

- GOLDBERG, D. P., COOPER, B., EASTWOOD, M. R., KEDWARD, H. B. & SHEPHERD, M. (1970) A standardised psychiatric interview for use in community surveys. *British Journal of Preventive and Social Medicine*, **24**, 18–23.
- HOBSON, R. F. (1977) A conversational model of psychotherapy. *AUTP Newsletter*. January, 1977, 14–18.
- (1984) *The Heart of Psychotherapy*. London: Tavistock Publications. In press.
- MAGUIRE, G. P., GOLDBERG, D. P., HOBSON, R. F., MARGISON, F. & MOSS, S. (1984). Evaluating the teaching of a method of psychotherapy. *British Journal of Psychiatry*, **144**, 575–80.
- MARSDEN, G., KALTER, N. & ERICSON, W. A. (1974) Response Productivity: a methodological problem in constant-analysis studies in psychotherapy. *Journal of Consulting and Clinical Psychology*, **42**, 2, 224–30.
- SCHWEDER, T. & SPIOTVOLL, E. (1982) Plots of P-values to evaluate many tests simultaneously. *Biometrika*, **69**, 3, 493–502.

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## Evaluating the Teaching of a Method of Psychotherapy

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**Summary:** A teaching package was produced to help trainees in psychiatry learn the techniques specific to a 'conversational model' of psychotherapy, prior to group supervision. This consisted of a booklet and three videotapes. The third tape used a micro-counselling approach to illustrate each key skill and was viewed together with a teacher. After this, trainees met in groups of three with a psychotherapist for eight weekly sessions. To evaluate this teaching, 12 trainees were asked to interview simulated patients before and after they used the package and after supervision. These interviews were recorded on videotape and rated. There were significant improvements on most of the key skills as a result of this training, and nine of the 12 trainees improved considerably. There was a strong negative correlation between improvement scores and a biological orientation to psychiatry. It is concluded that the teaching package is an economic but effective way of helping trainees learn the basics of a method of psychotherapy before they are given supervision.

The aims of this second study were to develop and evaluate methods of teaching the 'conversational model' of psychotherapy (Goldberg *et al*, 1984) to trainee psychiatrists,

### Teaching methods

The objective was to produce a teaching package which would enable inexperienced psychiatrists to learn the key concepts and skills contained within the conversational model, before they were given psychotherapy supervision. The package included those behaviours which were found to be much commoner in the therapists trained in the 'conversational model' (Goldberg *et al*, 1984) (Table I).

Three behaviours which did not distinguish therapists trained in the model from other psychiatrists (picking up verbal cues, code 5; recognising non-verbal cues, code 6; and use of linking hypotheses, code 16) were retained because of their potential therapeutic

relevance. Guidance was given about how to form a therapeutic contract (new Codes 31–33) and the importance of solving problems in the 'here and now' was emphasised (code 17). These skills were presented in a booklet and three videotapes.

The booklet described the 'conversational model' and told trainees how to use the videotapes, the videotapes used a micro-counselling approach (Ivey, 1971). Each skill was explained and demonstrated separately. The examples were taken from interviews conducted by 'model' therapists and from videotapes of Dr Hobson (R.F.H.) using his 'conversational model'. The first self-teaching tape explained the basic concepts, in ascending order of complexity, and provided illustrations of each one. The second self-teaching tape showed the key skills being used during a psychotherapy session, while the third tape was seen with a teacher. Each skill was demonstrated in turn on videotape, and the student asked to use that skill in

TABLE I  
*Derivation of material in teaching videotapes One and Three*

Components of teaching package	Rating codes	Comment
I. Initial Interview Behaviours	1-4: Introduction, time available, TV equipment, purpose of interview	*
II. Statements, not questions	8: Use of statements	*
III. Negotiating style	9: Negotiation	*
IV. Showing involvement	7: Use of "I" and "We"	*
V. Picking up cues	5: Verbal cue 6: Non-verbal cue	Done by both groups in Part 1, but thought important for trainees
VI. Problem solving in the 'here and now'	17: 'Here and Now'	Done by both groups in Part 1, but thought important for trainees
VII. Exploring feelings	19: Patient/Doctor relationship 30: Feelings in general	* See discussion in companion paper
VIII. Understanding hypotheses	15: Understanding hypotheses	*
IX. Linking hypotheses	16: Linking hypotheses	An infrequent but theoretically important behaviour
X. Contract formation	New Codes 31-33: number and length of sessions, topics to be covered	Important for trainees

\* Denotes a prediction confirmed in companion paper, Goldberg *et al.*, 1984.

responding to further patient behaviours. This allowed the teacher to ensure that each skill had been learned. The skills covered included the use of statements not questions, adoption of a negotiating style, recognition of verbal and non-verbal cues, focusing on feelings, stating understanding and linking hypotheses, and forming a therapeutic contract.

#### Group supervision

This took the form of eight weekly sessions, in which three trainees and a psychotherapist participated. The first session was devoted to further discussion of the 'conversational model' and role play. The other seven sessions were concerned with the replay and discussion of at least one videotape of a psychotherapy interview conducted by one of the trainees. Early sessions concentrated on recognising and responding to cues; only when the trainee had managed this, were more complex skills discussed. The discussion and exploration of the trainee's own feelings about this experience were facilitated in all sessions.

#### Evaluation

A study was then conducted to see if the teaching package, followed by group supervision, led to acquisition of the relevant skills, and if its efficacy was affected by trainees' attitudes.

#### Trainees and Methods

The first 12 trainees, who had not worked with R.F.H. and were still in the first or second year of training, were recruited. After the study had been explained by one of us (D.P.G.), each trainee completed four attitude questionnaires. The first two, the Wilson-Patterson Inventory (Wilson and Patterson, 1966) and 'Attitudes to Treatment' Questionnaires (Caine and Leigh, 1972), provided measures of 'conservatism'—a factor which has been correlated with the ability of doctors to diagnose psychological problems. The remaining questionnaires, 'Doctors' Attitudes towards Drugs and Psychotherapy in the treatment of Psychiatric Patients' questionnaire (MacAndrew and Rosen, 1964) and Kreitman's (1962) measure of psychiatric orientation afford measures of general orientation to psychiatry. It was hypothesised that trainees with a high degree of psychoanalytical orientation would learn the 'Conversational Model' more easily.

#### Assessment

Each trainee was assessed on three occasions: before seeing the teaching package (base-line); after completing the package but before beginning supervision; and on finishing the eight supervision sessions (post-supervision). On each occasion, the trainee was asked to interview a simulated patient who had been referred by a general practitioner because of depression secondary to difficulties in personal relationships. A different patient was seen each time, but the task given was the same; viz—to clarify the patient's current

problems. The trainees were told they had 20 minutes to do this, and that a knock on the door would signal that five minutes remained. All the interviews were recorded on videotape, to permit ratings to be made.

#### Ratings

The videotapes and transcripts of the interviews were rated by raters blind to the stage of assessment, using methods described previously (Goldberg *et al.*, 1984).

#### The use of simulated patients

This enabled the complexity of the interviewing task to be standardised. Three simulators were trained, and their interviews so ordered that each trainee saw each simulator once, and each simulator completed an equal number of initial, post-teaching, and post-supervision.

Training began with the patient being handed an edited history of a real patient suffering from depression; she was then asked to learn it, but to adapt it to her own biography and environment. Two weeks later, she returned to be interviewed by one of us (P.M.); this was recorded on videotape, and immediately played back and discussed with her. When required, further practice and feedback were arranged. Each simulator was instructed to respond honestly, if asked about areas not covered in training. The trainees were told that they would be interviewing simulated patients.

### Results

#### Changes in key skills

Responses to non-verbal cues and the use of linking hypotheses were too infrequent to be analysed. The use of the

other skills on the three assessment occasions is shown in Table II as a percentage of all therapist utterances.

A two-way analysis of variance was carried out, with assessment, occasion, and doctor as the main effects. When significant F ratios were found, the Neuman-Keuls Test was used to test the significance of any differences (Table II). The teaching package led to an improvement in the use of statements rather than questions, showing involvement by the use of 'I' and 'we', and the use of understanding hypotheses. Negotiating style, focusing on the 'here and now' and on feelings only changed with the combination of the package and supervision. There was little change in the trainee's ability to focus on feelings or to recognise verbal cues. Behaviours used to begin the interviews and to firm a contract were rated as either present or absent, and are given as absolute frequencies (Table III).

Mentioning the time available, explaining the interview situation, and checking how the patient feels all improved as a consequence of the teaching package. The formation of contracts was scored on a 0-6 scale, according to whether or not the therapist mentioned the number of future sessions, their length, and their content. The trainees also improved on this measure as a result of the television teaching.

#### Changes in trainees

The data were then examined to see how well each doctor used the 'conversational model' on the three assessment occasions. Ten behaviours which distinguished 'model' from eclectic therapists in the first study were used. These included six desirable (understanding hypotheses, negotiation, therapist, involvement, comment about topics to be covered,

TABLE II  
Performance of 12 doctors on components 2-9 of the teaching package on the three assessment occasions

Component: of the teaching package	Rating code	Percentage for all 12 doctors			Significance of changes between baseline and post-supervision assessments
		1. Before teaching	2. After TV teaching	3. After supervision	
II. Statements, not questions	8	35.1	63.2	71.2	15.1***
III. Negotiating style	9	4.9	16.5	19.5	5.2**
IV. Showing involvement	7	2.1	8.0	6.5	6.4***
V. Picking up cues:					
Verbal	5	27.9	29.7	30.9	NS
Non-verbal	6	insufficient data			
VI. Problem solving in the 'Here and Now'	17	9.2	20.7	21.9	4.1*
VII. Exploring feelings:					
Patient/Doctor	19	0.7	1.0	0.6	NS
General	30	27.6	33.8	44.7	
VIII. Understanding hypotheses	15	6.5	18.1	25.2	9.6***
IX. Linking hypotheses	16	insufficient data			

\* $P < 0.05$ , \*\* $P < 0.025$ , \*\*\* $P < 0.01$ .

TABLE III  
Results for the 12 doctors on components 1 and 10 of the teaching package on the three occasions

Components of the teaching package	Frequencies for all 12 doctors			Significance of changes between base-line and post-supervision assessments
	1. Before teaching	2. After TV teaching	3. After supervision	
I. <i>Initial interview behaviour</i>				
Gives name	9	9	11	NS
Mentions time	0	10	10	<sup>1</sup> 16.7***
Mentions situation	0	6	5	<sup>1</sup> 7.7*
Check patients feelings	0	6	4	<sup>1</sup> 7.0*
Mention purpose	1	5	4	NS
Total score (Max = 60)	10	36	34	<sup>2</sup> 11.5
X. <i>Contract formation</i>				
Mentions				
No. of sessions (0-1)	3	9	8	<sup>1</sup> 8.9***
length	1	5	4	NS
content	1	6	6	<sup>1</sup> 8.5**
Total score (using 0-1-2 on length and content)	9	35	30	<sup>2</sup> 6.2**

<sup>1</sup> = Cochran's Q.

<sup>2</sup> = Friedman's 2-way ANOVA  $X^2_1$ .

\* P < 0.05, \*\* P < 0.025, \*\*\* P < 0.01.

patient/doctor feeling and the use of statements) and four undesirable behaviours (closed questions, open questions, understanding questions and information or explanation giving).

The means for these behaviours were computed from all 36 assessment interviews, and the means for each trainee's interview compared with them. A score of one was given when the trainee's mean was higher than the overall mean for a desirable behaviour or lower for an undesirable one. The maximum possible score on each interview was therefore ten, and the maximum zero. The changes in these scores are shown in Table IV.

The teaching package led to changes in the expected direction in 11 of the 12 trainees (sign test P < 0.003). Psychotherapy supervision produced change in six trainees, but this was not significant. To allow for the magnitude of changes in means, two sample t-tests were performed, using paired data. This confirmed that it was the teaching package (t = 3.5, P < 0.01) rather than psychotherapy supervision (t = 0.79, P = NS) which led to significant changes.

Inspection of the performance of the individual trainees showed that two (L. and Q.) improved considerably with the teaching package, but did not maintain this, while one trainee (N.) began and finished at a high level, despite some deterioration after the package.

#### Effects of attitudes

The only significant finding was a negative correlation (-0.71, P < 0.01, Spearman rank order correlation) between a biological orientation to psychiatry and the change scores.

#### Discussion

We were encouraged that our teaching methods enabled trainees to acquire most of the skills associated with the 'conversational model' of psychotherapy, even though several trainees had no special interest beforehand. Moreover, our methods were economical; administration of the teaching package required only one hour of teaching time per trainee and eight sessions from a psychotherapist. The psychotherapist was therefore able to concentrate on supervision.

Our package used examples from interviews with real patients, but one using examples from interviews with simulated patients has now been produced for general distribution. Tutors in non-teaching hospitals could therefore give this training, provided they used the booklet and three videotapes, and had the help of a visiting psychotherapist. However they need to be aware that most biologically-orientated trainees may need more help to acquire psychotherapy skills.

The teaching package was so effective that it left little room for further change, though psychotherapy supervision might have been as effective, had it been given first. Changes in negotiation, focusing on the 'here and now' and feelings, either take longer to learn or require supervision. The teaching package comprised three components (the handout, modelling, and

TABLE IV  
Global measures of proficiency in the models for the 12 trainees

Trainer	Trainee	(1) Base-line	(2) After TV	(3) After supervision	Overall change
Dr Hobson	L	3	9	5	2
	M	1	6	6	5
	N	8	3	8	0
	O	2	3	8	6
	P	1	3	7	6
	Q	2	8	3	1
	R	1	9	8	7
	S	1	6	7	6
	T	4	5	7	3
Subtotal	Mean	2.6	5.8	6.6	—
	SD	2.3	2.5	1.7	—
Dr Margison	U	2	10	9	7
	V	2	5	8	6
	W	2	6	6	4
Subtotal	Mean	2.0	7.0	7.7	—
	SD	0.0	2.6	1.5	—
Total	Mean	2.4	6.1	6.9	4.4
	SD	2.0	2.5	1.6	2.4

For comparison 1 vs 2:  $t = 3.5$ ,  $P < 0.01$ ; 2 vs 3:  $t = 0.8$ , NS.

micro-teaching) but we do not know if they all contributed to learning.

The use of simulated patients, coupled with the nature of the task given to the trainees during the assessment interviews, may explain why linking hypotheses, comment on doctor/patient feeling, and explanation of the topics to be covered were used so infrequently. The choice of simulated patients also prevented us from comparing the performance of these trainees with that of the 'model' therapists, interviewing real patients in the first study.

We believe that our apparent failure to teach the skill of recognising and responding to cues was due to limitations in our rating methods. In our desire to achieve high inter-rater reliability, we defined cue recognition in such a way that no distinction could be made by the raters between banal and more subtle examples.

The combination of television teaching and micro-teaching does not seem to have been used previously in the training of psychotherapists, but was used in training general practitioners by Byrne and Long (1976) in England, and by Goldberg *et al.* (1980) in the United States. The latter research resulted in similar findings. Doctors who received television training and micro-teaching learned how to focus much less on the past and more on the 'here and now'. Some doctors improved considerably, while others were relatively resistant. In this study, three doctors (L. N. and Q.)

benefited little. It is still too early to say whether they were slow learners who would have improved with additional training, or were unable to learn the relevant skills.

It seems reasonable to conclude that such training will lead to substantial gains in most trainees. However, we do not know if these would be maintained over time or applied consistently within subsequent psychotherapy. Further studies are needed to clarify this and to determine the impact of this form of psychotherapy on outcome.

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#### References

- BYRNE, P. S. & LONG, B. E. (1976) *Doctors Talking to Patients*. London: H.M.S.O.
- CAINE, T. M. & LEIGH, R. (1972) Conservatism in relation to psychiatric treatment. *British Journal of Social and Clinical Psychology*, 11, 52-6.

- GOLDBERG, D. P., HOBSON, R. F., MAGUIRE, G. P., MARGISON, F. M., OSBORN, M. & MOSS, S. (1984) The Clarification and assessment of a method of psychotherapy. *British Journal of Psychiatry*, **144**, 567–75.
- STEELE, J. J. & SMITH, C. (1980) Teaching psychiatric interview techniques to family doctors. *Acta Psychiatrica Scandinavia Supplement*, **285**, Vol. 62, pp 41–7.
- IVEY, A. E., (1971) *Microcounselling: Innovations in Interview Training*. Springfield, Illinois: Thomas.
- KREITMAN, N. (1962) Psychiatric orientation: A study of attitudes among psychiatrists. *Journal of Mental Science*, **108**, 317–26.
- MCANDREW, C. & ROSEN, A. C. (1964) An empirical contribution to the evaluation of practitioner bias. *Psychopharmacologia*, **5**, 349–60.
- WILSON, G. & PATTERSON, J. R. (1966) A new measure of conservatism. *British Journal of Social and Clinical Psychology*, **7**, 264–9.

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