

Review

Present task and future role of psychiatric service and psychiatric nursing

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Abstract

Cognitive function is impaired with patients of various major psychiatric disorders. Cognitive impairment can be the common target for psychiatric service and psychiatric nursing, which will be the goal of future psychiatry. After the publication of DSM-5, the never-ending difficulty in installation of the diagnostic system in psychiatry has been discussed. The future goal of the psychiatric diagnostic classification system will incorporate dimensional model as well as subjective experience of the patients to increase the validity of the diagnosis.

The professionals serving for the psychiatric patients should pay more attention to the remarks issued by the patients trying to understand the meaning of those remarks. To serve as the competent clinical service professionals, the ability to understand the meaning of the patient's subjective experience will be essential, which should be implemented by all professionals in psychiatric service including psychiatric nurses.

Key words: cognitive impairment, psychiatric nursing, psychiatric service, patient-oriented, validity

1. Introduction

Psychiatry is the medical subspecialty mainly engaged with human abnormal behaviors. All humans live their lives in the society making use of their behavior like the currency, and human beings are selecting appropriate actions and behaviors by recognizing stimuli from the society. Human cognition and behavior function as the currency in social life, mutually influencing each other.

All human behaviors are, however, not controlled by conscious cognition. We must be aware of the fact that some of human behaviors are regulated unconsciously. In addition to reacting to the stimuli from outside world, behavior can also be changed according to the psychological state of the person. The behaviors induced by similar external stimuli may produce different behaviors depending on educational level and

experience of the individual. Also, responses to the outside world may differ depending on the person's habits, preference, and personality. These behaviors are primarily consciously controlled with partial modulation by unconscious internal mechanism, but there may be the behaviors which are controlled by mostly unconscious process, which are dominated by habit, taste or personality. Furthermore, drugs acting on the central nervous system, and psychiatric disorders may have significant influence on human behavior. Some psychiatric disorders may change the behavior of the person by modulating the cognitive function to the external stimulus, and the behavior pattern can be changed due to psychiatric disorders. For this reason, evaluation and understanding of cognitive function is extremely important for psychiatric service and psychiatric nursing, in which abnormal behaviors are the direct target of the service (Takeda, 2014).

2. What is Cognitive Function

Cognitive function determines the response, behavior and conduct of the humans responding to the stimuli and information from outside world. Cognitive function includes human's intellectual function such as language, calculation, memory, learning, and problem solving ability. Although it sometimes refers to the whole function of the cerebrum in a broader sense, it usually refers to memory, learning, language, and execution function in a narrower sense. In DSM-4, the cognitive dysfunction was cited as either memory impairment, aphasia, learning dysfunction, or execution impairment. In DSM-5, the cognitive function is described to be composed of the six domains; (complex) attention, executive function, memory and learning, language, motor perception, and social cognition (Figure 1)

3. Cognitive Impairment due to Psychiatric Disorders

Cognitive dysfunction is now drawing much attention in psychiatric disorders. In DSM-5, the term "dementia" has been replaced with the new term "neurocognitive impairment", in which cognitive impairment is in the foreground symptom of the disease. It should be noticed that cognitive impairment can be observed in many psychiatric disorders in addition to dementia.

Cognitive impairment in schizophrenia is significantly impaired. Linguistic memory, executive function, arousal level, and language fluency are 2-3 standard deviation (SD) lower in patients with schizophrenia as compared with healthy subjects, but word reading and understanding, and episodic memory are not faulty (Roitman, 1997).

Cognitive impairment is also observed with pa-

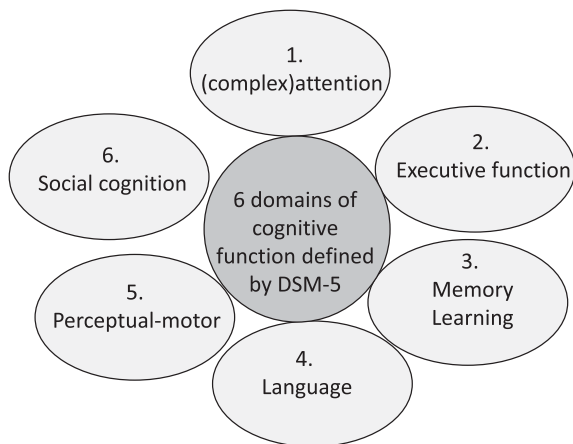


Figure 1 Cognitive domains defined by DSM-5

tients with major depression, anxiety disorder, and bipolar disorder. Memory, speed of processing, response time, attention, and fluidity of cognition are all lower in major depression, anxiety disorder, and bipolar disorder patients than those of the healthy subjects. In particular, disturbance of attention is significantly impaired in the patients with those psychiatric disorders (Gorwood, 2008). Those who present with 2 SD or lower in multiple items are seen in bipolar disorder by 30.2%, major depression by 20.7% and anxiety disorder by 19.0% (Gorwood, 2008). Depressive episodes are often repeated in major depression patients, and it is well known that the cognitive function of delayed memory reproduction is disturbed as the depression episode is repeated (Gorwood, 2008).

If we consider such cognitive impairment over the whole human life, psychiatric disorders have significant impact to social life capacity of the humans due to disturbed cognitive function. Humans will expand their activities through education and experience in children and adolescents, to maintain a certain level of activity after becoming adults, and their activity slowly declines in the elderly. Even in adulthood, various psychiatric disorders may temporarily impair the social activity due to cognitive impairment. The goal of the psychiatric service and psychiatric nursing is to maintain the social life function as long as possible throughout the life cycle of the humans (Figure 2).

4. Introduction of DSM-5

In May 2013 the American Psychiatric Association published DSM-5 (Diagnostic and Statistical Manual of Psychiatric disorders), after DSM-III (1980), DSM-III R (1987), DSM-IV (1994), and DSM-IVTR (2000), as a major revision from DSM-IV in 19 years. There had been intense controversies between the categorical model and the dimensional model taking the recent biological findings into consideration, before the final version of DSM-5 was announced. There had been hot discussions of "deconstructing psychosis", which might have decomposed the solid dichotomy of the two major psychiatric disorders; schizophrenia and bipolar mood disorder, which had been the basis of classification since the days of Emil Kraepelin. As many psychiatrists wondered how such controversies would be reconciled into the new classification, the announcement of DSM-5 gained a lot of attention.

Features of DSM-5 can be summarized as follows; 1) the change from categorical model to

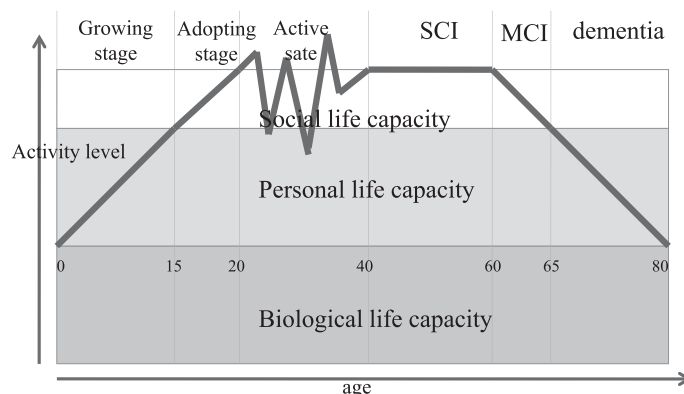


Figure 2 Cognitive function through life

dimensional approach was left undigested, 2) major items were sorted according to lifelong development model, 3) the categories are arranged considering the internal and external factors, 4) multi-axis diagnosis was abolished, 5) for overall functional evaluation, WHO Disability Assessment Schedule (WHODAS) based on ICF was introduced instead of DSM-IV's GAF scale.

Reflecting the high expectation of the new diagnostic system, there were many opinions for DSM-5. As a representative opinion from Europe, Hans Jourgen Moeller pointed out, 1) the original plan of introducing the dimensional system was not realized and eventually ended with the categorical system, 2) the biological findings including biological markers, genetics, and molecular cell biology were not fully taken into consideration. Nevertheless, it remained a descriptive classification based on symptomatology, 3) a dimensional approach remained to be minimally observed as newly introduced specifiers, 4) it is unclear whether these specifiers will be clinically sufficiently used.

5. Never-ending disappointment of psychiatric nosology and classification

The systemic classification of psychiatric diseases began by Emil Kraepelin in 1920 with the dichotomy of the diseases into schizophrenia or bipolar disease, but the difficulty of classifying psychiatric disorders was already pointed out by Kraepelin himself. Kraepelin said, "Attempts to define psychiatric disorders in consideration of clinical symptoms, course, outcome, terminal state, autopsy brain findings, etc. were difficult tasks, and the current classification is not satisfactory. We must seek out new ways."

Steve Hyman, NIMH's director said when DSM-4TR was announced, "Attempts to approach the

diagnostic validity of mental illness based on clinical symptoms, laboratory data, natural history, and family accumulation, unfortunately, could not create a classification system based on the relevance of disease. Creating a rational diagnostic system of psychiatric disorders due to brain dysfunction is a big challenge for contemporary life science."

And in the paper published in 2013, Lopes-Ibor said "Despite extensive and vigorous research, DSM-5 did not realize the hope of bringing significant progress to the fundamental understanding of the neural network involved in pathological mental function by revealing genetic and environmental factors involved in the risk of mental illness."

DSM-5 itself is of course not completed as it is now, and further revision work will continue from now on, considering the complexity of psychiatric disorders, aiming for the complete classification system. Probably more accumulation of further knowledge and longer time may be necessary for the establishment of the complete classification system of psychiatric disorders. At the same time, having an appropriate classification system is important for the development of psychiatry, and further development of psychiatry will make possible the new classification system (Figure 3).

6. What is required to increase the validity of psychiatric disorders

In DSM-5, reliability of the diagnostic criteria was regarded as the most important in order to achieve the goal of increasing the concordance rate of the diagnosis. The validity of the diagnostic criteria, however, has been inadequately sacrificed. It is important for clinicians including psychiatrists and psychiatric nurses to be aware of the means to enhance the validity in actual use of

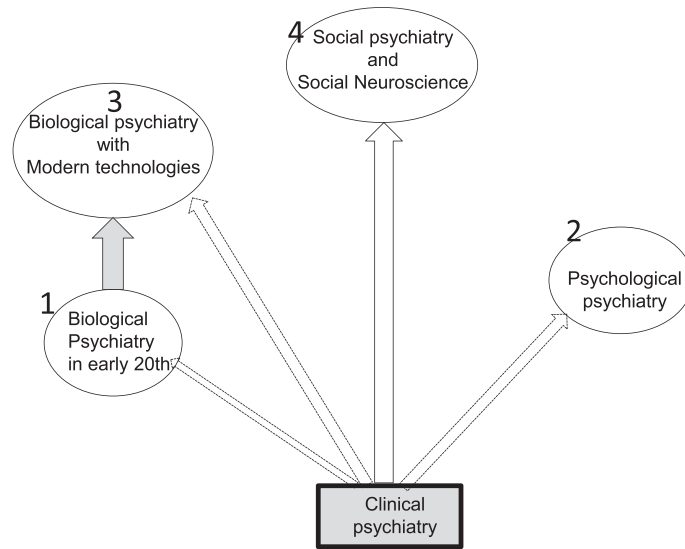


Figure 3

DSM-5.

The weak point of the operational diagnostic system was already apparent in DSM-III developed in 1980. Before DSM-III, the diagnostic system was mainly based on German psychiatry in which a clinician was expected a task of extracting factors that he/she considered important from the abnormal behaviors of the patient and selecting the disease name that seemed to be optimal by comparing its characteristics to the diagnosis system. Therefore, there was a disadvantage that the diagnosis did not match according to the experience and judgment of the clinician who gave a diagnosis. On the other hand, DSM excludes reasoning about the pathological process of the patient's mind and brain. The clinician are expected to combine multiple behavioral abnormalities which are observable from the outside, and to select the most appropriate diagnosis with as many matching items as possible. In DSM system, a clinician tries to give an diagnose based on behavior abnormalities and epidemiological facts that can be observed from the outside without paying attention to psychopathological process, the pathogenesis, or pathology of psychiatric disorders.

The "reliability emphasized-validity neglected" structure throughout DSM may have stimulated the attitude of the clinician to diminish psychopathological considerations in order to improve the concordance rate of diagnosis. We have to admit that even if an increase in the diagnostic coincidence rate is attained by DSM-5, the validity of the diagnosis of psychiatric disorders is not guaranteed.

In science, validity cannot be discussed uniform-

ly, but it should be considered according to each occasion in accordance with the situations. Especially it is the most difficult to consider the validity of the diagnosis of psychiatric disorders, considering the complexity of the disorders. The validity of the disorder should be judged by integrating all clinical information, including symptom, sign, progression, treatment response, and outcome, in addition to epidemiological findings such as incidence and prevalence rate, risk factors, vulnerable age, etc. In other words, validity should be considered for fitness purposes of the subject under individualized situation. For evaluating the validity of psychiatric disorders, the meaning of the disorder to the life of the patient, and the implications of the disorder in the patient's life should be considered. In other words, a clinician should pay more attention to patient's life instead of the disorder itself. The following points will be important when considering the validity of diagnosis of psychiatric disorders.

1) Meaning of the psychiatric disorder to the patient

Psychiatric disorders are unique and different from physical disorders. Psychiatric disorders are the disorders of a living person. Diseases or disorders in physical medicine are regarded as the disease or disorders of a particular organ. For example, heart disease patients usually have dysfunction in their heart but other organs are usually normal. The disordered organ can be isolated and examined as the target of intervention. Regarding psychiatric disorder, however, a patient is subjected to psychiatric disorders as a whole and it is impossible to discuss the disease out of the patient. In other words, psychiatric

disorders are understood as the disorders inseparable from the patient's existence.

As an extreme argument, T. Szasz, who advocated anti-psychiatry movement, had insisted that psychiatric disorders did not exist and that mentally disabled people were produced by the society for the sake of the existence of the society in which the minority subjects are required as the target of devaluation and segregation for the stability of the society. Of course, such extreme opinions have been diminished today, but many similar problems still exist when we consider the abnormal behaviors caused by psychiatric disorders how far the patient's abnormality is resulted from disease and how far it is due to personality deviation.

The meaning of psychiatric disorders is quite different by the attitude toward understanding the disorders. There are wide variation of understanding of psychiatric disorders among biological psychiatry, psychological psychiatry or sociological psychiatry, because the disease model is different.

Difference in understanding psychiatric disorders is probably due to the complexity of psychiatric disorders. Unlike physical disorders, psychiatric disorder is not a single organ disorder, but disorder of human behavior as a whole.

2) Importance of subjective remarks

Psychiatric symptoms are manifested by humans in their lives, which are exposed in a multilayered structure in their lives. Given the complexity of the symptoms of such patients with psychiatric disorders, it should be considered from observation by others and expression from the patients as well.

Until now, remarks of the patients with psychiatric disorders have been unjustly appreciated because the remarks of psychiatric patients often change, their contents often lack logics, and sometimes difficult to understand. Such assertions of the patients have been unduly ignored as being unbearable for objective evaluation. The patients' subjective complains and remarks are becoming more and more versatile means for the service in psychiatry, when we are working under the diagnostic system of DSM. Hearing the voice of the patients is the only way to supply the fault of DSM because DSM is designed to exclude the subjective complains of the patients and reductive consideration of the clinician. It is now the time for the clinicians serving for the psychiatric patients diagnosed under DSM to try to collect remarks and complains of the patient by listening the voices of the patients.

The only way to compensate the defect of DSM will be the collaboration with patients and their family. The patients and their families are the persons who has experienced the psychiatric disorders and their experience is essential for better clinical service. Admitting the difficulty in securing the right information out of various remarks which is leading to the correct diagnosis and evaluation of psychiatric disorders, at least, all professionals serving for psychiatric patients, including psychiatrists and nurses, should try to know the subjective experience of their patients. This kind of effort means knowing individual differences among patients who are living their lives and to understand what each symptom means for individual patients. In this sense, collaboration between clinicians as "expertise-by-training" and patients and families as "expertise-by-experience" must be promoted more than ever.

3) Medical or recovery model of psychiatric disorders

For chronic diseases and disorders, there might be divergence in the mode of intervention whether the patient is served either under medical or recovery model. Medical model is intended to control or reduce the symptom itself and the recovery model is intended for the better QOL or better adjustment to the life. Dissociation between medical model and recovery model is often observed in psychiatric disorders because symptom suppression of psychiatric disorders and better adjustment of to the social life often do not necessarily coincide with each other.

There are opinions whether all psychiatric symptoms are worthless. It is a well-known fact that writers and artists in hypomanic state often do excellent work and create high quality works, which cannot be done if they are in euthymic state. Autistic patients are sometimes able to make the rational and reasonable calm judgments without being held up with complicated human relationships because they have difficulty in building proper interpersonal relationships. Autistic patients can work better in IT companies in which precise fine attention is required for long time which is difficult for usual person. Patients with schizophrenia are easily engaged with simple fixed tasks to have an autonomous tendency. Considering such an example, it cannot be said that all of the psychiatric symptoms are worthless. Some psychiatric symptoms seem to require a viewpoint of extending controllable and psychiatric benefits. In such a sense it is necessary to recognize the value and meaning of mental symptoms and to think about the patient's QOL and

wellbeing.

7. Collaboration between clinicians and patients

Collaboration between clinicians and patients is important good service in psychiatry and it will become more required in future. In retrospect, K. Jaspers pointed out in 1913 that it is important to understand the meaning of psychiatric disorders for the patient (K. Jaspers, *General Psychopathology*, 1913) In modern and future psychiatry, the most important things to implement better psychiatric service to our patients will be 1) to correctly evaluate the subjective experience of the patient, and 2) to broaden the frame of common sense of the clinician to absorb more experience of the patients. The authors claims above may not be much different from that of Jaspers, but those two points are the most important for psychiatrists and psychiatric nurses in order to correctly understand psychiatric symptoms of the patients. To understand the meaning of the patient's psychiatric symptoms, it is important to correctly understand the psychiatric symptoms focusing on the subjective experience of the patient. Subjective experiences of the patient is required to properly evaluate and provide patient-centered services. Also, as an expert in psychiatry, it is required to expand the frame of common sense of their own so as to expand the ability of clinicians to the utmost extent, which will be the common foundation to all psychotherapy.

In order to correctly understand the patient's experience, it is important to consider the evaluation method of psychiatric symptoms. It is necessary to use an appropriate evaluation method according to the viewpoints below ; 1) Who's outcome? 2) Which area is evaluated? 3) On what level of evaluation?, 4) Disease Symptom control or recovery model? 5) Who's perspective? 6) Evaluation of deficiency or evaluation of strengths? 7) Overall evaluation or an individual evaluation?.

8. Advantage and expectation to psychiatric nurses

Nurses are working closely with the patient. Nurses are engaged with psychiatric service facing with the direct exposure of behavior abnormalities and complains and claims presented by the patient. So nurses are in the best positioning to understand what is the meaning of the remarks and symptoms of the patients. Psychiatric nurses can have opportunity to understand the meaning

of the symptoms to patient's life without sticking to the given diagnosis to the patients by psychiatrists. From the symptoms presented by patients, it is required for psychiatric nurses to sort out which symptom is the most painful and to identify the symptom most urgently intervene with to be of help to the patient in turn. Such a polite line will be the work that the psychiatrist nurse is most proud of.

Psychiatric care as well as psychiatric service in the future will be required to be closer to the patient. It will be implemented only if the professionals in charge of the service is willing to listen directly to subjective complaints and claims of patients. Heretofore, the complaint of patients with psychiatric disorders tended to be disregarded due to demons, such as not being constant, being illogical, not being overly objective evaluation. In future psychiatric service, such attitudes will no more be tolerated. Let's listen to patient's opinion-oriented complaints as much as possible and psychiatric nurses will be expected to play an important role in psychiatric service only if they are willing to do so.

References

- Gorwood P, Corruble E, Falissard B, Goodwin GM: Toxic effects of depression on brain function: impairment of delayed recall and the cumulative length of depressive disorder in a large sample of depressed outpatients. *Am J Psychiatry* : 165 : 731-739, 2008
- Hyman S: Neuroscience, genetics, and the future of psychiatric diagnosis. *Psychopathology* 35 : 139-144, 2002
- Jaspers K : *General Psychopathology*. Baltimore: The John Hopkins University Press, 1997. (English publication of Jaspers K, *Allgemeine Psychopathologie*, 1913)
- Kraepelin E. Die Erscheinungsformen des Irreseins. *Zschr Ges Neurol Psychiat* 62 : 1-29, 1920
- López-Ibor JJ, López-Ibor MI: Paving the way for new research strategies in mental disorders. Second part: the light at the end of the tunnel. *Actas Esp Psiquiatr* 41 : 67-75, 2013
- Möller HJ, Bandelow B, Bauer M, Hampel H, Herpertz SC, Soyka M, Barnikol UB, Lista S, Severus E, Mauer W : DSM-5 reviewed from different angles: goal attainment, rationality, use of evidence, consequences-part 1: general aspects and paradigmatic discussion of depressive disorders. *Eur Arch Psychiatry Clin Neurosci*. 2014
- Roitman SE, Keefe RS, Harvey PD, Siever LJ, Mohs RC : Attentional and eye tracking deficits correlate with negative symptoms in schizophrenia. *Schizophr Res*. 26 : 139-46, 1997
- Takeda M, Ashikaga M, Iida H, Okuno S, Tatsuoka Y, Masuda Y. Behavior, cognition, and future direction of psychiatry. *Aino J* 13, 9-25, 2014
- Thomas Insel's blog, NIMH Director, May 2013
<https://www.nimh.nih.gov/about/directors/thomas-insel/blog/2013/index.shtml> searched on Jan 23 2017