ORIGINAL ARTICLE

Public trust in health care: the system or the doctor?

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Objectives: To examine how the public assess trust in health care in England and Wales.
Design: Postal structured questionnaire in cross sectional survey.
Setting: Random sample of people on the electoral register in England and Wales.
Subjects: People aged 18 and over.
Main outcome measures: General levels of trust and confidence in health care.
Results: The response rate was 48% (n = 1187). The mean level of confidence (trust) in the healthcare system was 6.0 out of a score of 10. Levels of distrust appeared relatively high with at least 356 (30%) respondents reporting little or very little trust for 28 of 32 specific aspects of health care. The highest levels of distrust were found in relation to how the health service was run and financed, particularly waiting times and the implication of cost cutting for patients. Statistical analysis by univariable linear regression of the specific determinants of generic assessments of public trust (confidence) suggested that the key aspects were patient centred care and levels of professional expertise. Being covered by private health insurance was also a key determinant of levels of public trust.
Conclusion: Public assessment of trust tends to address the views of care at the micro level. Policy makers concerned with the erosion of public trust need to target aspects associated with patient centred care and professional expertise.

Public trust in health care in the UK is believed to have been shaken by the recent intense media scrutiny about scandals over medical competence such as the enquiry into paediatric cardiac surgery in Bristol, the conviction of the GP Harold Shipman, and the removal of organs from children at Alder Hey Hospital. This has led to policies aimed at creating more effective accountability for healthcare professionals.[1–3] However, the erosion of public trust in health care has also been linked with how the NHS is run and financed (box 1) and the increasing pressure on NHS budgets due to increased demand by an ageing population, the rising costs of technology, and increases in public sector pay.[4] Others have suggested that it might be associated with changes in public attitudes, values, and expectations of health professionals brought about by wider social and cultural changes such as the overall decline in deference to authority and trust in experts and institutions and increasing reliance on personal judgements of risk,[5–7] or the overall decline in social trust due to the breakdown in communities, social networks, and cohesion.[8]

Definitions of trust vary but, as Davies[9] argues, ''all embody the notion of expectations: expectations by the public that healthcare providers will demonstrate knowledge, skill and competence; further expectations too that they will behave as true agents (that is, in the patients best interest) and with beneficence, fairness and integrity. It is these collective expectations that form the basis of trust'' (page 193).

The empirical evidence about the extent of the decline in trust in health care appears to be limited and inconsistent. In Europe there is evidence of a decline in trust but this is claimed to vary according to the values and organisational principles of the country's healthcare system.[10 11] In the USA public trust in health care is believed to have gradually declined during the past 20 years[12 13] and, over a similar period, there is evidence of a pattern of decline in public satisfaction (not necessarily trust) with the NHS in the UK.[14 15] However, while trust in health care may be in decline, trust in medical practitioners in the UK seems still to be strong, at least compared with other professional occupations.[16] According to recent survey evidence,[16] trust in the medical profession has risen steadily over the last decade.

This apparent inconsistency in the pattern of evidence raises the question about how the public assesses trust in health care in the UK. Is the public's assessment based on criteria associated with the structure, organisation, and financing of the health service or is it more to do with ''micro'' level issues such as the quality of health care provision, professional expertise, and the doctor-patient relationship? This question is the focus of this study which presents evidence on levels of trust and explores more critically the specific determinants of public trust.

METHOD

Sampling

The analysis was based on data collected between October 2002 and February 2003 in a postal questionnaire sent to a random sample of 2777 people aged 18 and over in England and Wales on the 2000 electoral register (that is, registered to vote in local and national elections). The sampling methodology adopted used an equal probability design. Addresses were stratified by region and within region by local authority.

Questionnaire development

This survey formed part of an international study comparing levels of trust in the UK with those in Germany and the Netherlands. Common core questions were therefore necessary and these were derived from a survey instrument developed in the Netherlands, the specific items of which were based on themes which emerged from qualitative research.[10] The questions used in the survey are shown in Appendix 1 available online on the *QSHC* website (www.qshc.com/supplemental). Confidence was used as an equivalent of trust primarily because, in the Netherlands and Germany, no semantic distinction is made between the terms. These questions were piloted (n = 50) and tailored to the context of the NHS where appropriate.

No information is available on the reliability and validity of the general question (overall confidence in today's healthcare

Box 1 National Health Service (NHS) in England and Wales

- National system financed primarily through public taxation and free at point of access.
- Majority of public are registered with a general practitioner (family doctor) who acts as their first point of contact with the NHS.
- General practitioners and primary healthcare teams aim to act as coordinators of health and social care for their patients and as ''gate keepers'' to hospital and secondary specialist services.
- There is a relatively small private health sector which is primarily accessible to the minority (20%) covered by private health insurance.

system). However, 30 of the 32 specific items of trust were derived from the Dutch instrument.[10] These items were categorised into six dimensions on the basis of evidence from a factor analysis of the Dutch data as follows: (A) patient centred focus; (B) macro level policies; (C) professional expertise; (D) quality of care; (E) communication and provision of information; and (F) quality of cooperation. Two further items related to the recent NHS context—the decline in deference to doctors (''patients show doctors respect'') and concern about the regulation and accountability of doctors (''doctors are well regulated in this country'')—were also added.

Statistical analysis

The statistical analyses were carried out using Stata software, version 8. Descriptive statistics are presented about the level of trust and confidence in different healthcare practitioners and with specific aspects of health care and the healthcare system as a whole. Univariable linear regression analysis examined the specific aspects of trust which were most strongly associated with a general measure of trust. The general measure was derived from the question: ''How much confidence do you have in today's healthcare system?'' Subjects were asked to give a rating between 1 (not at all confident) and 10 (extremely confident).[1] 1157 answered the question giving a mean (SD) score of 6.0 (2.0). As the specific aspects of trust are coded in an ordinal fashion, linearity of these variables within the regression models was checked using the Wald test. There was no reason to suspect non-linearity and these variables were used as though continuous within these models. Also presented are regression analyses, both univariable and multivariable, of sociodemographic variables on the overall rating of trust.

Table 1 Levels of trust in specific aspects of health care

Category of care	Number	Little/very little trust
(A) Patient focused care		
Patients are taken seriously	1140	32%
Patients get enough attention	1140	37%
Doctors provide their patients with good guidance	1137	32%
Patients are listened to	1145	45%
Doctors spend enough time on their patients	1138	63%
(B) Macro level policies and patient care		
Medical help and patient care will not be compromised by the shortening of waiting lists	1137	62%
Patients won't be the victim of rising costs of health care	1134	70%
Waiting times are never too long	1137	75%
Cost cutting does not disadvantage patients	1135	68%
Patients will be able to pay for their own health care if they have to	1128	65%
(C) Professional expertise		
New treatments are put into practice in the healthcare system	1137	45%
The education and training of doctors in this country is one of the world's best	1140	17%
Doctors can do everything	1132	65%
Doctors know everything about all sorts of diseases	1139	65%
(D) Quality of care		
Patients will always get the best treatment	1141	50%
Doctors always make the right diagnosis	1144	31%
Patients are referred in time	1134	45%
Patients always get the right dose of medicine	1142	34%
Patients always get the right medicine	1143	43%
A lot of care is taken to keep patients' medical information confidential in the health service	1143	17%
Doctors always do enough tests	1141	46%
Doctors don't prescribe medicines too late	1132	42%
(E) Communication and provision of information		
The information given to patients is clear and understandable	1137	40%
Patients get sufficient information about the cause of their problems	1134	44%
Doctors discuss things fully with their patients	1140	44%
Patients get sufficient information about the various treatments that are available	1142	62%
Patients get sufficient information about the effects of their treatment	1139	54%
(F) Quality of cooperation		
Healthcare providers are good at cooperating with each other	1136	47%
Patients are not given conflicting information	1140	52%
High levels of specialisation do not cause problems in the healthcare system	1129	38%
New items		
Doctors are well regulated in this country	1139	28%
Patients will show doctors respect	1143	19%

Table 2 Specific determinants of overall rating of trust/confidence (rank order)

Rank order	Individual determinants	Number	Mean change*	95% CI	p value	R^2
1	(A) Patients are taken seriously	1140	−0.801	(−0.89 to −0.71)	0.00	0.21
2	(A) Patients get enough attention	1140	−0.742	(−0.82 to −0.66)	0.00	0.21
3	(D) Patients will always get the best treatment	1141	−0.703	(−0.78 to −0.62)	0.00	0.21
4	(D) Doctors always make the right diagnosis	1144	−0.687	(−0.78 to −0.59)	0.00	0.16
5	(A) Doctors provide their patients with good guidance	1137	−0.651	(−0.74 to −0.56)	0.00	0.15
6	(F) Healthcare providers are good at cooperating with each other	1136	−0.635	(−0.72 to −0.55)	0.00	0.15
7	(C) New treatments are put into practice in the healthcare system	1137	−0.622	(−0.71 to −0.53)	0.00	0.14
8	(E) The information given to patients is clear and understandable	1137	−0.618	(−0.70 to −0.53)	0.00	0.15
9	(A) Patients are listened to	1145	−0.611	(−0.69 to −0.53)	0.00	0.16
10	(A) Doctors spend enough time on their patient	1138	−0.605	(−0.69 to −0.52)	0.00	0.15
11	(E) Patients get sufficient information about the cause of their problem	1136	−0.600	(−0.68 to −0.51)	0.00	0.14
12	(D) Patients are referred in time	1134	−0.593	(−0.68 to −0.51)	0.00	0.15
13	(B) Medical help and patient care will not be compromised by the shortening of waiting lists	1137	−0.592	(−0.68 to −0.50)	0.00	0.12
14	(E) Doctors discuss things fully with their patients	1140	−0.590	(−0.67 to −0.51)	0.00	0.15
15	(D) Patients always get the right dose of their medicine	1142	−0.588	(−0.68 to −0.50)	0.00	0.13
16	(C) The education and training of doctors in this country is one of the world's best	1140	−0.581	(−0.67 to −0.49)	0.00	0.12
17	(E) Patients get sufficient information about the various treatments that are available	1142	−0.571	(−0.66 to −0.49)	0.00	0.14
18	(D) Patients always get the right medicine	1143	−0.570	(−0.66 to −0.48)	0.00	0.12
19	(D) A lot of care is taken to keep patients' medical information confidential in the health service	1143	−0.566	(−0.67 to −0.47)	0.00	0.10
20	(E) Patients get sufficient information about the effects of their treatments	1139	−0.560	(−0.64 to −0.48)	0.00	0.14
21	Doctors are well regulated in this country	1139	−0.558	(−0.65 to −0.46)	0.00	0.11
22	(B) Patients won't be the victims of rising costs of health care	1134	−0.536	(−0.62 to −0.45)	0.00	0.10
23	(C) Doctors can do everything	1132	−0.524	(−0.62 to −0.43)	0.00	0.11
24	(D) Doctors always do enough tests	1141	−0.516	(−0.60 to −0.43)	0.00	0.11
25	(C) Doctors know everything about all sorts of diseases	1139	−0.480	(−0.57 to −0.39)	0.00	0.09
26	(D) Doctors don't prescribe medicines too late	1132	−0.452	(−0.55 to −0.35)	0.00	0.07
27	(F) Patients aren't given conflicting information	1140	−0.383	(−0.48 to −0.29)	0.00	0.05
28	Patients will show doctors respect	1143	−0.376	(−0.48 to −0.27)	0.00	0.04
29	(B) Waiting times are never too long	1137	−0.358	(−0.45 to −0.27)	0.00	0.05
30	(B) Cost cutting does not disadvantage patients	1135	−0.343	(−0.43 to −0.26)	0.00	0.05
31	(F) High levels of specialisation do not cause problems in the healthcare system	1129	−0.278	(−0.38 to −0.18)	0.00	0.02
32	(B) Patients will be able to pay for their own health care if they have to	1128	−0.081	(−0.18 to −0.15)	0.10	0.01

*Mean change in overall trust rating per unit lost in trust in individual determinant.

RESULTS

Response rate and sample representativeness

Respondents were sent three follow up mailings in addition to the first mailing. The original sample of 2777 was reduced to 2489 as 288 had died or moved away. 1187 (48%) completed the questionnaire, 75 (3%) refused, and 1227 (49%) did not reply.

The background characteristics (age, sex, marital status, socioeconomic status, health status, and limiting long-standing illness) of the sample were compared with those of the adult (18+) population[17] as no information was available on non-respondents. There were significantly lower proportions of men ($p<0.001$) and respondents in the 15–24 and 25–34 age groups ($p<0.001$) in the survey population than in the background population, but higher proportions in the older age group (45+) ($p<0.001$). There were significantly higher proportions of married respondents in the survey population ($p<0.001$) but lower proportions of single ($p<0.001$) and divorced/separated people ($p<0.001$). Those who reported having a limiting long-standing illness were significantly overrepresented ($p<0.001$), as were those who reported that their health was ''fair'' ($p<0.001$), but those who rated their health as ''good'' or ''excellent'' were underrepresented. Those in routine and intermediate occupations were significantly overrepresented in the survey population ($p<0.001$) while self-employed and routine workers were underrepresented ($p<0.001$).

Level of trust and confidence in the healthcare system

The mean level of confidence (trust) in today's healthcare system reported by respondents was 6.0 out of a score of 10, although this declined to 5.6 when respondents were asked about their confidence in the healthcare system of the future. This pattern was borne out in the response to the question: ''How much better or worse do you think the general standard of health care in the NHS has been getting in the past 5 years?'' 463 (39%) reported that they felt the standard had deteriorated compared with 249 (21%) who felt it had improved, and a further 463 (39%) thought the standard had not changed. 1056 (89%) respondents reported at least a fair amount of confidence (404 (34%) reported a great deal of confidence) in general practitioners and a similar level of confidence was reported for hospital doctors (n = 1033 (87%)) and nurses (n = 1056 (89%)). However, the lowest level of confidence was reported for health service managers (n = 344 (29%)) and complementary therapists who were not doctors (n = 463 (39%)) although, in the latter case, 309 (26%) of respondents reported that they did not know.

Specific aspects of trust

Table 1 shows that at least 356 (30%) of the respondents reported little or very little trust for most of the items (n = 28). The highest levels of distrust were found in relation to the macro level issues of organisation and provision, particularly in relation to waiting times and the consequences for the patient of cost cutting. There were also high levels of distrust in relation to some items involving doctors' professional expertise such as their level of knowledge about a range of diseases.

A different picture emerged from the analysis examining the specific aspects of trust which best predicted generic measures. The dependent variable included in the regression was overall trust rating. The models gave the mean change in overall trust rating per unit lost in the individual determinants.

Table 3 Sociodemographic determinants of overall rating of trust (confidence)

Determinants	Number	Crude mean change in overall trust rating† (95% CI)	R^2	Adjusted * mean change in overall trust rating† (95% CI)	p value‡
Age	1130	0.0079 (0.001 to 0.014)	<0.01	0.0065 (−0.003 to 0.16)	0.19
Sex (M v F)					
Female	651		<0.01		0.34
Male	497	0.190 (−0.41 to 0.42)		0.124 (−0.13 to 0.38)	
Marital status					
Single (never married)	144		<0.01		0.22
Married or living with long term partner	827	−0.069 (−0.42 to 0.28)		−0.280 (−0.69 to 0.13)	
Divorced/separated	84	−0.054 (−0.58 to 0.48)		0.026 (−0.55 to 0.60)	
Widowed	91	0.299 (−0.22 to 0.82)		0.035 (−0.63 to 0.70)	
Educational qualifications					
Degree	195		0.01		0.32
Teaching or other higher	42	0.841 (0.19 to 1.50)		0.805 (0.13 to 1.48)	
A level	116	0.151 (−0.30 to 0.60)		0.030 (−0.45 to 0.51)	
GCSE	203	0.320 (−0.07 to 0.71)		0.189 (−0.25 to 0.63)	
CSE	78	0.182 (−0.33 to 0.70)		0.160 (−0.41 to 0.73)	
HND	36	−0.171 (−0.87 to 0.53)		−0.387 (−0.10 to 0.32)	
GNVQ	27	0.431 (−0.36 to 1.22)		0.121 (−0.76 to 1.00)	
Other qualification	128	0.090 (−0.35 to 0.53)		−0.012 (−0.51 to 0.48)	
No educational qualification	305	0.469 (0.12 to 0.82)		0.214 (−0.25 to 0.67)	
Ethnic group					
White	1076		0.01		0.14
Black Caribbean	8	0.703 (−0.66 to 2.07)		1.299 (−0.38 to 2.97)	
Black African	6	−0.214 (−1.79 to 1.36)		1.012 (−0.87 to 2.89)	
Black other black negro	0				
Indian	20	−0.747 (−1.62 to 0.12)		−0.991 (−2.00 to 0.02)	
Pakistani	7	−1.333 (−0.28 to 0.13)		0.341 (−1.84 to 2.52)	
Bangladeshi	4	−2.047 (−3.98 to −0.12)		−1.207 (−3.86 to 1.45)	
Chinese	4	−2.297 (−4.23 to −0.37)		−1.644 (−3.81 to 0.52)	
Other	16	−0.297 (−1.27 to 0.67)		−0.489 (−1.58 to 0.60)	
Social class/occupation					
Higher managerial/professional	185		<0.01		0.99
Lower managerial/professional	297	−0.001 (−0.36 to 0.35)		−0.002 (−0.39 to 0.38)	
Intermediate	148	−0.122 (−0.54 to 0.30)		−0.095 (−0.57 to 0.38)	
Small employers/own account	68	−0.070 (−0.60 to 0.47)		−0.171 (−0.76 to 0.41)	
Lower supervisory, craft and related	113	0.044 (−0.41 to 0.50)		−0.013 (−0.53 to 0.50)	
Semi-routine	184	0.082 (−0.31 to 0.48)		−0.054 (−0.52 to 0.41)	
Routine	72	0.210 (−0.33 to 0.75)		0.053 (−0.57 to 0.67)	
Private health insurance					
No	930		0.01		0.03
Yes	210	−0.418 (−0.71 to −0.12)		0.338 (0.03 to 0.65)	
Long term illness					
Yes	460		<0.01		0.38
No	706	0.057 (−0.18 to 0.29)		0.139 (−0.17 to 0.45)	
Health status over last 12 months					
Excellent	153		0.01		0.01
Good	603	−0.206 (−0.56 to 0.15)		−0.214 (−0.58 to 0.16)	
Fair	317	−0.287 (−0.67 to 0.10)		−0.385 (−0.83 to 0.06)	
Poor	103	−0.511 (−1.01 to −0.01)		−0.698 (−1.30 to −0.09)	
Don't know	3	−2.905 (−5.16 to −0.65)		−3.340 (−5.53 to −1.15)	

*Adjusted for all other variables in the table.
†For categorical variables a baseline group is chosen and the mean change is shown between this group and other groups.
‡Wald test from multivariable model.

Table 2 shows the rank order of specific aspects according to their mean change in the generic rating of trust. The pattern of results shows that five of the top 10 strongest determinants were associated with patient centred care, particularly with the doctor-patient relationship (for example, ''patients are taken seriously'' and ''patients get enough attention''). Two items measuring trust with quality of care also came in the top four of the determinants. However, what was notable was the absence from the cluster of strongest determinants of specific items measuring trust in macro level aspects of health care such as waiting times and cost cutting. Three of these items were in the bottom four places.

A similar statistical analysis was carried out using the same dependent variable but with the sociodemographic characteristics of the respondents as the independent variables. The crude results (table 3) show the characteristics examined (age, sex, marital status, educational qualifications, ethnic group, socioeconomic status, private insurance coverage, presence of a limiting long-standing illness, and health status). Age (ageing positively associated with trust), ethnic group (white and black Caribbean positively associated with trust), health status (poor health associated with lower trust), and private insurance coverage (those covered by private health insurance were more likely to report a lower level of trust) were determinants of trust. However, when the demographic variables were adjusted for each other, variation in overall trust is explained by private health insurance coverage and perceived health status.

DISCUSSION

The evidence from this national cross sectional survey confirmed previous research[16] that, despite the series of medical scandals, confidence and trust in orthodox medical and healthcare practitioners remains relatively high. This is in marked contrast to the low levels of confidence and trust found in health service managers. This probably reflects the evidence that levels of confidence in the healthcare system now[15] and in the future were at best modest and expected to deteriorate, and the increased levels of distrust were found for items specifically measuring aspects of

organisation and finance such as concerns about cost cutting and waiting lists.

Levels of trust overall, however, appeared to be relatively low—at least compared with other indicators of public views such as public satisfaction levels.[14 18] The inadequacies of satisfaction indicators have been well documented[14 18]—not least the propensity to underrepresent levels of dissatisfaction—although in this survey the increased levels of distrust might be an artefact of the possible biases in the sample. Older age groups were overrepresented as were those in good health, but the analysis suggested that this might increase levels of trust rather than distrust. Those with limiting long-standing illness (overrepresented in this survey) are sometimes portrayed as ''lay experts''[19] and may be more aware of the inadequacies and limitations of healthcare provision. However, there was no evidence that those with long-standing illness were more likely to report higher levels of distrust. Clearly, further research is needed to examine the relationship between satisfaction with and trust in health care, although doubts have been raised about the benefits of survey methods, particularly structured postal questionnaires, for eliciting public and user views.[18] This applies equally to attempts to measure public trust as it does to satisfaction. In addition, there is the possible problem with equating confidence and trust in health care,[9] and whether the two should be treated as distinct concepts. It has been suggested that trust refers to whether a person is doing a job for his or her benefit as well as the public's, whereas confidence relates to competence to do the job.[20] However, empirical evidence suggests that the public do not make such a distinction.[21]

Despite the public's expressed concerns about the way the health service is organised and financed, the results of the analysis of the specific determinants of public trust suggest that the most significant dimensions were those measuring the extent to which the doctor is patient centred (that is, behaves professionally and gives patients enough attention) and the perceived level of professional expertise (accurate diagnosis and high quality treatment). This appears to suggest that general assessments of public trust in health care might be replaced by questions about specific dimensions of micro level health care such as professional expertise and the doctor-patient relationship. The analysis seems to suggest that public views about trust tend to match the views of ''users'' about the quality of health care rather than the broader concerns of ''citizens'' with how the services are run and paid for.[18] However, again these findings might reflect the possible biases in the sample with more frequent users, such as those with long-standing illness, being overrepresented.

There was little evidence of variation in the level of trust by social position. The relationship between being covered by private health insurance and lower levels of trust supports other evidence[22] which suggests that those dissatisfied with NHS care—either as a result of direct experience or political beliefs and values (choice, competition)—are more likely to subscribe to private health insurance. However, this relationship between dissatisfaction and the use of private health care is not simple[22] as people with private health insurance coverage fall into two groups: those who have chosen to subscribe and those such as management executives who have been given it as a company perk.[15 22] Thus, private health insurance coverage, although on the increase,[15] is not necessarily a sensitive indicator of a more consumerist or critical orientation to NHS care.

The results of the statistical analysis in this study suggest that the relationship between the perceived performance of the healthcare system at the macro level and the perceived quality of healthcare provision at the micro level is a complicated one. In spite of the higher levels of distrust expressed about the performance of the system, public trust seems to hinge on the performance of the provider in terms of levels of clinical competence and their skills in addressing their patients' needs and interests. Policy makers concerned with maintaining trust and confidence in the NHS need to focus on strategies for enhancing the quality of healthcare provision and on how micro and macro level policies might be integrated to achieve this aim. This is crucial if healthcare professionals are to resist the alleged erosion of trust in experts in general.[5 6] However, with the increasing emphasis on managed care and accountability, it might not be practicable to expect to be able to continue to maintain high levels of trust.[23]

Key messages

- Despite a series of medical scandals, confidence and trust in orthodox healthcare practitioners remain relatively high.
- Levels of distrust, particularly with how the service is run and financed, are high.
- Key aspects of public assessment of trust were patient centred care and levels of professional expertise.
- Policy makers intent on enhancing public trust should focus on patient centred care.

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The Confidence in Health Care questionnaire (Appendix 1) is available on the *QSHC* website at www.qshc.com/supplemental.

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Michael Calnan initiated the study, developed the core ideas, designed the study, supervised the analysis and wrote the paper. Emma Sanford carried out the statistical analysis.

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