

Co-located welfare advice in general practice: a realist qualitative study

Co-located welfare advice in general practice: a realist qualitative study

CHARLOTTE WOODHEAD^{1†}, HILLIARY COLLINS¹, ROBIN LOMAS², ROSALIND RAINE¹

¹Department of Applied Health Research, University College London, London, UK

²Haringey Citizens Advice, London, UK

†Correspondence to: Dr Charlotte Woodhead, Department of Applied Health Research,
University College London, 1-19 Torrington Place, London, UK, WC1E 7HB E-mail:

c.woodhead@ucl.ac.uk

Abstract

General Practitioners (GPs) engage with patients about a variety of social issues distinct from direct clinical work ('non-health' issues); such as health-related benefits and debt. Co-located welfare advice services could provide support to practices but have usually been considered in terms of patient rather than practice outcomes. We aimed to develop an initial programme theory for how the provision of co-located advice supports specific practice outcomes; and, to identify salient barriers and enabling factors. 24 semi-structured interviews with general practice staff, advice staff and service funders in two UK urban localities were conducted between January and July 2016. Data were thematically analysed and a modified Realist Evaluation approach informed the topic guide, thematic analysis and interpretation. Two outcomes are described linked to participant accounts of the impact of such non-health work on practices: reduction of GP consultations linked to non-health issues and reduced practice time spent on non-health issues. We found that individual responses and actions influencing service awareness were key facilitators to each of the practice outcomes, including proactive engagement, communication, regular reminders and feedback between advice staff, practice managers and funders. Facilitating implementation factors were: not limiting access to GP referral; offering booked appointments and advice on a broader range of issues responsive to local need. Key barriers included pre-existing socio-cultural and organisational rules and norms largely outside of the control of service implementers, which maintained perceptions of the GP as the 'go-to-location'. We conclude that co-location of welfare advice services alone is unlikely to enable positive outcomes for practices and suggest several factors amenable to intervention that could enhance the potential for co-location to meet desired objectives.

Key words: co-location; primary health care; welfare advice; realist evaluation; social welfare

What is known on this topic?

- Co-locating welfare advice services in general practices (GP) has been one approach to tackling the wider determinants of patient health.
- Previous evaluations have focused on patient health and financial outcomes.
- GP practitioners perceive increasing demand for supporting patient social needs but there is little information on how co-located advice services could support practices.

What this paper adds

- We suggest an underlying theory linking co-located welfare advice provision to improved practice outcomes.
- The findings indicate that co-location of welfare advice services alone is unlikely to enable positive outcomes for practices.
- We suggest several factors amenable to intervention that could enhance the potential for co-location to meet desired objectives.

Introduction

General Practitioners (GPs) are involved with a variety of social issues independent of direct clinical work (Popay *et al.* 2007). Patient demand for such 'non-health' work has been identified as a contributing factor to increased general practice pressures (Iacobucci 2014a,

2014b, Baird *et al.* 2016). Austerity and welfare reform has led to cuts to a range of support services in the UK. Such changes are likely to exert additional strain on GPs, particularly those in deprived areas, and to exacerbate health inequalities (Bloomer *et al.* 2012, Deep End Report 2015). Two recent UK GP surveys found that the majority of GPs (particularly inner city GPs) reported that patient health, GP workload and practice staff time demands had been adversely affected by greater patient financial hardship and changes to welfare provision (Iacobucci 2014a, 2014b). These were reported to contribute to decreased time available for other patients' health needs, as well as increased job stress and practice costs (Citizens Advice 2015).

Initiatives which co-locate general practice with welfare advice have been established to support patients and practices. Prior research has focused on patient outcomes such as income gain and improved well-being (Adams *et al.* 2006, Allmark *et al.* 2013, Parkinson & Buttrick 2015). Studies reporting practice outcomes have identified a perceived reduction in workload and time spent dealing with non-health issues (Borland 2004, Greasley & Small 2005, Burrows *et al.* 2011); there is also weak quantitative evidence for a decline in consultation frequency (Abbott & Davidson 2000, Abbott & Hobby 2000, Krska *et al.* 2013). However, there is no evidence available for providers of similar services to understand how benefits might occur or be promoted through co-location. Nor is there information about which factors (internal and external to the service) might influence outcomes. Explicit assumptions about the nature of the problems targeted by co-located advice and the mechanisms through which the service might produce desired outcomes ('programme theory' (Weiss 1997)), have not been made.

In evaluation terms, mechanisms have been described as the *intervening* processes, entities or structures between service delivery and the outcomes of interest (Astbury & Leeuw 2013). They reflect what happens in response to the delivery of a service or programme to promote outcomes, and are sensitive to contextual factors (Weiss 1997; Astbury & Leeuw 2013). Within the Realist Evaluation approach, Pawson & Tilley (1997) state, '*context...is the prior set of social rules, norms, values and interrelationships gathered in these places which sets limits on the efficacy of program mechanisms...Programs work by introducing new ideas and/or resources into an existing set of social relationships. A crucial task of evaluation is to include...investigation of the extent to which these pre-existing structures 'enable' or 'disable' the intended mechanism of change*' (p.70). Understanding these elements could support stakeholders to improving existing, or develop future similar interventions (Chen 2012).

We therefore aimed to describe the underlying context giving rise to increased practice pressures and which co-located welfare advice services might be able to influence; and, to develop an initial programme theory for how the provision of co-located advice might influence these issues in relation to specific practice outcomes. The practice outcomes investigated were:

1. Reduction in GP consultations. This includes consultations directly linked to 'non-health' issues (e.g. housing letters or benefits advice) and those indirectly linked (e.g. where social pressures influence symptoms of depression, anxiety or stress).

2. Reduced practice staff and management time spent dealing with patient 'non-health' issues.

Methods

This study was nested within a mixed methods evaluation (December 2015 to July 2016) of co-located welfare advice services in a London borough (locality 1). To inform the findings, data were also collected from services in a nearby borough (locality 2). Co-located services in locality 1 provide specialist casework advice on welfare benefits and debt, offer a walk-in 'first-come-first-served' service and is open to all residents. In locality 2, booked appointments and casework advice are offered on a broader range of issues (e.g., housing and employment), and only individuals registered with host practices are eligible.

Recruitment & data collection

GPs, practice managers, GP receptionists and advice staff from intervention practices in both localities and those in the "comparison" arm of the wider evaluation from locality 1 were invited to participate. Sampling aimed to include representatives from each job role as well as from both the advice and comparison groups. Semi-structured qualitative interviews were carried out with informed consent at an interviewee-chosen time and location, or by telephone. Interviews were chosen rather than focus groups both due to practical difficulties of bringing together practitioners at the same time and to enable individuals in different roles within the same practices to speak freely. The topic guide built on a formative evaluation (Pizzo *et al.* 2014) - covering experiences, attitudes and expectations of the co-located advice service. Interviews were audio-recorded and transcribed, removing identifiable information. Following the first few interviews, transcripts were descriptively

coded and the topic guide was amended to probe further into emerging areas of interest. Further sampling also aimed to include a greater number of GPs. Interviews continued until we were no longer receiving new information relevant to the study aims from additional respondents.

Theoretical framework

The mechanisms brought about by a programme are embedded within, but distinct from, pre-existing social (contextual) mechanisms. Pawson & Tilly (1997) conceptualised mechanisms brought about by a programme as a combination of 'resources' (e.g., information, skills, support, materials) provided by the activity being evaluated and individuals' 'reasoning' (e.g., attitudes, logic, beliefs) in response. However, it has been argued that the operationalisation of these ideas into the 'context + mechanism = outcome' (C+M=O) formula used as a guiding principle for Realist Evaluation is problematic in three main ways, which has led to difficulties in distinguishing context and mechanisms (Marchal *et al.* 2012; Porter 2015a, 2015b).

First, Porter (2015b) argues that the C+M=O formula moves away from the ('realist') idea that context encompasses pre-existing social mechanisms into which programmes are embedded and produces a categorical distinction between 'context' and 'mechanism'. He suggests distinguishing 'Contextual Mechanisms' as the pre-existing social mechanisms within which (and as a result of) programmes are designed, from 'Programme Mechanisms' - the processes introduced which are designed to counteract the (contextual) status quo.

Second, there is a conflation of 'resources' and 'reasoning' within the term 'mechanism'. Dalkin *et al.* (2015) suggest this causes a tendency to emphasise either element while neglecting the other, and argue for a disaggregation of 'mechanism' into 'resources' and 'reasoning' to clarify interpretation. Porter (2015b) goes further, saying that combining the two into a single term contradicts Pawson and Tilley's ('realist') beliefs about the interdependence (but duality) of structure and agency - leading to an '*elision of structure and agency*' (p.243). He instead proposes that human agency should be distinguished from the mechanisms brought about by a programme to acknowledge the role of interpretation and behaviour by human agents in bringing about change.

Third, and related, the notion of favourable contextual conditions 'triggering' mechanisms in order to produce outcomes is contested as undermining the role of human 'volition' (Dalkin *et al.* 2015) or 'agency' (Porter 2015b). While Dalkin *et al.* (2015) suggest considering 'continuums of activation' (p.5), Porter (2015b) suggests removing 'reasoning' from the umbrella of 'mechanism', and explicitly including 'Agency' as an evaluation element in its own right. Agency refers to individual interpretations and responses to programme mechanisms. Taken together, Porter (2015b) argues for a revised formula: Contextual Mechanisms + Programme Mechanisms + Agency = Outcome (p.247).

We use this approach to generate hypotheses about how co-located welfare advice is proposed to lead to outcomes (through which Programme Mechanisms). We explore how both individual responses to these (Agency) and pre-existing conditions (Contextual Mechanisms) influence the capacity for Programme Mechanisms to elicit change (Table 1). It

is hoped that future work may test and refine this initial programme theory in different situations.

[TABLE 1 HERE]

Data analysis

Data were coded using thematic analysis. Specifically, after familiarisation, interview transcripts were descriptively coded, codes discussed between two researchers and data were input into NVivo10 (NVivo 2012). Finally, codes were further refined and reassessed for relevance to Contextual Mechanism, Agency, Programme Mechanism and Outcome-relevant concepts, providing a framework for further coding and data categorisation.

Findings

22 interviews were conducted with 24 participants including practice staff, CA staff and funders from the two localities (Table 2). We first describe some of the pre-existing Contextual Mechanisms which frame the need for co-located welfare advice services and into which the service is embedded.

[TABLE 2 HERE]

Contextual Mechanisms framing the need for co-located welfare advice services

The ways in which participants described patient 'non-health' issues as influencing practices are summarised in Table 3. Non-health issues were brought to GP consultations through two main ways: for *direct* support (e.g., appointments for help navigating an aspect of the welfare system); and, *indirect* support (e.g., where ill health was triggered, maintained or exacerbated by underlying social situation(s)). GPs and practice managers reported that

appointments for direct support increased waiting times and reduced capacity to support patients with medical needs, often considering this outside of their clinical role. In contrast they felt that supporting patients where their mental and/or physical health was affecting or affected by their social situation was part of their role. However, there was frustration or dissatisfaction at their inability to support patients with some of the 'wider determinants' of health. Participants across all job roles identified the immediate cause of the problem to be the perception of the GP as the 'go-to-location'. For indirect support, this perception was because of the inherent link between social circumstances and health. For direct support, it was linked to the GP role as an advocate or gateway to social support and to the view of the GP practice as a trusted and familiar support service. Interviewees identified both local factors and the wider structural environment as promoting the view of the GP as 'go-to-location'. Local area characteristics included, for example, the extent of temporary or social housing in the area - increasing the proportion of patients requiring medical opinion letters; language barriers and social deprivation - reducing the level of confidence to self-manage or seek help elsewhere; and, social isolation due to limited social support networks. Wider structural factors included a welfare system which inherently involves the GP in decision-making; the role of GP as coordinator and gateway to a range of social support services; and, cuts to other community services available as an alternative to patients.

[TABLE 3 HERE]

The next section describes how (through which Programme Mechanisms) co-located welfare advice services could counteract the status quo described above to influence practice outcomes. Key Contextual Mechanisms, Agency and also implementation factors are described (Table 4 and Figure 1).

Linking co-located advice to outcomes, Programme Mechanisms, Contextual Mechanisms and Agency

[TABLE 4 HERE]

[FIGURE 1 HERE]

Practice outcome 1: reduced GP consultations

A signposting option for staff and an alternative option for patients. Co-located welfare advice services could lead to a reduction in GP consultations directly linked to non-health issues (e.g. housing letters or benefits advice) through two Programme Mechanisms: ‘providing a signposting option for staff’, and ‘providing an alternative option for patients’ (Figure 1). These mechanisms depended on the Agency of both clinicians and practice staff actively signposting to the service; and/or, of patients in changing their consultation behaviour. Such Agency was in turn reliant on adequate service awareness (Figure 1 and Table 4).

However, we found such awareness to be limited even within host practices:

I have no clue that exists and I don't know how, what exactly they do. [159, GP, locality 2, advice group]

I can't be sure what day is the walk-in, whether they do walk-in or whether it is all appointments. I can't remember. [61, GP, locality 1, advice group]

Lack of service awareness was therefore a key barrier to a reduction in GP consultations directly linked to ‘non-health’ issues. Factors affecting service awareness are described in more detail below.

Implementation differences between the two localities were also important (Table 4 & Figure 1). For the Programme Mechanisms identified above to affect a reduction in GP consultations, referral by other practice staff and self-referral should be possible. Reception staff suggested that the potential for co-located advice services to immediately influence GP consultations depended on their capacity to gate-keep appointments. If gate-keeping was not possible, any immediate or future reduction in consultations *directly* linked to non-health issues would be wholly reliant on changes in patient behavior (Agency) (Figure 1). Policies on enquiring about the appointment reason varied across practices (Contextual Mechanism):

We can just book them an appointment [with the adviser] and know that they're going get the right advice and it frees up the doctor's appointment. [60, Reception staff, locality 2, advice group]

Now the doctors are saying they don't want us to ask the [appointment] reason so they [patients] could go in to the doctor for a completely inappropriate appointment. [37, Reception staff, locality 2, advice group]

In locality 1, individuals more commonly self-referred partly due to less awareness and signposting by practice staff. Further, locality 1 services were open to anyone in the area, often used as an 'overspill' from other advice services and were therefore not necessarily being accessed by the target patient group. Nonetheless, advice staff in both localities felt that the opportunity for patients to self-refer enhanced access and could enable the diversion of appointments through patient consultation behaviour change (Agency). As

above and illustrated in Figure 1, this was dependent on the extent of service awareness among patients.

Other enablers to patient behavior change described by GPs and advice staff included service longevity and adviser continuity. This was particularly essential for patients experiencing mental health difficulties, for whom the GP may be a more familiar and trusted adviser:

There are some that are sort of so entrenched that they have to see a GP or someone. I think it's going to take time for them to develop a relationship with someone (...) and if they feel that they can trust that person. I think part of it being in a GP surgery automatically they will (...) have a sense that it is a reputable place.

[13, GP, locality 1, comparison group]

Addressing underlying issues. Interviewees also discussed whether co-located welfare advice services could reduce GP consultations indirectly linked to non-health issues, through the Programme Mechanism 'addressing underlying issues' (Figure 1). Most respondents acknowledged that where underlying social drivers affected patients' health, health improvement would be unlikely through medical intervention alone. Many felt that receiving welfare advice could positively influence mental health:

I've got one patient who has depression (...) he's on some benefits but he's finding it very difficult to get by and he can barely buy enough food to eat, and he's concerned about having his benefits taken away so he's the sort of person who I think if he had some more help with his finances that might help relieve stress and therefore his mental state. [61, GP, locality 1, advice group]

Whilst practice managers, reception staff and advice staff felt that such health improvements would reduce need for consultations, some GPs were not convinced it would be sufficient to influence demand:

The problems are deeper and more engrained and often go hand in hand with other problems so that it might take the edge off things but I don't think lead to a massive improvement in someone's overall well-being. [98, GP, locality 2, advice group]

Maybe it reduces the referral to secondary care but (...) I can't honestly say it reduces the appointments with us. I don't think it largely does. I mean maybe prevents some follow ups. If they are getting good advice they won't come back to us quite so often. [51, GP, locality 2 advice group]

Practice outcome 2: reduced practice time spent on non-health issues

Co-locating advice services could reduce practice staff time spent on non-health issues within and outside of consultations; especially if linked to direct (e.g., form-filling) rather than indirect support (e.g., depression linked to debt). Time saved was more commonly identified by advice and reception staff, through the Programme Mechanism, 'reducing bureaucratic pressure' (Figure 1):

They can do that [appeal against ESA decision] with a doctor but that means (...) more admin time for the doctor to do something like that where she could be doing another thing for another patient. [37, Reception staff, locality 2, advice group]

Advice staff and funders reported that since welfare and health issues were so intertwined, the most efficient way to address them would be to work together. They suggested that co-location may save time by facilitating opportunities for collaborative work, enabled by

opportunities for interaction provided by co-location (Figure 1). Further, two GPs reported that closer working with advisers could reduce time collating unnecessary information for external agencies and reducing repeat requests for information:

The number of times where patients have gone to appeal, we've got letters from a solicitor requesting medical information and (...) having feedback from [the advice service], would stop excessive amounts of unnecessary information being sent. [13, GP, locality 1, comparison group]

However, it was acknowledged that co-located advice services would not completely remove bureaucratic pressure for non-health issues:

Having a CAB wouldn't necessarily reduce the workload considerably because (...) in order for us to do our work and get a successful outcome for the patient, they would need to be doing some work, so i.e. doing medical reports. [40, Advice staff, locality 2, comparison group]

While respondents often aspired to work collaboratively, interactions in both localities were limited and there were few real examples of collaborative working (Agency):

The best model would be an advisory service within the practice premises which liaises closely with the GPs (...) But as I say with the current pressures on GP's I can't see that close working together is practical in reality. [93, Practice manager, locality 1, comparison group]

Promoting service awareness was also key to Programme Mechanisms involved in time-saving (Figure 1 and Table 4). For example, this GP was unaware of the service at their

practice and reported spending long hours working on letters that the advisers could have helped with:

When we finish work [we] then have to sit until 8 o'clock, 9 o'clock to do letters for housing and councils and x, y, z, so if (...) we had a CAB advisor, instead of seeing a GP [they could] just go to this adviser. [159, GP, locality 2, advice group]

Since most of the pathways linking co-located advice services and practice outcomes were influenced by service awareness, we describe in further detail the barriers and enablers to awareness.

Service awareness Barriers to service awareness included a lack of reminders and opportunities for dialogue about the service between advisers, GP practice staff and funders (Table 4). Despite co-location, respondents in both localities suggested frequent reminders were necessary given the number and unstable commissioning of other services (Contextual Mechanism):

Just as you're starting to have an awareness of what's out there, services move, close down, rebrand and change (...) and so it's harder for us as health professionals to keep track of them all and it's probably even harder for patients or members of the public. [32, GP, locality 2, advice group]

Practice managers were identified as key facilitators of service promotion; providing opportunities for advisers to feedback to practice staff (e.g., at team meetings), communicating with GPs directly, and advertising the service to patients (e.g., in waiting areas) (Agency):

[At] one of our GPs there's a new practice manager and all of a sudden that practice manager is doing other things to try and promote the service to patients (...) [if] they have a positive reaction to the service, then that spreads to the doctors and to the receptionists. [40, Adviser, locality 2]

Partly due to the greater longevity of services, practice managers at locality 2 were perceived as more proactive than locality 1 managers and advisers distinguished 'cooperative' practices from those which did not provide proactive support and/or in which they felt they were treated as 'outsiders'. Other influences on service promotion included the presence of "socially aware" GPs (Contextual Mechanism) and proactive engagement (Agency) by advisers (Table 4). Advisers stated that it was important to feedback to practices on their activity, but noted variability in assimilation:

I try and tell them, the Practice Managers, so that they're aware that we're producing results for their surgery (...) some of the surgeries are interested, others are not particularly bothered. [22, Adviser, locality 2]

The physical co-location of advice services encouraged staff awareness through the Programme Mechanism, 'providing opportunities for formal and informal interactions' (Figure 1):

They [advisers] can sometimes knock on our door and say, "we have got a person we are worried about, would you arrange to see them?" So it is very useful to have them situated here, definitely. We do invite them to our educational meetings once or twice a year and meet them in the coffee room quite informally. [51, GP, locality 2, advice group]

I think having a presence in an actual surgery or practice highlights that the service exists, so it's more visible. [92, Funder, locality 2]

Certain practice characteristics impeded service awareness by minimising opportunities for interaction and advice staff proactive engagement (Contextual Mechanism). These included large list sizes, large numbers of front-line staff, high staff turnover, and locating advice services physically apart from the main surgery area (Table 4):

The doctors should know but we have a huge cohort of clinicians and because everyone works part-time we try to inform people through emails, GP education meetings (...) and also the trainers should tell their trainees. Whether that happens, I don't know. [88, Practice manager, locality 2, advice group]

The extent of perceived funder support also varied by locality. If advisers struggled to feedback to practices, support from funders to promote the services to practices or provide a forum for formal feedback (Agency) was needed. Locality 2 advisers reported that funders engaged with regular feedback on service activity, identifying an 'individual champion'. In contrast, locality 1 advisers perceived little funder support and few opportunities to promote or feedback on the service formally. Advisers from both areas thought that funders could do more:

I also think [in terms of] support we get from our funders (...) just in terms of promoting - they do bits and pieces behind the scenes - but I'd like to see them all sort of promoting, this as a service they are paying for...or certainly exerting some kind of influence on the doctors. [40, Adviser, locality 2]

Our initial programme theory is summarised by Figure 1, illustrating the Programme Mechanisms and Agency elements through which co-located welfare advice is proposed to

link to the practice outcomes of interest. Figure 1 also reveals the Contextual Mechanisms, and implementation factors which act as barriers and enablers to the outcomes through their influence on Programme Mechanisms and Agency factors.

Discussion

Summary

We describe the pre-existing Contextual Mechanisms in which social issues are perceived by primary care staff to contribute to increased practice pressures including demand for GP consultations and practice staff time spent dealing with 'non-health' issues. We describe *how* (through which 'Programme Mechanisms') co-located services could support practices with such pressures. We identified key implementation, Agency and Contextual Mechanism-related barriers and enablers to the Programme Mechanisms. Individual responses and behaviours (Agency) which influenced service awareness were key facilitators and are amenable to change; they encouraged collaborative working, signposting, and changes in patient help-seeking behaviour. For example, service promotion was associated with improved service awareness through proactive engagement, communication, regular reminders and feedback between advice staff, practice managers and funders. Other important facilitators were not limiting access to GP referral; offering booked appointments and advice on a broader range of issues responsive to local need (implementation characteristics). Key barriers included pre-existing socio-cultural and organisational rules and norms largely outside of the control of service implementers, which maintained perceptions of the GP as the 'go-to-location' (Contextual Mechanisms). Despite co-location, many of the facilitating elements were underdeveloped in the localities examined.

Comparison with existing literature

In the current study local area deprivation was not only linked with greater need for support from the GP for social, or 'non-health', issues but also positively influenced the view of the GP as the 'go-to-location' for help. This builds on previous work linking social deprivation to more frequent consultations and more consultations for the psychological and health impact of social problems (e.g., Boerma & Verhaak 1999, Popay *et al.* 2007). The capacity for GPs to support patients with such 'wider determinants' of health is limited by a lack of patient willingness and/or confidence to disclose social problems among patients, or to probe for them among GPs; lack of GP knowledge about locally available support services; and, considerable time pressures on practitioners (Popay *et al.* 2007; Citizens Advice 2015). In this context, co-locating welfare advice services in GP settings is an opportunity to support patients, particularly those living in deprived areas, at a location that they would normatively go to, to seek help. Further, it may be expected that co-locating services should make it easier for GPs to refer patients to appropriate support.

However, our findings suggest that co-location alone is unlikely to promote the Programme Mechanisms linking advice services to practice outcomes. Further, we point to the difficulties in making co-location work in primary care, which have also been identified by previous research examining other forms of 'integrating' services through co-location. For example, Lawn *et al.* (2014) state, "coordination and collaboration do not happen on their own, that co-location is not just about the bricks and mortar. It is also about strategies to bring people together in a meaningful way." (p8). In a systematic review Cameron & Lart (2003) recognised many of the barriers to co-location acting as a facilitator to integrated

working identified here, such as a lack of formal or informal regular and frequent communication. In addition, they highlighted the need for mutual trust and GP respect for the skills and contribution of other partners; sufficient administrative support; supervision and training; feedback about referrals; and, clear lines of responsibility. As described by our interviewees, allowing sufficient time for co-location to have its desired effects has been acknowledged as important (e.g. Brown *et al.* 2003, Cameron & Lart 2003). However, the active participation of both services and service funders is necessary.

Strength and limitations

The main limitation of this paper is its possible lack of generalisability to other geographic areas. Both localities were within London and served areas with high levels of multiple social disadvantage. Whilst these may be similar to other inner metropolitan areas, they may not reflect other urban and rural areas with differing socio-demographic population profiles. However, evaluations of similar services in less urban UK locations also report that, in common with our sites, welfare benefits and debt are the main issues presented (Wolverhampton Citizens Advice 2012, Derbyshire Citizens Advice 2012). Nonetheless, further work should seek to test the current findings in different geographical areas. By developing an initial programme theory, we provide a starting point to support planning and effective implementation of future services elsewhere.

Implications for research and/or practice

Further qualitative and quantitative research will help refine and test key Contextual Mechanism, Programme Mechanism and Agency components linking service provision to outcomes. Co-location of welfare advice has the potential to help practices support patient

social issues but not if co-location is limited to a physical sharing of space. Coordinated working requires individual and organisational effort, and strategic support. This should be recognised in efforts to coordinate care through co-location.

Ethical approval

The study was approved by the London-Harrow NHS Research Ethics Committee (ref: 15/LO/1260). Practice managers additionally provided informed consent for staff to be approached to be interviewed.

Acknowledgements

CW, HC and RR were supported by the National Institute for Health Research (NIHR) Collaboration for Leadership in Applied Health Research and Care (CLAHRC) North Thames at Bart's Health NHS Trust. The views expressed are those of the authors and not necessarily those of the NHS, the NIHR or the Department of Health.

Conflict of interest

One author (RL) is an unpaid volunteer for the advice service in locality 1 but was not involved in data collection.

Source of funding

This research was funded by [locality 1] Council and the School for Public Health Research. The funders had no role in the study design, collection, analysis or interpretation of the data; in the writing of the article or in the decision to submit the article for publication.

References

Abbott S. & Davidson L. (2000) Easing the burden on primary care in deprived urban areas: a service model. *Primary Health Care Research and Development* **1** (4), 201-206.

Abbott S. & Hobby L. (2000) Welfare benefits advice in primary care: evidence of improvements in health. *Public Health* **114** (5), 324-327.

Adams J., White M., Moffat S., Howel D. & Mackintosh J. (2006) A systematic review of the health, social and financial impacts of welfare rights advice delivered in healthcare settings. *BMC Public Health* **6**, 81 doi: [10.1186/1471-2458-6-81](https://doi.org/10.1186/1471-2458-6-81).

Allmark P., Baxter S., Goyder E., Guillaume L. & Crofton-Martin G. (2013) Assessing the health benefits of advice services: using research evidence and logic model methods to explore complex pathways. *Health & social care in the community* **21** (1), 59-68.

Astbury B. & Leeuw F. (2013) Unpacking black boxes: mechanisms and theory building in evaluation. *American Journal of Evaluation* **31** (3), 363-381.

Baird B., Charles A., Honeyman M., Maguire D. & Das P. (2016) *Understanding Pressures in General Practice*, The King's Fund, London.

Bloomer E., Allen J., Donkin A., Findlay G. & Gamsu M. (2012) *The impact of the economic downturn and policy changes on health inequalities in London*, UCL Institute of Health Equity, London.

Boerma W.G.W. & Verhaak P.F.M. (1999) The general practitioner as the first contacted health professional by patients with psychosocial problems: a European study. *Psychological Medicine* **29** (3), 689-696.

Borland J. (2004) *Better advice, better health. Final evaluation report*. Gwynedd, University of Wales-Bangor. Available at: <http://advicestransition.org.uk/wp-content/uploads/2015/05/Borland-2004.-Better-Advice-Better-Health-113.pdf> (accessed on 21/11/2016).

Brown L., Tucker C. & Domokos T. (2003) Evaluating the impact of integrated health and social care teams on older people living in the community. *Health & Social Care in the Community* **11** (2), 85-94.

Burrows J., Baxter S., Baird W., Hirst J. & Goyder E. (2011) Citizens Advice in primary care: A qualitative study of the views and experiences of service users and staff. *Public Health* **125** (10), 704-710.

Cameron A. & Lart R. (2003) Factors promoting and obstacles hindering joint working: a systematic review of the research evidence. *Journal of Integrated Care* **11** (2), 9-17.

Chen H.T. (2012) Theory-driven evaluation: conceptual framework, application and advancement. In *Evaluation von Programmen und Projekten für eine demokratische Kultur* (pp. 17-40). Springer Fachmedien Wiesbaden.

Citizens Advice. (2015) *A Very General Practice: How much time do GPs spend on issues other than health?* Citizens Advice. Available at: https://www.citizensadvice.org.uk/Global/CitizensAdvice/Public%20services%20publication/s/CitizensAdvice_AVeryGeneralPractice_May2015.pdf (accessed on 21/11/2016)

Dalkin S.M., Greenhalgh J., Jones D., Cunningham B., Lhussier M. (2015) What's in a mechanism? Development of a key concept in realist evaluation. *Implementation Science* **10** (49), 1-7. Doi: 10.1186/s13012-015-0237-x.

Deep End Report: GPs at the Deep End. (2015) *Improving partnership working between general practices and financial advice services in Glasgow: one year on*, Deep End Report 27, University of Glasgow.

Derbyshire Citizens Advice Bureaux. (2012) *Citizens Advice Bureaux in General Practice: Report 2011/12*, Citizens Advice Bureaux, Derbyshire.

Greasley P. & Small N. (2005) Establishing a welfare advice service in family practices: views of advice workers and primary care staff. *Family Practice* **22** (5), 513-519.

Iacobucci G. (2014a) GPs' workload climbs as government austerity agenda bites. *British Medical Journal*, g4300. Available at: <http://www.bmj.com/content/349/bmj.g4300> (accessed 21/11/2016).

Iacobucci G. (2014b) GPs increasingly have to tackle patients' debt and housing problems. *British Medical Journal*, g4301. Available at: <http://www.bmj.com/content/349/bmj.g4301> (accessed 21/11/2016).

Krska J., Palmer S., Dalzell-Brown A. & Nicholl P. (2013) Evaluation of welfare advice in primary care: effect on practice workload and prescribing for mental health. *Primary Health Care Research and Development* **14** (3), 307-314.

Lawn S., Lloyd A., King A., Sweet L. & Gum L. (2014) Integration of primary health services: being put together does not mean they will work together. *BMC Research Notes* **7** (66), 1-10.

Marchal B., van Belle S., van Olmen J., Hoérée T. & Kegels G. (2012) Is realist evaluation keeping its promise? A review of published empirical studies in the field of health systems research. *Evaluation* **18**(2), 192-212.

NVivo qualitative data analysis software. (2012) QSR International Pty Ltd. Version 10.

Parkinson A. & Buttrick J. (2015) *The Role of Advice Services in Health Outcomes Evidence Review and Mapping Study*. Consilium Research and Consultancy. Available at: www.asauk.org.uk/policy/healthandadvice (accessed 21/11/2016).

Pawson R. & Tilley N. (1997) *An introduction to scientific realist evaluation*. In: Chelmsky E, Shadish WR (Eds) *Evaluation for the 21st century: A handbook* (pp. 405-418). Thousand Oaks, CA: SAGE Publications Ltd.

Pizzo E., Turner S. & Raine R. (2014) *The Evaluation of the Haringey Welfare Hubs: Preliminary Report*. Unpublished report, UCL.

Popay J., Kowarzik U., Mallinson S., Mackian S. & Barker J. (2007) Social problems, primary care and pathways to help and support: addressing health inequalities at the individual level. Part I: the GP perspective. *Journal of Epidemiology and Community Health* **61** (11), 966-971.

Porter S. (2015a) The uncritical realism of realist evaluation. *Evaluation* **21** (1), 65-82.

Porter S. (2015b) Realist evaluation: an immanent critique. *Nursing Philosophy* **16** (4), 239-251.

Weiss C. (1997) *Theory based evaluation: past, present and future: new directions forevaluation*. San Francisco, CA: Jossey-Bass.

Wolverhampton Citizens Advice Bureaux. (2012) *Wolverhampton Citizens Advice Bureaux: the health impact of good advice*, Citizens Advice Bureaux, Wolverhampton. Available at: <http://advicestransition.org.uk/wp-content/uploads/2015/05/Wolverhampton-CAB-2012.-The-Health-Impact-of-Good-Advice-22.pdf> (accessed on 21/11/2016).

Table 1 Contextual Mechanisms, Programme Mechanisms, Agency and Outcomes

Term	Description
Contextual Mechanism	<ul style="list-style-type: none"> Pre-existing socio-cultural and organisational situation (rules, norms, values and interrelationships) in which the co-located welfare advice service is embedded.
Programme Mechanism	<ul style="list-style-type: none"> Resources, aspects or features of the service that are designed (or hypothesised) to counterbalance the status quo within the prevailing Contextual Mechanisms. Transitive, influenced by social context and amenable to alteration by human action, thus also able to influence the social context they are embedded within. May be latent.
Agency	<ul style="list-style-type: none"> Interpretations of, responses to, or behavioural changes as a result of Programme Mechanisms.
Outcome	<ul style="list-style-type: none"> Consequences of the service being implemented. These may be Intended or desired as well as unintended or unanticipated influences of the service.

Adapted from Porter (2015b)

Table 2 Participant characteristics

Sample characteristics	n	%
<i>Sex</i>		
Female	10	42
Male	14	58
<i>Role</i>		
General Practitioner (GP)	9	38
Reception staff	4	17
Practice manager	3	13
Advice staff	6	25
Funder	2	8
<i>Area</i>		
Locality 1	11	46
Locality 2	13	54
<i>Group¹</i>		
Advice	13	54
Comparison	3	13
n/a	6	25
Total	24	100

¹ Refers to GPs, practice managers and reception staff only

Table 3 Summary of Contextual Mechanisms framing the need for co-located welfare advice services in terms of the practice outcomes of interest

<p>General Practice (GP) consultations</p>	<p>Demands on GP consultations and practice staff time linked to non-health issues: - <i>Direct support</i> (e.g., appointments for help navigating the welfare system) - <i>Indirect support</i> (e.g., ill health triggered, maintained or exacerbated by underlying social situation(s))</p>	<p><i>People come to us with an agenda regarding social issues for example, if they want rehousing [...] or if they want to appeal benefits decisions, they have been told doctors' letters would help them. And then there are also the social issues where people are suffering from stress from work or housing. [51, GP, locality 2, advice group]</i></p>
<p>Practice burden</p>	<p>Increased waiting times, reduced capacity to support medical needs Lack of expertise and time to support wider determinants of health Reduced staff job/role satisfaction</p>	<p><i>It ends up in quite a high wastage of appointments, when we would rather be seeing patients for strictly medical issues. [96, GP, locality 1, advice group]</i> <i>You often feel quite dissatisfied in what we can do socially because actually that is (...) basically the crux of a lot of patients, the reason why they come in. So we can talk to them about medication or counselling but (...) no amount of sorting that kind of stuff out is going to really help address it. [13, GP, locality 1, comparison group]</i></p>
<p>Help-seeking behaviours</p>	<p>GP perceived as 'go-to location'</p>	<p><i>Patients are using the GP as a way of accessing services outside of what a GP is required to do. So other than clinical assistance, they do want help with housing for example. [73, Practice manager, locality 1, advice group]</i> <i>I do get a lot of patients saying that places like Housing Authority and Job Centre's actually do tell them to come back to see the GP to get things like letters. [13, GP, locality 1, comparison group]</i></p>
<p>Local and national characteristics</p>	<p>Local area and population characteristics; e.g., access to housing, social isolation, language barriers, deprivation. Wider structural-welfare related environment; e.g., cuts to local support services, involvement of GP/medical evidence in welfare system, changes to benefits system</p>	<p><i>There are lots of issues with the accommodation that patients are in and so a lot of consultations, even if it may not be the first thing that they present with, it is there in the background. [13, GP, locality 1, comparison group]</i> <i>They think the GP has more power, give a letter (...) [and] of course the reason they don't go to CAB because most of the CAB offices are closed anyway. [159]</i> <i>[Place] has a big turnover of patients...so patients do feel isolated because they are new to the area and don't know what's available to them. So yes they are going to come here because it's the GP and the GP they assume has the answers to everything. [73, Practice manager, locality 1, advice group]</i></p>

Table 4 Contextual Mechanism (CM), Agency, and implementation characteristics influencing Programme Mechanisms and practice Outcomes

Outcomes relevant to:	Key Programme Mechanisms	Key Agency factors	BARRIERS	ENABLERS
			(CM=Contextual Mechanism, A=Agency)	
<p>Reducing/diverting consultations away from GPs</p> <p>Reducing time spent on non-health issues</p>	<p>Providing an alternative option for patients</p> <p>Providing a signposting option for staff</p> <p>Opportunities for informal/formal interaction</p> <p>Relieving bureaucratic pressure</p>	<p>Promoting service awareness</p> <p>Signposting and service promotion</p> <p>Engaging in collaborative work</p>	<ul style="list-style-type: none"> • Lack of service reminders and feedback (A) • High staff turnover (CM) • Large practice/numbers of staff (CM) • Physical separation of co-located services (e.g. on a different floor) (CM) • Frequent turnover of services/short term commissioning (CM) • Time constraints (CM) • Practice staff view of social issues as extraneous to medical role (CM) 	<ul style="list-style-type: none"> • Proactive engagement by Practice Managers, CAB and funders (A) • Regular feedback on activity (A) • Regular service reminders (A) • Staff education/training on support offered by advisers (A) • Advertising/marketing service within and outside of GP practices (A) • Promotional support from funders (A) • Time/duration of co-location (implementation) • Socially aware GPs/acceptance of biopsychosocial model of health (CM)
<p>Reducing/diverting consultations away from GPs</p>	<p>Providing an alternative option for patients</p> <p>Providing a signposting option for staff</p>	<p>Patient consultation behaviour</p> <p>Signposting and service promotion</p>	<ul style="list-style-type: none"> • Complex and interlinked patient social/health issues (CM) • Practice policy preventing appointment gatekeeping (CM) • Referral by GP only or walk-in service open to any resident (implementation) • Perceptions of the GP as 'go-to-location' (CM) • Structural reliance on GP for medical evidence (CM) 	<ul style="list-style-type: none"> • Offering advice on a broad range of/locally relevant welfare issues (implementation) • Appointment gatekeeping (CM) • Appointment booking/option for self-referral/referral by other practice staff (implementation) • Patient communication clarifying support available from GP vs advisers (A) • Facilitation of welfare system navigation (A)

Figure 1 Illustration of the Programme Mechanisms (PM) through which co-located welfare advice services could influence practice outcomes (O). Key Contextual Mechanisms (CM), Agency (A) and programme implementation characteristics (I) acting as barriers and enablers are also shown.

