does become a patient. He also highlighted the need for the student of field visit to a village and surveying the attitudes of people to nutrition, beliefs about health and illness, or a visit to a family. He too noted the lack of provision for examination in psychiatry which led to the neglect of the subject.

In 1989, a workshop was conducted in NIMHANS on UG teaching in psychiatry for teachers

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from 10 medical colleges, which made several recommendations to Medical Council of India (MCI) to promotepsychiatry as a full-fledged subject at MBBS level. Unfortunately, no follow up activities were initiated further.

The recommendations formulated by NMHPin 1982[6] to impart mental health training to medical undergraduates is grossly inadequate. However, NMHP stressed about enhancing the amount and content of undergraduate psychiatric training to address the mental health needs of our country. NMHP foresaw the potential of using future medical doctors as agents of a new and better mental health delivery for our country.

Trivedi in an editorial in Indian Journal of Psychiatry mentioned that, "Thebasic purpose of teaching and training psychiatry at undergraduate level is to prepare medical graduates to serve better at the primary health care level. Patients with physical illness who have concomitant emotional problems requires professional handling, therefore teaching psychiatry at undergraduate level becomes even more relevant and essential."

The document submitted by the Psychiatric Education Committee of Indian Psychiatric Society (IPS) [30] to the MCI in 2010 states that a medical student on graduation should be able to deliver mental health services at primary care level and listed the following main objectives -

- 1. Able to identify signs and symptoms of common psychiatric illnesses
- 2. Able to identify developmental delays including cognitive delays
- 3. Able to understand the nature and development of normal human behaviour
- 4. Able to appreciate the interplay between psychological and physical factors in medical problems
- 5. Aware of basic pharmacological interventions in the clinical practice of psychiatry
- 6. Able to apply basic counselling skills when discussing common psychiatric issues with the patient or relative
- 7. Aware of statutory and educational provisions with regard to psychiatric illnesses and disability
- 8. Able to develop empathetic and humane attitude toward psychological issues
- 9. Able to deliver mental health services at primary care level

## As per these recommendationsMCI incorporated the following changes in the undergraduate curriculum of psychiatry

- 1. Teaching hours in psychiatry was increased from 20 to 40 hours
- 2. Clinical posting in psychiatry was increased from two weeks to four weeks
- 3. Questions from psychiatry was made mandatory and mark was doubled to 20.
- 4. Internal assessment in psychiatry was made mandatory for final examination
- 5. Psychiatry posting in internship was made mandatory, instead of elective posting
- 6. Psychiatry should be taught in an integrated manner, especially in community medicine

Unfortunately, even though all the above recommendationswere progressive and to be welcomed, except for the recommendation on internship, all other decisions are yet to be implemented effectively. The general attitude of medical students is that they will not take a subject seriously unless there is a separate exam on that subject. Regrettably, MCIdid not

respond positively regarding exclusive examination in psychiatry. According to MCI, due to the constraint of council and to restrict the burden of so many examinations on medical students this recommendationwas not considered. There were further efforts from IPS (under the leadership of M Thirunavukarasu, Roy Abraham Kallivayalil, Rakesh Chadda, and UC Garg)to convince the MCIregarding UG training and examination in psychiatry and this suggestion was accepted, though in principle.

### A comparison of the current undergraduatecurriculum

Comparison of MCI-based curriculum and a progressive curriculum in the autonomous institutes of the country provides interesting insights. The Kerala curriculum is a prototype of MCI-recommended curriculum. The other is of the curriculum at India's premier medical institution AIIMS, New Delhi.

MBBS curriculum in Kerala (2009)[31] is prepared by the Director of Medical Education as per Regulations on Graduate Medical Education.

### The highlights are:

Two weeks clinical posting and 20 theory classes

Examination -

Medicine theory: 150 marks (60 + 60 + 30) (2 papers of 3 h duration, each 60 marks)

Paper I: General Medicine

Paper II:

Section A: TB and Emergency Medicine

Section B: Dermatology and Psychiatry

Internal Assessment: 30 marks (15 marks in Psychiatry out of 150 can be presumed)

Practical: 150 marks (60 + 60 + 30)

OSCE: 2 stations of 5 marks each in Psychiatry

Marks for Psychiatry: 10/150

Total marks for Psychiatry: 25/300

### **Draw backs:**

- 1. Psychiatry questions are set by and evaluated by department of medicine. Psychiatry faculty has no role.
- 2. Psychiatry teacher is not an examiner.
- 3. No need to score minimum marks in psychiatry.
- 5. Psychiatry may not be considered for internal assessment

### Curriculum in AIIMS, New Delhi [14]

Nine weeks clinical posting including Rural Health Services Project

Compulsory log book Examination: 13 marks for theory and 12 marks for practical (total 25/ 225)

### Chapter 2

Although there is not much variation in the marks awarded for psychiatry, the nine weeks clinical posting, rural posting, compulsory log book, evaluation by psychiatry examination, and internal assessment marks for psychiatry make this a unique model, different from the MCI stipulated one.

### Proposals for improving undergraduate teaching of psychiatry

The minimum requirements are as follows.

- a. Considering the multidimensional limitations in many states, there should be at least 30 beds dedicated to psychiatry in all the medical colleges with a minimum faculty of one professor, one associate professor, two assistant professors/lecturers and residents.
- b. Psychiatry should be a compulsory subject in the university examination with separate theory paper, clinical exam, and viva voce, as for other subjects
- c. Examiner should a psychiatrist
- d. Minimum eight weeks clinical posting and 100 hours for teaching
- e. Compulsory posting in psychiatry during internship for at least 15 days
- f. Few lectures in psychiatry may be included in the first or second semester for orientation
- g. Revising the curriculum and enhancing the quality of training

In addition toenhancing the time allocated to psychiatry teaching, there is a great need for introducing social and behavioural sciences in the training to make them more socially aware and responsive and to develop a holistic community-oriented approach.

### Strengthening faculty of Psychiatry

Technological revolution is bringing rapid changes in our knowledge base and this may put a greater stress on the teachers in a developing country like India where doctors are already burdened with high clinical workload and administrative responsibilities. Teachers must be involved in regular training programs to enhance their teaching skills by application of newer tools like digital applications, online resources, artificial intelligence and other tools of information technology.

### **Mental Health Research**

Most of the research in mental health is generated in developed countries [33]. Research should also be included as part of medical curriculum in the developing countries to create evidence basefor improving mental health care. This will have an indirect impact of strengthening the undergraduate teaching of psychiatry as well.

### An action plan

- 1. The biggest hurdle to include psychiatry as a sperate subject for examination is our own fellow clinicians, who think that psychiatry is not that important. This has to be solved bybreaking the stigma against psychiatry among the medical community.
- 2. How to convince the importance of psychiatry to policy makers? We have to provide epidemiological data that psychiatric disorders are common, missed very often due to lack of training, and most importantly psychiatric disorders are treatable and treatment is cost-effective.

Not identifying and treating psychiatric disorders leads to poor quality of life (QoL), excessive resource utilization, and ultimate complications like suicide. We also have to educate policy makers that manysocial problems like alcoholism, drug abuse, suicidal behaviour, school dropouts, etc. which are only superficially addressed are in fact related to underlying mental health problems.

- 3. Create awareness among students that understanding principles of psychiatry is helpful in professional and personal development. Firm footing in neuroscience should start from the days of physiology and anatomy, linking brain areas and circuits to emotions and behaviour.
- 4. Make clinical postings interesting by introducing newer teaching methods and lively description of mental health issues.
- 5. Increased emphasis on Consultation Liaison Psychiatry and General Hospital Psychiatry is needed to make training more relevant and useful.
- 6. Uniformity should be maintained in training and examination by using the same schedule, modules and structured assessment methodsin all medical colleges.
- 7. Psychiatry postings can be made more interestingby integrating psychiatric cases with other clinical subjects like general medicine (depression or somatoform disorder) and dermatology (OCD/trichotillomania/ delusional parasitosis), cardiology (panic disorder or depression), gastroenterology (psychosomatic disorder), surgery (post-operativedelirium), neurology (dissociative convulsions, encephalopathies, movement disorders), and paediatrics (OCD/ ADHD/ dyslexia).
- 8. Encourage exposure to humanities and social sciences in medicine and promote a personcentred approach.
- 9. Soft skills like communication skills, stress management, study techniques, etc. which are helpful in personal development can be included in the training.

### **Conclusions:**

Medical curriculum should adapt and evolve to produce professionals with a person-centred approach. This requires a change in policy (on the selection of students, content of medical curriculumandexaminations) and India should lead the way with the co-operation of other countries in South Asia. [36,37,38]Reaching the unreached should be our goal.[39] Equipping our young medical graduates with a sound knowledge of psychiatry is the only option to bridge the treatment gap. Indian Psychiatric Society has repeatedly clamoured for the importance of Psychiatry in undergraduate medical education and as a result of this, Psychiatry has become a compulsory subject for internship. It is a very positive development but making Psychiatry a subject with examination for MBBS is absolutely necessary. Let our future medical graduates have adequate training in Psychiatry which will enable them to be more humane, compassionate, people centred and empower them to fight stigma and discrimination against people with mental illness. We need to succeed in this mission by collaborating with all stake holders- governments, policy makers, educationalists, journalists, media, NGOs, other disciplines of medicine, users, carers and families. The challenges are huge, but we need to face them bravely and collaboratively.

### **Take Home Points**

- 1. Psychiatry training during MBBS has wide scope as it enables young medical graduates to be humane and compassionate physicians.
- 2. Common mental disorders are often misdiagnosed due to poor training and orientation in Psychiatry.
- 3. The number of psychiatrists is too few in India. This challenge can only be met by MBBS graduates, adequately trained in Psychiatry. But undergraduate training in Psychiatry continues to be neglected in India.
- 4. Fighting stigma and discrimination is a huge challenge; we can succeed only with collaboration by all stake holders.

S. no.	Topics	Must know	Desirable to know
1.	Signs and symptoms of common mental disorders: Depression and anxiety disorders. Ask about depression, anxiety, somatization disorders including conversion disorders, psychoses, and dementia. Diagnose depression, assess suicidal risk, educate and advise, prescribe rationally the antidepressants and tranquilizers, and refer appropriately Yes	Yes	
2.	Unexplained physical complaints: Identify physical symptoms without apparent physical cause, interplay of physical and psychological aspects in medical presentations, elicit stress and coping, educate, reassure, and refer	Yes	
3.	Cognitive delays: Identify developmental delay, basic education and advice, referral	Yes	
4.	Substance abuse: Ask about alcohol or drug use, identify problem drinking, educate and advise, refer appropriately, signs and symptoms of alcohol dependence, its medical and psychosocial impact, treatments available	Yes	
5.	Sleep education: Sleep hygiene, prescribe rationally, look for other physical possibilities Yes	Yes	
6.	Mental functions: Primary and higher, elicit signs and symptoms of delirium, identify early cognitive decline, educate family, plan referral	Yes	
7.	Agitated/violent patient: Emergency management, forensic and transportation needs, procedural knowledge for hospitalization	Yes	

### Details of IPS document submitted to MCI

8.	Psychoses: Identify, provide immediate care, and refer, educate family regarding the nature of illness	Yes	
9.	Concept of mental hygiene and mental health: Promotional issues related to death and dying, breaking bad news, eliciting reaction and providing support, prevalent social and psychological concepts around death and dying	Yes	
10.	Common causes of delirium: Behavioral management of delirium, safe sedation methods	Yes	
11.	Child development: Common developmental disorders	Yes	
12.	Forensic aspects of violence, attempted suicide, and suicide	Yes	
13.	Chronic organic brain syndrome: Dementia and mental health issues in old age		Yes
14.	Mass hysteria, PTSD		Yes
15.	Stress management	Yes	
16.	Basic counseling principles	Yes	
17.	Principles of psycho?education		Yes
18.	Basic psychotherapeutic skills		Yes
19.	Psycho?social barriers in help seeking in mentally ill		Yes
20.	WHO Primary Care Classification of Mental Disorders		Yes
21.	Knowledge about NMHP and Mental Health Act		Yes

Skills to be acquired	Perform independently	Perform under supervision	Assist the expert	Observe
Psychiatric history taking	Yes			
Mental state examination (primary mental functions)	Yes			
Mental state examination (higher mental functions)	Yes			
Diagnosis of common mental disorders	Yes			
Dealing with PTSD Dealing with mass hysteria		Yes		
Mental hygiene	Yes			
Sleep hygiene	Yes			
Developmental delay assessment		Yes		
Physical methods of treatment (electroconvulsive therapy)				Yes
Use of psychotropic medication, knowledge of their indication, adverse effects, therapeutic dosage	Yes			
Abreaction				Yes
Brief psychotherapy		Yes		165
Counselling	Yes	105		
	Yes			
neurologist or psychiatrist				
Behavioral and psychological analysis of self-destructive behavior	Yes			
Child psychiatric history taking			Yes	
Child and adolescent mental state examination			Yes	
Geriatric history takin			Yes	
Geriatric mental state examination			Yes	
Initial and primary care for the children and adolescents and referral to the specialist	Yes			
Terminal care			Yes	
Exercising empathy, compassion, and establishing rapport and maintaining rapport which is a must for all psychiatric interventions	Yes			
Psychotherapeutic and behavior modification approach			Yes	

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# CHAPTER 3

# PSYCHIATRY IN UNDERGRADUATE MEDICAL EDUCATION

# **CBME IN PSYCHIATRY:OPPORTUNITIES AND PITFALLS**

#### Introduction

Traditional Medical Education in India used to emphasize knowledge acquisition. The older medical curriculum had a limited focus on defining meaningful outcomes that did not reflect the real-world responsibilities of the Indian Medical Graduate (IMG)<sup>1</sup>. This approach stressed that students memorize and recollect information instead of building clinical and communication skills<sup>2</sup>. The traditional syllabus also suffered from inadequate assessment methods, lack of emphasis on important areas of learning for medical graduates, and insufficient faculty development initiatives<sup>3</sup>. This trend extended to psychiatry undergraduate teaching, and it was up to the medical student to find their way into the real world often emulating less-than-ideal role models<sup>4</sup>. Psychiatry teaching suffered from the inadequate duration of clinical postings, reinforcing the Cinderella attitude towards the specialty and adding to damaging misconceptions about mental disorders<sup>5</sup>.

#### Implementation of CBMEfor the Indian medical graduate

The Graduate Medical Education Regulations 2019 and the subsequent 2023 revisions to the Indian medical curriculumbrought forth the Competency Based Medical Education (CBME). CBME is more learner-centric, patient-centricand outcome-oriented along the trends of global standards 6 & 7. The implementation of CBME in India, signals a change from a broad knowledge-basedcurriculum to adistinct syllabus with specific competencieslinked to the proficiencies required of the IMG. There is a shift from the Indian medical teacher who completed the syllabus and conducted summative exams to assess knowledge, to the student in whom the teacher assesses meaningful outcomes per competency.

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## TABLE 1: Traditional syllabus vs competency based medical education

	TRADITIONAL MEDICAL EDUCATION	COMPETENCY BASED MEDICAL EDUCATION
1	Syllabus centered	Learning and outcome centered
2	Conventional learning strategies (lecture and bedside)	Innovative teaching strategies (Student directed learning/Problem Based Learning/Flipped Classrooms <sup>8</sup> )
3	Less opportunity for feedback and reflection	Feedback and reflection encouraged
4	Emphasis on time-based learning	Emphasis on attainment of competencies
5	Summative assessment	Assessment of predefined competencies through formative and summative assessments
6	Teaching and Learning focus on knowledge	Teaching and Learning focus on multiple domains like attitude, knowledge, and skills
7	Assess via written and vivavoce	Assess defined competencies through varied assessment strategies like Observed Structured Clinical Examination (OSCE), portfolios etc <sup>8</sup> .

Table 1 shows differences between Traditional medical education and Competency Based Medical Education.

The National Medical Commission (NMC) has specified the competencies IMG should have achieved with suggested teaching learningmethods (TLM) and outcome assessment strategies. Psychiatry has 117 competencies which is much more than other specialties like community medicine and ophthalmology<sup>6</sup>. The NMC curriculum has also suggested competencies for integration at horizontal and vertical levels with other specialties to facilitate a multi-disciplinary approach to learning psychiatry at undergraduate level<sup>9</sup>.

# **CBME IN PSYCHIATRY:OPPORTUNITIES**

# 1. INNOVATIONS IN TEACHING LEARNING METHODS

CBME emphasizes improvements and innovations in TLM so that every learner learns and performs skills under supervision. These methods include modifications of existing TLM and newer methods like small group discussions (SGD) with specific learning objectives and directly observed practical skills (DOPS). For example, the student could learn the skill of diagnosing depression by seeing a psychiatry consultant interview a patient. The teacher could follow this with an SGD on criteria for identifying depression. These TLM could help the learners attain the specific competencies.

# 2. DE-EMPHASIS ON COMPARTMENTALIZATION

A criticism of the traditional medical education curriculum was its separation of basic and clinical sciences<sup>10</sup>. CBME addresses this criticism through horizontal and vertical integration of competencies across specialties<sup>11.</sup> CBME reduces the duplication of concepts by medical teachers from various specialties while the student learners gain a more meaningful experience. CBME could lead to more effective utilization of teaching and learning resources. Teachers could use integration techniques like nesting (bridging academic knowledge with practical skills). For example, the teacher links learning of neurophysiology with the etiology of psychiatric disorders in the first year of MBBS. Psychiatry teachers could share competencies addressing intervention and assessment in psychiatric emergencies with the internal medicine and emergency department. This could lead to a more effective mainstreaming of psychiatry competencies that would translate into improvements in the quality of health care.

# 3. INCREASE IN PSYCHIATRY TEACHING HOURS

Undergraduate psychiatry teaching in the pre-CBME era consisted of 2 weeks of clinical postings and 20 theory lectures. These clinical postings were not enforceable and varied according to priorities and resources of the medical college. Some colleges would have compulsory two weeks undergraduate clinical postings with 5-14-day clinical psychiatry postings while some colleges would not have any clinical exposure to psychiatry at all during MBBS. Thus, the IMG suffered from low contact with the psychiatry teacher. There was an absence of uniform structure in psychiatry teaching across the country. Psychiatry teachers did not have any information on whether the IMG had any skills in identifying common mental disorders and/or their treatments.

CBME has increased the hours allotted to psychiatry. The duration of clinical posting in psychiatry was 4 weeks split across two years in the first NMC CBME curriculum and has increased to 6 weeks in the NMC Revision 6&7. Clinical posting is mandatory. The time for theory lectures is increased to 40 hours and includes didactic theory classes, self-directed learning (SDL), and tutorials. These changes offer a great opportunity for teaching and learning psychiatry, particularly developing skills for assessment, diagnosing and managing mental disorders. This may also increase the interest of the undergraduate in taking up psychiatry as a specialty.

The structure, level of detail, and increase in time allotted to psychiatryhas inspired most faculty to teach undergraduates in a more systematic manner<sup>12</sup>. It is of note that psychiatry is the only clinical specialty with an increased duration of postings with the CBME 2023 revision<sup>7</sup>.

# 4. COMPETENCIES LINKED TO THE AETCOM MODULE

The inclusion of the module on Attitude Ethics and Communication (AETCOM) provides a legitimate pathway for the incremental acquisition of milestones that contribute to the roles of the IMG namely communicator, clinician, team leader and team member<sup>13</sup>. The importance of AETCOM for the attainment of psychiatry related competencies for the IMG cannot be overstated<sup>14</sup>. AETCOM modules such as "What does it mean to be a patient", (dealing with patient/family experiences and concerns) and "The Doctor Patient relationship" as well as the

"Communication" modules highlight the necessity of building a therapeutic alliance through skill building active listening, gathering information and negotiation for treatment options. Modules on Patient autonomy, privacy and Confidentiality are very relevant for the care of patients and their families, especially those with mental disorders.

## 5. REFLECTION AND FEEDBACK

Reflection and feedback are key components in the CBME which make the learning more experiential and provide depth due to the opportunity for introspection offered in this. This is important to psychiatry, as increased clinical exposure may lead to documentation of experiences not commonly encountered by the young medical student. A collection of such reflective writing may also serve as a portfolio, which could be a learning and assessment tool to showcase attained competencies<sup>15</sup>.

# 6. THE LOGBOOK AS A REINFORCER

The mandatory requirement of the logbook with faculty signatures for competencies serves as a reinforcer to the student learner. Students might be encouraged to look for occasions to learn from teacher interactions and seek clinical encounters with patients during their posting. Psychiatry teachers have witnessed the welcome phenomenon of students pointing out that they need to see individuals with a particular diagnosis to meet their logbook requirements!

## 7. ELECTIVES: AN OPPORTUNITY

The 2-week electives in CBME are designed as courses with predefined learning objectives as determined by the medical college that are independent of prescribed NMC competencies. Inclined students can choose psychiatry electiveswhich may involve focusing on a niche aspect in mental health not usually studied during their clinical postings or theory. The examples could vary from a placement in a translational laboratory to study the genetics of schizophrenia to observer ship in the emergency ward forassessment and management of psychiatric emergencies. The 2-week period provides an immersive experience where the student learner will benefit through a range of learning and take part in discussions. Authors have shown that psychiatry electives encourage young doctors to pursue psychiatry as a future vocation<sup>16</sup>.

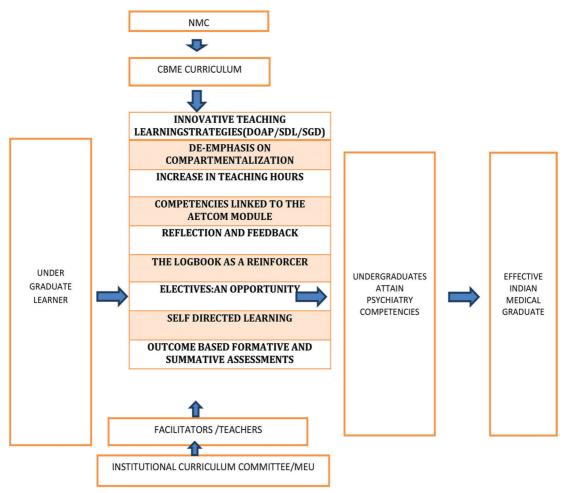
## 8. SELF DIRECTED LEARNING

Self-directed learning (SDL) is built into CBME to encourage budding doctors to develop a mindset for life-long learning. SDL has facilitated knowledge and skill learning in health care education<sup>17</sup>. Practical considerations for SDL implementation include learners given the choice of either the topic or method of study through their interactions with the facilitator. Eating disorders or behavioral addictions are potential topics for SDL. SDL could help students develop skills for identifying sources for further study and assimilate their learning with what is already known, thus setting a foundation for active self-regulated learning<sup>18</sup>.

# 9. OUTCOME BASED FORMATIVE AND SUMMATIVE ASSESSMENTS

CBME and NMC have recommended outcome-based assessments like theory questions and OSCEs with respective answer keys and objective checklists<sup>19</sup>. Psychiatry has assessments across psychomotor, communication, affective, knowledge, and attitudinal domains. Formative

assessments ensure that the learner and teacher can track progress and make corrections. Formative assessments can act as simultaneous TLM. For example, after the teacher assesses the IMG for their skills in eliciting the signs and symptoms of anxiety through OSCE, the teacher can add to their learning through feedback. Such formative assessments help the learner accomplish meaningful competencies.Figure 1 shows a postulated model of opportunities for psychiatry teaching through CBME.



#### Fig 1: CBME IN PSYCHIATRY: OPPORTUNITIES

# **PITFALLS OF CBME**

# **1. THE ENTRY INTO MEDICAL EDUCATION**

School education in India is didactic. School students experience prescriptive education before admission into medical colleges. The coaching for National Eligibility cum Entrance Test (NEET) for undergraduate medicine concentrates on recall aspects of cognition. This coaching might not prepare the students for the multidimensional aspects of learning in CBME. In

contrast, in certain countries, would-be doctors must complete an undergraduate degree program and -in doing so- equip themselves with valuable life experiences like volunteering for humanitarian activities to qualify for entry into the medical course<sup>20</sup>. These prepare the medical students for the communication, interpersonal, and leadership skills essential to medicine and could help them derive the best from CBME curriculums.

# 2. A HYBRID MODEL AT BEST

While CBME aims for skill development through competencies, their achievement is still through traditional time-bound deadlines<sup>11</sup>. Also, attempts to realize horizontal and vertical integration through sharing, nesting, or alignment of competencies across specialties are difficult due to interdepartmental coordination issues.

# 3. THE STRUGGLE TO MATCH THE RESOURCES WITH REQUIREMENTS

There is a mismatch between the ideal CBME model, which focuses on the student attaining competencies, and its actual implementation due to time limitations and faculty non-availability. Over the last few years, the scheduled MBBS course of 4 and half years has experienced curtailments to 4 years due to the prolonged NEET counseling processes and the COVID-19 pandemic. Key constituents like the foundation course that would have helped the student adapt to the change of learning, are shortened to make up for lost time. While there are attempts to address this, students and teachers have scrambled through the first year of medicine to complete the mandated curriculum, thus defeating the purpose of CBME.

# 4. THE PACE OF CHANGE

The change to a participatory and facilitative approach with a wide range of teaching learning techniques and assessment strategies is sudden. A survey concluded that incremental changes would have been more effective in CBME implementation<sup>21</sup>.

# 5. THE STEP BROTHERLY ATTITUDE TO UNDERGRADUATE TRAINING

Somemedical colleges run psychiatry postgraduate programs, and this can lead to a casual approach to undergraduate psychiatry training in such settings. Reviews have shown that when psychiatry post graduate residents are involved in undergraduate psychiatry teaching, both residents and students might benefit with improved experience and performance<sup>22</sup>.

Most IMGs are keen on specializing after their graduation and begin coaching for post graduate entrance tests early in their MBBS. The undergraduate student may ignore the training offered by their medical college in favor of multiple-choice question rehearsals. So, the IMG might lose out on acquiring skills in the psychomotor or affective domains due to their differing priorities.

# 6. FALLING BACK ON TRADITIONAL METHODS-INADEQUATE TRAINING

Most psychiatry teachers are familiar with the didactic model for UG psychiatry training. The shift to newer TLM and outcome assessments, with emphasis on the psychomotor, attitude and communication domains is a quantum leap for the teachers. Training in various TLM including those specificfor psychiatry competencies is lagging. Faculty regard newer TLM with varying degrees of trepidation and fall back on traditionalTLM which might not help with desired outcomes.

## 7. PAUCITY OF RESEARCH ON CBME TLM AND OUTCOME ASSESSMENTS

Authors have shown the utility of video-based lectures in addition to traditional formats in knowledge improvements in students<sup>23</sup>. Students and teachers have endorsed TLM like roleplays, use of simulated patients and audio-visual techniques in sustaining interest in psychiatry<sup>24</sup>. However, the research on TLM and outcome assessments in CBME is limited. This could lead to borrowing of education models from other countries/systems which might not be relevant to the Indian context. While the implementation of outcome based CBME has definite advantages, a systematic examination of what works within the Indian health and social climate is warranted.

# 8. THE NUMBER OF COMPETENCIES IN PSYCHIATRY

There are 117 competencies in the Psychiatry CBME Curriculum. This offers a detailed approach to learning of psychiatric disorders for the undergraduate student. On the flip side, the completion of this large number of competencies in a short duration may appear daunting for the psychiatry teacher as well as the learner. There appears to be an equal focus on common mental disorders like depression and anxiety and theless common but serious mental disorders such as schizophrenia. This could dilute the understanding of what is essential for a primary health care doctor. The large number of knowledge competencies could compromise time for skills acquisition in essential areas such as assessment of the medically ill for depressive disorders or management of behavioral emergencies. The latest modification of the curriculum in 2024 has attempted to address this atleast partially.

## 9. THE ABSENCE OF CERTIFIABLE COMPETENCIES & SUMMATIVE ASSESSMENTS

The absence of mandatory certifiable competencies in psychiatry for medical graduates is a major shortcoming. Professional psychiatry bodies have shared proposals to make competencies for the assessment and management of common mental disorders like depressive, anxiety and substance use disorders certifiable with the National Medical Commission. This will overcome the current drawback of all competencies from depression to personality disorders being given equal importance for the Indian Medical Graduate. There has been an attempt to address this issue in the latest modifications of 2024.

There isno outgoing summative assessment (examination) in psychiatry required for the MBBS graduation and this might diminish the importance of psychiatry in the student's mind. However, it is to be noted that the requirement of 75% and 80% attendance for the theory and clinical postings to be eligible for the respective outgoing assessments at each phase of MBBS, does lend importance to psychiatry for the student. The inclusion of theory questions and an OSCE station during the summative assessments during phase III part 2 is another suggestion that could ensure the student achieves essential psychiatry competencies.

## **10. THE NEED FOR ADMINISTRATIVE WILL AND COMMITMENT**

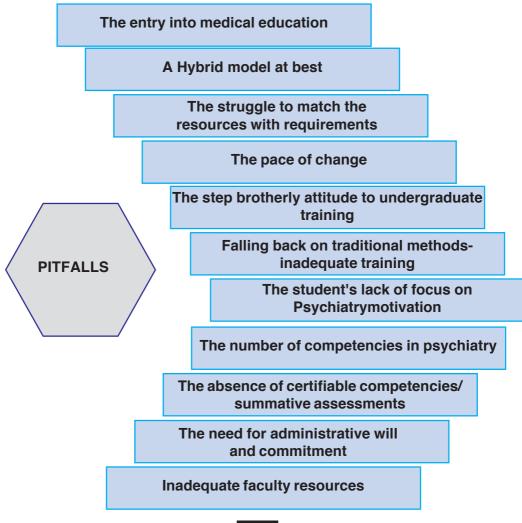
There is a need to match time/teaching faculty resources with the learners' schedule, to ensure that all students acquire competencies in the essential areas of depression, anxiety and substance use disorders. There are difficulties in the prioritization of planning and coordination activities required given the competing demands on the administration and faculty.

The curriculum committees, the medical education departments and psychiatry teachers in institutions need to work on this together.

## **11.INADEQUATE FACULTY RESOURCES**

The number of faculty in a teaching unit as mandated by NMCis 1 professor, 1 associate professor, 1 assistant professor and 1 senior resident7. This does not allow for an adequate teacher-learner ratio. The 40 hours theory and 6 weeks of clinical postings particularly with the recommended TLM calls for better faculty-learner ratios<sup>9</sup>. Medical teachers have mentioned that current faculty numbers were not adequate for the preparatory work for CBME implementation<sup>21</sup>.Most medical teachers opined that framing specific learning objectives (SLOs) was time-consuming in a teachers' survey<sup>12</sup>.Figure 2 shows a model of pitfalls of CBME in psychiatry undergraduate teaching.

Figure 2. Pitfalls of undergraduate psychiatry teaching in CBME



# **FUTURE DIRECTIONS**

Student exposure to psychiatry in clinical settings increases the interest in medical students<sup>25</sup>. The increased duration of clinical exposure to psychiatry is a welcome step in CBME. There is a need however to collect feedback from all the stakeholders involved in CBME implementation. The sharing of this feedback with teachers, students, medical college management and NMC could help refine further iterations of the undergraduate medical psychiatry curriculum.

The Indian Psychiatry Society in 2024 published a manual on Psychiatry Undergraduate Medical Trainingafter many years of workand expert faculty contribution<sup>26</sup>. This manual has provided specific learning objectives for the competencies with a suggested schedule for the clinical postings and theory sessions. This could be an important resource, saving hours of planning on the faculty's part. An evaluation of its use and impact is to be made. There are plans to devise a schedule for essential competencies for interns and reprint the manual.

# CONCLUSIONS

Implementation of CBME in medical education has changed the way psychiatry is taught and learned. There is an urgent need to render competencies related to common mental disorders certifiable. The CBME holds a promise to improve skills in psychiatry in the IMG and periodic appraisals by stakeholders and recalibration will help fulfill this promise.

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## **KEY MESSAGES**

- CBME implementation, with learner centric and outcome-oriented approaches, as well as its emphasis on skills and attitudes, has improved the approach to psychiatry training
- The increased duration and teaching hours allotted to psychiatry is in keeping with the relevance of mental health. Components such as integration, AETCOM, electives etc., add value to the learning of psychiatry competencies
- A significant pitfall is the mismatch between the resources available and the demands of implementing the CBME, as is the need to emphasize on the essential competencies in psychiatry required for the Indian Medical Graduate
- The way forward maybe a recalibration of the CBME Psychiatry implementation keeping in mind the socio-medical realities of the Indian Population

# CHAPTER 4

# Clinical Teaching Methods of Psychiatry for Undergraduates

Abstract: There cannot be a better way to trainundergraduates than to enhance skills by using appropriate teaching methods. They are upcoming doctors who play an important role in identifying and management of common psychiatric conditions in the Indian scenario. Clinical teaching methods used by psychiatry teachers have huge impact on the skills imbibed by medical graduates. Competency-based Medical Education (CBME) is now mandatory in India. The clinical teaching methods should begin with adult learning principles in mind. Affective, Psychomotor, and Cognitive domains should be delineated in every clinical teaching session and the teacher has to design specific learning objectives for the same. This chapter gives an outline with example.

## Introduction:

There cannot be a better way than to enhance skills by using appropriate teaching methods to train undergraduates. They areupcoming doctors who play an important role in identifying and management of common psychiatric conditions in the Indian scenario. This skill is crucial as there is a huge gap between those who require psychiatric services and the services available to them, as per the National Mental Health Survey 2016. The survey noted that one in seven had one or other psychiatric disorder and paradoxically, just over 10,000 psychiatrists in India, are trained to provide services. Hence psychiatry training in Indian medical colleges is of utmost importance. Currently, more than 700 medical colleges in India cater to more than half a million undergraduates at any given point in time. Clinical teaching methods used by psychiatry teachers have huge impact on the skills imbibed by medical graduates. Competency-based Medical

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Education (CBME) is now mandatory in India.[1]Innovative approaches are always required in psychiatry teaching. [2]Recently, many resources by the Indian Psychiatric Society and Indian Teachers of Psychiatry (IToP) forum are available for utility. [3,4]This chapter explores all aspects of Clinical teaching methods.

# Adult Learning Methods:

It is important to start any clinical teaching session with recap of adult learning principles.Undergraduate medical students are young adults; hence every psychiatry teacher must revisit the following & keep them in mind throughout the session.

- Adults Learn only when they want to (Control Learning)
- Adults require higher motivation to learn.
- Adults are resistant to change.
- Adults are pragmatic in learning.
- Adult learners are more diverse.
- Adults draw on past experiences in learning.
- Learning in adults is often self-initiated.
- Learning inadults is aimed at an immediate goal.

The clinical session has to generate curiosity among the undergraduates and psychiatry teacher has to prepare well for the induction, the art to begin any session.

# **Designing Specific Learning Objectives:**

The first principle of clinical teaching methods is designing SLO (Specific Learning Objective); it simply means psychiatry teacher and the student are able "to define what is expected to be learnt at end of the session". It involves:

- 1. Choice of topic & its components (psychiatry topic- example: depression)
- 2. Degree of expertise required (What is expected from 1st year or 2nd year or 3rd year or Final year MBBS student? How much should they know?)
- 3. Time Available (Is clinical session for 1hour? Is it a 3-hour session? Or more?)

For example, if it is 3rd year MBBS students who are attending clinical posting and Psychiatry teacher has designed SLOs for a 3-hour session on depression, at end of session, the student should be

- 1. Able to develop rapport with a patient presenting with depression
- 2. Able to elicit depression clinical criteria through the patient narrative as per WHO ICD-10 /11 or DSM IV/V
- 3. Able to do present the case of depression in psychiatry history taking format
- 4. Able to assess severity of depression using Hamilton Rating Scale for Depression

Psychiatry teacher can design SLO by using his /her clinical expertise and wisdom. It can be on "Pharmacological Management of Depression", it can also be on "Socio-demographic factors of Depression" and many more such SLO.

Suppose it is the first clinical posting in psychiatry for medical students. In that case, the psychiatry teacher can design SLO to differentiate psychiatric history-taking from the regular medical history-taking format. The Mental Status Examination (MSE) specific for usage among UGs can be taught.

## Competency- based Medical Education (CBME) Domains

Once the SLO is ready for the session, psychiatry teacher can look at the competency-based medical education (CBME), domains for the clinical teaching session.

There are three domains as per the National Medical Commission (NMC)

- 1. Cognitive- the knowledge component
- 2. Affective -the communication skill or professionalism
- 3. Psychomotor- the physical -mental skills

The psychiatry teacher should be able to give a lot of emphasis on the "Affective" and "Psychomotor" domains because medical students can read for themselves to gain the Cognitive domain or the knowledge aspects Ex: Prevalence of Depression in India, Aetiology of Depression, Antidepressants, etc

#### **Miller's Pyramid**

Psychiatry teachers can look at the level of competency expected from the medical students presenting to the clinical postings as per Miller's Pyramid

- 1. knows
- 2. Knows how
- 3. Shows
- 4. Shows how
- 5. Performs (under supervision/independently)

For example, 1st year and 2nd year MBBS students can be best trained in 1) knows and 2) knows how. If the students can proceed, 3) shows and 4) shows how can be incorporated.

Once the teacher has made the mind map of the SLO and domains for the clinical session, he or she should clearly inform the students about the same and proceed with the Induction.

#### Induction: the art of starting the session

Induction is all about generating curiosity, there are numerous methods, some of which are

- Verbal questioning (Example: What do they know about depression?)
- Case scenarios
- Picture or video clip
- Quotation
- Statistics
- Current events

There are unlimited methods for an enthusiastic psychiatry teacher and they have to be tried in every session and for every topic.

It is of utmost importance that clinical sessions should never be conducted without patients. Where it is not possible, role plays or simulation should be used because students are keen to learn from real-world scenarios, hence psychiatry teachers should plan well and prevent the conversion of clinical sessions into theory sessions.

Psychiatry teachers can also have ice-breaking sessions so that the learning environment can be made much more mutually engaging, for example by introducing themselves and his or her hobbies, then all students can narrate their hobbies.

Teachers can focus on learners' attention and learners' participation. The entire group of students can be assigned sequential repetition of numbers such 1,2,3,4,5 and small subgroups can be made, where everyone randomly gets into one or another group for a much more interactive but goal-oriented approach. Such a method can greatly help in dividing the SLOs designed for the entire session and each group focuses on one aspect. For example, group 1 should explore ways to elicit mood and group 2 should look at clinical criteria for depression as per WHO ICD 10/11 or DSM V.

Similarly, all groups take up different SLOs, and later from each group, the psychiatry teacher can randomly invite a student (so that all in the group are ready) to demonstrate either from the patient or by role-play or through simulation.

For example, in the affective domain (predominantly it is a communication skill or professional skill), let us consider students have to learn the art of development of rapport and the psychiatry teacher has given the following direction:

"Establish rapport with the patient (actual, with consent or simulation) who has nicotine dependence"

The allotted time is 5-10 minutes and let us consider one of the students taking up the role to demonstrate the same. The psychiatry teacher and the rest of the students can observe if the student in the interview process has carried out self-introduction, greetings, verbal and non-verbal communication of respect, empathy, normalisation of the interview process, etc that helps in rapport development.

Sometimes, the psychiatry teacher can demonstrate to all students the art of developing rapport with a patient who has given consent, followed by which the student groups can try it for different sets of patients or simulated scenarios.

Let us consider the cognitive domain: (predominantly knowledge)

For example, students are expected to elicit the diagnostic criteria for depression from the patient's narrative. Here different groups can take up different criteria, and in sequence, explore how to elicit each criterion. If the patient provides consent or through role play, students can elicit each criterion and note down the response and observation. Psychiatry teacher and students can jointly discuss if the interaction involves the Socratic questioning method. (Were open-ended questions used? Were there keen observation and empathetic listening skills?)

Let us now consider psychomotor domain (predominantly physical-mental skill)

The psychiatry teacher has instructed the student to demonstrate alcohol withdrawal tremors. In a patient who has given consent or in a simulated patient, the student should be able to give clear instructions to the patient to extend both forearms and spread the fingers, if the tremor is not visible, then the student should be able to demonstrate the same by keeping a paper sheet over the palmso that fine tremors visible.

Here the focus is on students' ability to demonstrate and not about describing the process. The psychiatry teacher should be able to distinguish how different domains should be imparted during the training of students.

#### **Important Considerations for Psychiatry Teachers**

Clinical teaching methods should involve active student participation throughout the session and irrespective of language constraints, students should make an attempt to communicate in the language that the patient can understand. Psychiatry teachers should actively involve all students and encourage them, including those who show hesitancy for one or other reason. Even if they can repeat what the teacher has demonstrated, learning happens.

There are numerous strategies for enthusiastic psychiatry teachers to imbibe CBME in everyday sessions. There are ways for many innovations. This includes mobile app-based strategies for clinical teaching. An example would be SAFL app (Self-AssessmentFor Life), a free android application for suicide risk assessment, that can be used for assistance in cognitive domain training of medical students in suicide risk assessment.

#### Assessment of Learning

Although the focus of the chapter is not on assessment, the psychiatry teacher's wisdom will enable effective assessment. Wherever the patient is involved, there isimmense scope for the patient himself or those who played the roleof the patient to give feedback to the student about the entire process. A clinical session can end with a brief Objectively Structured Clinical Examination (OSCE) for assessment of the students. Reflection is also a useful strategy in assessment. Students can write briefly about the learning experience or narrate the experience. Psychiatry teachers can plan for further assignments at end of the session or have open house interaction on any aspect of learning.

#### **Conclusion:**

Clinical teaching sessions are at the heart of psychiatry teaching. Clarity of specific learning objectives (SLO) and domains to be focused are important for enhancing the skills of medical students. Appropriate teaching methods go a long way for every psychiatry teacher.

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# **CHAPTER 5**

# Resources for Undergraduate Psychiatry Training

# Abstract:

Undergraduate psychiatry training is receiving the long due attention coinciding with implementation of CBME (competency based medical education). Using the opportunities and facing the challenges, the resource intensive curriculum is in its initial years. The resources needed for training undergraduates in psychiatry can be viewed as those required at each phase of MBBS. Starting as early as with foundation course and early clinical exposure the interaction with faculty and students tend to happen all throughout the course. In addition to traditional components, newer things like electives, learner doctor method of training, self-directed learning and attitude, ethics and communication (AETCOM) module have their own specific resource requirements which are dealt with in this chapter. This section makes use of medical education principles and comprehensively covers student, faculty and institution/ department related resources arranged in phase wise manner.

#### **Resources for Undergraduate Psychiatry Training**

## Introduction

With the start of CBME era and also due to sensitization of faculty through medical education training, Indian Psychiatric Society (IPS) networking and activities, undergraduate psychiatry training has gathered momentum. Currently psychiatry teachers are on the lookout for

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systematic and innovative approaches in undergraduate psychiatry training. This chapter highlights the role of faculty and optimal resources needed throughout the course of MBBS with a disclaimer that attempt has been made to be a bit idealistic and comprehensive. Readers are left with their discretion to use the inputs as applicable to their institutional context, individual preference and departmental feasibility.

# Foundation course

"Foundation Course", at the beginning of the MBBS course is to sensitise the fresh medical student in acclimatising to the new professional environment.<sup>1</sup>Communication skills and stress management are the components under foundation course where the department of psychiatry can be assigned with the responsibility but the discretion of delegating to the appropriate resource department is with the Dean and coordinator of the institution. If assigned, a PowerPoint presentation and role play script can be handy. NMC recommends the usage of Kalamazoo consensus document with the set of essential elements in physician-patient communication.<sup>2</sup>

# Early Clinical Exposure (ECE)

ECE provides a clinical context and relevance to basicsciences learning.<sup>3</sup>One of the ECE session can be volunteered by department of psychiatry to demonstrate clinical interviewing of either a patient with Parkinson's disease as suggested in NMC document or a patient with alcohol dependence. The objective is to make students understand alterations in normal functions of brain structures and its clinical expression. An observational guide for students and a facilitator guide for faculty are needed along with feedback form to carry out this session in a hospital setting.

## Research

The Competency Based Medical Education Curriculum Guidelines document from NMC in 2023 has suggested few changes in assessment. Student research finally finds a place under continuous internal assessment carrying 20 marks in all the phases of MBBS. It is suggested for faculty members to brainstorm with students to come up with suitable topic for research either through ICMR sponsorship or self-funded mini project. The other option is making teams and allotting research topics.

# **Clinical Postings with Learner Doctor method of training**

The revised schedule of clinical postings as per recent CBME document allows 2 weeks in III professional year and 4 weeks in IV professional year of MBBS for clinical learning in psychiatry. Introduction of learner-doctor method of training allows learners to gather experience in:

- · Longitudinal patient care,
- · Being part of the health care team,
- · Hands-on care of patients in outpatient and in-patient setting

3 <sup>rd</sup> year MBBS: 2 weeks	• Doctor patient relationship, history taking and mental status examination (MSE), interpretation of lab findings, differential diagnosis of common psychiatric disorders
4 <sup>th</sup> year MBBS: 4 weeks	• Psychiatric specialities, revision of common psychiatric disorders with focus on treatment and family education at primary health care level , breaking bad news
Internship: 2 weeks	• Novice to competent level of history taking, examination and family education, investigations, management and referral, promotion of mental health and hygiene

Figure -1. Focus areas in clinical postings across the phases and internship

As described in figure-1, the initial clinical posting focuses on doctor patient relationship, history taking and mental status examination, interpretation of lab findings, differential diagnosis of common psychiatric disorders. The educational resources needed are scripts of role play for rapport establishing session and empathetic interaction, standardized proformas (e.g. case taking scheme adapted from Mayer-Gross proforma followed at NIMHANS, IPS-recommended standardized MSE format<sup>4</sup>), and lesson plans for sessions on history taking and mental status examination which in turn requires case scenarios, simulated patients, hypothetical/ real investigation reports/values and ICD-11 booklet.<sup>5</sup>

The psychiatry postings in final year need to take into additional consideration, management and family education apart from the topics of speciality sections like child psychiatry, sexual disorders, geriatric psychiatry etc. In this regard, apart from the resources mentioned under postings of 3rd professional year, the faculty require similar materials for clinical management and family education sessions. Alternatively, pre-recorded and pre-consented videos of clinical interviews or audio podcasts can also be used to demonstrate history taking and examination. The concept of learner-doctor method of training, though not totally new, has students getting tagged with available in-patients to observe and follow the patient's progress under the supervision of senior resident or faculty member. Having postgraduates (PG) in the department could be resourceful to effectively engage the undergraduates as they also get parallelly assigned with cases in the ward. The logbook/case records serve the purpose of assessing the students in this regard.

End postings assessment, wherever possible, can follow OSCE (Objective Structured Clinical Examination) format or OSLER (Objective Structured Long Examination Record) with some adaptation.<sup>6</sup>The manual by IPS mentions the checklist, stations and specific tasks for the students along with suggested marking scheme. Since the assessments are formative in nature it is better to include component of feedback. The department can generate google forms to receive feedback while semi-structured format can be followed to give oral feedback to the students individually.

The posting in psychiatry during internship is all about achieving the competence level from novice level (Dreyfus model of skill acquisition) for clinical diagnosis based on history, physical

examination, relevant laboratory investigations and to institute appropriate line of management. Revised list of competencies in psychiatry makes mention of two certifiable skills in diagnosing and managing case of depression at primary care level and suicide risk assessment. Wherever possible, the internship logbook can be altered to include skills to manage common psychiatric illnesses in alignment with teaching-learning happening during the clinical postings.

## **Electives**

Electives are offered to provide the undergraduates with diverse learning experiences which will stimulate enquiry, self-directed experiential learning and lateral thinking about a career stream, discipline or research project.<sup>7</sup> The NMC document already has a template for creating an elective module which can be used in psychiatry in the areas based on feasibility in each institution. The faculty need to devise learning objectives, prerequisites, list of activities for student participation, learning resources, entries in logbook/ portfolio and assessment strategies. The CBME manual by IPS has such an example of electives module in 'addiction medicine'.<sup>6</sup>

## Lectures

The topics which have predominant cognitive domain can be subsumed under allotted 15 hours of lectures in final year of MBBS. While the faculty ideally need lesson plans and power point presentations for each of these sessions, the students would want textbooks to go through at their pace.<sup>8-10</sup> The CBME manual by IPS has suggested schedule, topics, sample of lesson plan for an interactive lecture.<sup>6</sup> The additional resources for the enthusiastic teachers could be case vignettes,videos,pictures,cartoons,tables and charts either to set induction or to make lectures interesting throughout. If a faculty member can invest more time, pre and post-test MCQs in addition to the feedback can be utilized. It is suggested that the topics of interest to the faculty are considered in allotment to make the teacher more resourceful to students.

# Small Group Learning (SGL) with Integration

With 15 hours meant for small group discussions, the topics categorized under this need higher order cognitive involvement from learners. The topics like psychosomatic disorders, substance use disorders, intellectual disability etc., need horizontal integration with general medicine, dermatology, paediatrics, obstetrics and gynaecology etc. Hence lesson plans and coordination with faculty of respective department (if nesting and sharing methods of integration are feasible) are the requisites. The topics ranging from EEG (electroencephalography) to mental health legislation will require vertical integration with physiology, anatomy, pharmacology, community medicine and forensic medicine.<sup>11</sup>EEG recordings, the mental health care act 2017, brain models, ECT (electroconvulsive therapy) manual, PowerPoint presentations from faculty of integrating department and videos for discussion are few resources which are useful in these sessions.

# Self-Directed Learning (SDL)

Some other topics in psychiatry with cognitive domain predominance that can be covered under self-directed learning are history of psychiatry, gender incongruence, autism spectrum disorders, behavioural addictions and headache. The faculty engaging in SDL might need a facilitator guide and a list of resources to provide to learners. The facilitator guide will have key

components of the topic which are to be used to ascertain whether the learners are on the right track in deriving learning objectives and accessing the appropriate educational resources. The faculty can also point out whether such learning resources are of adequate standard and are authentic.

## **AETCOM** modules

It is genuinely expected that this module plays a vital role in providing a coherent picture of how attitude, communication and bioethics can be integrated within medical curriculum.<sup>12</sup>Amongst the modules meant for 3rd professional year and final year of MBBS, those concerning communication, empathy, ethical dilemma, confidentiality and autonomy have relevance to psychiatry. The booklet by NMC has adequate information and guidance to implement this longitudinal module. It includes the core and non-core competencies, teaching learning strategies, case vignettes, duration of sessions, learning resources, points for discussion and assessment aspects.

# Yoga training

Now that the practice of yoga has been integrated into the curriculum, department of psychiatry can play arole in coordinating with other departments in its implementation. The standard medical textbooks give inputs regarding basis and benefits of Yoga and there are many books and online videos for demonstration.

#### Summative assessment

The current curriculum has created opportunity for the subject psychiatry to be part of summative assessment. Since the subject carries roughly 15-20 marks in paper -II of general medicine, the faculty need to create question bank (descriptive, MCQs etc) and a blueprint for proper weightage distribution and better organization. A sample of blueprint is shown as Table-1 considering total allotted marks to psychiatry as 20.

Sl No	Торіс	Weightage (Max Marks)	Short essay 5 marks each	Short answer 3 marks each	MCQ 1 mark each	Total marks from each topic
1	Introduction to Psychiatry	3				
2	Substance use disorders	6				
3	Psychotic disorders	4				
4	Mood disorders	6				
5	Anxiety disorders	4				
6	Stress related disorders	3				
7	Somatoform and other psychosomatic disorders	3				
8	Personality disorders	3				
9	Psychosexual and gender identity disorders	5				
10	Psychiatric disorders in child hood & adolescence	5				
11	Psychiatric disorders in elderly	4				
12	Psychiatric emergencies	3				
13	Community psychiatry	3				
14	Legal and ethical issues in psychiatry	5				
15	Other biological and psychological treatments	3				
	Max no. of questions and total ma	arks	2	2	4	20

Table -1. Blueprint of question paper (Psychiatry in Section -B of General medicine)

Note: Total marks under each type of question from each topic needs to be entered by Question Paper setter. The marks for each topic should not exceed more than the weightage given for the topic. ( $\sqrt{}$  in appropriate box and sum up the total marks for the topic)

- · Weightage of marks assigned to topics may add to more than 20
- Maximum of 01 MCQ can be framed from each topic.
- Out of 4 MCQs, at least 03 MCQs shall be framed from application and above level of cognition
- Out of 2 Short essays and 2 short answers, at least one question under each category shall be allocated to assess the higher order thinking of the learner.
- The questions framed shall be with appropriate verbs without any ambiguity or overlap

Phase of MBBS	Resources for the Student	Resources for the Faculty	Resources for the Institution/ department
I MBBS Foundation course	Kalamazoo consensus document	PowerPoint presentation, Script of role play, Communication skills checklist	Book on life skills approach <sup>13</sup>
Early Clinical Exposure	Observer guide	Facilitator guide	Relevant clinical material in OP/IP Feedback form
II MBBS Student research Yoga Training	ICMR website Literature search on PubMed Common Yoga protocol by AYUSH	ICMR website Literature search on PubMed Common Yoga protocol by AYUSH	Pool of Research topics Common Yoga protocol by AYUSH
III MBBS Clinical postings -1	Case taking proforma, MSE format	Case scenarios, Scripts of role play, Lab report/values Lesson plans Videos, audio podcasts OSCE/ OSLER checklist & stations	Simulated patients (Interns/PGs) ICD-11 booklet Google forms feedback The CBME manual by IPS
IV MBBSClinicalCase taking proforma,postings -2MSE format,Family educationtemplate		Case scenarios, Scripts of role play, Lab report/values Lesson plans Videos, audio podcasts	Simulated patients (Interns/PGs) ICD-11 booklet Google forms feedback

Table 2: Resources for undergraduate psychiatry training at a glance

End postings assessment	Standard textbooks	OSCE/ OSLER checklist & stations	The CBME manual by IPS	
Electives	Electives Announced Electives module Schedule for student engagement Pre and Post test MCQs		The CBME manual by IPS Google forms feedback Clinical materials Google classroom	
Lectures	Standard textbooks	Lesson plans, PowerPoint presentation	Slide changer	
Internal assessment	Blue book	Question paper Answer keys	Question bank, Google forms feedback	
Small group learning	Standard textbooks	EEG recordings, Videos, PowerPoint presentation	ECT manual, Brain models	
Self- directed learning	Library books,	Facilitator guide Resources list	Library	
AETCOM module	AETCOM booklet by NMC	AETCOM booklet by NMC	Clinical materials Google forms feedback	
Summative Standard textbooks Question paper Answer keys			Question bank Blueprint	
Internship Clinical postings-3	Logbook MCQs books for competitive exams	List of Assessment/ certifiable skills	Clinical materials Postgraduates (PGs)	

The educational resources for undergraduate psychiatry training can be categorized for the sake of convenience and better understanding as (Table -2 shows details):

- 1. Resources for the Student
- 2. Resources for the Faculty
- 3. Resources for the Institution/ department

# Conclusion

The implementation of CBME is resource intensive but proper planning and faculty support will ensure smooth sailing for both students and faculty. Involving PGs, interns and support staff will reduce the departmental burden and also enhance collective learning. Utilizing e-learning resources needs to be the norm going ahead.

## Take home messages

- Psychiatry training for undergraduates happens in all the phases of MBBS
- · Faculty needs to be proactive, enthusiastic and use e-learning resources
- Faculty needs to be trained in medical education principles so as to better utilize the limited resources

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# CHAPTER 6

# COMPETENCY BASED ASSESSMENT OF UNDERGRADUATES IN PSYCHIATRY

#### Abstract

In competency-basedassessment(CBA) both teaching and assessment has to be aligned with specific learning objectives. This ensures and facilitates learning progress.CBA is a continuous and ongoing process with opportunities for providing developmental feedback. Informal assessments help the facilitators to ensure the learning in the classroom or clinical setting.High context specificity is mandatory in the CBA.Individual assessment of knowledge, skills and attitudes do not always ensure competency. Proper planning and preparation are essential to ensure the utility of the assessment bythe use of tools with good validity, reliability and educational impact.Use of multiple assessment opportunities, tools and assessors enhances learning and reduces subjectivity in assessment.Assessment tool box that provides general guidance about availability and possible use of a tool is handy for the assessors to ensure the quality of assessment. Competencies, especially those involving psychomotor and affective domains need to be assessed multiple times and in different authentic contexts. CBA ensures the learning progress in all three domains.Direct observation of the learners improves utility of CBA and quality of feedback. Proper communication of the assessment is essential.

#### INTRODUCTION

Passing an examination was considered as the single determinant of mastery on a subject in traditional medical curriculum. In reality, this alone does not equip a learner to face clinical situations. Moreover, various personal, financial, and family factors arising during the learning period or around the examinations tend to affect the performance of the learners. In view of these, the decision to pass or fail a learner based on a year-end examination does not appear wise .<sup>1</sup>

Traditional assessments are cross sectional observations of learning. Though easy to design, administer, score and analyze, those are not able to provide complete information about the level of learning. They generally are fragmented and not linked to instructions or outcomes and focus mainly on knowledge.

Ideally, assessment has to be a process aimed at determining the extent of the learning outcome accomplished by the learner in a teaching-learning program. The major objective of the

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Associate Professor of Psychiatry, Faculty, Regional Centre for Medical Education Technologies. Govt. Medical College, Kozhikode-8, Kerala assessment process must be to ensure learning enhancementby inducing learner motivation, self-evaluation, retention and transfer of the learning.<sup>2,3</sup> If well designed, it can unravel the effectiveness of the instruction process too.For every assessment, the most efficient and appropriate method for the intended learning outcomes has to be identified. The planning of assessment and instruction must complement each other.

#### **PROGRAMMATIC ASSESSMENT**

Programmatic assessment is a crucial attribute of competency based medical education and expounds the ways to bridge the gaps in the traditional assessment process.<sup>4</sup> It advocates "assessment for learning" (formative assessment) rather than "assessment of learning" (summative assessment).<sup>5,6</sup> It is resource-intensive and demands time, energy and dedication of the teachers/ facilitators.<sup>6,7</sup> There is provision to opt for different assessment methods in order to align with the curriculum outcomes.<sup>5</sup>The progress of the learners throughout the academic year is continuously monitored and analyzed, and this helps facilitation of learning.<sup>6</sup> Since value of year end/summative examinations is not over emphasized, remedial actions are made possible in between.<sup>4,6</sup>

## THE ASSESSMENT IN CBME

Harmony and alignment between learning objectives, instructional activities, and assessment are mandatory in competency-based assessment (CBA). CBA, provides comprehensive information about the current level of learning as well as the progression and ascendency of the learner.<sup>9</sup> In CBME, teaching and assessment has to be in the context of competencies. The continuous process of assessment for learningis crucial for ensuring the acquisition of competencies. Authentic settings of assessment, and provision of developmental feedback based on direct observation of the learner's performance to improve learning, are also the hallmarks of competency-based assessments. All competencies need to be assessed multiple times and in different contexts.

The assessment tools in CBA are markers for evaluation of learning or for certification of competencies. The decision to pass or fail is made only after obtaining adequate evidence from multiple assessors and assessments using various tools. <sup>8-10</sup> The assessment in CBME involves both formal and informal components and records the strengths and weaknesses of the learner and the areas which require improvement.<sup>8,9</sup> This information is made available to the learner along with constructive feedbackand guidance to improve their areas of weakness.<sup>8,9</sup> The assessment also generates evidence for the quality assurance like overall improvement of the curriculum and the mode of education delivery.<sup>8</sup> Longitudinal nature of CBA lowers the importance of individual assessments, which reduces exam anxiety and in turn helps in improving learning.

#### THE DOMAINS AND LEVELS OF LEARNING AND CBA

Proper understanding of domains of learning and hierarchy of learning is essential in planning and preparation of specific learning objectives(SLOs), teaching learning(TL) and assessment methods in CBME.

#### The revised Bloom's taxonomy of educational objectives

Every learning objective has a specific domain of learning among the following three: Cognitive, Affective and Psychomotor.<sup>12</sup> The revised Bloom's taxonomy of educational objectives describes six cognitive process categories which are remember, understand, apply, analyze, evaluate and create.<sup>13</sup> It also describes four knowledge categories which are factual, conceptual, procedural and metacognitive.<sup>12</sup> Based on these categories, suitablemeasurable action verbs are identified that explicitly indicate what the learners must do in order to demonstrate learning.

# Miller's model for the assessment of clinical competencies

George Miller's model, represented by the 'Miller pyramid' divides the development of clinical competence into four, hierarchical processes.<sup>15</sup> The lower levels stands for the cognitive components, which can be tested by the classroom-based assessments. The higher tiers account for the behavioral components which call for assessments in simulated and real clinical settings.<sup>16</sup> As the observable behaviors take the top of the hierarchy, Miller's model argued for the introduction of performance-based assessments.<sup>16</sup> Sound diagnostic reasoning skills are important for safe clinical practice. Diagnostic reasoning, an essential part of clinical setting.<sup>17</sup> In undergraduate medical education, it is important to incorporate adequate assessment methods which focus on diagnostic reasoning pertaining to the competencies of 'knowledge' and 'application of knowledge'.

Table 1.Learning Progression in Various Domains

	Miller's Levels Learning progression→				
Bloom's Domains	К	КН	SH	S/D	
Cognitive (Knowledge)	Knowledge	Application	Analysis	Evaluation	
	Comprehension		Synthesis	Creation	
	Perception	Set	Guided Response	Mechanism	
Psychomotor (Skills)				Complex Overt Response	
				Adaptation	
				Origination	
Affective (Attitudes)	Receiving	Responding	Organizing	Characterizing	
(Autudes)		Valuing			

# STEPS IN DESIGNING AN ASSESSMENT

# Preparation and Announcement of Directions and Criteria:

At the starting of the clinical posting itself, summarize the schedule, rules and procedures of assessment to the learners. It should be incorporated in the timetable and logbook/study guide of the module too.

# Assessment Procedure with Good Validity and Reliability:

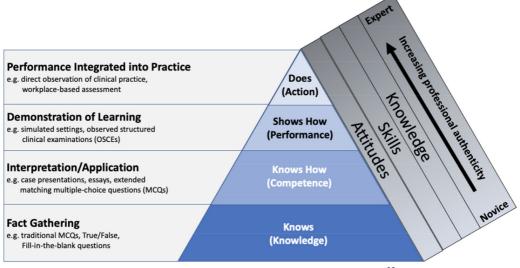
A well-designed assessment procedure must be one with good validity and reliability. For CBA, validity and educational impact are the major determinants of its utility. The validity depends on the way a tool is used, i.e., "does it test what it is intended to test?". Increasing the number of tests and the number of questions improves the validity. The reliability refers to the interpretation of the test, ie, "does it consistently test what it is intended to test?" The reliability can be improved by increasing the number of assessors, assessments and tasks.High educational impact assessments motivates the learners for in depth learning.

# Choosing an Assessment Tool/Method:

Based on the level of clinical competency in Miller's Pyramid, one or two assessment instruments from each level is needed to reflect the real ability of the learner. <sup>20</sup> No assessment tool is inherently good or bad, but it is the way the assessment tool is utilized, which makes all the difference.

# The Blueprint:

## Fig.1.The Miller's Pyramid showing the suitable assessment tools for various levels



(Source:Miller's Pyramid – Education Theory Made Practical, Volume 4<sup>22</sup>)

In the context of health professional education, a blueprint is a template that represents a systematically developed plan to ensure proper weightage and representativeness of contents and learning outcomes in the assessment. It enhances constructive alignment and provides evidence of validity. It displays the selection of the appropriate assessment tool and test items depending on the Miller's cognitive level of each topic. The subject experts prepare the blueprint by calculating the weightage of each topic in the curricular content and providing a priority index to those topics.<sup>23</sup>

#### **Referencing Framework:**

To get accurate and useful results interpretations, a referencing framework is mandatory. Norm referenced and criterion referenced interpretations are the two main frameworks.CBA uses the criterion-referenced interpretation.A standard, cut-off score or criterion will be predetermined (eg:50% score) deciding if one passes or fails. The criterion-referenced framework depends on the performance of the particular learner and not on that of others.<sup>24</sup> There is flexibility as the criteria for certain core areas/topics can be set at a higher level to ensure learning.Norm referenced interpretation measures the individual differences in the achievement. It depends on the other learners' performance for determining the pass or fail grade of the given learner.It discriminates between high and low achievers and is suitable for competitive or entrance examinations.

#### Ensuring the Feasibility of Assessment:

The assessment must be feasible. This depends on the availability of resources such as the time for test development, test administration, analysis of papers, availability of training for examiners and the expenses <sup>25</sup>

#### THE ASSESSMENT OPPORTUNITIES AND TYPES OF ASSESSMENTS

The assessment opportunities are of two types: term-end and ongoing.Generally, the universities conduct the term-end examinations, which are outcome focused and make pass or fail decisions.Known as summative assessment, this aids in the identification of mastery in the subject or assigning of the grades and also aims at providing feedback. Assessment of professionalism, ethics and team work, and many procedural skills are not possible with these term end assessments. The ongoing assessments (also known as formative assessments) are conducted by the instructors/facilitators. These are process-focused and measure the extent of the learning outcomes in the period of instruction. These are handy for monitoring learner progress and identifying the strength and weak points of their performance and also aid in learning improvement.

#### Informal Assessments

Informal assessments are conducted during routine classroom teaching learning sessions as well as clinical teaching. These serve the purpose of identifying the level of learning and are useful aid to learning and acquiring competencies.<sup>1</sup> Psychiatry being a subject with no certifiable competencies at present and not chartered to have formal examinations yet, extensive utilization of informal assessment opportunities is more desirable in undergraduate training. Proper planning and preparation is the key for successful informal assessments.

#### Classroom Assessment Techniques (CATs)

These simple, non-graded and easy to administer in-class activities give learners and facilitators a rapid input about the TL process.<sup>27,28</sup> These are formative method and permit real time assessment of learning. The choice of technique utilized depends on the logistics, time, subject and feasibility.<sup>28</sup> Use of clickers, one-minute papers, muddiest point, 3-2-1 format, Focused listing, Think-Pair-Share, Concept Mapping, Jigsaw method, Memory Matrix, Quizzes, Flashcards, Crosswords, Word clouds etccan assess understanding and provide feedback.<sup>7</sup> Online sharing platforms like Google classrooms, forms, slides, docs and sheets, Whatsapp polls, etc can be used for in-class assessments. An interactive white board, if available is a teaching aid which is of great help in conducting informal classroom assessments. Various smartphone applications like word search matrix, mindomo, word search, word wall, kahoot, anki cards etc are useful to ensure the learner engagement by using elements of gaming in assessment.

During clinical teaching, a one-minute preceptor (OMP) or SNAPPS can be used for informal assessment. SNAPPS is a technique that involves steps like summarizing history and findings, narrowing and analyzing the differential, probing preceptors about uncertainties, planning management, and selecting case-related issues for self-study <sup>1</sup>

#### Internal assessments

Internal assessment(IA) creates useful avenues for both formative and summative assessment. It provides best formative opportunities when done by the facilitators who have taught the subject. Apart from providing hands-on experience in assessment, it also supports building the ownership of teaching learning and assessment processes for facilitators. With the formal nature, larger sampling of topics, competencies and skills it curbs the limitations of informal classroom assessments. IA focuses on both the content and process of learning. This assessment gives priority to all three domains of learning.<sup>29</sup>

## **ASSESSMENT TOOLS**

Expert subjective judgment is important in CBME. Many available tools use the power of expert subjectivity which allows assessment of many traits which were impossible with the traditional ones. Assessment tools in the field of medical education have their own strengths and weaknesses that affect the decision-making process.30 In CBA there is flexibility in the use of tools. Use of multiple assessment tools with different properties helps to compensate for the weaknesses as well as supplement the strengths of the tools. For example, a long case presentation of Depressive Episode can be supplemented with an OSCE station to test skills to elicit suicide risk and mini peer assessment tool (mPAT) for communication skills.

## ASSESSMENT TOOLBOX

Like a skilled mechanic who carries a tool box which contains various tools that can be used depending on the situations, in CBA it is desirable for the facilitators to have a handy assessment toolbox. This toolbox encompasses those tools which can be used for any assessment, which can either substitute or supplement the commonly used or main ones, those which can be used in special or demanding situations. One assessment can be performed by various assessment

tools and one tool can be handy in various assessments too. It is not the tool but the users' creativity and expertise in using the tool that determines its usefulness and outcome. In most situations, one method would be enough but, if needed, another or more than one method may have to be used. Rather than being their innate property, the psychometric characteristics of most tools are dependent on the way they are used.<sup>3</sup>

#### **Response tests and performance assessment tests**

These are the common assessment methods for cognitive domain.Many common tools like multiple-choice questions (MCQs), short answer questions (SAQs), essay-type questions (EAQs) belong to this group.Response tests include selected response and supply response tests.<sup>31</sup> Selected response tests include MCQs, true-false and extended matching tests. They are very popular due to the ease of administration even for a large group and highly objective scoring.Understanding and thinking skills are measured but these tests are less realistic with relatively low freedom of response. Extended matching questions(EMQ) are simple and superior variations of MCQs.These are useful for the assessment of the problem-solving and clinical reasoning skills.<sup>32</sup> Short answer questions and completion questions test supply response. Recall of terminology, methods, procedure and specific facts can be tested using this method.These are more realistic with high freedom of the response as the learner can 'supply' own words, phrases or more.<sup>31</sup>

Performance assessment tests include essays, portfolios and clinical demonstrations. The learner applies their knowledge, skills, and abilities to the given problems and gives a report, experiment, or performance. The scoring is time consuming, subjective and requires scoring rubrics, or rating scales.<sup>33</sup> Restricted performance assessments focus on limited aspects and demand the learner to provide short and concise answers. It is a realistic assessment with good freedom of response. Performance of a highly structured and focused task is assessed. Specific topics like "compare and contrast the side effects of first- and second-generation antipsychotics" or "demonstrate the features of alcohol withdrawal" are assessed in this method. Extended performance assessment simulates the real-world scenario. Integration of knowledge and skills from various sources is required in the response. This includes less structured and unrestricted tasks like preparing a public awareness handout on alcohol use disorders or a project on medication adherence in chronic psychiatric disorders.

# Short Case and Long Case

These holistic tools assess most global competencies well. These methods demand a strong knowledge base and are useful in assessment of clinical skills and communication skills too. These may require supplementation tools in specific situations. Short cases are mainly used to assess clinical competence. Learners are asked to perform a supervised, specific examination of a real patient, and are then assessed on the examination technique, the ability to elicit signs and symptoms and interpret their findings in an organized manner.<sup>34</sup>

Due to the perceived educational impact, long cases are useful in both summative and formative assessment.<sup>35</sup> Irrespective of its resemblance to real life case encounters, its acceptance in CBA is less. A long case requires an uninterrupted patient encounter time of 30-45 minutes. After

listening to the summary of history and examination findings along with the management plan the examiner conducts an unstructured oral examination on the related topics. Conducting an objectivestructured long examination record (OSLER) by structuring the oral examination and incorporating direct observation or incorporating an extended objective structured clinical examination (OSCE) to the long case are some measures to improve this assessment method.<sup>36,37</sup> Increasing the number of cases and assessors also help to increase its reliability38Objective-structured long examination record (OSLER) was developed by Gleeson with a structured format and direct observation of patient encounters.Being a useful tool for effective feedback and handy in formative assessments, OSLER is an excellent tool which fosters clinical competence.<sup>36</sup>

Objective structured clinical examination (OSCE), which assesses the 'shows how' level of Miller's pyramid, is one of the most used tools for assessment of the psychomotor domain. This standardized tool can test content skills, process skills, and clinical management. It can be usedfor assessing competencies like history taking, physical and mental status examination, and various clinical procedures in Psychiatry. The infrastructure and the availability of human and material resources contributes to the success of OSCE.<sup>39</sup> Because every learner performs the same task, the acceptability of OSCE among the learners is high.<sup>37</sup> The test results depend on the direct observation andrepeated measurements of the learner's performance. Multiple stations and examiners assessing a variety of learning outcomes within a limited time, and the use of rating scales or checklists indicating high reliability, makes OSCE popular among both the learners and facilitators.

Script concordance test (SCT) is a tool developed to test clinical reasoning especially in uncertain situations that match with the real-life scenarios. This consists of a short case vignette or clinical scenario and a set of questions in three parts. The first part gives a hypothesis in the form of a diagnostic or therapeutic consideration. The second part gives some additional information, such as a physical examination or investigation finding or a pre-existing condition, that may or may not influence the initial hypothesis. The third part contains a 5-point likert-type response scale to be answered by the learner. Learners are required to indicate on the likert scale what they think would be the possible effect of the new information given in part two on the proposed hypothesis mentioned in part one.<sup>40</sup>

If you planned/ If you were thinking of	And then you found	Your management/hypothesis becomes	
talk, intrusive behavior and spending sprees lasted for three months in the past		<ul> <li>+2: Strongly contraindicated</li> <li>+1: Should be reconsidered</li> <li>0: Neither more nor less indicated</li> <li>-1: Indicated</li> <li>-2: Strongly Indicated</li> </ul>	

#### **Table 2.Script Concordance Test Model**

Professionalism mini clinical evaluation exercise (P-MEX): This structured observation tool with good reliability and validity is used to assess professionalism. It contains 24 items, rated on a 4-point scale. The results are discussed with the learner after multiple observations.<sup>41</sup>

In Case-Based Discussion (CBD) or Chart-Stimulated Recall (CSR), theassessment is by a structured and standardized oral examination based on clinical cases during a 20 minutes encounter probing the justification behind the case work-up, diagnosis, interpretation of clinical findings, care provided and case management plans. This one-to-one discussion which promotes reflective thinking, self-directed learning and autonomy also provides 5 minutes of feedback.<sup>42</sup>

Mini Clinical Evaluation Exercises (m-CEX) is a popular formative assessment technique which demands workplace interactions with patients under the observation of educators or faculty members.45 Learners perform clinical activities like focused history taking, MSE or relevant physical examination. Then they present a summary with their clinical diagnosis and a management plan.A 9-point rating scale is used by the observer to score the various aspects of patient encounter.<sup>46</sup>

Multi source Feedback provides performance assessment and feedback to enable the learner to reflect upon and act to enhance learning. Data about learner's observable clinical behaviors (self-reports as well as information from the faculty, residents, other members of the mental health care team, peers and the patients) can be collected. More than eight raters indicate good validity.<sup>47</sup> This four-staged formative assessment technique is often called 360-degree feedback.

- · Collection of information using questionnaires.
- Aggregation of the collected data ensuring anonymity and confidentiality
- Preparing a report using the aggregated data to the learner.
- Plan a session with the learner to review the data and develop an action plan.

Patient care and education, procedural skills, interpersonal and communication skills, professionalism, and practice-based learning and improvement are the domains where MSF is useful.<sup>48</sup>

Direct Observation of Procedural Skills (DOPS) is a structured rating scale that ensures that learners are given specific feedback based on direct observation so as to improve their procedural skills. Commonly performed procedures for which learners are expected to demonstrate competence can be assessed using DOPS. These are best assessed by multiple facilitators on multiple occasions throughout the training period.<sup>49</sup>

The Clinical Encounter Cards (CEC) assesses and scores various dimensions of observed clinical practice ranging from history taking to problem solving/management. Each dimension is scored using a 6-point rating scale. To measure a clinical competence and to provide effective feedback, approximately eight clinical encounters need to be assessed using the CEC system.<sup>50</sup> Clinical Work Sampling (CWS) is another assessment method using direct observation of clinical performance which collects data related to specific patient encounters for various domains.Faculty members (after direct observation of learner performance),the nursing staff and the patients in care also assess the learners.<sup>52</sup>

Blinded Patient Encounters (BPE)can be incorporated in everyday undergraduate bedside teaching. In a bedside small-group session, the facilitator entrusts one of the learners to perform a task on a patient who is unknown or blinded to them, under direct observation. Tasks could be very specific like a focused interview on abnormal perceptual experiences or MSE stressing on

general appearance and behavior. Based on the clinical findings, the learner makes a diagnosis and/or differential diagnoses. After the presentation, the facilitator demonstrates relevant clinical findings, discusses the management of the patient's condition and provides feedback on learner performance.<sup>53</sup>

Portfolio is collections of systematic, selected, purposeful and organized learner work displaying the documentation and progression of their learning along with their reflections of learning experiences. Suitable for the assessment of combined domains, it is considered as one of the most popular and useful methods. A portfolio links the learning objectives with clinical experiences that are recorded in a standardized manner to facilitate the learning, teaching, and assessment. The developmental portfolio is formative and is used throughout the course and helps in learning progress assessment. The showcase portfolio is summative, is used at the end of the course and displays the learner's work samples and final level of performance.<sup>55</sup> Achievement of learning throughout the course can be documented by including the project reports, selected learner assignments, pictures and audio video recordings of the academic activities, details of cases and practical procedures undertaken by the learner, clinical tutor reports, narratives of patient encounters that evoked ethical dilemmas, the reflective diary/writings, self-directed learning plans, a list of attained skills, evidence of communication skills and assessment results. <sup>56,57</sup> Despite its many advantages, the significant effort which is required both in compilation and evaluation of the portfolio makes it a less feasible tool.<sup>59</sup>

Assessment Tool	Level Assessed	
SAQs	Knows	
MCQs	Knows,Knows how	
EAQs	Knows, Knows how	
SCT	Knows, Knows how	
Viva-voce	Knows how	
Long case	Shows how	
OSLER	Shows how	
OSCE	Shows how	
PMEX	Shows how, Does	
CSR/CBD	Does	
Mini-CEX	Does	
DOPS	Does	
MSF	Does	
Portfolio	Does	
BPE	Does	
M-PAT	Does	
CEC	Does	

Table 3. Miller's levels assessed b	y various assessment tools
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#### Feedback

Feedback is an invaluable tool for the learners for professional development.<sup>61</sup> A timely feedback synchronized with the learning stage can help the learner to rectify the flaws in the learning process. The feedback if included in the blueprint of formative assessments is expected to be conducted systematically and effectively.<sup>61</sup> Feedback requires direct observation of academic performance. It is useful to pick up those with learning difficulties and borderline performance. Tools that demand multiple encounters help to identify learners' issues and customize effective feedback. Proper utilization of effective assessment tools is mandatory for fruitful feedback that ensures acquisition of competencies. The tools like CWS, CEC, m-CEX, CSR/CBD are more suitable for developmental feedback as their built-in characteristics include direct observation, multipleassessors and assessment opportunities and high specificity.Recent research supports the use of artificial intelligence (AI) due to its ability to provide individualized feedback which helps to enhance learning.<sup>62</sup>

# ASSESSMENT OF COGNITIVE, PSYCHOMOTOR AND AFFECTIVE DOMAINS

Though the separation of clinical competence from one domain to another is artificial, the exploration of the assessment of individual domains are done here for ease of understanding.

#### **Cognitive Domain**

Analysis, synthesis and evaluation skills and their assessment are of utmost importance during the undergraduate medical education. The cognitive categories range from remembering information, understanding its meaning, using the concepts to combine the learned information to create a meaning for suitable application etc.<sup>14</sup> Use of tools that stimulate higher order diagnostic thinking and application of knowledge, evaluating the learner's ability to integrate, synthesize, and judge medical information is essential for the assessment of cognitive domain.Recall questions assess learners' knowledge of definitions or isolated facts while application questions test the ability to reach a conclusion, make predictions, or select a course of action.<sup>63</sup>

	Cognitive Domain (Knowledge)				
Lev el	Proficiency Level	Observable Behavior		Learner able to	Tools
К	Knowledge		Remembering information	Define Hallucinations	SAQ Viva
К	Comprehen sion	Recall	Understanding of meaning	Given a set of examples, able to interpret and categorize first, second and third person Auditory Hallucinations.	MCQ, Viva Bedside Demonstration
КН	Application		Use of concept	How to modify antipsychotic treatment if the patient develops extrapyramidal side effects?	MEQ REQ MCQ Viva SAQ
КН	Analysis	Interpretation	Deconstruction of concept	Recognition of personal, socioeconomic or cultural factors while selecting an antipsychotic.	MEQ MCQ
SH	Synthesis		Combines information to create meaning	Writing a customized and rational antipsychotic prescription	REQ
D	Evaluation	Problem Solving	Judgment of concept	Outlining the prognosis for a patient with first episode psychosis	EPA

Table 4.Assessment of Cognitive Domain

#### **Psychomotor Domain**

The psychomotor domain includes coordination, physical movement and use of the motor skill areas. Practice is required for the development of these skills and achieving their measure in terms of precision, speed, distance, procedures or techniques in execution.<sup>14</sup> A range of methods exist for assessment of psychomotor domain. The effective learner assessment program will include a variety of procedures.Informal observation is a direct observation technique done when learners utilize the skills taught in the class to evaluate the work that was produced using the skills taught.Classroom achievement tests like MCQs, EMQs, SAQ and focused essays are useful.<sup>64</sup> Performance assessment involves ongoing performance skills observation and use of anecdotal records and using checklist, rating scale or holistic scoring.Thus,the observation is directed towards the most important elements of the performance and provides useful information concerning learner achievement.<sup>64</sup> Portfolios and clinical simulations provide greater realism in the psychomotor domain. Both standardized patient simulations and computer simulations are widely used to assess clinical skills and medical problem solving.

	Psychomotor Domain (Skills)				
Lev el	Proficiency Level	Observable Behaviors	The learner will	Tools	
К	Perception	Sensory guiding of a psychomotor action	Observe the steps of Cognitive Function Assessment (CFA)		
КН	Set	Feeling ready to act	Acquire a state of mental, physical and emotional readiness to initiate the steps of doing CFA	1.MCQ,Viva,SA Q 2.Practical clinical postings 3.OSCE	
SH	Guided Response	Performs as demonstrated	Perform CFA under supervision		
S	Mechanism	Performance of simple acts	Perform CFA independently in the hospital set up	<ul><li>4.OSPE</li><li>5.DOPS</li><li>6.Simulated patients &amp; patient</li></ul>	
S	Complex Overt Response	Skillful performance of complex acts	Automatically perform effective CFA on a patient while directing a staff on ensuring the safety of the patient.	interviews 7.Video- recording & Reviewing 8.BPE 9.CEC	
S	Adaptation	Modifying actions to meet special problems	Perform CFA on a postoperative patient with pain	10.CBD	
S	Origination	Creating situation specific actions	Modify CFA protocol to make it more effective in an uncooperative patient.		

Table 6.Assessment of the Affective Domain

#### **Affective Domain**

The affective domain describes the learning objectives that address feeling, emotion, values and the degree of acceptance or rejection. Attitude, motivation and self-efficacy are the three parameters of the affective domain. Attitude consists of cognition, affects, behavioral intentions and evaluation. Motivation indicates initiation, direction, and human behavior persistence. It also includes the engaging reasons in special behaviors like the basic needs, object, goal, and the desirable ideal. The personal perception for the ability of performance in a particular manner is called self-efficacy.64 Translating these behavioral objectives into well defined, quantifiable and observable behaviors makes the assessment of affective domain a difficult one. Assessment also demands many tools that assess attitudes, interests, motivations, and self-efficacy. These tools include self-reports, rating scales, semantic differential scales, Thurstone scale, and checklist.

	Affective Domain (Attitudes)				
Level	Proficiency Level	Observable Behaviors	The learner will	Tools	
К	Receiving	Passively paying attention Accept,Attend,Recognize	Show awareness of the anxiety of a patient with Social Phobia	1.Observation 2.Self-reports/ Reflections	
КН	Responding	Discuss, complete, examine. Actively learning and reacting	Reassure an anxious patient	<ul><li>3.Group discussions</li><li>4.Rating scales</li><li>5.Checklists</li></ul>	
КН	Valuing	Accept, seek, defend. Attaching worth to information	Realize that it is worth spending time reassuring patients when they are symptomatic.	6.Questionnaires 7.Log books 8.Thurstone scale	
SH	Organizing	Discriminate, organize, systematize. Rearrangement of value system	Form judgements about the responsibility of the health care team for the commitment towards the emotional well being of patients	9.Semantic differential scales 10.OSCE 11.P-MEX 12.MSF 13.CWS	
S	Characterizi ng	Verify, Internalize. Incorporates value into life	Act consistently in accordance with the values the individual has internalized	14.CEC 15.BPE	

#### **Table 6.Assessment of the Affective Domain**

#### ASSESSMENT OF GLOBAL COMPETENCIES

The global competencies are to fulfil the roles of IMG as clinician, communicator, leader/ team member, lifelong learner and professional.Global competencies are assessed along with the clinical competencies.Selection of suitable tools is important in this context.67 Apart from clinical skills, the tools based on rating scales and checklists like m-CEX,OSCE, BPE, SP and DOPS are useful in assessing communication skills, professionalism, and leadership qualities. Useful tools to motivate learners to be life-long learners are SCT and case-based discussion (CBDs) as they stimulate reasoning, higher thinking, and self-directed learning. Feedback of professional behaviors, leadership, and communication is possible using a mini peer assessment tool (mPAT), patient survey (PS) and multi-source feedback (MSF).68

#### COMMUNICATION OF ASSESSMENT OUTCOMES

Communication of the results should be clear, in an easy to explain and understand format and appropriate to the context. The assessment results summarized into totals, percentages, and qualitative data presented in meaningful and self-explanatory tables and charts are good options. It must contain the essential information including identification, evidence of success, and the consequences or outcome of unsatisfactory results. Grading of the result, an indication of learner achievement is essential in feedback and suggestions.69The test score interpretation should depend on the referencing framework. Finally, the revision of the borderline cases should be done by re-examining all achievement evidence.70The assessment feedback is important for all the stakeholders including the educational authority. The assessment results may be used as a method for curriculum evaluation and revision or accreditation or employment. The confidentiality in the reporting of assessment outcome is essential for the credibility of the assessment process.71

#### CONCLUSION

Competency basedassessment is different from the traditional assessments as it stands for the assessment for learning. This ensures and facilitates learning progress. Informalongoing assessments help the facilitators to ensure the level of learning in the classroom or clinical setting itself. In the absence of certifiable competencies, classroom assessment techniques help the assessors to ensure the attainment of all the competencies. Proper planning and preparation are the key factors in CBA which ensure the utility of the assessment by ensuring the use of tools with good validity, reliability and educational impact. Useof multiple assessment opportunities, tools and assessors enhances learning and reduces subjectivity in assessment. Assessment tool box helps in a comprehensive assessment process using effective methods that ensures the learning progress in cognitive psychomotor and affective domains. Developmentalfeedback is also a crucial element of CBA. Proper communication of the assessment results help in assisting learning difficulties by remedial measures.

#### **Take Home Points**

- Both teaching and assessment in CBME has to be aligned with specific learning objectives(SLO).
- CBA operates within the framework of competencies.
- CBA is a continuous and ongoing process with opportunities for providing developmental feedback
- Informal classroom-based assessment helps to identify the level of learning and plan remedial actions.
- Classroom Assessment Tests are informal assessments where the creativity of the assessor engages the learners and ensures the learning progress.
- Individual assessment of knowledge, skills and attitudes do not always ensure competency.
- Context specificity of assessment is crucial
- Proper planning of assessment is mandatory.
- Multiple assessors, multiple tools and multiple assessments improve the validity and reliability of CBA
- Assessment tool box provides general guidance about availability and possible use of a tool and is handy for the assessors to ensure the quality of assessment.
- Competencies, especially those involving psychomotor and affective domains need to be assessed multiple times and in different authentic contexts.
- Direct observation of the learners improves utility of CBA and quality of feedback
- Communication of the results need to be clear and appropriate to the content.

#### **Classroom Assessment Techniques**

Fig 2 Crosswords as CAT for Somatoform Disorder



# Fig.3 Mind Map app for SUD session

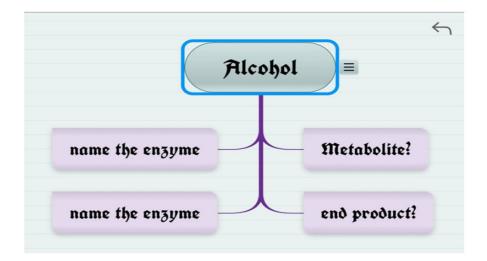


Fig 4 Word finder for Recall of Terminology

#### **Psychotic Disorders**



Fig 5 Word cloud for Recall of Terminology



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**Section II** 

# **Post Graduate Training**

# CHAPTER 7

# PG Psychiatry Training in India and the West: A Comparison

# Abstract

Postgraduate (PG) psychiatry training is crucial in developing proficient psychiatrists equipped to meet evolving mental health needs. This chapter offers a comparative analysis of PG psychiatry training in India and Western countries, highlighting their educational frameworks, strengths, and areas needing improvement. Despite global advancements in psychiatric education, disparities persist, especially in low- and middle-income regions where PG programs are often unavailable. Competency-based Training frameworks are increasingly adopted to enhance residents' skills. However, recruiting candidates for psychiatry remains challenging worldwide, with many residency positions unfilled annually. Understanding and addressing factors influencing medical students' choices to pursue psychiatry is vital for meeting future societal demands. In India, postgraduate psychiatry training is evolving, yet undergraduate exposure to psychiatry remains limited, affecting career choices. The Indian postgraduate training model is regulated by the National Medical Commission, emphasizing theoretical and practical learning. Western regions, such as the USA, Europe, and Canada, offer structured training programs with rotations across various psychiatric subspecialties, emphasizing interdisciplinary collaboration and research. This comparative analysis aims to elucidate current training landscapes and identify potential areas for cross-cultural exchange to enhance educational outcomes and mental health care delivery globally. Insights gained will inform policy, curriculum reforms, and educational practices, fostering continuous improvement and excellence in postgraduate psychiatry training.

# Introduction

In the realm of psychiatric education, the training received during postgraduate (PG) years plays a pivotal role in shaping the competency and expertise of future psychiatrists. This chapter aims to delve into and compare the landscape of PG psychiatry training in India and Western countries. By examining these distinct educational frameworks, we seek to highlight their similarities, differences, strengths, areas for improvement and critical aspects of training. Globally, psychiatry and mental health have often been underemphasized in numerous countries, especially affecting psychiatrist training in low- and middle-income countrieswhere postgraduate programs are

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frequently unavailable. Competency-based training frameworks are increasingly being incorporated into postgraduate medical education worldwide, with new methods being introduced to assess PG-trainee'sskills. Recruiting candidates for psychiatry residency positions continues to be a challenge globally, with many positions going unfilled in national residency matching programs or through the national entrance exams annually. Considering the projected societal demand, residency training programs, medical schools, and health service planners need to better understand and address the factors influencing medical students' choices to pursue psychiatry residency training and the quality of PG training. A comprehensive postgraduate education in psychiatry should offer an integrated approach, encompassing psychotherapy, pharmacotherapy, neuroscience, and other pertinent disciplines. Enhancing postgraduate psychiatry training globally should be guided by intensified research on training content, teaching methods, and resident assessment. (1,2)

#### Importance of Postgraduate Training in Psychiatry

Postgraduate training in psychiatry (aka psychiatry residency training) serves as the bedrock upon which competent psychiatric practice is built. It not only equips trainees with clinical knowledge and skills but also fosters the development of critical thinking, empathy, and professionalismqualities essential for providing effective mental healthcare. The significance of robust PG training cannot be overstated, as it directly influences the quality of patient care, preparesfuture psychiatry teachers, contributes to advancements in psychiatric research, and shapes the discipline's future.

In today's global landscape, the role of psychiatrists is evolving. The field of psychiatry encompasses a vast range of topics, from the study of biological psychiatry (e.g., neurotransmitters, genetics) to socio-cultural psychiatry (addressing societal challenges like self-harm and psycho-political issues). Psychiatrists are increasingly called upon to plan, coordinate, and lead various mental health initiatives. To effectively fulfil these roles, they must possess courage, vision, innovation, a positive outlook, conviction, social concern, and strong leadership skills. Empowering psychiatrists is crucial for the advancement of psychiatry, underscoring the importance of high-quality psychiatric training.(3)

In India, Psychiatry training unless specified implies postgraduate training, as undergraduate exposure and training in most medical colleges of India is still struggling and has a long way to go. A few undergraduates choose psychiatry as a career, primarily due to negative experiences during their undergraduate education or limited psychiatry exposure as latter is not a major subject in the UG curriculum. To enhance postgraduate psychiatry training, attracting motivated and interested students to these programs is crucial. In a nation of a billion where the mental health burden is constantly on the rise and the treatment gap is as high as 90%, PG psychiatry training becomes particularly pertinent as they are the future backbone to bear the brunt of this burden.(4) Contrasting this with Western models (European national, NorthAmerica) allows for a comprehensive examination of evolving psychiatric practices and technologies.(5,6)

This comparative analysis seeks not only to elucidate the current state of PG psychiatry training but also to identify potential areas where cross-cultural exchange and adaptation could enhance educational outcomes and, ultimately, mental health care delivery globally. By exploring

these dynamics, we aim to contribute insights that can inform policies, curriculum reforms, educational practices, and research in crucial areas, including educational research, in both Indian and Western contexts.(7)

In the subsequent sections, we will discover the specific components of PG psychiatry training in India and Western countries, examining educational frameworks, clinical rotations, research opportunities, and the overall learning experiences afforded to trainees. Through this exploration, we aspire to provide a comprehensive understanding that fosters continuous improvement and excellence in postgraduate training in psychiatry.

#### **Evolution of Postgraduate Psychiatry Education**

Medical education has ancient roots, believed to have started in Egyptian temples and further developed in ancient Greek and Arabic medicine. Systematic teaching began in the Middle Ages at Salerno and expanded during the Renaissance. However, psychiatric education for medical students emerged much later. Sir Aubrey Lewis notes that formal psychiatric education in Britain began around 1753 when St. Luke's Hospital in London permitted William Battie to teach pupils, although this permission was later revoked. By the mid-19th century, Alexander Morison in Edinburgh and John Connolly at Hanwell had also initiated teaching programs. In 1848, Bethlehem Hospital began regular courses in psychiatry. The first designated chair of psychiatry was established by Heinroth in Leipzig in 1811. In America, Benjamin Rush's 1821 publication "Medical Inquiries and Observations Upon the Diseases of the Mind" marked the beginning of formal American psychiatric education. Generally, psychiatry received little attention in medical lectures.

It wasn't until 1881 that the first post-graduate school was founded at New York Polyclinic. These schools provided education primarily through outpatient departments of affiliated hospitals, but systematic teaching in psychiatry was not yet established. There was widespread indifference to mental disorders in most Western medical schools until the late 19th century; however, when more textbooks on psychiatry were published it fostered greater interest in the field. In the 1900s, psychiatry training in the West underwent profound transformation. Initially a marginalized specialty, psychiatry became professionalized with the establishment of key organizations like the American Psychiatric Association (APA) and the Royal College of Psychiatrists (RCPsych), solidifying standards for training and certification. Treaty of Rome in 1957 formed the European Economic Community (EEC), enabling the free movement of goods, services, capital, and people among member states. Professional qualification recognition became mandatory in 1975, which standardized basic medical training to a minimum of 6 years across the EEC. The Union Européenne de Médecins Spécialistes (UEMS), founded in 1958, aimed to ensure highstandards of medical specialist training and practice across Europe. Their Charter on Training of Medical Specialists (1993) outlined comprehensive requirements for specialist training. Despite their efforts, challenges like the advisory nature of UEMS guidelines, resource limitations, and varied mental health services across Europe persisted, impacting uniformity in training guality and assessment methods. Over the decades, psychiatry integrated into mainstream medical education, emphasizing evidencebased practice and benefiting from advances in neuroscience and psychopharmacology. Specialization flourished, with disciplines such as child and adolescent psychiatry and forensic psychiatry emerging. Collaboration across medical and scientific disciplines enriched training,

ensuring psychiatrists were well-equipped to address complex mental health challenges globally. This evolution reflects a shift towards comprehensive, interdisciplinary approaches to mental health care, supported by international standardization of training practices. (8-13)

India had a fascinating development of psychiatry as a discipline and postgraduate training. Since 1941, when the first postgraduate (M.D.) Psychiatry course started in Patna, there has been substantial growth in psychiatric education. The Indian Psychiatric Society (IPS), founded in January 1947, established a committee on Postgraduate Psychiatry Education the same year. This initiative led to the founding of the All-India Institute of Mental Health (AIIMH) in Bangalore in 1954, currently known as the National Institute of Mental Health and Neurosciences (NIMHANS) and has become a pioneer in the field of postgraduate psychiatry training in India.PG training came under the regulation of the then Medical Council of India (MCI, now the National Medical Commission [NMC]) in 1956.

Initially, from 1947 to 1967, only six institutes offered Doctor of Medicine (M.D.) Psychiatry degrees, producing approximately 14 psychiatrists yearly. However, by the end of the first decade of the millennium, over 100 medical institutions had started to offer postgraduate training in psychiatry, marking significant progress. This represents a significant advancement compared to the past. This has been possible through the NMC, the regulatory medical education body in India, which has made notable changes to psychiatry training, such as reducing the required beds for department establishment, shortening the faculty experience needed to teach, and expanding student intake per teacher in addition to conversion of existing mental hospital setups to postgraduate training institute. However, despite these reforms, implementation often remains superficial in many institutions, driven more by the need to maintain NMC approval than by creating effective training environments. Postgraduate psychiatry education in India has evolved significantly from its nascent stages. Initially, training programs were limited, focusing on basic clinical skills and institutional care. Over time, the curriculum expanded to encompass a broader spectrum of psychiatric disorders, therapeutic modalities, and research methodologies. The introduction of structured residency programs and formal examinations by medical councils aimed to standardize training across institutions and ensure quality education. Over the past few decades, psychiatry in India has undergone notable sub-specialization and growth, paralleling developments in other medical specialties.(7,14-16)

A factor to be considered is that the post-graduate psychiatry degree courses are unevenly distributed across India, potentially contributing to the unequal distribution and development of mental health professionals nationwide. (17)Currently, postgraduate training is provided as an MD degree course by around 331 institutes with a total of about 1293 seats annually, 13 institutions offer Diploma in psychiatry (DPM) with 31 seats annually and 26 Diplomat in National Board (DNB) seats are offered by National Board of Examination(NBE) accredited hospitals.(18,19)

The historical contexts and evolution of postgraduate psychiatry education in India and the West illustrate both unique trajectories and shared developments. Understanding these histories provides insights into the foundations upon which current training programs are built while also highlighting opportunities for mutual learning and improvement in global mental health education.

# Structure of training, assessment and certification of Postgraduates in Psychiatry

The structure of postgraduate training in psychiatry is designed to provide comprehensive education and practical experience to medical graduates aspiring to specialize in mental health. This training encompasses a combination of theoretical coursework, clinical rotations, and research opportunities tailored to develop a robust understanding of psychiatric principles and practices. Typically lasting between three to six years, depending on the country, the training program aims to equip residents with the skills necessary to diagnose and manage a wide range of mental health disorders. The curriculum usually includes exposure to various subspecialties within psychiatry, such as child and adolescent psychiatry, geriatric psychiatry, addiction psychiatry, community psychiatry, and forensic psychiatry, ensuring a well-rounded expertise. Additionally, the training emphasizes the development of competencies in psychotherapy, psychopharmacology, and interdisciplinary collaboration (including neurology), preparing future psychiatrists to provide holistic and effective care in diverse clinical settings.

Postgraduate training of psychiatry in India requires candidates to fulfil specific eligibility criteria. This includes graduation from a recognized medical college accredited by the NMC, completion of a one-year compulsory rotating internship at an NMC-recognized teaching institution (including a rotation in psychiatry of 2 weeks duration), and permanent registration with the State Medical Council. Admission to MD, DNB, or DPM courses is based on merit in a national-level entrance exam (National Eligibility cum Entrance Test-PG[NEET-PG] or Institute of National Importance Combined Entrance Test [INI-CET]) conducted by respective regulating bodies. Training programs in India typically span three years for MD in Psychiatry or DNB and two years for DPM. These programs are structured to provide a comprehensive education in psychiatry, encompassing coursework, clinical rotations, and research. The curriculum, overseen by the Post Graduate Medical Education Board (PGMEB) under NMC, ensures exposure to various psychiatric subspecialties such as adult psychiatry, child and adolescent psychiatry, geriatric psychiatry, and addiction medicine.

Teaching methodologies in MD Psychiatry training emphasize interactive and practical learning approaches over traditional lectures. Small group discussions, seminars, journal clubs, caseconferences, bed-site teaching, and clinical demonstrations are prioritized for theoretical knowledge and clinical skills development. However, there are challenges, including disparities in teaching standards and a shift towards pharmacological treatments over holistic approaches (including psycho-social interventions). There is a recognized need to enhance the curriculum with greater inclusion of community psychiatry, forensic psychiatry, rehabilitation psychiatry, and consultation-liaison practices. Assessment during MD training is continuous and comprehensive, evaluating competencies essential for effective psychiatric practice. Formative assessments cover medical knowledge, patient care, procedural skills, professionalism, and more. Summative assessment includes a thesis submission, written exams (covering basic sciences, clinical psychiatry, specialities, and recent advances) and clinical/practical exams and oral/viva voce examinations. These assessments ensure a thorough evaluation of candidates' readiness for professional practice in psychiatry. The certification process involves passing written and clinical exams conducted by universities associated with medical colleges governed

by the National Board of Examinations (NBE). Successful completion leads to MD or DNB certification, acknowledging proficiency in psychiatric practice according to national standards. However, in India still, Entrustable professional activities (EPAs)-based certification, unlike West, is not in practice. In the United States, psychiatry residency programs typically span four years, integrating both general medical training and specialized psychiatric education. Oversight is provided by the American Board of Psychiatry and Neurology (ABPN) and the Accreditation Council for Graduate Medical Education (ACGME). Clinical rotations encompass a broad spectrum, including adult psychiatry, with opportunities for various specialization areas. The curriculum is competency-based, focusing on core competencies such as Patient Care, Medical Knowledge, Practice-Based Learning and Improvement, Interpersonal and Communication Skills, Professionalism, and System-Based Practice. Residents are required to complete rotations in primary care (4 months), neurology (2 months), adult inpatient psychiatry (6 months), continuous adult outpatient psychiatry (12 months), child and adolescent psychiatry (2 months), consultationliaison psychiatry (2 months), geriatric psychiatry (1 month), addiction psychiatry (1 month), and elective rotations during the fourth year. Many programs also emphasize research and publication requirements, and residents may participate in Quality Assessment and Improvement projects. There are also provisions of research tracks during the PG to hone the research skills of the residents and create a pool of interested clinician-researchers.(20)

Assessment methods include evaluations after each rotation (often using a 360-degree approach), patient logs, annual Psychiatry Resident In-Training Examination, Clinical Skills Verification exams, psychotherapy assessments, and the ABPN certification examination. ABPN certification is divided into two parts: Part I involves written examinations, while Part II assesses clinical skills. Thus, the postgraduate training program in the USA is integrative, with a strong emphasis on supervised clinical training. It offers options for elective rotations and includes small-group teaching sessions. The curriculum also features summer courses and research opportunities, for which credits are awarded. Additionally, the program includes enrichment activities to further enhance learning and professional development. (21-24)

In the United Kingdom, psychiatry residency training is overseen by the Postgraduate Medical Education and Training Board (PMETB) and the Royal College of Psychiatrists (RCP). The program spans 6 years, comprising a structured sequence: a three-year core psychiatry training program (CT1-CT3) followed by three years of higher specialty training (ST4-ST6). Specialization options within psychiatry include general adult psychiatry, with subspecialties such as liaison psychiatry, substance misuse, rehabilitation, learning disability, psychotherapy, child and adolescent psychiatry (CAP), forensic psychiatry, and geriatric psychiatry. Core competencies emphasized throughout training encompass medical expertise, effective communication, collaborative teamwork, managerial skills, advocacy for health, scholarly inquiry, and professional ethics. Psychotherapy training is structured around five essential components: development of interviewing skills, formulation of psychotherapeutic approaches, training involving a minimum of three short cases and one long-term individual case, and practical experience in group or family therapy settings. During the first three years (CT1-3) of psychiatric training, residents gain a minimum of 12 months' experience in general adult psychiatry, supplemented by exposure to CAP, old-age psychiatry, and psychotherapy. Trainees subsequently select their subspecialty area (ST4-6), culminating in the award of a certificate of completion of training. Research activities

include a focus on clinical audits (such as Quality Assurance/Quality Improvement initiatives), case reports, or small-scale literature reviews within the Core Psychiatry Training framework. Evaluation of training progress includes Workplace-Based Assessments (WPBA) and Annual Review of Competence Progression (ARCP), complemented by weekly Clinical Case-Based Discussion Groups (CBDG) in the initial year. Psychotherapy skills are evaluated using the Supervisor Assessment of Psychotherapy Endpoints (SAPE), with additional requirements for case reports or literature reviews during Core Psychiatry training. Original research is mandatory during years 4-6, in preparation for the Member of the Royal College of Psychiatrists (MRCPsych) examinations, which consist of three written papers and the Clinical Assessment of Skills and Competencies (CASC) examination as prerequisites for certification.(25)

The Psychiatry Training Program in Canada mandates a minimum of 60 months of approved residency training. This includes PGY1/Basic Clinical Training (12 months), which involves diverse medical experiences relevant to Psychiatry, covering core elements in Medicine, Paediatrics, Family Medicine, Neurology, Emergency Medicine, and Psychiatry. It comprises 13 four-week blocks, with 7-9 blocks in core training (including Internal Medicine, Family Medicine, Paediatrics, Neurology, neuroimaging, and Emergency Medicine), 2-4 blocks of selective training (from fields like Geriatric Medicine, Obstetrics and Gynaecology, General Surgery, etc.), and 1 block of elective training. In PGY2 and PGY3 (24 months), the focus is on foundational training across various practice settings, including general adult Psychiatry (12 months), psychiatric care for children and adolescents (6 months), and psychiatric care for the elderly (6 months). These rotations occur in accredited hospital-based and ambulatory care settings. In the last twoyears PGY4 and PGY5, residents assume leadership roles and further specialize through electives and selectives. Training includes 12 months of providing complex adult patient care, including consultation and liaison psychiatry, collaborative/shared care, and severe mental illness treatment.

Additionally, 6 months of selectives in Psychiatry and 6 months of electives in relevant areas of psychiatric practice are required. There is Concurrent and Longitudinal Training where residents must engage in mandatory horizontal rotations, including training in empirically supported psychotherapeutic approaches for at least 32 weeks during PGY2-5 and supervised experience in treating patients with addictions. Optional longitudinal components may include research, education, and administration. Mandatory training in cognitive, psychodynamic, group, and family therapies is provided, with additional skill-building sessions supervised by psychiatrists and psychologists. Residents are expected to complete at least one Quality Assurance/Quality Improvement or research project during residency.Evaluation of training includes the In-Training Evaluation Report (ITER) and Final In-Training Evaluation Report (FITER), annual oral examinations, and Psychotherapy evaluation. The Royal College of Physicians and Surgeons (RCPSC) certification examination consists of written and oral (OSCE) components, culminating in the certification award. The certification in Psychiatry necessitates successfully completing the 5-year accredited program, participating in a scholarly project, and passing the certification examination. Additional training may be required to ensure clinical competence.(26,27)

European Union of Medical Specialties (UEMS) oversees a 5-year psychiatry training program, including specialized tracks in old age psychiatry, psychiatric aspects of substance misuse, developmental psychiatry (CAP, learning difficulties, and mental handicap), and forensic psychiatry. The curriculum allows for up to oneyear of flexible training, such as research or other approved

subjects designated by the training supervisor. Core competencies emphasized in the program include medical expertise/clinical decision-making, effective communication, collaboration, management, advocacy for health, scholarly inquiry, and professionalism. Training encompasses systematic, cognitive, and psychodynamic approaches, with exposure to family, couples, and group therapies. The training also places emphasis on planning research or audit projects. Evaluation of trainee progress is conducted annually through clinical assessments, theory evaluations, training logbooks, and culminates in a final assessment typically in the form of a written report. UEMS guidelines recommend that national requirements for psychiatry training align with the standards set by the UEMS Board of Psychiatry.(13,28)

The Fellowship Training Program is an in-depth postgraduate course for doctors aspiring to become consultant psychiatrists, entitling psychiatric practice inAustralia or New Zealand once completed. The program, which lasts a minimum of 60 months full-time equivalent (FTE), includes working as a registrar with guidance from experienced psychiatrists. Eligibility requirements include holding a medical degree, completing two years of general medical training (changing to 24 months of prevocational training from 2025), and maintaining current general registration as a medical practitioner in Australia or Aotearoa New Zealand. The training is divided into three stages-Stage 1 (12 months FTE), Stage 2 (24 months FTE), and Stage 3 (24 months FTE)-with an option to earn a Certificate of Advanced Training in the final stage. Assessments throughout the program consist of various exams and evaluations, and trainees must also enrol in a formal education course approved by the College. Core training encompasses adult psychiatry, including a six-month acute setting rotation, consultation-liaison psychiatry (CL), child and adolescent psychiatry (CAP), addiction psychiatry, old age psychiatry, forensic psychiatry, indigenous psychiatry, and rural psychiatry. Specialist training, which spans two years, allows trainees to focus on areas such as addiction psychiatry, CAP, old age psychiatry, forensic psychiatry, research/academic psychiatry, CL psychiatry, and psychotherapies, with specific provisions for indigenous and rural settings as stipulated by the board. By the end of the program, trainees will have developed the competencies required of a psychiatrist. Throughout the program, trainees develop core competencies including medical expertise, communication, collaboration, management, health advocacy, scholarship, and professionalism. Assessment involves summative assessments which include the Multiple Choice Question Exam (MCQ), the Critical Essay Question Exam (CEQ), the Modified Essay Question Exam (MEQ), and the Clinical Competency Assessment - Modified Portfolio Review, a clinical competency review, a psychotherapy written case, and a scholarly project, all recorded in the In Train online platform of the RANZCP. Regular workplace-based assessments (WBAs) provide feedback and guide future learning, while intraining assessments (ITAs) monitor progress and attainment of EPAs. Additionally, trainees must complete mandatory e-learning modules from Learnit, the RANZCP's e-learning platform, ensuring comprehensive training and competency development. Successful completion leads to fellowship certification by the RANZCP, granting the title of Fellow of the Royal Australian and New Zealand College of Psychiatrists.(29)

# Strengths and Weaknesses of Psychiatry Training Programs: India & Western Perspectives

Table 1: Showing the country-wise strengths and weaknesses of Psychiatry PG-training program

Coun try	Strengths	Weaknesses
India	<ul> <li>Comprehensive Exposure,</li> <li>Interactive Learning,</li> <li>Mandatory research work,</li> <li>National Standardization</li> </ul>	<ul> <li>Disparities in Teaching Standards,</li> <li>Pharmacological Bias,</li> <li>UG exposure- Practically quite under translated exposure to psychiatry at the undergraduate level,</li> <li>Teacher training – Minimal teaching training facilitation of teachers prior to initiation of PG teaching,</li> <li>Lack of EPAs or objective structured workplace-based assessments</li> </ul>
United States	<ul> <li>Competency- Based Curriculum,</li> <li>Research Opportunities,</li> <li>Structured Assessments</li> </ul>	<ul> <li>High Costs,</li> <li>Competitive Entry,</li> <li>Stress and Burnout</li> </ul>
United Kingdom	<ul> <li>Structured Training Pathway,</li> <li>Diverse Specializations,</li> <li>Regular Assessments</li> </ul>	<ul> <li>Length of Training is much more</li> <li>Entry into psychiatry is becoming increasingly competitive,</li> <li>Variation in Quality,</li> <li>There are too stringent norms for international graduates to pursue training</li> </ul>
Canada	• Broad Clinical Training, Leadership Development, Mandatory Psychotherapy Training	<ul> <li>Workload,</li> <li>Limited opportunities and support for substantial research during residency,</li> <li>Insufficient interprofessional training with other healthcare providers,</li> <li>Restrictions in elective options may limit specialization opportunities</li> </ul>
European	• Standardization,	Advisory Nature,

Union	<ul> <li>Flexible Training,</li> <li>Core Competencies</li> </ul>	<ul><li>Diverse Mental Health Systems,</li><li>Resource Limitations</li></ul>
Australia/N ew Zealand	<ul> <li>Comprehensive Competency Development,</li> <li>Flexible Specialization,</li> <li>Continuous Feedback</li> </ul>	<ul> <li>Demanding Entry Requirements,</li> <li>Resource Allocation,</li> <li>Assessment Intensity</li> </ul>

# Career Pathways and Specializations in Psychiatry

Psychiatry offers a wide range of career pathways and specializations, allowing professionals to focus on various aspects of mental health care. Here are some of the primary career pathways and specializations within the field of psychiatry:

# 1. General Adult Psychiatry

- Role: Diagnose and treat a broad range of mental health disorders in adults.
- Setting: Hospitals, outpatient clinics, private practices, community mental health centres
- Focus: Mood disorders, anxiety disorders, psychotic disorders, personality disorders, substance-use disorders, neuromodulation facilities, and other general mental health conditions.

# 2. Child and Adolescent Psychiatry

- **Role:** Specialize in the diagnosis and treatment of mental health issues in children and adolescents.
- **Setting:** Schools, paediatric hospitals, outpatient clinics, community centres, rehabilitationcentres.
- Focus: Neuro-developmental disorders, behavioural issues, mood disorders, anxiety disorders, and family therapy.

# 3. Geriatric Psychiatry

- Role: Focus on mental health care for elderly patients.
- Setting: Nursing homes, geriatric clinics, rehabilitation centres, hospitals, private practices.
- Focus: Dementiaand other neuro-psychiatric conditions, depression, anxiety, and other mental health issues prevalent in older adults.

# 4. Forensic Psychiatry

- Role: Work at the intersection of mental health and the law.
- Setting: Prisons, courts, forensic hospitals, private practices.

• **Focus:** Criminal responsibility evaluations, competency to stand trial assessments, expert witness testimony, treatment of offenders.

# 5. Addiction Psychiatry

- Role: Treat patients with substance use disorders and related mental health issues.
- Setting: Rehabilitation centres, community-addiction treatment facilities, hospitals, outpatient clinics, private practices.
- Focus: Alcohol and other drug addiction, behavioural addictions, dual diagnosis.

# 6. Consultation-Liaison Psychiatry (Psychosomatic Medicine)

- Role: Provide psychiatric consultation to patients in medical and surgical settings.
- Setting: General hospitals, specialty hospitals, outpatient clinics.
- **Focus:** Psychiatric aspects of medical conditions, comorbid psychiatric and medical disorders, psychosomatic symptoms.

# 7. Psychotherapy

- Role: Specialize in therapeutic modalities to treat mental health issues.
- Setting: Private practices, outpatient clinics, hospitals.
- **Focus:** Psychodynamic therapy, cognitive-behavioural therapy (CBT), dialectical behaviour therapy (DBT), family therapy, and group therapy.

# 8. Neuropsychiatry

- Role: Focus on the interface between psychiatry and neurology.
- **Setting:** Neurology departments, neuro-psychiatric clinics, hospitals, private practices, neuromodulation facilities.
- **Focus:** Brain-behavior relationships, neurodegenerative diseases, epilepsy, traumatic brain injuries, neuropsychiatric symptoms of neurological disorders, psychosurgeries.

# 9. Emergency Psychiatry

- Role: Provide immediate care to patients experiencing acute psychiatric crises.
- Setting: Emergency departments, crisis intervention centres, psychiatric hospitals.
- Focus: Acute psychosis, severe depression, suicidal ideation, psychiatric emergencies.

# **10. Research and Academic Psychiatry**

- Role: Conduct research and teach in academic settings.
- Setting: Universities, research institutions, teaching hospitals, private-coaching institutions.
- Focus: Clinical research, psychopharmacology, mental health policy, education and training of future psychiatrists.

# **11. Community Psychiatry**

• Role: Focus on the mental health needs of specific populations within the community.

- · Setting: Community mental health centres, public health agencies, non-profit organizations
- **Focus:** Preventive care, public mental health initiatives, mental-health related policies & legislations, persons with disabilities, underserved populations.

# 12. Rehabilitation Psychiatry

- **Role:** Specialize in the rehabilitation and recovery of individuals with severe and persistent mental illnesses.
- Setting: Rehabilitation centres, community-based rehabilitation programs, psychiatric hospitals.
- Focus: Long-term treatment planning, vocational rehabilitation, skills training, community integration, and improving quality of life for individuals with chronic mental health conditions.

Psychiatry offers diverse career pathways and specializations, each with unique roles, settings, and focuses. Whether working with children, the elderly, forensic populations, or individuals with addictions, psychiatrists have the opportunity to make significant impacts on various aspects of mental health care. As the field continues to evolve, the need for specialized training and a deep understanding of diverse patient populations remains paramount, including leadership skills, research acumen, ensuring that psychiatric professionals are well-equipped to address the complex mental health needs of society.

# Conclusion

The comparison of postgraduate psychiatry training programs across India and the west highlights several key differences and similarities.

# Differences:

- Duration: Training programs range from6 years (UK) to 3 years in India for professional Degree courses and even 2 years for diploma (DPM).
- Eligibility: Each country has unique prerequisites, such as national exams (India), foundation training (UK), and specific residency matches (US, Canada).
- Curriculum: Variations exist in the focus areas and subspecialties offered and the duration offered for core training and advanced training, with some countries emphasizing community and rural psychiatry (India, Australia/New Zealand) and others incorporating advanced research components (US, Canada).
- Assessment Methods: Different approaches include continuous evaluations (India), rotational assessments (US), and comprehensive annual reviews (UK).
- Certification: Certification processes and titles vary, with MD/DNB degrees conferred by NBE/ University in India, ABPN certification in the US, MRCPsych in the UK, RCPSC in Canada, and FRANZCP in Australia/New Zealand.

#### Similarities:

- All programs emphasize core competencies such as clinical skills, patient care, communication, and professionalism.
- There is a common goal of ensuring comprehensive exposure to various psychiatric subspecialties.

 Most programs include significant components of psychotherapy training and emphasize research and quality improvement projects.

# Implications for Global Psychiatry Education

The differences in psychiatry training programs have a significant impact on the global practice of psychiatry. Variations in training duration, curriculum, and assessment methods can lead to discrepancies in the knowledge and skills of psychiatrists from different regions. This may affect international collaboration, standardization of psychiatric care, and mobility of professionals across borders. However, the shared core competencies and commitment to high-quality training provide a foundation for establishing global standards in psychiatric education. There is potential for developing universal guidelines and frameworks that accommodate regional differences while maintaining consistency in psychiatric practice globally.

#### **Recommendations for Further Research and Collaboration**

#### 1. Standardization of Training Programs and Quality Assurance:

Research should focus on identifying best practices across different training programs to develop standardized guidelines and quality assurance that can be adapted globally. This would help minimise discrepancies and ensure a uniform competency level among psychiatrists worldwide. The World Health Organization and scientific bodies, both international (e.g., World Psychiatry Association, WPA) and national (Indian Psychiatry Society, APA, RCPsych) can be instrumental in realizing this goal

#### 2. Technology Integration:

Further study is needed on integrating digital tools, telepsychiatry, Artificial intelligence (AI), and robust learning management system (LMS) in training programs to enhance learning and patient care.

#### 3. Interdisciplinary and cross-cultural training:

Research should explore the benefits of interdisciplinary training and cross-cultural competence in psychiatric education. Developing modules that emphasize these aspects can improve the quality of care provided by psychiatrists in diverse settings. Diagnostic and Statistical Manual of Mental Disorders, Fifth Edition (DSM-5) cultural formulation interview in making psychiatry diagnoses is a noteworthy step in this direction; however, it is under practised in most of the countries.

# 4. Enhanced teacher training programs:

Implementing comprehensive training programs for educators can improve teaching methodologies and clinical training effectiveness. This could include workshops, seminars, and continuous professional development courses focused on modern pedagogical approaches and clinical supervision skills. International and national bodies such as the Foundation for Advancement of International Medical Education and Research (FAIMER), WPA-psychiatry education sections, Indian Teachers of Psychiatry (IToP), National Teachers' Training Centre (NTTC), Jawaharlal Institute of Postgraduate Medical Education & Research (JIPMER), etc., can play critical roles in this regard.

# 5. Increased Undergraduate exposure:

Integration of more extensive psychiatry rotations and modules in the undergraduate medical curriculum can foster an early interest in the field. This should involve hands-on clinical experience, interactive learning sessions, and exposure to various psychiatric subspecialties to provide a well-rounded introduction to the discipline. Running various enrichment programs during the UG period to promote psychiatry teaching and igniting an interest in psychiatry can be a valuable step.

# 6. Collaboration Opportunities:

Establishing international platforms for collaboration, such as joint research projects, conferences, and exchange programs (e.g., WPA-exchange program), can facilitate knowledge sharing and innovation in psychiatric education. This would also help in addressing global mental health challenges through a unified approach.

# 7. Evaluation and Feedback Systems:

Further research into effective assessment methods and feedback systems can ensure continuous improvement in training programs. Developing robust evaluation frameworks will help in tracking the progress and competencies of trainees more accurately.

By addressing these areas, the global psychiatric community can work towards enhancing the quality of psychiatric education, ensuring better mental health outcomes, and fostering international collaboration in the field.

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# **CHAPTER 8**

# CBME IN PSYCHIATRY PG TRAINING : THE WAY AHEAD

# ABSTRACT

The National Medical Commission has introduced competency based medical education (CBME) for MD Psychiatry post graduates from the year 2022. Guidelines have been issued so as to have a uniform training for the post graduates in India. Post graduate institutions, across the country are in the process of incorporating the competency-based psychiatry education at the post graduate level. This chapter discusses the implementation of the same, the advantages and the disadvantages of the proposed CBME, and the challenges that are faced by the diverse type of Institutions that offer the MD Psychiatry PG degree course. The last section focuses on the gains achieved so far and the way forward - in achieving a uniform, fair and objective PG training that emphasises on the learner achieving the desired competencies.

# INTRODUCTION

Competency is defined as the ability to do something successfully and effectively. In order to keep up with the Global trends and to make the Indian Medical Graduates function efficiently both nationally and internationally, the National Medical commission (NMC) has adopted competency based medical education(CBME). This introduction of CBME is a landmark in Indian medical education. Though it has adopted the competency-based training for medical education to meet up with the international standards, the moot question is how will this shape the successful future of psychiatry training, both at Undergraduate level and Post graduate level.

There were periodic suggestions and guidelines from time to time to improve the training of our post-graduates(PGs). The last one was the 'Guidelines for Post-Graduate training in Psychiatry in India<sup>2</sup> published by the Indian Psychiatric Society (IPS) in January 2002.<sup>1</sup>The guidelines had suggested a) theoretical knowledge, b) clinical skills, c) ethical considerations and d) research and training as core competencies to be acquired during the course.

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In a large online survey done among 451 Psychiatrists by Grover et al (2018), it was noted that significant differences existed across all aspects of training across different institutions in India.<sup>2</sup>It is hoped that a uniform competency based psychiatric education (CBPE) would help to narrow this difference and produce competent and certified psychiatrists to address the huge mental health treatment gap in India.

#### **DEFINING COMPETENCY**

Different fields have defined competency differently. Epstein and Hundert define competency in the medical field as "The habitual and judicious use of communication, knowledge,technical skills, clinical reasoning, emotions, values and reflection in daily practice for the benefit of the individual and community being served".<sup>3</sup>The two defining features of the CBME are a) its focus on measurable outcomes (specific competencies) and b) its independence of the length of time in training for achieving the same.

In this Chapter we will mainly focus on the Competency Based Medical Education in Post Graduate training in Psychiatry. CBME was introduced earlier to undergraduate studies in 2019. CBME for Post graduate studies was introduced on 5th August, 2022 by the NMC. The NMC has clearly described its guidelines for Competency based postgraduate training programme for MD in Psychiatry. It has given everything in detail starting with a preamble on purpose of PG education, and subject specific learning objectives along with the primary goal of MD course. Subject specific competencies are elaborated under different domains, while the syllabus with course contents, and the teaching and learning methods are detailed along with a clinical posting schedule for 36 months. The assessment types and a list of recommended reading is also given. A postgraduate student's appraisal form is given as an annexure at the end of the guidelines.<sup>4</sup>

#### NEED FOR COMPETENCY BASED MEDICAL EDUCATION (CBME)

CBME has two distinct features: focusing on specific domains of competence and an independence of time in training. It aims for an individualized approach for every student. A student's readiness for unsupervised practice is measured by the competence or competencies that she has achieved irrespective of the time needed to achieve the same. CBME is considered as a means for optimising the preparation of health care professionals. The traditional training assumed time-bound acquisition of skills as primary, whereas CBME is more learner centric.

Looking at the global trends, the CBME is being implemented in many other nations especially in developed ones. The Accreditation Council for Graduate Medical Education (ACGME) of the United States in 2001, laid emphasis on the educational outcomes in terms of competencies that are to be achieved under six domains.<sup>5,6</sup> In the United Kingdom, the General Medical Council(GMC) brought out the details of the competency framework in form of the document 'Tomorrow's Doctors' in 1993. Later, three broad outcomes were specified for medical graduates.<sup>7</sup> Similarly, the Royal College of Physicians and Surgeons of Canada (RCPSC) delineated seven 'roles' of a physician and went on to develop competency framework based on these - the Canadian Medical Education Directions for Specialists (CanMEDS).<sup>8</sup> In Netherlands the National Undergraduate Framework implemented outcome competency-based medical education framework.<sup>9</sup> Similar frameworks exist in Australia and Europe, including the United Kingdom (Tomorrow's Doctor) and Scotland (the Scottish Doctor).<sup>7,10,11</sup>

In India, through the traditional mode of psychiatry training, post graduates underwent a rigorous and rigid curriculum training which was focused on its structure and process. Trainees were expected to learn theoretical and practical aspects of clinical psychiatry in a Guru-Chela like education system. The exposure of learning content and improving skills was considered to be the prerogative of the student. It was hoped that learning from teachers who differed in their clinical approach, teaching skills and interpersonal connectedness, the student would get a rounded and diverse learning experience. The assessment of the student was similarly highly subjective. The application of knowledge, skills and attitude was not assessed in total in the traditional system. The introduction of CBME is hoped to correct these anomalies. The use of specified competences along with progression of increasing independence with learner tailored approach is a paradigm shift.

# TRADITIONAL TRAINING Vs PG CBME

CBME places huge emphasis on performance rather than mere knowledge acquisition. Although competence was the hidden backbone of the traditional training methods, CBME explicitly lays emphasis on observable and measurable performance that are prescribed by it. Traditional methods focus on what the learner must know but the focus of CBME is what the learner can do in a consistently demonstrable manner.

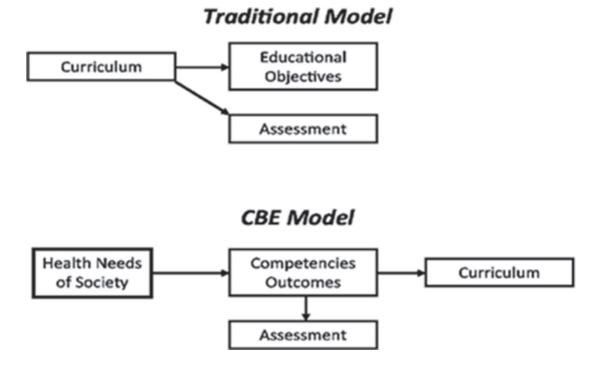


Fig.1: Comparing traditional and competency-based educational models<sup>12</sup>

<b>Table 1</b> : Differences between traditional and competency-based education <sup>13</sup>
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Variable Educational Model	Traditional	Competency-Based
Goal of Educational encounter	Acquisition of knowledge	Application of Knowledge
Responsible for driving the educational process	Teacher	Learner
Responsible for content	Teacher	Student and teacher
Timing of assessment	Emphasis on summative (High stakes final evaluation)	Emphasis on formative (on going feedback facilitating improvement)
Typical assessment tool	Indirect, proxy assessment	Direct assessment with observation of real tasks of profession
Evaluation standards	Relative to peers (norm-referenced)	Relative to objective measures (criterion - referenced)
Program completion	Fixed time	Variable time

# Prevailing challenges in PG Psychiatry Training

- a) Unlike other medical and surgical specialties, there is no continuity in the learning curve in psychiatry. Students taking up PG in, say dermatology or pulmonology, are consolidating what they have learnt in the first year and go on to build competencies upon it. However, it is not the case in psychiatry. The introduction and exposure to psychology and psychopathology is next to nil in the undergraduate training. Hence students enter PG in psychiatry with handicap. Many terminologies and concepts are like Greek and Latin to the first-year PG students.
- b) There is a huge difference in the way a PG in psychiatry gets trained depending on the type of institution that she gets to enter. Training in a standalone Central or State Government Mental Hospital - based Institutions is vastly different from a General Hospital Psychiatry Unit (GHPU).
- c) Basic sciences are not adequately dealt with, as there is very little allotted time. Addition of District Residency Posting (DRP) has further reduced the allotted time.
- d) As much as it is sad to note that the training in Neurology and General Medicine is waning, it is far more disheartening to note that even newer modalities of treatments like transcranial

direct current stimulation (tDCS) and repetitive transcranial magnetic stimulation (rTMS) have not permeated in many of the centres. Hence these competencies are not imparted.

- e) Major focus is on Psychopharmacological management of any and all Psychiatric cases, with very little attention to their psycho-social aspects. The psychotherapy training for PGs has taken a backseat, which is a serious lacuna.
- f) The minimum requirement of teachers in any psychiatry department, as envisaged by NMC is only 3. However, they are expected to serve at outpatient and inpatient duties, teaching and training MBBS students, PGs and paramedical students, engaging in research activities, attending district MHRB, liaison with State and Central Governments, conducting disability camps and awareness programmes etc.
- g) The compensation for the psychiatry teacher is amongst the lowest nationally and internationally.
- h) The training for the psychiatry teaching faculty is also meagre and poorly designed. At the most it is limited to the UG level training given in the respective Medical Education Units.
- The evaluation is often relegated to the teacher's overall impression. Objective and newer methods of student evaluation are being talked about, but without proper infrastructure and financial compensation, it only adds to the burden of the teachers.

# **GUIDELINES FOR CBPG TRAINING PROGRAMME IN PSYCHIATRY**

Unlike the UG CBME, the PG CBME in psychiatry has been presented in broad strokes by the NMC. It is a mere guidance document. The purpose of the document was 'to provide teachers and learners guidelines to achieve defined outcomes through learning and assessment'.

By the end of the training period, the trainee is expected to fulfil about 19 subject specific learning objectives, along with basic knowledge about research and the basic methodology of teaching as well.

The subject specific competencies are divided into three domains - 1) Cognitive domain, 2) Affective domain and 3) Psychomotor skills domain. By the end of the course the student is expected to demonstrate knowledge in about 16 general topics. The affective domain focuses on team work, cooperative attitude, adoption of ethical principles that respect the rights of the patient. The communication skills -verbal, non-verbal and written- are emphasised.

Psychomotor domain addresses the skill aspect of the learner. About 9 procedures are listed that need to be performed under supervision. The student is expected to independently perform 10 procedures by the end of the course. Behaviour therapy, opioid intoxication management, genetic counselling, family therapy are the competencies that need to be performed by the PG under supervision. Interpersonal therapy and management of suicide attempt are two procedures that she should be able to assist the expert.

A detailed syllabus with course content is also given, which includes about 53 theoretical concepts that the student must acquire knowledge in. These come under the 'Must Know' category. A list of 7 'May know' items are also given, which are controversial; items like 'mental health issues in women' and other similar important areas being listed under it being the reason.

Teaching and learning methods to impart knowledge on the above are also enumerated in

detail. This includes, but not limited to, 1) lectures, 2) seminars, 3) case conferences, 4) clinical meetings, 5) psycho-somatic rounds, 6) journal club, 7) case presentations, 8) psychotherapy tutorials, 9) research methodology, 10) teaching skills, 11) CME & conferences participation and presentations, along with 12) extra-mural activities. A break up of the clinical posting rotations is also given, which now also includes the compulsory District Residency Program (DRP).

The assessment of the learner is a dynamic and on-going process in CBME, incorporating its elements. The Formative Assessment (FA) is given due importance. This is done quarterly, taking into account the assessment of medical knowledge, patient care, procedural skills, academic skills, interpersonal skills, professionalism, self-directed learning and ability to cooperate in the system. The Summative Assessment (SA) is at the end of the three years and is the University degree exam. Apart from the regular theory examination (four papers) and clinical/practical and viva voce examination, the thesis submission and evaluation has been made the third part of the examination. As per NMC rules, 5% of practical marks (20 marks) shall be awarded to the candidate, as part of her practical viva voce. The external examiner from outside the state shall evaluate the thesis and take viva on it.

#### Implementation of NMC curriculum

The introduction of CBME into medical education by NMC has both its pros and cons. The introduction of clinical postings of psychiatry in 3rd and 4th year of UG training and the elaboration of the psychiatry training in the final year, and allocation of psychiatry into elective postings have increased the exposure to psychiatry at UG level. This is in keeping with the special enrichment of psychiatry training programs worldwide. This bridges the gaps and lacunae in the exposure to the basics of psychiatry, minimizing the difficulty in identifying and managing psychiatry complaints and cases during their internship.

Regarding the implementation of CBME into psychiatry post graduate training, it is an attempt to bring uniformity in the psychiatry training in different institutes. The NMC has to take appropriate steps for the reduction of these huge differences between the institutes and GHPUs. Certain guidelines especially applicable for trainees in GHPU are also mentioned briefly, with special emphasis on exposure to community services and psychological interventions with a prescribed minimum of 100 hours of supervised sessions.

# **Postings:**

Out of the 36 months of posting, only 18 months are allotted for General Psychiatry (Ward & OPD). The remaining 18 months is spent in various rotations. With the introduction of DRP, another 3 months is taken off. This leaves very little time for training in basic sciences and general psychiatry.

As part of DRP, the PGs of psychiatry are being posted into nearby district and taluk hospitals, institutes where they have to arrange for their accommodation and other amenities by themselves. That again involves difficulties in terms of travel, residential accommodation, safety and security.

Another practical aspect that is overlooked is that there are more female candidates, who take up psychiatry these days. Many candidates are married during their first or second year of

residency and may have to deal with struggles related to conception, pregnancy, high risk pregnancy and maternity leave or child care during the period of residency including DRP.

It is hoped that PG CBME would narrow the gap between psychopharmacological treatment and non-pharmacological treatments, with adequate supervised therapy sessions. However, in a populous country like ours, with centralization of mental health care and treatment, the time and effort to provide these non-pharmacological treatment options is very meagre. Unless the District Mental Health Programme, along with a robust Primary care treatment of common mental illnesses at the Primary Health Care is strengthened, coupled with a proper referral mechanism to higher centres, most centres and GHPUs will end up with basic pharmacotherapy alone.

Human Resource and financial resource:

The NMC mandated requirement of psychiatry teachers currently consists of one professor, one associate professor and one assistant professor. This must be increased as the teaching work required from teachers with regard to UG, PG and Allied Health Sciences curricula is huge and demanding. The teachers also have to perform clinic duties, which include indoor, OPD, and specialist OPDs, the IP services, liaison services and the special camps and awareness programmes. This is a seemingly tedious and impossible task unless the mandatory requirement of teachers is increased. Along with the psychiatrists there should be adequate recruitment of psychiatry nursing staff, clinical psychologists and psychiatry social workers for a multidisciplinary approach and learning facilities.

Collaborating with the funding agencies and the psychiatry department helps in infusing the funds for upgrading the educational programs in the department. Facilitating the funding enrichment programs or activities and encouraging research within the existing training modules, that are locally relevant, is much needed.<sup>14</sup>

The resource constraints, overburdened teachers or consultants, low student-teacher ratio, and limited funding resources are the practical challenges in smooth implementation of CBME.

#### Training in Research Methodology:

It is now mandatory for any PG to complete a Basic Course in Biomedical Research in the first year of training. This is a step in the right direction, to build the research capacity of the PG. Further amendments to the rules however, have made it compulsory for the PG to present a poster, read a research paper in a conference and submit/publish an article in a peer reviewed scientific journal. These may help to improve the research ecosystem in the long run. However, the fact remains that, not every student or teacher is genuinely interested in research and making it mandatory for everyone may be counterproductive.

#### Assessments, Thesis, Log book:

The formative and summative assessments are a welcome change. Though these were in place, albeit in a less formal manner even earlier, now it has been made more objective. Gone are the days when the students' overall performance was assessed by the Professor and other senior teachers and decisions were made regarding the suitability of the PG to even appear for the final examination. It is a mentor-mentee paradigm now and 'periodic feedback' forms one of the

cornerstones of the assessment process. At the time of unit rotation (every 6 months), the significant positive or negative attributes of the PG student is to be shared and documented. The guideline document has also furnished a model PG Appraisal Form in its annexure which may be used.

One other area that needs to be looked into is the 'slow learner'. CBME essentially advocates the acquisition of the competencies and skills at the learner's own pace. However, the current NMC rules have not taken this into consideration. Since there are no semester or annual examinations, it is possible to accommodate the slow learners, but only for a maximum of 3 years, until their final university examination.

It is a welcome move that the thesis has been given its due importance. From just an acceptance of the thesis as an eligibility criterion to appear for the final examination, now it has been given a separate head under the practical examination, with its own viva. This would help the students to put some more effort into learning research and applying it during their training.

The other aspect of ongoing assessment is the log book. Recent advisory requests to shift from a physical log book to an e-log book. This is also appreciable. However, the institutions have to now ramp up e-infrastructure to have a repository of the PG student's e log book. The design of this must be user friendly and should be easily accessible to the teachers for their periodic inputs and suggestions. Data security and cyber threats are a reality in our country and precautions need to be taken to protect the three-year documented hard work of the PGs.

#### Training of the Teachers:

NMC has made training in teaching methods and research methodology mandatory for teachers where they should have completed the Basic course in Biomedical Research from Institutions designated by NMC. Norms for faculty appointment and promotion, and eligibility norms for being designated as Postgraduate Guide provided in NMC postgraduate educational board will help in effective training based on CBME. Psychiatry teachers have to adopt and orient themselves to provide competency based teaching to the students so that the latter can contribute to the needs of society and develop as a better professional.<sup>15</sup> Much like students who are fresh into CBME, the teachers also need to up-skill themselves, more so when it comes to PG teaching.<sup>16</sup> Whatever little experience available from the UG CBME teaching needs to be transcribed into PG CBME teaching also.

Many of the teaching methodologies suggested by the CBME framework like small group discussion (SGD), Directly Observed Practical Skills (DOPS), OSCEs, OSPEs etc are manpower intensive and time consuming. These place an undue demand on the teacher's time and effort for which there is no adequate compensation. Further, it needs time and better training of the teachers to remove the negative ideas that are attached to the PG CBME.

#### THE WAY FORWARD

The guidelines for competency based postgraduate training programme for MD in psychiatry is an appreciable effort. Though it is far from adequate and has many lacunae, it is probably the first step in shifting towards a competency-based PG training. Like the UG CBME, training domains, various competencies, and specific learning objectives (SLO) need to be identified and

enumerated. Must know, may know and good to know categorization will also help in the assessment. All these require a coordinated effort by teachers of psychiatry from various institutions across the country to work upon, elaborate and expand on the PG CBME. The Indian Psychiatric Society and the IPS- South Zone have a major role in coordinating these efforts, so that we may have a document that helps not only the PG students, but also the teaching faculty in imparting outcome-based training.

#### RECOMMENDATIONS

- A task force for enumerating the PG CBME that shall be acceptable and applicable for all PG training institutions is the need of the hour. A PG training manual is to be prepared, which shall detail the core and desirable skills and competencies, for each year, that each and every PG in psychiatry has to demonstrate and be certified.
- 2. Consultative meetings must be held with PG teachers of psychiatry across the length and breadth of the country. This can be done under the aegis of the Indian Psychiatric Society and with the active contribution of the IPS- South Zone.
- 3. The minimum number of faculties per teaching unit is to be doubled. Considering the length of time that is spent by each PG and psychiatrist with each patient in OPD and ward, this requirement is justified. Only then can the faculty do justice to both the patient and their students.
- 4. Like the University Grants Commission (UGC), the NMC must also bring in Choice Based Credit System (CBCS) and perhaps move from mark based to grade based system. This will eliminate the bias of different schools awarding different marks for their students. Perhaps later on the Semester Grade Point Average System (SGPA) and Cumulative Grade Point Average System (CGPA) may become a reality in PG medical curriculum as well.

#### CONCLUSION

CBME is a step forward and in the right direction for training the psychiatry PG. This step will hopefully make training simpler, uniform across institutions and make the assessment of the training more objective. It also hopes to put our learners, on an equal pedestal, with respect to the training in psychiatry from foreign medical institutions of repute. This will increase their chances of getting further training in such institutions or to take up work placements too.

But it is also worthy to note that psychiatry, as a speciality, is unique by itself. Even within a state, there is a huge regional and cultural difference in the presentation of mental illness. Further there is a huge gap in the mental health care delivery in India, which needs to be addressed systematically. The authors seriously doubt if psychiatry and psychiatry training can be put in a straight-jacket (uniform CBME for the whole of India), as presented in its current form. Ingenuity, flexibility and adaptability must be the cornerstone of CBME implementation if it is to achieve its ambitious goals.

#### Take home message

- The PG CBME is a milestone in psychiatry education and training. There needs to be an intensive re-orientation of students and training of teachers to achieve this goal.
- This new landmark in PG training comes with its own challenges and these challenges need

to be addressed for smooth transition from traditional training to competency-based training.

- The proper implementation of CBME will, it is hoped make things simpler, uniform across institutions and make the assessment of the training more objective.
- In its current form, the CBME training will be intensive not only for the students, but also for the teachers and trainers as well.

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### **CHAPTER 9**

# Research during postgraduate training in psychiatry

#### ABSTRACT

In this era of competency-based medical education, there is increasing emphasis on developing research-related competencies during postgraduate medical training. Nonetheless, the existing curriculum has limited scope, flexibility, and credits to foster and incentivize the acquisition of these competencies. In this chapter, we discuss the various avenues and opportunities for research in psychiatry training, methods to improve research and presentation skills among trainees, steps to augment research capacity building and potential hurdles in achieving this at the trainee, department, and institutional level. We provide examples of simple research opportunities available to every psychiatry trainee, irrespective of their workplace and training settings. Throughout the chapter, we illustrate our suggestions with examples, wherever possible, and provide actionable suggestions drawn from evidence and our personal experience. Though the chapter is primarily intended for the psychiatric trainee, faculty and institutional authorities may also find our suggestions helpful in creating a research ecosystem that promotes research, encourages mentoring, and strengthens collaboration.

#### Background: research and research training during psychiatry residency

Research is a systematic exploration and analysis of new information for better understanding a field of knowledge.Specialist training, including in psychiatry, is a critical period in the life of a medical professional to acquire the essential clinical skills and academic excellence and develop a mindset of scientific enquiry (or research) to solve day-to-day clinical problems. Moreover, this training period is crucial in moulding a resident trainee into a lifelong learner or self-directed learner to competently deal with scientific queries and attend to the health needs of the community.

Postgraduate training in our country is regulated by the Postgraduate Medical Education Regulations, included in the gazette released on 29th December 2023 (PGMER, 2023).<sup>1,2</sup>To realize the goals of the PGMER for postgraduate Psychiatry training (henceforth, psychiatry training) in the country, the National Medical Commission (NMC, formerly known as the Medical Council of India) has come up with postgraduate (PG) psychiatry competency-based medical education

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(CBME) curriculumin August 2022, for making the psychiatry training program more organized and objective, with a focus on the development of research-related competencies.<sup>3</sup>

The postgraduate medical education regulations (PGMER) mandate that postgraduate trainees be aware of the contemporary advances and developments in their training field, for which acquiring research or scientific investigation skills is paramount.<sup>2</sup>Although completing a thesis/dissertation is a mandatory requirement to pass the MD psychiatry course in our country, the scope for other research and related avenues is limited (restricted to weekly journal clubs, seminars, and case-conferences) in most institutions. Notably, research opportunities, particularly for funded research during residency and research electives or research tracks, are few and far in medical institutions, unlike Western countries, where they have well-established research tracks for the PG psychiatry trainees (hereafter referred to as psychiatry trainees). The latter opens many opportunities for the residents to pursue a research career, upskill their research fundamentals, and eventually become a scientist-clinician.

Research during the residency mainly depends on the resident's motivation and faculty members' or mentors' skills and attitudes toward mentoring students.<sup>4,5</sup>However, these attitudinal factors, by themselves, maynot be sufficient to bring about quality research works by the residents or drive them to remain invested in scientific enquiry, as a lot depends on the departmental and institute support and, at a macro level, the priorities and mandates of the regulatory bodies such as the NMC. The research benefits during the residency are not only limited to the trainees but also the department or institute, as it enhances the latter's academic reputation and attracts motivated and talented residents and faculty members.<sup>4,6</sup>

However, the implementation of research during residency is challenged by limited available resources (time, human, and financial), competing commitments or priorities for the faculty mentors and residents, and lack of flexibility in the psychiatry curriculum to incorporate research in the conventional training program. Much has been discussed regarding research in psychiatry residency globally and in our country; however, it is limited to particular view points or reports by professional bodies or academic agencies.<sup>7,8</sup>Therefore, this chapter aims to provide an overview of research in psychiatry training in India and highlight some of its critical aspects.

The objectives of this chapter are:1) to outline the critical research competencies laid down by the NMC for psychiatry trainees of India; 2) to discuss the importance of and avenues for research during psychiatry training; 3) to examine how research can be integrated into the busy psychiatry residency curriculum; and 4) to explore various opportunities and roadblocks in integrating robust research training/activities during the psychiatry training and future directions.

#### Research-related mentions in the postgraduate psychiatry competencybased medical education

The PG CBME document explicitly mentions the significance of research and developing a research mindset during psychiatry training. It envisages the incorporation of basic tenets of research to promote learning, improve patient care, and augment assessments, both formative (journal clubs, research forums, poster and paper presentations at conferences, etc.) and summative (compulsory thesis work). The preamble of the PG-Psychiatry CBME document states that a psychiatry trainee should be "able to recognize the health needs of the community and

competent to handle medical problems effectively" (page 2, PG-Psychiatry CBME). Research skills have a vital role to play in remaining updated. One of the crucial learning objectives of the PG-psychiatry CBME includes"developing the necessary skills to practice evidence-based psychiatry".<sup>3</sup> (Box 1)

Box1: Research-related mentions in the National Medical Commission's postgraduate psychiatry competency-based medical education, 2022

- 1. Research has been envisaged as valuable tool to promote learning, improve patient care, and augment assessments under NMC's CBME document for postgraduate training.
- 2. Research skills can be learnt and sharpened through research methodology workshops, research forums, attending and presenting in CMEs/conferences
- 3. At least one poster presentation or one oral paper at national/state conference, or having one research paper accepted or published or sent for publication to a scientific journal is mandatory to appear for the exit examination.
- 4. Thesis writing, journal clubs, case conferences, seminars, research forums, and participation in CMEs/conferences are mentioned as useful T-L methods
- 5. Research as a mandatory part of formative & summative assessment is mentioned.

CBME competency-based medical education; CME continuous medical education; NMC National Medical Commission; T-L teaching learning

Research skills can also be enhanced through teaching-learning (T-L) methods such as thesis writing and research methodology workshops that help learn the basics of research, epidemiology, biostatistics, planning a research project, ethical aspects, and in retrieving resources for clinical problem-solving. Similarly, another useful avenue is research forums, wherein psychiatry trainees should meet with their fellows and consultants monthly to discuss their research plan and present project reports of the completed work. The routine academic journal clubs (JCs), widely practiced across medical institutions and integral to PG training, offer an additional, essential platform for research-based learning.

Lastly, the PG-Psychiatry CBME highlights the essentiality of research skills and their evaluation during formative and summative assessments. The performance in journal clubs (JCs), research forums, paper and poster presentations in conferences (at least one each), and publication (accepted or published paper) in scholarly journals serve as an objective measure for the formative assessment. Of note is that the student appraisal form for the trainee carries an item on research ('conduct research and other scholarly activities')under scholastic aptitude and training. Thesis completion is a mandatory component of the summative assessment.

#### Avenues for and importance of research in psychiatry training

Why must psychiatry trainees do research? Apart from the obvious fact that a postgraduate

thesis is a mandatory requirement for course completion and award of the degree, there are several other reasons, too. First, participation in research feeds into and improves the quality of patient care and outcomes. Indeed, data from the United Kingdom suggest that national health service trusts with greater research involvement, as deduced by the number of research participants recruited and research funds received, had better patient outcomes even after adjusting for structural factors such as staffing.<sup>9</sup>

A second reason is more fundamental and relates to one of the stated goals of postgraduate training in the PGMER 2023 document<sup>10</sup>: trainees shall "be aware of the contemporary advances and developments in the respective discipline concerned. "To achieve this, one must read, understand, and stay abreast of scientific literature to evaluate evidence-based practice guidelines and one's own practice.Such evaluation requires several abilities: critical thinking, assessment of the strength of the evidence, reasoning, and analytical skills.Participation in research improves one's practice by fostering the development of these skills.

A third reason to do research is that it can facilitate the identification of research gaps, potentially leading to simple, novel, and relevant research questions for one's setting. This, in turn, opens opportunities for scientific publications that address local needs, help one attract research funding, do better research, and, ultimately, improve one's curriculum vitae (CV), contributing to career advancement. All of these can potentially enrich the postgraduate experience and help achieve another stated goal of the NMC GMER: that trainees shall "have acquired a spirit of scientific inquiry and is oriented to the principles of research methodology and epidemiology".

#### Avenues for research during psychiatry training (Table 1)

#### a. Execution of thesis work

The postgraduate thesis is an excellent opportunity for the psychiatric trainee to learn basic research and project management skills such as conceptualising study objectives, designing an appropriate methodology to answer them, obtaining administrative approvals to conduct the study, gaining knowledge about ethical aspects such as obtaining informed consent, administration of research questionnaires, creating data master sheets, data analysis, data interpretation, scientific writing, and academic publishing. They also learn problem-solving skills by circumventing issues that may arise at any stage of the project life cycle. Critical soft skills, such as time management and communication skills, are also learnt through protocol presentations, interim results presentations, and the final submission. All these contribute to creating a medical specialist who is competent in core skills and oriented to research principles and practice.

#### b. Various research or scholarly activities during the psychiatry residency

Depending on their research appetite, all psychiatry trainees can undertake a small study in addition to their thesis to further strengthen their research experience and skills. In many institutions, faculty undertaking research may provide research opportunities for resident trainees and authorship in publications commensurate with their participation.

Research opportunities
Chart reviews involvingcross-sectional or
longitudinal data analysiscan be a simple
and good starting point
Research in medical education:Novel T-L
Methods. Many journals have a separate
section on medical education and students'
section to accommodate such research
Research in consultation-liaison psychiatry-
offers both learning & research
opportunities, particularly in GHPUs.
Clinic attendance registers and registers of
special services (such as ECT, TMS,
geriatric, child & adolescent, or
psychosexual clinic, etc.): resources for
learning, research and publication
Volunteer for research responsibilities:Helps
in learning new skills, gaining command
over research topic(s),
collaboratingandimproving one's CV.

Table 1: Avenues for research during psychiatry training and potential researc	h
opportunities	

CVcurriculum vitae;ECTelectroconvulsive therapy; GHPUGeneral hospital psychiatry unit; NMC National Medical Commission; T-L teaching-learning;TMStranscranial magnetic stimulation

#### c. Clinical case conference

The teaching clinical case conference, where the trainee presents a clinical case in detail to improve case presentation skills and invite inputs on diagnostic clarification or management issues, is an integral component of the postgraduate teaching program. However, such discussions may also provide interesting insights that can be written as a case report correspondence for possible publication, teaming up with the consultant-in-charge.Novel outpatient or inpatient cases with unique clinical features or management issues may also be suitable for publication.

#### d. Journal Club

Academic JC discussions, another integral component of postgraduate teaching programs, involve critical appraisal of the study methodology, statistics used, interpretations derived, and findings presented in research papers. Many journals accept letters critiquing articles published in their journal, and trainees may utilise these opportunities to enhance their critical

thinking and writing skills. A caveat here is that letters critiquing published articles must be written up and submitted in a time-bound manner, as many journals allow only a limited time window (typically a few weeks) for such submissions. Interested residents may read the author guidelines section of the target journal carefully before preparing their manuscripts.

#### e. Seminar

Postgraduate teaching seminars involve a presentation by the trainee on an allotted topic, typically of theoretical and practical relevance. It involves extensive preparation and invites discussions by other participants; a faculty member usually moderates the discussions. Depending on the novelty and comprehensiveness of topic coverage, it can be prepared as a review article for possible publication. A narrative or systematic review, with a critical synthesis of the findings, may be prepared; many such efforts have been published in journals of good repute and standing.<sup>11,12</sup>

#### f. Book reviews, movie clubs, and other teaching innovations

Academic psychiatry teachers may use innovative methods of teaching psychiatry. One such example is the movie club,<sup>13</sup> where the presentation of a person with psychiatric illness is portrayed, and this leads to wide-ranging discussions including but not limited to psychopathology, therapist-patient relationships, expressed emotions of family, and social issues such as stigma and discrimination against mental illness. These and other teaching innovations are potentially publishable.

#### How to develop research and presentation skills during psychiatry training?

Psychiatry trainees may build research skills by participating in the avenues mentioned above. However, in this section, we aim to outline some specific approaches that may be adopted by novice clinician-researchers (Box 2):

#### Box 2: Developing research and presentation skills during psychiatry training

- 1. Many developed nations (Canada, USA, UK, etc.) have formal research training or research tracks during residency (e.g., DART program)
- 2. Research electives (e.g., research fellowships, funded research, interdepartmental/interinstitute research collaboration) can be incorporated in the existing psychiatry training curriculum.
- 3. Research tracks are beneficial both for the trainess and the psychiatry department in improving their research profile and for attracting skilled and motivated psychiatry teachers and trainees.
- 4. Challenges in this process are posed at the regulatory (no formal provision or flexibility in the course to incorporate research tracks), institutional (resource and fund constraints), departmental (lack of skilled mentors and timeconstraints), and trainee level (time and competing work demands).

DART Drug Abuse Research Training program of Medical University of south Carolina; UK United Kingdom; USA United States of America

#### a. Participation in basic research methodology workshops

Many academic institutions in India conduct basic research methodology workshops that aim to provide an overview of and orientation to principles of research and epidemiology. These workshops are popular among both psychiatry trainees and faculty. Trainees may enrol in such programs early in their residency to improve their grasp of research fundamentals. Trainees may also utilise free online research methodology courses offered by platforms such as Coursera. Another excellent initiative for enhancing one's research skills is the Electronic Journal Club India (eJCI), which is now close to a decade of existence, with more than 1000 members, 150-200 discussions per year, and over 60 direct publications since its inception.<sup>14</sup>

#### b. Write, write, write

Precision writing is a skill that needs to be practised and honed. Trainees may start writing about anything trending that piques their curiosity; there is no need to wait for big ideas to write. For instance, short published articles about the limitations of internet surveys, <sup>15,16</sup> which were the norm during COVID-19, attracted many citations due to their relevance. To make writing less of a chore and even more enjoyable, trainees may provide examples to illustrate their points or ideas.<sup>17</sup>

#### c. Enroll for courses on soft skills such as time management.

A common refrain among trainees is: "But I do not have time for research. I have exams, seminars, patient care duties, family and personal obligations. How do I make time to do research properly?" For this, one must know how to manage one's time well. Some platforms, such as Coursera, offer free soft skills courses designed to improve time management and personal and professional productivity.

#### d. Find a mentor

Easier said than done. Good and knowledgeable mentors willing to share their time and expertise are hard to come by. The onus is on trainees to identify mentors who are both compatible and possess the requisite expertise and reach out to them. The value of a good mentor in research cannot be overstated; they not only guide doing good research but also critique the trainees, which is very important for their development. Mentors are also role models for trainees in various ethical and professional aspects.

#### e. Grab opportunities for presentation.

Every presentation is an opportunity to improve one's communication skills, observe other presenters and make notes, obtain immediate feedback on the presented research work, network with peers, form research groups, and potentially identify mentors. The feedback received may help improve the research work presented and draft a better manuscript. Hence, trainees must utilise the opportunities available to them. Free papers, posters, and award paper categories at various conferences and continuing medical education events provide ample opportunities for presenting one's research work beside soffering networking opportunities to form research groups and do better-quality research.

#### f. Network and form research groups

The power of collaboration in research is immense, particularly when collaborators possess

diverse skill sets. Collaboration drives better quality research, which is more likely to be published in good journals with higher visibility. Publication in good journals boosts one's CV and provides an edge in competitive settings. Trainees must attend early career networking sessions, which are a part of most major psychiatric conferences. Both online and offline peer networks can be created and maintained; published models are available in this regard.<sup>18</sup>

#### g. Do thesis work diligently

The thesis is the first exposure any trainee will have to formal research methods. Trainees would do well to work on their thesis diligently without cutting corners. This involves doing the literature search comprehensively, collecting data meticulously, synthesising the findings, writing it up with attention to detail, and finally, persevering to publish it. Unpublished research findings represent a waste of time and resources and are unethical to participants who have contributed their valuable time on the research.

#### h. Critique articles in depth during journal clubs

The academic JC is essential to psychiatry training because discussions in these sessions help foster skills in critical thinking, reasoning, and evaluation of evidence-based medicine. It also allows clinicians to stay updated with the latest developments in the field. To derive maximum benefit from these sessions, trainees should strive to analyze the article in-depth, not just superficially critique it. Ideally, articles for the JC must be mailed in advance to all discussants so they can read and come prepared rather than discuss them on the fly.

#### i. Develop an attitude of life-long learning.

Competence in research requires adequate subject matter knowledge, expertise in research design and methodology, and proficiency in statistics. Each of these can take years, if not decades, to develop. Hence, trainees must cultivate an attitude of lifelong learning to become competent researchers and not be afraid to discuss their research ideas with experienced colleagues to refine them further. With every research effort, the endeavour must also be to learn something new that adds to one's skill sets.

#### Box 3: Research tracks/activities to promote research during psychiatry training

- 1. Proactive participation in the researchmethodology workshops and other skilldevelopment coursesorganized by ICMR, IPS, & MOOC platforms to learn research.
- 2. Engaging oneself in scientific writing and developing manuscript writing skills
- 3. Finding a mentor and researchteammate(s) to hone researchand collaboration skills
- 4. Grabbing opportunities to present one's research work (departmental, zonal or national CMEs/conferences)
- 5. Doing one's thesis work digilently for learning research skills and steps in the publication cycle.
- 6. Networking and forming reseach groups for upskilling oneself, doing impactful

ICMR: Indian Council of Medical Research; IPS: Indian Psychiatry Society; MOOC: Massive Open Online Course

#### Incorporating research tracks in psychiatry training

Many developed nations (Canada, United States, UK, etc.) have formal research training or research tracks during residency to orient trainees to research or hone their ability to conduct guality research in their preferred area. The research track is defined as "formal training wherein psychiatry residents design and complete their projects, often over several years, and usually in conjunction with specialist training in laboratory skills and/or clinical research assessments, data analysis, scientific writing, and grant applications."Such programs add immensely to the growth of translational research in biological psychiatry, psychiatric investigations, diagnosis, and treatment and enhance the resume of the psychiatry trainee(s).<sup>4,5</sup>One such program is the Drug Abuse Research Training (DART) program by the Medical University of South Carolina, where selected residents are provided with a research mentor, support for research time during the residency, and financial support to carry out the research. The core component of the DART program includes individual, regular meetings with the resident's research mentor, bi-annual evaluations with the research mentor and DART administrators to review the research work and its alignment with the trainee's career goals, a modest amount of funding to conduct the pilot project, and formal, didactic seminar series to improve essential skills for a successful research career.<sup>5</sup> Research tracks can be in the form of extended residency, electives in psychiatry research during residency, or regular dedicated days/periods during the entire residency period with varying intensity depending upon the residency phase (Box 3).

Although dedicated research tracks do not seem feasible anytime soon in our country, there are various ways to foster research interest or acumen among residents. Such steps include a research methodology workshop for residents upon their entry into medical colleges (particularly during the thesis protocol preparation phase), periodic research workshops (on data collection and management, statistical analysis, ethics in psychiatry research, grant application preparation, manuscript writing, etc.), and involving them in ongoing departmental research activities in various capacities (as participants in focused group discussion/in-depth interviews, data collection, data analysis, writing a part of the paper, etc.).<sup>8,19</sup>Other platforms may include funded projects such as intramural funding for the students, extramural funding by professional bodies (Indian Psychiatric Society [IPS], Indian Teachers of Psychiatry [ITOP], etc.), research fellowships, and assisting senior residents or faculty members in their research (**Table 2**).

The benefits of research during residency, both for the psychiatry trainee and the department of Psychiatry, cannot be overemphasized. The trainee acquires additional research skills, experience, strengthens his/her CV, gets a footing in the academia and research community, gains opportunities for collaboration and networking, and develops critical thinking. The department can boost its research profile, enhance its networking, gain greater recognition within the institute or outside, and create an ecosystem where a mentoring culture is embedded and valued; this can potentially attract talented and skilled research-oriented faculty and residents.<sup>20</sup>

However, such dedicated research opportunities or programs pose specific challenges to the residents, such as time constraints, loss of clinical or administrative opportunities, and extended training hours impacting their personal time. On the other hand, department-level hurdles include a paucity of trained research mentors, a lack of protected time to supervise the resident trainee (and mentors), and access to funding to do cutting-edge research. Other departmental or institution-

Table 2: Research training andfunding opp	
Research training opportunities	<b>Research funding opportunities</b>
MandatoryResearch Methodology	Intramural Funding:Psychiatry-training
workshop in the institute	research awards/funds if available
Research methodology workshops	Extramural funding:
orgranized by the ICMR	ICMR provides MDthesis support grant
	(upto ₹50000 support) <sup>29</sup> through a
Basic Course in Biomedical Research	competitive funding process to promote
Course, by ICMR's National Institute of	high-quality work that can be widely
Epidemiology, available in the Swayam portal. <sup>27</sup>	disseminated.
portai.	Indian Psychiatry Society, its zonal bodies
Health Research Fundamentals organized by	and state chapters offer best research paper
by the ICMR School of Public Health,	or oral/poster presentation award
Chennai, <sup>28</sup> etc.	opportunities for the trainees in their
	respective conferences (trainees can look up
	the respective websites to explore such
	opportunities).
Research methodology workshops	PRIIIA fellowship for trainees: This is
organized by the Indian Psychiatry Society	short-term (sixmonths) and long-term (2-4
& its Zonal bodies (trainees can look up the	years), with mentoring, training, and $\frac{24}{24}$
respective websites to explore such	researchfunding support. <sup>24</sup>
opportunities), including specific workshops as part of the PG-development program	
organized by the IPS-zonal bodies (such as the	
basic course in psychiatry research conducted by IPS SZ)	
Research methodology courses on massive	
open online course (MOOC) platforms,	
such as Coursera, Udemy, edX,	
etc.,:opportunities to hone research skills	
and get oriented in research	
methodologies. <sup>30</sup>	
Leadership and Professional Skills Course	
for Early Career Psychiatrists:Intended for	
the trainees in their final year of residency.	
A unique opportunity to develop	
professionalism, leadership, and research skills in areas such as applying for research	
grants and co-ordinating with peers. <sup>31</sup>	
	; PRIIIApsychiatry research infrastructure for
intervention and implement	

Tuble 2. Research framming anaralianing opportantities for trainies	Table 2: Research	training	andfunding	opportunities	for trainees
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r intervention implementation research and in India level challenges include devising a mechanism for timely review of the trainee's research proposal, ensuring continuity of clinical services during the engagement of the residents in the research work, and providing manpower and other logistics for the research work.<sup>4,20</sup>

### Expertise or resources required within the department to ensure research during PG training

Enhancing research training among psychiatry trainees requires a departmental ecosystem that fosters research and a research mindset among its members, including senior residents and faculty members. Faculty members mentoring trainees themselves need to be trained and knowledgeable in research;<sup>21</sup> this would ensure robust research training, including ethics in research.<sup>8</sup>The faculty members mentoring residents conducting research should be provided dedicated time for this important activity to ensure the continuity of research training. The department needs to develop the necessary infrastructure and systems to promote research, such as data archival mechanisms, purchase of research tools (e.g., screeningtools such as the Hospital Anxiety and Depression Scale or diagnostic instruments for mental health conditions such as theStructured Clinical Interview for DSM-5 [SCID-5] or the Mini-International Neuropsychiatric Interview [M.I.N.I]), software for analysis or data management, timely departmental review meetings, regular research forum meetings and discussions (to promote critical thinking, strengthen research design in ongoing works, and monitor their progress), and identifying faculty who are willing to facilitate and oversee residents research-training and inter-disciplinary research activities.<sup>7,19,20,22</sup>

# Roadblocks in implementing effective research training during psychiatry residency

- a. Regulatory: Research should be a core competency in psychiatry training and used as a tool to foster learning among psychiatry trainees.Notably, in India, completing a dissertation is part of the psychiatry training course; however, only recently has the educational outcome in terms of accepted/published papers been realised by the NMC. Similarly, oral/poster presentation during the residency has been mandated. However, the NMC has not laid down outcome measures to gauge students' research quality and skills. Similarly, the current curriculum does not offer adequate flexibility to incorporate research tracks during the residency. The lack of specific regulatory provisions may contribute to keeping research during residency a low priority vis-a-vis clinical work.<sup>19,20</sup>
- b. Institutional: At an institutional level, there is often no robust mechanism where trainees' research work and clinical work can be distinctly outlined or separated. In this context, Menon et al. (2019) rightly pointed out that "mindless fusion of research & clinical work results in poor outcomes in both the domains" not to forget the stress it creates for the students, particularly those who do not have a research inclination or work in low resource settings. Few institutions in India have an interdepartmental research mentorship culture where skilled faculty members from other departments assume the role of a research mentor for residents if such mentors are unavailable in the parent department. Similarly, unlike in the West, most colleges have no provision where students can have a guest research rotation in relatively resource-rich departments. Lack of protected time for research can potentially affect the quality and time

devoted to mentoring among faculty mentors. Furthermore, the lack of periodic training workshops, handholding of residents, orproviding necessary financial or administrative support can be a significant barrier to conducting research.<sup>19,20</sup>

**c. Personal:** Residents can have various reasons for not participating in research activities. Research is an activity mostly done gratis in our country. Students can have financial issues; to overcome them, they may prefer learning some core clinical competency or speciality training to enable a more financially lucrative clinical practice. A hectic schedule where clinical work and associated accountability take precedence over less priority work (such as research) and poor mentoring on managing day-to-day affairs may discourage residents from considering a research career or taking up research responsibilities during residency. Resource limitations at various levels (national, institutional, and department levels) may be an obstacle for the students when they consider doing impactful research during residency (particularly those involving consumables, instruments, or high-end software).<sup>19,20</sup>

#### Potential simple research opportunities during psychiatry training

This section aims to invoke curiosity among budding researchers about simple research opportunities during psychiatry training. We do this by listing a few opportunities available to all trainees, regardless of their setting.

- a. Chart reviews: Information documented in the patient's outpatient or inpatient clinical charts provides a rich data source for conducting simple yet publishable research. Either cross-sectional studies that look at factors associated with a phenotype of interest (e.g., clozapine-resistant or ultra-resistant schizophrenia) or longitudinal studies where follow-up data is taken from records (e.g., course and outcome of acute psychosis) can be conducted with relatively lesser effort and resources.
- b. Research in medical education: Most medical institutions provide a population of students to research. Trainees may harness this opportunity to study issues of topical interest, such as qualitative studies of sources of stress and service utilisation patterns in this group. Studies evaluating perceptions and effectiveness of novel teaching-learning techniques may also be conducted.
- c. Research in consultation-liaison psychiatry: Such studies may be more applicable to general hospital psychiatry units where cross-referrals constitute a significant chunk of cases seen in the outpatient department. If appropriately maintained, the referral registers provide a good data source to answer relevant questions.
- d. Clinic attendance registers and registers of special services such as electroconvulsive therapy: Most departments maintain registers of patients seen in special clinics or those receiving niche treatments. These registers, over a period of time, become a valuable resource for answering simple yet novel research questions related to profile, sex differences, treatment response, adverse effects, and follow-up patterns, to name a few.
- e. Volunteer for research responsibilities: Every research teaches us something we did not know before.Trainees should actively seek and volunteer for research responsibilities by talking to research-oriented faculty in their institutions and taking up the responsibility assigned.Since trainees with domain expertise, such as knowledge of specific statistical

software, are likely to get more opportunities, learning new, relevant skills, among other things, is also appropriate for a psychiatry trainee inclined towards research.

#### Way Ahead or Opportunities

Having provided a 360-degree picture of research in psychiatry training in India, we offer some handy and implementable solutions to enhance the research experience for trainees and build a favourable research ecosystem in our institutions. First would be, having clear-cut objective research outcome measures that can be included in the summative assessment, in addition to the mandatory MD thesis, because assessment drives learning. These can include utilizing students logbooks, internal assessments (formative mid-term presentations in departmental research forum), and an appropriate summative assessment (thesis evaluation/project completion report with objective-structured scoring and viva. Flexibility in training with the provision of research electives (within the institute or outside) may be another effective strategy. Making institutional resources, within the department or outside, accessible to the residents can bridge the gap in research capacities across departments of an institute (Box 4).

#### Box 4: Way forward for research during psychiatry training

- 1. An objective structured research assessment (formative & summative) during the psychiatry training to facilitate development of research competencies.
- 2. Flexibility in training with the provision of research electives (within or outside the institute).
- 3. Utilizing available research resources, such as the multi-disciplinary research unit of the institute, inter-departmental research collaborations & resource sharing, attending research capacity building workshops conducted by ICMR and professional bodies.
- 4. Creating trainee editorial post in institutional (e.g., Digital Journal of Clinical Medicine), zonal, & national level journals (MINDS Newsletter)
- Mentoring students in writing grant applications and orienting them about various funding opportunities (e.g., ICMR's MD thesis support grants). ICMR: Indian Council of Medical Research

The Multi-disciplinary research unit (MDRU) established by the Department of Health Research (DHR) in several institutes can help promote interdisciplinary or translational research.<sup>23</sup>National and zonal professional bodies can work with regulatory bodies or academic institutes to enhance research capacity building in medical institutions and provide necessary financial resources such as research fellowships or travel awards to motivated trainees.One such initiative is the Psychiatric Research Infrastructure for Intervention and Implementation in India (PRIIIA) fellowship (medium and long-term research training) for psychiatry trainees. This fellowship offers opportunities to be mentored by international and national faculty in psychiatry research; the model incorporates handholding throughout the fellowship period.<sup>24</sup>

Likewise, scientific journals run by professional bodies or institutional journals can create a post(s) for trainees in their editorial board (like MINDS Newsletter) or have a dedicated section to

publish postgraduate research, such as in the Digital Journal of Clinical Medicine.<sup>25,26</sup> Research funding is a vital part of learning and conducting research; therefore, the opportunity for intramural research funding/awards for the residents and extramural funding (by the Indian Council of Medical Research [ICMR] or professional bodies such as the Indian Psychiatric Society, and student organizations) can help promote research and nurture a research-mindset among the residents, who will eventually become research mentors or clinical-scientists in future. The thesis support grants (up to 50000) by the ICMR for postgraduates is a valuable step in this direction.

#### Conclusion

Postgraduate psychiatry training is a critical period to learn and hone research skills. Research is vital for the psychiatry trainee to develop into a competent clinician, professional, and lifelong learner. Apart from mandatory thesis work, psychiatry trainees must take up scholarly activities to learn research and for their career development. Research also serves as a crucial teaching-learning and assessment method during training. Journal clubs, seminars, case conferences, research forums, and movie clubs are commonly available avenues to learn basic research and must be utilized fully. Research methodology workshops, CMEs/conferences, and research tracks/ fellowships are great opportunities to get oriented to research, network, and improve one's resume. However, research during the training period warrants regulatory, institutional, and departmental support and trainee motivation.

Inflexibility in PG training, lack of institutional or departmental ecosystem to foster research, lack of resources and infrastructure, poorly demarcated clinical and research work, coupled with lack of skilled mentors, and time constraints on the part of the trainee are critical barriers in promoting research during the training period. Setting clear objective and structured research outcome measures, sharing of resources within the institute and outside, effective utilization of available resources within the institute (e.g., multi-disciplinary research units) or outside (research consortiums), and research funding (intramural research grant and support from the national research agencies and professional bodies) are vital tools to promote research during the psychiatry training period.

#### Take-home messages:

- 1. Developing research-related competencies, such as critical analysis of the evidence, are essential to remain updated in the field and emphasized in the postgraduate competency-based medical education curriculum.
- 2. Simple research avenues and opportunities are available to every postgraduate trainee, irrespective of their workplace setting (table 1)
- Teachers must brainstorm on ways to make the existing curriculum more research-friendly with greater scope and flexibility to include research time and credits for undertaking research during postgraduation.
- 4. Including research-related outcomes in the summative assessment, incorporating research electives during residency, and establishment of multidisciplinary research units in every institute may help promote research among psychiatry residents.
- 5. Trainees must do their mandatory thesis work diligently and are encouraged to form peer networks to further collaboration, learning, and do impactful work.

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### **CHAPTER 10**

### **Specialty Training for Postgraduates**

#### **ABSTRACT:**

Specialty training is essential for comprehensive psychiatric training. Evidence shows that it is uneven across subspecialties and institutions. With many subspecialties becoming independent specialties, the need for training becomes all the more necessary. With the IPS PG Training Guidelines though a path-breaking effort, little has translated to teaching, and NMC and NBE have not adopted their suggestions. Evaluation of resident training shows glaring disparities in the quality of training in CAP, geriatric psychiatry, forensic psychiatry, and interventional psychiatry. Training in many centres can be upgraded by collaboration with centres rich in resources for a particular sub-specialty. There is a need to broaden the number of subspecialties being prioritized to include geriatric psychiatry, forensic psychiatry, rehabilitation, and interventional psychiatry. The training in the new era of CBME should be re-designed to make residents competent in subspecialty case management to a level that they can be entrusted with cases with confidence.

#### Introduction

It was Carl Jung who said, "Medicines cure diseases, but only doctors can cure patients". Postgraduate training should therefore go beyond learning the science of medicine to the art of being a physician. The art of the doctor-patient relationship forms the bedrock of cure in psychiatry more than any other specialty, especially as most other specialties have given up clinical medicine and have moved more towards investigative medicine. Therefore, skilled and competent teachers and structured clinical programs are essential to help a postgraduate navigate the often-troubling waters of clinical psychiatry.

The process of standardizing psychiatric training in the face of ground realities was expertly highlighted by Professor NN Raju in his presidential address at ANCIPS in 2022. The problems highlighted pertained to curriculum, resources, training, cultural perspective, research, and assessment methods.<sup>1</sup> He further emphasizes that individual universities and institutions have evolved course and certification procedures, that do not adhere to the minimum standards prescribed by the National Medical Commission (NMC).

Current-day training has faced challenges due to the rapid increase in the number of training centres being approved by the NMC while compromising the faculty-student ratio.<sup>2</sup> The greatest resource a department can possess is the number of qualified and experienced staff. In an

environment where most colleges consider excess staff as a luxury (whether it be Government or private), the balancing of basic functions like inpatient and outpatient clinical care, teaching, medico-legal work (in this era of MHCA 2017), and research seems ever more like a bridge too far. This problem is compounded by the fact that undergraduate and postgraduate training, have to be offered simultaneously by most of these centres.

There is ample evidence of the gap in resources provided by many Central and State Government institutions and the private sector.<sup>1</sup> The difference also exists between government institutions within states and definitely between government-funded premier institutions and government medical colleges.<sup>2</sup>

The bare minimum staff and resources in most centres affect the development of subspecialty clinics, as the staff pattern is barely enough to sustain a regular adult outpatient department. The nascent stage of development of many colleges offering postgraduate courses also prevents them from developing and offering dedicated subspecialty training.<sup>2</sup> Dedicated psychiatry institutes with no undergraduate student responsibility may be able to develop more services, but they suffer from a dearth of consultation-liaison training.

Further, most subspecialties themselves have developed into independent disciplines with their own clinical, management, and research paradigms. The ever-expanding knowledge base in a way has converted these subspecialties into what are often inappropriately and strangely referred to as 'super specialties', a term which is disputed within the discipline of psychiatry.<sup>3</sup> Semantics aside the phenomenal growth of addiction medicine, child and adolescent psychiatry (CAP) and geriatric psychiatry have given rise to courses (DM/PDF/DNB courses) and dedicated specialists in this field, whose expertise is available to a select minuscule of the postgraduate student population, further widening the gap in quality sub-specialty training.

All these factors have created a situation where most institutions are forced to depend on other established institution/s with well-developed subspecialty training facilities to provide comprehensive postgraduate training. Therefore, across the board subspecialty training quality is inherently dependent on the nature of the institutions to which the students are temporarily outsourced.

#### Global Lag - Is Sub-specialty Training Sub-standard?

The Asian Journal of Psychiatry Commission on Psychiatric Education in the 21st Century in its observations expressed dissatisfaction with psychiatric training standards in most parts of the world.<sup>4</sup> A major barrier according to them was the conceptual error in adopting the Cartesian duality which dictates the duality of mind and body. This has led to an erroneous separation of physical and mental health which has impaired the opportunities to provide integrated teaching and service delivery.<sup>4</sup> Psychiatric training standards at the same time need standardization from a global perspective to achieve the best results. But, due to the inherent nature of the discipline which is more than a science and is often modulated by the cultural milieu, country/region specific considerations should also influence training. This is a problematic balance of global standards with local execution, that many countries are unable to provide. The Royal College Guidelines emphasize that a good psychiatrist should be an excellent clinician, a good communicator, a good record keeper, a lifelong learner, researcher, mentor, team member, and leader and should

work with high ethical standards.<sup>5</sup> This largely echoes the concept of an Indian Medical Graduate (IMG) laid down by NMC.<sup>6</sup> The effectiveness of the training modules to achieve this, and their implementation across countries varies. In many Asian countries, local universities are at the helm of training and this causes a serious disparity in standards of training and assessment across centres.<sup>4</sup> A similar scenario was expressed by Prof. NN Raju as the reason for the disparity in training cross centres in India.<sup>1</sup> Further even in countries where the training was supervised by national bodies, inconsistencies existed in the delivery of training and assessments-a fact that is pivotal to the quality of specialty training across these regions also.

The specialty training in psychiatry in most parts of the world according to the commission does not meet the current needs, especially when one takes into account the shortageof international expertise.<sup>7</sup> The international call has been to adopt programs that give the postgraduate diverse knowledge across various domains, especially in fields like addiction medicine, where accurate identification and management is a must given the rapid increase in substance-related problems.<sup>4</sup> The subspecialty training in child and adolescent psychiatry, addiction psychiatry, geriatric psychiatry, and psychosomatic medicine according to the review is dire.<sup>7</sup>

The Accreditation Council for Graduate Medical Education (ACGME) in the United States has a subspecialty rotation policy that allows a variety of adjustments, possibly to the detriment of training. The CAP rotation is flexible from 2 months to 3 months. The rotation for addiction psychiatry (1 month), geriatric psychiatry (1 month), and psychosomatic medicine (2 months) is perceived to be short. Further, some areas like community psychiatry and forensics do not have any specified time for training.<sup>7</sup> So, the scenario in advanced training centres also seems to be less than adequate. So sub-standard subspecialty training is an area of concern globally.

#### Global Training in Child and Adolescent Psychiatry: A Tale of Disparity

Meta-analysis shows that the pooled prevalence of child and adolescent mental disorders worldwide is 13.4%.<sup>8</sup> Still several countries do not have CAP training programs and the void is filled by general psychiatrists and paediatricians. It is also evident that the content and breadth of the curriculum and the delivery of training are variable and inconsistent across countries that offer child psychiatry training.<sup>9</sup> A study examining CAP training across 16 countries shows that Nepal, Ukraine, and Spain offer a 3- to 6-month rotation in CAP during general psychiatry training while the UK, Australia, Japan, Indonesia, and Bangladesh offer a 6-month CAP rotation in their general psychiatry program.<sup>8</sup>

Of the trainees interviewed, 59% said that their curriculum was comprehensive to aid competent practice. The deficits identified by those who felt that their training programs were deficient included lack of exposure to psychotherapy skills, neurodevelopmental disorders, forensic or medico-legal practices, and transition to adult facilities. The regular supervision of their work and feedback were perceived by only 41% of the trainees. The high demand from the patient load in low- and middle-income countries mostly accounted for the disparity in trainer supervision.<sup>9</sup> Rigorous academic programs comprising case discussions, journal clubs, and lectures are lacking in countries where CAP training is essentially a part of general psychiatry training (e.g. Spain, India).

A ray of hope is that programs with collaboration between trainers in resource-rich and resource-

starved nations have produced good results. A few cases in point are the collaborations between PhD programs in CAP at Kanti Hospital in Nepal with the University of Oslo; CAP training in Bangladesh with child psychiatrists from Canada and Germany, the University of Michigan and the Ghana College of Physicians as well as Universitas Indonesia's and the University of Hawaii.<sup>9</sup> In a resource-variable nation like India such collaborations between resource-rich and resourcestretched institutions within the country and if needed international centres are an effective way of improving the quality of CAP training.

Indian Framework-Tentative Steps Towards Standardization

The IPS PG training guidelines which came in 2002 and were revised in 2013 have specified subspecialty postings in child and adolescent psychiatry, addiction psychiatry, consultationliaison psychiatry, geriatric psychiatry, rehabilitation psychiatry, forensic psychiatry, and community psychiatry. The duration specified are:

- · Child and adolescent psychiatry -3 months
- · General medicine/ liaison psychiatry 3 months
- · Addiction psychiatry 1 month
- · Forensic psychiatry 2 weeks
- · Geriatric psychiatry 2 weeks
- Rehabilitation 1 month
- Psychology 1 month
- Family Psychiatry 1 month
- Psychiatric hospital\* 1 month
- Community psychiatry 1 month.<sup>10</sup>
- · For trainees in a general hospital

These postings are to be completed in the second year. The guideline however takes into account that the recommendations for posting be modified based on local constraints. The only mandatory specialty training is in CAP. The guideline again allows centres with specialized facilities to advance the training to the last 3 months of the first year or extend it to the first 3 months of the third year of training. The inequality in training is therefore an acknowledged truth and the guideline does not suggest any remedial measures for the same.<sup>10</sup>

Another fact that remains to be seen is the modification the current proposals will have to undergo once a detailed competency list for specialties is laid out as part of the competencybased MD psychiatry curriculum which is yet to be formulated. The current distribution of training shows the same broad and flexible approach that is to be modified based on the resources an institution possesses.

#### Schedule of clinical postings for M.D Psychiatry \*(36 months)

- · Area/ Specialty
- · Ward and OPD (Concurrent) 18 months
- · Neurology -2 months
- Emergency Medicine/ Internal Medicine 1 month
- · Consultation Liaison Psychiatry 3 months
- Psychiatric hospital and Forensic Psychiatry 1 month

- Clinical Psychology 1 month
- Addiction Psychiatry 3 months
- · Child and Adolescent Psychiatry 3 months
- Community psychiatry 2 months#

Elective posting 2 months (as per choice in the same Institute)

\* The stated duration can be subjected to minor modifications depending on available resources

# Exposure to community-based services should be integral to various postings<sup>6.</sup> The system is almost similar to DNB Psychiatry<sup>13</sup>.

- Ward/OPD/Emergency 20 months
- · Neurology 2 months
- Internal Medicine 2 months
- · Consultation-Liaison & Emergency Management 3 months
- Psychiatry Hospital/ Nursing Home 1 month
- Clinical Psychology 1 month
- Drug De-addiction 2 months
- · Child & Adolescent Psychiatry 3 months
- · Community Psychiatry 2 months

The absence of training rotations in geriatric psychiatry, for which the IPS guideline allocates 2 weeks and the absence of the proposed 1-month rotation for family psychiatry and rehabilitation are the major lacunae in the MD and DNB curriculum. Further, the DNB curriculum does not include the Forensic psychiatry posting proposed for 2 weeks. The MD curriculum clubs it with a month of psychiatric hospital posting (which is only for general hospital psychiatry units) and possibly assumes that all trainees posted in psychiatric hospitals will be exposed to forensic cases and does not specify separate training.<sup>6,13</sup> The only other option is to use the elective postings in the MD curriculum to fill these gaps, something the DNB curriculum may not allow.

So, the Indian framework for postings varies across courses and proposals, therefore it is important that IPS Task Force Guidelines for Post Graduate Psychiatry Training, which had formulated the PG training guideline, should liaise with the NMC and NBE to ensure the standardization of rotations, their duration, propose competencies and training modules, ensure program delivery and help standardize assessment protocols. The task force should periodically review the training practices, conduct outcome research, and suggest appropriate modifications to the curriculum.

#### Specialty Postings- Through the Looking Glass

#### **Child and Adolescent Psychiatry**

Child and adolescent psychiatry training is the only mandatory specialty in the list of specialties as per IPS guidelines. The specialty also is given the maximum time allocation of all subspecialties. India has a significant deficit of skilled professionals in child and adolescent mental health. The problem is being addressed by starting multiple specialty training courses whether it be MD or PDF. But this step though significant, will in no way solve the existing service gap, a

fact that alarms one especially when one considers the statistic that less than 1% of children and adolescents with mental disorders receive treatment in India.<sup>12</sup> The NMC-prescribed MD curriculum allocates 3 months to child and adolescent psychiatry, the same duration is prescribed in the DNB curriculum also.

## The broad areas to be covered during this posting as per the IPS task force guidelines are:

- Development
- · Interviewing and classification
- · Child and adolescent psychiatric disorders
- · Conduct, emotional, and behavioural problems in children
- Mental retardation
- Specific learning disabilities (not disorders)
- · Psychopharmacology in children
- · Adult outcome of childhood disorders
- · Liaison with teachers, schools, child care institutions.<sup>10</sup>

This draft does not specify theoretical and clinical topics. Further conditions like autism spectrum disorders, ADHD, and childhood affective disorders are not given due mention.

A survey was conducted under the aegis of IPS to evaluate the psychiatric training among 451 gualified and trainee residents across different centres from India five years after the guidelines were proposed.<sup>14</sup> The survey found that the overall rating of psychiatric training was good/ very good among 68.3% of the participants. Of this sample, only 6.2% rated the training as poor/very poor. But when it comes to CAP the global rating of good/ very good was expressed by 38.2% and 26.2% found the training they received to be poor to very poor. On further sub-classifying the participants into 2 groups based on the quality of the institutions, it was seen that a perceived resource-rich institution (Group I) fared better than a heterogeneous group of institutions of undetermined resources (Group II). The Group I Institutions which included central institutes like NIMHANS, CIP, AIIMS, PGIMER, and JIPMER among others offered CAP training which was perceived to be good/very good by 52.2% of the residents. A figure that barely passes muster. However, only 14.5% felt that their CAP training was poor/very poor. But when it comes to group Il institutions, which may represent the quality of most colleges in India, only 26% of residents felt that they received good/very good CAP training. Further 38.1% of the residents found the training to be poor to very poor. This dismal statistic not only represents the general state of CAP training across institutions but also highlights the disparity in training among the different institutions.14

When it came to rating the competence of the faculty in CAP, the global impression was good/very good among 59.8% of the residents. However, residents in Group II institutions rated only 43.6% as good/very good as against 74.5% of the residents from Group I institutions. So there exists a clear disparity in the perceived quality of the faculty across the centres in India.

The way ahead is for resource-scarce centres to collaborate with resource-rich centres to implement a CAP rotation.<sup>8</sup> This would help to pool the methods of teaching and qualified faculty

to serve a larger number of trainees. This can be done by collaboration based on regular contact between institutes in case discussion, teaching, and assessment or by posting trainees in institutes with better training resources and faculty. But in such cases, there should be a structured system for training and assessment of all postgraduates, which should not differentiate between inhouse trainees and those from another institution.

#### **Addiction Psychiatry**

Addiction is a worldwide problem with significant health hazards, and an estimated 100.4 million cases globally as of 2020. The disability-adjusted life years (DALY) of alcohol and drug use are 4.2% and 1.3%, respectively.<sup>15</sup> A review of training standards in Europe observed that addiction psychiatry (sometimes named addiction medicine) is probably not adequately and homogeneously incorporated within the psychiatric training.<sup>16</sup> The 2014 WHO Global Survey on Resources for Prevention and Treatment of Substance Use Disorders, reported that around 37% of the 155 responding countries do not provide adequate training in addiction as part of post-graduate training programs.<sup>17</sup> Nearly 30% of countries had no addiction psychiatry training programs (52% in low-income countries vs. 16% in high-income countries). In a European survey, only 33.27% agreed or strongly agreed to be confident after training to treat addiction cases.<sup>16</sup> In the same survey, 66.9% of the trainees agreed or strongly agreed that addiction psychiatrists are usually less skilled than their counterparts in CAP and general psychiatry.

In the Indian scenario specialty expert training such as DM and PDF courses have been a welcome step to bridge the service gap in this field. The IPS Guidelines on postgraduate training allocates a month-long posting in addiction psychiatry while the MD curriculum and DNB curriculum allocate 3 months and 2 months respectively.<sup>10, 13</sup> The NMC and DNB allocation to an extent is more reflective of the scale of the problem and the need for training and the IPS guidelines probably needs to rethink its strategy on addiction psychiatry. The guideline has a broad-based approach and sets forth the following areas to be covered as part of the rotation:

- Mechanism and epidemiology of drugs of abuse
- Neurobiology of addiction
- · Substance use and public health impact
- Behavioural addiction
- Assessment and management of addiction
- · Motivational interviewing and relapse prevention
- Self-help groups
- Prevention
- Legal issues

The curriculum tough needs to address community resource mobilization and utilization aspects also, as it serves in prevention and better service delivery.

The survey on addiction psychiatry training in India observed that 68% felt that they received good/ very good training as part of their postgraduate program.<sup>14</sup> (Group I 77.6% Vs. Group II 68.3%) The training across different institutions also does not show a marked heterogeneity in perceived quality. The residents surveyed opined that 80% of the faculty training them in addiction psychiatry were good/ very good, which is an encouraging statistic. The figures are also more

than the perceived quality of training and faculty competence in CAP.<sup>14</sup> So the training seems to be better across the country in addiction psychiatry.

The goals set out by the IPS guidelines have been realized to a large extent, but further expansion of the framework to comprehensively cover the behavioural addiction and community psychiatry aspects, along with periodic program assessments and modifications would be the way ahead.

#### **Geriatric Psychiatry**

The United Nations report on world population prospects from 2010-2050 predicts a 55% growth of the population in India. But what is more striking will be the growth rate of the geriatric population with a 326% increase in those aged above 60 and a 700% growth in those above 80 years.<sup>18</sup> The geriatric psychiatry programs therefore have received greater attention in the last few decades. The geriatric psychiatry program in the UK is 3 years after three years of core psychiatry training. In Australia and New Zealand, the 2-year geriatric psychiatry training is part of a 5-year fellowship/residency program. Geriatric psychiatry training programs vary from six months to five years between countries in Europe. A global survey reported the duration of geriatric psychiatry training from 3 months to 5 years.<sup>19</sup> Realizing the scale of the problem, Indian institutes have started DM and PDF courses in geriatric psychiatry.

The situation however seems too underplayed in the postgraduate training curriculum including the IPS Guidelines and the MD and DNB training programs. The IPS guidelines allocate 2 weeks of rotation for geriatric psychiatry training while there is no geriatric psychiatry posting in the MD and DNB curriculum. <sup>6, 10, 13</sup>

#### The broad areas covered as per the IPS guidelines are:

- Psychiatric evaluation of the elderly with specific emphasis on disability, activities of daily living, and caregiver issues
- · Use of specific instruments to evaluate cognitive functions and psychopathology
- · Comprehensive management and caregiver intervention

This is a highly reductionist approach to a specialty that requires extreme care in diagnosis. Assessment and management are often made difficult by medical co-morbidities, other medications, neglect, and elder abuse. The art of obtaining history, eliciting mental status and cognitive examination are themselves challenging in geriatric psychiatry. The need for medical investigations, standardized assessment scales and batteries, and multiple consultation-liaison procedures further make the area complex. Finally, the science and art of pharmacotherapy in the elderly balancing their physiology, medical co-morbidities, and co-prescriptions, and the issue of medication tolerability all are factors that make geriatric psychiatry a challenging area.

The geriatric psychiatry training as part of the postgraduate training is currently considered as good/very good by only 52.6% of the residents. Further, even in resource-rich Group I institutions, the training is considered good/very good by only 59.8% of the residents.<sup>14</sup> Echoing the training scenario, only 52.7% of the residents rated their trainers as good/ very good in geriatric psychiatry. So, total neglect in MD and DNB curriculum is a matter of serious concern as increasingly

psychiatrists will be called in to treat geriatric patients in the coming decades with an exponential increase in demand that cannot be covered by specialists in geriatric psychiatry. So, a revamping of the curriculum and training duration is a legitimate demand.

#### **Forensic Psychiatry**

Psychiatry has a unique relationship with the law and is a specialty with a law specifically designed to care for the mentally ill, the Mental Health Care Act of 2017. In addition, there are multiple laws like the Persons with Disability Act, National Trust Act, Juvenile Justice Act, and Protection of Children from Sexual Offences Act with interphase with psychiatric practice. A review of the responsibilities in being a forensic psychiatrist stated clearly that the current 2 weeks postgraduate posting in forensic psychiatry is highly insufficient to make trainees competent in handling the legal issues related to psychiatry. The practice conditions are also reflective of the same scenario. In India, most psychiatric units do not have a dedicated forensic psychiatry ward/unit. Evaluations are conducted by the treating psychiatrist who has not undergone any structured training which has resulted in their quality being deemed insufficient.<sup>20</sup> In his presidential address at ANCIPS 2014 Dr. T. V. Asokan gave a gist of the training format that should be adopted for forensic psychiatry. He emphasized that basic didactics can be taught in a seminar format. He pointed out the role of self-assessment questions and tests to help trainees to remember key concepts. The need for additional CMEs, seminars, and workshops at national and state levels was also proposed. He concluded by stressing the need for every trainee to be given mandatory training in writing a forensic report.<sup>21</sup> The recent implementation of PDF and DM courses might produce experts in this field. However, in a country of the scale and scope like ours, it would be more prudent to increase the allocation in forensic psychiatry training of postgraduates.

The IPS guidelines allocate 2 weeks of rotation for forensic psychiatry training. The MD curriculum clubs forensic psychiatry with psychiatric hospital posting and allocates a total of 1 month to complete both without specifying the duration to be dedicated exclusively to forensic training. However, there is no forensic psychiatry posting in the DNB curriculum. <sup>6, 10, 13</sup>

#### The broad areas covered as per the guidelines are:

- Admission / Discharge procedures
- · Psychiatric testimony (fitness to stand trial, assessment of psychiatric state)
- Insanity plea, criminal issues (Relevant IPC / CRPC sections)
- · Civil Marriage and divorce, testamentary capacity, child custody, property issues
- ACTS Mental Health Act (to be read as MHCA 2017), NDPS Act, PDA, CPA further POCSO Act, RPWD Act, National Trust Act, its antecedents, critique, and application
- · Other developments Initiatives public initiatives, judicial initiatives, NHRC initiatives, etc.
- Psychological sequelae of victimization
- Psychiatric ethics Basic human rights, ethical principles in care, confidentiality, research, informed consent for treatment, preventing boundary violations
- · Training for the psychiatrist in court
- Liaison with legal services authority, handling mental health and substance use in prison and other correctional settings

In the current scenario, competence in forensic training is rated as good/very good by a truly appalling 21.1 % with 45.5% rating it as poor/very poor. The faculty competence was found to be good/ very good by 42.1% of the residents, a figure that is unacceptable.<sup>14</sup> However, the fact that the faculty competence rating was high compared to residence competence points to the lack of a dedicated forensic program. The IPS broad framework itself requires a longer specifically designed forensic posting to complete the aims set. So forensic psychiatry training is an area that needs immediate prioritization.

#### **Rehabilitation Psychiatry**

The psychosocial rehabilitation services are disgracefully lacking and less than 2% of the required resources are available for the patients.<sup>22</sup> The poor state of affairs can largely be attributed to the dearth of trained manpower in psychiatric rehabilitation. There is little focus on rehabilitation during postgraduate training.<sup>23</sup> The current MD and DNB curriculum does not specify a posting for rehabilitation psychiatry, despite the IPS guidelines setting forth a 1month rotation in psychiatric rehabilitation.<sup>10, 13</sup> The broad areas covered as per the guidelines are:

- · Knowledge of deficits and disabilities associated with chronic mental illness
- · Familiarity with tools to assess disabilities, including rating scales
- · Strategies of tertiary care and disability limitation
- Long-term community care of the chronically mentally ill including daycare, residential care, networking with community agencies
- Rights-based approaches

The current rehabilitation training was rated good/very good by a disappointingly low19.8% of residents.<sup>14</sup> The figure is a shocking indictment of the priority given to rehabilitation in psychiatric training. The minimum prescribed 1 month in rehabilitation by the IPS guideline should be recognized as mandatory by the NMC and NBE if the situation has to show any signs of improvement.

#### Interventional Psychiatry - The Future is here

The development of interventional psychiatry has now made it almost a prime subspecialty. Mandatory training in intravenous psychopharmacology (e.g. ketamine), non-invasive brain stimulation (ECT, tDCS, and rTMS), and invasive neurostimulation (VNS and DBS) therefore should be offered to all residents. Training in ECT was rated as good/ very good by less than 50% of residents. The training in rTMS was rated as very poor/ poor by 69.9% of the residents and intravenous pharmacology was not even a consideration in the survey.<sup>14</sup> These modalities are efficacious and often lifesaving. ECT was there before the dawn of psychopharmacology and we have no excuse for being undertrained in it. So dedicated interventional training is something that is essential and needs to be worked into the curriculum.

# Competent Subspecialty Training- the Entrustable Professional Activity (EPA) Paradigm

The future will see the addition to the curriculum of specific competencies as part of CBME. The role of certifiable competencies will be of great importance in this context. The theoretical knowledge and clinical skills that are essential for competent practice should be made into certifiable competencies. This will ensure that the trainees progress to the summative assessment stage only after they have completed these competencies in an adequate manner as certified by their trainers. This will shift the onus from a few structured tests at the end of a rotation as the basis of completion to clearly defined goals and competencies as the benchmark for the completion of a rotation. The trainee in such cases should be bound only by the total duration of the specialty rotation and should be allowed to progress at an individual pace across set competencies with periodic formative assessment on demand to certify the different competencies. A summative assessment at the end of the rotation in such cases will be redundant. This may help in the standardization of training and assessment of postgraduates across specialty rotations.<sup>24</sup>

Isolated certifiable competencies will not help the trainee handle a case in the real-world dayto-day clinical setting. The trainee, for example, may know how to elicit a history of alcohol withdrawal but is not adept at clinical and mental status examination, and in formulating and implementing a management plan. The certifiable competencies should progress from isolated tasks that may not have a daily clinical work implication to making a trainee proficient to take up responsibility. This will help the trainer to decide to transfer responsibility to the trainee, called an entrustment decision.<sup>24</sup> To reach that stage a real clinical scenario needs to be divided into multiple certifiable competencies, which then can be integrated holistically to translate to a clinical task that then can be entrusted.<sup>25</sup> Thus, the trainee by moving through individual competencies as in the earlier example of eliciting history, assessment of physical and mental status, and formulating and implementing a management plan ends up managing a daily professional activity like managing a case of alcohol withdrawal, which then becomes an entrustable professional activity or EPA. Such EPAs can be constructed across specialties and across rotations to make every subspecialty rotation standardized in transferring the desired competence to the trainee. This will make trainees proficient in different aspects of each subspecialty.

#### Take Home Message

- Psychiatric subspecialty training is uneven across subspecialties and institutions.
- With the growth of many subspecialties to independent specialties, the need for training becomes all the more necessary.
- The IPS PG Training Guidelines though a path-breaking effort, little has translated to teaching.
- Evaluation of resident training shows glaring disparities in the quality of training in CAP, geriatric psychiatry, forensic psychiatry, and interventional psychiatry.
- Training in many centres can be upgraded by collaboration with centres rich in resources for a particular sub-specialty.
- There is a need to broaden the number of subspecialties being prioritized to include geriatric psychiatry, forensic psychiatry, rehabilitation, and interventional psychiatry.
- The training in the new era of CBME should be re-designed to make residents competent in different aspects of subspecialty case management so that tasks can be confidently entrusted to them.

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### **CHAPTER 11**

### PG examination in Psychiatry: An overview

#### **1. INTRODUCTION**

Preparation for the final MD Psychiatry examination essentially starts three years before - at the time of joining the Residency Program! Although there are NMC mandated periodic formative assessments in the course of the MD program, these are purposed to facilitate feedback and course correction to the trainee during the residency. The real summative examination, the 'final decider' so to say, that qualifies one to be a certified Practicing Psychiatrist, is the final MD Psychiatry University examination.

It is in this context that the present guidance on how to prepare for 'the examination' will be useful for the residents in training. This guidance may also be useful for faculty in creating appropriate structures and work flow in the curriculum in their departments, to facilitate adequate training, for the residents to clear the final examination.

Although the following paragraphs may seem to be focusing on the examination perse, their emphasis is really on the methods of gaining a deep and comprehensive understanding of the plethora of subjects encompassed in this course; acquiring appropriate clinical skills; and learning the basics of analytical and synthetic methods of discourse. This will in turn help in critically evaluating scientific information and incorporating it into a fund of knowledge usable in clinical practice. Such practice will be scientifically based, multifaceted, and with a biopsychosocial perspective of the causation and amelioration of psychiatric disorders. The trajectory of learning proposed here, will also help in the development of a similarly nuanced interest in research and future upgrading of knowledge and skills.

Ultimately, it is the residents' competence in these matters that are evaluated in the final examination.

#### 2. THEORY

The theory examination is often considered less important as it doesnot involve any practical clinical skills. It would be prudent to not underestimate this form of evaluation, not only because it contributes to 400 marks in the university examination, but also as it provides the resident with the base for understanding all the practical aspects of Psychiatry.

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#### 2.1 Preparation for the theory examination:

While most trainees realise the importance of learning interviewing skills and examination techniques from the inception of their residency training, reading is often given a back seat, the most common reason cited being the inability to find time after the clinical work is done. This leads to a woefully poor beginning to one's psychiatry career. It is important to understand that reading theory should go hand in hand with clinical work from day one of the training. During the first 6 months of the residency training, the reading can focus mainly on psychopathology, classification, overview of disorders, introduction to basic sciences and social sciences. The rest of the first year must be devoted to learning the details of the disorders while continuing to remain in touch with the basic aspects learnt in the first half. The second year will focus on further reading about the various disorders including treatment strategies and research methods as well as honing the ability to critically analyze reading material. In the final year, the resident must also focus on the specialties, neurology and recent advances while continuing to improve knowledge on the basic sciences and social sciences. Trainees often report getting overwhelmed by the vastness of the subject and profess an inability to know where to start. Beginning with a case-related theory learning is a good approach, the resident reads the theory related to the disorders he/ she has encountered in the OPD/ ward that day. Particular emphasis must be placed on understanding the behavioral and social Sciences, as trainees are barely acquainted with them during their undergraduate training. Remember, all the clinical aspects of psychiatry training evolve from the aforementioned disciplines. The trainee must also brush up on his / her neuroanatomy and neurophysiology knowledge gained during the initial days of MBBS training as they are the very edifice on which biological psychiatry stands. The trainee will do well to remember that only continuous and systematic reading over three years can sufficiently prepare him/ her to face the theory university examination. The last 6 months can be utilized for much focused reading and collecting relevant material necessary for the examination.

Unlike undergraduate training, post graduate training does not have a dedicated theory class's schedule. Self- directed learning is the order of the day. Passive reading is not going to be retentive, hence it is a good idea to make reading more active by making concise notes of the chief points of the topics that have been discussed/taught. These will be very helpful while attempting to revise prior to the examinations. Reading must be from multiple sources, and it is inadequate to confine oneself to only one book/ article while reading a particular topic. One must ensure that standard publications are read. A comprehensive textbook always confers extra advantages while compared to just a textbook, irrespective of whether the resident is reading psychiatry, neurology or the basic sciences. Having access to multiple standard textbooks will also ensure that one reads a particular topic that is especially well written in one textbook, while another textbook can be perused for a different concept. While choosing articles, the trainee must take care to access good journals; reviews and meta-analyses compiled by researchers with a fair degree of expertise in the particular field of research as well as RCT's for original research findings and standard practice guidelines for assessment and management of psychiatric conditions. These articles (either the hard or soft copies) must be compiled and kept for future reference. It is also a good practice to read seminal and historical articles in their original form, as they often give one a very rich and detailed understanding of phenomenology. Since one cannot exhaustively cover all topics related to such a vast field, in spite of one's best efforts, making it a practice to read extensively can help. Also, the trainee needs to keep in mind that the theoretical understanding of mental illnesses is still an evolving field, hence he/ she needs to go back and read the same topics periodically in order to keep abreast with the latest understanding of aetiopathogenesis and treatment strategies as well as developing a clear conceptual framework. Cross referencing while reading helps get a better mental representation of facts. It is also good to be vigilant so as not to miss the often-neglected specialities like forensic,geriatric, gender related psychiatry, issues related to deprived sections of society, psychology and sociology, psychosocial therapeutics, community and policy issues. Departmental seminars are often a good source of potential theory questions. Attending CMEs with theory-oriented themes would also contribute to learning theory.

Most teaching departments subscribe to the policy of a continuous and periodic assessment rather than having only a single university examination at the end of three years of training. Written examinations are often conducted twice a year, with the papers pertaining to the residents' current level of training. These are evaluated by senior faculty in the department, with constructive feedback provided to the trainees and helping them adopt remediation measures. Several universities also conduct a mock examination about a month prior to the actual university examination. Preparing well for these examinations will go a long way in reducing the burden of learning just prior to the qualifying examination. The days immediately prior to the examination must be utilised for revising the notes prepared, spending more time on concepts that the trainee is not yet clear on or has difficulty in understanding. Having a look at previous years' question papers will give the student an idea of the pattern and types of questions that are generally asked. It is also important to look after one's self-care, nutrition and get adequate sleep.

#### 2.2 The Theory Examination:

The qualifying examination has several objectives, all of which are taken into consideration before declaring that a candidate has gualified. The aim is to evaluate the theoretical and applied knowledge that an examinee has gained in the course of training, to assess if the trainee is competent to practice psychiatry and adequately identify, evaluate and manage psychiatric disorders. Each training centre has its own guidelines to decide if a trainee is eligible to take the examination. This is usually based on a good attendance record as well as participation in all training activities as reflected in the trainee's log book, as also approval of the dissertation submitted. Traditionally, the theory examination has four papers of 100 marks each, consisting of 2 long questions and 6 short notes. The marks distribution across these questions may be different in different universities. MCQ's may also be a part of the theory assessment. The examination is conducted over 4 days, each paper is allotted a time of 3 hours. The National Medical Commission has given clear guidelines about the content to be covered in the four papers. The theory papers include Basic Sciences as related to Psychiatry (both neurosciences and behavioural sciences), Clinical Psychiatry, Psychiatric theory and Psychiatric Specialties, and Neurology and General medicine as related to Psychiatry. Recent advances must form a part of all papers. The questions are prepared in such a way as to confirm knowledge of the objectives specified during training.

On the D-day, the examinee must make it a point to read the theory question paper carefully, and understand the questions before answering. A skeleton answer can first be written in the

rough work area of the answer sheet for the long/ conceptual questions before transcribing them onto the answer sheet. It is important to highlight the main points in each answer, either by underling or using a different coloured pen. Point wise answers are better than rambling text as the examiners are likely to be able to grasp the relevant points better. Use of diagrams is a very powerful tool in conveying one's knowledge in theory examinations, as also flow charts. The trainee must take care to write only what has been asked and not additional material related to the condition but not asked in the question. Also, it is desirable to write only what one is certain of and not misquote. One should avoid being obscure, unclear or unintelligible. When the question is on classification or treatment strategies, sticking to universally accepted classificatory systems and practice guidelines is likely to earn higher marks. It is advisable to make a mental note of the approximate time needed for each answer (for e.g., half an hour each for the long questions; 15 minutes for the short notes) so as to not fall short of time at the end. One should answer all questions, number them correctly and try to reserve some time at the end for a quick perusal of what has been written, this may aid in making corrections as well as ensuring that questions haven't been overlooked.

#### 2.3 After the theory examination:

Rather than considering it as a tiring job that had been done with, a wise examinee should introspect on the deficiencies that are likely to have come in his or her answer scripts. A wiser examinee will read up on these topics not only to fill in the knowledge gaps but also to be ready for the viva voce where these deficiencies may be addressed by the examiners.

The main thing to remember when faced with the theory examinations is that all the systematic reading that has been done through the 3 years of training and the knowledge accumulated therein will help the trainee to clear the papers with flying colours.

Remember, Rome was not built in a day!

#### 3. The Practical Examination

The National Medical Council of India in its revised guidelines for Postgraduate (PG) psychiatry course mandates the evaluation of clinical or practical skills in the following format. The four major stations of assessment include

- a. Presentation of long case of psychiatry (100)
- b. Neurology short case (50)
- c. A short case psychiatry (50)
- d. Viva -voce (100)

The 2022 revised guidelines emphasize the need to review the log-book records and day to day observations during training while conducting the assessment. The more recent PG Medical Education Regulations 2023 (PGMER-23) by NMC added additional 100 marks for the practical exam. Two additional evaluation have been included -

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e. OSCE (80)
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f. Thesis Viva (20)

Thus the practical examination will also be for a total of 400 marks.

#### 3.1 Preparation for the practical examination

The aim of the clinical or practical examination is to assess the examinee's competence in some of the more pertinent areas under psychomotor domain such as the interview skills, arriving at a diagnosis and to map out a management plan in the given time frame. The viva-voce component focuses on the cognitive domain in relation to its potential utility in clinical scenarios. Preparation for the practical examination starts from day one of the residency training. Beginning with understanding the format of case history collection, training in physical and mental status examination during clinical postings to the collective experience gained over the three years of case discussions, provides the basic framework for the case-based assessments in the practical examination.

Being familiar with the case proforma helps in rapid collection of history and ensures that all relevant information is obtained as part of the work up. The multitude of cases seen over the period of residency, equips the examinee with the skill to quickly collect information and interpret the findings of the physical and mental status examination. It goes without saying that the preparedness of the examinee is proportional to the number and the variety of cases worked up and observed during their postings. Doing a thorough physical review for every patient including anophthalmic fundoscopywill help in honing examination skills. All residency trainees must have a complete physical examination kit that does the rounds with them from day one of training. Trainees often form their own algorithms at the sub conscious level for probing and arriving at a diagnosis. Diligently keeping track of the discussions during clinical case presentations will prune these algorithms and give the residents a glimpse of what can be expected in the exams. However, scoring in the practical exams is an art and needs organization of information and crisp presentation to make the required impact on the examiner.

By the time the resident reaches the final year, he/she needs to start timing the case work up and aim for completing the same in less than 1 hour including documenting the pertinent details. Subsequently the resident needs to collect information that was missed out and understand how the interview could have been done better, in the given time frame. With practice, it becomes a spontaneous process.

#### 3.2 Psychiatry long case

The Long case carries the most marks (100) for any given segment of the practical examination. The aim of a long case is to ensure adequate evaluation for arriving at a probable or differential diagnosis and present a complete management plan. Patients who present with diagnostic or management challenges are typically chosen as long cases for the examination.

#### 3.2.1 Working up the long Case

Time management is the key for obtaining a complete history and performing an adequate Mental Status Examination. Attention should also be given to assess Levels of Functioning, Premorbid personality, psychosocial contexts, Stress and Coping styles etc. A thorough Physical examination is a must. During the physical examination the candidate can continue to interview the client to get additional information missed earlier. Key points related to family tree, specific sections of history and MSE should be written in the record sheet while conducting the interview

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itself. An overview of the working up of the Long case is mentioned in the table below.

#### 3.2.2 What should be included in the evaluation

· The examinee must document the chief complaints from both patient and informant in the

Time Management	Complete HOPI
<ul> <li>15-20 minutes for history + part of the MSE</li> <li>10 minutes for additional history</li> <li>20 minutes to complete MSE + Physical examination</li> <li>10 minutes for writing case sheet + clarification</li> </ul>	<ul> <li>Elaboration of the chief complaints</li> <li>Elaboration on probed additional symptoms</li> <li>Elaboration on probed associated symptoms</li> <li>Mention of the Negative history- Unreported symptoms - Associated &amp; comorbid symptoms - Symptoms to rule out differentials - Symptoms to rule out medical conditions</li> </ul>
Do's in the Presentation	Don'ts in Case Presentation
<ul> <li>15 minutes for presentation</li> <li>5 minutes for summary/ formulation</li> <li>30-40 minutes for discussion</li> <li>Do follow department template</li> <li>Own up if a portion of history is missed (due to time constraints)</li> <li>Present MSE finding- followed by interpretation.</li> <li>Physical examination findings with mention of specific negative findings.</li> <li>Do use resources such as any files, reports available with patients which may sometimes be</li> </ul>	<ul> <li>Avoid trivial details – saves time and prevents digression.</li> <li>Don't miss relevant history/ examination. Reasons of lack of time and uncooperativeness may not be accepted always. E.g.: Missing sexual history in a person with erectile dysfunction.</li> <li>Don't contradict yourself in your observation. E.g.: Patient restless and fidgety but mood and affect are happy and cheerful.</li> <li>Don't begin with statement of patient being uncooperative. Report what could be done first and then indicate challenges for completion of the task.</li> <li>Do not bluff or base your views on diagnosis communicated/ noted through peers or records.</li> </ul>

language used by them verbatim Include as many complaints as are reported and note them down in chronological order. Elaboration should include levels of dysfunction, course, treatment response, apart from phenomenological details and evolution or subsidence of symptoms and behaviour. Try to use relevant ICD-10/ ICD-11 diagnostic criteria wherever possible to probe additional and differential symptoms.

 Relevant additional history such as stressors, life events, impact on functioning, relationships and work must be elicited. Interpret if they seem to be a precipitating or maintaining factor. Ruling out relevant medical comorbidities should be part of history, especially endocrine and metabolic abnormalities.

- Family: The examinee must interpret available data cautiously regarding family history, genogram, support systems and environmental influences. Focus on getting family history of mental illness, suicide, neurological conditions, addictions and chronic medical conditions. Where feasible, ask leading questions to quickly elicit the nature of psychiatric condition in other family members. (E.g., whether illness like that of the index patient, episodic/ continuous, key phenomenon, age of onset, treatment, and response to treatment etc.). This will help in arriving at a differential diagnosis and planning management.
- Personal history: The examinee must elicit relevant details regarding childhood, sexual history, challenges at school, home, occupation as well as menstrual history where applicable with specific exploration for PMDD/ PMS symptoms. Premorbid personality evaluation is to be done as per the format used in their institution.
- Mental Status Examination: The examinee can follow the standard format taught in one's institute. The interview should preferably be in the language the patient is fluent in. The time frame of reference for most of the psychopathology is the last one week. Observation regarding Thought form, possession and content; Perceptual abnormalities, Cognitive functions and Insight must be accompanied by verbatim records. Appropriation elucidation of the cognitions and other experiences that are usually associated with the condition the patient is suffering from, should be explored proactively by the examinee. Kirby's proforma may be used in case of extremely uncooperative patients.
- **Physical Examination:** The examinee must ensure that the physical examination is complete with a special focus on relevant physical findings based on the case scenario. A neurological examination is mandatory and should include a fundus examination. For this, it is mandatory that he/she carries a complete examination kit that includes anOphthalmoscope. He/she should also look for possible common adverse effects related to psychiatric medications. Specific negative findings which are case relevant can be documented.

#### 3.2.3 Presentation of the case

- The examinee can present the case in the format followed in his/her parent department. The presentation should be in a smooth flow. Before proceeding with the summary/ formulation, it is a good practice to pause and ask the examiner to continue or prepare for discussion. Candidates need to be ready with both the summary and formulation.
- [Note: A Summary is a simple compilation of the various findings in the case. It includes basic sociodemographic data, major findings in current, past, personal, family and other features of the history. This is followed by the positive and key negative findings on MSE and Physical examination. Formulation on the other hand is a conceptual summarization of the case with focus on elements including key positive and negative findings from overall longitudinal history and MSE. The information brought out not only helps establish the diagnosis, but also incorporates essential details from the evaluation that facilitates prognostication, treatment decision and guide the management plan.]
- The examinee must provide a working diagnosis or a differential diagnosis (as warranted by

the case) at the end of the presentation. The diagnosis must be based using standard criteria such as the ICD10/ICD 11 or DSM 5 as practiced in the parent department. Criteria for diagnosis or differential diagnosis (wherever appropriate) must be mentioned in the order of the most likely possibility first, with clear reasons for such prioritization

 The management plan should begin with a decision of managing on OP or IP or Day care etc basis, as relevant for the patient. Further evaluation, relevant clinical and laboratory investigations, rating scales and assessments will need to be mentioned. Immediate action plan in the treatment followed by choice of key medications, additional medications if required, are to be mentioned as also psychosocial interventions. The Examinee will need to be ready with amultidisciplinary management plan for the acute, continuation and maintenance phases. It is desirable to be specific as to the choice of drug and therapy of choice rather than generalisations.

#### 3.2.4 Discussion of the case

Examiners often focus the discussion on what has been elicited and presented in the case. They may probe to check the efforts made by the examinee to explore the actual findings. When in doubt, the examiners will likely call the patient / informant and ask the examinee to re-elicit the history or examination findings. Hence, do not venture and bluff. For information that could not be collected completely, the examinermay ask for an elucidation of the specific information that would be relevant but nor elicited.

Examiners may challenge the examinee's diagnosis with a view to assessinghis/her understanding of the process of arriving at a diagnosis or a differential diagnosis. One needs to be aware that this does not necessarily indicate that the diagnosis made is incorrect. As part of the evaluation, examiners often test both the examinee's ability to be firm on the decision as well as openness for considering other possibilities. One can acknowledge the possibility of altered diagnoses or management plans and indicate why one has chosen a particular view point. One need not be stubborn in sticking to an untenable diagnosis when the examiners are giving clues to alternate possibilities.

The discussion on management will require the examinee to justify the proposed management plan. Alternative plans may also be given to test the theoretical knowledge related to the case. The examinee will also need to be prepared to answer questions related to more theoretical aspects of the case such as likely course and outcomes, associated legal issues and etiological theories linked to the case at hand. An overview of the preparation for the discussion of the long case is tabled below:

Likely questions in discussion	Preparation required
<ul> <li>Definitions/ Differentiation of various phenomenon in the case</li> <li>Eliciting certain findings in MSE Relevance of various sections in</li> </ul>	<ul> <li>Be thorough with eliciting and interpreting phenomenology.</li> <li>Be familiar with the standard process of testing.</li> </ul>

history, additional history and examination for diagnosis/ management

 Diagnostic Criteria of diagnosis/ Differential

Questions about choice of medications, investigations and management. Questions on alternatives as well as questions on investigations and nonpharmacological management.

 Risk and Prognostic factors, course and outcome of the specific condition  Importance of the sections in terms of risk, prognosis, psychosocial factors impacting illness.

- Stick to criteria (ICD 10/11 or DSM V) followed at your institute but know about key differences in the other system.
- Named or Sentinel Studies/trials supporting the treatment of choice.
- Drug of Choice and gold standard medications. Guidelines for treatment decision – at least one of them should be well known – IPS, NICE, Maudsley, and CANMAT etc.
- This information can often be found in standard textbooks and review articles.

#### 3.3 Neurology Case

In clinical practice, it is essential to differentiate primary Neurological problems from Psychiatry/ psychological problems. This is because of the significant overlap of symptoms across the two connected yet unique medical specialties. The Neurology Case carries 50 marks. The minimum expectation is of being able to do a thorough neurological examination and arriving at a broad diagnosis of the type of brain injury responsible for the patient's condition. The Examinee is also expected to know the basic medical management in such situations.

#### 3.3.1 Preparation

The Examinee must ensure that he/sheis thorough with the neurological examination and carry a complete neurology kit including items needed for examination of cranial nerves, ophthalmoscope, tuning forks, knee hammer etc. (The trainee must have practiced the use of these instruments throughout his/her residency). Reading standard clinical textbooks of neurological examination is a must. Dedicated Neurology postings should be utilized as a golden opportunity to learn about various neurological signs and familiarize oneself with the algorithms used to arrive at a diagnosis. It is also pertinent to know the various neuropsychiatric manifestation of common neurological conditions such as Stroke, Parkinson's and other movement disorders, Epilepsy, Myasthenia, GBS, Encephalopathy, tumors to name a few.

#### 3.2 Patient evaluation and Presentation

One can follow a standard medical proforma including a standard neurological examination proforma. The examinee get 45 minutes to an hour to evaluate the patient. Focus on the history must be on the onset, progression, character, time of occurrence, duration of symptoms, periodicity, aggravating/ relieving factors, associated symptoms etc. The Examineewill be expected toelicit any associated cognitive and behavioural symptoms in relation to the neurological

condition. Dedicating at least 30 minutes for the detailed neurological examination will help in making a meaningful diagnosis/ differential diagnosis.

The General physical examination is essential while seeing a patient with neurological symptoms, specifically to look for any neurocutaneous markers and deformities. It is necessary to remember to examine carotid and peripheral pulses, thyroid, skull and spine as well as gait (which is often missed). Complete neurological evaluation should include higher mental functions and lobe functions where required (such as in stroke, cognitive disorders). One must follow a standard neurological examination proforma.

The examinee must try arrive at a broad diagnosis based on clinical findings with localization of the lesion and mention of possible aetiopathology. He/ She should not rush to see any available imaging or discharge summary or clinical notes and bias the diagnosis based on the recorded information, unless the examiner specifically asks the candidate to review the scan and opine.

#### 3.3.3 Discussion and Demonstration

After presenting thehistory, examination and diagnosis, the examinee should be ready to give an overview of the treatment with an outline of basic line of management. He/she must also bring out relevant psychiatric and psychosocial aspects of the case into discussion of the management part. Examiners will often ask thecandidate to demonstrate certain signs as well as to interpret radiological images related to the case.

#### Tips for neuro evaluation

- Expose the part of the body to be examined.
- · Examine from the "right side" of the body.
- Follow textbook description of eliciting the signs.
- · Examine the normal side first and then the other.
- If there are challenges to perform due to comprehension, acknowledge and inform.
- If missed a test, acknowledge, do not invent findings examiners will cross check.
- Be prepared to read the neuroimaging findings and familiarize yourself with the reading of the CT/MRI/Angiography scans.

#### 3.4 Psychiatry Short Case

The psychiatry short case carries 50 marks. This is often a spotter for diagnosing. The aim of the short case is to evaluate the trainee's ability to arrive at a quick diagnosis and devise a specific management plan. The pattern of short case differs across various centres and may involve a brief case work up, eliciting a finding in front of the examiners, spotters, OSCE, OSPE or combinations of the same. Accordingly, the marks may be split across the components of this evaluation. Based on the PGMER-23 regulations, OSCE will be a separate assessment in itself to assess PGs for specific competencies.

#### 3.4.1 Case Work up and presentation

The examinee will generally be given 30 minutes to work up a short case. He/she may be

asked to do the interview and elicit specific phenomenology in the presence of the examiners. One must comply with the instructions given in the examination. The discussion regarding the short case is usually limited to eliciting phenomenology, justifying Chapter 11 156 Psychiatry in PG Medical Education the diagnosis and drafting a quick management plan with deliberation on the choice of management. One's interview skill may also be rated. If OSCE or OSPE/ spotter are involved, it can help to score better as the assessments are focused, testing the trainee's skill and knowledge through a straightforward and objective scoring system.

#### 3.5 Viva-voce

This section assesses the candidate's theoretical and practical knowledge on a wide variety of topics in psychiatry. Patterns for viva voce differ across centres. Two to Four stations are created based on the number of examiners. Division can occur based on sub areas to cover such as Psychology concepts, Psychological tests, Rating scales, Neuroanatomy, Psychopharmacology, EEG, Neuroimaging, Adult psychiatry, Child, Addiction, Rehabilitation, Forensic, Mental health policy or other subspecialty of Psychiatry. Time is usually limited, with about 10-15 minutes per station/ examiner/candidate.

The pattern of questioning is aimed to elicit short and specific answers, rather than descriptions. Sometimes, theory paper questions that had not been satisfactorily answered may be asked in an attempt to check if the candidates have tried go back and learn what they did not know very well. The examinee will do well to avoid guessing answers as that may lead the examiner to 'difficult' areas. When given an opportunity, the examinee can express the area of interest (only if he/she is well versed in it). The examinee also needs to be thorough with the dissertation done as the examiners may ask questions on the concept, statistics or results generated.

#### 3.6 **OSCE**

The Objective Structured Clinical Examination or OSCE format has been recommended to be included as a separate entity in the practical examination as per the PGMER-23 guidelines. This is to tune with the competency based PG curriculum and facilitate assessment of specific competencies. The number of stations (usually 2-4) and components of assessment may differ across universities and in the course of time. However the principles remain same, i.e.; specific task, to be completed in a given time frame and a guide checklist to the examiner for objective assessment. The competencies assessed may include eliciting psychopathology, performing specific tests, psychoeducation, clarification of certain situation/ events given a brief background. A detailed description on this assessment method can be found in another chapter dedicated for OSCE in this book.

#### 3.7 Thesis Viva

The thesis viva carries 5% of the total practical marks which is 20/400 and is aimed at giving weightage to the thesis work in the final examination. While, this often would be included under the general viva section, the PGMER-23 has mandated a separate evaluation by the external examiner (outside of state) and scoring based on quality of the dissertation and performance in the thesis specific viva.

#### 3.8 Demeanor of the candidate

While this may not be a direct marks fetcher, the body language of the candidate communicates a lot regarding the confidence level of the examinee. While some anxiety in the exam situation is natural, some behaviour may send wrong signals e.g., frequent shuffling of papers, being restless, jumpy, hyperactive, not maintaining eye contact, low volume of speech, pauses during presentation, tears, swooning etc. One may take slow, deep breaths before the presentation, maintain eye contact with the examiner and present with confidence. When not sure, it is better to acknowledge lacunae in information unless asked by examiner to take a wild guess!

#### 4. CONCLUSION

The above paragraphs are not meant to scare away a junior resident early in his/her career, by pointing out the steep mountain to be climbed. It rather is meant to give the resident the wherewithal, to climb that mountain, with appropriate effort, in a timely manner, to reach the top successfully.

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### CHAPTER 12

## Assessment methods in Post Graduate Psychiatry Training

#### Abstract:

Assessment of competency is always a challenge for trainers. Structured and uniform assessments affect the trainee. Traditional assessment methods like written examinations, bedside clinical examinations, and viva voce were cost-effective and easy to conduct with limited human resources. However these are subject to many biases, could assess only limited knowledge and skill, and chance factors could play a role at different levels. These disadvantages will increase if non-standardized patients and evaluation techniques are used. Objective Structured Clinical Examinations (OSCE) and their adaptations have revolutionized the competency assessment as they handle most of these deficiencies and biases. OSCE and its adaptations can be used for training and practical skill development apart from evaluation if well designed. In India, OSCE is used only in a few centers for evaluation purposes as a part of formative assessments. However, in the Indian setting, there is a need to develop OSCE models for psychiatry.

#### I. Introduction

Various assessment methods have been developed in the field of medicine every now and then to address the competency of medical students and residents. The assessment methods have a positive effect and reflect what is valued more in the course, which will stimulate the learning of the curriculum in the residents. The competency assessment of a trainee is always a challenge for educators or trainers. "Competency" is defined as the "ability to do something well and efficiently,<sup>[1]</sup>and the assessment is required periodically to monitor the progress during the course and at the end of the residency. It is crucial since the qualified graduate will move to the next level in their career (i.e., post-graduation), post-graduate specialists will manage the patients independently after that, and the certification after the assessment promises the patients that the certified doctor has the competent skills to manage the patient. If non-standardized patients and patterns are employed to assess the competency, there is a greater risk of losing sight of key learning objectives and what should be prioritized for learning. By using the standard assessment methods, medical students and residents will have more idea of what will be focussed during the residency program and what will be evaluated in the final assessment.

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#### II. Timing of assessment

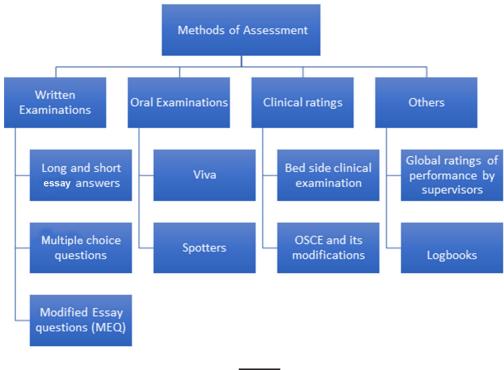
Assessment should be done during and at the end of residency. Assessments during the residency plays a very crucial role in giving regular feedback to the candidate and helping improve skill development. Broadly, assessments can be categorised into two groups. As per the National Medical Commission, India, the guidelines for competency-based

#### postgraduate psychiatry training, the areas that need to be included are:

- Formative assessments: Assessments should be conducted periodically, every 3 or 6 months, and should focus on areas such as progress in knowledge, patient care, academic skills, and performance in academic activities. (like case conferences, seminars, journal clubs, interdepartmental activities like psychosomatic rounds with surgery, medicine and neurology, research forums), participation in external or outreach activities and professionalism. The trainers of the institute will evaluate the residents periodically for this purpose.
- 2. Summative assessment: This is a one-time assessment at the end of the residency and include the thesis (should be submitted and accepted 6 months prior) to applying the final qualifying exams, theory examinations (long-essay and short answers), and practical examinations (long case, short case, neurology and viva voce). The evaluators are both from the residents' institute and the external evaluators from other institutes. <sup>[2]</sup>

#### III. Methods of competency assessments in medical education

Figure 1: Methods of competency assessments in medical education



Traditionally, across the globe, a medical student or resident's competency across all specialities was assessed by a combination of written examinations and clinical ratings/ clinical performance. The written examination consists of long-essay and short answer questons, enquiring into the knowledge the trainee has acquired about the subject or specialty they have chosen. This would inquire about the trainee's ability to recall the acquired knowledge/ fund of knowledge attained during the training and need not assess whether the trainee can apply the knowledge correctly in a given clinical situation. <sup>[3,4]</sup>In most medical institutes, this part of competency tests would carry 50% of the total marks, and the remaining 50% would be for clinical ratings assessed through bedside examinations (comprising of long cases and short cases), spotters, and viva voce.

In India, in psychiatry, for clinical ratings/ performance, usually a non-standardized actual patient is allotted for a long case for 45 minutes; the candidate is expected to take the history, do a mental status examination and physical examination, and it is primarily equivalent to a bedside clinical examination of other specialties, followed by 30-40 minutes of questioning and answering session with 2-3 examiners for the clinical reasoning and decision of the trainee. It is not compulsory in practice for a candidate to be assessed or observed while interacting with a patient and evaluating a clinical condition. The short cases include 2-3 non-standardized actual patients, and the candidate is asked to evaluate (allotted time is usually 20-30 minutes for an interview for each patient). The primary aim for short cases is doing the mental status examination, designing a management plan for the given clinical condition, and spotting the positive findings. The number of short cases kept for assessment differs from center to center. Unlike the long case, short cases give more chance to evaluate varied conditions and skills. A neurology case with demonstrable neurological signs, usually with or without comorbid psychiatry condition, primarily focuses on the candidate's approach, eliciting the signs and doing standard neurological examination (motor, sensory, cerebellar system, reflexes, gait) and fundoscopic examination. The usual time allotted for neurological assessment (history taking and physical examination) is 45 minutes, and discussion is usually for 30 minutes.<sup>[5]</sup>

In psychiatry, the clinical evaluation (long case, short case, and neurological examination) is influenced by three variables:

- the patient (cooperative/ non-cooperative/ guarded/ over talkative/ native and non-native language speaker)
- · the examiner (internal/external; examiner's areas of interest)
- the candidate (native and non-native language speaker)

The candidates' competency assessment will depend on the first two variables. This variability will be further enhanced with the use of non-standardized actual patients, and the chance of luck will enter the assessment. For example, a resident with below average performance throughout the training program may get a cooperative patient, and an above-average resident or bright student may get a guarded or non-cooperative patient. Further, with this approach, i.e., long case, short case, and neurological case-based evaluations, the discussion will be limited to mental status examination, diagnosis, management, style of presentation of the particular case, and a narrow/small area of curriculum will be assessed. While assessing, if the examiners are not using any structured method, there is a high chance of subjective biases in rating the

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performance. [3,6]

Multiple-choice questions (MCQs) allow for quickly assessing the vast curriculum in a single setting. MCQs test the ability to recall but are less powerful in assessing problem-solving abilities. MCQs usually stimulate superficial and exam-oriented study. Studies have shown that sole MCQ-based competency assessments do not correlate well with the clinical performance of the residents.<sup>[3,7]</sup>Modified essay questions (MEQ) are brief clinical conditions with follow-up questions and a structured scoring for each question. MEQs will test factual recall, cognitive skills like organization of knowledge, problem-solving abilities, reasoning, and writing skills. They can even be designed to evaluate reasoning, such as morality and ethics. It allows one to test more concepts in clearly defined areas than MCQs and Essay Questions.<sup>[8]</sup>

Conventional Oral Examination (COE) or Viva Voce is an oral evaluation of a candidate's knowledge and reasoning in the absence of a patient. Usually the questions are from MRI/CT scan film interpretation, case vignettes, EEG interpretation, instruments used in psychiatry, recent advances, and subspecialties. In the traditional method, if uniformity or structure is not followed, the questions posed to the candidates can be highly variable, leading to higher interrater variability and subjective biases. With this method, there is no scope to see how the knowledge will translate into skill. Structured oral examinations (SOE) are a better alternative to COE as they are designed assessments with pre-planned content and questions. For SOE performance, the use of a checklist is advisable.<sup>[9,10]</sup>

In 1960-1970, there was widespread dissatisfaction among medical education trainers in North America and the United Kingdom with bedside examinations for competency assessment. In the United States, the National Board of Examination (NBE) conducted studies on the reliability of bedside clinical examination with a carefully devised evaluation form used by two examiners on a single candidate (over 1000 examinations), which showed r= 0.25, a chance level agreement. Following this, in May 1963, bedside examinations were discontinued as a part of competency examination by the NBE, and various other approaches were tried. After this, new ways were looked into and tried across these countries, and gradually, there was a shift in competency assessment from knowledge-based to performance and skill-based. The various methods approached include motion pictures (a patient is shown being examined by the physician, and questions can be asked about the adequacy and competency of the examination) of carefully selected patients, interpretation of clinical data presented in pictures or graphs (radiographs, electrocardiograms, blood smears, funduscopic views), programmed testing (under observation, resident is allotted a clinical condition (emergency and non-emergency) to assess the approach and clinical judgment within a stipulated time.<sup>[11]</sup> The General Medical Council, responsible for the standard of medical education in the UK, included in its 1967 report the recommendation that the clinical knowledge and skills attained by the student should be tested in the final qualifying examinations.

Ronald M Harden, lecturer at the University of Glasgow, designed (1975 to 1979) OSCE. In OSCE, the resident/trainee will move through a series of stations, and at each station, (as shown in figure 2) there is a structure with a specific task to elicit. Usually, these tasks are clinically focused (like history taking, mental status examination, physical examination, carrying out a procedural skill, or interpreting lab data). Every station has a set amount of time allotted, and the

marking schemes are pre-planned. There can be differences in OSCEs regarding the number of stations and amount of time at each station, the use of mannequins or standardized patients, and the marking of the performances (such as rating scales or checklists). <sup>[12,13]</sup>

# Figure 2: S1-S5 - Stations 1-5, students at different stations and at each station different skill is assessed.

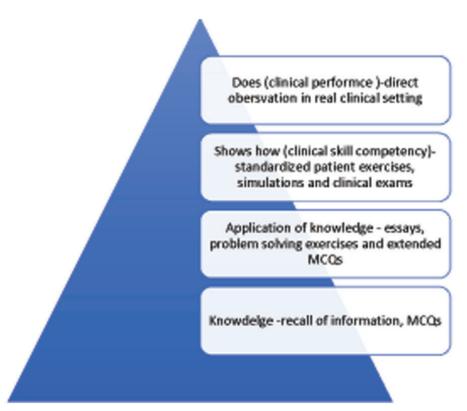


Loschen E, for the first time in 1985, used the OSCE to evaluate the psychiatry residency program. <sup>[14]</sup> In OSCE, the objective characteristic is due to the multiple stations with different clinical conditions, and each trainee is evaluated at each station. Multiple examiners will observe the trainees at stations and mark their performances. The structured nature is due to the print or grid, with a precise plan of what is expected to be assessed at each station and the uniqueness of each station. Table 1 shows the model blueprint of OSCE with five stations. The clinical component involves observing students as they work with actual and standardized patients.<sup>[15]</sup>

Stations	Task	Duration	Checklist/ Scoring system	Observers/ examiners rating
Station 1	Exploring phenomenology (Depressed/ Psychotic patient)			
Station 2	Central Nervous System Examination			
Station 3	Capacity Assessment			
Station 4	Psychoeducation of family members about disorder			
Station 5	Psychology Spotter and applications			

Table 1: A 5-station blueprint or grid of Psychiatry OSCE:

Miller's Pyramid Model:In 1990, George Miller described a hierarchy assessment framework for clinical competency. As shown in figure 3, at the base, it represents what the resident knows (knowledge), and the level above the base represents the 'knows how,' the application of the knowledge, and the ability to use that knowledge to answer complex questions. The above level represents skill application/behavioural level compared to the cognitive level application at the lower levels. This level represents ability, skill, and competency. In OSCE, there is a predominant share for showing the process of doing something rather than just knowing. The topmost level represents the skill or performance at day-to-day clinical practice. As we progress from the bottom, the acquired knowledge will move from the just cognitive level to a combination of cognitive processes and behaviours with the best outcome.<sup>[16]</sup>



#### Figure 3: Miller's pyramid model

**Studies on postgraduate psychiatry OSCE:** In psychiatry OSCE, a wide variety of studies (like competency evaluation, teaching, preparation for exams ahead, examiners' training, and suicide risk assessment) are conducted, and the majority are from North America, the United Kingdom, and Canada. The psychiatry OSCE studies had medical students/clerks, interns, residents (postgraduate psychiatry), psychologists, and psychiatrists. In India, studies have yet to be conducted in this area of psychiatry OSCE. In Table 2, we limited our scope to studies in postgraduate psychiatry residents and Indian studies.

#### Table 2

Reference and	OSCE	Results and key findings
Sample Loschen, 1993 <sup>[14]</sup> (18 second-year and 25 fourth-year psychiatry residents) Hodges et al,	Six 40-min stations Eight 12-min stations	<ol> <li>Favourable for formative assessment during the training and better avoided for summative assessments</li> <li>Scenarios based on unusual or rare cases are best avoided</li> <li>The residents rated the OSCE scenarios highly realistic</li> </ol>
1998 <sup>[17]</sup> (17 psychiatry residents and 33 clinical clerks)	Light 12-min stations	<ol> <li>The residents rated the OSCE scenarios nighty realistic</li> <li>Evidence of construct and concurrent validity of psychiatry OSCE indicated that it can be a valid assessment for clerks.</li> </ol>
Loschen, 2002 <sup>[18]</sup> (clinical experience)	5-6 stations, 20 minutes for psychiatry residents, 3 for medical students	1. Practical application of knowledge was evaluated (unlike traditional pen-and-paper knowledge-based tests) and OSCE was a cost-effective means of performance-based clinical skills assessment
Sauer et al, 2005 <sup>[19]</sup> 36 psychiatry senior house officers	Twelve 7-min stations	<ol> <li>Trainees evaluated OSCE positively, with 86% considering it fair and 89% appropriate in assessing clinical ability</li> <li>Trainees preferred OSCE to the individual patient assessment it replaced in the RCPsych membership exam</li> </ol>
Sadeghi et al, 2007 <sup>[20]</sup> 21 final-year psychiatry residents and 24 board-certified psychiatrist examiners	Eight 12-min stations	<ol> <li>Psychiatry residents and examiners found standardised patients acceptable, competent and accurate in their roles</li> <li>Examiners (who wrote scenarios) rated competence more highly</li> </ol>
Whelan et al, 2009 <sup>[21]</sup> 55 psychiatry trainees	Eleven or 12 stations	<ol> <li>Moderate correlation between examiner and standardised patient scores for communication skills and overall performance</li> <li>Examiners' scores were more strongly correlated</li> <li>Including standardised patient scores in postgraduate psychiatry OSCEs required caution due to poor concurrent validity</li> </ol>
Hung et al, 2012 <sup>[22]</sup> 26 psychiatry residents and 5 clinical psychology interns	Single 40-min station	<ol> <li>A competency-assessment instrument for suicide risk- assessment (CAI-S) showed good internal consistency, reliability, and interrater reliability in an OSCE setting</li> <li>Senior trainees performed better than junior trainees, supporting its concurrent validity</li> </ol>
Chandra PS, 2009 <sup>[23]</sup> 27 postgraduate trainees- clinical psychology, psychiatric social work, psychiatric nursing, medicine and neurology	1 station, training purpose, weekly total 34 sessions, 15 minutes duration Objective structured clinical assessment and feedback (OSCAF)	<ol> <li>Few areas of clinical interview (summarizing, closure, enquiring patient's understanding) require more training</li> <li>Significant deficits in assessing suicidal intent, insight and breaking bad news</li> </ol>

Chaturvedi SK, 2010 <sup>[24]</sup> Sharma MK, 2015 <sup>[25]</sup> 22 postgraduate trainees- clinical psychology, psychiatric social work, psychiatrists	One station, training purpose, weekly, 15 sessions, 15min duration. Objective structured clinical assessment and feedback (OSCAF) 2-3 team OSCE training purpose, weekly each Team OSCE duration is for 15minutes	1. 2. 1.	<ul> <li>13 rated 'somewhat satisfied' and two rated themselves as being fully satisfied</li> <li>14 reported a positive impact of the exercise, and one reported 'not sure'.</li> <li>Promoted better understanding of role of each team member, handling unexpected events, shared decision making, problem solving, giving feedback and closure.</li> </ul>
Bhandary RP 2023, <sup>[26]</sup> Experience paper	4 stations, 10 minutes	1. 2.	Assessed residents on more clinical conditions than conventional exam (long, short and neurological cases), language barriers for the residents and cultural differences are minimized Designing and implementing required more staff and infrastructure and generalizability might be a challenge in India.

# Essential Components and method of evaluation for Postgraduate Psychiatry OSCE:<sup>[27]</sup>

Various methods and guidelines exist worldwide to assess the competency of a psychiatry resident, but in this chapter, we would like to discuss the components mentioned by the American Board of Psychiatry and Neurology (ABPN).

ABPN requires candidates pursuing psychiatry certification to pass three clinical skill assessments. Physicians must master the following three core competency components, according to the ABPN: A doctor-patient relationship; a psychiatric interview that includes a mental health assessment; and a case presentation. It is necessary to do three assessments on three distinct patients (one adult under 26 years, another 26-65, and the third above 65 years). In the assessment, they might also rate other components of competency like treatment planning and differential diagnosis. The evaluator will observe the resident and assign a score based on the doctor-patient relationship, psychiatric interview (including a mental status examination), and case presentation. Every evaluation should last at least forty-five minutes. The psychiatric interview should take the doctor at least thirty minutes to complete. They should have at least ten to fifteen minutes to make their case. The session might run longer if the program has chosen to evaluate more competency components. The evaluator may provide the doctor with feedback if it is suitable. While they can be given at any point during training, the ABPN recommends giving in-residency evaluations at every stage.

Objective Structured Practical Exam (OSPE): When the OSCE was initially developed, it was thought to be a clinical test that should be taken mainly in the course's final or clinical years. Nevertheless, the structure could also be used early in the course to evaluate a student's aptitude

#### Chapter 12

for integrating the fundamental sciences into clinical medicine. This method was referred to as "the Objective Structured Practical Exam," and Malik et al. discussed its application in India to evaluate the students ' skills in physiology. The assessment of student competence is now referred to as the OSCE, as this distinction has lost relevance over time due to the emphasis on the vertical integration of clinical skills into the early years of the course.<sup>[28,29]</sup>

Advantages and disadvantages with traditional and newer methods of competency assessment in psychiatry

# Table 3: Advantages and disadvantages with traditional and newer methods of competency assessment for psychiatry resident:

S. No	Traditional Methods (Written exams, bed side clinical examinations, Conventional Oral Examination, Sole MCQs)	Newer Methods OSCE and its adaptations
Advantages	<ol> <li>Require less pre-planning and design</li> <li>Require fewer human resources and infrastructure to conduct</li> <li>Suitable for resource-limited setting</li> </ol>	<ol> <li>Assessing more patients may remove the chance/luck factors</li> <li>Multiple areas of skill can be evaluated</li> <li>More evaluators and standardized rating lists/ checklists will remove the subjective bias and variability of ratings</li> <li>Each station can precisely evaluate the specific skill</li> <li>To a certain extent, it removes the linguistic and cultural difficulties of the patient and resident</li> </ol>
Disadvantages	<ol> <li>High variability and subjective bias in evaluation</li> <li>Only a few areas of knowledge or skill are evaluated</li> <li>Tests may not check the skill necessary for competency</li> <li>Students with below average competency may perform well due to luck/chance factors</li> <li>Learning may not be stimulated if the tests are too non- standardized, i.e., poor skill development</li> </ol>	<ol> <li>Need a lot of preplanning and standardization of patients, checklist, and specific items that can be elicited and rated</li> <li>More evaluators, human resources, and infrastructure needed</li> </ol>

#### Conclusion

Several methods were employed to assess the competency in the medical education. Traditionally, it was a combination of written and bedside clinical examinations. Since the second half of the 20th century, there has been a rapid shift in the competency assessment process. Gradually, the methods shifted from "knowing/knowing how to do" to showing how to do things under direct observation. Since its inception in 1979, OSCE and its adaptations have replaced the traditional ways of assessments, especially in developed countries. Research findings on OSCE and its adaptations show that it can be utilized primarily for formative and, if well-designed, even for summative assessments.<sup>[30]</sup>

In countries like India, the National Medical Commission advises using OSCE models for assessments but does not mandate it. In India, few tertiary centres use OSCE for formative assessments and training, and in other places, traditional ways like bedside clinical examination viva voce are still in use. In India, most centres do not have the human resources and the infrastructure to design the OSCE blueprint and conduct the assessment. Indian Psychiatric Society can take an initiative in this area. That would include development of model OSCE stations, the blueprint grid, standardized patients, assessment / evaluation checklists. Gradually, OSCE needs to be introduced both for training and as a part of formative assessment across the various institutes. Active research in this area needs to be encouraged too for continued improvement.

#### Take Home Message:

- 1. Traditional ways of competency assessments (written essays, MCQs, MEQs, bedside examination) are easy to implement and cost-effective; but they come with many subjective biases, luck/chance, and they assess narrow areas of knowledge or skill.
- 2. OSCE and its adaptations assess a wide range of practical skills but require more human resources, infrastructure, and planning.
- In India, the method of competency assessment in postgraduate psychiatry requires some change, and research on the use of OSCEs is needed to develop models suitable for our settings
- 4. The National Medical Commission advises on the development of OSCE models for evaluation and teaching but has not made their use compulsory.
- 5. Indian Psychiatric Society can take a lead role in this area to develop culturally appropriate, cost-effective OSCE models so that they can be used across the country.

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### CHAPTER 13

## Psychiatry Training for Postgraduates in Other Specialties

#### Abstract:

This chapterexplains the importance and implications of including psychiatry training into postgraduate education for doctors pursuing careers in other medical specialties. Even though mental health has been shown to be a vital aspect of general health and wellbeing, there are still obstacles and restrictions when it comes to the integration of psychiatric training into non-psychiatric disciplines. The authors look at the benefits, problems, and future directions of this kind of integration as well as the current state of psychiatry training in non-psychiatric specialties in India and around the world. The purpose of this chapter is to demonstrate how postgraduates in other disciplines can benefit from psychiatric training as it is vital to provide comprehensive treatment and can lead to better patient outcomes overall.

Keywords:mental health integration, holistic patient care, postgraduate education, Psychiatry training for other medical specialties,

#### Introduction

The World Health Organization (WHO) defines health as a state of complete physical, mentaland social well-being and not merely the absence of disease or infirmity (World Health Organization; 2016). This important definition emphasizes that there is no complete health without mental health and that there is an intricate relationship between mental and physical health. Despite this acknowledgment, the integration of psychiatric training into postgraduate education for individuals pursuing careers in other medical specialties remains challenged, limited and often not made mandatory. With an increasing prevalence of mental health issues world-wide, Psychiatry training for postgraduates in non-psychiatric specialties holds the potential to address the unmet mental health needs, improve multidisciplinary collaboration, and provide holistic care. In this chapter, we discuss the need, the current status and the importance of incorporating psychiatry training for postgraduates in other specialties for improving healthcare outcomes.

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#### Current Scenario of Psychiatry Training in Non-Psychiatric Specialties

Global Scenario: Across the globe, the training in psychiatry for postgraduate trainees of other specialties remains inadequate. Therefore, doctors may not be equipped with the knowledge, skills, and confidence to effectively handle mental health burden of their patients. Studies have shown that this contributes to the under-recognition and under-treatment of mental health conditions (Sartorius et al., 2010).

#### **United States of America:**

Across most medical schools in USA, the curriculum of Internal medicine has psychiatry liaison services rotation as part of elective rotations. The total duration of elective rotations is for a period of 6 months in divided periods in 3 years of residency. Some medical schools have 2 weeks in first year, 8 weeks in the second year and 10 to 12 weeks in final year residency program. These elective rotations include Psychiatry, Dermatology, Anaesthesiology. It is unclear how many days the residents are posted in each speciality.

#### Canada:

In Canada, most of the medical schools have clinical postings of one block for electives during first year of PG training and 1-2 blocks of elective postings in second year of PG training and also allows 1-2 blocks of elective postings in final year, if not availed previously. Each block of postings indicates four weeks of training. Elective postings include Emergency Medicine, Psychiatry and Radiology. This indicates that there are opportunities to avail training for internal medicine residents but it is not compulsory.

#### Australia:

In Australia and New Zealand, electives are offered for 4-12 weeks duration and applicant may only apply for elective in a single discipline per calendar year.

UK: In UK, most of the students get training regarding identifying common psychiatric conditions in their foundation course. In FY1 and 2, they are trained to identify common psychiatric conditions and refer to psychiatry department. Though there is no specific rotation program designated for this, but the students are taught basic history taking in psychiatry, to identify triggers and also trained to elicit mood disorders and suicidal thoughts.

#### Indian Scenario:

In India,training in psychiatry is limited to psychiatry postings during undergraduate internship (Compulsory Rotating Medical Internship) or during postgraduate training in medical specialities. Sometimes, psychiatry postings are elective and can be substituted by other medical speciality postings. While some interns attend psychiatry postings out of interest, unfortunately, many may be attracted for the leisure time available or to utilise their casual leaves. The challenges continue for implementation psychiatry training for postgraduates in other specialities due to disparity of the implementation of guidelines, limited standardization and wide variation across different colleges/ universities and various medical specialities (Gururaj et al., 2016). This is a disheartening situation.

# Challenges to implementation of psychiatry training for other medical specialities

- 1. Prioritization of specialty-specific training: In the era of super specialization or sub specialization, there is inadvertent prioritization of specialty-specific training at the cost of broader interdisciplinary learning (Torrey et al., 2012). Additional careful planning, coordination, and resource allocation are required to be able to fit-in psychiatry training.
- 2. Stigmatization of psychiatry: Stigma regarding psychiatric illness though decreasing, continues to be one of the significant barriers to psychiatry treatment. Not only patients, but professionals ofother medical specialities may also harbour significant stigma towards psychiatry due to lack of proper knowledge and training. They may perceive psychiatry training as extraneous to their core competencies (Gill & Jeffrey, 2014). Early introduction of psychiatry as part of medical curriculum during MBBS may contribute to better attitude and better acceptance and help mitigate this stigma.

#### Scope and need for Psychiatry Training for Other Specialties

There are several reasons for the integration of psychiatry training into postgraduate education for non-psychiatric specialties. Some of them are listed below:

#### 1. High prevalence of psychiatric disorders:

Studies have repeatedly demonstrated that patients especially with chronic medical conditions have a high prevalence of comorbid psychiatric disorders (Smith et al., 2019).

#### 2. Consequences of untreated psychiatric comorbidity:

Patients with psychiatric disorders that are undiagnosed and more importantly untreated may experience worse treatment outcomes, medication adherence, and overall quality of life in the treatment of co-occurring medical illnesses (Katon, 2011).

#### 3. Bidirectional relationship between mental health and physical health:

Untreated psychiatric comorbidity can indirectly worsen physical health condition. (De Hert et al., 2011). Psychiatry training into non-psychiatric specialties is necessary to help understand of the relationship between mental and physical health.Understanding the biopsychosocial model of healthfacilitates holistic patient care (van der Feltz-Cornelis et al., 2010)

#### 4. Multidisciplinary collaboration:

Every medical speciality is rapidly advancing with the possibility of unique contribution to patient care(Xiao et al., 2016). Training in psychiatry will help a doctor to make an appropriate and timely psychiatric referral besides enhancing the capability to better manage comorbidities in patients with psychiatric disorders.

#### 5. Better patient satisfaction and outcomes:

Studies have shown that recognition and management of psychiatric disorders diverse clinical settings, leads to improved patient outcomes and satisfaction (Kisely et al., 2015).

#### 6. Addresses stigma:

Training in psychiatry promotes a culture of inclusivity, empathy, and understanding within

the healthcare workforce (Knaak et al., 2014). This can address the stigma which is a major barrier to addressing mental health conditions in the developing world.

#### Expectations from psychiatry training for other medical specialities

To be able to deliver a patient-centred care, a foundational understanding of psychiatry is required to recognize, assess, and manage psychiatric symptoms and conditions before referral to a psychiatrist. Ideally, a week duration of posting in psychiatry may be required to learn these essential areas.

#### 1. Recognition of psychiatric symptoms:

Other medical specialties should be able to recognize common psychiatric symptoms such as depression, anxiety, psychosis, mania, suicidal ideation, agitation, and cognitive impairment. Understanding the clinical manifestations of psychiatric disorders enables early identification and appropriate referral for further evaluation and management.

#### 2. Psychiatric Screening and Assessment:

Knowledge of basic screening tools and assessment techniques for psychiatric disorders can help other medical specialties identify patients at risk or in need of further psychiatric evaluation. Familiarity with validated screening instruments for depression, anxiety, substance use disorders, and cognitive impairment facilitates early detection and intervention.

#### 3. Psychotropic Medications:

Awareness of commonly used psychotropic medications, their indications, mechanisms of action, side effects, and potential drug interactions is essential for other medical specialties. In some instances, the continuation of these drugs may be lifesaving. For example, in a woman suffering from depression or schizophrenia, it has been the practice that the obstetricians ask their clients to stop the medicines, which might cause relapse in patients. Recurrence of a severe psychiatric disorder during pregnancy can have potentially serious adverse consequences both for the mother and the baby. Understanding the principles of psychopharmacology enables safe and effective use of psychiatric medications in conjunction with other modalities of treatment.

#### 4. Psychosocial Factors:

Appreciation of the influence of psychosocial factors such as stress, trauma, social support, cultural background, and socioeconomic status on mental health and illness enhances other medical specialties' ability to provide holistic and patient-centred care. Recognizing the complex interplay between psychosocial factors and physical health outcomes informs comprehensive treatment planning and patient support.

#### 5. Communication and Collaboration:

Effective communication and collaboration with psychiatrists and mental health professionals are critical for other medical specialties to address the complex needs of patients with psychiatric comorbidities or psychosocial stressors. Collaborative care models promote interdisciplinary teamwork, shared decision-making, and coordinated management of patients with both medical and psychiatric conditions.

#### 6. Mental Health Resources:

Knowledge of available mental health resources, including outpatient psychiatric services, crisis intervention services, support groups, and community-based programs, enables other medical specialties to connect patients with appropriate mental health care and support services. Awareness of local referral pathways and resources facilitates timely access to mental health care for patients in need.

#### 7. Psychiatric Emergencies:

Basic training in recognizing and managing psychiatric emergencies such as suicidal behaviour, acute psychosis, severe agitation, and substance intoxication/withdrawal prepares other medical specialists to respond effectively in crisis situations and ensure patient safety. Understanding protocols for psychiatric assessment, de-escalation techniques, and crisis intervention enhances readiness to address psychiatric emergencies in various clinical settings.

#### Cross referrals among psychiatry and other medical specialities.

There are many medical conditions that might prompt psychiatrists to refer patients to other medical specialties for a comprehensive care. Understanding of the psychiatric condition by the specialist may become quintessential to deliver the standard care to the patient.

#### 1. Cardiovascular conditions:

Patients with mental health disorders such as depression or anxiety may also have comorbid cardiovascular conditions such as hypertension, coronary artery disease, or arrhythmias. Referral to cardiology may be warranted for further evaluation and management of these conditions, especially if they impact the patient's overall health or response to psychiatric treatment.

#### 2. Endocrine disorders:

Certain psychiatric symptoms, such as changes in mood, energy levels, or cognition, may be associated with underlying endocrine disorders such as thyroid dysfunction, diabetes mellitus, or adrenal disorders. Referral to endocrinology may be necessary for comprehensive evaluation and treatment of these conditions, as they can significantly impact psychiatric treatment outcomes.

#### 3. Neurological conditions:

Neurological disorders, including epilepsy, multiple sclerosis, Parkinson's disease, or traumatic brain injury, may coexist with psychiatric disorders and contribute to the complexity of the clinical presentation. Psychiatrists may refer patients to neurology for specialized assessment, diagnostic testing, or treatment of neurological conditions that influence psychiatric symptomatology.

#### 4. Respiratory conditions:

Chronic respiratory conditions such as asthma, chronic obstructive pulmonary disease (COPD), or sleep-disordered breathing may exacerbate psychiatric symptoms or impact the effectiveness of psychiatric medications. Referral to pulmonology or respiratory medicine may be necessary for optimizing respiratory function and addressing the underlying respiratory pathology.

#### 5. Gastrointestinal conditions:

Gastrointestinal disorders such as inflammatory bowel disease, gastroesophageal reflux disease (GERD), or liver cirrhosis may be associated with psychiatric symptoms such as anxiety, depression, or cognitive impairment. Psychiatrists may refer patients to gastroenterology for evaluation and management of gastrointestinal conditions that contribute to or exacerbate psychiatric symptoms.

#### 6. Immunological disorders:

Autoimmune disorders, chronic infections, or immune-mediated conditions such as lupus, HIV/AIDS, or rheumatoid arthritis may have psychiatric manifestations or interact with psychiatric medications. Referral to immunology or infectious diseases may be necessary for comprehensive evaluation and management of these conditions, especially if they impact mental health or treatment adherence.

#### 7. Oncological conditions:

Patients with cancer or undergoing cancer treatment may experience psychiatric symptoms such as depression, anxiety, or cognitive impairment. Psychiatrists may collaborate with oncologists to address the psychological and emotional aspects of cancer diagnosis, treatment, and survivorship, while oncologists manage the medical aspects of cancer care.

#### 8. Renal conditions:

Chronic kidney disease, electrolyte imbalances, or renal failure may contribute to psychiatric symptoms or impact the metabolism and clearance of psychiatric medications. Referral to nephrology may be warranted for assessment and management of renal conditions that affect mental health or psychiatric treatment.

#### 9. Musculoskeletal conditions:

Chronic pain conditions, musculoskeletal disorders, or rheumatologic conditions such as fibromyalgia or arthritis may coexist with psychiatric disorders and contribute to functional impairment or treatment resistance. Psychiatrists may refer patients to rheumatology or pain management specialists for multidisciplinary assessment and treatment of musculoskeletal conditions.

#### 10. Infectious diseases:

Infectious diseases such as HIV/AIDS, tuberculosis, or hepatitis may have psychiatric manifestations or interact with psychiatric medications.

#### Knowing when psychiatry consultations are needed

Knowledge of psychiatry can improve timely and appropriate calls for psychiatry consultations. Some of the conditions that might require collaboration with psychiatry include:

#### 1. Delirium:

Delirium is a common neuropsychiatric syndrome characterized by acute and fluctuating changes in cognition, attention, and consciousness. Other medical specialties, such as internal medicine, surgery, or critical care, may consult psychiatrists for evaluation and management of delirium in hospitalized patients, particularly when there are concerns about underlying psychiatric contributors, differential diagnoses, or appropriate pharmacological and non-pharmacological interventions.

#### 2. Severe mood disorders:

Patients with severe mood disorders, such as major depressive disorder or bipolar disorder, may present to medical specialties with acute exacerbations of mood symptoms, suicidal ideation, or psychotic features. Consultation with psychiatrists may be sought for comprehensive assessment, risk stratification, crisis intervention, and pharmacological management of mood disorders, especially in cases of treatment resistance or safety concerns.

#### 3. Psychiatric emergencies:

Medical specialties, including emergency medicine, critical care, or neurology, may encounter patients with acute psychiatric emergencies such as suicidality, psychosis, agitation, or substance intoxication/withdrawal. Psychiatrists are often consulted to provide expertise in managing psychiatric emergencies, conducting risk assessments, facilitating psychiatric stabilization, and coordinating appropriate disposition, including admission to psychiatric facilities when necessary.

#### 4. Psychosomatic disorders:

Psychosomatic disorders refer to conditions in which psychological factors significantly influence the onset, presentation, or course of physical symptoms or illnesses. Other medical specialties, such as gastroenterology, cardiology, or rheumatology, may consult psychiatrists for evaluation and management of psychosomatic disorders, including somatic symptom disorder, illness anxiety disorder, or functional neurological disorders.

#### 5. Capacity assessments:

Medical specialties may request psychiatric consultation for capacity assessments when patients' decision-making abilities are impaired due to psychiatric illness, cognitive deficits, or other factors. Psychiatrists are often involved in determining patients' capacity to consent to medical treatment, make financial decisions, or manage personal affairs, particularly in cases involving complex ethical, legal, or guardianship issues.

#### 6. Psychiatric comorbidities:

Patients with chronic medical conditions or complex medical histories may present with comorbid psychiatric disorders, such as depression, anxiety, post-traumatic stress disorder, or substance use disorders. Other medical specialties may consult psychiatrists for comprehensive psychiatric assessment, treatment recommendations, and collaborative management of psychiatric comorbidities to optimize patient outcomes and quality of life.

#### 7. Psychotropic medication management:

Medical specialties prescribing psychotropic medications, such as primary care, neurology, or geriatrics, may seek consultation from psychiatrists for medication management, including medication selection, dosing adjustments, side effect management, or pharmacokinetic considerations. Psychiatrists provide expertise in psychopharmacology and collaborate with other specialties to ensure safe and effective use of psychotropic medications, especially in medically complex patients or those with treatment-resistant psychiatric conditions.

#### 8. Personality disorders:

Patients with personality disorders may present with challenging interpersonal dynamics, self-harming behaviors, or difficulties in social and occupational functioning. Other medical

specialties may consult psychiatrists for evaluation, diagnosis, and management of personality disorders, including psychotherapeutic interventions, dialectical behavior therapy, or specialized treatment programs aimed at addressing maladaptive personality traits and behaviors.

#### **Future Directions**

Some of the *complex medical conditions frequently need multidisciplinary treatment* in holistic treatment as shown in the table below.

Medical		
Condition/Scenario	Description	Multidisciplinary Approach
Chronic Pain Management	Patients experiencing chronic pain often require a holistic approach involving multiple specialties, including pain medicine, physical therapy, and psychiatry.	Pain management specialists, physical therapists, psychologists, and psychiatrists collaborate to address pain perception, coping strategies, mood disturbances, and functional impairment.
Traumatic Brain Injury (TBI)	Individuals with TBI may experience a range of physical, cognitive, emotional, and behavioral challenges that necessitate comprehensive care.	Neurologists, neuropsychologists, physical therapists, occupational therapists, speech therapists, and psychiatrists work together to address cognitive deficits, emotional distress, and functional limitations.
Eating Disorders	Eating disorders such as anorexia nervosa, bulimia nervosa, and binge-eating disorder require a multidisciplinary approach to address medical, nutritional, and psychological aspects of the illness.	Physicians, dietitians, psychologists, psychiatrists, and social workers collaborate to stabilize medical status, promote healthy eating behaviors, address body image concerns, and manage comorbid psychiatric conditions.
Substance Use Disorders	Individuals with substance use disorders often require integrated care to address physical dependence, withdrawal symptoms, psychiatric comorbidities, and psychosocial factors contributing to addiction.	Addiction medicine specialists, psychiatrists, psychologists, social workers, and peer support specialists collaborate to provide detoxification, pharmacotherapy, psychotherapy, relapse prevention, and social support services.
Complex Medical Illness InGeriatric Patients	Elderly patients with complex medical conditions may experience cognitive impairment, functional decline, mood disturbances, and social isolation, necessitating a comprehensive approach to care.	Geriatricians, primary care physicians, neurologists, psychiatrists, occupational therapists, and social workers collaborate to address medical management, cognitive deficits, mood disorders, functional decline, and social support needs.
Psychiatric disorders in Pregnancy and Postpartum	Pregnant and postpartum women with psychiatric disorders require specialized care to ensure maternal and fetal well-being, as well as optimal maternal mental	Obstetricians, psychiatrists, psychologists, perinatal nurses, and lactation consultants work together to provide prenatal monitoring, medication management,

Medical		
Condition/Scenario	Description	Multidisciplinary Approach
	health outcomes.	psychotherapy, lactation support, and parenting education.
Severe Mental Illness in Forensic Settings	Individuals with severe mental illness involved in the criminal justice system require specialized treatment and supervision to address psychiatric symptoms, behavioral management, and risk of recidivism.	Forensic psychiatrists, psychologists, correctional officers, social workers, and legal professionals collaborate to provide psychiatric treatment, rehabilitation programs, risk assessment, and court-mandated interventions.
Palliative Care for Terminal Illness	Patients with terminal illnesses require compassionate care focused on symptom management, psychosocial support, and addressing existential distress at the end of life.	Palliative care physicians, nurses, chaplains, social workers, psychologists, and psychiatrists work together to provide pain relief, emotional support, spiritual care, grief counseling, and assistance with advance care planning.

Postgraduate curriculum can adopt the following to enhance the capability of non-psychiatry doctors to identify and refer patients with psychiatric co-morbidity across diverse clinical settings. Addressing these challenges necessitates a collaborative approach involving policymakers, healthcare administrators, educators, and professional organizations such as IPS.

- 1. Adopt a competency-based approach to psychiatry training, incorporating core competencies related to mental health assessment, diagnosis, and management into existing curricula (Wilkinson et al., 2014).
- 2. Interdisciplinary collaboration should be promoted through joint training initiatives, shared learning experiences, and interprofessional workshops (Doherty et al., 2016).
- 3. Faculty development programs should be implemented to enhance the teaching skills and confidence of educators delivering psychiatry training to postgraduates in other specialties (Kelly et al., 2017).
- 4. Assessment methods should be aligned with desired learning outcomes, ensuring that trainees have the requisite knowledge, skills, and attitudes to provide high-quality mental healthcare (Sharma et al., 2013).
- 5. Healthcare organizations should prioritize the allocation of resources, infrastructure, and support systems to facilitate the effective implementation of psychiatry training for postgraduates in other specialties (Schwenk et al., 2010).

#### Conclusion

Psychiatry training for postgraduates of other disciplinesis important to address the mental health gap, improve collaboration with mental health professionals and deliver holistic care. A multidisciplinary and systematic approachcan effectively integrate psychiatry training into postgraduate education for other specialties, thereby promoting a more patient-centred, holistic, and effective healthcare system.

#### TAKE HOME MESSAGE

There is 'no health without mental health'. Doctors lacking psychiatry training will not be adequately equipped to effectively manage common medical conditions with a complex interplay of psychosocial and biological factors. It will also hamper prompt identification, early intervention and timely referral of patients with psychiatric disorders in the community. A collaborative approach by policymakers, healthcare administrators, educators, and professional organizations should make effective psychiatry training mandatory for all medical specialists to bridge the mental health gap and deliver holistic care that will improve treatment outcomes.

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## INDIAN PSYCHIATRIC UPDATE

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