

Pearson BTEC Level 3 Nationals Diploma, Extended Diploma

**January 2021**

Monitored hours: 6 hours

Paper Reference **31494H**

## **Health and Social Care**

**Unit 4: Enquiries into Current Research in Health and Social Care**

**Part A**

**You do not need any other materials.**

### **Instructions**

- **Part A** contains material for the completion of the preparatory work for the set task.
- **Part A** is given to learners four weeks before **Part B** is taken under formal supervision as scheduled by Pearson.
- **Part A** must be given to learners on the specified date so that learners can prepare as directed and monitored.
- **Part A** is specific to each series and this material must only be issued to learners who have been entered to undertake the task in that series.
- **Part B** contains unseen material and is issued to learners at the start of the specified formal supervised assessment session on the timetabled date specified by Pearson.

*Turn over* ►

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### Instructions to Teachers/Tutors

This set task has a preparatory period. **Part A** sets out how learners should prepare for the completion of the unseen task in **Part B** under supervised conditions.

**Part A** should be issued to learners four weeks prior to undertaking **Part B** of the assessment.

Learners should be provided with the opportunity to conduct independent research in order to select and read secondary source materials such as articles and journals. Centres may need to make facilities available to learners to support independent work. Learners are advised to spend approximately **8 hours** on selecting and reading their secondary sources and that spending any longer on this is unlikely to advantage them. Learners may bring their research, such as copies of articles, into the monitored sessions, and these will be subject to monitoring by the teacher/tutor.

Learners should be monitored in **6 hours** provided by the centre to compile notes on their secondary research. During this time they may only have access to:

- the internet to carry out searches and to access secondary sources in relation to their research
- outcomes of independent research such as sources that they have selected.

Learners must work independently and must not be given guidance or feedback on the completion of the preparatory work. Learners must not prepare potential responses.

Learners may take up to four A4 sides of notes into the supervised assessment. Learner notes are the outcome of independent preparation and support learners in responding to the additional information and activities presented only in **Part B**.

The notes may be handwritten or typed in a 12 point size font. Learner notes can only include:

- facts, figures and data relating to secondary sources covering the article's area of research
- the research methods used in the learner's own secondary research.

Other content is not permitted.

In addition to the four pages of notes, learners should use the monitored sessions to prepare a list of sources that they have used to take into the supervised assessment.

Teachers/tutors should note that:

- learner notes produced under monitored conditions must be checked to ensure that they comply with the limitations
- learner notes should be retained by the centre between the monitored sessions and the formal supervised assessment
- learner notes should be retained by the centre after the completion of assessment and may be requested by Pearson.

**Part B** is a supervised assessment and uses the **Part B** booklet. This is a task book.

This supervised assessment will take place in a timetabled slot. A supervised rest break is permitted.

The supervised assessment is a formal external assessment and must be conducted with reference to the instructions in this task booklet and the *Instructions for Conducting External Assessments* (ICEA) document.

### Instructions for Learners

Read the set task information carefully.

In **Part B** you will be asked to carry out specific written activities using the information in this **Part A** booklet and your own research on this topic.

In your preparation for **Part B**, using this **Part A** booklet you may prepare notes to refer to when completing the set task. Your notes may be up to four sides and may be handwritten or typed in a 12 point size font. Your notes can only include:

- facts, figures and data relating to secondary sources covering the article's area of research
- the research methods used in your own secondary research.

Other content is not permitted.

You will complete **Part B** under supervised conditions.

You must work independently and you should not share your work with other learners.

Your teacher will provide a schedule for the **6 hours** of monitored preparation.

Your teacher cannot give you feedback during the preparation period.

### Set Task Information

You are required to use your understanding of research methodologies and associated issues related to a piece of current research on a health and social care issue, and to use your own skills in carrying out secondary research around the issue.

You must choose **one** of the two articles covering an aspect of recent research in the health and social care sector to base your secondary research on.

To prepare for the set task in **Part B**, you must carry out the following:

1. Analyse the article.
2. Carry out your own independent research using secondary sources.
3. Prepare the following for your final supervised assessment:
  - a list of your secondary sources
  - notes on your secondary research – you can take in no more than four A4 pages of notes.

During the supervised time for **Part B** you will have access to this material. You will be required to address questions based on your chosen article and your own secondary research. You will have **3 hours** under supervised conditions in which to complete your final assessment.

### Part A of Set Task

Select **EITHER** Article 1 **OR** Article 2.

You are provided with the following information:

Article 1: Health research: Coeliac disease: no difference in milk and dairy products consumption in comparison with controls, pages 7 to 10.

Article 2: Social care research: Vulnerable adults in police custody: The role of local authorities in the provision of Appropriate Adults, pages 11 to 16.

# Coeliac disease: no difference in milk and dairy products consumption in comparison with controls

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## ABSTRACT

**Background** Nutritional deficiencies are common in patients with coeliac disease and they can cause osteopenia among other associated diseases. Reduced consumption of milk and dairy products may play a major role in determining low bone mass in patients with coeliac disease.

**Aim** We aimed to investigate milk and dairy products consumption in patients with coeliac disease compared with the general population.

**Methods** We examined the average consumption of milk and dairy products and the reasons for not consuming them. An online survey was sent by email to patients with coeliac disease on a gluten-free diet and aged 18–75. Matched controls were selected among volunteers who responded to the survey posted on the public access sites. Differences in frequencies and means between the two groups were calculated using the  $\chi^2$  test and t-test, respectively. All tests were two-tailed with a significance level set at  $p < 0.05$ .

**Results** 176 patients with coeliac disease and 528 controls participated in the study. We found that 22.2% of the patients with coeliac disease and 19.9% of controls did not drink fluid milk on a regular basis; lactose-free milk was preferred by 20.4% of the patients with coeliac disease and by 19% of controls ( $p=0.69$ ). Only a minority of patients with coeliac disease contacted a doctor before having lactose-free milk, despite this being led by the presence of gastrointestinal symptoms. More patients with coeliac disease than the general population reported a breath test before avoiding milk and dairy products.

**Conclusions** There is no significant difference between patients with coeliac disease and controls in regular milk consumption. Follow-up visits for patients with coeliac disease could avoid unnecessary dietary restrictions.

## INTRODUCTION

Milk and dairy products contain lactose, a disaccharide made of galactose and glucose. The absorption of lactose by the intestine requires a brush border enzyme named lactase that carries out the hydrolyses of the disaccharide to its monosaccharides, which easily cross the small bowel mucosa. Lactase activity decays during childhood in the majority of human populations leading to adult-type hypolactasia.<sup>1</sup> Lactose intolerance related to primary or secondary lactase deficiency may cause

## What this paper adds

- ▶ The damaged intestinal mucosa in coeliac disease may cause lactose intolerance.
- ▶ Patients on a gluten-free diet frequently claim lactose intolerance and therefore avoid milk and dairy products.
- ▶ We found that 22.2% of the patients with CeD and 19.9% controls do not drink fluid milk on a regular basis.
- ▶ Lactose-free milk is chosen by 20.4% of patients with CeD and 19% of the controls.
- ▶ In our study we describe that there is no significant difference between patients with coeliac disease and controls in regular milk consumption- Follow-up visits for patients with coeliac disease could avoid unnecessary dietary restrictions.

abdominal pain and distension, borborygmi, flatus and diarrhoea induced by bacterial metabolism of undigested lactose in dairy products.<sup>1</sup> In untreated coeliac disease (CeD), the damaged intestinal mucosa may have reduced the lactase activity, causing lactose intolerance in those subjects. However, previous data suggest that also patients with CeD on a gluten-free diet frequently claim lactose intolerance and therefore avoid milk and dairy products.<sup>2</sup> Recently, it has been demonstrated that there is no association between the type of adult hypolactasia gene mutations and CeD.<sup>3</sup> Milk avoidance in patients with CeD may depend on the fact that lactose intolerance is determined not only by the expression of lactase gene but also by the dose of lactose, intestinal flora, gastrointestinal motility, small intestinal bacterial overgrowth and sensitivity of the gastrointestinal tract to the generation of gas and other fermentation products of lactose digestion<sup>4</sup> and other unidentified factors.

Milk avoidance and consequent reduction of the intake of calcium is claimed to be one of the possible causes of osteopenia frequently found in patients with CeD.<sup>5–7</sup> Recently, we showed that 22.2% (260/1173) of the population from Southern Italy avoid milk consumption and



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18.1% (213/1173) drink lactose-free milk, even though among this only 10.3% had undergone a breath test for lactose tolerance, with positive results in 5.5% of the population. The reasons for milk avoidance were mainly gastrointestinal symptoms and the belief in its somewhat toxic effect on health.<sup>8</sup>

The present study aimed to investigate, using the same survey of the previous study,<sup>8</sup> the milk and dairy products consumption in patients with CeD compared with the general population.

**METHODS**

As previously reported,<sup>8</sup> we used an online survey investigating the average consumption of milk and dairy products and the reasons for not consuming them. The survey consisted of 16 questions, and we calculated an average time of 5 min to complete it. The small number of questions and short answering time were devised to provide the best adherence and results.

Subjects aged 18–75 years and living in Campania (South Italy) were invited to answer the questionnaire online. The

**Table 1** Study population characteristics

	Patients with coeliac disease, N (%) 176	General population, N (%) 528	P value
<b>Ethnicity</b>			
Caucasian	100 %	100%	–
Female	129 (73.3)	389 (73.7)	0.43
Age at test (mean±SD)	37.7±10.8	39.1±12.7	0.19
<b>Body mass index</b>			
≤18	5 (2.8)	16 (3.0)	0.1
18.1–25	137 (77.8)	382 (72.3)	
25.1–30	27 (15.4)	80 (15.2)	
>30	7 (4.0)	50 (9.5)	
<b>Job</b>			
Student	25 (14.2)	85 (16.1)	0.9
Housewife	13 (7.4)	28 (5.3)	
Low-class job	14 (8.0)	45 (8.5)	
Middle-class job	39 (22.1)	120 (22.7)	
High-class job	70 (39.8)	201 (38.1)	
Retired	5 (2.8)	18 (3.4)	
Unemployed	10 (5.7)	31 (5.9)	
<b>Physical activity</b>			
Walk 30 mins daily	26 (14.8)	97 (18.4)	0.51
Practice sport once a week	12 (6.8)	48 (9.1)	
Practice sport more than twice a week	43 (24.4)	131 (24.8)	
Physical demanding job	12 (6.8)	26 (4.9)	
No sport activities	83 (47.2)	226 (42.8)	

**Table 2** Consumption of fluid milk in our study population

	Patients with coeliac disease, N (%)	General population, N (%)	P value
Do not drink milk	39 (22.2)	105 (19.9)	0.69
Milk with lactose	101 (57.4)	322 (61.0)	
Lactose-free milk	36 (20.4)	101 (19.1)	

survey was sent by email to 317 patients with CeD on a gluten-free diet for at least 6 months. Consent was obtained as part of a study dealing with vitamin D levels, bone mass and nutrition in CeD funded by a grant from the advocacy group Fondazione Celiachia (Italy). Patients specifically accepted to participate in the related online studies.

We selected controls from the general population who responded to the survey that was posted on the public access sites as reported elsewhere<sup>8</sup> creating two groups matched by gender, age and type of job and selecting three controls for each patient with CeD.

Categorical variables were expressed as frequency, continuous variables as mean±SD. Differences in frequencies and means between the two groups were calculated using the  $\chi^2$  test and t-test, respectively. Covariates included sex, age (18–35, 35–49, 50–75), body mass index (BMI, kg/m<sup>2</sup>), classified as underweight (≤18.5), normal weight (>18.5–25), overweight (>25–30) and obese (>30), job type (classified as student, housewife, low-class, middle-class and high-class job based on average salary, retired and unemployed) and weekly physical activity. We chose the above covariates because they may be associated with dietary restrictions and gastrointestinal symptoms like irritable bowel syndrome.<sup>9–12</sup> All tests were two-tailed with a significance level set at p<0.05. The data were analysed with STATA V.12. A biomedical statistician performed the statistical review of the study. We have followed the Strengthening the Reporting of Observational Studies in Epidemiology STROBE guidelines for this study.

**RESULTS**

Forty-three of the 317 emails bounced back because of the incorrect email address or server problems; 176 out of 274 patients with CeD (64.2 %) responded to all questions of the survey and were included in the study; 528 matched

**Table 3** How much milk do you drink per day?

	Patients with coeliac disease, N (%) total 137	General population, N (%) total 423	P value
1 L	0	5 (1.2)	0.22
0.5 L	5 (3.6)	14 (3.3)	
250 mL (large cup)	68 (49.6)	230 (54.4)	
150 mL (medium cup)	49 (35.8)	123 (29.1)	
50 mL (small cup)	15 (11.0)	51 (12.0)	

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**Table 4** Why do you drink lactose-free milk?

	Patients with coeliac disease, N (%) total 36	General population, N (%) total 101	P value
Doctor's advice	2 (5.5)	13 (12.9)	0.5
Friends	1 (2.8)	6 (5.9)	
My choice	18 (50)	47 (46.6)	
GI problems	15 (41.7)	35 (34.6)	

**Table 5** Lactose intolerance test

	Patients with coeliac disease, N (%)	General population, N (%)	P value
Never	145 (82.4)	474 (89.8)	0.002
Negative test	19 (10.8)	20 (3.8)	
Positive test	12 (6.8)	34 (6.4)	

controls were used for the analysis. Details on sex, age, BMI, job and physical activity of the two groups were reported in table 1.

Our study shows that milk consumption is similar between patients with CeD and control (p=0.69). We found that 22.2% of the patients with CeD and 19.9% controls do not drink fluid milk on a regular basis. Lactose-free milk is chosen by 20.4% of patients with CeD and 19% of the controls (table 2).

Among those who drink milk (regular or lactose free), 49.6% of patients with CeD and 54.4% controls drink a daily average of 250 mL of fluid milk (table 3). Most of the subjects start to consume lactose-free milk for personal choice (without any specific reason) or because of gastrointestinal problems. Only a minority of patients with CeD contacted a doctor before starting the use of lactose-free milk (5.5%), despite being driven to this change by gastrointestinal symptoms (41.7%) (table 4).

Although the high percentage of responders avoid regular milk, only a minority of them reported having

undergone a breath test for lactose tolerance with positive results (table 5). However, more patients with CeD than the general population reported a breath test before avoiding milk and dairy products.

When considering only dairy products consumption, no patient with CeD and only 6 (1.1%) controls state that they do not eat dairy products on a regular basis, with most of them eating these products at least once a week (table 6). Subjects who rarely drank dairy products mainly consumed lactose-free mozzarella, cheese, yoghurt or only parmesan cheese (table 6).

**DISCUSSION**

Our study shows that there is no significant difference between the patients with CeD and matched controls in the regular milk consumption.

This is, to our best knowledge, the first study investigating the milk and dairy products in CeDs in comparison with controls. The results indicate that in our population, the reduced calcium intake is not the dominant player in determining the low bone mass frequently found in patients with CeD.

Both patients with CeD and controls chose to avoid milk consumption because of their choice or because of gastrointestinal symptoms, without undergoing a breath test for lactose intolerance or consulting a doctor.

As previously reported,<sup>8</sup> the use of an online survey has both strengths and limitations. Our survey, to our best knowledge, is the first one conducted in a large Italian cohort whose results describe the milk habits of patients with CeD and controls from the general population. Online surveys are quite popular because they are convenient and easy to use. However, possible limitations are the recall bias, common in food questionnaires and the use of a non-standardised questionnaire. We discussed these limitations elsewhere.<sup>8</sup> The questionnaire being anonymous, we do not have any information regarding, for example, the compliance to the gluten-free diet, the antitransglutaminase antibodies values or the time from the CeD diagnosis.

**Table 6** Consumption of dairy products in our study population

	Patients with coeliac disease, N (%)	General population, N (%)	P value
Do not eat dairy products	0	6 (1.1)	0.125
Every day	25 (14.2)	75 (14.2)	
3–5 times a week	73 (41.5)	238 (45.1)	
Once a week	48 (27.3)	140 (26.5)	
Sometimes lactose-free mozzarella, cheese and yoghurt	8 (4.5)	23 (4.4)	
Only lactose-free mozzarella and cheese and yoghurt	2 (1.1)	10 (1.9)	
As ingredients only	11 (6.3)	29 (5.5)	
Only parmesan cheese (lactose-free aged cheese)	9 (5.1)	7 (1.3)	

The present data confirmed our previous results, adding the information that patients with CeD on a gluten-free diet avoid milk in a percentage similar to that of the general population. The most frequent cause of avoiding milk in patients with CeD is the persistence of gastrointestinal symptoms despite the starting of a gluten-free diet. There are several reasons for the persistence of symptoms in CeD on a gluten-free diet,<sup>2</sup> such as dietary lapses and irritable bowel syndrome, and lactose intolerance is only one of them. Therefore, daily calcium absorption may be low in those who avoid dairy products and contributes, but not fully explains, to the frequent low bone mass observed in patients with CeD from the same country, both before and after the gluten-free diet.<sup>13</sup> However, studies reported that dairy food intake is associated with higher bone mineral density among adults, particularly those with sufficient vitamin D status.<sup>14 15</sup>

Another aspect to take into consideration when dealing with the choice of food is that patients with CeD tend already to have psychological problems caused by dietary restriction.<sup>16 17</sup> Therefore, our data suggest that doctors' and dietitians' advise during follow-up visits for patients with CeD on a gluten-free diet should focus on avoiding unnecessary restriction of milk and of dairy products which could further compromise their health and quality of life.

**Contributors** FZ and CC designed and performed the research and wrote the paper. FZ and PI analysed data. CB performed the research and reviewed the paper. All authors accepted the final version of the paper.

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**Disclaimer** CONSORT 2010: the authors declare that the CONSORT 2010 statement guideline has been adopted.

**Competing interests** None declared.

**Patient consent for publication** Not required.

**Ethics approval** The study was approved by the by the Ethics Committee of the University of Salerno Campania Sud aut. No 25, 25.4.2015.

**Provenance and peer review** Not commissioned; externally peer reviewed.

**Data sharing statement** Data set is available from the last author at cciacci@unisa.it. Consent for data sharing was obtained. All the data were anonymised, and risk of identification is inconsistent.

**Author note** Core tip: we examined the average consumption of milk and dairy products and the reasons for not consuming them in patients with coeliac disease compared with controls. We found that there is no significant difference between patients with coeliac disease and controls in the regular milk consumption.

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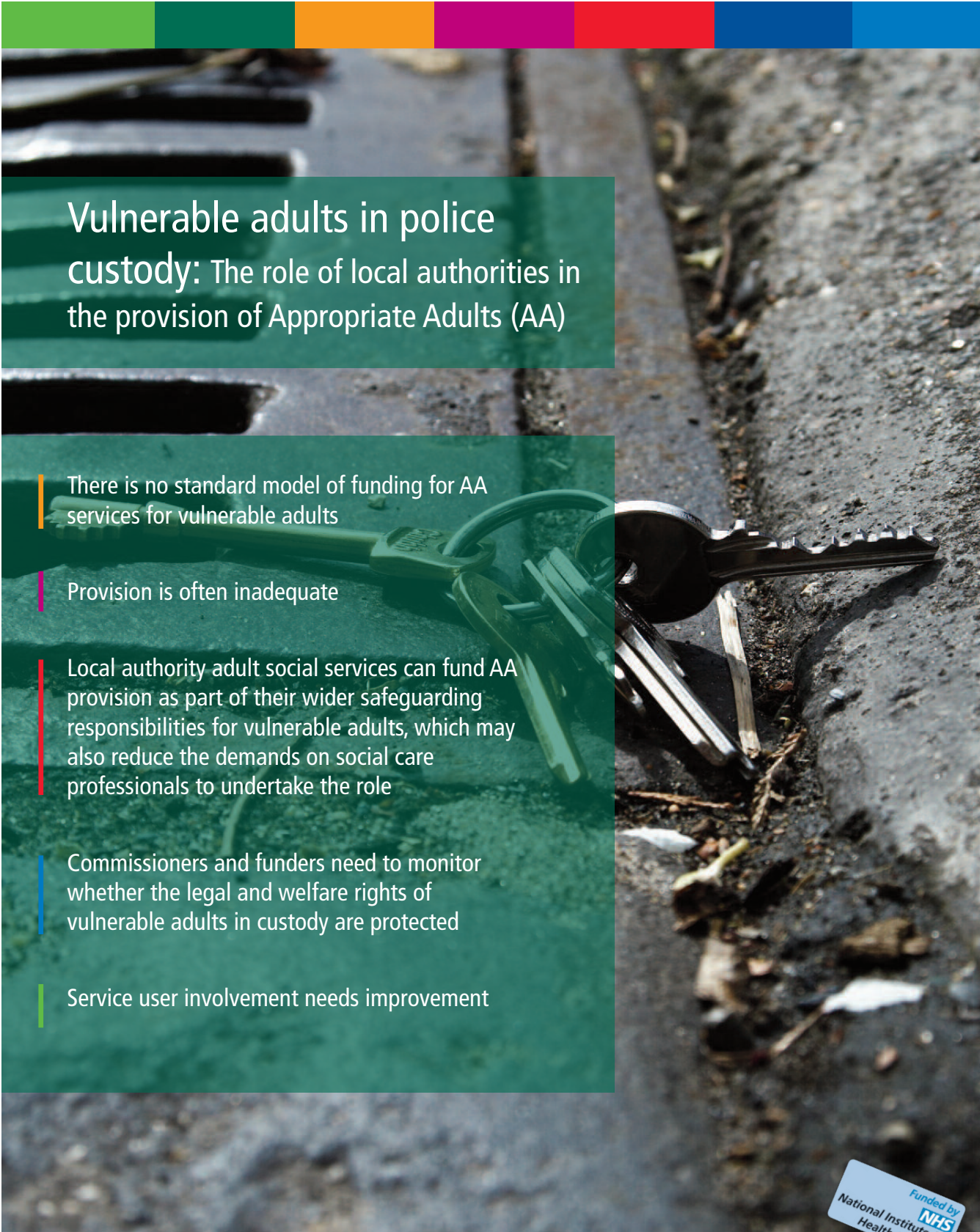
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## Vulnerable adults in police custody: The role of local authorities in the provision of Appropriate Adults (AA)

There is no standard model of funding for AA services for vulnerable adults

Provision is often inadequate

Local authority adult social services can fund AA provision as part of their wider safeguarding responsibilities for vulnerable adults, which may also reduce the demands on social care professionals to undertake the role

Commissioners and funders need to monitor whether the legal and welfare rights of vulnerable adults in custody are protected

Service user involvement needs improvement

School for  
Social Care Research

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## BACKGROUND

Research undertaken by The National Appropriate Adult Network (NAAN) in 2015 indicates that local authority adult social services are the most common funder of Appropriate Adult (AA) schemes for vulnerable adults, but this funding may be being reduced. Poor provision of AAs has been highlighted as a source of concern in a series of Government-commissioned reviews and inspections (e.g. the 2009 Bradley Report, HMIC 2015, CJI 2014) suggesting that the rights and welfare of vulnerable adults in custody are currently not being safeguarded.

**THE 1984 POLICE AND CRIMINAL EVIDENCE ACT (PACE)** and its Codes of Practice created a duty on police custody sergeants to secure an AA to safeguard the rights and welfare, and enable effective participation, of vulnerable people detained or questioned by the police. This includes any young person aged 10–17 years and adults who are mentally vulnerable. There is an explicit statutory duty on Youth Offending Teams to provide AAs for children and young people, but no similar duty on any agency to provide AAs for vulnerable adults in police custody.

**LOCAL AUTHORITY ADULT SOCIAL SERVICES** do have key responsibilities for people with mental health needs and learning disabilities in this role (Health and Social Care Act 2012, Care Act 2014).

The aim of this research was to understand the role for local authority social services in the provision of AAs across England and identify good practice. It also sought to examine what commissioners, practitioners and service users would expect from an effective service.

## Methods

An online survey was sent to all local authority Adult Social Care departments in England (29/151 responses), and all AA adult services who are members of NAAN (23/54 responses). The survey aimed to map the current involvement of local authority social services in the provision of AAs for vulnerable adults in police custody across England.

Case studies were undertaken in four areas (Cases A-D) in which survey respondents indicated that the local authority was involved in funding and/or commissioning AA provision for adults. Qualitative interviews were undertaken with 25 respondents: managers or coordinators of AA services (6), managers or commissioners from adult social care and/or health services (6), Appropriate Adults (9) and police (4). In addition, two focus groups were held with user groups, in which a total of 13 participants took part.

## FINDINGS

### SURVEY RESPONSES

#### Local Authority adult social services

Of the 29 adult social care departments who responded, 14 funded or part-funded AA services for vulnerable adults. Of these 14, six were sole funders, and eight funded provision in partnership with other agencies, including children's services, Youth Offending teams, CCGs, the police and neighbouring local authorities.

Most of this provision was commissioned from a third-sector partner (ten areas) or a private sector organisation (two areas). In two areas, provision was provided directly by local authority adult social care staff.

Although a small sample, there is some evidence from this study that funding an AA service for vulnerable adults may reduce the demands on local authority social care professionals to undertake the role.

In our survey, only 4/14 adult social care departments that provide funding for a dedicated service also said that social workers or adult mental health professionals would undertake the role. Respondents said that the use of these professionals was usually 'limited' and cases would normally be dealt with by the AA service unless the vulnerable adult was known to the local authority.

Of those authorities who did not fund a dedicated service, a greater proportion (13/15) said that their social care professionals would act as an AA. Respondents with no dedicated service had concerns about the resource implications of using qualified social workers to act as AAs, and the lack of training for this role:

*We have little choice about attending if one of our vulnerable service users are in custody and require an appropriate adult then all other work must be reprioritised to enable attendance to the police station. This has a huge impact for workloads as acting as an appropriate adult can involve many hours of waiting at the police station and interviews themselves can take a long time to complete. Furthermore whilst I have received training in acting as an appropriate adult many of my colleagues are expected to act up in to this role with little or no training. (ADASS survey response)*

## FINDINGS

Many respondents in areas that did not fund a dedicated service raised concerns about the lack of availability of AAs for vulnerable adults in custody, expressing regret that this was an area of social care they were unable to deliver.

### AA service managers

Of the 23 services who responded, 12 received some or all of their funding from local authority adult social services.

Just over half (12) of the AA provision was managed by third-sector organisations, nine were part of a local authority, and two were commercial organisations.

Almost all services who responded used trained volunteers as AAs, sometimes in combination with paid staff. In two areas only paid sessional staff delivered the service.

Services varied in their hours of operation with most providing AAs seven days a week typically between 8am and 10pm (largely because of the reliance on volunteers). Nine services said that the local authority emergency duty team may provide an AA outside these hours although only in emergencies. The remaining services said they did not think there was any provision of AAs outside their hours of operation.

Most services had some relationship with local authority social services regardless of funding. This included joint membership of local partnership groups, information sharing and safeguarding arrangements, and in three areas, reciprocal training arrangements. However, despite their role in supporting vulnerable adults, four services reported no contact with adult social services.

Most AA services in our study did not have any form of service-user involvement beyond the use of feedback forms, for which the response rate is often very low.

## CASE STUDIES

Four models of local authority involvement in funding and management of an AA service

### CASE A

A private sector organisation delivers the service in custody suites across three local authority areas. The lead commissioner is the police and the contract was awarded following a competitive tendering process. Funding is provided by six agencies: adult social services in each of the three local authorities, and three Clinical Commissioning Groups.

The cost in 2015/16 was approximately £96,000, and the service responded to 963 requests for an AA for a vulnerable adult. AAs are paid sessional staff and the service is provided 24 hours a day, seven days a week.

### CASE B

The local authority commissions a third-sector organisation to provide a range of services for children and families, of which the AA service is one. Funding comes from both adult and children's services. The provider also receives funding from a neighbouring local authority and delivers AA provision across all custody suites in both areas. There is no joint commissioning arrangement and separate monitoring arrangements are in place for both local authorities.

The cost in 2015/16 was approximately £72,000, and the service responded to 1,410 requests (675 for adults, 735 for children). The service is coordinated by one full-time manager and trained volunteers act as AAs for both children and adults from 8am to 11pm, seven days a week. The emergency duty team may respond to police requests for an AA for a vulnerable adult outside these hours.

### CASE C

Local Authority Youth Justice Service manages provision for both children and adults. Two part-time staff coordinate a pool of volunteers, most of whom fulfil two roles: AAs and members of Referral Panels for young offenders. Adult social services contribute a small amount of top-up funding to ensure AA provision includes vulnerable adults.

The cost in 2015/16 was approximately £35,000, and the service responded to 260 requests (127 for adults, 133 for children). The volunteers are available from 9am to 5pm, Monday to Friday. The emergency duty team may respond to police requests for an AA for a vulnerable adult outside these hours.

### CASE D

The local authority out-of-hours duty social work team employs a full-time AA service manager. The service is funded by both adult and children's services. AAs are trained volunteers and the service manager also acts as an AA. A small number of paid sessional staff provide cover over Bank Holidays.

The cost in 2015/16 was approximately £47,000, and the service was used over 700 times by adults, and approximately 150 by children/young people. The AA service attends adults from 9am to 11pm, seven days a week. The Youth Offending team performs the role for children/young people during office hours, with the AA service providing evening and weekend cover only. The duty team will attend outside these hours where necessary.

# FINDINGS

## WHY DO THESE LOCAL AUTHORITIES FUND AA PROVISION FOR VULNERABLE ADULTS?

These four local authorities have funded or part-funded provision despite not having a statutory duty to do so. The following explanatory factors were identified by respondents interviewed during the case studies:

- The provision of AAs is seen as part of their wider adult safeguarding responsibilities;
- Concern about demands on social work and mental health professionals' time supporting adults in custody;
- Increasing number of requests from police for AAs for vulnerable adults;
- Existing AA service for children and young people unable to meet demand for vulnerable adult support;
- To build and maintain good working relationships with other agencies, including police and CCGs; and/or
- To develop volunteering opportunities.

*It's about us taking responsibility as a local authority. We see this as a very important response that we should be making...giving the best we can to people who are very very vulnerable and find themselves in police custody, and making sure their needs are properly met. (Social work manager)*



**"It's about us taking responsibility as a local authority"**  
(Social Work Manager)

## INFORMATION SHARING AND SAFEGUARDING

Appropriate Adults may become aware of safeguarding concerns during their time in custody with vulnerable adults. There is some variation in how these concerns are dealt with.

In some cases, concerns are reported to the custody sergeant and no further action taken.

Two services use feedback forms for each referral that include safeguarding issues which are passed back to the local authority. It is unclear to the AA managers of these services if this information is acted on.

In other services, clearer links exist with adult social care safeguarding teams that facilitate early follow-up of safeguarding concerns. These include examples where the AA manager is embedded within the social work out of hours team and has direct access to the appropriate professionals; or has a named contact within the safeguarding team and clear protocols are in place for information-sharing.

## EFFECTIVENESS

Case study respondents and service users in the focus groups were asked what they considered to be the most important criteria to determine the effectiveness of an AA service for vulnerable adults.

AA service managers, service commissioners and the police reported

that they prioritise availability and response time as the defining performance measure of an effective service. All four case examples collated monitoring data on this and were performing well on these measures (within the operating hours of the service).

Monitoring quality is less well managed. Service managers and commissioners are largely reliant on feedback from the police. Issues frequently raised by the police included increasing the operating hours of the service, and in one area there was also a request to increase the diversity of AAs (age and ethnicity).

Reliance solely on the police for monitoring quality is unsatisfactory given part of the role of the AA is to ensure due process is followed during a vulnerable adult's time in custody. There was no direct monitoring of whether the legal and welfare rights of vulnerable adults are indeed protected.

Adults who had experience of being in custody understood the purpose of the role. During the focus groups they prioritised the demeanour of the AA as the most important indicator of effectiveness. Service users wanted AAs who were trustworthy, kind, respectful of gender, ethnicity, religion and culture, and honest. They also wanted AAs who could manage difficult situations calmly, understanding the needs of vulnerable adults.

There is little opportunity for service users to feedback on quality. We found no evidence of service user involvement in the design, delivery and monitoring of AA provision. This may help explain the apparent gap between the perspectives of professionals and service users on the factors that contribute to effective AA provision.

# CONCLUSIONS & RECOMMENDATIONS

Although they do not have a statutory duty to do so, there are several policy drivers for local authority involvement in the provision of AAs for vulnerable adults. The Care Act 2014 includes a duty for social care services to cooperate with criminal justice agencies and encourages a greater focus for adult social care on early intervention. Health and Wellbeing Boards, created by the Health and Social Care Act 2012, also offer an opportunity to improve joint commissioning and cooperation with criminal justice agencies, as Joint Strategic Needs Assessments consider the needs of vulnerable groups, including offenders.

Only a small proportion of local authorities responded to our survey and of those, less than half-funded (or part-funded) AA services for vulnerable adults. While our sample is small, the responses support the findings of other studies indicating that AA provision for vulnerable adults is often inadequate (Bath *et al.* 2015, 2009 Bradley Report, HMIC 2015, CJI 2014).

This study examines four models of local authority involvement in the provision of AAs for vulnerable adults. They vary in whether the service is delivered 'in-house' or commissioned from an external agency, and also in the degree to which local authorities bear the burden of funding. In all cases, services were closely monitored and performing well on the key indicators of availability and response times of trained AAs, indicating how adult social services can be successful in ensuring vulnerable adults in custody have access to AAs.

## THE RESEARCH HIGHLIGHTS TWO KEY AREAS FOR IMPROVEMENT

1. Commissioners and funders should have more regard for monitoring wider outcomes which may be more appropriate measures of service effectiveness. These should include whether the AA provision does protect the rights and welfare, and promote the effective participation in the justice process, of vulnerable adults in custody.

They may also wish to monitor whether better links with AA provision facilitates early intervention and effective referral pathways for vulnerable adults into health and social care services, a key duty under the Care Act 2014.

2. There is a need to improve service user involvement in the commissioning, delivery and monitoring cycle.

## COMMENT

When detained or questioned by police, people with mental health conditions, learning disabilities, autism and other conditions are extremely vulnerable, both short-term and long-term, to legal, physical and psychological risks. AAs are central to the integrated approach envisaged by the Bradley Report and support outcomes under the Care Act and Transforming Care.

With an understanding of need, and a clear independence from police, local authorities are well placed to lead on AAs as they have done for over 30 years.

This research is an important and extremely timely reminder that AA provision requires the same person-centred, outcomes-focused approach as other health and social care functions. It will make a positive and lasting impact on the future of support for vulnerable adults.

Chris Bath  
Chief Executive  
National Appropriate Adult Network (NAAN)



Bath C, Bhardwa B, Jacobson J, May T, Webster R (2015) *There to Help: Ensuring Provision of Appropriate Adults for Mentally Vulnerable Adults Detained or Interviewed by Police*, National Appropriate Adult Network. Available at [www.appropriateadult.org.uk/images/pdf/2015\\_theretohelp\\_complete.pdf](http://www.appropriateadult.org.uk/images/pdf/2015_theretohelp_complete.pdf)

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# School for Social Care Research

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The study was conducted by Tricia Jessiman and Ailsa Cameron between September 2015 and October 2017. Fieldwork was undertaken between February and June 2016.

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Please check the examination details below before entering your candidate information

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<b>Wednesday 6 January 2021</b>										
Supervised hours: 3 hours					Paper Reference <b>31494H</b>					
<b>Health and Social Care</b>										
<b>Unit 4: Enquiries into Current Research in Health and Social Care</b>										
										<b>Part B</b>
You will need notes prepared in Part A.										Total Marks

### Instructions

- Use **black** ink or ball-point pen.
- **Fill in the boxes** at the top of this page with your name, centre number and learner registration number.
- Answer **all** activities.
- Answer the activities in the spaces provided  
– *there may be more space than you need.*
- **Part A** will need to have been used in preparation for completion of **Part B**.
- **Part B** booklet must be issued to learners as defined by Pearson and should be kept securely.
- **Part B** booklet must be issued to learners on the specified date.
- **Part B** is specific to each series and this material must only be issued to learners who have been entered to undertake the task in that series.
- **Part B** should be kept securely until the start of the supervised assessment periods.

### Information

- The total mark for this paper is 65.
- The marks for **each** activity are shown in brackets  
– *use this as a guide as to how much time to spend on each activity.*

### Advice

- Read each activity carefully before you start to answer it.
- Try to answer every activity.
- Check your answers if you have time at the end.

Turn over ►

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## Instructions to Teachers/Tutors

**Part B** set task is undertaken under supervision in a single session of **3 hours** in the timetabled session. Centres may schedule a supervised rest break during the session.

**Part B** set task requires learners to apply research. Learners should bring in notes as defined in **Part A**. The teacher/tutor needs to ensure that notes comply with the requirements.

Learners must complete the set task using this task and answer booklet.

The set task is a formal external assessment and must be conducted with reference to the instructions in this task booklet and the *Instructions for Conducting External Assessments* (ICEA) document to ensure that the supervised assessment is conducted correctly and that learners submit evidence that is their own work.

Learners must not bring anything into the supervised environment or take anything out without your approval.

Centres are responsible for putting in place appropriate checks to ensure that only permitted material is introduced into the supervised environment.

### Maintaining security during supervised assessment sessions

- The assessment areas must only be accessible to the individual learners and to named members of staff.
- Learners can only access their work under supervision.
- Any work learners produce under supervision must be kept secure.
- Only permitted materials for the set task can be brought into the supervised environment.
- During any permitted break and at the end of the session materials must be kept securely and no items removed from the supervised environment.
- Learners are not permitted to have access to the internet or other resources during the supervised assessment period.
- Learner notes related to **Part A** must be checked to ensure length and/or contents meet limitations.
- Learner notes will be retained securely by the centre after **Part B** and may be requested by Pearson if there is suspected malpractice.

After the session the teacher/tutor or invigilator will confirm that all learner work has been completed independently as part of the authentication submitted to Pearson.

### Outcomes for Submission

One document will need to be submitted by each learner:

- a completed taskbook.

Each learner must complete an authentication sheet.

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### Instructions for Learners

This session is **3 hours**. Your teacher/tutor will tell you if there is a supervised break. Plan your time carefully.

Read the set task information carefully.

Complete all your work in this taskbook in the spaces provided.

You have prepared for the set task given in this **Part B** booklet. Use your notes prepared during **Part A** if relevant. Attempt all of **Part B**.

You will complete this set task under supervision and your work will be kept securely during any breaks taken.

You must work independently throughout the supervised assessment period and you should not share your work with other learners.

### Outcomes for Submission

You will need to submit one document on completion of the supervised assessment period:

- a completed taskbook.

You must complete a declaration that the work you submit is your own.

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**Set Task Information**

Select **EITHER** Section 1 beginning on page 6 **OR** Section 2 beginning on page 25 and answer the questions in the spaces provided.

You will need to refer to Article 1 on pages 43–46 **OR** Article 2 on pages 47–52 and the notes of any research completed in **Part A**.

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**Activity 4**

Yanna is a gastroenterologist who specialises in coeliac disease. She works for the NHS and has been diagnosing and working with individuals with the disease for several years. As research progresses, there is evidence to suggest that children are at a higher risk of developing the disease if their parents have been diagnosed with coeliac disease.

She has been commissioned by NHS England to investigate this link further in the hope of improving early diagnosis of the disease. She will be working with a team of six researchers undertaking a range of tests, along with monitoring participants' diets over the next six months. Due to the nutritional deficiencies and low bone mineral density evident in those living with coeliac disease, Yanna is keen to assess the consumption of dairy in the diets of participants.

The research will involve the use of laboratory testing, using a serological test, as well as questionnaires to assess current diets, and changes to diet made throughout the research. The parents of the children participating will complete the questionnaires at the start of the research, then after three months and again at six months.

Yanna will implement the case study methodology during her research, using parental support to consider the holistic lifestyle of their child. She will include 20 children in her research, where at least one parent has been diagnosed with coeliac disease.

What should Yanna consider when undertaking this research?

You should include judgements on:

- planning considerations
- ethical issues
- research methodologies used in the scenario
- research skills required to explore the issue.

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**SECTION 2: SOCIAL CARE RESEARCH BEGINS ON THE NEXT PAGE.**





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**Activity 2**

How does your secondary research support the importance of research into protecting vulnerable adults in custody?

In your answer, you should consider:

- secondary research and its relationship to the issue
- an analysis of the effects on individuals, practitioners and/or wider society.

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**Activity 4**

Silas works for the National Appropriate Adult Network and is interested in improving the services offered to vulnerable adults in need of an Appropriate Adult. Recent research findings have led to more funding being provided to improve the provision currently offered. Silas has been asked to work with adult social services, service users and the police. He will investigate a more appropriate system for dealing with, and reporting, the support offered.

During this research, Silas would like to investigate the use of more volunteers as Appropriate Adults, along with the type of system that would personalise the service for vulnerable adults. He would like to involve the participants in his research in the design, delivery and monitoring of the provision. It is thought that with their input, the system would be more beneficial and supportive for all involved.

Silas has decided to undertake 10 observations of meetings between Appropriate Adults and service users in a range of contexts, to assess the attributes presented by the Appropriate Adults. He will also provide a quantitative questionnaire for 20 service users to rate what is important for them when using an Appropriate Adult.

Silas will undertake small focus groups with the same vulnerable adults, split into smaller groups, to gather further data on their expectations of the provision. He will also hold focus groups with a total of 10 adult social services employees and 10 police officers, to design the delivery and evaluation of this provision to meet the needs of all involved.

What should Silas consider when undertaking this research?

You should include judgements on:

- planning considerations
- ethical issues
- research methodologies used in the scenario
- research skills required to explore the issue.

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**TOTAL FOR PAPER = 65 MARKS**



BMJ Nutrition,  
Prevention & Health

# Coeliac disease: no difference in milk and dairy products consumption in comparison with controls

Fabiana Zingone,<sup>1</sup> Paola Iovino,<sup>2</sup> Cristina Bucci,<sup>2</sup> Carolina Ciacci <sup>2</sup>

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## ABSTRACT

**Background** Nutritional deficiencies are common in patients with coeliac disease and they can cause osteopenia among other associated diseases. Reduced consumption of milk and dairy products may play a major role in determining low bone mass in patients with coeliac disease.

**Aim** We aimed to investigate milk and dairy products consumption in patients with coeliac disease compared with the general population.

**Methods** We examined the average consumption of milk and dairy products and the reasons for not consuming them. An online survey was sent by email to patients with coeliac disease on a gluten-free diet and aged 18–75. Matched controls were selected among volunteers who responded to the survey posted on the public access sites. Differences in frequencies and means between the two groups were calculated using the  $\chi^2$  test and t-test, respectively. All tests were two-tailed with a significance level set at  $p < 0.05$ .

**Results** 176 patients with coeliac disease and 528 controls participated in the study. We found that 22.2% of the patients with coeliac disease and 19.9% of controls did not drink fluid milk on a regular basis; lactose-free milk was preferred by 20.4% of the patients with coeliac disease and by 19% of controls ( $p=0.69$ ). Only a minority of patients with coeliac disease contacted a doctor before having lactose-free milk, despite this being led by the presence of gastrointestinal symptoms. More patients with coeliac disease than the general population reported a breath test before avoiding milk and dairy products.

**Conclusions** There is no significant difference between patients with coeliac disease and controls in regular milk consumption. Follow-up visits for patients with coeliac disease could avoid unnecessary dietary restrictions.

## INTRODUCTION

Milk and dairy products contain lactose, a disaccharide made of galactose and glucose. The absorption of lactose by the intestine requires a brush border enzyme named lactase that carries out the hydrolyses of the disaccharide to its monosaccharides, which easily cross the small bowel mucosa. Lactase activity decays during childhood in the majority of human populations leading to adult-type hypolactasia.<sup>1</sup> Lactose intolerance related to primary or secondary lactase deficiency may cause

## What this paper adds

- ▶ The damaged intestinal mucosa in coeliac disease may cause lactose intolerance.
- ▶ Patients on a gluten-free diet frequently claim lactose intolerance and therefore avoid milk and dairy products.
- ▶ We found that 22.2% of the patients with CeD and 19.9% controls do not drink fluid milk on a regular basis.
- ▶ Lactose-free milk is chosen by 20.4% of patients with CeD and 19% of the controls.
- ▶ In our study we describe that there is no significant difference between patients with coeliac disease and controls in regular milk consumption. Follow-up visits for patients with coeliac disease could avoid unnecessary dietary restrictions.

abdominal pain and distension, borborygmi, flatus and diarrhoea induced by bacterial metabolism of undigested lactose in dairy products.<sup>1</sup> In untreated coeliac disease (CeD), the damaged intestinal mucosa may have reduced the lactase activity, causing lactose intolerance in those subjects. However, previous data suggest that also patients with CeD on a gluten-free diet frequently claim lactose intolerance and therefore avoid milk and dairy products.<sup>2</sup> Recently, it has been demonstrated that there is no association between the type of adult hypolactasia gene mutations and CeD.<sup>3</sup> Milk avoidance in patients with CeD may depend on the fact that lactose intolerance is determined not only by the expression of lactase gene but also by the dose of lactose, intestinal flora, gastrointestinal motility, small intestinal bacterial overgrowth and sensitivity of the gastrointestinal tract to the generation of gas and other fermentation products of lactose digestion<sup>4</sup> and other unidentified factors.

Milk avoidance and consequent reduction of the intake of calcium is claimed to be one of the possible causes of osteopenia frequently found in patients with CeD.<sup>5–7</sup> Recently, we showed that 22.2% (260/1173) of the population from Southern Italy avoid milk consumption and

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18.1% (213/1173) drink lactose-free milk, even though among this only 10.3% had undergone a breath test for lactose tolerance, with positive results in 5.5% of the population. The reasons for milk avoidance were mainly gastrointestinal symptoms and the belief in its somewhat toxic effect on health.<sup>8</sup>

The present study aimed to investigate, using the same survey of the previous study,<sup>8</sup> the milk and dairy products consumption in patients with CeD compared with the general population.

**METHODS**

As previously reported,<sup>8</sup> we used an online survey investigating the average consumption of milk and dairy products and the reasons for not consuming them. The survey consisted of 16 questions, and we calculated an average time of 5 min to complete it. The small number of questions and short answering time were devised to provide the best adherence and results.

Subjects aged 18–75 years and living in Campania (South Italy) were invited to answer the questionnaire online. The

**Table 1** Study population characteristics

	Patients with coeliac disease, N (%) 176	General population, N (%) 528	P value
<b>Ethnicity</b>			
Caucasian	100 %	100%	–
Female	129 (73.3)	389 (73.7)	0.43
Age at test (mean±SD)	37.7±10.8	39.1±12.7	0.19
<b>Body mass index</b>			
≤18	5 (2.8)	16 (3.0)	0.1
18.1–25	137 (77.8)	382 (72.3)	
25.1–30	27 (15.4)	80 (15.2)	
>30	7 (4.0)	50 (9.5)	
<b>Job</b>			
Student	25 (14.2)	85 (16.1)	0.9
Housewife	13 (7.4)	28 (5.3)	
Low-class job	14 (8.0)	45 (8.5)	
Middle-class job	39 (22.1)	120 (22.7)	
High-class job	70 (39.8)	201 (38.1)	
Retired	5 (2.8)	18 (3.4)	
Unemployed	10 (5.7)	31 (5.9)	
<b>Physical activity</b>			
Walk 30 mins daily	26 (14.8)	97 (18.4)	0.51
Practice sport once a week	12 (6.8)	48 (9.1)	
Practice sport more than twice a week	43 (24.4)	131 (24.8)	
Physical demanding job	12 (6.8)	26 (4.9)	
No sport activities	83 (47.2)	226 (42.8)	

**Table 2** Consumption of fluid milk in our study population

	Patients with coeliac disease, N (%)	General population, N (%)	P value
Do not drink milk	39 (22.2)	105 (19.9)	0.69
Milk with lactose	101 (57.4)	322 (61.0)	
Lactose-free milk	36 (20.4)	101 (19.1)	

survey was sent by email to 317 patients with CeD on a gluten-free diet for at least 6 months. Consent was obtained as part of a study dealing with vitamin D levels, bone mass and nutrition in CeD funded by a grant from the advocacy group Fondazione Celiachia (Italy). Patients specifically accepted to participate in the related online studies.

We selected controls from the general population who responded to the survey that was posted on the public access sites as reported elsewhere<sup>8</sup> creating two groups matched by gender, age and type of job and selecting three controls for each patient with CeD.

Categorical variables were expressed as frequency, continuous variables as mean±SD. Differences in frequencies and means between the two groups were calculated using the  $\chi^2$  test and t-test, respectively. Covariates included sex, age (18–35, 35–49, 50–75), body mass index (BMI, kg/m<sup>2</sup>), classified as underweight (≤18.5), normal weight (>18.5–25), overweight (>25–30) and obese (>30), job type (classified as student, housewife, low-class, middle-class and high-class job based on average salary, retired and unemployed) and weekly physical activity. We chose the above covariates because they may be associated with dietary restrictions and gastrointestinal symptoms like irritable bowel syndrome.<sup>9–12</sup> All tests were two-tailed with a significance level set at p<0.05. The data were analysed with STATA V.12. A biomedical statistician performed the statistical review of the study. We have followed the Strengthening the Reporting of Observational Studies in Epidemiology STROBE guidelines for this study.

**RESULTS**

Forty-three of the 317 emails bounced back because of the incorrect email address or server problems; 176 out of 274 patients with CeD (64.2 %) responded to all questions of the survey and were included in the study; 528 matched

**Table 3** How much milk do you drink per day?

	Patients with coeliac disease, N (%) total 137	General population, N (%) total 423	P value
1 L	0	5 (1.2)	0.22
0.5 L	5 (3.6)	14 (3.3)	
250 mL (large cup)	68 (49.6)	230 (54.4)	
150 mL (medium cup)	49 (35.8)	123 (29.1)	
50 mL (small cup)	15 (11.0)	51 (12.0)	

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**Table 4** Why do you drink lactose-free milk?

	Patients with coeliac disease, N (%) total 36	General population, N (%) total 101	P value
Doctor's advice	2 (5.5)	13 (12.9)	0.5
Friends	1 (2.8)	6 (5.9)	
My choice	18 (50)	47 (46.6)	
GI problems	15 (41.7)	35 (34.6)	

**Table 5** Lactose intolerance test

	Patients with coeliac disease, N (%)	General population, N (%)	P value
Never	145 (82.4)	474 (89.8)	0.002
Negative test	19 (10.8)	20 (3.8)	
Positive test	12 (6.8)	34 (6.4)	

controls were used for the analysis. Details on sex, age, BMI, job and physical activity of the two groups were reported in table 1.

Our study shows that milk consumption is similar between patients with CeD and control (p=0.69). We found that 22.2% of the patients with CeD and 19.9% controls do not drink fluid milk on a regular basis. Lactose-free milk is chosen by 20.4% of patients with CeD and 19% of the controls (table 2).

Among those who drink milk (regular or lactose free), 49.6% of patients with CeD and 54.4% controls drink a daily average of 250 mL of fluid milk (table 3). Most of the subjects start to consume lactose-free milk for personal choice (without any specific reason) or because of gastrointestinal problems. Only a minority of patients with CeD contacted a doctor before starting the use of lactose-free milk (5.5%), despite being driven to this change by gastrointestinal symptoms (41.7%) (table 4).

Although the high percentage of responders avoid regular milk, only a minority of them reported having

undergone a breath test for lactose tolerance with positive results (table 5). However, more patients with CeD than the general population reported a breath test before avoiding milk and dairy products.

When considering only dairy products consumption, no patient with CeD and only 6 (1.1%) controls state that they do not eat dairy products on a regular basis, with most of them eating these products at least once a week (table 6). Subjects who rarely drank dairy products mainly consumed lactose-free mozzarella, cheese, yoghurt or only parmesan cheese (table 6).

**DISCUSSION**

Our study shows that there is no significant difference between the patients with CeD and matched controls in the regular milk consumption.

This is, to our best knowledge, the first study investigating the milk and dairy products in CeDs in comparison with controls. The results indicate that in our population, the reduced calcium intake is not the dominant player in determining the low bone mass frequently found in patients with CeD.

Both patients with CeD and controls chose to avoid milk consumption because of their choice or because of gastrointestinal symptoms, without undergoing a breath test for lactose intolerance or consulting a doctor.

As previously reported,<sup>8</sup> the use of an online survey has both strengths and limitations. Our survey, to our best knowledge, is the first one conducted in a large Italian cohort whose results describe the milk habits of patients with CeD and controls from the general population. Online surveys are quite popular because they are convenient and easy to use. However, possible limitations are the recall bias, common in food questionnaires and the use of a non-standardised questionnaire. We discussed these limitations elsewhere.<sup>8</sup> The questionnaire being anonymous, we do not have any information regarding, for example, the compliance to the gluten-free diet, the antitransglutaminase antibodies values or the time from the CeD diagnosis.

**Table 6** Consumption of dairy products in our study population

	Patients with coeliac disease, N (%)	General population, N (%)	P value
Do not eat dairy products	0	6 (1.1)	0.125
Every day	25 (14.2)	75 (14.2)	
3–5 times a week	73 (41.5)	238 (45.1)	
Once a week	48 (27.3)	140 (26.5)	
Sometimes lactose-free mozzarella, cheese and yoghurt	8 (4.5)	23 (4.4)	
Only lactose-free mozzarella and cheese and yoghurt	2 (1.1)	10 (1.9)	
As ingredients only	11 (6.3)	29 (5.5)	
Only parmesan cheese (lactose-free aged cheese)	9 (5.1)	7 (1.3)	

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The present data confirmed our previous results, adding the information that patients with CeD on a gluten-free diet avoid milk in a percentage similar to that of the general population. The most frequent cause of avoiding milk in patients with CeD is the persistence of gastrointestinal symptoms despite the starting of a gluten-free diet. There are several reasons for the persistence of symptoms in CeD on a gluten-free diet,<sup>2</sup> such as dietary lapses and irritable bowel syndrome, and lactose intolerance is only one of them. Therefore, daily calcium absorption may be low in those who avoid dairy products and contributes, but not fully explains, to the frequent low bone mass observed in patients with CeD from the same country, both before and after the gluten-free diet.<sup>13</sup> However, studies reported that dairy food intake is associated with higher bone mineral density among adults, particularly those with sufficient vitamin D status.<sup>14 15</sup>

Another aspect to take into consideration when dealing with the choice of food is that patients with CeD tend already to have psychological problems caused by dietary restriction.<sup>16 17</sup> Therefore, our data suggest that doctors' and dietitians' advise during follow-up visits for patients with CeD on a gluten-free diet should focus on avoiding unnecessary restriction of milk and of dairy products which could further compromise their health and quality of life.

**Contributors** FZ and CC designed and performed the research and wrote the paper. FZ and PI analysed data. CB performed the research and reviewed the paper. All authors accepted the final version of the paper.

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**Disclaimer** CONSORT 2010: the authors declare that the CONSORT 2010 statement guideline has been adopted.

**Competing interests** None declared.

**Patient consent for publication** Not required.

**Ethics approval** The study was approved by the by the Ethics Committee of the University of Salerno Campania Sud aut. No 25, 25.4.2015.

**Provenance and peer review** Not commissioned; externally peer reviewed.

**Data sharing statement** Data set is available from the last author at cciacci@unisa.it. Consent for data sharing was obtained. All the data were anonymised, and risk of identification is inconsistent.

**Author note** Core tip: we examined the average consumption of milk and dairy products and the reasons for not consuming them in patients with coeliac disease compared with controls. We found that there is no significant difference between patients with coeliac disease and controls in the regular milk consumption.

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Article 2: Social Care Research

# Vulnerable adults in police custody: The role of local authorities in the provision of Appropriate Adults (AA)

There is no standard model of funding for AA services for vulnerable adults

Provision is often inadequate

Local authority adult social services can fund AA provision as part of their wider safeguarding responsibilities for vulnerable adults, which may also reduce the demands on social care professionals to undertake the role

Commissioners and funders need to monitor whether the legal and welfare rights of vulnerable adults in custody are protected

Service user involvement needs improvement



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## BACKGROUND

Research undertaken by The National Appropriate Adult Network (NAAN) in 2015 indicates that local authority adult social services are the most common funder of Appropriate Adult (AA) schemes for vulnerable adults, but this funding may be being reduced. Poor provision of AAs has been highlighted as a source of concern in a series of Government-commissioned reviews and inspections (e.g. the 2009 Bradley Report, HMIC 2015, CJI 2014) suggesting that the rights and welfare of vulnerable adults in custody are currently not being safeguarded.

**THE 1984 POLICE AND CRIMINAL EVIDENCE ACT (PACE)** and its Codes of Practice created a duty on police custody sergeants to secure an AA to safeguard the rights and welfare, and enable effective participation, of vulnerable people detained or questioned by the police. This includes any young person aged 10–17 years and adults who are mentally vulnerable. There is an explicit statutory duty on Youth Offending Teams to provide AAs for children and young people, but no similar duty on any agency to provide AAs for vulnerable adults in police custody.

**LOCAL AUTHORITY ADULT SOCIAL SERVICES** do have key responsibilities for people with mental health needs and learning disabilities in this role (Health and Social Care Act 2012, Care Act 2014).

The aim of this research was to understand the role for local authority social services in the provision of AAs across England and identify good practice. It also sought to examine what commissioners, practitioners and service users would expect from an effective service.

## Methods

An online survey was sent to all local authority Adult Social Care departments in England (29/151 responses), and all AA adult services who are members of NAAN (23/54 responses). The survey aimed to map the current involvement of local authority social services in the provision of AAs for vulnerable adults in police custody across England.

Case studies were undertaken in four areas (Cases A-D) in which survey respondents indicated that the local authority was involved in funding and/or commissioning AA provision for adults. Qualitative interviews were undertaken with 25 respondents: managers or coordinators of AA services (6), managers or commissioners from adult social care and/or health services (6), Appropriate Adults (9) and police (4). In addition, two focus groups were held with user groups, in which a total of 13 participants took part.

## FINDINGS

### SURVEY RESPONSES

#### Local Authority adult social services

Of the 29 adult social care departments who responded, 14 funded or part-funded AA services for vulnerable adults. Of these 14, six were sole funders, and eight funded provision in partnership with other agencies, including children's services, Youth Offending teams, CCGs, the police and neighbouring local authorities.

Most of this provision was commissioned from a third-sector partner (ten areas) or a private sector organisation (two areas). In two areas, provision was provided directly by local authority adult social care staff.

Although a small sample, there is some evidence from this study that funding an AA service for vulnerable adults may reduce the demands on local authority social care professionals to undertake the role.

In our survey, only 4/14 adult social care departments that provide funding for a dedicated service also said that social workers or adult mental health professionals would undertake the role. Respondents said that the use of these professionals was usually 'limited' and cases would normally be dealt with by the AA service unless the vulnerable adult was known to the local authority.

Of those authorities who did not fund a dedicated service, a greater proportion (13/15) said that their social care professionals would act as an AA. Respondents with no dedicated service had concerns about the resource implications of using qualified social workers to act as AAs, and the lack of training for this role:

We have little choice about attending if one of our vulnerable service users are in custody and require an appropriate adult then all other work must be reprioritised to enable attendance to the police station. This has a huge impact for workloads as acting as an appropriate adult can involve many hours of waiting at the police station and interviews themselves can take a long time to complete. Furthermore whilst I have received training in acting as an appropriate adult many of my colleagues are expected to act up in to this role with little or no training. (ADASS survey response)

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## FINDINGS

## CASE STUDIES

Four models of local authority involvement in funding and management of an AA service

Many respondents in areas that did not fund a dedicated service raised concerns about the lack of availability of AAs for vulnerable adults in custody, expressing regret that this was an area of social care they were unable to deliver.

AA service managers

Of the 23 services who responded, 12 received some or all of their funding from local authority adult social services.

Just over half (12) of the AA provision was managed by third-sector organisations, nine were part of a local authority, and two were commercial organisations.

Almost all services who responded used trained volunteers as AAs, sometimes in combination with paid staff. In two areas only paid sessional staff delivered the service.

Services varied in their hours of operation with most providing AAs seven days a week typically between 8am and 10pm (largely because of the reliance on volunteers). Nine services said that the local authority emergency duty team may provide an AA outside these hours although only in emergencies. The remaining services said they did not think there was any provision of AAs outside their hours of operation.

Most services had some relationship with local authority social services regardless of funding. This included joint membership of local partnership groups, information sharing and safeguarding arrangements, and in three areas, reciprocal training arrangements. However, despite their role in supporting vulnerable adults, four services reported no contact with adult social services.

Most AA services in our study did not have any form of service-user involvement beyond the use of feedback forms, for which the response rate is often very low.

### CASE A

A private sector organisation delivers the service in custody suites across three local authority areas. The lead commissioner is the police and the contract was awarded following a competitive tendering process. Funding is provided by six agencies: adult social services in each of the three local authorities, and three Clinical Commissioning Groups.

The cost in 2015/16 was approximately £96,000, and the service responded to 963 requests for an AA for a vulnerable adult. AAs are paid sessional staff and the service is provided 24 hours a day, seven days a week.

### CASE B

The local authority commissions a third-sector organisation to provide a range of services for children and families, of which the AA service is one. Funding comes from both adult and children's services. The provider also receives funding from a neighbouring local authority and delivers AA provision across all custody suites in both areas. There is no joint commissioning arrangement and separate monitoring arrangements are in place for both local authorities.

The cost in 2015/16 was approximately £72,000, and the service responded to 1,410 requests (675 for adults, 735 for children). The service is coordinated by one full-time manager and trained volunteers act as AAs for both children and adults from 8am to 11pm, seven days a week. The emergency duty team may respond to police requests for an AA for a vulnerable adult outside these hours.

### CASE C

Local Authority Youth Justice Service manages provision for both children and adults. Two part-time staff coordinate a pool of volunteers, most of whom fulfil two roles: AAs and members of Referral Panels for young offenders. Adult social services contribute a small amount of top-up funding to ensure AA provision includes vulnerable adults.

The cost in 2015/16 was approximately £35,000, and the service responded to 260 requests (127 for adults, 133 for children). The volunteers are available from 9am to 5pm, Monday to Friday. The emergency duty team may respond to police requests for an AA for a vulnerable adult outside these hours.

### CASE D

The local authority out-of-hours duty social work team employs a full-time AA service manager. The service is funded by both adult and children's services. AAs are trained volunteers and the service manager also acts as an AA. A small number of paid sessional staff provide cover over Bank Holidays.

The cost in 2015/16 was approximately £47,000, and the service was used over 700 times by adults, and approximately 150 by children/young people. The AA service attends adults from 9am to 11pm, seven days a week. The Youth Offending team performs the role for children/young people during office hours, with the AA service providing evening and weekend cover only. The duty team will attend outside these hours where necessary.



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# FINDINGS

## WHY DO THESE LOCAL AUTHORITIES FUND AA PROVISION FOR VULNERABLE ADULTS?

These four local authorities have funded or part-funded provision despite not having a statutory duty to do so. The following explanatory factors were identified by respondents interviewed during the case studies:

- The provision of AAs is seen as part of their wider adult safeguarding responsibilities;
- Concern about demands on social work and mental health professionals' time supporting adults in custody;
- Increasing number of requests from police for AAs for vulnerable adults;
- Existing AA service for children and young people unable to meet demand for vulnerable adult support;
- To build and maintain good working relationships with other agencies, including police and CCGs; and/or
- To develop volunteering opportunities.

It's about us taking responsibility as a local authority. We see this as a very important response that we should be making...giving the best we can to people who are very very vulnerable and find themselves in police custody, and making sure their needs are properly met. (Social work manager)



"It's about us taking responsibility as a local authority"  
(Social Work Manager)

## INFORMATION SHARING AND SAFEGUARDING

Appropriate Adults may become aware of safeguarding concerns during their time in custody with vulnerable adults. There is some variation in how these concerns are dealt with.

In some cases, concerns are reported to the custody sergeant and no further action taken.

Two services use feedback forms for each referral that include safeguarding issues which are passed back to the local authority. It is unclear to the AA managers of these services if this information is acted on.

In other services, clearer links exist with adult social care safeguarding teams that facilitate early follow-up of safeguarding concerns. These include examples where the AA manager is embedded within the social work out of hours team and has direct access to the appropriate professionals; or has a named contact within the safeguarding team and clear protocols are in place for information-sharing.

## EFFECTIVENESS

Case study respondents and service users in the focus groups were asked what they considered to be the most important criteria to determine the effectiveness of an AA service for vulnerable adults.

AA service managers, service commissioners and the police reported

that they prioritise availability and response time as the defining performance measure of an effective service. All four case examples collated monitoring data on this and were performing well on these measures (within the operating hours of the service).

Monitoring quality is less well managed. Service managers and commissioners are largely reliant on feedback from the police. Issues frequently raised by the police included increasing the operating hours of the service, and in one area there was also a request to increase the diversity of AAs (age and ethnicity).

Reliance solely on the police for monitoring quality is unsatisfactory given part of the role of the AA is to ensure due process is followed during a vulnerable adult's time in custody. There was no direct monitoring of whether the legal and welfare rights of vulnerable adults are indeed protected.

Adults who had experience of being in custody understood the purpose of the role. During the focus groups they prioritised the demeanour of the AA as the most important indicator of effectiveness. Service users wanted AAs who were trustworthy, kind, respectful of gender, ethnicity, religion and culture, and honest. They also wanted AAs who could manage difficult situations calmly, understanding the needs of vulnerable adults.

There is little opportunity for service users to feedback on quality. We found no evidence of service user involvement in the design, delivery and monitoring of AA provision. This may help explain the apparent gap between the perspectives of professionals and service users on the factors that contribute to effective AA provision.

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# CONCLUSIONS & RECOMMENDATIONS

Although they do not have a statutory duty to do so, there are several policy drivers for local authority involvement in the provision of AAs for vulnerable adults. The Care Act 2014 includes a duty for social care services to cooperate with criminal justice agencies and encourages a greater focus for adult social care on early intervention. Health and Wellbeing Boards, created by the Health and Social Care Act 2012, also offer an opportunity to improve joint commissioning and cooperation with criminal justice agencies, as Joint Strategic Needs Assessments consider the needs of vulnerable groups, including offenders.

Only a small proportion of local authorities responded to our survey and of those, less than half-funded (or part-funded) AA services for vulnerable adults. While our sample is small, the responses support the findings of other studies indicating that AA provision for vulnerable adults is often inadequate (Bath *et al.* 2015, 2009 Bradley Report, HMIC 2015, CJI 2014).

This study examines four models of local authority involvement in the provision of AAs for vulnerable adults. They vary in whether the service is delivered 'in-house' or commissioned from an external agency, and also in the degree to which local authorities bear the burden of funding. In all cases, services were closely monitored and performing well on the key indicators of availability and response times of trained AAs, indicating how adult social services can be successful in ensuring vulnerable adults in custody have access to AAs.

## THE RESEARCH HIGHLIGHTS TWO KEY AREAS FOR IMPROVEMENT

1. Commissioners and funders should have more regard for monitoring wider outcomes which may be more appropriate measures of service effectiveness. These should include whether the AA provision does protect the rights and welfare, and promote the effective participation in the justice process, of vulnerable adults in custody.

They may also wish to monitor whether better links with AA provision facilitates early intervention and effective referral pathways for vulnerable adults into health and social care services, a key duty under the Care Act 2014.

2. There is a need to improve service user involvement in the commissioning, delivery and monitoring cycle.

## COMMENT

When detained or questioned by police, people with mental health conditions, learning disabilities, autism and other conditions are extremely vulnerable, both short-term and long-term, to legal, physical and psychological risks. AAs are central to the integrated approach envisaged by the Bradley Report and support outcomes under the Care Act and Transforming Care.

With an understanding of need, and a clear independence from police, local authorities are well placed to lead on AAs as they have done for over 30 years.

This research is an important and extremely timely reminder that AA provision requires the same person-centred, outcomes-focused approach as other health and social care functions. It will make a positive and lasting impact on the future of support for vulnerable adults.

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# School for Social Care Research

The School for Social Care Research was set up by the National Institute for Health Research (NIHR) to develop and improve the evidence base for adult social care practice in England in 2009. It conducts and commissions high-quality research.

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