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Factors influencing older nurses' decision-making around the timing of retirement: an explorative mixed method study

Older nurses and timing of retirement

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Conflict of Interest Statement

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Ethical Approval

Approval to undertake the study was obtained through the University of Greenwich Research Ethics Committee (UREC/17.1.5.4).

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ABSTRACT

Aim(s): Understand factors influencing decision making of older nurses around timing of retirement

Background: Global nursing shortages require flexible nurse retention strategies

Method(s): An explanatory sequential mixed method approach: Nurses across seven health care organisations within one integrated care system responded to an online survey (n=524). Semi-structured interviews and a focus group were conducted (n=19).

Results: Survey data confirmed age as a key factor influencing nurses' decision making. Factors associated with retention were flexible working conditions, financial considerations and feeling valued. Factors associated with attrition were poor or deteriorating health, stress, and wish for more time with family and friends. Logit regression confirmed flexible work patterns are the strongest predictors for working beyond retirement. Qualitative data revealed retirement plans are accompanied by personal milestones; the work environment heavily influence these plans.

Conclusion(s): Reasons for retirement are multifaceted but many factors are within the control of employers. Organisational policies, practices and workplace culture have a bearing on decisions surrounding the timing of retirement.

Implications for Nursing Management: Retention strategies that allow older nurses to work part-time are key and nurse managers need to proactively engage with older nurses to discuss their retirement plans.

INTRODUCTION

The House of Commons Select Committee Report into the UK nursing workforce opened with the following observation *“In too many areas and specialties, the nursing workforce is overstretched and struggling to cope with demand”* (House of Commons Health Committee, 2018, p4). This has been brought into sharp focus during the COVID-19 Pandemic where the NHS has struggled at times to cope with the volume of patients, creating additional levels of stress amongst an already stretched nursing workforce (Buchan et al., 2020; Royal College of Nursing, 2020).

Internationally, nurses and midwives are the largest component of the healthcare workforce (World Health Organization, 2016), nursing shortages a global concern (Wargo-Sugleris et al., 2018). These shortages are manifest in the UK, which ranks below the average of high-income OECD countries in terms of the number of practising nurses and the annual number of new nurse graduates relative to its population (Buchan et al., 2020). In 2015, Buchan and colleagues presented a comparative analysis of the nursing workforce across four countries and noted that rising healthcare costs, actual and projected nursing shortages, maldistribution of the workforce, ageing populations, consumer expectations and increasing demand would all impact on nurse supply requirements (Buchan et al. 2015, p. 168). Buchanan et al. (2015) predicted that the ageing nursing workforce, and projections for reductions in staffing would keep NHS nurse staffing in the policy agenda, as indeed has been the case. In the intervening period, although nurse numbers in the UK have increased (Buchan et al., 2020), this increase has arisen due to measures taken on the supply side of nursing, with insufficient attention paid to retaining the existing nursing workforce (UK Parliament, 2018).

As an overall response to a narrowing active dependency ratio (ADR) – i.e., ratio of the adult economically inactive population relative to the size of the adult population that is economically active – in an ageing society (ONS, 2021, p. 8) the UK government has

extended older employees' working lives. For the NHS in particular, this has meant significant change with the normal NHS pension age increasing from 60 to 65 years and the early retirement age moving from 50 to 55 years (Royal College of Nursing & RCN, 2016). Additionally, the default retirement age of 65 was abolished and the state pension age is due to increase to 66 by 2020, to 67 by 2028 and to 68 by 2037-39 (DWP & Department of Work & Pensions, 2016).

For nursing a key consideration in increasing effective retirement ages is the number of nurses who wish to work beyond 60. A review undertaken by Markowski, Cleaver & Weldon (2020) identified that the average age of intended retirement amongst nurses was 60.

Similarly, Nursing & Midwifery Council registration data reveals that, in September 2020, only a fifth of nurses on the permanent register were over the age of 56 (The Nursing and Midwifery Council & NMC, 2020), suggesting that comparatively few nurses who remain within the labour market intend to work beyond the age of 60.

(Markowski et al., 2020)(Markowski et al., 2020)Attrition of older nurses from the workforce results in a loss of experience, knowledge, skills and commitment (Bennett et al., 2009; Hatcher et al., 2006; Wray et al., 2009) and thus availability of teachers and mentors.

Importantly, this significant part of the nursing workforce also brings with it 'social capital.' For example, many resources that these individuals have developed via their personal and professional networks, that are often intangible, are the means through which actions are escalated, an "accumulated wisdom and knowledge, that is very hard quantify, but which represents a loss to the NHS and patients" (Watson et al., 2004, p. 275). Retaining older nurses is therefore a key component of nurse retention strategies. Factors that influence nurse retention have been widely researched and with 'push' (attrition) and 'pull' (retention) factors identified (De Preter et al., 2013; Markowski et al., 2020). The paper presented here reports on the findings of a study, which aimed to determine and further understand the

specific factors that affect older nurses' decision making around the timing of retirement and thus their decisions' on whether or not they remain within the nursing workforce.

METHODOLOGY

Design

An explanatory sequential mixed method approach (Creswell & Plano Clark, 2011) was employed to address the following overarching research question: What factors influence older nurses' decision-making regarding timing of retirement?

In line with a mixed methods study design sub-research questions were posed and addressed through the collection and mixing of quantitative and qualitative data as follows:

- Is there an association between current age and planned age for retirement?
- Would nurses consider working beyond retirement age?
- Which 'push' and 'pull' factors have the most influence over timing of retirement?

See table 1 for the list of push and pull factors used in the survey and which have been formulated based on our literature review (Markowski et al., 2020).

Data were collected from November 2017 – June 2018.

Study Participants

Nurses working across healthcare organisations were surveyed through online questionnaires sent through HR management to all nurses from all paygrades between April 2017 and May 2018. Participants were drawn from health care organisations across a geographical footprint that (at the time of the study) was referred to as a Sustainability Transformation Plan (STP) but is now recognised as an Integrated Care System (ICS) and is hereafter referred to in this

paper as such. The ICS is represented by one acute NHS trust, one community trust providing inpatient and community mental health and learning disability services as well as adult and children's community nursing services: three primary care networks, and two voluntary sector organisations (hospices). To be included in the study the nurses had to be employed on a substantive basis in one of the healthcare organisations within the ICS. Agency nurses were therefore excluded.

The final [survey] sample (n= 524) corresponded to 4.6% of the total nursing workforce across the System (ICS) (N=11,293 in 2017) - see table 2 for the participants' descriptives.

Using purposive sampling i.e., by offering an option in the survey email to be invited to an interview, eleven nurses agreed to participate (see table 3 for demographics). To capture the perspective of nurses, working in primary care, who were time short and geographically spread, one focus group was organised, in which 8 nurses participated. All eight focus group members were female nurses, over 55 years of age and employed in GP practices across one Clinical Commissioning Group within the ICS.

Ethical Approval

Approval to undertake the study was obtained through the University of Greenwich Research Ethics Committee (UREC/17.1.5.4).

Data Instrument

The questionnaire comprised 42 questions related to expected retirement age, and "push-pull" factors influencing the timing of retirement (see supplementary file 1); these factors were identified through an integrative review of the literature (Markowski et al., 2020).

Semi-Structured Interviews and Focus Group.

Interviews and a focus group were conducted using a schedule of questions as a prompt (see supplementary file 2). The interviews lasted around an hour and the focus group 90 minutes. The purpose was to gain a deeper understanding of nurses' motivations and decision-making surrounding timing of retirement.

Data Analysis

Descriptive statistics were used to obtain an overview of the sample and responses to questions about retirement intentions and planning. As the study examined expectations in terms of timing of retirement, two outcome variables were used. The first variable was planned age for retirement, obtained by asking respondents to state their intended age of retirement. However, a large number of respondents did not reply to this question (about 50 per cent of the sample) thus the percentage of missing values is high and imputations strategies could have led to misleading estimates. A binary variable distinguishing those who knew when they are going to retire and those who did not was therefore created to distinguish those who knew their expected retirement age from those who did not. The second variable arose from the question: "*If the conditions were right would you work beyond the pension age*". Responses were coded 'yes' or 'no'. Pearson's correlation coefficient was used to determine expected retirement age and whether nurses would consider working beyond retirement age. A chi-square test was also used to assess whether an association between health and timing of retirement existed. Binary logistic regression was used to analyse the influence of 'push' and 'pull' factors over timing of retirement.

The semi-structured interviews and focus group were digitally recorded and transcribed, transcripts deductively and inductively analysed according to 'push and pull' factors using Braun & Clarke's (2006) approach to thematic analysis

RESULTS

Of the 524 nurses who responded to the survey; 80% were female, 9.5% male, 11% preferred not to say. Over half the respondents to the survey were aged 50 and over (n=301); only 3% of respondents were aged between 20–29, which brought the mean age to nearly 51 years (see table 2).

Retirement Planning

More than 50% of the sample (n=273) did not know when they were going to retire.

However, for those who answered this question (n = 251) it becomes clear that the numerical ages of 55, 60 and 65 are the expected milestone to achieve, with 60 yielding the most responses.

However, for those planning or thinking of retirement, an association between current age and planned age of retirement existed. When non-responses are excluded from the model and the full sample is examined distinguishing those who knew when they would retire and those who did not, the mean age for those who were undecided about age of retirement was 49.6 and 51.8 for those who had decide.

While nearly a third of the sample (n=166) were making plans for retirement, 55% of the respondents (n=290) identified that they would be willing to continue working beyond retirement age. However, 78% of the survey respondents lacked awareness of their organisation's policies around retirement and an even higher number (86%) were unaware or unsure of their organisation's policy on flexible working (see Table 4).

Factors Influencing Retirement Decisions.

A key factor that influences decision-making around timing of retirement is personal health.

A chi-square test revealed a positive association between participants' perceived health and planned timing of retirement $r = .12$, $n = 415$, $p = .02$, indicating an association between health and timing of retirement, namely as health declines nurses are more likely to opt for retirement.

Nurses were asked to select the factors that influence their decision to remain or leave the workforce. Overall working shifts including nights had little influence on remaining or leaving, only 16% ($n=85$) respondents indicated it would influence decision to leave, while only 10% ($n=54$) indicated shift working would influence decision around remaining. A very small percentage (3% $n=14$) identified that there was nothing that would convince them to remain in nursing. The factors that had the highest level of agreement and were ranked as the top three that would motivate nurses to remain were being able to reduce hours (53%, $n=276$), financial considerations (49%, $n = 259$) and feeling valued (45% $n=240$).

INSERT TABLE 1 HERE

Respondents were asked to select the factors that would influence their decision to leave the organisation. The Nursing and Midwifery Council revalidation had limited agreement, with only 11% of respondents ($n=59$) agreeing with this statement. Likewise, only 15% ($n=79$) of respondents agreed that retirement of a partner would influence decisions on leaving the workforce. Poor or deteriorating personal health was a key factor for 55% ($n=289$) of respondents, while stress 46% ($n=245$), the wish to spend more time with family and friends (44% $n=231$) and having more time for hobbies (40% $n=212$) were ranked as the top four reasons for leaving (see table 1).

To better capture the relationship between these factors and retirement decision, the ‘push and pull’ factors influencing retirement decisions were selected as predictors for decision-making about working beyond retirement. Binary logistic regression was performed using the willingness to work beyond the retirement age as the dependent variable (coded ‘1’ when the respondents declaring being keen working beyond the retirement age) and the push and pull factors as explanatory variables. Model 1 (on the left) controls for gender and age-group whilst model 2 includes an organisation control variable so that the potential effects of the organisation where data were collected on the expectations to work beyond retirement age are controlled. No statistically significant differences are observed across the two models. Table 5 shows the results of the logit model as odds ratios (OR) and includes significance levels and a 95 per cent confidence interval.

INSERT TABLE 5 HERE

Several results flow from the table. First, it can be observed that, among the ‘pull’ factors, being able to reduce the number of working hours, being able to choose when to work or to have a fixed working pattern are positively associated with planning to work beyond retirement age. In other words, being able to reduce working hours multiplies the odds of willingness to work beyond retirement by 1.94 and 1.84 respectively in models 1 and 2. Both estimates are significant at 95 per cent. The ability to choose when to work or to have a fixed working pattern multiplies the odds by 2.66 and 2.64 and this association is significant at 99 per cent. Having the opportunity to teach and supervise less experienced staff also has a very positive impact on the dependent variable with odds ratios reaching 3.15 and 2.70 in models 1 and 2. Significant ‘push’ factors include the level of stress within the current workplace (and this is independent from the organisation as can be observed in model 2), wanting to spend more time with family and friends. Pay is also a factor, where nurses’ remuneration is considered too low for the work they undertake.

Findings from The Semi-Structured Interviews and Focus Group

Analysis of the qualitative data identified three factors, which explained decisions relating to timing of retirement: age, ageing and wisdom. These factors are discussed in the following three themes:

1. Age: Deciding on the 'right time' to go
2. Ageing: workload stress and the lack of time to plan
3. Wisdom: Adapting to work challenges and feeling valued

Age: Deciding on the 'right time' to go

The qualitative data overwhelmingly confirms that chronological age is a defining feature of retirement decisions. Most interviewees identified that they were planning or aiming to retire at 60, perhaps reflecting that most of the interview and focus group participants were older nurses. There was however a degree of inconsistency within individuals' own thoughts about retirement, indicating a great deal of wavering and uncertainty about this decision, as the following conversation reveals:

P10: Well, I'm hoping to do it [retirement] next year, September.

I: And why then, exactly?

P10: Because I'll be 60 in the August and then, I think, I just want to, just do it in September, really.... I want to retire but I don't want to retire fully, I would like to go part-time....

I: And how long could you imagine doing that?

P10: I don't know, I really don't know. ... I can't see myself stopping work and not having anything to do and nowhere to go, I think I'd be lost. No, I think I'll do it for as long as I can..

Likewise P6 observed that:

I always decided [to retire] at 60, and you cut your cloth accordingly afterwards... I don't feel like I have to stop work completely at 60, but it seemed a good point to start making the changes and cutting down, etc.

Many of the interviewees did not wish to stop working, rather they were looking for opportunities for part-time flexible working. However, as the survey data corroborated, interviewees did not know about their organisations' policies surrounding retirement or flexible working.

While reaching the age of 60 was a strong factor in decision-making, this was often rationalised with other concurring milestones, which included pension eligibility, re-validation, retirement of a spouse, family milestones such as weddings, grandchildren, and plans to move overseas back to the participants' country of origin, as illustrated in this comment from a general practice nurse in the focus group.

I plan to retire within the next three years, possibly next year. I'll revalidate in March and then I'll retire soon after that. My daughter's expecting a baby so that might be the tick because yeah, it's all getting a bit busy ... I could have taken my NHS pension already.

Ageing: workload stress and the lack of time to plan

A recurring comment throughout the interviews and focus group was the influence of stress and workload on retirement planning and decision-making, for example a soon to be retired mental health nurse reported that:

P5: Sometimes, just occasionally, on a bad day you just feel as though you want to get out. I'm not saying there's many days like that by any means but on the whole, you know, I've enjoyed the job but just the occasional bad day when there's several crises happening at once, that kind of thing, you want to be out of it, so less responsibility.

Two factors that emerged through this were the nurses' recognition that they themselves were ageing, a community nurse who had reduced hours observing that:

P2: I mean how I had the energy to work full-time and do the necessary chores in the house, I don't know, I was getting physically tired and falling asleep in front of the television in the evenings.

The focus group participants worried about the effect that ageing had on their ability to function in general practice, for example:

FG6: You know in yourself you're not performing at the same speed ... somebody said "can you just squeeze this patient in for an ECG?" And three patients later you think "I agreed to do that ECG half an hour ago" and the patient's still sitting in reception patiently waiting and you've forgotten because you got interrupted.

Concerns about being able to cope were concomitant with concerns about the potential for error, which in turn created concerns due to the potential threat to registration with the Nursing and Midwifery Council, illustrated in the following observations from a mental health nurse:

P1: It's the stress [of workload], it's the stress of you losing your PIN or getting hauled into an investigation.

One interviewee observed that the stress and workload affected ability to plan for retirement as work was all consuming:

P5: When we talk about retirement it's almost like, it's almost like retirement is not - the priority is not to retire, to enjoy yourself and have a great life. The retirement is the focus to get away from the stress and I think that stops people from thinking about how would they like their life to be, because they're so busy in this really stressful bubble that they don't really have time for themselves, to think well how will it be?

Wisdom: Adapting to work challenges and feeling valued

Due to stress as well as their own perceived difficulties in keeping up with the pace of the work, participants were keen to explore alternative working arrangements. One participant had recently changed jobs and in doing so had changed clinical specialities. Consequently, she perceived that due to her lack of experience in her new specialism and her age, younger nurses tried to protect her:

P11: I'm of an older generation, they're the younger generation, and [sighs] I felt, let me tell you how I felt, I felt like, I thought they was treating me like their mummy, kind of thing, like they're, you know, I'm too old to do this and I'm too old to do that and,

"Oh, let me do...", and I was thinking, "I can do it myself, thank you very much", I can't explain it, but it was very hard for me to deal with.

Feeling valued was a key factor in retirement planning, with recognition of the nurses' wisdom, experience and contribution to the local workforce a key factor, for example:

FG1: Like you say your doctors don't even want to consider letting you go so you do feel valued.

The nurses themselves recognised their worth, and with the benefit of hindsight a nurse who had left general practice for an education role recognised that she could have perhaps negotiated with her GP employers:

FG4: We're all accruing all this amazing experience and understanding and knowledge and then you get to the stage where you want to slow down but it's how can we as nurses perhaps become more articulate in talking to our employers around what the options would be. And I think exactly what you say, you don't bother to ask because you think the answer's going to be no and you can't see it as being a conceivable concept, but what I didn't do before I left was go to my employers and say "I could stay but I want 15 minute appointments, I want a longer break from morning surgery to afternoon break and I'm going to stop doing complex visits" because you're eating in the car, you know, going through the drive-thru at McDonalds because it's the only thing you can do. It's just not healthy.

A lack of wellbeing interventions provided by the employer was notable in all interviews and the focus group, thus indicating missed opportunities by employers to ameliorate stress and support resilience.

DISCUSSION.

The quantitative data shows a relatively binary decision about retirement age, namely the age at which survey respondents anticipated retiring peaked at 55, 60 and 65. This finding was supported within the qualitative data which clearly indicated that nurses anticipate and make decisions about retirement based on age, with many of the interviewees citing 60 as the age at which they were planning to retire. The findings from this study suggest that for older nurses once the reality of retirement dawns, many become unsure about leaving professional

practice and to this end these nurses are 'retainable'. However, retaining older nurses requires employers to think about their specific needs and requirements. Critically, the interviewees cited the pace of work, their age, and stress as key factors that influenced decision-making on timing of retirement, stress also identified in the survey data as the 2nd most pertinent factor influencing a decision to leave. Emerging anecdotal and research evidence (for example: Labrague & Santos (2020)) clearly illustrate the levels of stress and burnout that the pandemic has brought to frontline nurses. For the older nurse this experience may now be a decisive factor when deciding on timing of retirement, potentially accelerating retirement plans.

The quantitative data reveals that the single biggest influencing factor in determining timing of retirement is the ability to choose when to work, i.e. if they can choose their working hours nurses are almost three times as likely to remain in the workforce. Such a finding is consistent with what is observed for the whole working population in the United Kingdom: flexible working time arrangements contribute, to a certain extent, to extending working lives (Wels 2018). However, it was evident across the datasets that the nurses did not know of employers' policies around flexible working/retirement, had not had discussion relating to possibilities, and did not know how to request flexible working with a view to phased retirement. As a consequence, nurses do not routinely discuss their retirement plans with their managers/employers, nor negotiate the terms on which they might remain. Offering flexible working as a route to retirement is likely to make experienced older nurses feel valued and gives them control over managing their (work) time which is an important consideration as the logit model has demonstrated that nurses who can choose their work pattern are three times more likely to remain and those who can reduce hours are twice more likely to remain. Options around flexible working, and strategies to enable staff to feel valued, as well as stress and finance are all in the gift of the employer, and all these factors play into the other key

considerations for older nurses, the desire to spend more time with friends and families (flexible working) and having more time for hobbies including travel. It is evident therefore that retaining older nurses is within the 'gift' of the employer.

LIMITATIONS

As noted above older nurses aged over 50 were more represented in the survey compared to those aged 20-39, which is probably a reflection of how relevant the survey was seen by older nurses and therefore is more likely to represent the perspectives of older rather younger nurses.

The sample of nurses participating in the interviews and focus group was self-selected.

Notwithstanding this, data from other studies have recorded proportionally higher number of older nurses working in community and primary care (Roland et al., 2015; Swift & Punshon, 2019), thus the data may be less generalisable to nurses working in the secondary/acute care sector, but does give a representation of the views of older nurses working across the ICS location studied.

CONCLUSIONS

The reasons why older nurses leave the profession are multi-faceted, but many factors are also wholly within the control of employers and can be impacted on through local organisational policies that are devised for, or explicitly include, older nurses as they approach retirement. If older nurses have opportunities for flexible working reducing their working hours, which allows them to manage stress and have more time for family and friends, they are likely in turn to have opportunity to recuperate and recover from the physical and mental tiredness associated with demanding roles. A particular focus on creating a workplace culture which makes adjustments for older nurses while respecting the experience,

skills and social capital these nurses bring is an essential consideration for retention of the older nursing workforce.

IMPLICATIONS FOR NURSE MANAGERS.

It is imperative that managers proactively engage early with older nurses, as findings from this study suggests that these nurses do indeed plan for and consider retirement for some time. Trust/organisational policies around flexible working and retirement need to be more accessible, with discussion around future plans-included in staff appraisal/annual review, providing a platform for older nurses to talk over their plans for retirement if they so choose.

Stress affects all ages and staff in different ways, but health and wellbeing interventions to ameliorate stress and promote wellbeing need to be tailored for older nurses, to create environments that are conducive to both the capabilities and limitations of the older nurse.

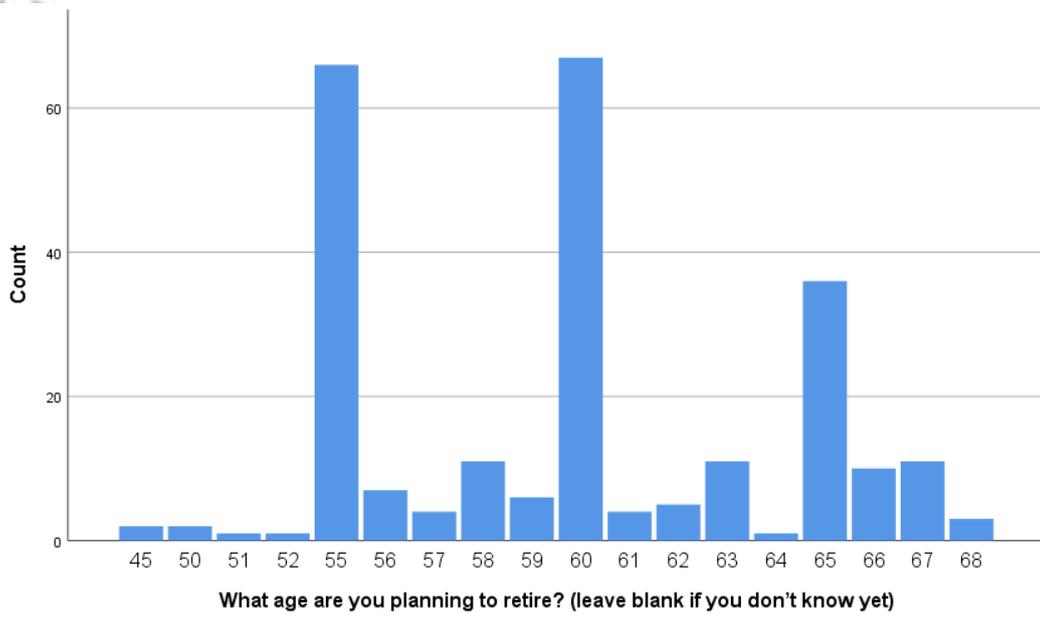
Retention strategies that allow older nurses to work part-time alongside strategies to ensure that older nurses feel valued are key in retaining the experienced workforce.

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Figure 1 Expected retirement age milestones



Accepted Article

Table 1 Push and Pull factors

Pull factors - Factors Influencing Decisions to Remain	N	Push factors - Factors Influencing Decisions to Leave on or Before Retirement Age	N
Being able to reduce the number of hours I work	276	Poor or deteriorating health	289
Financial considerations	259	I experience too much stress to make continuing to work worthwhile	245
Recognition that my contribution is valued by my organisation	240	I want to have more time for family and friends	231
Being able to choose when I work or have a fixed working pattern	226	I want to take up or have more time for leisure and hobbies	212
Being able to continue working as a member of a team	199	Lack of flexibility in number of hours worked	166
Being enabled to continue in current role with same responsibilities	125	My contribution is not valued by my organisation	141
Having opportunity to teach and supervise less experienced staff	113	Remuneration is not sufficient for the work I put in	122
Having opportunity to mentor less experienced staff	99	Financially I do not need to work	105
Having less [work] responsibility	91	Working long days (10 - 12 hour shifts)	84
Having a less physically demanding job	77	I do not enjoy my work	84
Not working weekends any more	65	I have too much responsibility in my current role	83
Not working nights any more	54	Working nights	83
Not working shifts any more	50	Working shifts	80
		My partner has or is retiring	79
		Working weekends	78
		NMC Revalidation	59

Table2 Descriptive information for survey respondents

Variable	Type	Modalities	Mean	N
Gender	<i>Categorical</i>	Female		420
		Male		50
		Missing – do not say		54
Age	<i>Numeric</i>		50.81	
		NA	53	
Age group	<i>Categorical</i>	21-45		95
		45-49		349
		60-70		26
		70+		1
Paygrade	<i>Categorical</i>	5		57
		6		137
		7		132
		8.a.		63
		8.b.		21
		8.c.		15
		8.d.		7
		Other		11
		Not known		81
What age are you planning to retire?	<i>Categorical + numeric</i>	Known	77.28	60
		Not known		273
If the conditions were right would you work beyond the retirement age?	<i>Categorical</i>	Yes		290
		No		153
		Missing		81

Table 3: Summary of interviewees' details

Field of Nursing	M/F	Age	Full time (FT)/ part time (PT)	Pension	Managerial position	Caring responsibility
Adult	F	57	PT (0.5)	NHS and other	No	No
Mental Health	F	42	FT	NHS and other	No	Yes
Adult	F	59	PT (0.5)	NHS	No	Yes
Mental Health	M	61	FT	NHS and other	Yes	Yes
Mental Health	M	58	FT	NHS pension	No	No
Adult	F	60	PT (0.8)	NHS pension	No	No
Adult	F	53	PT 4 (0.8)	NHS and other	Yes	Yes
Mental Health	M	59	PT (0.7)	NHS	Yes	Yes
Adult	F	56	PT (0.8wte)	NHS	Yes	Yes
Adult	F	59	FT	NHS and other	No	Yes
Mental Health	M	27	PT (0.5)	None	No	No

Table 4. Participant's awareness of policies on retirement

	Yes	No	Don't Know.
Does your current employer have a policy to support a flexible approach to retirement?	22% (n=100)	11% (n=48)	67% (n=298)
Are you aware how requests for flexible retirement are evaluated and managed at your workplace?	14% (n=62)	66% (n=292)	20% (n=91)
Has your line manager incorporated retirement planning into your appraisal discussions?	0.7% (n=3)	93% (n=386)	6.3% (n=28)

Table 5. Factors Influencing the odds of working beyond retirement

		Model 1				Model 2			
		OR	Sig.	95% CI		OR	Sig.	95% CI	
				CI-	CI+			CI-	CI+
Pull	Being enabled to continue in current role with same responsibilities	1.30	0.38	0.72	2.32	1.26	0.44	0.70	2.28
	Being able to reduce the number of hours I work	1.94**	0.02	1.12	3.36	1.84**	0.03	1.05	3.22
	Being able to choose when I work or have a fixed working pattern	2.66***	0.00	1.55	4.55	2.64***	0.00	1.53	4.56
	Not working shifts any more	0.37*	0.08	0.12	1.12	0.44	0.16	0.14	1.37
	Not working nights any more	0.66	0.40	0.25	1.73	1.60	0.45	0.48	5.38
	Not working weekends any more	1.06	0.91	0.40	2.82	0.74	0.58	0.26	2.11
	Having a less physically demanding job	1.01	0.97	0.50	2.03	1.00	0.99	0.49	2.03
	Having less [work] responsibility	1.07	0.84	0.56	2.06	1.03	0.94	0.53	1.99
	Being able to continue working as a member of a tea	1.50	0.15	0.86	2.62	1.42	0.23	0.80	2.51
	Having opportunity to mentor less experienced staff	0.85	0.75	0.30	2.35	0.97	0.96	0.34	2.75
	Having opportunity to teach and supervise less experienced staff	3.15**	0.02	1.20	8.29	2.70**	0.05	1.02	7.17
	Financial considerations	1.32	0.29	0.79	2.20	1.24	0.42	0.74	2.09
Recognition that my contribution is valued by my organisation	1.00	1.00	0.57	1.76	1.08	0.80	0.60	1.92	
Push	Poor or deteriorating health	1.57	0.11	0.91	2.72	1.56	0.11	0.90	2.71
	I experience too much stress to make continuing to work worthwhile	0.44***	0.00	0.25	0.76	0.41***	0.00	0.23	0.72
	I have too much responsibility in my current role	0.80	0.50	0.41	1.53	0.81	0.53	0.42	1.57
	Lack of flexibility in number of hours worked	0.79	0.40	0.45	1.38	0.84	0.54	0.47	1.48
	Working shifts	1.38	0.55	0.49	3.88	1.66	0.35	0.58	4.77
	Working long days (10 - 12-hour shifts)	0.89	0.79	0.38	2.07	0.84	0.70	0.36	2.00
	I do not enjoy my work	1.66	0.17	0.80	3.46	1.41	0.37	0.67	2.96
	My partner has or is retiring	0.80	0.48	0.44	1.48	0.83	0.57	0.45	1.56
	I want to take up or have more time for leisure and hobbies	0.68	0.19	0.38	1.22	0.66	0.17	0.37	1.20
	I want to have more time for family and friends	0.54**	0.04	0.30	0.97	0.56*	0.06	0.31	1.02
	Financially I do not need to work	1.00	0.99	0.55	1.79	1.09	0.78	0.60	1.99
	NMC Revalidation	1.00	1.00	0.51	1.98	0.96	0.90	0.47	1.94
	My contribution is not valued by my organisation	1.47	0.21	0.80	2.69	1.60	0.13	0.87	2.96
	Remuneration is not sufficient for the work I put in	0.85	0.59	0.47	1.53	0.90	0.73	0.49	1.64
	Constant	2.23	0.32	0.46	10.91	1.79	0.48	0.36	8.96

Note: the model looks at the association between declaring being keen working beyond retirement age and the predetermined factors explaining the retirement decision (pull and push). Both models control for the age group and gender. Model 2 adjusts for the organisation to control for workplace environment. Results are in odds ratio and 95 per cent CI were calculated. Significance level should be interpreted as follow: ***: < 0.01 ; **: <0.05 ; *: <0.10