New classification for mental disorders with management guidelines for use in primary care: ICD-10 PHC chapter five

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SUMMARY. A primary care version of the International classification of diseases *(10th revision) chapter five for mental and behavioural disorders (ICD-10 PHC chapter five) has been developed. This provisional version focuses on 24 conditions which are frequently seen in primary care and which can be managed effectively by general practitioners. The classification is accompanied by a flipcard for each of the conditions. The cards have diagnostic guidelines on one side and management guidelines on the other. The latter provide information which should be given to the patient, advice on the content of counselling, the available treatment methods, and indications for specialist referral. This classification system is also supported by diagnostic decision making aids, medication cards, and patient leaflets to facilitate the recognition and management of patients with mental disorders in primary care settings. The draft version of ICD-10 PHC chapter five will be finalized after field trials which will test the applicability and usefulness of the system in different primary care settings in various countries.*

Keywords: psychiatric disorders; classification of diseases; diagnosis; management of disease; primary health care.

Introduction

IN 1987 the president of the World Organization of National Colleges, Academies, and Academic Associations of General Practitioners/Family Physicians (WONCA) wrote:[1] 'The development of the 10th revision [of the *International classification of diseases* (ICD)] is under way and its main outlines are now established. Whatever its final form, it is important that this edition should take into account the needs of primary care, to which the WHO [World Health Organization] has been heavily committed since Alma-Ata...'[2] The introduction of mental health components into primary health care has been one of the main objectives of the WHO's division of mental health, and its present aim is to produce a classification which corresponds to the psychological disorders that are common in primary care settings, and which can be linked to management plans for each condition.

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Tenth revision of the *International classification of diseases*

The generation of international classifications is a constitutional task for the WHO. The ICD has been revised 10 times since it was drafted in the mid-19th century. The 10th revision of the ICD was introduced in 1993. It contains a chapter dealing with mental disorders, accompanied by glossary notes defining each category. These definitions are part of the effort to form a 'common language' as a basis for communication between mental health workers, governmental agencies and the parties concerned. Since the various user groups will have different needs when using the international classification, the WHO division of mental health in collaboration with several institutions and individuals in many countries developed different versions of ICD-10 chapter five.[3] Already in existence are a version for clinicians,[4] and a version for researchers.[5] The purpose of this paper is to present preliminary information about a version especially designed for use by general practitioners. Field trials of this version are currently being carried out in more than 50 countries and are nearing completion, after which further amendments will be made.

Diagnosis and classification of mental disorders in the primary care setting

Mental disorders are common in primary health care settings, and are present in between 15% and 40% of consecutive attenders.[6,7] An international study by the WHO in 14 countries representing both the developing and the developed world, shows that although the prevalence of individual disorders varies, similar syndromes of disorders are to be found in all centres.[8] It is therefore timely to produce a classification that can be used internationally.

There are many different factors affecting the issues of diagnosis and classification of mental disorders in primary care settings: the nature of the work in the health service, the interventions available, the training of the practitioners, and general practitioners' decisions about recognition and management of these problems have to be taken into account. In order to evaluate primary health care services, data are needed which show the diagnosis from each consultation. Classifications designed by psychiatrists such as ICD-10 or DSM-IV (*Diagnostic and statistical manual of mental disorders, fourth edition*) are generally found to be too complicated for use in general medical settings. General practitioners are unlikely to use these classifications.[9]

The *International classification of primary care* (ICPC) produced by WONCA[1] has recognized these problems and produced a list of 41 mental conditions — of which 18 are either identical or broadly similar to those presented in this paper. The differences stem mainly from the requirement in the present proposal to link concepts to clear advice on management. Although the alphabetical index of ICPC is strikingly comprehensive, the need

to compress all mental conditions into the 41 codes results in rather heterogeneous problems receiving the same code: for example amnesia, hallucinations and delusions are all coded as P20 disturbances of memory/concentration/orientation. Several important disorders are coded into 'other' categories: thus delirium is coded P71 other organic psychosis, agoraphobia as P79 other neurotic disorder, and so on. The disorders recognized by ICPC but not by the present proposals include many disorders that are in effect single symptoms (for example, feeling tense, feeling irritable or feeling depressed), some for which there are no clear interventions (for example, personality disorder or concern with sexual preference) and others which are heterogeneous residual categories (for example, other psychological symptoms and complaints, other organic psychosis, other neurotic disorder and other concern with behaviour of child).

The *International classification of health problems in primary care* (ICHPPC-2-defined) produced by WONCA,[10] also has troubles of oversimplification, since the 21 conditions recognized as mental disorders are sometimes overinclusive, and at other times do not allow recognition of important syndromes. For example, dementia and delirium are included together under organic psychosis and all childhood disorders are grouped together, while chronic psychosis, neurasthenia and unexplained somatic symptoms are not included.

In the early 1980s the WHO produced a triaxial classification of health problems presenting in primary care.[11,12] This consists of a list of problems which assists in the identification and recording of these problems using three different axes (psychological, social and physical). The main difference between the current proposal and the triaxial classification is that the current proposal is an ICD-10 based mental disorder classification where disorders are recorded rather than problems. The two schemes serve different purposes but if desired could complement each other.

Primary care version of ICD-10 chapter on mental disorders: ICD-10 PHC chapter five

ICD-10 PHC chapter five is tailored to meet the needs of general practitioners worldwide and it corresponds approximately to the full version of chapter five of ICD-10. The diagnoses are classified in 10 major groups, each subdivided into many diagnoses, most of which are not needed by general practitioners. The final version of ICD-10 PHC chapter five will include provisions for handling these diagnoses. These will not be discussed here, since the focus of the present work is on frequently used categories and the improvement in the management of these conditions.

ICD-10 PHC chapter five has been designed with the following requirements in mind. It should be: easy to understand and user-friendly; brief (containing a small number of categories); linked with advice on management (including treatment); compatible with and translatable into ICD-10 and other classifications; and reliable (that is, allowing different users to reach the same diagnosis).

The ease of training in and the educational uses of the classification were also regarded as important. It is presented as a user-friendly system that different types of primary health care personnel in different parts of the world will find easy to learn and to use. It should be helpful in training primary health care workers to improve their skills in recognizing, identifying and managing the disorders contained in it.

The components of ICD-10 PHC chapter five are: a list of categories with their diagnostic features; a set of guidelines for management; and a set of modules for recognition and identification of the disorders (flowcharts/algorithms).

The categories given prominence from the main ICD-10 classification scheme (Table 1) reflect a selection progress depending on:

Table 1. List of the 24 categories of ICD-10 PHC chapter five showing equivalent ICD-10 and ICPC categories.

	ICD-10	ICPC
Organic disorder (F0)		
Dementia	F00[a]	P70
Delirium	F05	P71[b]
Psychoactive substance abuse (F1)		
Alcohol use disorder	F10	P15, P16
Drug use disorder	F11[a]	P18, P19
Tobacco use disorder	F17.1	P17
Psychotic disorders (F2)		
Acute psychotic disorders	F23[a]	P71[b]
Chronic psychotic disorders	F20	P98[b]
Mood, stress-related and anxiety disorders (F3 and F4)		
Bipolar disorder	F31	P73
Depression	F32[a]	P76
Phobic disorders	F40[a]	P79[b]
Panic disorder	F41.0	P74[b]
Generalized anxiety	F41.1	P74[b]
Mixed anxiety and depression	F41.2	–
Adjustment disorder	F43	P02
Dissociative (conversion) disorder	F44[a]	P75
Unexplained somatic complaints	F45	–
Neurasthenia	F48.0	P78
Physiological disorders (F5)		
Eating disorders	F50[a]	P11
Sexual disorders	F52	P07, P08
Sleep problems	F51[a]	P06
Mental retardation (F7)		
Mental retardation	F70	P85
Childhood and adolescence (F9)		
Hyperkinetic disorder	F90	P21
Conduct disorders of childhood	F91	P22
Enuresis	F98	P12

Other categories in ICD-10 PHC chapter five to accommodate remaining diagnoses will be provided in the final version of the ICD-10 PHC chapter five, for coding purposes. For a full conversion between ICD-10 and ICPC see reference 13. The conversion codes were kindly provided by Charles Bridges Webb (WONCA).[a]More than one code of ICD-10 chapter five is included: eg F00 includes F00–F04. [b]Grouped categories.

- The public health importance of the disorder (that is, its prevalence; the morbidity or mortality, and disability resulting from the condition; the burdens imposed on the family or community; and the health care resources needed to help people with the condition).
- The availability of effective and acceptable management for the disorder: intervention methods with a high probability of benefit to the patient or her/his family should be readily available in primary care and acceptable to the patient and the population.
- Consensus regarding classification and management: a reasonable consensus should exist among primary care physicians and psychiatrists regarding the diagnosis and management of the condition.
- Cross-cultural applicability: suggestions for identification and management should be appropriate and practical across various cultural settings and health care systems.
- Consistency with the main ICD-10 classification scheme: a category in ICD-10 PHC chapter five should correspond to

one or more ICD-10 diagnoses; diagnostic features listed in ICD-10 PHC chapter five should be translatable and consistent with those listed in the ICD-10 guidelines.

All the categories that were chosen for inclusion are reasonably common in primary care settings, and it was possible to write a management plan for each of them. The list of categories will be stable and used in international and national comparisons, although categories that are reported infrequently in a particular country (for example, eating disorders in India, or dissociative disorder in the United Kingdom) might be omitted from the list commonly used in that country. The management guidelines, on the other hand, may well vary depending on the country, health care system and the amount of training of the users.

The list of categories is compatible with (and translatable to) ICD-10 and is expected to be translatable to the next version of ICPC.[14] The arrangement of primary care diagnoses shown here follows ICD-10 in the main, although depression has been included in the same grouping as anxiety, stress-related disorders and unexplained somatic symptoms, reflecting the difficulty in making sharp distinctions between these disorders in general medical settings (Table 1). For recording purposes ICD-10 PHC chapter five contains other specified mental and behavioural disorder and unspecified mental and behavioural disorder categories to allow for disorders which have not been given prominence in the classification.

Diagnostic and management guidelines

A 'flipcard' style has been provisionally adopted for the guidelines for the field trials; the card has diagnostic guidelines on one side and management guidelines on the other. The diagnostic guidelines for depression are given as an example in Figure 1. The user is provided with diagnostic information for each of the 24 diagnoses, and will only turn the card over if the information is thought to be applicable to the patient under review. Alternative presentations might include having the 24 cards in a ring binder, or a computerized version of the classification. These possibilities are being discussed with users during the field trials. The general headings for the diagnostic guidelines are:

- Presenting complaints — problems typically seen in primary care patients; to avoid repetition those presented as diagnostic features are not restated as presenting complaints.
- Diagnostic features — a concise representation of ICD-10 diagnostic guidelines.
- Differential diagnosis — other medical or mental conditions that need to be considered in making a diagnosis.

The management guidelines for depression are given as an example in Figure 2. Modifications to reflect local conditions can

DEPRESSION — F32*

Presenting complaints

May present initially with one or more physical symptoms (fatigue, pain). Further inquiry will reveal depression or loss of interest.

Sometimes presents as irritability.

Diagnostic features

LOW OR SAD MOOD

LOSS OF INTEREST OR PLEASURE

Associated symptoms are frequently present:

- Disturbed **sleep**
- **Guilt** or low self-worth
- **Fatigue** or loss of energy
- Poor **concentration**
- Disturbed **appetite**
- **Suicidal** thoughts or acts

Movements and speech may be slowed, but may also appear agitated.

Symptoms of anxiety or nervousness are frequently also present.

Differential diagnosis

If hallucinations (hearing voices, seeing visions) or delusions (strange or unusual beliefs) are present, see also card on acute psychotic disorders F23* about management of these problems. If possible, consider consultation about management.

If history of manic episode (excitement, elevated mood, rapid speech) is present, see card on bipolar disorder F31*.

If heavy alcohol use is present, see cards on alcohol use disorders F10* and drug use disorders F10*.

Figure 1. *Diagnostic card for depression.*

Essential information for patient and family

1. Depression is common and effective treatments are available.
2. **Depression is not weakness or laziness;** patients are trying their hardest.

Specific counselling to patient and family

1. **Ask about risk of suicide.** Can the patient be sure of not acting on suicidal ideas? Close supervision by family or friends may be needed.
2. Plan short-term **activities which give enjoyment or build confidence.**
3. **Resist pessimism and self-criticism.** Do not act on pessimistic ideas (for example, ending marriage, leaving job). Do not concentrate on negative or guilty thoughts.
4. If physical symptoms are present, **discuss link between physical symptoms and mood** (see card on unexplained somatic complaints).
5. After improvement, discuss signs of relapse, plan with patient action to be taken if signs of relapse occur.

Medication

1. **Consider antidepressant drugs if sad mood or loss of interest are prominent for at least 2 weeks and 4 or more of the following symptoms are present:**

Fatigue or loss of energy	Disturbed sleep
Guilt or self-reproach	Poor concentration
Thoughts of death or suicide	Disturbed appetite

Agitation OR slowing of movement and speech

If good response to one drug in the past, use that again.

If older or medically ill, use newer medication with fewer side effects.

If anxious or unable to sleep, use more sedating drug.

2. **Build up to effective dose** (for example imipramine starting at 25 to 50 mg each night and increasing to 100–150 mg in 10 days) — lower doses if older or medically ill.
3. **Explain how medication should be used:**
   Medication must be taken every day.
   Improvement will build over 2–3 weeks.
   Mild side effects may occur and usually fade in 7–10 days.
   Check with the doctor before stopping medication.
4. **Continue antidepressant** drugs for at least 3 months after symptoms improve.

Specialist consultation

1. If **suicide risk** is severe, consider consultation and hospitalization.
2. If **significant depression persists,** consider consultation about other therapies.
3. **More intensive psychotherapies** (for example, cognitive therapy, interpersonal therapy) may be useful for acute treatment and relapse prevention.

Figure 2. *Management card for depression.*

be made during translation or adaptation of these cards. The general headings for the management guidelines are:

- Essential information for patient and family — general knowledge about the disorder such as the nature or cause of mental disorders given as general health education.
- Specific counselling to patient and family — advice and psychotherapeutic strategies concerning the particular condition: how to cope, what to do and so on.
- Medication — advice on the use of drugs (effects, how to use, side effects and ways to increase compliance).
- Specialist consultation — indications on when and/or how to refer to a specialist.

The cards contain information which is considered essential for all patients to whom they apply. Regarding medication, advice is given in general terms about prescribing, and about the desirability of particular groups of drugs. Accompanying medication cards which summarize useful information on the essential drugs available in the country are being developed; these could be modified according to local usage. In addition, patient leaflets are being developed to complement the management strategies outlined (for example, a guide to sensible drinking, learning to relax and so on).

Modules for recognition and identification

Several flowcharts accompany the primary health care classification and serve as learning and decision support tools to be used during the everyday work of general practitioners and in their training. Similar flowcharts were constructed and field-tested in earlier WHO work.[15] It has been shown that flowcharts are useful for teaching and assist in decision making.[16,17]

The flowcharts form the basis for the sequence of diagnostic decisions and show which cards to use. Figure 3 shows a general flowchart for alcohol use disorder, dementa, delirium and so on. This chart should be used for any patient who shows signs that may suggest mental disorder. The flowchart is useful for training purposes in order to teach decision making and differential dia-

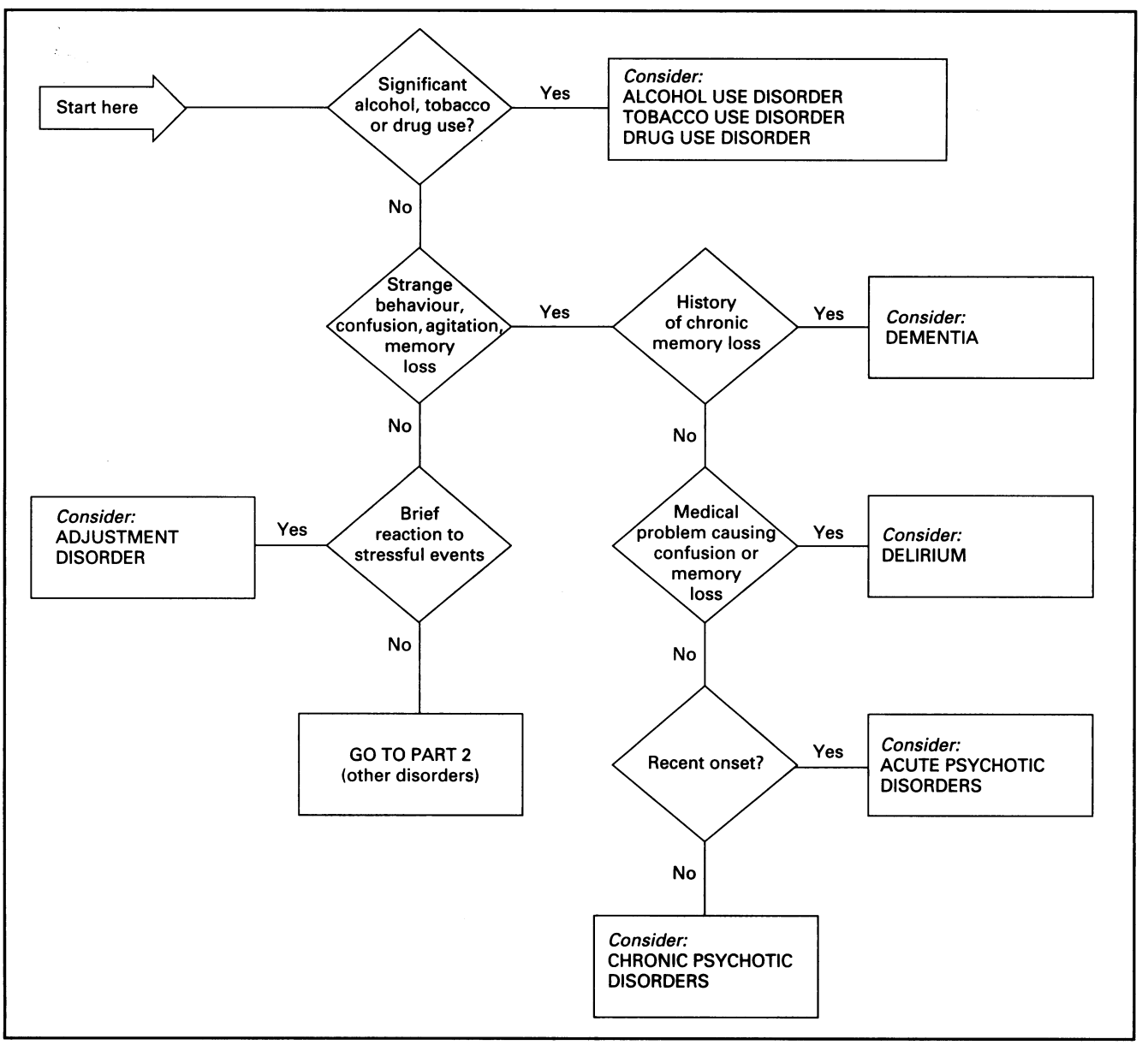

Figure 3. *A decision-making flowchart for alcohol use disorder, dementia, delirium and so on, to be used with ICD-10 PHC chapter five.*

gnosis. A complete set of flowcharts, one for each diagnostic group, showing how diagnoses are made in ICD-10 PHC chapter five is being developed and tested as part of the field trials.

In addition to the flowcharts, a symptom guide for differential diagnosis is also being developed. This provides different entry points to the classification system, for example differential diagnostic indexes for key symptoms such as appetite loss, tiredness, insomnia, anxiety, fears, inattention and so on.

In view of the increasing role of computers in the primary health care setting, at least in some parts of the world, the WHO is also exploring the possibility of developing a simple computerized expert system to help or guide primary health care physicians in making their diagnoses, providing information necessary for their decision making.

Simplified version of ICD-10 PCH chapter five

A simplified version of ICD-10 PHC chapter five has been prepared for use by primary health care workers with lower levels of medical and mental health training. This version includes only six guideline cards: memory loss and confusion, alcohol and drug use disorders, psychotic disorders, depression, anxiety and unexplained somatic complaints.

Field trials for ICD-10 PHC chapter five

Field trials for ICD-10 PHC chapter five have been conducted in a number of centres testing the list of categories and the definitions, the flowcharts and the guidelines for management in primary care settings. The aims of the field trials are: to assess the adequacy of ICD-10 PHC chapter five, that is how well the classification describes the various types of mental and behavioural disorders in primary care settings in different cultures and health care systems; to assess how easy it is to train primary care physicians to use the classification, and how easy the classification is for them to use in practice; to assess the inter-rater reliability of the classification; to assess the applicability of procedures described in the management plans; and to make further modifications to the classification in the light of the experience of primary care physicians themselves.

Apart from the assessment of reliability, some centres will be able to test the effect of the convergent validity of ICD-10 PHC chapter five, by determining to what extent assessments made using the new classification agree with those of psychiatrists using standardized research interviews.

When the results of the field trials have been evaluated modifications will be made to the present version of ICD-10 PHC chapter five with the aim of producing a classification which will allow international comparisons and which will improve both the recognition and the management of mental disorders in primary care settings.

Readers are invited to contact the WHO at the address for correspondence for information concerning the field trials and with comments about ICD-10 PHC chapter five.

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