

## Prevention is better than cure, but...: Preventive medication as a risk to ordinariness?

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**Title: ‘Prevention is better than cure, but...’: Preventive medication as a risk to  
ordinariness?**

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**Abstract:**

Preventive health remains at the forefront of public health concerns; recent initiatives, such as the NHS health check, may lead to recommendations for medication in response to the identification of ‘at risk’ individuals. Little is known about lay views of preventive medication. This paper uses the case of aspirin as a prophylactic against heart disease to explore views among people invited to screening for a trial investigating the efficacy of such an approach. Qualitative interviews (N=46) and focus groups (N=5, participants 31) revealed dilemmas about preventive medication in the form of clashes between norms: first, in general terms, assumptions about the benefit of prevention were complicated by dislike of medication; second, the individual duty to engage in prevention was complicated by the need not to be over involved with one’s own health; third, the potential appeal of this alternative approach to health promotion was complicated by unease about the implications of encouraging irresponsible behaviour among others. Though respondents made different decisions about using the drug, they reported very similar ways of trying to resolve these conflicts, drawing upon concepts of necessity and legitimisation and the special ordinariness of the particular drug.

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**Introduction**

Since the 1970s, health promotion campaigns targeting cardiovascular disease prevention have focused on behaviour change associated with ‘lifestyle’ factors such as diet, smoking and exercise, thus putting the emphasis on individual responsibility for heart health (Crawford 1977, Greco 1993, Lupton 1995). However, recent policy has increased the role of the primary care practitioner in this area, for example, through initiatives such as smoking cessation clinics (Department of Health (DH) 2002) and health checks (DH 2009a). Indeed since the mid 1990s doctors have been encouraged to prescribe medication for people ‘at risk’ of heart disease, identified through opportunistic screening and risk assessment (DH 2000; Will 2005). Furthermore performance in reducing patients’ cardiovascular risk (in particular their blood pressure and cholesterol) was a key part of the Quality and Outcomes Framework under the GP contract (DH 2003), and systematic screening for cardiovascular risk was recently introduced in primary care in England and Scotland for all those over 40 (DH 2009a, Scottish Government 2009). These measures to reduce the risk of ‘at risk’ individuals will involve lifestyle advice, but also medication for cardiovascular risk reduction, such as statins, anti-hypertensives or aspirin (DH 2009b).

In the current paper we focus on one type of preventive medication – aspirin – as a prophylactic for cardiovascular disease. Aspirin is widely available in the UK, as there are no restrictions on its sale as an everyday painkiller. It is commonly recommended for

secondary prevention following a myocardial infarction (Antithrombotic Trialists' Collaboration 2002), but the last decade has seen much debate as to its efficacy in primary prevention, that is, for people who have not yet had symptoms of heart disease but may be at risk. A number of trials have been carried out to investigate this issue in different groups, and the media has followed developments, for example reporting on aspirin's proposed benefits as a preventive measure (BBC 2005a, 2008) but also uncertainty in the medical profession (BBC 2005b, 2009). Interestingly daily aspirin has more recently been reported to reduce deaths from cancer (Rothwell et al. 2010). Such attention, along with the easy accessibility of the drug, means that it is likely that some people are self-medicating in a preventive manner, but little is known about this kind of use.

In this paper we investigate responses to the idea of prophylactic aspirin among people invited to screening for cardiovascular risk and a subsequent trial of aspirin itself. We explore conceptualisations of the physical risks and benefits of the drug, along with broader understandings of appropriate action. We situate our data in the context of two broad fields of research: risk and responsibility in the prevention of heart disease, and lay views of medicine-taking.

### **Risk and responsibility in the prevention of heart disease**

The concept of individual responsibility is central to discussions of heart health in the social science literature, and is evident in the complex interplay between professional attempts to define and reduce risk and lay understandings of disease and ageing (e.g. Nettleton 1996, Griffiths et al. 2006). The science of epidemiology emerged in the 20<sup>th</sup>

century as a powerful resource for states concerned to manage the social and economic burden of illness, by orienting action around the concept of risk and risky behaviours (Lupton 1995; Nettleton 1996). Within a literature on ‘governmentality’, critiques of health promotion messages about changing this behaviour were associated with calls upon citizens to take responsibility for their health and accept the ‘duty to stay well’ (Greco 1993; Rose 1999). This paper contributes to the discussion of the ways in which lay people respond both to the communication of risk and the moral messages or ‘hidden scripts’ (Sachs 1996) which accompany it.

Classic work exploring ‘lay epidemiology’ suggested lay people do make assumptions about the link between certain behaviours and heart disease, and attempt to judge ‘coronary candidacy’ through comparisons to others, who were seen as having more or less risky lifestyles and/or physiology (Davison et al. 1989; 1991; 1992). Yet the candidacy construct also gave weight to factors such as fate or inheritance in attempting to assess one’s own risk, and paid attention to cases where unhealthy lifestyle did not lead to disease, or where people got ill despite leading apparently virtuous lives, countering any simple assumption of individual responsibility.

The candidacy construct and its associated anomalies also appeared to modify decisions about engaging in preventive behaviour in complex ways: such behaviour might be considered irrelevant in the context of the play of chance, or of inherited risk or resilience (Davison et al. 1992); conversely it could be seen as a way of ‘counter-acting the effects of heredity’ (Davison et al. 1989) for example through an increased effort to engage in a prophylactic lifestyle. More recently people with genetic conditions linked to increased risk of heart disease have been shown both to use inheritance to limit any assumption of

individual responsibility and to claim that a sense of inherited risk brings greater motivation for lifestyle change (Weiner 2009). This fits with a wider literature on the way in which genetic information is associated with new demands for prudence or responsibility (e.g. Hallowell, 1999; Novas and Rose, 2000).

Finally, in discussions about lifestyle, a discourse of moderation has been presented as both responsible and reasonable (Backett 1992). Being too concerned with one's health may have negative connotations in terms of how one may be judged by others (Cornwell 1984). For example reporting the rarity of personal illness or visits to the doctor are ways in which one can help demonstrate and maintain one's strength of character (Blaxter and Paterson 1982, Brown 2001). Thus leading a lifestyle that is sufficiently healthy, but not overly rigid would seem to be the most responsible and least risky choice.

### **Lay views of medicine-taking**

Though sociological studies of medicine-taking originally focused on unpicking compliance, a wealth of qualitative studies has challenged the idea that 'non-adherence' with prescribed drug regimens should be conceived as the failure of individual patients to comply with professional advice (for example Adams et al. 1997). Rather, studies of lay meanings of medication repeatedly imply a deliberate decision to limit drug use – associated with framing medication as a disruption to ordinary life or routines and as both physically and morally risky, for example in fears about dependency (Britten 1994, Pound et al. 2005). Such fears may pose a challenge to the acceptability of prophylactic medication, as they appear intensified in conditions requiring long term use (Hansen and Hansen 2006, Nørreslet et al. 2010).

Widespread resistance to medicine (Pound et al. 2005) associated with physical riskiness also manifests in concern about side effects; the severity of these is weighed up against the symptoms or inconvenience of the condition (e.g. Benson and Britten 2002, Hansen and Hansen 2006). Yet with prophylactic medicine use – and in the absence of an immediate impact on a person’s life – it is likely to be less clear what physical benefits, present or future, may be attributed to the drug and thus balanced against these risks (Pound et al. 2005). Furthermore, willingness to take medication relates to acceptance of and identification with a condition (for example Britten 1994, Adams et al. 1997).

Without an embodied experience of illness, identification with risk appears likely to be an important part of any decision to start or continue such medication. In addition, actively taking medication could imply over involvement with one’s health, and thus pose a moral risk. Non-prescription preparations appear to be subject to the same norms of responsible use as prescription drugs (Lumme-Sandt et al. 2000, Moen et al. 2009). Indeed demonstrating a preference for minimal medication use could be more important in the case of OTC drugs, as this is where consumers have most choice – and so the opportunity to choose responsibly (Lumme-Sandt and Virtanen 2002, Hansen et al. 2009).

It is important to note therefore that as with talk about other health behaviours, people’s accounts about medication use are suffused with the moral work they may be doing to construct themselves as responsible. Mills (1940) suggested this was because talk about future action employed ‘vocabularies of motive’ which are most typically used to explain behaviour that may be viewed as irresponsible, such as not breastfeeding (Murphy 2004). When the behaviour under discussion is less ‘untoward’, the onus may be on presenting oneself as ordinary, for example by returning to everyday domestic tasks and routines -



an accessible way of appearing responsible (Radley and Billig 1996). Nevertheless, such work has an important effect for qualitative studies investigating health beliefs, including medicine-taking; people may unwittingly emphasise examples of their own responsible behaviour in the interview situation, countering any ‘suggestion of weakness’ or threat to ‘ordinariness’ that comes with unquestioning acceptance of medical treatment (Radley and Billig 1996).

As shown, the concepts of both responsibility and risk run through the two sets of literature discussed, but in very different configurations. While beliefs about individual responsibility for cardiovascular risk may be complex, as demonstrated by the coronary candidacy construct, taking individual action to reduce the risks appears desirable. Uncertainty remains however about how people will respond to the offer of prophylactic medication following communication of their individual risk, but in the absence of a formal diagnosis. In medicine taking, responsible behaviour is often presented as a matter of avoiding drugs. This may reduce the acceptability of preventive medication, which needs to be used for many years in the absence of both specific symptoms and a clear condition with which people may identify. Thus prophylactic medication presents particular difficulties for lay reasoning. Before exploring this further through the specific example of aspirin, we explain the origins of the data.

## **Methods**

Participants were sampled from a healthy population aged 50-75 invited to participate in the Aspirin for Asymptomatic Atherosclerosis (AAA) trial.<sup>i</sup> The trial set out to identify

people with asymptomatic atherosclerosis among otherwise healthy individuals using the ankle brachial pressure index (ABPI) and to assess the efficacy of aspirin in preventing cardiovascular events in those identified (Fowkes et al. 2010). A low ABPI ( $\leq 0.95$ ) is associated with an increased risk of mortality, coronary artery disease and stroke, and is proposed to be a better predictor of disease than conventional risk factors (smoking, hypertension, and hypercholesterolemia) (Heald et al. 2006). Following screening 3350 eligible individuals with screen-detected atherosclerosis were randomised to receive either aspirin (100mg daily) or placebo for 5 years. In 2010, the trial reported that aspirin did not significantly reduce vascular events in this particular group (Fowkes et al. 2010), concurring with a meta-analysis published shortly beforehand which found aspirin to have only a limited effect for healthy individuals (Antithrombotic Trialists' Collaboration 2009). However, at the time of the qualitative sub-study reported here – while the AAA trial was in progress - there was no good evidence on this question.

Our qualitative research involved 77 individuals with different relationships to the trial: trial participants; participants who had stopped the trial medication; eligible individuals who declined to participate in the trial; individuals whose screening result made them ineligible for the trial; and individuals who did not attend the initial screening for the trial. Table 1 provides a full description of each of these groups, with numbers per group and recruitment methods.

[Table 1 about here]

Ethical approval was granted by Greater Glasgow (Community/Primary Care), Lanarkshire, and Lothian Local Research Ethics Committees. Potential respondents were

offered the choice, where feasible, of participating in either an individual interview or focus group. HE conducted the interviews and moderated the focus groups (with an assistant moderator). With written consent all were audio recorded, transcribed verbatim and anonymised.

A semi-structured topic guide was used covering three main areas: screening for cardiovascular risk, preventive medicine (focusing on aspirin), and trial participation. HE conducted the initial analysis which was inductive and interpretative, informed by the constant comparative method (Strauss and Corbin 1990, Charmaz 2006). Fieldwork was undertaken in three waves, with preliminary analysis informing subsequent waves: transcripts were read and re-read, emerging themes were noted and preliminary codes developed and the coding framework refined throughout. Coding was facilitated with NVivo (qualitative data indexing software). This paper draws upon data generated when respondents were asked their views on cardiovascular prevention and aspirin specifically.

## **Findings**

Qualitative study respondents were between 52 and 77 years old (mean = 63.7, standard deviation = 7.3). Forty-six were female, all were of 'White British' ethnicity, and there was a wide range in socioeconomic background: the median Carstairs deprivation index was 3, and the sample included individuals from all seven levels. <sup>ii</sup>

## **Clashing of norms**

The data raised three key clashes of norms. We first present two clashes that arose in relation to the use of preventive medication at the individual level. Respondents'

accounts indicated an almost unanimously positive view of prevention. Reference to the adage ‘prevention is better than cure’ was common – both when talking about prevention in generic terms or specifically in relation to aspirin:

‘I think everybody should take a preventive thing. Better to prevent it than try and cure it.’ (R2.11, stopped trial medication, now on prescribed aspirin)

‘Well prevention’s better than cure...if you find out you’ve got the lower count [‘at risk’ result] in your ankles and you’re told to take [aspirin] and you don’t take it then more fool you.’ (R4.2, ineligible for trial)

Two norms are thus apparent concerning prevention: first, that prevention of disease can only be a good thing. Second, that engaging in prevention is responsible and one’s duty, as demonstrated by the language used (for example ‘should’ and ‘fool’).

Despite these assertions, but unsurprisingly given previous literature, a dislike of taking pills in general was highly salient in respondents’ accounts, including those of trial participants. This dislike related to avoidance of ‘chemicals’, concern about side-effects and fear of dependency, for example:

‘If you’re taking a lot, it knocks the hell out your stomach [...] Given the choice, I’d rather not take medication full stop.’ (R2.6, participant who stopped medication).

‘I don’t want to be taking tablets if I can avoid it [...] I don’t want to be dependent upon medication.’ (R2.4, participant who stopped medication).

Some respondents described a degree of pride in ignorance about drugs and having avoided taking them:

‘I’m not in the habit of taking any kind of tablets you know I couldn’t tell you the difference between them, a disprin and an aspirin [...] If I’ve went through 60 years of my life without taking anything like that, I’m just gonna leave it, not take it.’ (R2.2, participant who stopped medication)

Furthermore the desire to be seen as someone not needing medication sometimes involved distancing oneself from the type of person who takes too many drugs. Such implications were not limited to respondents who took no medication; for example the following trial participant distanced her acceptance of the trial drug from others' excessive medicine use.

‘I’m not a pill popper, like some people with their six bottles.’ (R1.3, trial participant).

Thus, two norms about medication were evident: a general dislike of taking pills, and concern about moral implications of being seen as a ‘pill popper’. These norms came into conflict with shared beliefs about preventing cardiovascular disease. The desire to resist medication clashed with a sense that preventing something must be preferable to having to deal with the consequences later, while to need to avoid being seen as a ‘pill popper’ potentially clashed with the need to be seen to engage actively with prevention.

A third clash – related to implications at the population level - emerged from when respondents were specifically asked about the idea of using aspirin as a preventive medication. In terms of benefits at this level, some respondents could see the appeal of promoting a drug such as aspirin for prophylactic means, particularly to target people who appeared unable to engage in a preventive lifestyle.

‘I know that a lot of people will benefit from that, for the simple reason that they can pop an aspirin [...] they do that and still continue to have fish and chips [...] . So that type of person, it’s wonderful for.’ (R3.9, declined trial - not on medication).

Indeed it could be argued that if people were not changing their behaviour, taking a pill might be responsible action given the over-riding concern with prevention. One respondent made this argument with reference to the failure of health promotion campaigns:

‘The fact of the matter is, they’re not having success changing people’s lifestyles yet, well not seriously, so if you say, “well if you do continue to smoke and drink and do all the things that are bad for you, then at least take this aspirin, it’ll help a bit.”’ (R1.4 trial participant)

Furthermore, the idea that preventive medicine could in fact limit the damage done by lifestyle was reinforced by stories of known others for whom aspirin may have counteracted unhealthy behaviours:

‘My wife’s mother, she had heart problems as well and she always took an aspirin and it kept her going for years despite her smoking.’ (R2.7 participant who stopped trial medication).

However, respondents more typically described the type of person who would benefit from preventive medicine in a way that emphasised their own distinction from that type in terms of lifestyle, for example:

‘So that type of person, it’s wonderful for. I’m quite happy to deny myself the fish and chips, the meat, and things, and discipline myself to what I think is necessary. [...] The majority of people, 7 out of 10 people are quite happy to go along, take 4 or 5 medicinal things from the doctor, instead of an alternate lifestyle and food.’ (R3.9, declined trial - not on medication).

Although the potential benefit of preventive medication was raised by some respondents, concern about potential negative implications was more common and raised a great deal of unease. First, there was wariness about the drug being promoted as a ‘quick fix’ – an intervention that could remove the need to manage risk responsibly on an ongoing basis, i.e. by balancing out unhealthy behaviour. This was primarily presented through assertions that people should not expect miracles, without making some effort to change their lifestyle:

‘They might think it was a panacea for everything.’ (R3.4 declined trial - not on medication)

There was a general feeling that encouraging preventive medication in the context of unhealthy behaviours was not only rewarding irresponsibility, but conveying a misleading message and ‘false sense of security’. Thus many respondents insisted that lifestyle change should accompany preventive medication use. For example:

‘Without sounding like some kind of new-age person, at the same time it’s important to stress the holistic approach [...] - absolutely fine to use the chemical remedy - but you try and use the personal lifestyle approach to things as well.’  
(R4.5 ineligible for trial)

Alongside this concern, respondents also appeared bemused at the idea, or considered it unbelievable:

FG1B.3: ‘It seems much easier if all you have to do is pop a pill... You turn to the newspaper headlines, somebody picks up the Daily Mail and says, “Ooh, I’ll take an aspirin and I’ll be all right. I’ll just go and have six pints tonight and then take this afterwards and I’ll be fine.”’  
FG1B.5: ‘That’s what I mean, it’s a daft idea.’  
(Trial participants)

The perspective of someone who was engaging in such an approach came from the following respondent who was self-medicating with aspirin:

‘I take the aspirin really because I can’t stop smoking, [...] I don’t take the aspirin so I can go on smoking, I take the aspirin because I smoke and I hope that it might reduce the chances...of a heart attack. But in my own mind I probably realise that smoking does so much damage it probably won’t help, but it’s worth a try.’  
(R3.10 declined trial - self-medicating with aspirin)

So even this respondent’s account of her behaviour was accompanied by a statement that the two types of action were distinct; aspirin did not make smoking possible, rather it was a responsible choice while she had not managed to quit, but even then it could not be relied upon.

Thus the third clash of norms raised by the idea of preventive medication operated at the population level between a potentially appealing approach to health promotion and the danger of encouraging irresponsible living.

To summarise, the idea of preventive medication raised three clashes of norms. To the extent that respondents sought to resolve these conflicts, how did they present the solutions?

### **Resolution 1: Necessity and legitimised medicine taking**

When discussing the decision to take or reject prophylactic aspirin, the language of ‘necessity’ served to cut through respondents’ deliberations and present medicine taking as responsible in particular circumstances. This was apparent even for respondents who expressed a preference for avoiding medication, for example:

‘Nobody likes taking pills but if you’ve got to, you’ve got to.’ (R2.9 participant who stopped trial medication – now on prescribed aspirin)

So what would it take to convince respondents that drug taking was necessary for the individual? Despite many respondents mentioning factors that enhanced their coronary candidacy, in particular talk of family history and heredity, it was more usual for such factors to have influenced attendance for screening than be used to account for actually taking preventive drugs. When talking about the decision to take drugs, respondents tended to refer to other kinds of legitimisation, particularly advice from doctors. Indeed this was captured in one respondent’s almost rhetorical question to her fellow focus



group participants: ‘We’ve read about the supposed benefits, but have any of us here actually decided, well off my own back I’ll take an aspirin?’ (Focus Group 2)

Legitimation emerged as possible via various routes but usually seemed to involve a healthcare professional. Given the context of the current data (the AAA trial), a common route was via the ABPI screening, and receipt of an ‘at risk’ test result. While the initial result was typically given by a research nurse, it was not unusual for respondents to report having discussed it with their general practitioner (GP):

‘I went to my own doctor...I spoke to him and told him what was happening [the ABPI result] and he said, “do you want to go on aspirin?” and I said, “well it sounds like I might have to, I’d sooner be on it than nothing.”’ (R3.8 declined trial, on prescribed aspirin).

However GPs could also veto the idea of taking preventive medication in response to this measure of risk. For example one respondent reported that his GP had “pooh-poohed” the idea.

The legitimising roles attributed to the GP varied. While the respondent above described initiating a conversation, a couple of respondents insisted that they would leave the decision to their GP altogether, while others talked in terms of getting permission from the doctor for a decision taken outside the consultation:

‘I just go with what the doctor puts me on really... if he said “I wanna put you on aspirin,” I would probably say, “we’ll try it”...’ (R3.1 declined trial)

R1.6 (trial participant): ‘Well yes I would take it by myself but they say you’ve gotta get the doctor to get permission first. [...] I would need to find out if I needed it and I would take it then [...].’

R1.6’s wife: ‘My sister and her man take half an aspirin each...’

R1.6: ‘But did they ask for permission from the doctor?’

R1.6’s wife: ‘I never asked them.’

In the second quote the respondent moves between the idea of seeking permission for his preferred course of action and 'need' as something identified by the doctor. In returning to the theme of permission in relation to his wife's relatives however, he reveals that this kind of legitimisation does not appear to be a more general topic of conversation.

A couple of respondents talked less in terms of seeking permission than checking with the GP for safety – for example establishing whether aspirin would interact with any other medication. Unusually, the respondent quoted earlier who was self-medicating following her ABPI result, had not felt the need to inform her GP, although when the topic arose in the interview she suggested that she had considered checking whether one type of aspirin was preferable:

'I buy them in Superdrug, and I just take one dissolved in water, most days...maybe 5 times a week. (*You haven't told your GP or anything?*) No I haven't been to see the GP for quite a long time [...] I keep thinking about it and saying maybe I should go along and see him 'cause maybe I should be taking [sugar-]coateds if I'm going to take them as regular as that.' (R3.10 declined trial - now self-medicating with aspirin)

A special role seemed to be given to clinicians to weigh up the risks and benefits of aspirin and pronounce it 'necessary'. Again responsibility ran through these discussions. The emphasis on legitimisation shifted responsibility for the decision to the health care professionals, and having one's medication prescribed/approved in this way then lent legitimacy to the user, whose behaviour became responsible not only in taking the drug but also investigating the case for taking it appropriately.

## **Resolution 2: The special ordinariness of aspirin**

Aspirin was repeatedly claimed as known and trusted by respondents including those who declined the trial or had stopped taking the trial tablet. Factors that seemed to contribute to the feeling of knowing the drug included: the length of time that it had been around for general use; reference to its use by family members in the past; and personal experience:

‘Aspirin’s been on the go for many, many years, it was used for most things before all the modern drugs.’ (FG1A.9, trial participant)

‘My mother always had an aspirin you know every day...for years and years [...] it was just something that she seemed to know was good for her.’ (R1.3, trial participant)

‘[My doctor] gave me other tablets which I don’t take [...] I just take the high blood pressure [pills] and the aspirin. I know the aspirin - I think that does do you good.’ (R5.5, screening non-attender, on prescribed aspirin)

‘Knowing’ the drug and believing that it ‘does you good’ gave aspirin a special status.

Awareness of contemporaries who were taking it demonstrated its ordinariness and validated respondents’ own confidence in it:

‘I’ve spoken to other chaps about my age and there’s a few that are on it and ...I’m quite happy to be on it, I feel very confident about it, it’s a strange thing but I feel it’s a real help the aspirin because it’s had such good reports.’ (R5.4, screening non-attender, on prescribed aspirin)

Such awareness of aspirin’s known benefits and widespread use seemed to blur the distinction between a level of risk at which it was known to help (for example in secondary prevention) and those for which efficacy was still being weighed against harm. In our sample, this led to acceptance of efficacy in primary prevention despite its use in these circumstances still being unknown at this point, and a question for the AAA trial.

‘I thought aspirin had been a proven blood thinner and so was accepted as such, and most people, once they’ve had stroke, heart attack, anything like that without complications in the digestive system are given a daily aspirin at this moment.’ (FG2.3, participant who stopped medication)

Many respondents were happy to accept the drug as ‘safe’, and again this seemed to be associated with its known and trusted status. Susceptibility to adverse side effects from aspirin was also discussed in these terms – there was a general opinion that an individual would know by this stage in their life if they were particularly sensitive to aspirin or likely to have side effects. For example:

‘A friend of mine, she was asked to [participate in the trial] and her son-in-law who’s a doctor advised her against it because she’s had stomach ulcers and whatnot and he said, no it’s too risky to take [...] (Were you worried about any side effects?) No, no well this person, she’d had stomach trouble years and years before [...] but it didn’t worry me at all.’ (R2.5 participant who stopped trial medication – now on prescribed warfarin)

Respondents’ accounts indicated that knowing aspirin and awareness of likely manifestation of side effects, made balancing the risks and benefits easier perhaps than for other drugs:

‘I get tummy trouble, so I try to avoid aspirin if I can, I don’t take aspirin, I’m lucky if I have a couple of tablets a year and I didn’t really fancy going on a prolonged sort of dose of it.’ (R3.1 declined to participate in trial to avoid aspirin)

But most respondents – who did not feel this susceptibility – balanced knowledge of side effects against the dangers of heart disease:

‘...[aspirin] can cause ulcers... of the stomach, and there’s a little niggle, when I was getting this indigestion, I’ve got to admit I thought about that, ...but there again I think there’s a risk with all tablets. [...] if I had an ulcer, they could sort of do something about that, but if I had a heart attack, there would be no point, I probably wouldn’t be here, you know, you’ve got to weigh the pros and cons.’ (R1.5 trial participant)

To summarise this section, aspirin emerged as a known and trusted drug; awareness of its longstanding and widespread use helped establish its ordinariness, thus furthering its acceptability. Such ordinariness and acceptability was sufficient in making the taking of

aspirin a responsible choice, and provided a second way of dealing with the clashes of norms described in our first section.

## **Discussion**

This paper has introduced data about preventive medication, with a particular focus on aspirin. The idea of taking preventive medication raised dilemmas in the form of three conflicts or sites of tension. First believing that prevention could only be a good thing was complicated by the desire to avoid medication whenever possible. Second the duty to engage in prevention was complicated by the need not to be seen as a ‘pill popper’. Finally, at the population level, the potential appeal of preventive medication as an alternative approach to health promotion was complicated by unease about the implications of encouraging irresponsible behaviour. A sense of dissonance was evident not only in respondents’ accounts of their beliefs about prevention and about medication, but also in the observation that some respondents’ behaviour appeared to be at odds with some of their stated beliefs about medicine use. Yet respondents’ accounts typically resolved such dissonance with reference to two main themes: first the language of ‘necessity’ to describe circumstances where medicine-taking was considered a responsible choice; and second, in this particular case of aspirin, discussions of the drug’s familiarity due its widespread and longstanding use helped make it appear both special (among other drugs) and ordinary.

As with many qualitative studies of health and illness, our data is limited to respondents’ accounts of their actions and was potentially influenced by the methods of data gathering (as Radley and Billig 1996) and complicated by respondents’ desire to present themselves in a responsible light (Mills 1940). Furthermore, given that respondents were recruited because of their particular relationship to the trial (current trial participant, ex-trial participant who had stopped medication, eligible individual who had declined trial, and

so on) they may have felt the need to justify the decision they had made about the trial in discussion of their use of aspirin. Despite this, we found very similar themes in the data from all groups in relation to the clashes of norms raised by preventive medicine, and the emergent 'solutions'.

The positive views expressed about prevention may reflect the consolidation of the risk paradigm in healthcare over the past two decades and the penetration of government messages about healthy living (e.g. Lupton 1995, Nettleton 1996, Griffiths et al. 2006); yet the desire to appear to take prevention seriously sat awkwardly with a well-documented resistance to medication taking (Britten 1994, Pound et al. 2005). The ways in which our data reflect moral work – in which respondents present themselves as actively seeking health and managing the need to be seen to avoid medication where possible – are perhaps not surprising given previous literature (Radley and Billig 1996, Lumme-Sandt et al. 2000). However, the tension between different norms appears intensified in the novel situation that preventive medication creates making it less obvious what the responsible choice should be in comparison to more straightforward examples such as taking medicine for an established condition or following a healthy lifestyle 'to stay well' (Greco 1993). In addition, discussions of the preventive use of aspirin went beyond the dilemmas raised at the individual level, which we had not anticipated. Respondents repeatedly emphasised that the best route to prevention was lifestyle change, and barriers to lifestyle change or causes of heart disease relating to the social or physical environment (for example Davison et al. 1992, Sachs 1996) were overshadowed by concern about the 'moral hazard' represented by the offer of a preventive drug. Perhaps the greatest amount of moral work done by the respondents was

in relation to the individual level, and the idea (actual or hypothetical) of taking the drug themselves, but discussing the moral quandary at the societal level provided an easy way for respondents to demonstrate their own responsibility by distinguishing themselves from the type of person to whom preventive aspirin may appeal.

Respondents also made frequent use of the theme of ‘necessity’ to resolve some of the clashes raised by the offer of prophylactic medication. While this concept has emerged as important in previous studies of medicine taking (Moen et al. 2009, Hansen et al. 2009), it was particularly useful here; in our data uncertainty about risk and the asymptomatic nature of the risk factor (atherosclerosis) meant that consideration of personal risk factors was not sufficient alone, instead certification of legitimacy was used to justify medication taking. Legitimacy in the form of professional sanctioning allowed respondents to mitigate any admission of willingness to take drugs long term, and distinguish this behaviour from unnecessary medicine taking. Such authorised medicine-taking echoes previous literature; the importance of a doctor’s opinion in patients’ decisions about drugs has emerged in relation to both prescribed drugs such as hypertensives (see Benson and Britten 2002; Moen et al. 2009) and OTC medication (Lumme-Sandt and Virtanen 2002), though we noted that it might not be a topic for conversation outside the research interview.

Less predictably, aspirin’s longstanding presence in the home medicine cabinet, along with awareness of old wives’ tales and contemporary recommendations for its use contributed to respondents knowing and trusting the drug, and gave it a special status. Discussion of this factor appeared to offer another way out of the dilemma caused by the clash of norms. As we might expect, there was some calculative talk about the risks of



side effects (Benson and Britten 2002, Hansen and Hansen 2006), but respondents' awareness of the gastro-intestinal risks of aspirin use was minimised by the expectation that adverse reactions would be treatable, most likely limited to people with previous, probably known, susceptibility, and minor compared to the possible benefits in protection against heart disease. In our conceptualisation of aspirin's status we draw upon Radley and Billig's (1996) concept of special ordinariness. For them the concept referred to the moral work done (typically by interviewees) in countering the stigma of illness by reference to involvement in relatively mundane household work. Here we argue that our respondents' talk about the 'ordinariness' of aspirin allowed them to counter negative images of the pill popper, and present themselves as responsible medicine users.

A further finding from our study related to the use of 'others' whose behaviour could be presented as untoward or reasonable, as respondents sought to present their own choices as responsible. This kind of reasoning emerged in two distinct forms in our data. Just as 'lay epidemiology' worked through observation of other people's coronary candidacy (Davison et al. 1989, 1991, 1992), our respondents invoked a vague category of 'other people' to distance themselves from an illegitimate trade off between lifestyle change and the apparently easy option of medicine use. In this case the 'other people' were not used to sanction unhealthy behaviour but to underline the importance of taking responsibility for staying well. However we also noted that respondents referred to specific known others such as contemporaries who took aspirin to emphasise its safety and effectiveness. Though discussion of other people's behaviour has not been a strong theme in previous work on decisions about medicine use, here we suggest such talk helped present aspirin and aspirin-taking as an ordinary and acceptable means of managing risk.

## **Implications and conclusions**

Since this study was carried out, the trial in which it was embedded has reported that the benefits with regards to preventing cardiovascular events do not outweigh the risks of aspirin in this particular group – otherwise healthy individuals with screen-detected atherosclerosis (Fowkes et al. 2010). We do not know how far the attractions of aspirin reported here will change in the light of dissemination of the AAA trial results. However, research on the clinical effects of aspirin continues and the recent report that aspirin helps to prevent deaths from cancer received significant coverage by the UK media (for example, Bosely 2010) may work to confirm some lay people’s beliefs about its value in risk reduction or promoting health in general. The extent to which aspirin is given special status in lay accounts may be of concern to healthcare professionals who remain wary of the physical risks demonstrated in the AAA trial and other studies. Building on our analysis, more work might be done on beliefs about other established primary prevention drugs like statins and anti-hypertensives, which although not having quite the longstanding status of aspirin, are nevertheless gaining in familiarity. Healthcare professionals and those invested in public health may also take comfort from our respondents’ dislike of the idea of ‘trading off’ by substituting medication for lifestyle change. Yet to the extent that policy makers and practitioners continue to promote the use of some prophylactic medicine in response to risk, they may also wish to reflect on the apparent emphasis given to advice from a general practitioner in deciding that a drug was ‘necessary’ and overcoming resistance to medication. From a theoretical perspective, this

finding suggested both limits to the acceptance of individual responsibility for prevention and the continued influence of professional views in this area.

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**Table 1: Qualitative study participants: description of the different types of participant including recruitment details.**

Group name	Description of group (in terms of relationship to the trial)	N	Recruitment details
‘Trial participants’	Attended screening, eligible to participate, recruited to trial, taking trial tablet and attending annual clinic visit.	Int:9 FG:9+7	All trial participants attending annual clinic visit during a 3-week period were given invitation letter and PIL by research nurse. Contact details of interested individuals passed to [Author1], who telephoned to check willingness to participate.
‘Stopped trial medication’	Attended screening, eligible to participate, recruited to trial, but <b>had stopped</b> trial tablet, and receiving phone follow-up.	Int:11 FG:6	All individuals receiving annual follow-up phone call from trial nurse during a 1-month period were informed about the study. Contact details of interested individuals passed to [Author1], who telephoned to check willingness to participate.
‘Trial decliners’	Attended screening, eligible but <b>declined</b> to participate in trial.	Int:11	All individuals who declined to participate in the trial during a 3-month period were sent invitation letter, PIL and opt-in reply slip. [Author1] telephoned individuals who returned reply slip to check willingness to participate
‘Ineligible for trial’	Attended screening, but <b>ineligible</b> for trial due to low risk from diagnostic test (ABPI >0.95).	Int:9 FG:3+6	All individuals attending screening but ineligible for trial during a 3-week period were given invitation letter and PIL. Contact details of interested individuals passed to [Author1], who telephoned to check willingness to participate.
‘Non attendees’	<b>Did not attend</b> screening	Int:6	All individuals invited to screening during a 2-week period who did not attend, were sent invitation letter, PIL and opt-in reply slip by post. [Author1] telephoned individuals who returned the reply slip to check willingness to participate

**Key to abbreviations in Table 1:**

Int: Individual interview

FG: Focus groups

PIL: Participant Information Leaflet