

Session Number : 7
Session Title : Measuring other non-market services
Session Chair : F. LEQUILLER

Paper prepared for the joint OECD/ONS/Government of Norway workshop
”Measurement of non-market output in education and health”

London, Brunei Gallery, October 3 – 5, 2006

A new approach to measuring the provision of Adult Social Care

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1. Summary

- 1.1 This paper gives an overview of the current measure of adult social care output in the UK national accounts and describes research which sets out a method for incorporating quality changes into the output measure.
- 1.2 The proposed method takes an holistic approach by looking at all main outcomes that the services attempt to affect and estimating the impact of social services of these outcome dimensions. The method weights these together using population preferences established through discrete choice experiments.
- 1.3 The paper also briefly discusses some of the practical issues that need to be overcome before robust quality data can be routinely collected.

2. The current measure

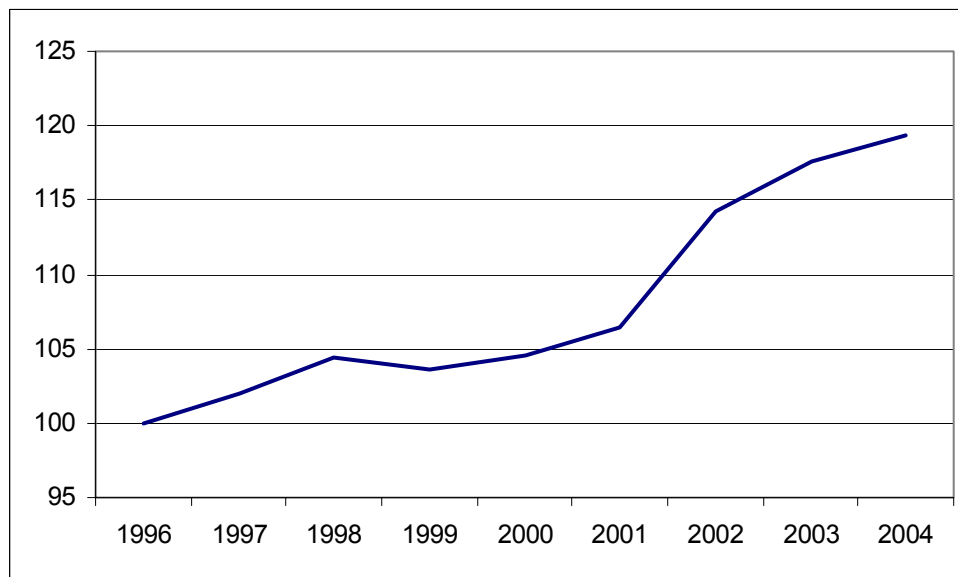
- 2.1 The current UK National Accounts measure of adult social care was introduced in 2005 as part of implementation of the Atkinson Review (Atkinson, 2005). The method is described in more detail elsewhere (Netten, 2006), but its key features are outlined below.
- 2.2 The measure is used in the expenditure measure of GDP and is based on data on the level of social services activities measured either in terms of time (e.g. number of weeks of residential care) or number of items (e.g. number of meals provided). The level of each activity is adjusted to allow for the proportion paid for by government.
- 2.3 A total of 23 service categories (see table 1) are included in the measure and between them they represent the bulk (around 90 per cent) of government expenditure in this area. The activities cover a variety of services: assessments of need; day care; domiciliary care (home care, provision of meals and provision of equipment) and provision of care home places (both residential and nursing). Where the data are available, services are measured separately for different client groups (older people over 65, and younger adults with physical disabilities, learning disabilities or mental health needs). Each category has a different unit cost associated with it. The activities are weighted together by their shares of expenditure to generate the overall measure of output growth.

Table 1 Components of Adult Social Care Measure

Service Component	Weight in 2004 (to nearest %)
Referrals and Assessments	15
Older People	8
Younger Adults – physical disabilities	2
Younger Adults – learning disabilities	2
Younger Adults – mental ill health	3
Care Homes – Older People	33
Nursing Homes	10
Local Authority Care Homes	7
Independent Care Homes	16
Care Homes – Younger Adults with Physical Disabilities	3
Nursing Homes	1
Local Authority Care Homes	0
Independent Care Homes	2
Care Homes – Younger Adults with Learning Disabilities	12
Nursing Homes	1
Local Authority Care Homes	2
Independent Care Homes	10
Care Homes – Younger Adults with Mental Ill Health	3
Nursing Homes	0
Local Authority Care Homes	0
Independent Care Homes	2
Day Care	12
Older People	3
Younger Adults – physical disabilities	1
Younger Adults – learning disabilities	6
Younger Adults – mental ill health	1
Domiciliary Care	23
Total meals provided all sectors	1
Home care all provision	20
Total number of people receiving equipment	2

2.4 The index series of adult social care using this methodology is shown in figure 1. Output growth is reasonably smooth except in 2002. Here the large growth is due to a machinery of government change which led to the fees of care home residents being paid directly by government rather than via transfers as previously.

Figure 1. Adult Social Care Output, 1996 – 2004. (Index 1996 = 100)



	1996	1997	1998	1999	2000	2001	2002	2003	2004	Average Annual Growth
Output Index	100.0	102.0	104.4	103.6	104.6	106.4	114.2	117.6	119.3	
Growth (%)		2.0	2.4	-0.8	1.0	1.8	7.4	3.0	1.4	2.2

3. Quality adjustment

- 3.1 To date work on estimating changes in quality has concentrated on the delivery of services where the impacts are both immediate and are largely physical in nature. This represents the bulk of the services delivered but does not cover either i) advice and assessment services or ii) equipment provision. There is a work programme in place to investigate these. The commentary below largely concentrates on care homes as this is the largest expenditure type.
- 3.2 Care home service recipients are a diverse group. The current output measure recognises some aspects of this diversity as it contains separate measures for client type (older people, younger adults with physical disabilities etc) and service setting (nursing homes, local authority homes and independent homes).
- 3.3 These categories, however, do not fully differentiate service recipients into homogenous groups. In the category 'older people in independent care homes' for example there will be people who are reliant on the service to supply all their basic care needs as well as those who only require minimal assistance. These people are clearly receiving greatly different amounts of care but the unit of measurement (a care-week) cannot capture this difference.

- 3.4 This lack of differentiation will not matter if the average level of need in a category is unchanging over time but in the UK there is good reason to believe that such a change is happening. UK government policy has been to concentrate services on those with the greatest needs. The implementation of this policy has meant that on average care home residents are more reliant on government services than before. Assuming for now that these increased needs are largely being met, the average amount of care being delivered per week of care will have increased. So, the current output measure has underestimated growth.
- 3.5 The most obvious way to account for changes in the client mix (the movement towards a greater number of service recipients having higher levels of need) would be to further differentiate the output measure. Each current measurement line could be divided into high, medium and low needs for example each with an associated unit cost. However, the data does not exist to allow this. Instead researchers from the Personal Social Services Research Unit (PSSRU) at the University of Kent have proposed an alternative measurement method. A brief description of the methodology is provided below; a fuller discussion is available at (ref).

Categories of need

- 3.6 The PSSRU methodology involves estimating the average level of needs of clients for different components of adult social care. They begin by describing what the needs of clients are. These are defined in terms of the outcomes that services are attempting to affect.
- 3.7 Nine need categories have been defined by PSSRU (see table 2). Seven of these categories relate to care delivered to the client. The eighth recognises the importance of role support; the assistance given to a client in supporting their dependents. The final dimension recognises that for most people moving from their own home to an institutional setting represents a loss of welfare and so the outcomes for those in care homes needs to be 'marked down' to reflect this.
- 3.8 There is more work needed to ensure that these outcome dimensions relate to the bulk of services provided, but when a definitive list is achieved the benefits of this approach are clear: this holistic approach will allow us to determine whether our proposed measures are truly representative of the changes in need and not merely selective aspects.

Table 2. Outcome Dimensions for Adult Social care

Dimension	Positive Outcome Sought
Personal cleanliness and comfort	the individual is personally clean and comfortable
Social participation and involvement	the individual is comfortable with their level of emotional support, general social contact and level of community participation
Control over daily life	the individual can choose what to do and when to do it, having control over daily life and activities
Meals and nutrition	the individual has a nutritious, varied and culturally appropriate diet with meals at regular, timely intervals
Safety	the individual feels safe and secure, including fear of abuse, falling or other physical harm and fear of being attacked
Accommodation cleanliness, order and accessibility	the environment is clean and comfortable and is easy to get around
Employment and occupation	the individual is sufficiently occupied in meaningful activities whether these are formal employment, unpaid work or leisure activities
Role support (as a carer or parent)	the individual is able to care for their dependant(s) as much as they wish without becoming overburdened
Living in own home	

Client Population Profiles

3.9 The next step is to determine the profile of the client population against the identified outcome dimensions. This indicates the extent to which clients are relying on services to meet their needs. An important choice needs to be made about how to establish this level of need: it is possible to seek data from the providers, the procurers or the receivers of services. PSSRU recommend asking service recipients as there is evidence that they are capable of making this judgement (possibly better than service providers). By asking consumers of the service the measure is closer to the market situation than it would be by asking other groups.

3.10 An example of the kind of results obtained is given in table 3. These results are for home care services, the survey asked recipients about which of the categories they received help in and what their level of need would be in the absence of the service. The results indicate that, for example, 48% of clients identified their 'personal comfort' needs as high.

Table 3. Client profile for high intensity home care (% of people)

Outcome category	High needs	Low needs	No needs
Personal comfort	48	21	11
Social participation	14	6	8
Control	42	9	2
Meals	37	9	6
Safety	16	6	3
Accommodation	37	12	5
Occupation	5	3	2

Weighting levels of need

- 3.11 In order to produce a single measure of average need it is necessary to combine together the needs information from the client profile. To manage this weights are needed which give the relative value of the cells in table3. That is, we need to determine the relative value of e.g. meeting a high need for 'social participation, with a low need for 'accommodation'.
- 3.12 Where there are 'no needs' the weight must be zero: if no outcome has been affected no service has been delivered, For the other cells, as with the needs data, there are a number of ways of approaching the estimation of weights (experts, producers, procurers, clients etc). PSSRU obtain them by seeking relative population preferences for each level of need in each dimension of outcome using discrete choice experiments. Using the outcome data and the preference weights it is possible to create an estimate of the average level of need of clients of a service.
- 3.13 The approach has also been tried for recipients of services in non-residential settings (home care, day care, meals etc). Here service recipients typically receive a bundle of different services and while it is possible to calculate a CfB for the bundle it is not possible to differentiate it into its components. Work is continuing to solve this issue.

Adjusting for actual delivery and client experience

- 3.14 PSSRU use the expression 'capacity for benefit' to describe the estimates of need produced by the method described above. The expression recognises that levels of need define how much benefit clients, on average, could obtain from the services. Clearly services will not actually deliver all this possible care and so it is desirable to adjust for changes in the degree to which services have been successful delivering this care.
- 3.15 Equally there are aspects of quality that are additional to the amount of care delivered which can be summarised as client experience. These types of quality data can potentially be picked up by either satisfaction surveys or by using inspection data. Satisfaction surveys are conceptually better as they fit in with the general approach of concentrating on recipients as consumers; however inspection data is routinely gathered so investigations are underway to see if this can be used.

Data collection issues

- 3.16 The model developed for adult social care needs four data sources: numbers of care-weeks, levels of need, preference weights, and actual service delivery. Much of this data is not routinely available and so as well as developing the model we need to ensure data supply. As ONS does not have the resources available to fund routine surveys, in the long run data availability will rely on adapting existing sources or persuading others to collect the data.

- 3.17 Annual data on the number of care weeks is available and is provided to ONS by UK health departments. There are therefore no issues to be resolved here.
- 3.18 Levels of need are not routinely collected for care homes. Regular data collection therefore must rely on persuading service procurers that this type of information is useful to them as an aspect of performance measurement. Procurers, local authorities in UK, would therefore be inclined to collect this data for their own needs which ONS could then use for its purposes. Efforts along these lines are underway.
- 3.19 It is assumed that preference weights will not change dramatically over time and so re-weighting need not be an annual exercise. It remains to be established: whether this is indeed the case; how often the weights need to be established; and which body will fund this resource intensive exercise.
- 3.20 Care home inspection data is available and work is underway to establish whether this can be used as a proxy for actual service delivery. Almost definitely the data will not be optimal and so efforts are being taken to encourage the inspectorate to alter its regime. It is hoped that they can be persuaded that the types of information that ONS requires are useful to the inspectors as well.

Summary

3.21 Table 4 summarises the overall method

Table 4: Summary of the proposed Adult Social Care method

Data	Measurement	Purpose	Source
Activity data	Weeks of care	Basic output unit	Dept Health
Outcome data	Level of need in each outcome dimension	These combine to produce the average need for a service category	Surveys/ Local Authorities
Preference weights	Weights of need levels for different dimensions		Surveys
Customer satisfaction	% at each level of satisfaction	Provide (with average need) actual service delivery and patient experience	Surveys or Inspector data

4. References

Atkinson (2005) *Atkinson Review of Measurement of government output and productivity for the National Accounts: Final Report*, January 2005, available via www.statistics.gov.uk/about/data/methodology/specific/publicsector/atkinson

Netten, Ann et al (2006) *Measuring Personal Social Services Outputs for National Accounts: Services for Older People, Final Report*, PSSRU Discussion Paper 2267/3, January.

