

Diabetes care by general practitioners in Northern Ireland: present state and future trends

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SUMMARY

A questionnaire returned by 250 (71.4%) of the 350 general practices in Northern Ireland indicated that although only 34 practices had special arrangements for seeing their diabetic patients, 178 practices stated that they would like to be more involved in the care of their non-insulin-dependent diabetes mellitus (NIDDM) patients. One hundred and eight practices felt the same way about their insulin-dependent diabetes mellitus (IDDM) patients. One hundred practices stated that the partners felt competent to manage their diabetic patients. The main area where general practitioners felt they needed to improve their knowledge was ophthalmology (56 practices). When asked which type of care scheme would appeal most to their practice, 135 practices stated that regular attendance with the general practitioner and annual hospital review would be the preferred arrangement. Overall there was a positive attitude towards increased general practitioner involvement in diabetes care.

INTRODUCTION

In recent years there has been considerable debate about the role of the general practitioner in the management of diabetes.¹ Since 1972 the Royal College of General Practitioners has been encouraging general practitioners to become more involved in the routine care of patients with chronic disease. The College has produced a Diabetes Folder which gives clear guidelines on the care of patients and strongly advocates the concept of structured care.²

Day et al³ showed that for general practitioners to take on even routine diabetic care they need to be well organised and have a structured approach. They also need sufficient community services and resources to provide a standard of care which will complement that of their hospital colleagues. Although diabetic clinics

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in general practice can be successful and provide a good standard of care,⁴ there have been occasions where clinics have run into problems.⁵ Smaller practices may find clinics less appealing or viable but Foulkes et al⁶ have shown that a successful structured approach can be adopted in the normal consultation.

For various reasons there is considerable regional variation in the services available for patients with diabetes in the United Kingdom.⁷ In Northern Ireland traditionally there has been an excellent hospital-based diabetic service. The main aims of this study were to assess the existing provision of diabetic care within general practice in Northern Ireland, to assess the level of primary health care team resources, and to determine general practitioners' attitudes towards increased practice involvement in the care of their diabetic patients.

METHOD

In September 1989 a questionnaire was sent to one general practitioner in each of the 350 general practices in Northern Ireland as identified by the Central Services Agency (FPC equivalent in Northern Ireland). This covered the entire population of Northern Ireland (approximately 1.5 million). The questionnaire was worded to encourage practice-based responses rather than an individual opinion. The questionnaire was divided into three main sections: practice description and personnel, practice attitude to diabetes care and quantitative information.

An accompanying letter outlining the aims of the questionnaire was sent to each practice. It recognised that it might not be possible for some practices to complete the questionnaire fully but all practices were asked to return the questionnaire even if incomplete. The questionnaire was anonymous, but practices were given the opportunity to identify themselves if they required further contact with a general practitioner and nurse appointed by the Royal College of General Practitioners as diabetic facilitators. One reminder letter was sent out to practices who did not reply to the first communication.

RESULTS

A total of 250 questionnaires were returned (71.4% response). There were no marked differences in the characteristics of the practices that did not respond when compared to those that did. Of the 250 questionnaires returned 173 were fully completed in every respect, 57 were incompletely answered and 20 were considered invalid. Analyses were conducted on the 230 (65.7%) questionnaires.

Table I shows the level of diabetic care existing in the practices. Practices where one or more partners have a particular interest in diabetes were significantly more likely (Chi squared $p = 0.001$) to have special arrangements in the practice for seeing diabetic patients. This was not the case for practices who said they would like to be more involved in the care of diabetic patients on diet/tablets ($p = 0.3$) or for practices who thought that the care of diabetic patients on diet/tablets should be based more in general practice than in hospital ($p = 0.7$). Practices which indicated that they would like to be more involved in the care of their NIDDM patients were no more likely to have readily available advice from either a dietitian ($p = 0.2$) or a chiropodist ($p = 0.2$).

TABLE I
Existing diabetic care*

	Yes (%)	No (%)	Total
Does the practice have any special arrangements for seeing diabetic patients?	34 (15)	194 (85)	228
Resources based in the practice or easily available:			
Dietitian	157 (71)	65 (29)	222
Chiropodist	131 (61)	85 (39)	216
Nurse with interest in diabetes	67 (30)	158 (70)	225
Partner with interest in diabetes	67 (30)	158 (70)	225
Data provided by practice computer	16 (7)	200 (93)	216
Audit of diabetic patients	26 (11)	201 (89)	227
Diabetic Care Card currently used	32 (14)	195 (86)	227

*The denominator shown under "Total" is the number of practices who answered the question (this will not always be 230).

The views of individual practices on their own diabetic skills are shown in Table II. Practices where partners felt their skills were adequate to manage their diabetic patients were significantly more likely to want to be more involved in the care of their IDDM patients ($p = 0.05$).

TABLE II
Practice skills

	Yes (%)	No (%)	Unsure (%)	Total
Do the partners feel competent to manage their diabetic patients?	100 (48)	44 (21)	63 (30)	207
Main areas where partners would like to improve their knowledge:			Yes (%)	
None			93 (45)	
Ophthalmology			56 (27)	
Regular update of all management areas			17 (8)	
Knowledge of insulin			16 (8)	
Diet			9 (4)	
Blood glucose monitoring			6 (3)	
			Total	207

Views on changes in practice involvement in diabetic care and various care schemes are shown in Table III. One hundred and eighty practices (79%) felt the care of NIDDM patients should be based more in general practice and 178 practices (80%) wished to be more involved in their routine care. Interestingly,

although 108 practices (48%) wanted more involvement in the care of their IDDM patients, only 53 (23%) felt the care of IDDM should be based more in general practice. This would confirm the belief that increased involvement in diabetic care in general practice should be mainly for NIDDM, but increased involvement with IDDM patients should not be precluded when practices feel their skills are adequate. Sixty seven practices had a partner interested in diabetes, but only 23 of these had any special arrangements for seeing their diabetic patients. This would suggest that many more practices already have the expertise necessary to improve the care of their patients with diabetes. Thorn et al⁸ point out that to run a successful mini clinic at least one of the partners must be interested in diabetes.

TABLE III
Changes in care of diabetes

	Yes (%)	No (%)	Unsure (%)	Total
Should diabetes care be based more in general practice for:				
(i) IDDM	53 (23)	112 (49)	62 (27)	227
(ii) NIDDM	180 (79)	28 (12)	19 (8)	227
Would your practice like to be more involved in diabetes care for:				
(i) IDDM	108 (48)	68 (30)	49 (22)	225
(ii) NIDDM	178 (80)	24 (11)	21 (9)	223
Which care scheme appeals most to your practice?	Yes (%)			
(i) Attend GP regularly with annual hospital review	135 (61)			
(ii) Attend GP regularly with hospital review only at request of GP	57 (26)			
(iii) Attend GP regularly with hospital doctor visiting practice	29 (13)			
	Total	221		

IDDM — Insulin-dependent diabetes mellitus.

NIDDM — Non-insulin-dependent diabetes mellitus.

For non-insulin-dependent diabetic patients the majority of practices saw general practitioner follow-up with annual review at hospital as the preferred shared care format. However, there will be situations where it is preferable for certain patients to be seen at hospital for the majority of their care. Only 29 practices (13%) wanted a hospital doctor to visit the practice for a joint review of diabetic care. The new arrangements for the Post Graduate Educational Allowance encourage general practitioners to organise meetings within their practices involving local hospital colleagues. Hopefully this improved liaison will result in better care of chronic illness.

DISCUSSION

Good diabetic care can only be provided by general practitioners if the community dietetic and chiropody services are easily available. Our results in this area were unexpected. One hundred and fifty seven practices (71%) had dietitians and 131 practices (61%) chiropodists readily available. However, subsequent visits by the facilitators have shown that although these facilities were considered to be easily available by the practices, very few had either available actually on the premises. We feel that to provide an adequate standard of care for diabetics it is essential that such resources are close to hand when required. This has important financial implications; with the current expansion of community care this may now be an appropriate time for practices to make the local health authority aware of their increasing needs. Sixty seven practices (30%) had a nurse with an interest in diabetes. We feel that the nurse has a major role to play in the development of diabetic care in general practice and in particular in the education of the diabetic patient. It is important for these nurses to be given the opportunity to attend appropriate courses on diabetic care.

It was not surprising to see ophthalmology identified as being the area that general practitioners wanted most to improve. Routine fundoscopy through dilated pupils should be carried out annually as retinopathy is a serious and common complication of diabetes. Increasing the number of adequately trained general practitioners would help ease this burden on the hospital clinics. The Mobile Eye Camera, recently introduced by the British Diabetic Association, may also have a role to play. However, it is also important to remember that good blood glucose control has been shown to reduce the incidence of diabetic retinopathy.⁹

The existence of an up-to-date disease register and accurate recording of routine patient data is essential if general practice audit on management of chronic diseases is to be undertaken. Only 26 practices (12%) said they carried out any form of audit on their diabetic patients. Simple audit provides an ideal starting point to identify areas which can be improved. Identification of *all* diabetic patients is fundamental. Studies report that up to 20% of diabetics do not attend anyone.¹⁰ The general practitioner is in the position of being able to identify and hopefully to follow up this neglected group. Only 16 practices (7%) reported that their numerical results were obtained from a computer. Following the implementation of the new contract for general practitioners on the 1st April 1990 there has been a rapid increase in computerisation and 150 practices in Northern Ireland (43%) now have a practice computer. This has exciting implications for both the identification and management of diabetes. As problem lists are transferred onto computer, the identification of diabetics will become much easier and computerised recall will enable general practitioners to identify non-attenders.

One hundred and thirty six practices identified themselves at the end of the questionnaire as being interested in further contact. This has resulted in visits to 65 practices by the facilitators who have also met with a further 60 practices at several study days. The overall impression is that the majority of practices in Northern Ireland would like to take on more of the routine care of their NIDDM patients, but would need to improve their practical skills and organisation before being able to do so. There are various areas which are crucial to achieving this improvement and thus raising the standard of diabetic care in general practice.

These include accurate identification of all patients, agreement on a management protocol, regular audit and an efficient recall system. A general practitioner cannot manage all this in isolation. The back up of a properly trained practice nurse and the availability of a dietician and chiropodist greatly enhances the standard of care that can be offered. In addition, the use of a shared care card facilitates effective communication between the patient, the general practitioner and the hospital.

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