Journal of Health & Population in Developing Countries; 1999, 2(1): 78-87

Assessing Management Training Needs: A Study in the Punjab Health Services, Pakistan

NF Ruck, M Sc, M Hafeez, MA, S Manzur, MBBS, F Nasir, MBBS, K Rivers, M Sc and D Prozesky, MBBS, M Comm H

The paper reports on the findings of a training needs assessment for health personnel in the provincial health services, Punjab, Pakistan. The skills required were compared to those covered by the existing training, job descriptions and felt needs of four cadres. The implications of decentralization and the problems of preparing training plans in the absence of decentralized structures are discussed.

Key words: Pakistan; community health management; training needs assessment; decentralization

Introduction

This paper aims to show how a training needs assessment (TNA) can be used systematically to improve the quality of training of health professionals. It also discusses the extent to which better training could contribute to improved health management capacity in Pakistan. The context and problems of the Pakistan health services are described, focusing on management capacity, and the methods and results of a training needs assessment that was carried out to tackle these problems. The final discussion covers the usefulness of the TNA method in Pakistan and its applicability to other countries.

The health services context in Pakistan

The public sector in Pakistan is organized in a federal system with many management and planning functions devolved to the four provincial governments. Provincial Health Secretariats lead on most policy and planning decisions for health services. The provinces employ health personnel although the national Public Service Commission controls some key aspects of human resources management. For example, establishment posts can be created and abolished at provincial level, but only within the limits of the national scales.

Pakistan has poor social and health indicators in relation to its economic development[1] and poor performance of the public health services as indicated by low utilization by patients and underutilization of funds available[2]. The Pakistan Family Health Projects were set up to improve the efficiency and effectiveness of health services in meeting the needs of the population. The second Family Health Project (FH2) running during 1994-99, covers Punjab and Balochistan Provinces, and is jointly funded by the Government of Pakistan, the World Bank, German KfW and British ODA (now DFID). Some management problems identified by this project were: lack of clarity on roles between different levels of the services, duplication of functions, decision-making structures excluding community representation, poor supervision, low motivation of personnel, and low recruitment and retention of female staff[2]. Poor performance in information and financial management was also highlighted. The project accordingly

NF Ruck, Lecturer, Nuffield Institute for Health, University of Leeds, 71 Clarendon Rd, Leeds LS2 9PL, UK. • Tel: 44-113-2336959 • Fax: 44-113-2336997 • E-mail: nfruck@hotmail.com
M Hafeez, Lecturer, Dept of Sociology, Punjab University, Lahore, Pakistan
S Manzur, Lecturer, Institute of Public Health, Lahore
F Nasir, Deputy Director, Provincial Health Development Center, Lahore
K Rivers, previously Advisor to Provincial Health Development Center, Lahore
D Prozesky, Senior Lecturer, University of Pretoria, South Africa

aimed to clarify management functions, review organizational structures and improve the decision-making of health managers[2]. Decentralization to the district level was given high priority. The national Social Action Program (SAP) is a high profile program linked to economic reforms, which aims to expand and improve health and social services. The SAP also promotes decentralization and therefore gives it political weight.

Under the Family Health Projects, plans for decentralization are at various stages towards completion in different provinces. In Punjab, a Provincial Health Development Center (PHDC) has been established in Lahore to plan for change and to coordinate human resources development. In 1994, the detailed planning for delegation of responsibilities began.

The Training Needs Assessment

The FH2 project needed an assessment of what training would fulfill its objectives for Punjab, and what training courses currently being run were relevant. Available information was not sufficiently comprehensive or detailed. A Training Needs Assessment (TNA) covering technical and managerial training for 11 cadres covered by the project was therefore selected as a priority activity in 1994. The TNA aimed to establish a systematic methodology for regular training review and to provide a baseline for monitoring the progress of decentralization. This report summarizes the methodology and selected findings on the needs for training of district managers.

It was noted throughout the TNA that many problems were not due to lack of training, but would only be solved by reallocation of resources, less political patronage or better working conditions for the staff. It is unlikely that training will solve problems of communication between managers and staff, if, for example, the underlying cause is staff resentment of poor pay. Studies in other countries have found that training is unlikely to improve health management without structural change to allow performance incentives[3] or good follow-up[4]. This study was carried out because it was felt that some problems, such as the confusion over roles and functions, poor supervision and some aspects of district planning and reporting, could be tackled by appropriate training.

District health personnel selected

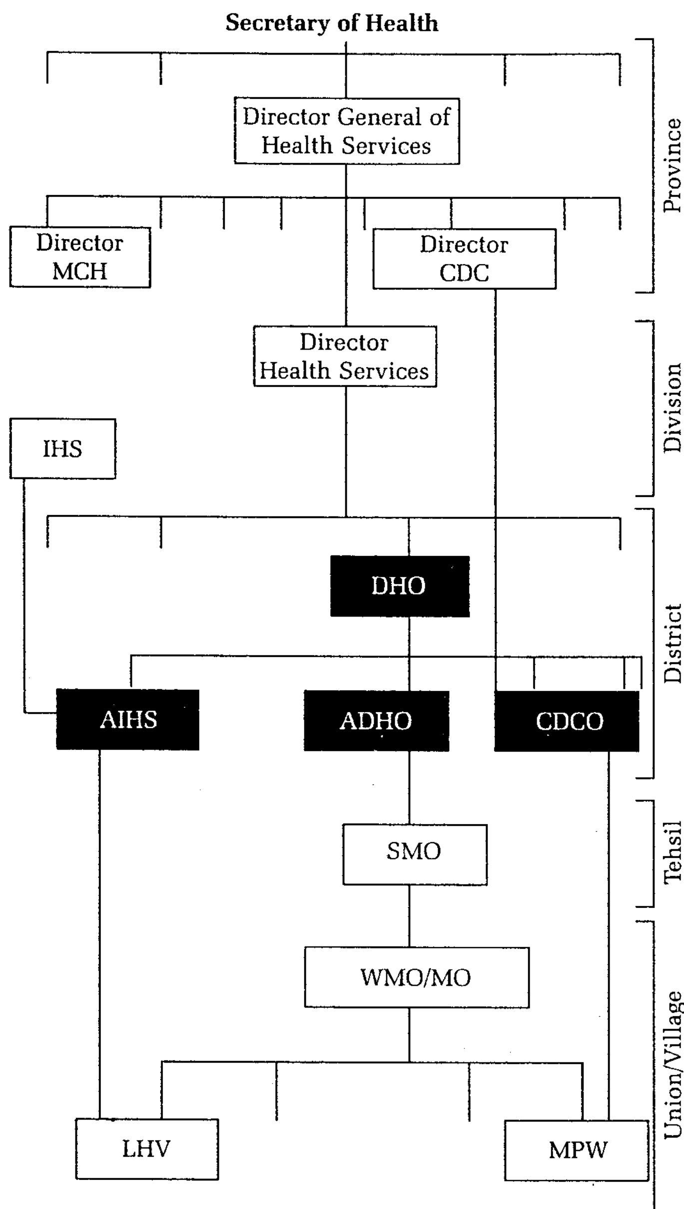
The province of Punjab has a population of about 65 million and is divided into 34 districts. Each District Health Office is responsible for running the community health services, typically about 9 Rural Health Centers and 65 Basic Health Units, with some 500 - 1500 staff. Overall responsibility for all services and personnel lies with the District Health Officer (DHO), who is always a doctor.

Eleven cadres of government health workers were chosen for the Punjab TNA using three criteria: they should have been allocated training under the project; there should be a high proportion of female cadres according to project aims; district, first line management and primary level workers should all be represented. Four district level cadres in the sample are reported on here, since they are the key to the decentralization and organizational change. These four are:

DHO	Overall responsibility for all personnel and services.	Always a doctor.
Assistant DHO	Supports the DHO. Only one seniority point below the DHO.	Currently all posts are held by male doctors.
Assistant Inspectress, Health Services (AIHS)	Supervises all female non-medical workers. Does not manage programs.	Female with public health nursing training.
Communicable Diseases Control Officer (CDCO)	Manages malaria control, childhood immunization and disease surveillance. Supervises CDC workers.	Male with malaria control training.

Figure 1 shows the position of these cadres in the structure of the Punjab Provincial Health Department. All four of these cadres, — DHO, ADHO, CDCO and AIHS, — are responsible for supervision, performance appraisal, and disciplinary procedures for large numbers of staff. All four are required to make regular reports using the health management information system (HMIS). The DHOs and the Communicable Disease Control Officers are also responsible for budgeting, procuring and distributing supplies. Officially, authority for recruitment of staff and for operating budgets is devolved to district level (and below) up to prescribed limits. This is not functioning well in practice. The DHOs also have to prepare district plans and liaise with other government departments. Written job descriptions have been produced by the Health Department for these cadres, but not approved or disseminated.

Figure 1 *Structure of the Punjab Provincial Health Services*



Methodology of the training needs assessment

The TNA was feasible through maximum use of existing reports, phasing over 14 months and supplementing local expertise with external short-term consultants. The study was planned in three phases from October 1994 to December 1995. Phase 1 was the use of existing data from interviews with senior officials; Phase 2 was the analysis of secondary data from reports and training curricula, and interviews with trainers; Phase 3 was the analysis of existing job descriptions, collection of primary data through focus group discussions with 70 personnel, and analysis and writing up of the complete study. The TNA covered four main sources of information:

— needs as defined by Government/Project policies and plans;
— knowledge and skills covered in existing training curricula;
— knowledge and skills as defined in job descriptions; and
— needs as defined by the health workers themselves.

The methodology is described in detail below. The team for the TNA consisted of two staff members of the PHDC in the Punjab Health Department, two researchers from academic institutions in Lahore, and three donor-funded consultants.

Phase 1: Health policy and roles of personnel as defined at national and provincial levels

A report was available on training needs as perceived by policy-makers, based on interviews carried out in 1994 by independent consultants for the PHDC and UNICEF Pakistan.

The sample was 16 national and provincial level personnel, selected as policy-makers and representatives of relevant donors. There were 9 managers from the Secretariat and the Directorate of the Punjab Health Department, 4 senior doctors from MCH, pediatrics and public health training institutions, 1 health/population specialist from the national SAP office, and 2 donor representatives[2]. Semi-structured interviews were carried out using questions relating to recent changes in primary healthcare and the role of the PHDC. The question on training was: *'In your opinion, what kind of in-service training should be imparted to primary health care providers to make them more effective in their jobs?'*

Phase 2: Provincial health plans and existing training curricula

The aim in Phase 2 was to cover all relevant government policy documents, and provincial and national training institutions. Trainers were interviewed, training observed when possible, and curriculum documents collected for 19 institutions and projects. For another 6 institutions, only

curriculum documents were collected. Information was collected in the following four areas:

A. Health situation in Punjab: A brief review of the priority health problems in the province was carried out using reports from the national Social Action Program, Family Health 2 and the Situational Analysis of Health in Punjab[5].

B. Health services, current issues and problems: Information from the Phase 1 study, the Punjab Situational Analysis, Family Health 2, and SAP documents was reviewed. The current decentralization policy was reviewed to assess its implications for management functions at provincial, district and first line supervisory levels in the short and long terms. Using A and B, a list of priority areas in which skills and knowledge were required, extrapolated from current aims and objectives for the health sector and the desired outputs of FH2 (Figure 2), was drawn up.

Figure 2 *Project Priority Organizational Needs for Skills and Knowledge*

This list was compiled from an analysis of Family Health 2 project documents, Social Action Program reports and the Situational Analysis of Health in Punjab[3].

2.1 **TECHNICAL AREAS**

— MATERNAL AND CHILD HEALTH
— FAMILY PLANNING
— HEALTH EDUCATION
— NUTRITION
— WATER SUPPLY AND SANITATION
— LABORATORY SKILLS
— COMMUNICABLE DISEASE CONTROL

2.2 **MANAGEMENT AND RELATED AREAS**

- MANAGEMENT
  - strategic planning
  - information management
  - human resources management: recruitment, selection, job descriptions, performance review, supportive supervision
  - teamwork
  - financial management
  - supplies and estates management
  - monitoring and evaluating programs
  - dealing with emergencies
- GENDER AWARENESS
  - understanding of gender imbalances
  - attitude to female clients and colleagues
- INTERPERSONAL SKILLS
  - negotiating
  - listening
  - decision-making
  - attitude to subordinates
  - collaborative approach to colleagues and other services
- COMMUNITY PARTICIPATION
  - community supportive orientation
  - dialogue with communities
  - participatory planning and evaluation
- RESEARCH
  - simple quantitative and qualitative methods for health systems research
- TRAINING

C. Social and community issues: The assessment considered key social values, particularly attitudes towards female health workers, need for more female staff, and attitudes regarding qualifications required for management. Information on community beliefs was reviewed from a local pilot project.

D. Existing training courses: Information was collected on pre- and in-service training in public health, planning and management for health personnel, and also courses on teaching methodology, held in the previous 12 months in Punjab. Relevant specialist long courses and degree programs were included. The course content was analyzed in relation to both management and technical needs of the Project. Three checklists were used: one of criteria for judging the quality of training, one of project priority organizational needs (Figure 2), and one for evaluating the resources of the training institutions. The FH2 organizational needs were then compared with current training curricula to assess how far they corresponded. The information on the quality of institutions and courses was used to set up an information system on the availability of expertise in Punjab. The Phase 2 report was finalized and distributed through the Project in September 1995.

Phase 3: Felt needs of selected health personnel and review of existing job descriptions

Information was collected on the views of health workers

on their roles, current problems and training needs. Current job descriptions for selected cadres were also reviewed.

A. TNA Phase 3 planning group: In 1995, the Provincial Health Development Center formed a TNA planning group, including additional researchers and experienced trainers, which reviewed the design and decided to collect qualitative data by focus group discussions (FGD). A sub-sample of 6 of the 11 TNA cadres was selected, and the results for 4 management cadres are reported here as discussed above (Figure 1).

B. Focus group discussions: The PHDC organized the selection of participants through 3 Divisional Health Officers and 19 District Health Officers. The DHOs were asked to select staff in the required cadres, with a mixture of rural and urban, long and short service and affluent and deprived areas. Seventy participants were called to Lahore to attend a 90 minute discussion in single discipline groups. The DHOs and the ADHOs preferred to be treated as one discipline, as they were similar in qualifications and experience.

For the FGD sample, participants came from 19 out of the 34 districts in Punjab, and from all districts within a day's return travel of Lahore. In the whole FGD sample, there appeared to be no effect of urban or rural location on the needs expressed, and no obvious difference between participants from Lahore City and others. There were fewer women participants from far away districts, probably reflecting travel problems. There was found no effect of geographical location on training needs, probably because the remoter parts of the province were excluded. The sample included a wide range of length of service, — from 5 months to 35 years. Women Medical Officers were the group with the shortest service, and no women were represented in the senior medical cadres. Two groups of each of the 3 female cadres were moderated by an experienced female MCH specialist, assisted by a female staff member from the Provincial Health Development Center. Six groups of 3 male cadres were moderated by an experienced male medical sociologist, with assistance from a male PHDC officer. The moderators were briefed on the aims of the TNA, and given a tested schedule of questions (Figure 3).

Figure 3 *Framework of questions for focus group discussions*

1. What are the most important tasks in your job?
2. What are the common mistakes that are made by staff in your job?
3. Recall one best performer; what made this person especially good at the job?
4. Recall one poor performer; what made this person poor at the job?
5. What skills are needed for improving the performance at work?
6. Can you think of any tasks which you have to perform regularly in your work which were not adequately covered in your pre-service training?
7. What in-service training do you need to improve your performance at work?
8. What kind of instruction methods do you prefer?

C. Job descriptions: The Punjab Health Department had draft job descriptions produced by a pilot district project, although these had not been approved or distributed. Interviews were held with a representative of each of the 6 focus group cadres to determine their own perceptions of their job descriptions. Job descriptions from the North West Frontier Province Family Health Project were also analyzed. The Punjab job descriptions were used for the TNA, and any major differences with the other sources, if any, were noted for each cadre.

D. Data analysis: The checklists described above were used to identify the extent to which the needs of the project were met by existing training and by the job descriptions for each cadre. For the 4 management cadres, their felt needs could also be compared. Recommendations were made for a program of in-service training for each cadre. These recommendations were presented to the HRD Working Group of the PHDC and senior members of training institutions, and their views were incorporated in the final report.

Strengths and limitations of the methods

The TNA used several methods of collecting information and several different samples of respondents. The views of health service decision-makers, health workers at different levels, donors, NGOs, and trainers were included. Previous

reports, studies and existing project plans and training curricula were consulted to ensure that this assessment built on previous knowledge and took account of current policy decisions. The range of sources of information ensured that the most important training issues were identified. Also, the variety of methods and data sources enabled triangulation to check the validity of the results.

The data collected in the focus group discussions should not be taken as widely generalisable, but only as the first step to developing improved curricula. In general, FGDs are valuable sources of data when used together with information collected by other methods[6]. In this study, the FGDs were valuable in checking the conclusions of Phase 2 on training curricula, since the training could not be observed in action. The opinions of the respondents confirmed that some skills and knowledge missing from written curricula were a significant lack.

Results

Phase 1

The results indicated a widespread awareness of the need for managerial and technical training among provincial and national level personnel. Needs for better interpersonal communication, developing job descriptions, and training in office management were specifically mentioned.

There was evidence that the objectives of the Family Health Projects and the PHDC were not well known to respondents and that better exchange of information was needed in the health department. The situation may have improved since 1994, but as the health services have a high turnover of staff, the results highlight the need for regular orientation of senior managers.

Phase 2 and Phase 3

The results of Phase 2 were analyzed using the provincial priorities as identified in the Family Health Project. The organizational priorities (Figure 2) were compared to current training, job descriptions and felt needs as expressed in the focus groups. The results for management and related subjects for the four district management cadres are shown in Figures 4, 5, and 6.

These show that for the Assistant Inspectress (Figure 4), current training covers very little of the content required. The job description is adequate on management, but not on other related areas; the felt needs of the staff match the priority areas on HR management and HMIS, but not on other areas such as interpersonal skills.

For the Communicable Disease Control Officer (Figure 5), the study found a strongly felt view that most aspects of the

Figure 4 *Assistant Inspectress of Health Services*
n=10 11 to 30 years service (1 to 18 yrs in post)

Management areas required according to provincial priorities	Covered by current training	Job description	Felt needs for training
Management			
HRM: recruitment & selection;	No	Supervision of all female MCH staff;	Clearer job description;
performance review;	No	Performance reviews;	Better model of supervision;
supportive supervision;	Partly	Selection of *Dais* for training;	HMIS;
teamwork for service delivery.	No	Conducting *Dai* training	Field training;
Reporting/HMIS	Partly	Distribution of food aid;	Practice visits;
Managing training	Partly	Reporting to DHO	Training in Urdu.
Interpersonal skills			
Listening skills	Yes	No	No
Decision-making skills	No	Yes	No
Attitude changes	Partly	No	No
Collaborative approach	No	No	No
Gender awareness			
Knowledge of gender issues	No	No	Partly
Community participation			
Orientation	Yes	Partly	No
Dialogue with communities	No	No	No
Participatory planning	Partly	No	No
Research	-	-	-

Figure 5 *Communicable Disease Control Officer*
n=11 25 to 35 years service

Management areas required according to provincial priorities	Covered by current training	Job description	Felt needs for training
Management			
Leadership	Junior Malaria Training &	All responsibilities relate to malaria	Knowledge of job description
Performance review;	Senior Malaria Training	control only	All aspects of district level tasks
Supportive supervision;		Supervision of CDC teams	Planning
Teamwork in planning & service	Curricula not reviewed	Project planning	HR management
delivery.		Maintenance of equipment & supplies	Practical work experience
Managing budgets		Distribution of supplies	Data presentation & reporting
Managing supplies		Member of district team	Supplies management
Reporting/HMIS		Training CDC staff	Accounts
Dealing with emergencies		Reporting to DHO	
Inter-personal skills			
Listening skills		No	No
Decision-making skills		No	Yes
Attitude changes		No	Yes
Collaborative approach		Collaboration with other sectors	(Awareness of this)
Gender awareness			
Knowledge of gender issues		No	No
Attitude change		No	No
Community participation			
Orientation		Yes	No
Dialogue with communities		Yes	No
Participatory planning		No	No
Research			
Simple health systems research		Annual Geographical Reconnaissance	Job-related epidemiology

Figure 6 *District Health Officer and Assistant District Health Officer*
n=25 6 to 30 years service

Management areas required according to provincial priorities	Covered by current training	Job description	Felt needs for training
Management			
Planning & setting objectives	Partly*	**DHO**: Overall responsible for all	HRM: Supervision
HRM: Recruitment & selection;	No	services in the district	Leadership
Performance review;	No	Supervising supervisors	Job descriptions
Supportive supervision;	No	Performance review	Disciplinary procedures
Teamwork in planning & service delivery.	Partly	Recruitment and selection	'Service rules'
Financial management: preparing &	Partly	Plan and budget preparation	Financial management
managing budgets		Managing all resources	Data handling & report
Supplies management	Partly	Managing HMIS	writing
		Monitoring and evaluation	
		Medical advisor to other government departments	
Estate management	Partly	**ADHO**:	Delegation
Managing HMIS	Partly	Support to DHO	Planning
Monitoring & evaluation of district services	Partly	Community liaison	Evaluation
Dealing with emergencies	Partly	Tehsil level management	
Interpersonal skills		Lead and motivate staff (DHO)	
Listening skills	No	No	Yes
Decision-making skills	No	Yes	Yes
Attitude change regarding subordinates	No	Yes	Yes
Collaborative approach	No	Yes	General social skills
Gender awareness			
Knowledge of gender issues	No	No	No
Attitude change	No	No	No
Community participation			
Dialogue with communities	Partly	Yes (ADHO)	Handling local politicians
Participatory management & planning	Partly	Yes (ADHO)	Knowledge of community involvement
Research			
Simple health systems research	Yes	Data gathering	Data handling

** 'Partly' here means that the subject was covered in theory but with insufficient practical application*

job had not been covered in the current basic CDCO training course in Malaria Control. The curriculum was not available, but there was agreement among all the respondents that although it was of good quality, it did not cover their current responsibilities. The job description described CDCOs as responsible only for malaria programs, whereas in practice, they are expected to cover all communicable disease programs. The CDCOs had little awareness of the priority areas of gender awareness and community participation.

For the District Health Officers and Assistant DHOs (Figure 6), the results showed many gaps in current training, particularly in practical skills. It was striking that 'interpersonal skills' were included in felt needs, provincial priorities and job descriptions, but were not covered by training. The job descriptions and felt needs were close to provincial priorities in most areas, with the exception of gender awareness. There was emphasis on dealing with rules and procedures in the felt needs of DHOs and ADHOs, indicating they were used to an 'administration' role, meaning control and enforcement in relation to programs and activities, rather than 'management', meaning setting goals, motivating staff, and using initiative.[7] The FH2 project requires a 'management' role, and although the DHOs had an understanding of this new role, — for example, they mentioned support for staff and forward planning as within their job descriptions, — when it came to defining specific skills needed, they fell back on more familiar administrative procedures. At national level also (Phase 1), the respondents referred to 'office management', suggesting an administrative role.

Other findings from the FGD respondents showed a strong consensus about the qualities of a 'good' health manager. They emphasized personal characteristics, such as honesty, politeness, and good relations with colleagues, more than technical competence. The communication and human relations aspects of the posts were seen as very important. This suggests that the staff have a high 'need for affiliation' in McClelland's terminology[8]. It would be useful to investigate this further as an aid to improving motivation. Finally, on the teaching methods used in in-service training, the health staff commonly said that the current methods did not address work problems realistically or in a sufficiently practical way. They wanted the courses to be participative and located physically closer to the workplace.

Overall, the results highlighted the areas in which there was agreement between provincial organizational priorities, job descriptions and felt needs of these health managers, notably supervision, financial management and practical skills in planning and monitoring services. The results also showed where there were gaps in basic training when compared to organizational priorities. The most important were lack of training in interpersonal skills and gender awareness, as well as lack of training in a wide range of important aspects of management. So, there were certain areas, which were in the job descriptions but not included in any currently available training , which all players agreed should be a priority.

In some areas such as community participation for CDCOs, and gender awareness and interpersonal skills for AIHS, the managers were not aware of the priorities. The DHOs and the ADHOs, overall, have a greater awareness of project needs. All the cadres felt that they needed better knowledge of their job descriptions, indicating an awareness of their changing roles. The job descriptions had major gaps when compared to the work required by the project, – an important finding in relation to the confusion of roles known to exist.

The qualitative data clearly showed that greater importance was given by all cadres to the interpersonal than the technical aspects of management.

Discussion

Use of the TNA in Punjab

The Punjab TNA set out to tackle problems identified by the Second Family Health Project: lack of clarity on roles between different levels of the services; duplication of functions; decision-making structures without community representation; poor supervision; low motivation of personnel; and, poor management of information and finances. The TNA identified where current training was failing to address these problems, and where the felt needs of the health staff coincided with organizational needs. This produced a long list of areas in which current training was deficient, particularly in the development of practical management skills. Selecting those areas seen as felt needs and included in the latest job descriptions, such as supervision and interpersonal skills, could then be prioritized. In the Pakistan situation of low motivation of health personnel, responding to felt needs is important for

improving performance. Previous experience of the authors had also shown the value of training in communication skills and use of practical, problem-based learning methods not normally included in training. In other areas, such as proactive 'management' rather than administration, gender analysis, and community participation for CDCOs, where staff awareness was low, the results suggest that training might not be so effective in changing practices; other measures such as changes in job descriptions, might be needed as well, or instead. This study made it possible to divide the project's priority areas into those that were felt needs and those that were not.

The TNA could therefore make recommendations regarding training for Punjab health managers with a good chance of their acceptance by the staff. In-service courses on interpersonal skills, supervision, priority setting, the district system and roles of district staff, for example, could all be expected to improve clarity of roles and decision-making, as required by the project. However, other factors necessary for change, as for example, resource availability, motivation of staff, real decision-making power, political support, should not be forgotten.[9,10] The potential value of any TNA should be judged against these factors. For example, as decentralization progresses, one effect will be the development of teamwork and accountability at the district level. This will cut across the existing lines of 'vertical' responsibility within technical programs, and affect all supervisors in a province. Figure 1 shows the current lines of accountability. In practice, the dotted lines of technical supervision are usually stronger than the solid 'horizontal' lines of reporting to the District Health Officer. The FH2 project's management training for DHOs and other supervisors is likely to be effective only if it is accompanied by a clear shift in procedures to strengthen horizontal accountability. Accurate and consistent job descriptions could also help to clarify accountability. The TNA provided useful information on where the deficiencies lay in existing job descriptions.

As well as improving the quality of training in the short term, the TNA aimed to set up an information base for health human resources planning and management in Punjab. Information from training institutions and individuals was categorized and stored according to the three key checklists described, so that it is easily accessible and can be updated consistently in future years. The criteria for evaluating training courses were selected for long term use. The proposed system for continuous review of training was the following:

Data collection and recording : continuous or at regular short intervals.	(a) Maintaining an up-to-date data base on in-service courses, including subjects of training and details of participants. (b) Collecting and analyzing evaluations of training courses, including qualitative data.
Analyzing of data: annually or according to planning cycle.	(c) Comparing in-service training with Project or Health Department priorities. (d) Updating files on training institutions.

This system enables the Health Department to regularly update priority training needs in relation to participants' views (b) and new policies (c). It could also provide information to improve collaboration and reduce duplication between different units in the Department of Health, and between the Department and other training institutions.

Lessons for training needs assessment in other health systems

This study illustrates how qualitative data can be used in problem analysis and in evaluation of training programs. Focus group discussions were used to complement the data collected from documents and to verify findings or point out where inconsistencies lay. Qualitative data can be very important in understanding why problems occur and combination of several survey methods was important in improving confidence in the validity of results. In this study, the views of the health workers helped explain why there was confusion of management roles, and deficiencies in the teaching methods of current training.

Secondly, the Punjab TNA demonstrates a method of setting priorities for training in a situation where there is rapid change in a health system, and therefore a need for many new skills, but where resources are limited. Four different sources of information on training needs are used, and the topics on which they all agree can be selected as most

likely to lead to the desired change. This method also recognizes and gives weight to the views of the health staff as recommended for the implementation of district systems[11].

This TNA also provides a useful tool for the management of the changes required for health sector reforms in many countries. A well accepted finding on organizational change is that participation in the change reduces resistance and motivates people to change themselves[12]. The TNA method sets up a channel of communication with the health staff and a clear set of priorities that can be discussed and reviewed. In the present climate of international health sector reform, there are often rapidly changing rhetoric and plans, but slow implementation of reform due to poor communication and structural weaknesses in local systems. A top-down approach to reform which fails to take account of local realities has been widely condemned.[13,14]

Lastly, the Punjab study attempted to set up a system for long term monitoring of training needs which could be applied within any health organization. The key elements are a comprehensive database of current in-service training, up-to-date data from evaluation of training, and regular updating in relation to organizational policies and plans. It is important to have organizational needs clearly summarized and disseminated and to have a system that links these with feedback from trainers and trainees.

This study illustrates four key points for training in the health sector: the value of combining qualitative and quantitative methods of needs assessment; the use of TNA to prioritize from among many learning needs; TNA as a practical tool to enable participation in organizational change; and the importance of a permanent system for reviewing training needs.

Acknowledgments

This work was carried out under the Second Family Health Project of the Government of Pakistan, part funded by the British ODA, the World Bank and the German KfW. The authors would like to acknowledge the contributions of FH2 and PHDC colleagues, particularly Zamin Gul, Shabnam Saaed, Colin Thunhurst and the valuable comments on the drafts of the article from colleagues in the International Division, Nuffield Institute for Health.

References

1. World Bank. 1993. *World Development Report.* New York: World Bank
2. ODA/World Bank Second Family Health Project. 1994. *Punjab and Balochistan health systems strengthening components Vision statement,* Pakistan.
3. Sandiford, P, GJ Kanga and AM Ahmed. 1994. The management of health services in Tanzania: a plea for health sector reform. *International Journal of Health Planning and Management* 9(4): 295-308.
4. Abdel Rahim, IM, S Nalder, BA El Faki, GS Ghorashi and B Bower. 1988. Improved training in primary health care: field follow up essential. *World Health Forum* 9(3): 393-398.
5. Planning Cell. 1993. *Situational analysis of health in Punjab,* Province of Punjab Health Department, Lahore.
6. Khan, ME and L Manderson. 1992. Focus groups in tropical diseases research, *Health Policy & Planning* 7 (1): 56-66.
7. Keeling, D. 1972. Management in Government. London: Allen and Unwin; quoted in Collins, C. 1994. *Management & organization of developing health systems.* Oxford: Oxford University Press, pp 1-4.
8. McClelland, DC. 1961. *The achieving society.* New York:The Free Press.
9. Rojas, Z and P Sandiford. 1995. It's not just how you train, it's who you train. *Learning for Health* Issue 7 Mar-Aug: 3-7.
10. Bryce J, F Cutts, J Naimoli and M Beesley. 1993. What have teachers learnt? *The Lancet* 342(8864): 160-161.
11. WHO. 1990. *Systems of continuing education: priority to district health personnel.* Tech. Rep. Ser. 803 Geneva:WHO.
12. Nadler, D. 1993. Concepts for the management of organizational change. P 92 in *Managing Change,* ed. C Mabey and B Mayon-White. London: Paul Chapman/Open Univ.
13. Lancet editorial. 1993. World Bank's cure for donor fatigue. *The Lancet* 342 (8863): 63-64 & 105.
14. Gilson, L. 1995. Management and health care reform in Sub-Saharan Africa. *Social Science & Medicine* 40 (5): 695-710.