WHO COLLABORATIVE PROJECT ON IDENTIFICATION AND MANAGEMENT OF ALCOHOL-RELATED PROBLEMS IN PRIMARY HEALTH CARE: PHASE IV - DEVELOPMENT OF COUNTRY-WIDE STRATEGIES FOR IMPLEMENTING EARLY IDENTIFICATION AND BRIEF INTERVENTION IN PRIMARY HEALTH CARE

CHAPTER 6

DENMARK

Sverre Barfod

6.1. Introduction

6.1.1. Brief country description

Denmark has a population of roughly 6 million. There are 3,600 general practitioners (GPs) and 12,000 physicians in total. Hospitals are almost all public and are managed by the Danish counties. Primary health care is almost completely public and based on agreement between the Organization of General Practitioners *(Praktiserende Lægers Organisation)* and the National Health Service (*Den offentlige Sygesikring*). The GP is paid partly per capita (25%) and partly by fee for service (75%). GPs work in their own clinics, mostly in groups. Around 25% work in single-handed clinics.

6.1.2 Brief history of responses to alcohol problems

Medical treatment is largely based in hospitals and is concerned with physical harm from heavy drinking. However, in the last few years an EU project on 'Healthy City Hospitals' has focused on prevention in hospitals and a guideline for hospital professionals is now available[1]. In Danish primary health care there has been no tradition of treating alcohol problems; for about a century, voluntary organizations have done this work. In the health services, treatment of alcohol abuse is provided mostly in outpatient clinics directed by the county authorities with a staff of social workers, psychiatrists and psychologists.

6.1.3. Available data on alcohol consumption and problems

According to data from the National Board of Health[2], Danes aged 14+ consumed 11.5 l of pure alcohol in 2001. This figure has been roughly unchanged since the mid 1970s. The peak was in 1983 with 12.8 litres. Since 1996 it has declined by 0.6 l. In comparison with 17 European countries, 6 consume more alcohol than the Danes: Luxemborug is at the top with more than 12 l, Iceland is bottom with less than 5 l. Alcohol-related deaths have more than doubled in the last 30 years, from 2% of all deaths in the early 1960s to 4.6% in 1998. The number of alcohol-related deaths per 100,000 inhabitants (aged 14+) in 1998 was 61 (liver cirrhosis 27, pancreatitis 27 and alcoholism/alcohol psychosis/alcohol poisoning 7 deaths).

6.1.4. Previous research on alcohol brief interventions

Alcohol research has been mainly in the field of sociology but in the last few years there have been some studies of treatment effectivenes. From 1994 the Danish National Board of Health *(Sundhedsstyrelsen)* has given funds specifially for research on alcohol problems. Unfortunately in the last few years priority has been given to non-medical projects but an essential study of matching was published in 2001 from the fields of psychiatry and behavioral science[3]. Early intervention has rarely been practiced and mainly only by specially interested GPs. Documentation of this is scanty.

6.2. Customisation

6.2.1. Findings from focus groups

In an interview survey in 1995[4], GPs explained their reluctance to talk about alcohol. They were not sure how to open the subject, had unfortunate experiences of trying to persuade patients to reduce consumption, and believed that patients did not listen or were lying. Also, GPs did not know what to do if patients really had serious alcohol problems.

These observations were confirmed in the Phase IV project. It emerged from two focus groups with 15 GPs in Frederiksborg County that GPs commonly felt it difficult to avoid moralising, or seeming to moralise, when asking patients about alcohol consumption and advising them to reduce. GPs found it difficult to talk about alcohol if obvious symptoms were absent. And it was often frustrating when patients denied alcohol problems or hazardous comsumption. Many GPs felt a lack of ability in coping with these problems.

6.2.2. Specific aims of customisation

The materials used in the Phase IV project were customised during educational activity in continuous medical education (CME) groups. In Frederiksborg County, which was the local Phase IV intervention area, more than 90% of GPs are members of one or more groups. Participants in the GP focus groups suggested that these small CME groups could be used as arenas for disseminating knowledge and know-how and developing or training skills in handling risky drinking and alcohol abuse. This was one of the reasons the project leaders prepared and offered an educational package to these small CME groups.

The educational package consisted of two meetings, each lasting two hours, and was offered to 21 small CME groups in autumn 2001. The aim was to reframe understandingsof alcohol problems towards the concept of risky drinking and to teach when to talk about alcohol, how to raise the subject, the principles of brief intervention, handling barriers and difficulties, plus a demonstration of the principles of motivational interviewing[5].

The promotion of the CME project was done through an article in the local GP journal, through letters of invitation to each of the small groups and indirectly through a medical audit registration in November 2000.

6.3. Reframing

GPs accepted to some extent the idea of working with alcohol problems other than addiction ("alcoholism") but the experience of the CME courses was that we could not choose alcohol or hazardous and harmful drinking as the *only* topic for the project. GPs told us that if the project were aimed at tobacco, exercise and overweight *as well*, they would be more interested. We were thus convinced that alcohol problems do not “sell tickets”.

Hence we had to offer training of more generic skills, useable over a much broader range but including alcohol issues. In addition, many of the strategies we sought to teach were feasible to use in other areas too and relevant overall to the doctor-patient relationship. That is, difficulties in communication and frustrations can impede the doctor in talking about alcohol with the patient even when it is clinically relevant. For these reasons, in 2000 a project was designed to investigate whether education and training could enhance doctors' ability to

communicate with patients in difficult matters such as reducing alcohol consumption and smoking cessation.

As promised during the meeting of Phase IV investigators in Bled, January 2000 we tried to develop a questionnaire on attitudes to reframing by testing the one presented in Bled. At the end of his visits to GPs, an academic detailer in one of the counties of Denmark asked each of them to fill in the questionnaire immediately. 30 questionnaires were sent to Newcastle for analysis but the data had a low internal consistency and no meaningful factor structure.

Reframing of the understanding of alcohol problems should take place in small-group based CME activities where the GPs' understanding and attitudes should be highlighted and, if necessary – challenged and changed.

6.3.1. Communications strategy

The conception of early detection and brief intervention for hazardous and harmful drinking is now accepted in institutions responsible for educating medical professionals. But there is a large proportion of active professionals in both primary and secondary health care who lack knowledge in this area.

In some of the Danish counties, courses have been run on treating alcohol problems and members of the Danish Phase IV group were often invited to lead or contribute to these courses. As a part of the implementation activity in the intervention county of the project, recommendations for handling alcohol problems have been shown on the national health website from December 2003[6].

A proposal for a *national strategy* aimed at providing knowledge and training to medical professionals was sent to the Danish National Board of Health in 2003. Unfortunately the Board showed no interest. With support from the EU project (PHEPA), it could be possible to increase the interest of central authorities in this area in future.

6.3.2. Media contacts

Relevant articles published in professional journals are as follows:

i. Zachariassen A, Barfod S, Jørgensen AF, Sørensen E, Vendsborg P. Behandling af alkoholmisbrug efter kontrolprincippet i almen praksis. *Månedsskr Prakt Lægegern* 1991; 69: 629-632.
ii. Barfod S. Skal alkoholmisbrug overhovedet behandles i almen praksis. *Practicus* 1995; 96: 180-181.
iii. Barfod S. Flere behandlingsmuligheder for alkoholproblemer. *Ugeskr Læg* 1995; 157: 7054-7055.
iv. Barfod S, Beich A, Jørgensen AF, Sørensen E, Sørensen HS, Vendsborg P, Zachariassen A. Tidlig intervention mod alkohol-problemer. *Månedsskr Prakt Lægegern* 1996; 74: 1303-1307.
v. Sørensen E, Barfod S, Jørgensen AF, Zachariassen A, Vends-borg P. Praktiserende læger og kontrolprincippet. En interview-undersøgelse. *Månedsskr Prakt Lægegern* 1997; 75: 369-373.

vi. Barfod S. General practitioners' barriers on talking about alcohol with their patients. *European Psychiatry* 1998; 13: 190-190s.
vii. Zachariassen A. Alkoholkontrolprincippet i praksis. Behandling af alkoholstorforbrug i almen praksis efter kontrolprincippet. *Månedsskr Prakt Lægegern* 1998; 76: 985-988.
viii. Hansen LJ, Olivarius NdeF, Beich A, Barfod S. Encouraging GPs to undertake screening and a brief intervention in order to reduce problem drinking: A randomised controlled trial. *Family Practice* 1999; 16: 551-557.
ix. Thorsen T, Barfod S. Det er svært ikke at virke moraliserende. *Det Blå Blad* 2000; 22: 13-14.
x. Andreasen J. Lægen som motiverende sundhedskonsulent (Interview). *Ugeskr Læg* 2002; 164: 548-550.

In 2001 the project leader (SB) was a member of the *Hornum Committee* under the Ministry of Health with the task of describing the extent of alcohol abuse in Denmark and the target groups for treatment.

Examples of other media activities are:

- Articles in magazines:
  Barfod S. Så stil dog det spørgsmål! *Alkoholpolitisk Magasin* 1996; 4: 14-15.
  Barfod S. Praktiserende læger hjælper med ændring af drikkevaner. *Læge-Helse* 2002; 3: 15
- Interview on a regional radio programme.
- Article in a county newspaper.
- Lectures at conferences for social workers.

6.4. Strategic alliance

6.4.1. Organisations signing up to the alliance

Intervention county: In the 3 years from 2000 to 2002 the Committee for Prevention (Forebyggelsesrådet) and the Board for Quality Development (Kvalitetsudviklingsudvalget) supported the activity of the project leader in facilitating co-operation between general practice, hospitals, private specialists, outpatient departments offering alcohol treatment, local authorities in the municipalities and NGOs.

National: Because of lack of interest from government authorities, this part of the work did not succeed.

6.4.2. What activities and how successful?

Intervention county: All partners in the alliance were invited to a meeting to discuss how co-operation could be described and improved. Very few attended and only two participatns had the professional or employer’s authorisation to follow up on this task. A proposal for a guideline for GPs was mailed out to partners for comment and, after some valuable corrections, this became the recommendation mentioned under "Communications Strategy" (see 6.3.1. above). At the beginning of 2004 it was mailed to all GPs in the county.

National: Our suggestion for a national strategy included disseminating the effort to educate medical professionals, especially in general practice, in treating alcohol problems by:

a) establishing the education of trainers for advising on behavioural change, with the aim of assisting regional authorities of CME;

b) evaluating methods of training;
c) developing and distributing educational material (videos, information sheets, etc.);
d) sustaining international collaboration and the exchange of knowledge

As mentioned above, these plans found no support. However, because the demonstration project had funding for 3 years (2000-2002), this lack of interest from some of the alliance partners did not interfere with the completion of the project.

6.5. Demonstration Project

6.5.1. Background

From Phase III of the WHO Collaborative Project in Denmark, we had strong evidence to believe that Danish GPs regarded routine screening for risky drinking as inappropriate and maybe even counter-productive. This meant that screening could not be promoted as a routine procedure; it had to be presented as an *option*, e.g. as screening-like procedures in broad preventive consultations. Instead of routine screening, diagnostic indications of heavy, risky or harmful drinking had to be highlighted, as had methods for overcoming patients' denial of heavy drinking or alcohol problems, and methods for motivational interviewing, counselling and referrals to specialist treatment etc..

Thus, the contents of our intervention (i.e., the knowledge and skills we wanted to implement in general practice) were identification, counselling, treatment and appropriate referral of patients with heavy drinking or problem drinking – in short, *Alcohol Intervention* (AI). This adjustment of the original contents did not substantially change the implementation and research design.

6.5.2. Preparation and planning the intervention

Focus groups

During May and June 2000, we ran two focus groups (FGs) with a total of 15 GPs participating and lasting for two hours each. The purpose of the focus groups was to obtain information on GPs' preconceptions of alcohol problems and prevention, their attitudes to and experiences with alcohol intervention, counselling, treatment etc.. We also wanted to know what kind of barriers they perceived from patients taking part in counselling, referrals etc. and whether there any structural barriers that make implementation of early identification and brief intervention (EIBI) or AI difficult. Moreover, we wanted to discover what knowledge and skills GPs needed to be able to deliver an optimal service to heavy drinkers and alcohol abusers. And how would they prefer to have CME-activities delivered/implemented?

As described in the section 6.2.1. above ("Findings from focus groups"), we then concentrated on factors that GPs perceived to be barriers to a smooth and efficient implementation of prevention and the handling of heavy and harmful drinking in general practice.

Patient attitudes
Because we had the impression – and this was confirmed by the FGs – that GPs were uneasy about patients' responses if they brought alcohol up as an issue during the consultation, we decided to investigate whether patients really dislike their doctors asking about their drinking habits and other life-style issues. First, we tried to construct a small questionnaire (22 items) as the data collection instrument. However, over two small pilots/validations, we realised that this method was not feasible. Instead, we set up a focus group with 8 patients from a general practice in Frederiksborg County addressing the same issues as the intended questionnaire.

From the focus group we received the impression that patients do accept their GP asking them questions about their alcohol consumption pattern when the problem presented might be alcohol-related. But screening-like procedures without relevance to the problem/disease would not be popular.

6.5.3. Intervention

In Denmark, there is a network of small CME groups. The members of these groups themselves decide which topics they want to deal with and how they will do that. The number of members is normally between 5 and 12. Some groups have a permanent character, while others are *ad hoc* - based on and devoted to a special problem - so that when the problem or issue has been exhausted the group is dissolved. In Frederiksborg County, over 90% of GPs are members of one or more groups.

Much implementation research in the medical field favours the use of local groups. New knowledge and skills can be discussed with colleagues in the context of the local medical culture and this is important because a consensus here is paramount for uptake in daily routine practice. Innovations, clinical guidelines etc. will acquire a more rapid footing in daily practice when the target group has a sense of ownership through discussing and accepting the innovation and through translating or transposing guidelines to local needs and sentiments.

The doctors were told that participation would enhance their skills and competence in handling alcohol issues and motivating patients etc.. Participation was free, i.e. the GPs did not have to draw on resources from their CME account.

Before launching the package in the first CME group we made an extension to the offer. Each participating GP could have a professional actor coming to the consultation room to simulate a patient with a problem or a disease that *might* be alcohol-related. The simulated patient in all cases had a somewhat high level of alcohol consumption (but this was not told to the GP unless s/he asked, or asked in a patient-centred way that persuaded the patient to drop resistance and be sincere). The simulated patient made an appointment for a consultation in the same way as ordinary patients. When entering the consultation room the actor revealed that s/he was an actor. The consultation lasted about 15 minutes (normal for a consultation) and was audio-taped. The tape was transcribed and used for feedback to the GP and for teaching and training at the second 2-hour meeting in the CME small group.

Both sessions in the group were focused on topics like:
- when should alcohol consumption be an issue?
- the transtheoretical model of change

- the spirit of motivational interviewing
- raising the issue of alcohol consumption
- avoiding resistance
- other MI techniques

The first meeting was focused on having GPs think about their practice and attitudes towards handling risky drinkers and alcohol problems, and to realising their problems and needs in relation to this category of patients and this task. Thus, the meeting was intended to function as an "eye-opener" (i.e., a starter that makes GPs consider their own practice regarding their handling of heavy drinkers) and to help participants define needs (knowledge, skills). Techniques of motivational interviewing and health behaviour change counselling were demonstrated and discussed.

During the second meeting GPs' experiences with the simulated patient were discussed and the transcriptions were used for this and for teaching, as mentioned above. Other specific issues and needs raised during the first meeting were also addressed.

However, in spite of what we regarded as a "special offer" and in spite of our marketing activities, the participation rate has been rather low. We will return to this below under the heading of "Problems and Miscellaneous" (section 6.5.6).

6.5.4. Monitoring

The year 2001 was scheduled as our year of intervention when all CME groups were supposed to have the 2x2-hour sessions. During that year we intended to monitor the project carefully, making it possible: 1) to know how the implementation actually ran; 2) to allow for adjustments and removal of unforeseen barriers and problems; 3) to know which parts of the intervention were the most appropriate and effective. (Unfortunately the participation of GPs transpired to be so scanty that changing project plans was necessary, see 6.6.)

We did not plan a full monitoring. Instead, we were less ambitious and had a panel of GPs and their partners (out-patient clinics, psychiatric wards, etc.) whom we visited regularly and asked relatively systematic questions about problems experienced, e.g., in asking patients about their alcohol consumption, in breaking the denials of problem drinkers, in the co-operation with referral institutions, and about information and written materials needed.

Supervisory meetings
Having participated in the small group-based CME and having tried out and practiced the new knowledge and methods in daily practice, GPs would have questions and problems they wished to discuss with each other and with those responsible for the intervention and the project. Therefore, we tried to set up meetings where such matters would be discussed and the GPs could be advised. We expected to have such meetings a couple of times during the year of intervention.

Internet
We are considering supplying the other elements of the intervention by an alcohol project-related homepage that is available only to the GPs in Frederiksborg County. (The restriction to GPs in this county is made to avoid contamination with the control areas). The homepage would be intended to bring new information about current interest and relevance for the handling of heavy drinking and alcohol problems; it should contain diagrams, forms and other

tools for downloading and use during consultation. There should be a discussion database and a FAQ-site could be included.

6.5.5. Evaluation

Of course, one wants to know whether this approach to disseminating knowledge and know-how has any impact on the performance of the target group, the GPs. Therefore, we planned an outcome evaluation and a process evaluation.

Outcome evaluation
We used a quasi-experimental design with pre- and post-measurements, with Frederiksborg County as the intervention group and 5 other counties as the control group. In the intervention group, all GPs were asked to fill in a medical audit registration form for all their adult patient consultations during a 2-week period in November 2000 and this procedure was repeated after the intervention period (in the beginning of 2002). We expected that 50 of the 230 GPs in the county would be willing to fill in the registration form twice. To have a control group of the same size we approached 275 GPs selected randomly from 5 randomly selected counties. (The reason for not selecting only one county for the control group was to avoid the possibility that the chosen county would turn out to be very active in this particular field during the intervention year, thus reducing the ability to find a possible intervention effect.)

The categories in the medical audit registration form were built partly on the focus group discussions, partly on the goals of the intervention itself (more activity in the areas of identification, assessment, motivational interviewing, counselling, referrals etc.). Thus, outcome is here defined as the clinical performance of the GPs. Patient outcome measures such as morbidity, mortality, driving under intoxication, arrests for drunkenness, referrals to specialist treatment etc. were not considered appropriate because of small numbers as well as a certain time lag in such parameters, not to speak of possible confounders. Nevertheless, we were able to look into the available statistics at the end of the project to check whether our expectations were confirmed or not.

Process evaluation
In order to interpret and qualify any positive or negative evaluation effects, a process (or implementation) evaluation needed to be undertaken, the aim of which was to describe to what extent – or whether – the programme was implemented as planned, whether it ran smoothly, or whether there were any barriers that might explain suboptimal outcomes.

The above-mentioned monitoring of the implementation process (for adjusting the intervention) also worked as a data collection for the process evaluation. The data and experience from the monitoring was be supplemented by individual qualitative interviews with GPs and other key persons and by focus groups with GPs as participants.

6.5.6. Problems and miscellaneous

Low response rate at the pre-measurement

The medical-audit-like 2-week registration form was sent to all GPs in the County of Frederiksborg (N=246) and a random sample of GPs in five other counties (N=275). As an incentive the GPs were offered a gift if they filled in the forms.

However, the response rate was low. In Frederiksborg County we had a 34% response rate (84/246) and in the control group 22%. This problem was accentuated by the fact that only about half of those participating in the training sessions in the intervention group had made the medical audit registration beforehand.

GPs not interested

Another problem our project ran into was minimal interest from GPs to engage in the CME activities offered in this project. Five groups asked us to come and the attendance rate was not high. About half the members of these CME small groups participated in both meetings.

No quantitative evaluation

With the prospect of having very few participants in the intervention group (half of whom had not filled in the medical audit registration in November the year before) we faced a serious problem of statistical power. At best we had figured out at the beginning to have 25 GPs in the intervention group that participated in the intervention *and* registered patient contacts both before and after the intervention year. Thus, remembering that this was a demonstration project that was to document the impact of a broad implementation of EIBI on the performance of GPs within a region (in this case, Frederiksborg County), we were in difficulties. Repeating the medical audit in the beginning of 2002 made no sense.

An alternative was a qualitative, in-depth interview study with those who had actually participated in the CME-activities.

6.6. Revised Demonstration Project

The problems described above led us to change the project plan in August 2001. The quantitative outcome evaluation was abandoned and the project was turned into a smaller method-development project where we tried to get GPs interested in participating in workshops in their own practices and let them define their own needs for training within the area of health behaviour change counselling and motivational interviewing.

We did not choose *alcohol* or *hazardous and harmful drinking* as the topic, as described in the beginning of this chapter. Instead, the project had the following outline.

6.6.1. Workshops

The teaching and training sessions were different from those already attempted and described above by being less top-down and less directive. While hitherto we had taught skills that we as teachers regarded important and useful for the particpating GPs, we now let them discover and decide what were the weaknesses that they wanted to improve/eradicate.

GPs were offered a multi-stepped workshop that allowed them to find out about their wants and wishes and to obtain training tailored to for this. Using catch-words, one could say that the clinician is the expert in what and how to learn, and the trainer's role is to facilitate and to provide useful ideas and skills. Training should start with what the GPs actually did in their everyday work setting. And if GPs were asked to decide what scenarios to focus on (i.e. clinical area – smoking, alcohol, nutrition, diabetes etc. – and communication skills), we

believed that this approach would be far more interesting for them than the usual top-down model where experts arrived to tell them what they ought to learn.

6.6.2. Stages

The workshop started with an introductory meeting in the general practice clinic or health centre. Participating GPs agreed on a topic for the consultations with simulated patients that would come a few days later. These consultations were audio-taped and the transcriptions were sent to the doctors for them to consider own weaknesses and strengths and issues for the training session 3 days later. This procedure was repeated twice focusing on different scenarios. After the 3rd consultation and return of transcriptions, there was a debriefing seminar where experiences were summarised. In overview the steps were those shown in Figure 6.1.

FIGURE 6.1

Steps in the GP Workshop

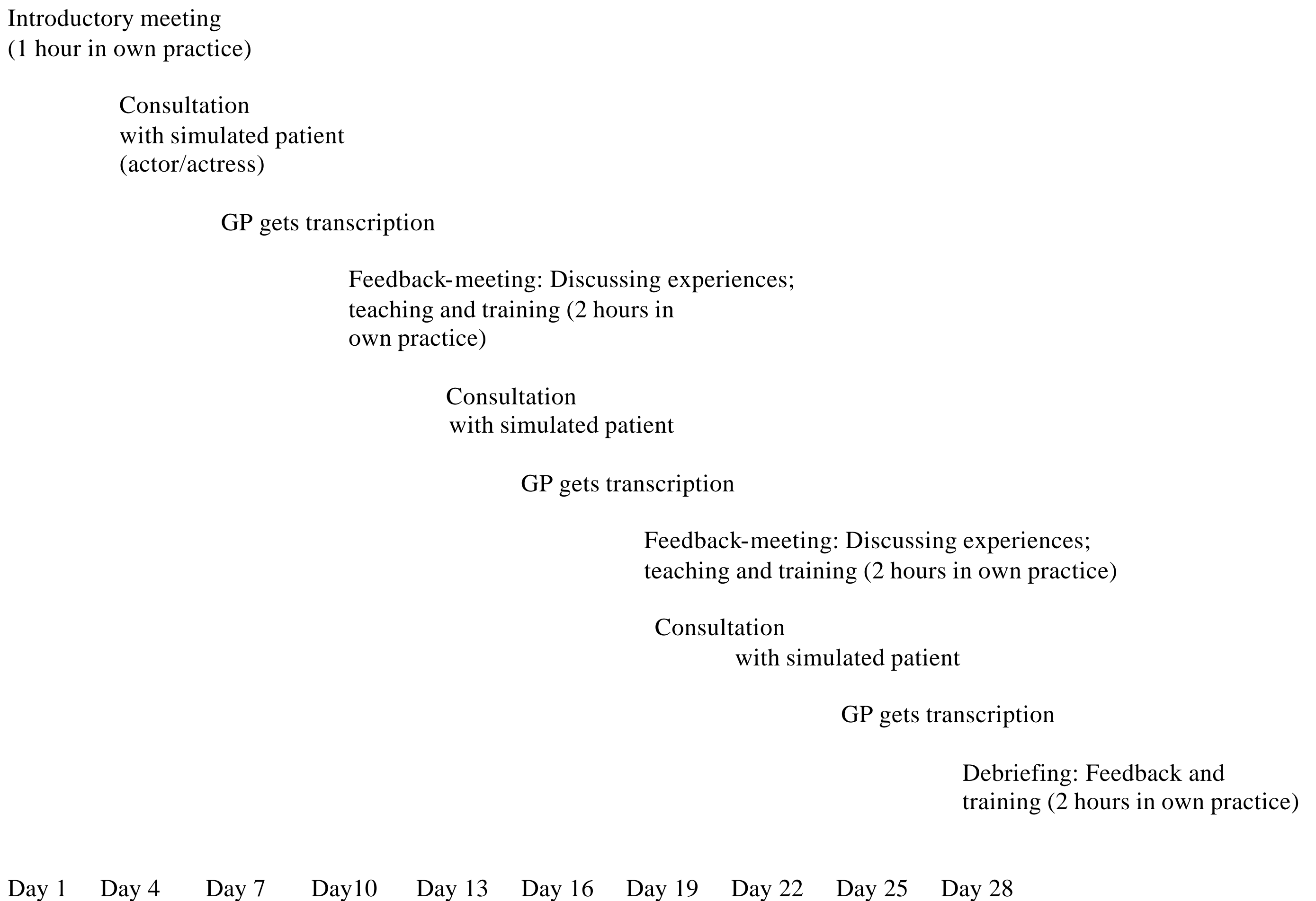


FIGURE 6.1 ABOUT HERE

A full stepped workshop had a 4-week course and included four meetings with trainers and GPs (a total of 7 hours), and three consultations (each lasting 15 minutes). GPs were paid for participating in meetings and received a standard fee for each simulated consultation.

When the first practice was completed, we started another course with different participants, since it was practically impossible to run parallel workshops with too many calendars to co-ordinate.

6.6.3. Evaluation

The introductory and debriefing meetings were audio-tape recorded for evaluation purposes, allowing comparison of GPs' self-reported communication problems and self-appraisal of skills etc. before and after. At the same time participants were asked to appraise the workshop and the didactic methods used so that the concept could be continuously improved.

The consultation transcripts were compared during the workshop period in order to reveal possible improvements in using motivational interviewing health behaviour change counselling. This evaluation was supplemented by yet another simulated consultation 4-6 months after the debriefing seminar. This consultation had a presented problem similar to that used at baseline. To reduce confounding of prior knowledge, a new simulated patient performed the acting.

The actors were instructed not to "deliver" certain replies or responses to the doctors handling the consultation but to study the case story and "to be" that patient and react as a person to the questions from the doctor. Three actors were hired (two female and one male), all graduates from the National Theatre School (Statens Teaterskole) and trained in performing patients with all kind of diseases and problems at the Laboratory of Clinical Skills (Laboratoriet for Kliniske Færdigheder) at the Rigshospitalet, Copenhagen.

At th beginning of the simulated consultation, the GP was handed a brief description of the patient in front of him/her. The actor him- or herself had supplementary information of the reason having an appointment that day and information on life-style according to the topic selected by the GP. The GP was aware it was a simulated consultation as the actor had an appointment. At the beginning of the consultation the actor placed the tape recorder on the desk and put it on.

The simulated consultation was intended to resemble a normal one as much as possible. The time used was normal for the actual clinic in question, for one 10 minutes and for the rest 15 minutes. The simulated patient was to have the same "treatment" as other patients, that is interruption in case of emergencies etc.. If the GP wanted to measure blood pressure etc., the simulated patient would hand over a note with the result.

Feedback

The audiotapes were typed out and sent to GPs as soon as possible, a few days before the lesson. The trainers at the 18 (6 clinics x 3 lessons) feedback meetings were the leaders of the

project: Thorkil Thorsen, sociologist by training, senior researcher, and Sverre Barfod (SB), specialist in family medicine and GP.

At the meetings the transcriptions were made the starting point. Each GP had his/her own transcription but did not know the others. At the first meeting the necessity of openness and trust was underlined to promote the positive atmosphere necessary for benefits from the lesson. Attached to the transscripted consultation GPs received an invitation to find "difficult" passages or sentences where they wished they had done something else and so on.

At the feedback meetings we started with a common discussion of their experiences, our evaluation (brief) of the consultation, the strong and weak aspects of the GPs' performance as judged from the transcriptions. In addition, we included elements from the *motivational interviewing* techniques elicited from the discussion. This method made the lessons different between the participating clinics and the three feedback meetings at the same clinic were also different. Nevertheless, the ingredients were sufficiently common that it is correct to talk about a certain *education or intervention.*

Common elements were:

- stages of change
- what is motivational interviewing?
- raising the subject
- asking permission to do so
- linking the presenting problem to life-style
- no stigmatising, no frightening
- open, not closed, questions
- ambivalence
- exploring ambivalence and the motivational balance
- motivation
- readiness (importance/self-confidence)
- change talk
- preparing for self-motivating statements
- resistance and avoiding this
- handling resistance (reflection, rolling with resistance)
- relapse

The method of training included mini-lessons (3-5 minutes), role-plays, training techniques of asking, and discussing experience from former consultations.

Efficiency

Six clinics with 25 GPs attended the project and 23 GPs concluded the whole course. The efficiency of the course was evaluated be analyzing the behaviour of GPs at the beginning of the course and at the follow-up contultation 4-6 months after the last lesson.

The analysis was based on the *One-Pass Coding System for Motivational Interviewing* developed by Resnicow and collegues at Rollins School of Public Health, Emory University, Atlanta, USA. The method was customised by Thorkil Thorsen. Transcriptions were rated according to the elements, techniques and strategies of motivational inteviewing, quantitatively and qualitatively. The rating concerns the GP behaviour only. As the recording

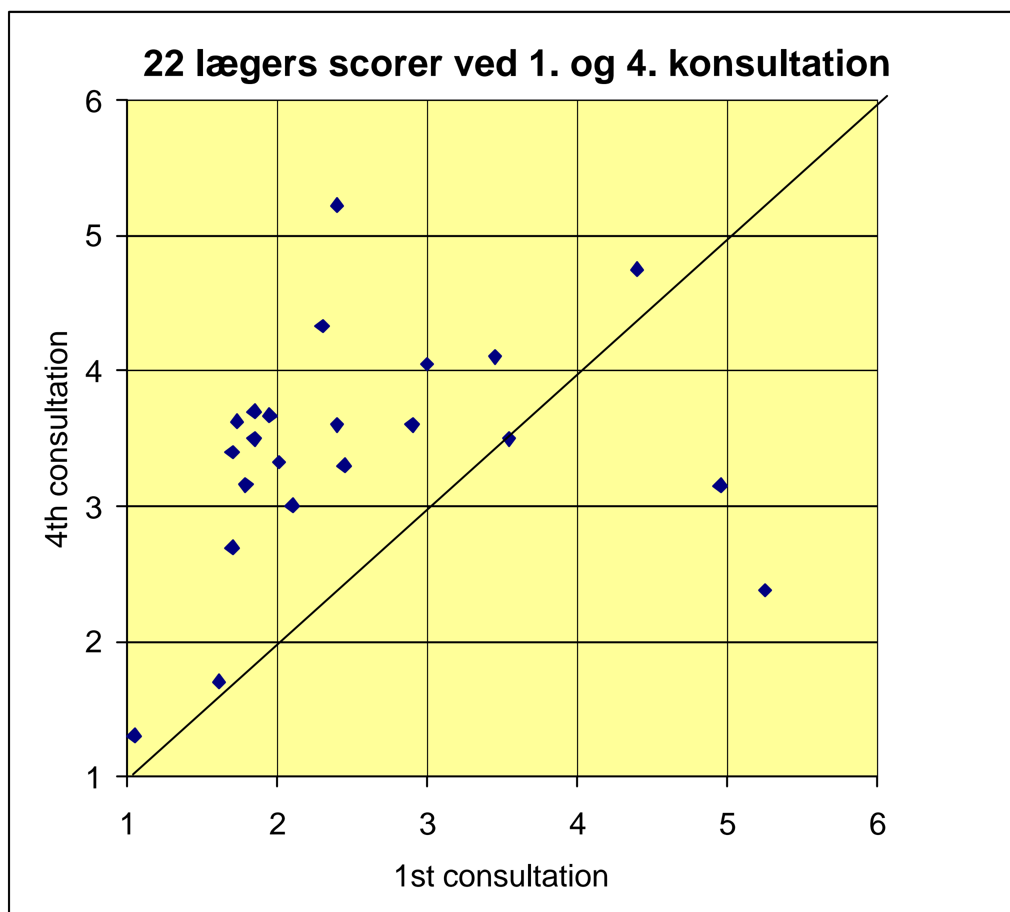
from the first consultation was missing from one of the GPs, only 22 GPs could be evaluated: 11 females, 11 males.

Semi-structured group interviews were carried out during the last of the three feedback meetings. Items were the GPs' immediate thoughts on the design and conduct of the project. Supplementary to this, participating GPs were invited to one of two follow-up meetings 1½ years after the 3rd lesson. Nine of the GPs attended a follow-up meeting.

6.6.4. Results: did GPs change their behaviour?

Figure 6.2 shows the overall changes for each GP from the 1st to the 4th consultation about 6 months later.

FIGURE 6.2



The abscissa gives the score of the 1st consultation and the ordinate the score of the 4th consultation, with maximun of 7 points and minimum of 1 point. (Figure 6.1 is limited to the value of 6 because no GP obtained points above 6). Each co-ordinate represents a GP. GPs above the diagonal have improved their consultations (according to our scoring) . 19 of the 22 GPs scored higher after the intervention, 3 GPs scored lower. This result is statistically significant (*Wilcoxon signed rank test:* $p < 0,01$). It is important to note that, because of an

ordinal scale, scoring can be used arithmetically only with great care. Thus, one cannot calculate a percentage improvement.

One of the four GPs who scored the highest at the 1st consultation improved only by one point while two others' scores fell markedly. The GP at the left lower edge of the figure scored low at both consultations but there is a little improvement all the same. The most marked improvement is shown among the GPs scoring between 1.5 and 2.5 before the intervention. While 16 of 22 GPs scored below 3 points at the 1st consultation, this was only the case with 4 GPs at the 4th consultation.

6.6.5. Costs

The implementation project had funding of 2.5 million DKK (c. 333,000 EUROS) from the National Board of Health. The Committee of Prevention and the Board of Quality Development in Frederiksborg County supported it with 400,000 DKK (c. 53,000 EUROS). The costs for the training of one GP amounted to about 8,000 DKK (excluding costs for the analysis). This is not unusual for similar CME-courses in Denmark.

6.6.6. Conclusion

The training project with three simulated consultations and three connected feedback meetings arranged in GPs' own clinics improved most GPs' skills concerning using *motivational interviewing* techniques and strategies.

6.7. Overall conclusion

Our overall conclusion from the Phase IV project in Denmark is that reframing understandings alcohol issues and implementing new skills for giving advice for changing behaviour demands intense planning in cooperation with local educational groups to succeed.

6.8. References

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