

ICD-11 AND DSM-V: WHITHER PSYCHOSES?

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INTRODUCTION

The revision of the international diagnostic classification systems of mental disorders (ICD-10 and DSM-IV) is currently fully underway. While the DSM-V development process is comparatively far advanced following a series of research conferences until 2007 with ensuing establishment of topic-related workgroups for all major diagnostic categories of mental disorders – including one for the psychotic disorders –, the ICD-11 development process has recently been catching up speed and is currently in the process of defining its workgroups in the mental disorders chapters. Note, however, that the development of ICD-11 also encompasses the revision of the diagnostic categories of the somatic disorders, necessitating the establishing of a wide range of expert groups from all fields of medicine far beyond mental disorders, and the development of an internet platform for the revision process (<https://sites.google.com/site/icd11revision/home/icat>). It is foreseeable that scientific progress will lead to a number of novel impulses for the classification of mental disorders, but recent examples like the genome-wide association studies also illustrate the complexity of questions which may arise from research applying such novel diagnostic tools to mental disorders like psychotic disorders. The genetic contribution to the liability to psychotic disorders is apparently minor for each individual risk allele, but im-

portant insights are gained regarding the overlap of risk-increasing genes in schizophrenia and bipolar disorder, and regarding the pathophysiology of psychotic disorders¹. It is estimated that one third of the variation in liability to psychoses is due to multiple common risk variants of small effect size². In addition, it becomes increasingly evident that genetic information needs to be complemented by research evidence from other areas like protein expression studies, neuro imaging, clinical phenomenology and many others³. The question of how to retrieve, sort, order, manage, and review the wealth of scientific information therefore takes center stage for a scientifically based reclassification process of psychotic disorders.

For both ICD-11 and DSM-V, one of the major issues is how to reconceptualise and classify psychotic disorders. Not only are these frequent disorders, they also form one of the core “psychiatric” disorders besides affective disorders, neurodegenerative disorders, personality disorders, developmental disorders, disorders of addiction and many others. A large amount of research results in these disorders is available and current research focuses on the identification of the pathophysiology of these disorders with a view to obtain sufficient evidence to warrant a reclassification of the psychotic disorders⁴. But besides scientific evidence, other factors also play a role in reclassifying psychotic disorders⁵. These include the problem of clinical and genetic overlap of mental disorders across the traditional boundaries of Kraepelin’s dichotomy, the high frequency of “psychosis-like” symptoms in healthy people, in only some of which this indicates an increased risk of developing a psychotic disorder, and aspects of stigmatization, which for example have led to renaming “schizophrenia” in Japan. However, recent novel model conceptions of schizophrenia have focused on putative etiopathogenetic factors including complex gene-environment interactions, learning experiences – be they stressful or not – and coping mechanisms⁶. While hallu-

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inations and delusions clearly are among the core clinical features of psychotic disorders (but are not exclusively specific to the classical psychotic disorders like schizophrenia), a clearly operationalized definition of the term “psychotic” is still lacking and “psychosis” may be one of the hard to define term, necessary for any classification system of mental disorders. It would mean a great step towards harmonization between ICD-11 and DSM-V if such basic terminological issues could be clarified by the respective psychosis workgroups with a joint votum on an operationalized definition. On the other hand, one may argue that the term “psychosis” may have had its historic values, but should be omitted now due to its ambiguity or poor conceptual foundations. Currently, however, genetic research seems to indicate that there are common risk genes for psychotic symptoms in different mental disorders and this does not only include the classical psychotic disorders like schizophrenia and bipolar disorder but also the subgroup of Alzheimer’s disease patients with psychotic symptoms⁷. This, of course, brings back the question of whether it is possible to identify the underlying common neural networks disturbed in psychotic disorders and to identify the modes of their disturbances. An important step in this direction is the recent elucidation of the pathomechanisms involved in copy number variants, although these play a role in only a minority of schizophrenia cases⁸. Hopefully, this will lead to novel therapeutic options, both in psychopharmacology and psychotherapy. One central aspect here is that the disturbances of underlying neural networks are now becoming accessible to direct assessments by sophisticated methods of neuroimaging or neuropsychological testing. This may also lead to novel ways of assessing the efficacy of therapeutic methods or to add to the diagnostic armamentarium in psychotic disorders. Here, the questions arise as how far faculties of the human mind can be distinguished from each other, how they are implemented (or “hardwired”) in functionally defined neurocircuits of the brain and what kind of disturbances in such neurocircuits can be detected in mental disorders. The idea of a “modular psychiatry”, which we have proposed as a conceptual framework for the future, may become a guiding concept in the context of the recent progress in determining neural network architecture by magnetic resonance tomography, electroencephalography and magnetencephalography^{9,10}. However, such pathophysiologically oriented diagnostic and classificatory approaches will probably only be sufficiently validated for inclusion in future revisions following ICD-11 and DSM-V.

On a more practical level, the American Psychiatric Association recently published a first draft of the DSM-V criteria on the internet. The main suggested changes in the psychotic disorders chapter were an introduction of a psychosis risk syndrome, omitting the schizophrenia subspecificers and repositioning catatonia as a specifier and not a defined subtype. Other changes were com-

paratively minor and involved some text clarifications. Comments from experts and the public are currently being evaluated to reformulate the suggestions. Also, there is an ongoing discussion about a metastructure for DSM-V and ICD-11 based on the similarity between mental disorders in eleven criteria including evidence from genetic, epidemiological, clinical and neurobiological research¹¹. It appears likely that the psychotic disorders will become one of the major groups for ordering this metastructure, although the scientific evidence for similarity of the involved diagnostic entities of the “psychosis cluster” (schizophrenia, schizoaffective disorder, schizotypal personality disorder, bipolar disorder) has been critically reviewed because while there is a certain overlap in genetic and clinical factors, there are also substantial differences which taken together make the membership definition in the cluster of the psychotic disorders somewhat difficult¹².

The process of developing ICD-11 is not that far advanced, but a psychosis workgroup is currently being formed by the WHO following a recent pre-workgroup expert symposium on the classification of psychotic disorders in Düsseldorf, Germany, in early May 2010. Here, the discussion focused on course specifiers, scientific issues for field trials and questions of utility, feasibility, and cultural adaptability. Members of the psychosis workgroup will probably be nominated this summer with a view to start the revision work this fall. This will involve reviewing the scientific evidence for reclassifications in the psychotic disorders chapter and this process will profit from the progress being made in the course of the DSM-V Psychosis Workgroup. On the other hand, ICD-11 will need to be usable in a wide variety of mental healthcare systems globally and may probably have to focus more on utility and feasibility than DSM-V. For example, the intricate dimensional assessment scheme for mental disorders proposed as an option in DSM-V may not be feasible in all mental healthcare settings and the assessment of genetic factors may also be limited by the availability of control group data from a number of countries around the world. Such aspects of global feasibility need to be addressed when developing ICD-11 and it will thus be of paramount importance to represent all WHO regions in the psychosis workgroup.

Key elements of the development processes of DSM-V and ICD-11 are the upcoming field trials, which will mainly serve to address such issues of feasibility and utility. In addition, field trials will assess the diagnostic boundaries between similar mental disorders and within clusters, as has been proposed by the respective WHO workgroup and will thus also contribute novel scientific information on classificatory issues. Establishing the enormous infrastructures for these field studies is an issue for itself but once these structures and modes of collaborations are available, it would be of high scien-

tific value to keep them active for future epidemiological or other scientific studies. This could be one of the unforeseen positive spin offs of the revision process. Also, the disorder-specific workgroups have established excellent working procedures for assessing scientific evidence of putative importance for the classification of mental disorders and it would be highly desirable from a scientific point of view to keep these groups of experts alive and working beyond the time of publication of DSM-V and ICD-11. Having such “standing expert committees” with the APA or WHO would greatly facilitate the scientific assessment of future novel scientific evidence as to further development of the classification systems of mental disorders. Of course, the question arises as who shall finance such standing expert committees? But considering the importance of the classification of mental disorders which lie at the heart of psychiatry as a medical specialty, funding going into such expert review groups is money well spent.

Thus, while incoming research evidence constantly changes our views of the pathophysiology of psychotic disorders, practical solutions for the classification of psychotic disorders in the next few years are being established. The reconceptualisation of psychotic disorders is complex and involves conceptual, pathophysiologic, social and feasibility issues. Given the high disease load caused by psychotic disorders worldwide, the task is definitely challenging but also provides excellent opportunities for improving the classification of mental disorders worldwide.

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