

Health personnel: Perceived differences in professional relationships and work role

BARBARA J ADAMSON AND LYNNE HARRIS

Barbara Adamson is a Senior Lecturer and Lynne Harris is a Lecturer in the Department of Behavioural Sciences, Faculty of Health Sciences, University of Sydney.

Abstract

This study questions the validity of the assumption that the workplace culture and experiences of health personnel are largely similar. The study compares nurses, occupational therapists, physiotherapists and speech therapists concerning their perceptions of professional issues within their own profession, and their perceptions of professional issues within the medical profession. Respondents completed a questionnaire containing 55 items referring to their own profession, and 55 items referring to the medical profession. Six scales were derived from the large survey instrument addressing issues regarding status/cohesiveness of the profession, professional relationships, and the role of the patient in health delivery in the respondent's profession, and in the medical profession. Nurses emerged as different to other health personnel on most dimensions. Few differences emerged among allied health professionals. Physiotherapists were more positive than occupational therapists about the status/cohesiveness of their profession, and regarded the contribution of the patient to health delivery as less important. Speech therapists did not differ significantly from occupational therapists on any dimension.

Introduction and literature review

In the Australian context, the term 'allied health professional' traditionally encompasses optometrists, physiotherapists, radiographers, podiatrists, occupational therapists, speech therapists and dietitians (Selby Smith & Crowley 1995). This grouping may be regarded as arbitrary, and not supported by evidence of similar work roles, work status, or professional interactions within

and between health professional groups. Despite the lack of empirical evidence concerning these workplace dimensions, the relationship between groups of allied health professionals, and health personnel more generally, is becoming increasingly important in forward planning in the health industry (Selby Smith & Crowley 1995).

It is not surprising that most of the research on workplace roles and professional interactions has been conducted with nurses. Nurses form by far the largest health occupation in Australia. In the 1991 Australian census, 188 630 people identified themselves as nurses, compared to 21 568 in all of the allied health professional groups combined (Australian Bureau of Statistics 1991). The nursing literature has tended to focus on workplace roles and professional interactions arising within the hospital setting, where the majority of nurses have traditionally worked (for example, Duffield & Lumby 1994; Gropper 1994; Wilson-Barnett 1989). Issues of concern to non-hospital-based nurses have also received attention (for example, McMurray 1992; Riordan 1991), and a number of studies have examined differences in workplace roles and professional interactions between these health workers. Even comparing nurses working in different contexts, there appear to be differences in factors such as perceived status of the profession and perceived lack of control over working conditions (Palmer & Short 1989; Miller 1992). These differences may have important planning implications, in that it has been suggested that low professional status and lack of control over working conditions may motivate hospital nurses to enter practice in the community and thereby expand their roles (Akroyd et al. 1994). Most studies of workplace roles and professional interactions among health personnel do not compare professional groups, although literature within each profession does consider these issues (for example, Krupa & Clark 1995; Raz et al. 1991). Given the significant differences within the nursing profession across workplace settings, it is likely that important interprofessional differences exist between allied health professional groups.

In physiotherapy, concerns about professional standing and autonomy within the health care system do not appear to rate highly. There may be several reasons for this relatively silent stance, both in the workplace and in the public domain. Gardner and McCoppin (1988) argue that physiotherapists have achieved a greater degree of professional independence and status than other allied health professional groups. They suggest that the varied work settings available to physiotherapists, which include private practice and sports physiotherapy, have allowed Australian physiotherapists to develop 'international recognition and a higher public profile' (p 306). This complacency, however, may be unwarranted. Recent reports concerning labour force planning with regard to physiotherapy

in the United States highlight the need to consider factors which have an impact particularly on the career paths and workforce participation of female physiotherapists (Gwyer 1995).

A large-scale survey of occupational therapists reported by Gardner and McCoppin (1988) indicated that occupational therapists see themselves as a group with an identifiable body of distinctive skills and with a high degree of autonomy in their professional practice. Nevertheless, research in this discipline appears to be focused on defining the role of the occupational therapist (Krupa & Clark 1995; Vogel 1991). This focus on role identification is indicative of the kinds of differences that may be expected between occupational therapists and physiotherapists.

The professional issues of speech pathologists have not been systematically investigated. This may suggest that such issues are not of paramount concern for this group, or that the profession is not as organised as physiotherapy or occupational therapy. Certainly, the speech therapy profession is not as large as either physiotherapy or occupational therapy (Australian Bureau of Statistics 1991).

Very few empirical studies have directly compared allied health professionals. Kenny and Adamson (1992) surveyed a small sample ($n = 90$) of Australian health professionals (nurses, physiotherapists, occupational therapists, speech pathologists and psychologists) to determine their perceptions of one aspect of their professional role – their relationship to medical practitioners. The findings indicated that a majority of health professionals (73 per cent) did not feel either that they were regarded as professional equals by doctors, or that doctors had an adequate knowledge and understanding of their professions. Importantly, significant differences between the professional groups also emerged. While 74 per cent of all health professionals considered they had sufficient autonomy in their work, this view was endorsed by all speech pathologists sampled, compared with 76 per cent of psychologists, 75 per cent of occupational therapists, 66 per cent of physiotherapists and only 53 per cent of nurses. These findings provided a glimpse of the professional differences that may exist between health personnel in the Australian health care system. The present study was designed to examine further the work role and professional interactions of physiotherapists, speech pathologists, occupational therapists and nurses (hospital-based and community-based) in the Australian health system.

Method

Sampling procedure

In order to obtain a representative sample of health professionals, the study employed the following procedures. The heads of departments of occupational therapy, physiotherapy and speech therapy at a number of large teaching hospitals were contacted to explain the purpose of the study and to seek approval for staff to participate in the study. Departmental heads were informed that the study examined issues related to professionalism in the context of the delivery of health care and perceptions of the medical profession. Each head of department was assured that respondents would remain anonymous and that the data would remain confidential. Further telephone contact was made with departmental heads after they had consulted staff concerning their involvement in the study and agreement was obtained for staff to participate. Staff were provided with a questionnaire which, on completion, was placed in a sealed envelope by the respondent and mailed to the researcher. A similar procedure was employed to obtain a sample of nurses working in the community. The hospital nurse sample was obtained by undergraduate nursing students working in large, predominantly public, metropolitan hospitals and clinics.

Questionnaire

Following a review of the available literature concerning professional issues among nurses and allied health professionals, and a sociological analysis of the position of health professionals within the structure of the health care delivery system, a detailed questionnaire was devised and pilot-tested. (Copies of the questionnaire may be obtained from the authors on request.) It sought to obtain the following information.

Part A: Background information

This section requested information concerning the demographic characteristics of respondents (see table 1).

Part B: Health professionals' perceptions of their own profession

This section of the questionnaire contained 55 items assessing health professionals' perceptions of their own profession, including their perceived professional status, professional relationships, the role of the patient, and other relevant professional issues. Respondents were asked to rank each item on a five-

point Likert scale, indicating their level of agreement with each statement (1 = strongly disagree, 2 = disagree, 3 = undecided, 4 = agree, 5 = strongly agree). For each professional group, all items used the profession's title, for example, for speech pathologists 'Speech pathologists have a high status profession'. For nurses working in the hospital setting, the term 'nurses' was used and for those nurses working in the community, the term 'community health nurse' was used.

Part C: Health professionals' perceptions of the medical profession

This section contained the same items as Part B and assessed health professionals' perceptions of the medical profession along the dimensions outlined in Part B. For example, item 1 in Part B for speech pathologists, 'Speech pathologists provide information to patients before commencing treatment', read 'Doctors provide information to patients before commencing treatment' in Part C.

Thirty per cent of the items were reverse scored to prevent the development of a response set.

Results

Description of the sample

The sample comprised 604 health professionals, 57 speech pathologists, 115 occupational therapists, 171 physiotherapists, 124 hospital nurses, and 137 community health nurses recruited from a range of settings in the Sydney region (see table 1 for a description of the sample). The nature of the distribution procedure (via professional supervisors) precluded an accurate determination of response rate. The majority of professionals surveyed in all groups were female, and most held junior positions in hospital settings. About half of both nurse samples had been hospital-trained and held certificates. The remaining nurses and almost all of the other professional groups for whom data were available had received a university education. Community health nurses were older and more experienced than any of the other health professional groups. The difference in age and experience of community health nurses is inevitable in cross-sectional research of this kind, since typically community health nurses commence their working careers in the hospital setting and then move to community health settings. The average number of years in current job for community health nurses (see table 1), whilst slightly higher than that of other professional groups, would appear to substantiate this viewpoint.

Table 1: Age, experience, time in current job, gender, workplace, seniority, and qualifications of the health professional groups^(a)

	Speech pathologists (n = 57)	Occupational therapists (n = 115)	Physio- therapists (n = 171)	Hospital nurses (n = 124)	Community health nurses (n = 137)
Age in years					
Mean	32.65	28.0	29.80	29.63	40.46
(S.d.)	(9.05)	(7.97)	(8.25)	(8.54)	(8.07)
Experience in years					
Mean	9.91	6.20	7.61	9.20	15.75
(S.d.)	(8.65)	(7.07)	(8.26)	(8.22)	(8.45)
Years in current job					
Mean	4.04	2.32	3.48	3.36	4.84
(S.d.)	(4.42)	(3.13)	(4.40)	(3.62)	(4.29)
Gender (%)					
Male	1.8	3.5	12.3	9.7	7.3
Female	98.2	95.7	87.7	90.3	92.7
Work setting (%)					
Public	92.7	96.5	94.7	82.3	98.5
Private ^(b)	5.5	3.5	4.7	16.9	0.7
Seniority (%)					
Base Grade	45.6	64.3	66.1	71.3	91.2
Senior	35.1	30.4	23.8	22.1	8.8
Supervisor	17.5	5.2	10.1	6.6	
Qualification (%)					
Certificate	1.8			53.2	53.3
Diploma	10.5	12.2	17.5	29.8	14.6
Degree	68.4	78.3	71.3	8.1	14.6
Postgraduate diploma	1.8	4.3	7.6	4.8	12.4
Postgraduate degree	15.8	5.2	2.3	0.8	4.4

(a) Some percentages do not total 100 due to missing values.

(b) Private work setting refers only to private hospital, not private practice.

Development of the scales

Three conceptually-based scales were constructed in order to condense the survey material for the purpose of making comparisons between the health professional groups. Items were selected which unambiguously addressed (1) the professionals' view of their own profession (OWNSELF); (2) the professionals' view of the interactions between members of their own profession and other health professionals (INTSELF); and (3) the professionals' perception of the degree to

which members of their own profession actively involved the patient in the delivery of treatment (PATSELF). Items which were ambiguous, or which did not bear on these three issues, were not included in the analysis. The same scales were then applied to the items concerning perceptions of medical doctors' professional performance to form equivalent scales for (4) the professionals' view of the medical profession (OWNDOC); (5) the professionals' view of the interactions between doctors and health professionals (INTDOC); and (6) the professionals' perception of the degree to which doctors actively involved the patient in the delivery of treatment (PATDOC). Table 2 provides examples of items on each of the scales and table 3 provides a summary of the scales and their reliabilities.

Table 2: Sample questionnaire items

OWNSELF

- _____ receive adequate pay for the work they do
- _____ have a high status profession

INTSELF

- _____ support a multidisciplinary team approach to health care delivery
- _____ view themselves as equal partners in the health care delivery team

PATSELF

- _____ are accountable to patients
- _____ accept patients' views as valid and important

OWNDOC

DOCTORS receive adequate pay for the work they do.
DOCTORS have a high status profession.

INTDOC

DOCTORS support a multidisciplinary team approach to health care delivery.
DOCTORS view themselves as equal partners in the health care delivery team.

PATDOC

DOCTORS are accountable to patients.
DOCTORS accept patients' views as valid and important.

Table 3: Means, standard deviations, reliability coefficients and significant contrasts for the scales

Scale (Number of items)	Whole sample	Speech pathologists	Occupational therapists	Physio- therapists	Hospital nurses	Community health nurses
OWNSELF (26)						
Mean	80.31	80.86	81.07	84.59	76.84	82.52
(s.d.)	(10.56)	(8.50)	(10.39)	(9.05)	(10.50)	(10.97)
Cronbach Alpha ^{(b) (c)}	0.81	0.74	0.84	0.79	0.77	0.84
INTSELF (11)						
Mean	36.74	39.51	38.09	39.03	34.08	37.99
(s.d.)	(5.93)	(5.74)	(5.45)	(4.33)	(5.73)	(5.75)
Cronbach Alpha ^{(a) (b)}	0.79	0.82	0.79	0.67	0.74	0.77
PATSELF (6)						
Mean	22.98	23.56	24.63	22.49	21.45	24.37
(s.d.)	(3.32)	(3.29)	(2.91)	(2.56)	(3.53)	(3.13)
Cronbach Alpha ^{(b) (c)}	0.68	0.76	0.72	0.52	0.62	0.66
OWNDOC (26)						
Mean	96.80	97.67	101.35	100.39	94.96	93.60
(s.d.)	(10.75)	(9.07)	(8.92)	(8.00)	(14.42)	(10.10)
Cronbach Alpha ^(a)	0.85	0.83	0.84	0.78	0.91	0.82
INTDOC (11)						
Mean	32.48	31.13	32.56	32.71	33.93	31.49
(s.d.)	(4.94)	(4.05)	(4.56)	(4.65)	(5.24)	(5.80)
Cronbach Alpha ^(b)	0.65	0.53	0.63	0.66	0.64	0.76
PATDOC (6)						
Mean	16.19	16.38	16.70	16.70	16.62	15.19
(s.d.)	(3.44)	(3.27)	(3.18)	(2.92)	(3.78)	(3.72)
Cronbach Alpha ^(b)	0.66	0.66	0.67	0.52	0.66	0.74

(a) Comparison of nurses (hospital and community) with other health personnel significant at 0.005.

(b) Comparison of hospital nurses and community health nurses significant at 0.005.

(c) Comparison of occupational therapists and physiotherapists significant at 0.005.

Data analysis

The scores of the health professional groups on each of the scales were compared using analysis of covariance with age as a covariate, and planned contrasts. The analysis of covariance statistically controls for age differences between the groups before carrying out comparisons. The contrasts compared (1) nurses to other health personnel; (2) community health nurses to hospital nurses; (3) occupational therapists to physiotherapists; and (4) speech pathologists to

occupational therapists. Because of the large number of comparisons, the type one error rate was set at .005 for each contrast. The overall F ratios were significant for each scale, and contrasts were significant, as noted in table 3.

Discussion

The present study has produced a number of interesting findings. For ease of interpretation of the findings, the following discussion is divided into two parts: the results pertaining to own profession; and the results pertaining to the medical profession.

Differences in professional relationships and work role: perceptions of own profession

Hospital nurses demonstrated greater dissatisfaction on the three scales concerned with the characteristics of their own profession than did any other professional group. Consistent with previous studies (for example, Seymour & Buscherhof 1991), hospital nurses were dissatisfied with their professional status despite significant changes in nurse education and changes to the nursing profession over the last decade. In addition, hospital nurses in this study were still dissatisfied with their professional standing, restrictions on their professional autonomy, and the limited extent of their contribution to important decisions affecting patient care, a finding consistent with other research (Wilson-Barnett 1989; Sorrell Truman 1991). It has been repeatedly argued that a perceived lack of status and poor working relationships entice many nurses to find employment in other settings (Miller 1992). It should be emphasised that the finding of greater dissatisfaction amongst nurses, including both hospital and community health nurses, compared to other health personnel (speech pathologists, occupational therapists and physiotherapists) is new.

Community health nurses were less dissatisfied than their hospital counterparts on the three scales concerned with the characteristics of their own profession. This is also a new finding warranting further discussion. As Riordan (1991) points out, most research in this area has been limited to samples of hospital nurses. The expansion of the role of the community health nurse over the last decade has provided an organisational structure different from that of the traditional hospital setting (Akroyd et al. 1994). Hackman and Oldman (1980) contend that organisational type is an important factor when attempting to assess employees' perceptions of the workplace and the findings of this study appear to bear this out. Riordan (1991) reported that community health nurses who were satisfied with their work role were also satisfied with their social interactions

with other health personnel, their professional autonomy, their professional prestige and the organisational requirements of the community setting. In addition, Riordan reported that community health nurses perceived their tasks to be highly related to the importance of their position. The findings from the present study of Australian nurses appear to agree with Riordan's study of American community health nurses. In particular, Australian hospital nurses perceived their own profession less positively than did community health nurses, and perceived themselves as interacting less well with other allied health professionals compared to community health nurses. Indeed, Gropper (1994, p 35) argues that it is time for nurses to discontinue 'destructive patterns of negative interactions' and that nurses 'need to start working on building trust and being open to the people with whom they communicate'.

The difference between the nursing groups on the third scale, which relates to the degree to which members of their own profession actively involve the patient in the delivery of treatment, is also an important one. Boswell (1992) argues that the role and status of nurses has changed with the increased need for nurse involvement in the community health care setting, particularly with clients who present with increasingly complex health needs. She emphasises that nurses can no longer be regarded as physician's handmaidens by the bedside, but rather that nurses must take on a role of leadership within the delivery of health care in the community setting. In the Australian context, Duffield and Lumby (1994, p 74) argue that community health nurses may have more time to 'be with' their patients and attend to a range of patient needs, a luxury not available to hospital nurses, particularly those working in short-stay, high-dependency hospitals where they only have time to 'do for' a patient a limited number of functions. The results of the present study in regard to nursing personnel appear consistent with these notions. Community health nurses perceived the involvement of the patient as more significant than did their hospital-based counterparts, and this patient focus may contribute to the higher professional satisfaction reported by community health nurses.

Differences that emerged between allied health professionals on the first three scales present important findings. In regard to health professionals' views of their own profession, physiotherapists were more positive than occupational therapists about the status and cohesiveness of their own profession. Speech pathologists did not differ significantly from occupational therapists, suggesting that they too are less positive about the status and cohesiveness of their profession than are physiotherapists. This adds to the meagre literature concerning professional issues in this group. It is clear that more research needs to be conducted before definitive statements can be made about interprofessional differences between

allied health professionals regarding the status and cohesiveness of their professions. The finding does appear to agree with the report of Gardner and McCoppin (1988), who have argued that physiotherapy has attained a greater degree of professional independence and status than other allied health professional groups. In addition, recent research in occupational therapy suggests that this professional group is still concerned with defining their role (Krupa & Clark 1995). No significant difference was obtained between speech pathologists, occupational therapists and physiotherapists with regard to interactions between members of their own profession and other health professionals.

The significant difference between the perceptions of physiotherapists and occupational therapists regarding patient involvement in health delivery appears consistent with the only available evidence for comparison (Nordholm, Adamson & Heard 1995). Again, speech pathologists did not differ from occupational therapists, with mean scores on this scale indicating that they fell between occupational therapists and physiotherapists. Nordholm and colleagues reported that, compared to physiotherapists, occupational therapists promoted the patient's resources and coping skills to a greater extent, and placed more emphasis on the patient in terms of the patient's own capacity for recovery and the patient's own coping abilities. Despite the obvious differences in the procedures and interventions used by occupational therapists and physiotherapists, which may contribute to the differing emphasis given to patient involvement, the issue of patient involvement in decision-making about the delivery of health care is an important one and is currently being addressed by personnel responsible for the education of allied health professionals. With regard to patient compliance with treatment, including dropout and long-term maintenance of treatment gains, there are clear advantages in viewing patients as active, responsible and thoughtful participants who have something important to contribute to their health care. For example, patients who are actively involved in decision-making with health care providers are more likely to be satisfied and cooperate with their treatment (Friedman & DiMatteo 1982).

Differences in professional relationships and work role: perceptions of the medical profession

Consistent with their dissatisfaction about professional standing, nurses rated the medical profession less positively on all the relevant scales than did other health personnel, notably speech pathologists, occupational therapists and physiotherapists. This finding is consistent with those of Kenny and Adamson (1992). The medical dominance model emphasises the long history of subordination of nurses to doctors and the role that this power structure plays

in contributing to workplace frustration among nurses (for example, Friedson 1984). Arguably, the close working relationship between doctors and nurses, compared with other health personnel, may explain why nurses are particularly vulnerable to these effects. The nursing literature already reflects these concerns. For example, Miller (1992) argues that nurses need more respect from the medical profession and need to be given the opportunity to take on more meaningful responsibilities.

Important differences between hospital and community health nurses emerged on two of the three scales pertaining to the medical profession. Community health nurses perceived doctors as interacting less well with other allied health professionals and also perceived doctors as regarding patient involvement in health delivery as less important than did hospital nurses. It is difficult to account for these differences between the nurse samples. It may in part relate to overall differences in the opportunity to observe a range of medical practitioners interacting with patients and professionals between the two groups. One possible explanation might relate to the greater expectations of community health nurses in relation to collegial relationships between health professionals in the community setting and the importance of the client in the decision-making process regarding health care. If this is the case, it may be that the doctor's role in community health care settings is a cause for concern amongst community health nurses. Alternatively, nurses may move into community health care settings where they experience greater autonomy in their interactions with clients because of dissatisfaction with medical practitioners to whom they are subordinate in the hospital setting. Further research is required before conclusive statements can be made to explain these results.

Limitations of the study

One of the inevitable shortcomings of conducting cross-sectional research with health professionals, including community health nurses, is that community health nurses are generally older and more experienced than their hospital counterparts, whether they be hospital nurses or other health personnel, as evidenced in this study. Nevertheless, as this study has demonstrated, there are important workplace differences in terms of community health nurses' perceptions of professional relationships and work role that may not be simply a function of age and professional experience. The findings of this study emphasise the necessity to further explore in depth, preferably by interview or open-ended questions, workplace dimensions that have an impact on community health nurses. In a similar vein, recent reports (for example, Selby Smith &

Crowley 1995) suggest that allied health professionals are increasingly entering domains other than the hospital setting. Future research on professional issues should endeavour to include allied health professionals from non-hospital settings. For example, Akroyd et al. (1994) found differences between physiotherapists and occupational therapists working in hospitals and community settings, and they suggested that organisational factors in the hospital setting have a negative impact on the perceptions of therapists. Unfortunately, their study did not specifically explore those factors in the hospital setting that contributed to perceptions held by therapists. Data from the present study cannot throw further light on this issue.

Conclusions and recommendations

The results of the present study clearly demonstrate that when compared with other health personnel, namely, community health nurses, occupational therapists, physiotherapists and speech pathologists, hospital nurses are the most dissatisfied with the characteristics of their profession. The differences between community health nurses and hospital nurses in their perception of the role of the doctor in interactions with other health professionals, and in the extent of involvement of the patient, may suggest that whilst community health nurses have adapted to the expanded role they now play in patient care, these issues remain. Thus, even within one professional group important differences have emerged, dependent on work setting. The few differences that were found between allied health professionals working in the hospital sector may suggest that they do indeed share many common professional experiences.

References

- Akroyd D, Wilson S, Painter J & Figuers C 1994, 'Intrinsic and extrinsic predictors of work satisfaction in ambulatory care and hospital settings', *Journal of Allied Health*, Summer, pp 155–62.
- Australian Bureau of Statistics 1993, *1991 Census: Population growth and distribution in Australia*, catalogue number 4346.0, Canberra.
- Boswell CA 1992, 'Work stress and job satisfaction for the community health nurse', *Journal of Community Health Nursing*, vol 9, no 4, pp 221–7.
- Duffield C & Lumby J 1994, 'Caring nurses: The dilemma of balancing costs and quality', *Australian Health Review*, vol 17, no 2, pp 77–82.

Friedman HS & DiMatteo MR (eds) 1982, *Interpersonal issues in health care*, Academic Press, San Francisco.

Friedson E 1984, 'The changing nature of professional control', *Annual Review of Sociology*, 10, pp 1–20.

Gardner H & McCoppin B 1988, 'Emerging militancy? The politicisation of Australian allied health professionals' in H Gardner (ed) *The politics of health: The Australian experience*, Churchill Livingstone, Melbourne.

Gropper EI 1994, 'Women supporting women: Are nurses really their own worst enemies?' *Nursing Forum*, vol 29, no 3, pp 34–6.

Gwyer J 1995, 'Personnel resources in physical therapy: An analysis of supply, career patterns, and methods to enhance availability', *Physical Therapy*, vol 75, no 1, pp 56–65.

Hackman JR & Oldman GR 1980, *Work redesign*, Addison-Wesley, Reading, Massachusetts.

Kenny D & Adamson BJ 1992, 'Medicine and the health professions: Issues of dominance, autonomy and authority', *Australian Health Review*, vol 15, no 3, pp 319–35.

Krupa T & Clark C 1995, 'Occupational therapists as case managers: Responding to current approaches to community mental health service delivery', *Canadian Journal of Occupational Therapy*, vol 62, no 1, pp 16–22.

McMurray A 1992, 'Expertise in community health nursing', *Journal of Community Health Nursing*, vol 9, no 2, pp 65–75.

Miller DF 1992, *Dimensions of community health*, 3rd edn, William C Brown Publishers, Toledo.

Nordholm LA, Adamson BJ & Heard R 1995, 'Australian physiotherapists' and occupational therapists' views on professional practice', *Journal of Allied Health*, 24, pp 267–82.

Palmer GR & Short SD 1989, *Health care and public policy: An Australian analysis*, MacMillan, Melbourne.

Raz P, Jenson G, Walter J & Drake L 1991, 'Perspectives on gender and professional issues among female physical therapists', *Physical Therapy*, vol 71, no 7, pp 530–40.

Riordan J 1991, 'Prestige: Key to job satisfaction for community health nurses' *Public Health Nursing*, vol 8, no 1, pp 59–64.

Selby Smith C & Crowley S 1995, 'Labour force planning issues for allied health in Australia', *Journal of Allied Health*, vol 24, no 4, pp 249–65.

Seymour E & Buscherhof JR 1991, 'Sources and consequences of satisfaction and dissatisfaction in nursing: Findings from a national sample', *International Journal of Nursing Studies*, vol 28, no 2, pp 109–24.

Sorrell Truman M 1991, 'Collaboration: A right and a responsibility of professional practice', *Critical Care Nurse*, vol 11, no 1, pp 70–72.

Vogel K 1991, 'Perceptions of practitioners, educators, and students concerning the role of the occupational therapy practitioner', *American Journal of Occupational Therapy*, vol 45, no 2, pp 130–6.

Wilson-Barnett J 1989, 'Limited autonomy and partnership: Professional relationships in health care', *Journal of Medical Ethics*, 15, pp 12–16.