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## **PROFESSIONAL DOCTORATES**

**The importance of participation in psychiatric hospital: Experiences of treatment planning and socio-economic predictors of admission.**

Golightly, Mark

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**The importance of participation in psychiatric hospital: Experiences of treatment planning and socio-economic predictors of admission.**

Mark Golightly  
North Wales Clinical Psychology Programme



PRIFYSGOL  
**BANGOR**  
UNIVERSITY

Submitted in partial fulfilment for the degree of  
Doctorate in Clinical Psychology

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## **Declaration**

I hereby declare that this thesis is the results of my own investigations, except where otherwise stated. All other sources are acknowledged by bibliographic references. This work has not previously been accepted in substance for any degree and is not being concurrently submitted in candidature for any degree unless, as agreed by the University, for approved dual awards.

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## **Thesis Abstract**

This thesis examines the influence of different forms of participation in psychiatric hospital admission, and inpatient psychiatric treatment planning. The first chapter presents a systematic review and meta-synthesis of qualitative studies into patients' experiences of treatment planning and decision making in psychiatric hospital. We found across the twenty one studies reviewed, that the degree and quality of participation possible in inpatient systems has important emotional and psychological consequences for patients. A novel model – the 'maze' was developed which describes the synthesis of patient experiences. We suggest ways for services to use the findings of the review to inform ward-based interventions to facilitate reciprocity in decision making and provide opportunities for patients to reflect on the impact of practices.

The second chapter describes a spatial epidemiological investigation into the relative utility of political participation and income deprivation as predictors of neighbourhood level psychiatric admission rates across Wales. Multilevel regression modelling was used to account for non-independent, non-normally distributed outcome data and showed that whereas neighbourhood political participation is associated with lower admission rates, this association is not significant when neighbourhood income deprivation is taken into account.

In the third chapter, the results of the literature review and empirical paper are discussed in the context of relevant theory, and methodological considerations, clinical implications and personal reflections are explored.



## **Chapter 1: Literature Review**

“To be informed, to be motivated, to argue and to understand why” Experiences of treatment planning in psychiatric hospital: A systematic review and qualitative meta-synthesis.

### **Qualitative Health Research:**

[https://www.sagepub.com/sites/default/files/upm-binaries/25187\\_QHR\\_Manuscript\\_Guidelines\\_11\\_08.pdf](https://www.sagepub.com/sites/default/files/upm-binaries/25187_QHR_Manuscript_Guidelines_11_08.pdf)

***“To be informed, to be motivated, to argue and to understand why” Experiences of  
treatment planning in psychiatric hospital:***

**A systematic review and qualitative meta-synthesis.**

Mark Golightly<sup>1</sup> and Dr. Gemma Griffith<sup>2</sup>

1. North Wales Clinical Psychology Programme, School of Psychology, Bangor  
University, Bangor, UK
2. Centre for Mindfulness Research and Practice, School of Psychology, Bangor  
University, Bangor, UK

**Corresponding Author:** Mark Golightly, North Wales Clinical Psychology Programme,  
School of Psychology, Bangor University, Bangor, UK. Email: markjgolightly@gmail.com

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inpatient treatment planning

## **Abstract**

Understanding patients' experiences of inpatient psychiatric treatment planning is crucial if national and local policy are to address persistent discrepancies between professional and ethical guidelines, and clinical practices known to cause distress. A systematic qualitative meta-synthesis reviewed twenty one studies into patient experiences of inpatient treatment planning using meta-ethnography. Treatment planning had the potential to strengthen or threaten patients' individual identity, and to cause or relieve distress. Patients are required to discover and negotiate decision making systems and practices in the context of reciprocal or antagonistic relationships with staff, and realise plans which either serve to restore previously valued identities, or prolong engagement with mental health services. Inpatient services should consider ways to help patients reflect on the personal impact of treatment planning practices, provide support for staff and patients to form reciprocal working relationships, and address cultures and assumptions that may result in iatrogenic harm.

## **Introduction**

There is strong evidence suggesting that inpatient psychiatric services do not consistently meet legal, policy and best-practice guidance stating that all patients, including those involuntarily hospitalised, should be routinely and substantially involved in decisions about the care they receive (Hopkins, Loeb & Fick, 2009; Wood & Alsawy, 2016; Bee, Price, Baker & Lovell, 2015).

For some patients, psychiatric hospital provides feelings of relief and security during times of distress (Hopkins, Loeb & Fick, 2009; Wood & Alsawy, 2016), a significant however, experience a distressing, humiliating lack of influence over their lives and treatment choices. They feel confused by a lack of clear information, out of control and powerless (Nugteren et al., 2015; Wood & Alsawy, 2016). A Care Quality Commission (2009) survey found that only 44% of service-users felt safe during hospital admission, 50% reported having opportunities to discuss their care and 33% reported definite involvement in their care. These findings should be surprising given the emphasis placed on shared decision making in the care planning process by professional bodies in the United Kingdom, yet this 'translational gap' between policy and decision making practice is widely acknowledged (Bee, Price, Baker & Lovell, 2015).

Patients in need of inpatient care are often those with the most complex problems and treatments plans are often made in the context of risk and substance use issues, and at times when patients are extremely distressed (McCrone, Dhanasiri, Patel, Knapp, & Lawton-Smith, 2008). It is generally acknowledged however that patients' perspectives, experiences and preferences should be an important source of evidence upon which decisions are made, and the ethical basis for approaches broadly termed shared-decision making (SDM) is clear (Drake,

Deegan & Rapp, 2010; Slade, 2017). Moreover, there is evidence for improved treatment outcomes, and patient self-esteem when services employ SDM practices (Crawford et al., 2002; Joosten et al., 2008; Slade, 2017) although their use in services is impeded by various factors including organisational pressures (e.g. limited resources, outcome focussed targets), philosophical tensions (i.e. biomedical versus person-centred care), and certain attitudes and beliefs including persistent doubts as to the decision making capacity of distressed patients (Bee et al., 2015; Drake et al., 2010).

“Increasing choice and reducing compulsion” are proposed in the recent independent review of the British Mental Health Act (Department of Health and Social Care, 2018) as two of the primary aims of any updated legislation, and to make shared decision-making, as far as possible, the basis for all decisions made under the act (p.70). Critical reviews of this publication by patient groups such as the National Service User Network (2018) highlight both the difficulty in translating principles and guidelines into statutory practice, and a need for further research into patient experience of secondary and tertiary mental-health services.

Reviews have investigated experiences of inpatient settings broadly (Nugteren et al., 2015; Wood & Alsawy, 2016); treatment planning in mental health (Bee et al., 2015); and experiences of involuntary treatment (Seed et al., 2016), but none so far have specifically examined patients’ experiences of the procedures and processes used to make treatment choices in psychiatric hospital. Given the current, pressing need for improved understanding of patients’ experiences of all aspects of mental health inpatient care, our aim is to review and synthesise qualitative studies examining peoples’ experiences of decision-making and treatment planning in inpatient psychiatric settings.

## Methods

We used Meta-ethnography (Noblit & Hare, 1988), arguably the best described approach to qualitative synthesis, and the focus of recent efforts to improve methodological rigour and reporting quality. Meta-ethnography suited our aim in that the process is designed to create novel theories and/or models. The method follows the eMERGe checklist for reporting quality in meta-ethnography (France et al., 2015; France et al; 2019) and the original seven phase process of Noblit and Hare (1988). Following consultation with service-user representatives, and referencing the linguistic distinction in the Mental Health (Wales) Measure (2010), we describe study participants as ‘patients’, referring only to the specific status of receiving treatment in hospital.

### *Phase one – Getting Started*

The lead researcher (MG) is a trainee clinical psychologist with experience of inpatient psychiatric settings where treatment decisions were predominantly made within a biomedical framework. Clinical Psychology training emphasises psychological and social factors in the understanding and treatment of mental health problems and it should be acknowledged that this will influence every step of the review process. The meta-ethnography was conducted in collaboration with the second author (GG) who was involved in the triangulation of the data at each stage of the analysis. The aim of triangulation is to bring potential author bias to light and to ensure that as far as possible, the analysis is based on the data, not the biases of the authors. Researcher reflections, including possible biases and emotional reactions to data were recorded in GoogleSheets spreadsheets used to record the steps in defining the research question, data extraction data and analysis.

### *Phase two - Deciding what is relevant to the initial interest*

The research question, search strategies (see Table 1) and inclusion/exclusion criteria were developed iteratively, guided by the STARLITE mnemonic (see Table 2, Booth, 2006). Preliminary literature searches were conducted, with the output reviewed and used to refine the question and search terms. At first, we were interested in experiences of discrete treatment planning meetings ('ward rounds', or 'multidisciplinary team-meetings') which are the focal point for decision-making in hospitals (Royal College of Psychiatrists, 2017). Searches returned few studies specifically examining ward rounds or other formal treatment planning meetings or practices (e.g. models of shared decision making) and we therefore widened the scope of the review to all formal and informal instances of treatment planning. Given our inclusive approach to study selection, clear criteria were set for defining treatment planning rather than general experiences of life in hospital (appendix 1). Clinical experience and initial reading indicated that practices conducted in hospital overlap with those in the community. However, it felt reasonable to conclude that patients are exposed to experiences in hospitals sufficiently different to warrant separate investigation. We therefore included studies specifically addressing inpatient treatment planning, plus those which addressed broader issues (e.g. inpatient experiences generally), providing they contained data relating to our question about inpatient treatment planning. Only studies in which it was clear that researcher generated interpretation was applied to qualitative data were included. Generally, such interpretive richness does not result from approaches which summarise qualitative data numerically (e.g. content analysis) but as descriptions of methodologies do not always correspond to the

approach actually adopted (Sandelowski, Barroso & Voils 2007), we checked all studies returned by the search reporting qualitative methods. Criteria and definitions were formulated by MG in consultation with GG.



Table 1.

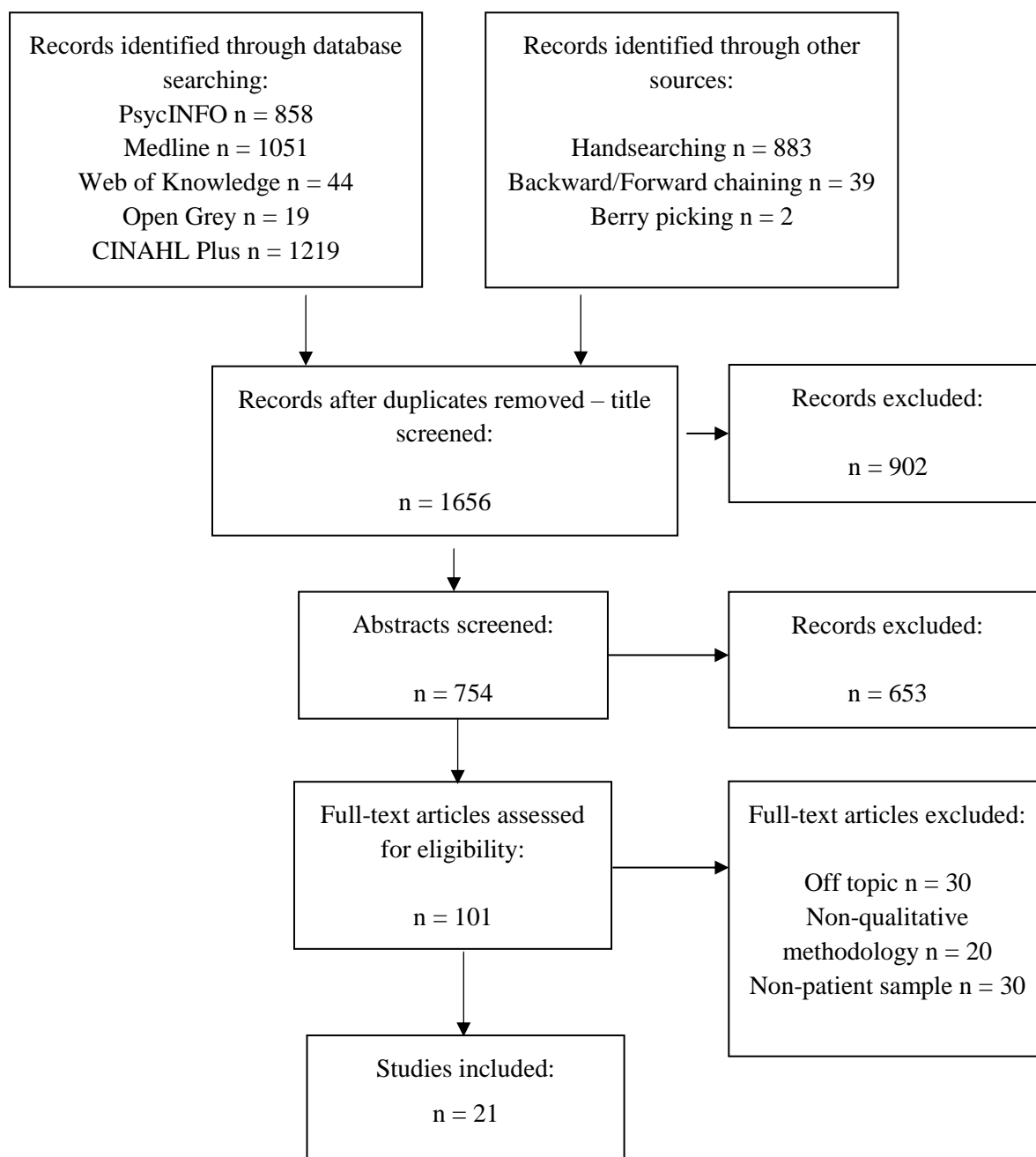
*Sampling and search strategies based on the STARLITE (Booth, 2006) mnemonic.*

Element	Approach
<b>S:</b> Sampling strategy	Given the limits to our area of interest described above, a selective sampling approach was most appropriate.
<b>T:</b> Type of studies	Published, peer reviewed
<b>A:</b> Approaches	<p>We adopted a four-step process to the search (Sandelowski, Barroso &amp; Voils 2007),</p> <ul style="list-style-type: none"> <li>• Electronic database searches</li> <li>• Hand-searching key journals (Journals proven to be a source of relevant studies were hand-searched: International Journal of Social Psychiatry, Journal of Mental Health and Journal of Psychiatric and Mental Health Nursing. Acta Psychiatrica Scandinavica, BMJ, British Journal of Psychiatry, General Hospital Psychiatry, International Journal of Mental Health Nursing, International Journal of Nursing Studies, Journal of Advanced Nursing and Psychiatric Bulletin),</li> <li>• Backward and forward chaining. Searching the citations and citing articles of studies found in previous searches.</li> <li>• Berry picking. Studies found through non-systematic approaches.</li> </ul>
<b>R:</b> Range of years	January 1990 - November 2018 - the aim was to achieve a sample that represented contemporary clinical practice, and was large enough to reach theoretical saturation.
<b>L:</b> Limits	Studies published in English
<b>I:</b> Inclusion and exclusion	See Table 2
<b>T:</b> Terms	<p>Example terms: <i>(qualitative OR “grounded theory” OR “thematic analysis” OR “content analysis” OR “field notes” OR narrative* OR “audio recording” OR “focus group*” OR interview* OR ethnograph* OR phenomenologic* OR perspective* OR experien* OR view* OR opinion* OR perception*) AND (psychiatr* OR “mental health” OR psych* OR “personality disorder*” OR depress* OR anxi* OR stress* OR “eating disorder*” OR bipolar OR mani*) AND (inpatient OR hospital* OR “psychiatric hospital” OR residential OR detained OR involuntary OR unit OR ward) AND (plan* OR “care plan*” OR “ward round” OR “multidisciplinary” OR MDT OR collaborat* OR goal OR “goal setting”)</i></p>
<b>E:</b> Electronic Sources	PsycINFO, Medline, Medline In-Process, Web of Knowledge, CINAHL Plus, OpenGrey (for abstracts, reports, policy documents).

Table 2.

*Inclusion and exclusion criteria*

	<b>Include</b>	<b>Exclude</b>
<b>Age of participants</b>	Adults, older adults	Young people, adolescents
<b>Sample</b>	Patients, mixed samples (only where it is clear that data refers to patient experiences)	Staff, carers, mixed samples (with analyses/findings that don't clearly differentiate data derived from non-patient groups)
<b>Setting</b>	Psychiatric inpatient, acute, rehabilitation, forensic, older adult, mixed samples (only where it is clear that data refers to inpatient experiences)	Learning disability, eating disorder, community, mixed samples (with analyses/findings that don't clearly differentiate data derived from inpatient groups)
<b>Methods</b>	Qualitative methodology whereby researcher interpretation is applied to the data - Interpretative thematic analysis, phenomenological approaches, grounded theory. Content analysis where authors have provided interpretive commentary.	Quantitative analysis. Analyses in which qualitative data are described numerically (e.g. frequencies, counts) with no evidence that researchers applied interpretation.
<b>Focus of research</b>	Question relates to inpatient experiences and includes findings referring to the planning of individual treatment.	Findings with no reference to individual treatment planning (see appendix for further definitions of 'treatment planning')
<b>Type of publication</b>	Primary research reports, peer reviewed,	



*Figure 1. PRISMA (2009) flowchart*

### *Search results*

Twenty one studies published between 1999 and 2018 met the inclusion criteria (see Figure 1 and Table 3). The population of the combined studies was  $n=451$  patients, aged between 18 and 75, at least  $n=218$  of whom were female (two studies did not report gender). All studies reporting the ethnicity of their participants reported a majority of white participants. Seven studies were conducted in the United Kingdom, four in Sweden, two each in Denmark and Canada, and one each in Australia, Finland, Iceland, The Netherlands, Northern Ireland, and Norway. Eight studies recruited from acute settings with others recruiting from a range of open, secure, forensic, rehabilitation, community inpatient, psychiatric intensive care, and supported housing settings. Three studies did not report the specific setting. Seventeen studies reported the mental health act status of patients with  $n=184$  involuntary,  $n=46$  voluntary,  $n=30$  detained in forensic settings, and  $n=191$  patients whose legal status was not reported. Eighteen studies collected data using interviews, one used focus groups and two used a combination of both methods.

Table 3..Studies included in the meta-ethnography

Source study (study number)	Country setting	Sample	Ethnicity	Hospital setting type	Reported method of data collection	Reported method of data analysis	Reported study aim
1 Goodwin (1999)	United Kingdom	n=110 (56 female)	not reported	Acute and Rehabilitation	Semi-structured interviews	Grounded theory and content analysis	To examine the views of patients in adult in-patient psychiatric services
2 Olofsson & Jacobsson (2001)	Sweden	n=18 (12 female), aged 19-52, previously involuntary inpatients, psychosis was the most common diagnosis	not reported	Not specified	Narrative interviews	Content analysis and thematic analysis	To describe involuntary patients' narrated experience of coercion, and their thoughts on how to prevent coercion
3 Johansson & Lundman (2002)	Sweden	n=5 (3 female), aged 27-49, previously involuntary inpatients	not reported	Not specified	Semi-structured interviews	Phenomenologic hermeneutic method	To gain a deeper understanding of the experience of involuntary psychiatric care

Table 3 (continued)

4	Koivisto, Janhonen & Väisänen (2004)	Finland	n=9 voluntary patients recovering from psychosis	not reported	Acute	Semi-structured interviews	Descriptive phenomenology	To describe patients' experiences of being helped during inpatient admission
5	Gilburt, Rose & Slade (2008)	United Kingdom	n=19 (9 female), aged 25-60, currently admitted, collectively had inpatient stays in over 10 hospitals in England	n=13 white British, n=1 white European, n=3 Black British, n=2 Asian British	Acute	Focus group and semi-structured interviews	Thematic analysis	To explore experiences of admission to acute psychiatric hospital from the perspective of services users
6	Lilja & Hellzén (2008)	Sweden	n=10 (7 females), aged 32-64, range of diagnoses including psychoses, anxiety and mood disorders, personality disorders, experience of institutional and acute settings	not reported	Psychiatric activity centres	Semi-structured interviews	Qualitative content analysis	To understand former patients' experiences of inpatient psychiatric care
7	Walsh & Boyle (2009)	Northern Ireland	n=18 (11 female), mean years of experience=14.3, mean number of admissions=10.7	not reported	Acute	Focus group	Content analysis	To explore psychiatric inpatients' ways of coping, and how acute inpatient psychiatric hospital services facilitate recovery

Table 3 (continued)

8	Gault (2009)	United Kingdom	n=11 patients with repeated compulsory admissions, n=8 carers	n=7 European, n=11 Afro-Caribbean, n=1 Asian	Not specified	Semi-structured interviews	Grounded theory	To analyse service user and carer perspectives on medication compliance and compulsory treatment
9	Johansson, Skärsäter & Danielson (2009)	Sweden	n=10 (8 females), aged 18-55, voluntary (n=6), involuntary (n=3), forensic care (n=1), bipolar disorder (n=6), major depression (n=2), anxiety disorder (n=1), anorexia nervosa (n=1).	not reported	Acute	Semi-structured interviews	Content analysis	To elucidate the meaning care has for patients on a locked acute psychiatric ward
10	Storm & Davidson (2010)	Norway	n=20 (13 female), aged 18-70, 16 voluntary, 4 involuntary, 2 on first admission, 18 had a history of multiple admissions.	not reported	2 Inpatient community mental health centres	Semi-structured interviews	Content analysis	To explore inpatients' perspectives on involvement in their care planning, and providers' experiences with encouraging user involvement in care planning and service provision

Table 3 (continued)

11	Thibeault, Trudeau, d'Entremont & Brown (2010)	Canada	n=6 (2 female), aged 25 to 75, diagnosed with major mental illness	not reported	Acute	Semi structured interviews	Phenomenology	To understand how patients and staff on an acute psychiatric unit experience the psychological, physical, social, political, and spiritual components of hospitalization
12	Petersen et al. (2012)	Denmark	n=12 (9 female) aged 22 to 45, schizophrenia (n=8), manic-depressive disorder (n=3), OCD (n=1), depression (n=4), multiple diagnoses (n=4)	not reported	Supported housing providing mental health rehabilitation	Individual and group interviews	Phenomenologic hermeneutic approach	To explore service user involvement in supported housing schemes during rehabilitation
13	Katsakou et al. (2012)	United Kingdom	n=59 (25 female), schizophrenia (n=27), affective disorder (n=20), other diagnosis (n=8)	n=37 White, n=14 Black, n=6 Asian, n=2 other	Acute	Semi-structured interviews	Thematic analysis	To explore involuntary patients' views on their compulsory hospitalisation
14	Bos et al. (2012)	Netherlands	n=12 (8 female) aged 17-45. 11 admitted involuntarily.	not reported	16 bed secure inpatient unit	Semi-structured interviews	Grounded theory	To gain insight, from patients' perspectives, into treatment in specialist settings for patients labelled as 'difficult'



Table 3 (continued)

15	Livingston, Nijdam-Jones, & Patients Empowered and Engaged as Researchers (2013)	Canada	n=29 (6 females) average age of 37 years, median length = stay of 2.5 years (range 2 months - 25 years), diagnosed with schizophrenia or other psychotic disorder (n=25)	n=18 white/Caucasian	Inpatient Forensic	Semi-structured interviews	Thematic analysis	To examine treatment planning from the perspectives of inpatients and service providers at a Canadian forensic mental health setting
16	Ridley & Hunter (2013)	United Kingdom	n=49 (26 female), aged 21-63	n=8 from black or minority ethnic including asylum seekers	Range of inpatient settings	Semi-structured interviews	Thematic analysis	To explore the experiences and views of individuals treated under the Scottish mental health act
17	Chambers et al. (2014)	United Kingdom	n=19 (7 female)	n=7 black British, n=10 white British, n=2 other ethnic origin	Acute, psychiatric intensive care, forensic	Semi-structured interviews	Relational thematic analysis	To explore the service user experience of detained care particularly in relation to dignity and respect
18	Cappelman, Bamford, Dixon & Thomas (2015)	United Kingdom	n=5 (1 female), aged 20-27, length of stay 1.5-11 weeks, n=4 detained, n=1 informal	not reported	Acute	Semi-structured interviews	Thematic analysis	To examine patients' experiences of ward rounds

Table 3 (continued)

19	Óladóttir & Pálmadóttir (2016)	Iceland	n=6 (2 female), aged 19-46	not reported	In and outpatient ward of a public hospital	Semi-structured interviews	Template Analysis	To examine clients' perceptions of the extent to which care in hospital reflected the principles of client-centred practice
20	Olasoji et al. (2018)	Australia	n=11 (6 female), aged 18-65, schizophrenia (n=4), schizoaffective disorder (n=2), bipolar disorder (n=3), major depression (n=2)	not reported	Acute	Semi-structured interviews	Thematic analysis	To explore patients' views of their involvement in nursing handovers
21	Waldemar, Esbensen, Korsbek, Petersen & Armfred (2018)	Denmark	n=14 (7 female), aged 18-59, duration of hospital stay ranged from 1 week to 7 months with an average of 6 weeks; range of diagnoses including schizophrenia, depression, psychosis, and bipolar disorder.	not reported	Two open inpatient units	Semi-structured interviews	Qualitative content analysis	To explore inpatients' experiences of care and treatment according to recovery oriented practice

### *Phase three - Reading the studies*

#### *Quality Appraisal*

We viewed quality appraisal (QA) as an aid to understanding the studies and classifying their characteristics and decided not to exclude studies based on quality (Atkins et al., 2008, France et al., 2015). We trialled the Consolidated Criteria for Reporting Qualitative Research (COREQ, Tong et al., 2007), an expanded version of the Critical Appraisal Skill Programme checklist (CASP, 2018; Campbell et al., 2003) and the original ten-item CASP checklist. Like Campbell et al. (2003) we found the expanded criteria to be time-consuming with no commensurate benefit over the original checklist. The COREQ was not substantially different to the expanded CASP and therefore the original CASP tool was used with an eleventh criteria added regarding the influence of researcher role and reflexivity (Campbell et al., 2003). QA was conducted by MG and four studies were separately appraised by GG (blind to MG's ratings). There was moderate agreement between the judgements,  $Kappa=.642, p<.005$  (Landis & Koch, 1977).

Eight adopted thematic analysis, one of which (Olofsson & Jacobsson, 2001) also used content analysis to summarise their data; four studies used phenomenological approaches; three used grounded theory; three used content analysis; two used qualitative content analysis; and one study used template analysis. The three studies adopting content analysis were judged to have applied conceptual or metaphorical meaning only possible through interpretive, hermeneutic processes. Year and country of publication, profession of lead researcher, and methodological orientation appeared to have no effect on the quality of studies. 12 of the 21 studies were rated to have adequately considered the relationship between the researcher and participants, and nine were judged to

have “*critically examined their own role, potential bias and influence during analysis and selection of data for presentation*” (CASP, 2018).

### *Data extraction*

Studies were read in chronological order. Data were extracted from ‘findings’ or ‘results’ sections, and hand-coded line-by-line. Additional author interpretation was sought in ‘discussion’ sections to help provide context for findings (Thomas & Harden, 2008; France et al., 2014). This stage of the analysis was based on previous descriptions of data extraction and used the concepts of first, second, and third-order interpretation as a guide (Britten et al., 2002; Malpass et al., 2009). Research participants give ‘first-order interpretations’ of their experiences, presented as quotes in original studies; the authors then apply ‘second-order interpretations’ as explanations of the data usually taking the form of concepts, themes and metaphors presented as thematic maps, theme labels, or longer narrative explanations. Meta-ethnographies aim to construct ‘third-order interpretations’ of authors’ second-order interpretations. Tables were constructed for each study into which second-order constructs were recorded in two columns (thematic structure/theme labels and narrative interpretation) using the original language or close paraphrase. Where provided, illustrative quotes from study participants were extracted to an adjacent column. In a fourth column, initial reflections were noted that were later used to create third-order constructs. As outlined in the inclusion criteria (Table 2), data were only included that related specifically to our question whilst taking care to preserve meaning in context. For example if authors refer to negative experiences of an aspect of treatment planning

in the context of otherwise positive experiences of care, it was important to extract the contextual data to be used in later phases.

#### *Phase four - Determining how the studies are related*

Here it was important to keep certain features of the dataset in mind. Firstly, at least 47% of patients in the sample experienced involuntary detention, and given the number whose legal status was not reported (13 studies), there is a chance this proportion is higher. Most patients were describing experiences of acute inpatient units, whilst three (Bos et al., 2012; Livingston et al., 2013; and Chambers et al., 2014) recruited from secure and/or forensic settings.

Second-order interpretations were copied into a second spreadsheet with each study's data occupying separate columns. At this stage we combined the original authors' thematic structure or theme labels with their narrative interpretations which provided contextual meaning. As an example, Lilja & Hellzén (2008, p.283) named one theme 'Meeting an omniscient master' a second-order interpretation of raw interview data. In their text they provide further interpretive meaning under this heading which was reduced and summarised in our table to "decision-making relies on the omniscient psychiatric master - who has the power to label the patient with a diagnosis and to outline a treatment strategy on the basis of that diagnosis". This example illustrates a difficult process whereby we attempted to combine authors' interpretive ideas and structure using original language, in a way that preserved meaning and context. This relied on a certain amount of interpretation and was inherently reductive. Second-order concepts of each study were then reorganised into broad thematic categories (e.g. patient

influence in decision-making; treatment choices) which were constantly reviewed and revised.

#### *Phase five - Translating the studies into one another*

Using the thematic categories generated in the previous step as a starting point, and using a ‘constant comparative’ approach (Noblit & Hare, 1988), second-order concepts from the first study were compared to those from the second study to determine whether concepts were matching or contradictory, or whether any new concepts emerged. The results of this comparison were then compared with the third study and so on, until all studies were compared with each other (Campbell et al., 2003; Atkins et al., 2008; Noblit & Hare, 1988). This process is known as translation (Noblit & Hare, 1988) which can be reciprocal where there is agreement in meaning across studies, or refutational where there are contrasting explanations or interpretations of the same concept (Griffith, Hutchinson & Hastings, 2013).

Concepts and metaphors from one study are translated into those from other studies resulting in a theme or metaphor which adequately encapsulates their meanings. Translations were either generated by writing a new interpretation which accounted for the concepts generated in the original studies, or where an existing description was deemed adequate, this was used. Constant re-reading of original studies, and the developing interpretive structure (extraction, recording, translation, organising concepts) was important in identifying any additional or disconfirmatory concepts (Booth, Carroll, Ilott, Low, & Cooper, 2013). We organised the output of this process similarly to Malpass et al. (2009) and the result can be seen in Table 4. The criteria for the adequacy of metaphors by Noblit and Hare (1988; i.e. economy, cogency, range, apparency, credibility) were followed with the intention that the synthesis would be accessible and useful to a wide

audience. To maintain internal consistency across translations, each was tested against all studies' second-order interpretations and were developed or amended iteratively until no new metaphors emerged.

At this stage we were able to assess the relationships between various contextual factors (setting, sample, methodology etc.) across included studies. The 'legal status' third-order concept was only developed from studies conducted in acute settings. 'long-term consequences' and 'avoiding protest' were developed by studies with only involuntary patients and 'playing the game' was formed with studies in which only n=1 patient was voluntary. 'Accepting rejected decisions' was unique to one study (Bos et al., 2012) which investigated behavioural treatment in secure settings for people labelled 'difficult'.

It was possible to translate the majority of concepts using reciprocal translation as there were many commonalities across studies. For example, a number of studies included concepts about the importance of feeling well-informed, and the perception that the flow of information was controlled by staff (e.g. Livingston et al., 2013). Rather than seeing these as refuting one another, we judged that they were related and complementary concepts. The concept 'accepting rejected decisions' from Bos et al. (2012) was considered refutational as we understood it to represent an impression of patients' relationships with coercive treatment plans that is unique and did not match related concepts from other studies. Of course, this is open to interpretation and it should be kept in mind that the setting and sample in the study by Bos et al. (2012) were somewhat unique.

Table 4. Translations

3rd-order interpretive structure headings	Translated 2nd-order constructs	Summary description	Contributing studies (study number)
1. Discovering the maze	1.1 Overarching challenges	Distress	Care planning processes and outcomes had the potential to evoke distressing memories of powerful figures and unpleasant feelings of confusion, anxiety and fear; and for patients to feel worthless, rejected, excluded and punished by others. 6, 10, 11, 15, 18
		Identity	The patient identity and associated loss of freedom and adult processes of self-determination represent separation from a credible human identity, mortification of the self, and a loss of integrity. 1, 2, 3, 4, 6, 8, 10, 11
	1.2. Systems, rules and cultures	Legal status	Voluntary status can confer a sense of control and involuntary care is not necessarily felt as coercive. The control afforded by voluntary status can be illusory when detention is used as a threat to compel compliance leaving voluntary patients feeling trapped, dejected and out of control. 1, 5, 9
		Care versus autonomy	A complex and sometimes conflicting relationship between patients' need for care, and the need for collaboration and autonomy. 12, 16, 17, 19
		Coercion with compassion	Feeling unable to make decisions, in need of help and protection without realising, justified professionals' right to decide for patients. 2, 3, 4, 12, 13, 20
Lack of alternatives	The medical model		Psychiatrists and patients are 'prisoners' to a power imbalance inherent to medical and psychiatric practice, which limits professionals to planning based on diagnosis, medication and compliance; and limits collaboration to the acceptance or denial of medication; This can be experienced as oppressive, or comforting depending on the relationships between patients and clinicians and patients' faith in the medical model. 2, 6, 11, 15, 17, 19, 21
			An active and/or passive restriction of alternatives to coercive treatment. The lack of alternatives to medical treatments. 2, 9, 13, 17, 21



<p>1. Discovering the maze (continued)</p> <p>1.3 People and Practices</p>	<p>The real authorities</p> <p><i>To not with</i></p> <p>Tokenism</p> <p>Teams attempting to control risk and uncertainty</p>	<p>A system of control which systematically separated patients from power and individual identity by threats, isolation, compulsion and suppression. Staff are compared to powerful agents, who patients felt powerless to challenge, and were forced to comply with treatment choices with which they disagreed.</p> <p>Patients are dependent on decisions made 'behind closed doors', without professionals seeking or accepting their involvement, and with associated feelings of exclusion, stress and powerlessness.</p> <p>Decisions were foregone conclusions, with patient input disregarded, meaningless, and sometimes sought after decisions were already made.</p> <p>Teams are afraid of risk they feel unable to control, and therefore prioritise risk management in planning which can feel unhelpful and coercive.</p>	<p>1, 5, 6, 8, 10, 11, 12, 13, 15, 16, 18, 21</p> <p>1, 3, 7, 8, 9, 10, 12, 15, 16, 17, 18, 20, 21</p> <p>10, 12, 15, 16</p> <p>5, 8, 15</p>
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Table 4 (continued)

2. Negotiating the maze	2.1 Reciprocity versus antagonism	Reciprocity	Spending time with staff to build recognition and understanding based on common humanity rather than illness or risk fostered self-determination. Contact with staff was needed to avoid coercion and involuntary treatment. Good relationships could be harmed by conflicts and disagreements.	2, 3, 10, 12, 14, 15,
		Antagonism	Denying patients voice and agency is associated with antagonism, conflict, resentment of staff, legal and physical protest, and a reduction in willingness to engage.	3, 4, 5, 10, 11, 16, 20
	Trusted to decide	Trust in clinicians	Well thought out medical treatments, planned by experienced and skilled professionals should be followed, meaning there is less of a need for patients to make choices themselves. Being flexible with staff and having respect and understanding for their work, views, and difficulties.	1, 2, 3, 5, 9, 15, 19, 21
			The unequal possession and exercise of power by professionals could feel unsafe and impeded trust. Patients had to earn clinicians' trust to contribute to decision making	1, 2, 5, 9, 15
		Effective communication	Effective communication with skilled staff involved a mutual willingness for flexible and sensitive dialogue and account being taken of individual communication needs. Giving and receiving positive and negative feedback helped build confidence, motivation and insight. Plans and goals could be developed and clarified through interaction with staff and coercive interventions can be avoided or understood through dialogue. Poor communication was associated with coercion and failing to adapt to individual communicative needs.	1, 2, 3, 5, 8, 9, 10, 12, 14, 15, 16, 20

Table 4 (continued)

2. Negotiating the maze	2.1 Reciprocity versus antagonism	Information	Being kept in the loop, knowing one's rights and feeling empowered to make informed choices. Passive 'ask and you will receive' or active withholding of information about rights, treatments and treatment rationale is associated with feeling coerced, out of control and limits understanding and influence. An unfair power imbalance in the possession, interpretation and flow of information and a desire to correct and clarify inaccuracies.	1, 2, 3, 6, 7, 9, 11, 13, 14, 15, 17, 18, 20, 21
		Meaningful involvement	Collaborating, sharing responsibility and initiative over decision making, planning processes and documentation. Arguing, understanding, considering and being considered. Choosing which staff and family members to involve.	2, 3, 9, 11, 12, 16, 18, 19, 20
		Strengthened and empowered	Participation and codetermination were associated with less sense of power struggle. Self-determination is associated with intrinsic motivation and a strengthened, empowered restructuring of the self.	2, 4, 9, 12, 14
		Supporters	Patients use supporters to ease anxiety and strengthen their voice in decision making. The choice to select family and Named Persons to advocate in decision making during difficult times and using supportive relationships with staff members to cope in stressful meetings.	7, 8, 10, 16, 18, 20
		Control over personnel	Drawing help from supportive relationships with staff members can be impeded by organisational factors such as rotas, and the selection of staff members nominated to attend meetings.	18
		Asserting influence	To assert influence meant fighting and struggling to persuade professionals or circumventing the immediate care team through legal appeal. When medical interventions were declined, the decision was judged as ill-conceived.	2, 3, 9, 12, 21

Table 4 (continued)

2. Negotiating the maze	Playing the game	Learning the 'rules' of treatment planning and playing the game by acting as if collaborating in order to achieve incentives.	8, 18
	Avoiding protest	Contributing wishes or views could be 'incriminating' or have adverse consequences, so people remained silent and agreed with professionals.	2, 16
	2.1 Reciprocity versus antagonism		
	Opting out	Avoiding care planning meetings and wishing to leave hospital with minimal professional 'interference'.	10, 16
3. The centre of the maze	Adopting once rejected treatment plans	Making a decision to follow a plan once perceived as coercive helped give a sense of self determination and lead to more productive collaboration.	14
	Returning fully to my own self	Plans connected to patients' subjective experiences and inner resources, with psychiatric interventions framed as tools to use in achieving personally important goals. Self-relevant goals were the cause and result of motivation, whereas non-collaborative goals were meaningless.	4, 10, 14, 19, 20, 21
	Stuck under the surgeon's knife	Lack of involvement in planning meant problems were more likely to return. Involuntary treatment disrupted lives and patients feared the effect it could have on their future.	13, 16

### *Phase six - Synthesising translations*

At this stage, a third-order 'line of argument synthesis' (Noblit & Hare, 1988) was produced, which aims to tell the 'story' of the similarities and differences between the studies formed in an 'interpretive order'. MG and GG collaboratively combined second-order translations to develop the third-order narrative presented in the results section.

### *Phase seven - Expressing the synthesis*

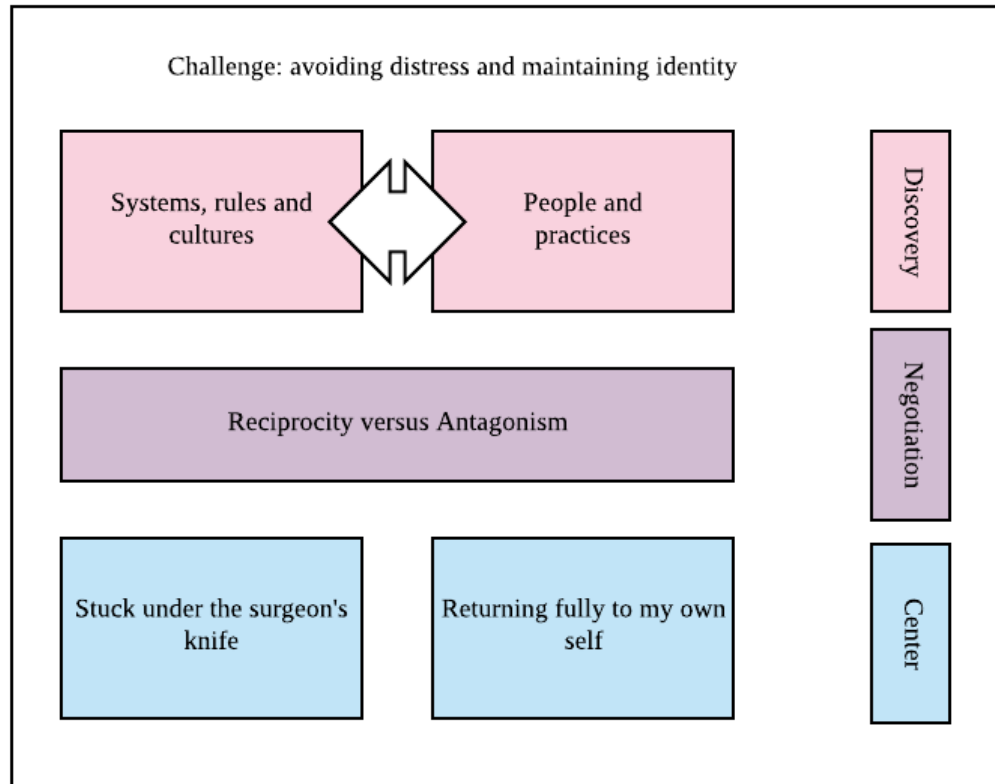
We used the metaphor of a 'maze' (Livingston et al., 2013, p.45) as a third-order construct to illustrate aspects of the treatment planning process that were evident in the studies reviewed. Firstly, both treatment planning in inpatient mental health settings and mazes have theoretical start and end points. Patients enter the maze when they become involved in decisions regarding treatment in hospital. They need to discover how the maze works including who makes decisions and how, and whether the rules help or hinder progress. Navigating a maze and planning treatment for complex problems both require a person to make choices, choose paths, learn and make use of information and resources to help them plot their route to the centre. Here, the end point (centre of the maze) is the result of the planning process which may be, but is not necessarily, a plan to treat the mental health difficulties for which the patient needs help. The following narrative is organised in three phases: 'Discovery', 'Negotiation', and 'Reaching the Centre'. These phases do not necessarily progress chronologically in practice, although they may for some patients. More likely is that as in a maze, some aspects of the process are discovered *during* negotiation, or even that patients are given a plan (reach the centre) before any discovery or negotiation has taken place. For economy, we chose

to present the synthesis as a linear narrative. The final column in Table 4 shows the relative contribution of the studies to translations and third-order interpretations in the following section.

The headings of the following sections outline the third order interpretive structure which is also shown in the left two columns of Table 4. Third order theme labels are numbered to correspond with those in **Table 4** as an aid to following the narrative

## Results

### 1. Discovering the ‘decision-making maze’



*Figure 1. The treatment planning maze.*

#### **1.1. Overarching challenges - avoiding distress and maintaining identity.**

Two concepts consistently emerged in the reviewed studies, which were classed as overarching and related themes: decision making practices and cultures (e.g. multidisciplinary team meetings, biomedical treatment approaches) have the potential to a.) Cause or relieve distress in patients; and b.) To strengthen or threaten a patient’s sense of individuality, autonomy and identity. We refer to these concepts within each of the phases and subthemes below.

People approach decision making in hospital with unique identities, roles and skills: *"I was at work, I had a life before this"* (Gault, 2009, p.509). Entering the maze for some, meant adopting a different role, that of a 'patient', and in this transition these core roles and identities were lost or threatened, and their skill devalued *"You become a nobody, they can do whatever they want with you..."* (Olofsson & Jacobsson, 2001, p.362). Patients learn that predetermined rules and cultures (e.g. legislation, medical model) and the people that work within them (i.e. ward staff) ultimately govern the available routes. Those who accepted the 'patient' role felt reassured and cared for by the decisions made for them; the maze was less threatening and navigable with greater ease in the knowledge that their route would be guided by powerful people who knew the way. For others, this power presented an upsetting and diverting obstacle, by which their views were rejected, information that may help guide the way was denied to them, and available paths were restricted. For these patients the conditions of the maze and the 'patient' role posed a traumatic threat to valued self-concepts.

### **1.2.Systems, rules and cultures**

An important discovery for patients is that the rules of the maze are set within legal, cultural and social contexts, all of which shape how decisions are made. Prominent within this is a prevailing tension between care and autonomy which established the basis for decision making. Some recognised the need for *"coercion with compassion"* (Petersen et al., 2012, p.63), and accepted the loss of self-determination in situations where they were unable to keep safe or understand their own needs: *"maybe for your own safety and the safety of others have to be locked in on the ward... it is done for my own good."* (Johansson & Lundman, 2002,



p.644). Conversely, decisions made which excessively restricted patients' choice and freedom were felt to be coercive and threatening even if intended to protect the patient.

For patients in acute settings, legal status influenced their right to make decisions, and whether 'sectioned' or not, the threat of detention was used to exert control over treatment choices: *"my psychiatrist said if you don't take your tablets I will section you and give you ECT"* (Gilburt, Rose & Slade, 2008, p.4). Detention, or the threat thereof, felt coercive and distressing to many, whilst a minority *"didn't ever get the feeling [they were] being pushed around; being on section felt no different to being [informal]"* (Goodwin, 1999, p.46).

The treatment options available were seen as restricted by the medical model, with an emphasis on diagnosis and medication. For some, their diagnosis was associated with the loss of identity, and decisions based on categories in their roles as patients, rather than individual experiences and preferences *"they labelled me as a paranoid schizo... the problem is that the diagnosis is there even when the disease is gone"* (Lilja & Hellzén, 2008, p.283). Diagnoses were used to determine treatment plans that are usually limited to biomedical approaches, and whilst some felt able to decline particular medical treatments, they were generally seen as compulsory. Some reacted differently to the influence of the medical model, accepting diagnosis and medical treatment from clinicians they trusted (see below). The emphasis on medical treatment was associated with a lack of alternatives. Psychosocial approaches were viewed as the non-medical approach most likely to reaffirm patients' sense of personhood: *"I think counselling's the most essential thing... Without it, patients are gonna be... constantly lost, and then pumped with more medication that they don't need."* (Chambers et al., 2014, p.5).

### 1.3. People and practices

Many saw decision-making processes as entirely controlled by staff, "*the real authorities*" (Petersen et al., 2012, p.64) who "...*have their own agenda about what I ought to do and the way I ought to be*" (Gilburt, Rose & Slade, 2008, p.4). At its most extreme, this was seen as a 'Soviet-style system of control' (Goodwin, 1999), deliberately enacted to separate patients from their individual identity and force them to passively accept biomedical treatments (Lilja & Hellzén, 2008). Many (but not all) therefore felt that decision-making was done by professionals to, not with them: "...*the [psychiatrist] I'm under goes in for telling... rather than asking*" (Goodwin, 1999, p.48). Decisions are made '*behind closed doors*' (Cappelman et al., 2015, p.234) leaving people feeling powerless and distressed. For some, their contribution felt tokenistic: "*I did get my tuppence worth, but it wasnae really worth anything...*" (Ridley & Hunter, 2013). Patients also realised that decisions are sometimes made when professionals fear their own inability to control risk, and so plan interventions to control the behaviour of patients thus relieving this anxiety: "*I think a lot of the fear is from... the consultants.. that if somebody does kill themselves they are accountable, they haven't done their job...*" (Gilburt, Rose & Slade, 2008, p.5). For patients this can result in an unhelpful loss of individualised planning.

Patients discover therefore that their right to choose their own route through the 'maze' is largely controlled by other people and practices which can limit the range of available paths. For some this results in a reassuring sense of protection and care, where they recognise that they are unable to decide for themselves. Others, who were denied their wish to plot their own route, had their views unheard, their range of options limited, and their behaviour controlled by threat,

felt profoundly and deeply distressed. This was felt by some as a denial, loss or violent separation from aspects of their identity (e.g. autonomy, individuality) that are highly valued.

## **2. Negotiating the maze**

Within the negotiation phase, ‘reciprocity versus antagonism’ is the key theme that provides the context for either effective communication, the helpful flow of information, reciprocal trust, meaningful collaboration, and strengthened sense of self; or feelings of coercion and distress. Another way of expressing the synthesis of this phase would have been to tell two contrasting stories: one of treatment planning facilitated by reciprocity, and a separate story highlighting the barriers to reciprocity. However, our interpretation of the accounts was that inherent in treatment planning is a constantly shifting tension between reciprocity and antagonism. It was apparent that patients rarely found either entirely reciprocal or entirely antagonistic relationships in their lives in hospital. Movement between the two is perhaps reflective of healthcare settings in constant and sometimes turbulent flux. The challenge this poses requires that patients learn to cope by recruiting supporters, attempting to assert themselves, play the game, avoid protest, opt out or learn to accept coercive treatments. Our interpretation was that the possession of power (the real authorities) and the manner in which this power is used (to, not with; and tokenistic) were structural features of inpatient treatment planning enabled by fairly static policy and legal measures. Reciprocity versus antagonism therefore reflects the way in which patients and staff negotiate this structural power relationship.

## **2.1.Reciprocity versus antagonism**

In the maze, relationships shape the plans that patients make. For many, the systems, rules and cultures they discovered and their relationships with those who operate them were fraught with distressing feelings of distress and subordination: *“They’ll take no notice of what you say (in ward rounds)... they do things against you [and] feel they’re higher than you... They don’t seem to have much love or respect for you.”* (Chambers et al., 2014, p.4-5). It must be made clear here that antagonism and associated feelings of fear, distress and anger was the case for most of the participants in the original studies as evidenced in Table 4 by the number of studies contributing to the translated concepts. In important, but exceptional cases, patients were able to form strong, collaborative relationships: *“I feel that we’re a team. I’m using [the staff] as resources to help me through the maze of the hospital”* (Livingston et al., 2013, p.45). Ideally then, patients negotiated the treatment planning maze within strengthening, collaborative relationships with clinicians *“like comrades”* (Storm & Davidson, 2010, p.118), formed with staff free to take time, listen and understand patients as *individuals*, rather than *‘patients’* identified by diagnoses. This understanding could be reciprocal when patients *“[facilitate] cooperation with staff by being flexible and sympathetic towards their difficulties”* (Johansson, Skärsäter & Danielson, 2009, p.503).

Navigating the maze side-by-side with professionals, patients required trust in clinicians. For some this trust, relied on an assumption that clinicians’ training and expertise prepared them to treat problems defined within a medical framework. This assumption helped patients accept a lack of influence in decision making, and so the medical model did not pose as great a threat to identity and self-

determination as it did to many others and was less likely to result in them feeling oppressed or threatened: *"I don't... have that much of an influence... and that's actually okay. There are... people here who took an education... and who probably know what people are suffering from, so I don't think I need to have three or four options to choose from. I'm assuming they know what they're doing."* (Waldemar et al., 2018, p.6).

For others, trust was tentative with the prevailing power imbalance and ever present threat of coercive treatment kept in mind: *"My treatment team is pretty honest and trustworthy, so far. I don't think they have... backstabbed me in the back, yet."* (Livingston et al., 2013, p.50). Others found their trust betrayed and antagonism resulted: *"I feel he lied to me, I feel he fooled me."* (Storm & Davidson, 2010, p.118). Again, reciprocity was key, *"the level of trust and honesty is high... It goes both ways"* (Livingston et al., 2013, p.50). In contrast however, some felt as 'patients' that they are initially unlikely to be trusted to decide for themselves - professionals' trust had to be earned: *"When you are a mentally ill patient, you just are not trustworthy... everything has to be checked, before they can believe you"* (Storm & Davidson, 2010, p.118). There is an overlap here with the tension between care and autonomy and the struggle to maintain identity once in the 'patient' role.

Strong relationships, which could help avoid distressing coercive treatment and ultimately form worthwhile treatment plans, were characterised by effective communication with skilled staff who take account of patients' views on their problems, preferences, and the way they needed to communicate: *"only you can feel how [medication] affects your body"*. (Petersen et al., 2012, p.62). Patients noted how this reciprocal, adult communication felt like *"a reflective process..."*

*[which] encourages the patient to look at themselves in a positive way, to feel valued, to feel that their view is valued.*” (Olasoji et al., 2018, p.5). Skilled communication was therefore associated with a therapeutic process whereby patients saw themselves as individually important, and through which personalised goals and plans were formed.

Opportunities to give and receive feedback with staff were welcomed: *“It would probably be good to hear what they’ve been observing... depending on where you are emotionally, I guess”* (Olasoji et al., 2018, p.5). Importantly, patients valued the chance to clarify and correct information or opinions from professionals that they perceived to be biased or inaccurate *“I think that [the physician] acts well since he could realise that I was better than he thought . . . was flexible”* (Johansson and Lundman, 2002, p.644).

Through effective communication, patients need access to the control of information to make treatment decisions and plot their route through the maze. Although some received *“enough information... [about] what might happen”* (Chambers et al., 2014 p.5), and consequently felt in control, many felt *“at times... totally in the dark”* (Livingston et al., 2013, p.49). *“This privileged knowledge...controlled by... professionals, reinforces [their] power and status at the expense of patients who often experience this power differential as oppressive and traumatic.”* (Thibeault et al., 2010, p.224). Whilst this quote endorses a view of control of information as a deliberately imposed feature of medical practice (also see Lilja & Hellzén, 2008), and hence related to the ‘medical model’ theme above, a more passive process was evident in other accounts: *“I don’t feel that they... kept anything from me that I’ve asked them... But I’m sure there’s things they’re not telling me”* (Livingston et al., 2013, p.49). Patients noted how information flowed

from nurses to psychiatrists, both exercising a ‘preferential right of interpretation’ over the details and patients’ information (Lilja & Hellzén, 2008, p.283) and who were able to engage in ‘creative charting’ whereby “[patients] say one thing and [the staff] write down a complete different [thing]” (Livingston, Nijdam-Jones, & Team P.E.E.R, 2013, p.50). This control left patients feeling confused and wrong-footed if information, of which they were unaware is used to make important decisions.

Effective, equitable communication paved the way for meaningful involvement in decisions and the processes by which decisions are made, including for example, documentation, information flow, personnel and handovers. Meaningful involvement meant “*to be informed, to be motivated, to argue and to understand why.*” (Olofsson and Jacobsson, 2001, p.362) and eased uncertainty and feelings of exclusion. In this sense, involvement was not expected to be straightforward, but was related to active adult processes of the kind in which patients engage in life outside hospital and resulted in patients feeling strengthened, empowered and with less of a struggle for power: “*it means a lot... you feel you are equal*”. (Petersen et al., 2012, p.63). Koivisto et al. (2004) suggest a direct link between this type of meaningful, individualised planning and treatments that aim to therapeutically ‘restructure’ the self, in contrast to diagnose-and-treat approaches simply focusing on symptom reduction. The denial of meaningful involvement represented a violation: “*I have been used to managing myself.... If someone told me I couldn’t, I could not live with that at all. It means everything.*” (Petersen et al., 2012, p.63). An exception was evident in Bos et al’s (2012) study in which ‘difficult’ patients felt that an excessive focus on their own responsibility for difficulties was upsetting: “*I must take the initiative in everything, it’s not*

*coming from them. That's not what I call cooperation, when I'm solely responsible"* (Bos et al., 2012, p.5).

Believing that the maze is better understood by professionals, feeling unable to make difficult decisions, and trusting professionals to know the way, can feel reassuring in the face of difficult, complex decisions. Alternatively when people wish to plot their own course, staff and supporters can be equal collaborators who provide information, practical help and who can comfortably engage in reciprocal discourse about choices. In these secure, balanced relationships patients are trusted to know which route they wish to take and the decision making process is shared. Having their choices heard and respected strengthened patients' belief that they mattered, and were in control. The denial of patients' contribution and personhood in the treatment planning process however, was associated with antagonism.

Patients want to be able to choose supporters including family, friends and certain members of staff to help make decisions and represent their views: *"To stand up for me when I can't do it for myself"* (Gault, 2009, p.509). Some chose people who would support their own views and thus helped to reduce feelings of isolation, and to bolster their identity. However, they were reminded that ultimately, control over personnel and process was not in their hands: *"it's nerve-racking enough going into your ward review and then at last minute, "oh yeah by the way, such and such a person isn't coming, this person's coming in"* (Cappelman et al., 2015, p.235).

Some found direct ways of asserting influence with staff and through legal frameworks around involuntary detention, though this is usually described as a struggle: *"I managed to negotiate the dosage [of medication] last week, but that*



*was the result of nagging.*” (Storm and Davidson, 2010, p.116). Successful legal appeals were, by nature, always in the context of disagreement with treatment teams. *“I appealed to the [court], and I was right, I did not have to be on involuntary status.”* (Olofsson & Jacobsson, 2001, p.362). In one exceptional example, a psychiatrist assisted a patient with a legal appeal despite their difference in views (Olofsson & Jacobsson, 2001, p.362). Patients also attempted to cope with antagonism by “playing the game” (Cappelman et al., 2015, p.235), *“being a good patient”* (Gault, 2009, p.509), and avoiding protest by *“[biting] your tongue... [and] guarding your emotions”* (Livingston et al., 2013, p.50), or by partially or wholly opting out: *“I write a list of what I need, and then they take it up in the meeting and discuss how they can arrange for it.”* (Storm & Davidson, 2010, p.116) hoping simply for as little interference as possible from the treatment team, and to return home as soon as possible.

Whilst these strategies were designed to avoid distress, acquiescence may require patients to compromise their own preferences and perhaps aspects of their identity in favour of goals they value more: *“in the end you have to lie to yourself a bit to convince... those people who make a difference when it comes to whether you will leave (the ward) or not. You say: “I’ll take any pills you want me to as long as I can get out” ... and then a [staff member] says: “You’re much better today than you were on Saturday” ... then you have to say: “sure”. Rather than saying “no, I don’t think so””* (Johansson, Skärsäter and Danielson, 2009, p.503). Perhaps similarly, some patients in a secure setting came to accept once rejected treatment plans regarding the management of behaviour. Plans initially perceived to be coercive were, over time accepted to the point that adherence to the plan was associated with a sense of pride, and a shift in motivation from extrinsic (i.e.

resulting from external influences) to intrinsic (i.e. self-relevant): *“I am prouder of myself (...) because I believe that I do matter, that I will not be judged, I stick by the rules, I am becoming me again, I am more accepting of myself”* (Bos et al., 2012, p.6).

### **3. The centre of the maze.**

For many (but not all) patients, the planning process resulted in a treatment plan. Having discovered the conditions of the maze, negotiated choices either through reciprocal or antagonistic relationships with staff, and having formed their own ways of coping with the obstacles, patients arrived at one of two outcomes: a.) Plans which were personally meaningful, intrinsically motivated and aimed at returning to an identity that they valued - ‘returning fully to my own self’ (Koivisto et al., 2004, p.273); or b.) Plans that were either non-existent, coercive, or personally meaningless - patients feared being stuck ‘under the surgeon’s knife’ (Katsakou et al., 2012) by planning which made meaningful change less likely, and/or future hospitalisation more likely.

Patients valued plans which took account of both their subjective experience of their difficulties, and their personal goals for treatment *“...I want to... return fully to my own self, so that I could control myself, my whole body and not someone else... The aim of my treatment is that I could go back to normal.”* (Koivisto et al., 2004, p.273). Self-relevant treatment goals were motivating and interventions (including medication) had the potential to be tools used by the person in pursuit of their own life-goals (Storm & Davidson, 2010).

Personally meaningful plans were only experienced by a minority of patients and some were unaware of even having a treatment plan: *“I do not know*

*what it is. I have had a plan before, a future plan, but not now.*'' (Storm & Davidson, 2010, p.116). Treatment goals that were not individualised or lacked clarity were meaningless and associated with the disconnection of the patient from their identity and imagined or hoped-for future self. Patients feared that their future would be adversely affected by non-collaborative (or coercive) treatment planning. Firstly, some feared that current legal detention may make future detention more likely: *''like being under the surgeon's knife: once under the surgeon's knife, always under the surgeon's knife''* (Katsakou et al., 2012). Additionally, treatment goals that were either irrelevant or insufficient made it more difficult to get back to life outside hospital *''Cos they're always saying they want to get us back to work and things ...But it's hard in a place like this; you just become institutionalised and there's no goals to set.*'' (Chambers et al., 2014, p.5)

## Discussion

Treatment planning could be thought of as a distilled focal point for many of the experiences people face during a stay in hospital. If hospital treatment poses questions about identity, influence and control - people may find the most important answers during instances of treatment planning.

This article described how people in psychiatric inpatient settings discovered decision making conditions and processes, negotiated these processes by making use of their resources and/or learning to cope without them in the face of distress, and realised the potential consequences of the planning process they have experienced. At every opportunity to make treatment decisions, people faced the struggle to maintain a sense of individual identity, and of emotional comfort and security as opposed to profound distress, anxiety and despair. Our findings correspond with those from previous reviews and support a body of evidence clearly showing that *how* treatment planning is conducted can have significant personal and emotional consequences for patients (Drake et al., 2010; Bee et al., 2015; Nugteren et al., 2015; 2016 Seed et al., 2016; Wood & Alsawy, 2016). We argue that the potential for broader emotional consequences of both hospitalisation in general and of mental health treatment planning is particularly concentrated at moments in which treatment decisions are made in inpatient settings.

The struggle for identity and against distress we describe is frequently noted in the mental health literature. In review of studies on the experiences of people detained under the mental health act by Seed, Fox and Berry (2016), anger and terror were found to be maintained by disempowering practices such as forced medication under restraint. Decision making practices which place patients at the centre of decisions about their care enhance patient motivation and engagement

(Bee et al., 2015). We found across three studies that the threat of legal detention was felt by informal patients to be used to compel compliance with treatment measures with which they did not agree - what Szasz (1972, in Gilburt et al., 2008) terms 'medical fraud'.

The pervasive tension between care and autonomy, and the belief for some people that coercive planning providing needed security are evident in experiences of general and psychiatric hospital (Rokach and Parvini, 2011; Seed et al, 2016). Psychodynamic perspectives of patients being treated for leukemia explore how clinical settings or practices which impede a person's ability to exert control, relate to others, and communicate meaning can disrupt the normal processes by which we think of and understand ourselves in relation to the world around us (Parkinson, 2006; Stern, 1985). Berterö (1998) observed how participants transitioned from 'individuals', to 'patients' and finally to 'leukaemia patients' through a process of gradually adopting patterns of behaving and responding consistent with their own expectations and those of the staff, and environment. Adhering to routines, only discussing certain topics, and only interacting in particular ways are therefore strategies to make life more predictable and less threatening. Moments in which important decisions are made in mental health hospitals arguably provide the clearest opportunity for an individual's personhood to be confirmed or threatened.

Most treatment decisions in the mental health system are based on medical diagnosis, and a lack of non-medical treatments such as evidence-based psychosocial approaches is commonly reported (Rose, 2001; CQC, 2009; Bee et al., 2015). Hughes (2001) argues that across medicine, psychological factors including notions of 'personhood' are seen as irrelevant and distracting, and medical treatments are strongly favoured by doctors. Decision making across

mental health is led by psychiatrists, the ‘real authorities’ with patients’ influence either restricted entirely, limited to declining medications or tokenism, or achieved as a result of struggle (Bee et al., 2015). The balance and operation of power in medicine and psychiatry has attracted enormous research attention and our findings reflect the general themes evident throughout this literature. Many have argued that practices inherent to psychiatry (and psychology, nursing, occupational therapy etc.) serve to depersonalise people by requiring them to adopt identities consistent with diagnoses, and that experiences of specific treatment planning meetings such as the ‘MDT’ create ‘a state of conscious and permanent visibility’ through the reporting and documenting of behaviour and the need to disclose personal information. Consequently the anxiety and powerlessness are amplified (Roberts, 2005). There is also evidence, consistent with patients’ experiences in this article, that clinicians prioritise procedural, rather than person-centred aspects of risk planning, and may attribute the causes of risk to patients themselves rather than their environment and circumstances. Despite their wishes patients are often excluded from discussions about risk for fear of causing distress (Bee et al., 2015; Coffey et al., 2016).

The current study emphasises the importance in treatment planning of respectful, empathic relationships between patients and staff, in which patients’ views are valued. This has been consistently emphasised, as has the need for meaningful, transparent information exchange between individuals, and through collaboratively prepared documentation (Bee et al., 2015; Grundy et al., 2016; Wood & Alsawy, 2016). Similarly, involving carers and advocates in decision-making, whilst retaining choice over personnel is an important facilitator of shared decision making (Bee et al., 2015).

We found that people struggle to cope with a lack of influence, and the experience of distress in treatment planning by struggling to assert themselves, playing the game or opting out. Additionally trust in the knowledge and expertise of clinicians, and a view of oneself as needing help facilitates acceptance of the patient identity. Seed et al. (2016) found that patients coped with the distress of being sectioned by ‘fighting back, acceptance and avoidance’ (p.88). In these authors’ view, all patients initially perceive detention to be coercive and threatening, but some undergo a process by which they come to accept the detention, the reasons for it, and doctors’ expertise, and begin to feel hospital as a sanctuary. What our findings add is that acceptance, either as a coping strategy or a conscious reinterpretation of one’s experiences to fit with that of professionals, may involve sacrificing aspects of one’s individuality.

Our interpretation of the results of the planning process as comprising either collaboratively formed plans aimed towards personally meaningful goals, or those which diminished or ignored patients’ independent identity and resulted in fears of poorer outcomes and unnecessarily prolonged engagements with services, are consistent with themes of restoration or loss noted in accounts of hospitalisation for medical treatments (Rokach & Parvini, 2011) and perceptions of treatment under the mental health act (Seed et al., 2016).

Key tensions arise from the treatment planning process that are reflected both within patients themselves, and between patients and staff. The Power Threat Meaning Framework (PTMF; Johnstone & Boyle, 2018) attempts to bring together social, philosophical and psychological literature and proposes that power and authority are held by mental health professionals, and communicated through, amongst others, possession and control of information, meanings given to patients’

experiences (diagnoses), and treatments offered. Being assigned a diagnosis by an expert can provide a sense of relief for some people depending on, our results suggest, the security of their attachment to the professionals and the personal meanings they attach to the role of the ‘patient’. Conversely in the context of adversarial or insecure relationships, this power poses a threat. Johnstone and Boyle (2018) argue that in the former case, this relief and security might give way to passivity, impaired coping and less sense of control; and in the latter the power imbalance may be associated with trauma, subordination and poorer long term outcomes. It is not possible, on the strength of our results to comment more specifically on the psychological processes which result from the treatment planning maze. What we can say however is that the way services and professionals organise and discharge power during treatment planning clearly impact patients’ lives and emotional wellbeing.

### *Strengths and Limitations*

The sample included in this review is biased towards people involuntarily detained in acute psychiatric settings. Whilst this is representative of the overall inpatient mental health population (Ewbank et al., 2017), and our analysis allowed us to determine which themes and concepts applied only to particular settings, caution should be exercised when generalising to other populations. Given the wide geographical and chronological spread of the studies, our analysis may not have accounted for cultural differences and changes in policy. However, that no key differences were found between studies from different countries or across the timespan, potentially supports the generalisability of our findings. The Mental Health Act review (2018) suggests legislation should take account of many of the



factors highlighted here (i.e. increasing choice and reducing compulsion), suggesting that recent practice is yet to fully address the issues raised in older literature.

Given the importance and complexity of ‘insight’ and capacity in mental health treatment planning, we were surprised these concepts were not apparent in the data (Allen, 2009). It is possible that recruitment criteria, and possibly research ethics committees prevented the recruitment of patients for whom these issues were particularly relevant. Given a possible lack of knowledge amongst professionals about the use of the Mental Capacity Act (Dunlop & Sorinmade, 2014) and potentially problematic assumptions about the decision making ability of people with diagnoses like Schizophrenia (Drake et al. 2010), we suggest this as an important area for further investigation. The majority of participants recruited were white and given that black, minority ethnic, and migrant groups are at significantly greater risk of involuntary detention (Barnett et al., 2019), and the emphasis our findings place on systemic and cultural power relationships in mental health treatment planning, further research into the experiences of groups at greater risk of marginalisation should be prioritised. This study contributes to a literature which aims to give voice to an underrepresented group, but we acknowledge that a significant group of patients remains unrepresented.

We were careful to reflect the spectrum of experiences evident in the original studies, nonetheless researcher and sampling bias in the collection and the interpretation of findings is likely to have influenced our results. Similarly, whilst our inclusive selection criteria and approach to quality appraisal mean we are confident our findings are consistent the literature, few original researchers included adequate reflexive statements about their assumptions and biases. Our

findings broadly correspond with the lead researchers (MG) reflections on professional experience of inpatient treatment planning - most consistently, patients reflections of the consequences of coercion, limited choice and denial of individuality. Moreover, MG is a trainee psychologist, and therefore trained to understand and interpret experience according to the practices of this profession. Given the points above regarding the underrepresentation of certain groups of patients in the review, it should also be acknowledged that aspects of the first author's social identity (e.g. gender, ethnicity, socio-economic class), and the aim to produce a study for a clinical audience will have substantially influenced the interpretation of the data and expression of the synthesis. For example, the narrative presented could be considered a 'neat' reduction of experiences that are often experienced by patients as chaotic and traumatic. Collaboration with a colleague with lived experience of inpatient treatment was essential in understanding the findings of the review. Logging reflections, second author triangulation, and clearly auditable analysis aim to make biases and assumptions transparent and limit their influence, but it is not possible (or necessarily desirable) to eliminate bias from interpretive approaches. Again, the consistency of our results with previous reviews lend support to the validity of our findings, and the aim of meta-ethnography is to explicitly acknowledge bias as a feature of the process, and stimulate debate rather than resolve it (Noblit & Hare, 1988).

One potential issue with our findings in the context of previous research is that, as Seed et al. (2016) note, it is not possible to conclusively determine whether the concepts we present are particular to treatment planning, inpatient settings, or even mental health treatment. Both hospitalisation and mental health treatment planning have been shown to elicit responses similar to those presented here and it

is possible therefore that the experiences we suggest are specific to inpatient planning are in fact more general experiences that are present during all decision making, or all hospital treatment. Our strict inclusion and exclusion criteria may account somewhat for this uncertainty, and it is practical to consider treatment planning in isolation nonetheless given the opportunities it provides for therapeutic clinical encounters. Further research into specific inpatient decision making practices would be required to clarify this.

## *Implications*

The narrative framework described in this study may help clinicians and providers to consider how treatment planning can be organised and used to best therapeutic effect, minimising the risk of iatrogenic harm. For example, multi-disciplinary team meetings could be thought of as interventions, and thus subject to scrutiny regarding their conduct and outcomes. Consideration to trauma informed models of care in the development of practices and training of staff at all levels may be an effective way of reducing the likelihood of harm (Muskett. 2014). Various models of shared decision making are available which should be employed and audited like any other clinical approach (Drake et al, 2010). Open Dialogue (Olson et al., 2014), which emphasises transparency, tolerance of uncertainty (e.g. around diagnosis and treatment outcomes) and reflection on the meaning and process of interactions is one option. Professional User Dialogue (Noorani, Karlsson & Borkman, 2019) is another model which provides teams a framework for balancing the weight of clinical expertise and patient experience in decision making.

Services should make treatment planning practices clear to patients including the people, processes and where plausible, the philosophies by which decisions are made. Our results support that the majority of patients wish to be involved in reflective, reciprocal, adult discussions about these issues and tensions, rather than excluded due to professional fear of causing distress, and teams should be aware that antagonism can lead to patients coping in ways that may superficially appear to be compliant. Communication skills training, for example non-violent communication (Lee et al., 1998; Suarez et al., 2014; May, 2016) could be provided to all staff and patients, and services should not assume clinicians subject to stressful working environments, managing complex caseloads are always able to communicate as flexibly as might be required. Opportunities to reflect on the impact of treatment planning should also be provided for all patients. This could take the form of individual psychotherapy,

or patient lead ‘mutual aid groups’ which aim to help people with experiences of the same issue, support one another in developing understanding and coping strategies (Noorani, Karlsson & Borkman, 2019).

Research is needed into patients’ experiences of discrete instances of treatment planning (e.g. multidisciplinary team meetings, assessment sessions) and the effects of treatment planning on patients’ wellbeing and treatment outcomes. Given that power and identity clearly play a role in how people experience all aspects of healthcare, research needs to address how these factors may interact differently for people of different backgrounds.

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## **Chapter 2: Empirical Paper**

The relationship between area level political participation and risk of admission to hospital for psychiatric treatment.

**Journal of Mental Health:**

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**The relationship between area level political participation and risk of admission to hospital for psychiatric treatment.**

Mark Golightly<sup>1</sup> & Dr. Christopher W. N. Saville<sup>1</sup>

1. North Wales Clinical Psychology Programme, School of Psychology, Bangor University, Bangor, UK

**Corresponding author:** Mark Golightly, North Wales Clinical Psychology Programme, School of Psychology, Bangor University, Bangor, UK. Email: [markjgolightly@gmail.com](mailto:markjgolightly@gmail.com)

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## **Abstract**

**Background:** Research has consistently demonstrated links between the socio-economic characteristics of neighbourhoods, such as material conditions and social processes, and the mental health of residents.

**Aims:** To investigate the relative value of area-level social capital and economic capital as predictors of neighbourhood psychiatric hospital admission rates across Wales.

**Method:** Using a spatial epidemiological design, postcode-linked psychiatric admission data from a national patient database, and census population data were used to calculate neighbourhood psychiatric admission rates. Mixed-effects Poisson regression modelling measured associations between neighbourhood voter-turnout to local council elections, income deprivation and neighbourhood admission rates. Separate analyses were conducted on data from 2012 and 2017.

**Results:** Areas with higher voter-turnout were associated with lower admission rates, but this relationship was not significant when controlling for neighbourhood income deprivation. Higher neighbourhood income deprivation was associated with greater admission rates.

**Conclusions:** Income deprivation as a measure of economic capital is a more useful indicator in the prediction of area-level psychiatric admission in Wales than political participation as a measure of social capital.

**Declaration of Interest:** No competing interests identified.

**Keywords:** epidemiology, psychiatric admission, social capital, deprivation,

## Introduction

Faris and Dunham (1939) demonstrated an association between neighbourhood social conditions and incidence rates of serious mental illness in Chicago, and research has continued to investigate links between the characteristics of the neighbourhoods in which we live, and the incidence and outcomes of mental health problems. Amongst these characteristics are the structural and economic features of an area. Economic deprivation, urbanicity and ethnic density for example, are consistently found to be associated with incidence of psychotic disorders (Boardman et al., 1997; March et al., 2008; McKenzie, 2008; Veling et al., 2008; Gage, Smith & Munafo, 2016; Fett, Lemmers-Jansen & Krabbendam, 2019) and depression (Mair, Diez Roux, & Galea, 2009; Richardson, Westley, Gariepy, Austin & Nandi, 2015). Research has also focused on neighbourhood social processes in risk or resilience to mental health problems. Various fields of research have grouped and defined these social processes as ‘social capital’ – the amount or quality of resource derived from social life.

Social capital concerns: “*networks together with shared norms, values and understandings that facilitate cooperation within or among groups*” (Organisation for Economic Co-Operation and Development Social, in Babb, 2005, p. 533). A community high in social capital is one in which people conform to healthy behavioural norms, trust the people and institutions around them, have access to resources and participate in civic life (Silva, Loureiro, & Cardoso, 2016). Amongst the various theoretical traditions in social capital research ‘Communitarian’ social capital, pioneered by Robert Putnam (2000) foregrounds participation in community organisations and institutions, and suggests that healthy, productive norms and resource providing networks arise out of this collective engagement

(Bassett & Moore, 2013). Research into the influence of social capital on mental health has produced somewhat inconsistent results possibly due to differing conceptualisations and heterogeneity in measurement (Bassett & Moore, 2013; Silva et al., 2016). Nonetheless, trust in others (e.g. neighbours), perceived social support, and sense of security *in* and attachment *to* one's neighbourhood have been found to be strongly associated with reduced risk of common mental health problems including depression, anxiety and post-traumatic stress disorder (Bassett & Moore, 2013; Ehsan & Da Silva, 2015). Community and civic participation have been shown to be associated with reduced likelihood of depressive symptoms (Silva et al., 2016) and self-rated mental health (Bassett & Moore, 2013).

Putnam (2000) identified political participation as an important measure of social capital, arguing that declining voter turnout, party membership and meeting attendance in the United States were indicative of declining social cohesion leading to poorer health outcomes. In line with this, the United Kingdom Office of National Statistics adopted civic participation, measured by political engagement (turnout) as one of its key measures of social capital (Babb, 2005).

Kirkbride et al. (2007) found that in Southeast London, higher levels of voter turnout and ethnic segregation were associated with reduced incidence of schizophrenia independent of age, sex, economic deprivation and population density. In Sweden, average neighbourhood-level voting turnout was significantly associated with reduced risk of hospital admission for depression and psychosis. The strength of these associations was reduced but still significant when controlling for age, sex, marital status, residency status, education and country of birth (Lofors & Sundquist, 2007). Heslin et al. (2018), however found that length of inpatient

treatment for psychosis, was not significantly associated with socio-demographic variables including voter turnout for people with psychosis in London.

The present study examines the relationship between area-level social capital and admission to hospital for psychiatric treatment in Wales. Following a recent study showing that greater economic deprivation was associated with increased admission rates in Wales (Jones, Jackson & Saville, Submitted) we were specifically interested in the relative value of social and economic capital as predictors of admission. Admission rates were chosen as the outcome variable given the importance, feasibility and validity of hospital admission as a measure of mental health service use (Durbin, Lin, Layne, & Teed, 2007).

Records of individual hospital admissions including patients' home postcode were used to generate counts of admissions across 1909 neighbourhoods in Wales. Linear mixed-effects regression modelling was used to determine associations between neighbourhood admission rates and area-level political participation, measured by electoral turnout; and income deprivation using the percentage of income deprived within each neighbourhood. Local council elections were conducted in 2012 and 2017 which allowed us to conduct analyses for both years with separate admission and socio-environmental data.

## Method

### *Ethics*

Ethical approval was obtained from the Bangor University School of Psychology, and the local NHS research ethics committee.

### *Design*

We adopted a spatial epidemiological design to examine area-level associations between social variables (political participation, and income deprivation), and rates of admission to hospital for psychiatric treatment within neighbourhoods across Wales defined by geographical census areas. An initial analysis was conducted on data from 2012, and a separate analysis of 2017 data was conducted to assess the stability of associations over time.

### *Area-level data*

Wales is a country of 20,760 square kilometres with a population of approximately 3.06 million people in 1.3 million households. There is considerable variation in population density across the industrial south and mountainous central and northern areas, with Cardiff (148 people/square kilometre) and Powys (27 people/square kilometre) as the most and least populous unitary authorities respectively (Office for National Statistics, 2012). Wales is divided into 22 local authorities, 852 electoral wards, 40 Westminster parliamentary constituencies and 1909 Lower Super Output Areas (LSOAs). An LSOA is a unit of census geography used to demarcate small areas with consistent average populations (1500; range=1000-3000). Outcome measures at the LSOA level were used as the unit of analysis.



For our measure of political activity we used ward-level participation turnout (percentage of eligible voters including spoilt or invalid votes), from the 2012 and 2017 local council elections in Wales (Electoral Commission, 2012; 2013; 2017). Turnout data were obtained for wards in which the number of candidates exceeded the number of seats and thus the election was contested. No election takes place if a seat is uncontested. Contested elections were held in 754 wards in 2012, and 760 wards in 2017. Economic capital was measured as the percentage of the population within each LSOA living in income deprivation, defined as any individual claiming an income related benefit, a supported asylum seeker, or a dependent of someone who is income deprived. Income deprivation is an ‘indicator’ of the income domain of the Welsh Index of Multiple Deprivation (WIMD; Welsh Government, 2014). Data were downloaded for 2014 and 2017. 2012 data were unavailable and the 2014 release was temporally closest to our 2012 exposure period.

#### *Admission data*

Psychiatric admission counts from each LSOA in 2012 and 2017 were generated from the Patient Episode Database for Wales (PEDW), which records all hospital admissions across Wales’ seven health boards with anonymised clinical (i.e. diagnosis, length of stay, time since previous admission) and demographic patient data (e.g. age, sex, postcode). Inclusion criteria were: a.) adults (over 18 years); b.) Admitted for psychiatric treatment (identified using PEDW treatment codes); c.) Resident in Wales; d.) Resident in an electoral ward in which the local council election in the study period was contested. Where an individual was admitted more than once during the study period, only the first admission was counted. Admission

counts from each LSOA, stratified by age band (18-34, 35-64, 65+) and gender (female, male) were generated (numerator). The at-risk population (denominator) was quantified by obtaining mid-year population census estimates (ONS, 2018) for each LSOA, stratified by age and sex. Individual patient admissions were therefore counted in one of six strata, within each of Wales' 1909 LSOAs.

### *Analysis*

We used 'R' (R Core Team, 2013), including the packages lme4 (Bates, Maechler, Bloker & Walker, 2015), ggplot2 (Wickham et al., 2009), and DHARMA (Hartig, 2019). Poisson linear mixed-effects regression analyses of the associations between election turnout and area-level admission rates was conducted. Poisson regression is considered suitable for the analysis of count data, and mixed-effects regression enables the modelling of fixed and random effects, making it possible to account for grouping of non-independent observations (i.e. admission counts, within strata, within areas) within outcome data.

Values included in the analysis and reported in the Results section below are derived only from areas in which local council elections were contested. Our overall aim was to determine the predictive significance of turnout before and after accounting for the influence of income deprivation. Four models were tested. The first, null model included admission counts as the outcome variable with the known 'at-risk' population entered as a log-transformed offset variable (parameter estimate set to 1) and random intercepts for age, sex, LSOA, ward and local authority. In the second model, ward-level turnout (%), Z-scored using the R 'scale' function, was added as a fixed effect. Percentage Income deprivation (also z-scored) was added as a single fixed-effect to a third model to compare the

strength of association between area-level variables and admissions. To determine the predictive value of turnout when accounting for economic capital, both turnout and income deprivation were added to a fourth model as fixed effects.

Non-parametric dispersion tests conducted using the DHARMa ‘testDispersion’ function (Hartig, 2019) showed no deviation from equidispersion for any model. Expected and observed zero-counts did not differ significantly for any model. Plots of observed outcomes against fitted residuals were examined for each model and indicated some heteroscedasticity (unequal variance) at low and high rates of the predictor variables. Akaike Information Criterion (AIC) values were used for model selection with lower values indicative of goodness of fit and parsimony. Rate ratios and 95% confidence intervals for each fixed effect are reported.

## Results

### *Admissions*

Table 1.

#### *Admission data*

	2012	2017
Unique admissions		
Male 18-34	1285	1299
Male 35-64	2365	2310
Male 65+	1389	1407
Female 18-34	909	1055
Female 35-64	1765	1700
Female 65+	1988	1745
Total	9701	9516
Mean admission rates within LSOA		
Male 18-34	0.005	0.006
Male 35-64	0.004	0.005
Male 65+	0.007	0.006
Female 18-34	0.003	0.004
Female 35-64	0.003	0.003
Female 65+	0.007	0.007
Range	0.00 - 0.20	0.00 - 1.10
Wales average	0.005	0.005

Note: Admission rates are the cases of admission per head of population

Table 1 shows the total numbers of unique admissions within each stratum across Wales, and LSOA level average admission rates (admissions per head of population) of admissions within each stratum. Admissions were infrequent with on average, less than 0.01 admission per member of the at-risk population for each gender and age band. The wide range in average neighbourhood level admission

rates suggests that a minority of areas in 2012 and 2017 were associated with much greater numbers of admissions<sup>1</sup>.

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<sup>1</sup>As shown in table 1, the number of unique admissions within one stratum exceeded the estimated at risk population in one LSOA in 2017 resulting in an admission rate of 1.1. There were 11 admissions from an estimated population of 10 females aged over 65. We believe this is due to fluctuation in population, possibly due to the opening of a care home after the census was conducted in 2011, which was not accounted for in the mid-year population estimate. Data from this LSOA were included in final analyses, as excluding made only negligible differences to model output.

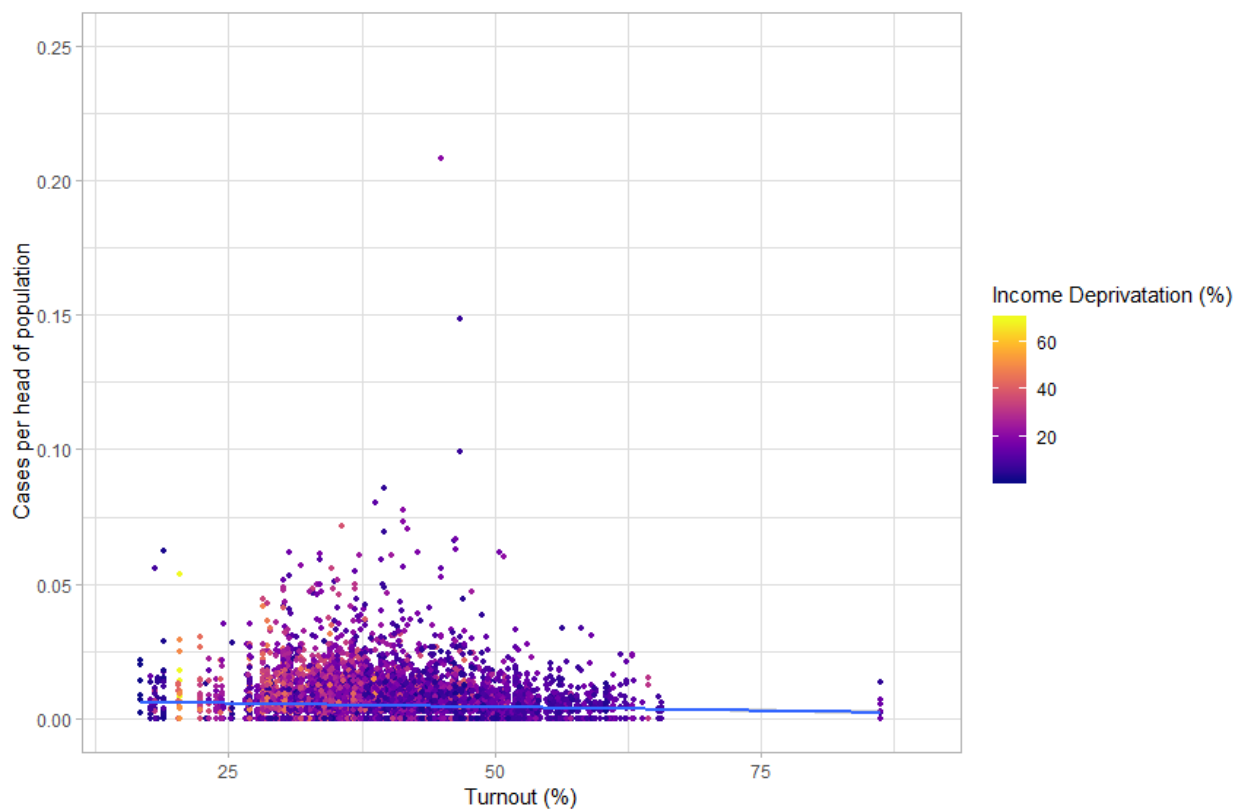
*Area level characteristics*

Table 2.

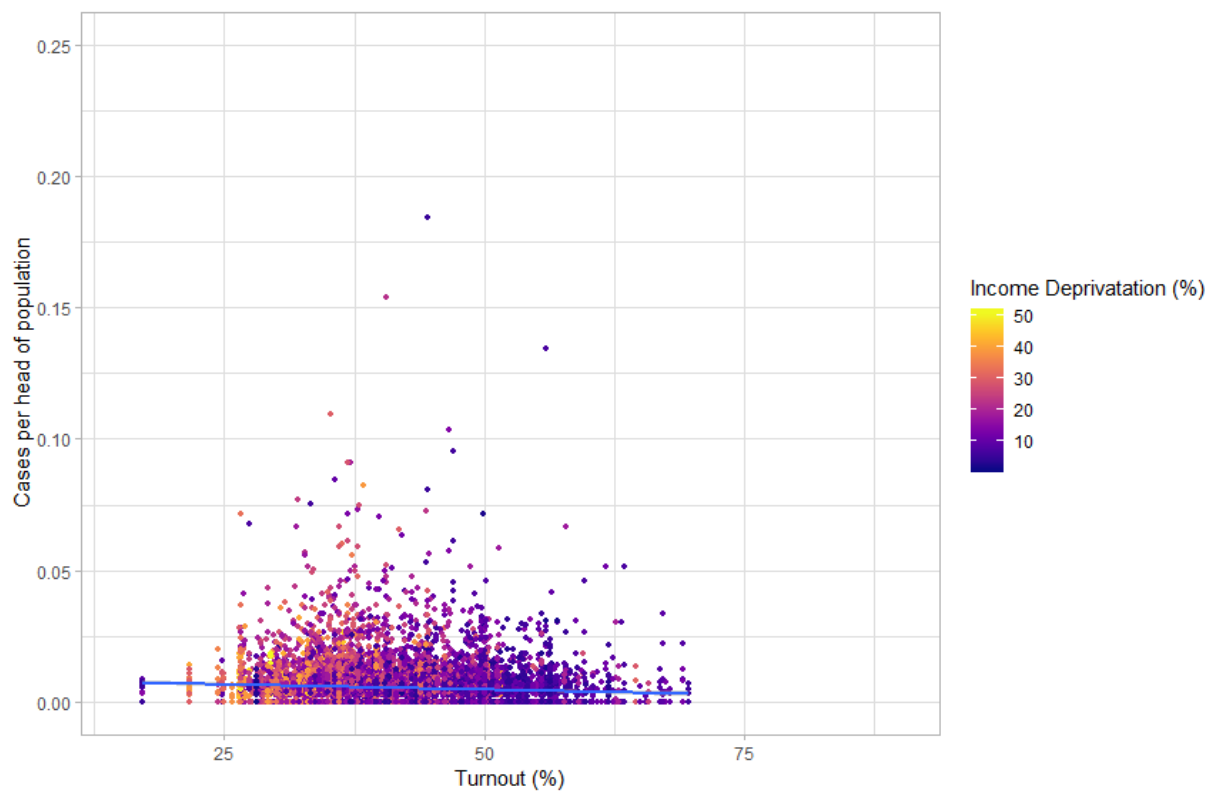
*Area level characteristics*

	2012	2017
Average % turnout (SD)	39.2 (8.25)	42.0 (8.79)
Range	16.71 - 86.16	17.17 – 69.59
Average % income deprivation (SD)	17.54 (10.19)	16.3 (9.69)
Range	3.00 - 69.00	1.0 - 63.0

Table 2 displays average local election participation turnout and income deprivation for the whole of Wales and shows considerable variability in both variables across both exposure periods as indicated by high standard deviations and wide ranges. Figures 1 and 2 show LSOA level admission rates (cases per head of population) plotted against percentage turnout for 2012 (Figure 1) and 2017 (Figure 2). The colour spectrum indicates the percentage income deprivation for each LSOA.



*Figure 1. Plot of cases of admissions per head of at risk population against local election participation turnout in 2012. Percentage income deprivation is represented by colour ('ggplot2' Wickham et al., 2009).*



*Figure 2. Plot of cases of admissions per head of at risk population against local election participation turnout in 2017. Percentage income deprivation is represented by colour ('ggplot2' Wickham et al., 2009). For plotting clarity, the outlying admission rate of 1.1 discussed in the footnote above was not included.*



Table 3.

*Regression model output*

	Intercept			Turnout					Income Deprivation				
	$\beta$	SE	Z	$\beta$	SE	Z	RR	95% CI	$\beta$	SE	Z	RR	95% CI
2012													
Null Model	-5.58*	0.19	-29.34	.	.	.	.	.	.	.	.	.	.
Model 1: Turnout	-5.56*	0.19	-29.17	-0.12*	0.02	-5.67	0.89	0.85-0.92	.	.	.	.	.
Model 2: Income deprivation	-5.56*	0.19	-29.34	.	.	.	.	.	0.27*	0.02	16.93	1.31	1.27-1.35
Model 3: Turnout + Income deprivation	-5.56*	0.19	-29.29	-0.03	0.02	-1.3	0.97	0.93-1.01	0.26*	0.02	15.82	1.30	1.25-1.34
2017													
Null Model	-5.58*	0.14	-39.5	.	.	.	.	.	.	.	.	.	.
Model 1: Turnout	-5.57*	0.14	-39.81	-0.13*	0.02	-6.28	0.87	0.84-0.91	.	.	.	.	.
Model 2: Income deprivation	-5.57*	0.14	-39.96	.	.	.	.	.	0.26*	0.02	15.18	1.29	1.24-1.34
Model 3: Turnout + Income deprivation	-5.57*	0.14	-39.97	-0.01	0.02	-0.6	0.98	0.94-1.03	0.25*	0.02	13.72	1.28	1.23-1.33

Note:  $\beta$  = coefficient , SE = coefficient standard error, z = coefficient Z score, \* =  $p < .0001$ , RR = rate ratio, CI = confidence interval

### *Regression analyses.*

Including only turnout as a predictor (fixed effect), there was a significant relationship with LSOA level admission rate in both 2012 and 2017 (Figures 1 and 2) such that comparing two LSOAs with a 1 standard deviation (SD) difference in turnout, the higher turnout area was associated with an admission rate 0.89 times (95% CI=0.85-0.92) that of the lower turnout area in 2012, and 0.87 times (95% CI=0.84-0.91) in 2017 (Table 3). Including income deprivation as the only predictor, there was a significant relationship between deprivation and admission rates in both 2012 and 2017. An area with 1 SD higher income deprivation was associated with admission rates 1.31 times higher in 2012 (95% CI=1.27-1.35) and 1.29 times (95% CI = 1.23-1.34) in 2017.

When including both predictors as fixed effects, thus controlling for income deprivation, turnout was no longer significantly associated with admission rates in either 2012 (RR=0.97, CI=0.93-1.01,  $p>.05$ ) or 2017 (RR=0.98, CI=0.94-1.03,  $p>.05$ ). In the full model, greater income deprivation significantly predicted higher admission rates. An area with 1 SD higher income deprivation was associated with admission rates 1.30 times higher in 2012 (95% CI=1.25-1.34) and 1.28 times (95% CI=1.23-1.33) in 2017.

Examining Akaike Information Criteria values (Table 4) indicates that in both years, models including only income deprivation as a predictor resulted in the best fitting model. Including turnout resulted in a more complex, less parsimonious model.

Table 4.

*Akaike Information Criterion*

	AIC	
	2012	2017
Null model	27624.6	28344.4
Model 1: Turnout	27595.2	28310.6
Model 2: Income deprivation	<b>27363.1</b>	<b>28130.6</b>
Model 3: Turnout + Income Deprivation	27363.5	28132.3

Note: AIC = Akaike Information Criterion. A lower value indicates better fitting model

## Discussion

Our aim was to investigate the relationship between political participation as a proxy measure of social capital, and rates of hospital admission for psychiatric treatment in Wales. Turnout was significantly associated with admission rate - a standard deviation increase in local election participation turnout was associated with 11% lower neighbourhood-level admission rates in 2012 and 13% lower in 2017. The association between turnout and admission rate however, was not significant when controlling for area-level income deprivation. Higher admission rates were significantly associated with greater income deprivation. The observed pattern of findings was stable across 2012 and 2017 suggesting that the relationships between these variables may be consistent across time.

The literature to date has produced inconsistent results in respect of the relationship between voter turnout and mental health outcomes. Lofors & Sundquist (2007) found a similar pattern of results to the present study in that turnout and hospitalisation for depression were no longer significantly associated when neighbourhood socio-economic deprivation was taken into account. They did find, however that admissions for psychosis were significantly associated with turnout even when accounting for neighbourhood deprivation. In contrast Heslin et al. (2018) found no association between neighbourhood voter turnout, deprivation and length of hospitalisation for psychosis in South London. Kirkbride et al. (2007) found that a 1% increase in voter turnout in Southeast London, independently predicted a 5% reduction in incidence of psychosis which remained significant after controlling for population density and deprivation. The nature of associations between area socio-economic risk factors and mental health outcomes is highly

complex and dependent on a range of factors that were not captured in the present study.

*Methodological issues.*

All admissions for psychiatric treatment in 2012 and 2017 were included in our analysis but due to inconsistent reporting of complete diagnostic information we were not able to examine associations between area-level characteristics and admission rates between different diagnoses. Doing so would have required us to discard data from a health board serving the most densely populated and socio-economically varied areas of Wales. Neighbourhood factors including social capital influence risk and outcome differently across different mental health conditions (Mckenzie, Whitley & Weich, 2002; Lofors & Sundquist, 2007; Burns & Kirkbride, 2012) and it is possible that diagnosis could account for variance in admission rates we were not able to measure. Although the aetiology of organic and non-organic; psychotic and neurotic psychiatric illnesses are unquestionably different, our interest was in hospital admission which we consider a valid and important measure of service utilisation.

Ward-level average participation turnout to local council elections provided us with turnout data at a high spatial resolution, and although an unspecified number of wards were unable to return data on the number of ballot papers issued (Electoral Commission, 2012, 2017) which would have affected calculation of participation turnout, we believe this would not have significantly affected the reliability of the measure. Similarly, issues with inconsistent diagnostic information notwithstanding, we would consider admission counts derived from the Patient Episode Database for Wales to be a reliable outcome measure which

enabled us to accurately capture variation in admission rates across small geographical areas.

The use of area-level measures of political participation and income deprivation prevents us from commenting on potential individual-level risk of admission. In order to fully understand the range of factors contributing to risk of psychiatric admissions both individual and area-level factors must be considered. The present study was not designed to comprehensively predict all the variance in admission rates and instead demonstrates the relative importance of political participation to the understanding of area-level risk. It is also worth considering that ‘neighbourhood’ was defined in the current study by administrative boundaries (ward, LSOA, local authority) used to group individuals into areas suggested to share socio-economic characteristics. As March et al. (2008) point out however, these areas may not correspond too closely to meaningful social groups and communities in the real world.

Turnout data, and thus theoretical exposure to the effects of political participation/social capital were taken from three specific time points – May 2012, May 2013 (postponed 2012 Anglesey local elections) and May 2017. Percentage income deprivation data were obtained for 2014 and 2017. 2012 data were not available. In effect, our analysis for 2012 contained exposure variables spanning from 2012 to 2014. Preliminary analyses indicated that the inclusion/non-inclusion of the 2013 Anglesey data did not significantly influence the results of regression analyses and we therefore decided to include it in the final models. Including turnout, income deprivation and admission data in a separate analysis for 2017 as a partial replication suggests that the analysis was robust to these variations in exposure period.

### *Interpretation of findings*

Our analysis did not show that political participation had any relationship with admission rates that was independent of area-level economic capital. It is possible of course that turnout was too crude a measure of political engagement. Although turnout is unquestionably a measure of political activity that has been demonstrated to be associated with health outcomes, it may be that other measures may yield different results. For example party membership, rates of attendance to MP surgeries, letter writing, and social-media activity related to politics are all possible area level measures of political activity that might be more sensitive than turnout. However, our finding relating to the relative strength of income deprivation as a predictor is consistent with previous literature and arguably consistent with theoretical explanations for previously observed associations between political activity and health outcomes.

Blakely, Kennedy & Kawachi, (2001) suggest that more politically active areas achieve better health outcomes by encouraging more generous social policy (e.g. welfare spending) at a local and national level. What the present results indicate is that economic capital plays the more important role in predicting variation in admission rates. Blakely et al. (2001) argue that lower income is associated with restrictions in access to beneficial resources and opportunities; reduced neighbourhood-level social cohesion; and emotional and psychological distress in reaction to one's position in society. Greater inequality is argued to be associated with reduced participation which in turn results in policy that affects health. Psychological processes related to both social and economic capital may also be aetiologically relevant. For example lack of trust in political institutions

was shown to be associated with both a lack of trust in other people generally and self-reported poor psychological health (Lindstrom & Mohseni, 2009), and voting behaviour may be encouraged by the threat of social sanction (Gerber, Huber, Doherty, & Dowling, 2016).

### *Implications*

Research could employ alternative measures of social capital and political participation. Election outcome and margin of victory could be potential candidates for predictor variables and the National Survey for Wales (2018) contains items referring to community trust and perceived political influence. Although turnout to general elections in the UK have increased since 2001, a recent survey indicated that people in the UK have never been less politically engaged and this is especially pronounced in younger people (Dempsey & Johnstone, 2018). Social media use has been shown to be strongly associated with civic and political participation in younger adults and may provide an ecologically valid measure of communitarian social capital (Gil de Zúñiga, Jung & Valenzuela, 2012; Boulianne, 2015). Individual psychological process may also play a role.

Length of hospital stay and readmission would be important to consider in forming a full picture of area level links to service utilisation. 9% of admissions last longer than 90 days and 1% last longer than a year (Thompson et al., 2004), and understanding associations between neighbourhood factors and repeated admissions would provide a more complete picture of the mental health disease burden (Metcalf et al., 2003). Admission to hospital is one of many outcomes associated with serious mental illness that may be influenced by neighbourhood factors. Admission is precipitated by circumstances (e.g. escalation in symptom



severity, risk, breakdown in community support) that could also result in death by suicide, an outcome also shown to be associated with area social capital (Kunst, van Hooijdonk, Droomers, & Mackenbach, 2013; Okamoto, Kawakami, Kido, & Sakurai, 2013).

### *Conclusion.*

To our knowledge, this was the first study to examine the relationship between social capital, economic capital and psychiatric hospital admissions in Wales. Area level voter turnout, argued to be a measure of social capital is associated with rates of admission to psychiatric hospital, but our results suggest this relationship does not provide as useful an indicator of admission risk as area level economic deprivation. These findings make an important contribution to a sparse literature on the links between social capital and hospital admission as a mental health outcome, whilst strengthening the case for the importance of neighbourhood economic capital as a risk factor.

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### **Chapter 3: Implications for future research and theory development**

## **Implications for future research and theory development**

### *Summary of Findings*

This thesis explores the influence of participation in trajectories into and through psychiatric hospital. Participation in the form of voting in elections, and participating in the crucial decisions relating to treatments that take place in hospital. Whilst psychiatric hospitalisation is assumed to keep people safe when at significant risk due to mental health problems, there is evidence that admission may itself be a risk factor for suicide (Large & Ryan, 2014). People who have been hospitalised, especially involuntarily, may suffer trauma as a result of adverse experiences of treatment; feel stigmatised, suffer reduced self-esteem, and poorer social and occupational outcomes, also possibly as a result of their experiences in wards (Rüsch, et al., 2014; Chung, Ryan, & Large, 2016). Understanding all facets of psychiatric admission is therefore an important goal for research.

The literature review presented in chapter one is the first to summarise qualitative investigation into patients' experiences of treatment planning in psychiatric hospital. It is well known that institutional decision-making can limit choice. The first chapter provides a comprehensive review of the personal consequences of these limits for patients. Treatment planning practices can confer either the caring, soothing sense of security we expect from hospital; or a distressing, depersonalising experience which separates people from valued identities. Services should pay attention to the process of treatment planning in psychiatric hospital as well as the outcome. The review provides the basis for further research into specific decision-making modalities and interventions.

The second chapter details a spatial epidemiology study which investigated the relative importance of neighbourhood political participation and economic



capital in the prediction of psychiatric admission rates. Multi-level regression models enabled us to model the variation in admission rates between groups of people organised by age, sex and neighbourhood of residence and showed that whilst areas where more people participate in local council elections are associated with lower admission rates, this relationship is not statistically significant when the influence of area level income deprivation is taken into account. The analysis was conducted on data from 2012 and 2017 indicating that this lack of independent association may be stable across time.

### **Theory development and future research**

#### *Empirical Paper*

The findings presented in the empirical paper contribute to the body of research into the links between the socio-economic characteristics of a neighbourhood, and the health of its residents. Theories attempting to explain the mechanisms by which features such as neighbourhood social and economic capital influence health fit broadly into three categories: The social capital hypothesis; the status anxiety hypothesis; and the neo-materialist hypothesis (Layte, 2011).

The social capital hypothesis proposes that neighbourhoods high in social capital promote individual health via three mechanisms: firstly in trusting, cohesive neighbourhoods with healthy behavioural norms (regarding e.g. substance use, exercise), people are more likely to support others in times of need, and regulate unhealthy behaviour; secondly, politically active communities are more likely to encourage investment and provision of health promoting infrastructure and resources; thirdly higher levels of interpersonal trust, reciprocity, emotional support may influence individual psychosocial functioning if for example, people

feel safer, less fearful, and more interpersonally connected (Layte, 2011; Kawachi & Berkman, 2000; Putnam, 2000)

The status anxiety hypothesis (Wilkinson & Pickett, 2006) proposes that the higher levels of emotional distress (and psychological illness) in more deprived neighbourhoods are explained by the effect on individual self-worth and interpersonal/societal status. Increased shame and decreased interpersonal trust are amongst the responses people may have to a perceived difference in status. As Layte (2011) points out, the social anxiety and social capital hypotheses overlap in that lower interpersonal trust will affect an individual's access to resources.

Finally, the neo-materialist hypothesis suggests that poorer health outcomes in more unequal communities is explained by differences in levels of investment and development of community resources (e.g. housing, education, health services, transport etc; Kawachi & Berkman, 2000; Layte, 2011).

The findings of the empirical paper, that the association between political participation and admission rates was not significant when controlling for income do not clearly provide support for any theory emphasising the role of community social processes or civic engagement in health outcomes. It is possible that in our data, voter turnout also functioned more closely as a proxy for economic capital than social capital. Wealthier, more highly educated people are more likely to vote (Dempsey & Johnstone, 2018).

The pattern of findings may be interpreted to suggest that economic deprivation results in increased risk of admission (social causation), or that people at higher risk of admission tend to move to more deprived areas (social drift; Mair et al., 2008; March et al., 2008; Gage, Davey Smith & Munafo, 2016). In order to

investigate this, longitudinal designs would be required which take account of the timing of admission and exposure to socio-economic conditions.

Our study does not rule out a role for social capital. It is possible that alternative measures of political participation, some other type of civic engagement, or an alternative conceptualisation/operationalisation of social capital could yield different results. For example, Tampubolon, Subramanian, & Kawachi (2013) used the Welsh Health Survey and Living in Wales Survey to measure neighbourhood ‘network social capital’ i.e. aggregated responses to questionnaire items relating to community trust and friendliness. They found an association between perceptions of trusting, friendly neighbourhoods and self-rated physical health.

Our finding related to the importance of area-level income deprivation in psychiatric admission rates is consistent with a number of studies showing deprivation, unemployment and welfare usage to be associated with psychiatric admission rates (Dekker et al. 1997; Peen & Dekker, 2001; Richardson et al. 2015; Keown et al. 2016). It should be kept in mind however, that studies of this type would not necessarily be able to support these hypotheses alone. Epidemiological studies are not able to explain variation in outcome, only to predict it (Curtis et al. 2006).

It is important to keep in mind the general limitations in epidemiological research in discussing the empirical paper. Firstly, we cannot assume that the people admitted to hospital and thus included in our outcome data were individually exposed to area level voter turnout or income deprivation. It is possible, if improbable that every patient admitted voted and was personally unaffected by income deprivation. The results of the empirical paper do not allow

us, therefore to infer any individual level causal relationships or associations between economic capital and psychiatric admission (Diez-Roux, 1998). In addition, our analysis included two amongst many socio-environmental variables which might play a role in predicting variation in admission rates.

Candidate predictors which could be examined in future studies conducted with admissions data for Wales include urbanicity (possibly measured by population density), ethnic density, and density of Welsh language speakers (Curtis, 2006; Thompson et al., 2004; Fett, Lemmers-Jansen, & Krabbendam, 2019). Predicting multiple admissions and relapse rates are important goals in this field of research which could be addressed in future studies (Heslin et al., 2018). Neighbourhood factors may influence admission risk differently for different psychiatric disorders, and although it would be mistaken to assume consistency in practice in areas which do report diagnoses, investigating the effect of our predictors across diagnoses would be a valid approach for future studies (e.g. Peen & Dekker, 2001; Thompson et al. 2004; Lofors & Sundquist, 2007).

### *Literature review*

The maze model contributes a patient perspective on the personal consequences of treatment planning processes, and the spectrum of clinical motivations and behaviours relevant in decision making interactions: from the controlling and coercive; the skilled and reassuring; the time-poor, risk averse and frightened; and the flexible and reciprocal. Professionals are well aware of these practical and philosophical tensions. Fears of suicide and violence, and the personal and legal consequences strongly influence clinical approaches to treatment planning (Bee, Brooks, Fraser & Lovell, 2016). This range of behaviours may exist in all systems,

teams and even within the same individual, and it is difficult to allow space for the understanding of all, and discuss the findings of the review without falling into traps of: a) failing to acknowledge the full range of patient experiences; b) situating problems within one profession; or c) situating problems and solutions within patients. Researchers commonly draw upon ideas regarding power, domination and control in the explanation of coercive practices in medicine (Roberts, 2005; Bracken, Khalfa & Thomas, 2007; Hamilton and Manias, 2008; Curtis et al., 2014). The findings of the literature review may be explained by drawing on aspects of social and linguistic theory regarding power and decision making in social systems.

‘Field theory’ (Bourdieu, 1984) proposes that in social spaces, power relations can be understood through differences in the quality and quantity of social, cultural and economic capital possessed by each actor, and the degree to which they are able to embody an implicit understanding of the space’s specific rules, codes and symbols. In contrast to the ‘communitarian’ approach to social capital discussed in chapter two, Field Theory sees social capital as a feature of the relationships between individuals, rather than between individuals and their communities. Academia, the military and politics are examples of ‘fields’ and we suggest that field theory could be used to interpret the flow of power in inpatient treatment planning (the maze). Professionals - ‘the real authorities’ in the maze are those with attributes such as the education, dress and technical linguistic competence (cultural capital); interpersonal connections (social capital); and financial background to facilitate relatively comfortable access to and navigation of the field (economic capital). Many professionals develop an understanding and flexibility with the language and practices of the treatment planning maze and thus perpetuate its structures. The capital and resource available to clinicians is often

unavailable or denied to patients. For some, this is unproblematic or unquestioned. Others however experience this mismatch of experience, disposition and skillset, along with professionals' attempts to retain order through coercive practice, as distressing and traumatic. Responses to this are natural and understandable responses to trauma and distress. Antagonism between patients and clinicians both struggling to contain their distress at this tension and some patients either withdrawing to avoid further trauma (opting out), or being tasked to 'learn the rules' in order to function and remain safe (playing the game).

The theory of communicative action (Habermas, 1984) would explain how treatment decisions are perceived by as being based on either 'normatively regulated action' or 'dramaturgical action'. Normatively regulated action bases decision making on values, norms and habits that generally go unquestioned. We would support others (e.g. Gilbert, Rose and Slade, 2008) in arguing that an overreliance on medical and diagnostic reasoning in treatment planning is reflective of this. 'Dramaturgical action' takes place when we act to present ourselves to an audience, whilst keeping our own goals and values private. 'Playing the game' - where patients behave so as not to appear to be subverting authority could be an example of dramaturgical action.

It is arguable too that social, cultural and linguistic factors in research also restrict understanding and debate on this subject. Inclusion criteria in the original studies and potential biases in recruitment resulted in samples of people who firstly wanted to participate and secondly were (or were deemed) able to participate. Additionally, individuals who prefer not to, or are not able to communicate their experiences (first order translations) in such a way as to be interpreted by qualitative researchers are also excluded from this review. People who don't share

linguistic competence with researchers and those with social-communication deficits or intellectual disabilities may be under-represented in this field of research. Social communication difficulties are common in individuals in inpatient settings (Speed, Goldstein & Goldfried, 2017) and it is not clear how effective inpatient mental health services in United Kingdom are at assessing and diagnosing cognitive deficits in inpatient psychiatric settings (Sheehan et al., 2016). Sheehan et al. (2016) suggest the intellectual disability liaison nurses could be deployed in adult inpatient psychiatric settings, and although our review cannot speak to this, we would suggest that further research into the experiences of this group of patients is urgently needed.

In their critique of the ‘recovery model’, the philosophy on which many mental health services are based, Woods, Hart and Spandler (2019) argue that the preferential use of particular linguistic and narrative tropes (e.g. resilience, struggle, change, acceptance etc.) limits discourse to stories which conform. We argue above that assumptions and practices in the treatment planning maze, known and used with ease by professionals and reflective of normatively regulated communication, also create restricted and exclusionary narratives in inpatient decision making. Favouring storytelling in treatment planning discriminates against people who ‘lack’ the need, will or skill to narrate - people that might be dismissed (or diagnosed) as ‘lacking insight’, ‘poor historians’, ‘not psychologically minded’, or who simply do not speak the same language as clinicians. This same issue is reflected in research in this area. Qualitative meta-synthesis certainly privileges stories which can firstly be told, secondly recounted verbally in interviews and finally translated into written form. Explicitly defining what we meant by ‘treatment planning’ was useful in forming the research question

and inclusion criteria, and necessary to construct a question and set of definitions which was relevant to clinical practice and which matched those in use in the literature. The definitions we arrived at were however fundamentally clinical, and therefore perhaps reflective of a narrow view of the purpose and practice of decision making in psychiatric hospital. A view rooted in my role as a trainee psychologist, and in my ethnicity, gender, social class and so on. This choice of pragmatic, clinically relevant terms viewed through a set of socio-cultural lenses, was in fact a trade-off in which ideas, terms and definitions which didn't conform to this view may have been lost. This and other reviews of this type could be argued to reinforce this preference in practice and research for narrative: "reifying a Western, arguably middle and upper class, concept as a universal mode of shaping and articulating subjective experience" (Schiff, 2006. P.21 in Woods et al., 2019).

Future research is also needed into specific decision making processes, practices and outcomes. We would suggest that the Maze provides a useful tool for guiding research questions in this area. Field theory and the theory of communicative action could offer theoretical bases for research. The specific experiences of sub-groups within the inpatient population should also be systematically examined. The concepts of social, cultural and economic capital would provide a useful framework for articulating the differential influences of social position on functioning in the maze.

### **Implications for clinical practice**

#### *Empirical paper*

Our findings support interventions attempting to reduce income deprivation, and to situate psychiatric services in more economically deprived areas (Curtis et al.,



2007; Carrier & Kendall, 2015; Gandre et al., 2018). Moreover, the empirical paper makes an important contribution to the understanding of socio-economic factors in mental health outcomes, the likes of which should be accounted for in national health and economic strategy. The ‘A Healthier Wales’ plan (Welsh Government, 2018) sets the reduction of general hospital admissions and re-admissions as a goal for health boards, but neither explicitly includes psychiatric admissions or refers to social predictors of admissions in its documentation. It has been pointed out that individual responsibility for health outcomes (i.e. healthy personal choices) are emphasised in the document whereas governmental responsibility for (or awareness of) social conditions associated with mental wellbeing is not). Our paper also supports suggestions to appoint professionals, or support those already appointed to promote research in this area in policy making fields (Psychologists for Social Change, 2018).

Training programmes for all mental health professionals, including clinical psychologists, should continue to emphasise epidemiological research methods, the design and evaluation of community and public mental health interventions, and the wider public communication of research findings in curricula. Clinical psychologists may be well placed to contribute alternative emotional, psychological and social perspectives as well as those derived from epidemiological research in fields perhaps more comfortably occupied by colleagues from other professions.

Although the findings of the empirical paper do not further understanding of individual factors in mental health problems, and so are of limited use in individual formulation, practicing psychologists might benefit from developing understanding of the socio-economic features of the neighbourhoods in a service’s

catchment area. Although the mechanisms are complex, wider social context does affect individual psychosocial function and building an understanding of neighbourhood features may prove useful.

### *Literature review*

The maze presents three options for clinical application. Firstly, meaningful change at the legislative, professional and service level is required to remove the conditions in which iatrogenic harm results from planning practices; secondly interventions designed to promote reciprocity in decision making; and thirdly providing opportunities for patients to understand and manage the personal impact of practices.

Others have suggested measures that might work to challenge the clinical cultures that underpin the functioning of the maze. The Power Threat Meaning Framework (Johnstone & Boyle, 2018) invites clinicians and patients to questions and challenge practices such as diagnosis, and explicitly focuses on the experience of power (both positive and negative) in understanding mental health problems and experiences of care. ‘Understanding Psychosis’ (Cooke, 2017) similarly offers professionals and patients a way to discuss unusual beliefs and experiences (i.e. normally labelled as symptoms) as conveying important meaning, without needed to refer to diagnostic or scientific concepts of questionable validity. National legal and professional standards should also address the issues raised in this review. The Mental Health Act review (2018) might set the context for change to decision making practices but the practicalities of applying legislation to complex clinical practices are well documented. Professional and service level standards such as the

AIMS accreditation standards (Royal College of Psychiatrists, 2017) should go further to promote more plural, less paternal approaches to treatment planning.

The review and the wider literature suggest that the clinical knowledge and expertise is a source of considerable cultural capital through which professionals exert influence in the maze. The original conception of evidence-based practice includes research, clinical expertise and patient preferences as the three sources of information on which to base treatment choices and shared decision making models such as professional user dialogue (PUD) should be routinely employed (Noorani, Karlsson & Borkman, 2019). PUD, an example of communicative action, is an approach that gives equal regard in decision making to treatment outcome research, clinical expertise, and the patient's unique experience and understanding of the clinical problem. Those who prefer to trust the options provided by clinicians are thus given the option to do so. Indeed, amongst patients who prefer to take more of a passive role in decision making, those who were more active in negotiating processes experienced improved outcomes (Légaré & Thompson-Leduc, 2014). The flow of power in the maze could thus be influenced by teams adopting models which deliberately place value on patient experiences.

Antagonism in treatment planning exists within *relationships* rather than individuals. Interventions designed to teach social communication and assertiveness skills to inpatient psychiatric populations including both patients and staff have been shown to improve self-reported anxiety and self-esteem, behavioural measures of assertiveness and social skill, and improve hospital discharge and relapse rates (Benton & Schroeder, 1990; Speed, Goldstein & Goldfired, 2017). Approaches such as 'nonviolent communication' (Rosenberg, 1999; 2004), which teaches techniques for compassionate, empathic

communication and confrontation have been trialled in various inpatient settings and could provide one model for patients and professionals to collaboratively develop mutual and reciprocal approaches to treatment planning thereby reducing the mismatch between patients and professionals feel for the rules of the ‘maze’, increasing the cultural capital of patients, and promoting communicative action (Lee et al., 1998; Suarez et al., 2014; May, 2016). This approach should of course be combined with psychoeducation and the provision of adequate information on medical and other treatment approaches.

As well as psychosocial therapies alongside or instead of pharmacological treatment, services should provide opportunities for patients to discuss, understand and perhaps to cope with the psychological and emotional impact of treatment planning practices. Individual psychotherapy is one possibility for this, and certain therapeutic modalities which emphasise identity and role taking in interpersonal relationships may be theoretically well suited to these themes (e.g. attachment-focussed psychodynamic psychotherapy, Cognitive Analytic Therapy).

We would also suggest a ‘mutual aid group’ (MAG) approach (Noorani et al, 2019). MAGs are composed of people who share experiences of a particular situation or problem and through supportive, non-judgmental, mutual exploration of these experiences seek to generate new insights, test alternative interpretations of situations, and develop solutions. MAGs are voluntary, not based on any particular theoretical model, not facilitated by professionals and encourage participants to view experiences from more than one perspective. We would suggest that a MAG could be one way for patients with a range of positive and/or negative experiences to understand and explore not only practical and informational aspects of treatment planning, but also the deeper personal

experiences highlighted in the review. MAGs are potentially cost effective, and a way of enhancing patient capital in ways that accept a range of philosophical influences (i.e. medical and non-medical) without preferring or judging any.

### **Personal Reflections**

Some people, for whom the themes of this thesis are particularly relevant, were not able to participate in qualitative studies, or were not admitted to hospital. People with whom I have worked during training would have been unlikely to be recruited to the studies in the literature review due to inclusion/exclusion criteria. People who die by suicide are not reflected in hospital admission data. Across this literature and thesis, people systemically denied a voice, and those for whom life was ultimately intolerable are absent. During clinical training I worked with a man who sadly died by suicide, and a number of clients traumatised by treatment planning interactions. These experiences and my emotional reactions to them have undoubtedly played a role in the conception of this project and interpretation of the data. The discomfort I feel at this is not easily resolved, nor necessarily should it be. Finding meaning, purpose and perhaps knowledge in these experiences will I hope, inform the choices I make in future research and clinical work.

I hope that the findings of this thesis make some contribution to improving the experiences of people in psychiatric care, and to the understanding of the social determinants of mental health outcomes. I believe the insights I gained from the extensive engagement with the treatment planning literature, and the methodological techniques I was required to learn for both papers prepare me well for future research in this field. Learning an unfamiliar set of statistical techniques would not have been possible without extremely skilled tuition, and I valued the

patient guidance and reassurance of supervisors when feeling the urge to add theoretically unrelated predictors into regression models in search of glamorous findings. The most stimulating moments throughout the course of this research have come in exploring and interpreting the work with other people. I look forward to more of the same.

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## **Appendices**

## **Appendix 1 - Definitions of treatment planning**

Included in 'Treatment Planning'	Not included in 'Treatment Planning'
Treatment' refers to interventions targeting patients reasons for being in hospital	Incidental or unplanned therapeutic contact e.g. talking through problems with nurses, or aspects of the environment or system designed to confer therapeutic benefit
Decision making and planning related to this treatment	Decision making or planning relating to routine activities, everyday life, or other features of inpatient life not specifically targeting mental health.
The act and process of making and reviewing treatment decisions e.g. ward round meetings, care and treatment planning documentation	The delivery or outcomes of treatments
Decisions about admission and discharge i.e. the decision to treat or remain in hospital	Planning in relation to general ward procedures, rules, and systems not explicitly aimed at individual treatment
The conditions required for effective/ineffective planning e.g. relationships, information	Everyday, incidental relations with staff or fellow patients
The personal and emotional meaning of experiences of treatment planning	The personal and emotional meaning of experiences of inpatient hospital in general
Plans made about treatment by people other than the patient	
Feelings, beliefs, perceptions about the ability to engage in planning and decision making	

## **Appendix 2 - CASP ratings – lead author only**



CASP Table.

CASP question	Study number																				
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21
Was there a clear statement of the aims of the research?	1	1	1	1	1	1	1	1	0	1	1	1	1	1	1	1	1	1	1	1	1
Is a qualitative methodology appropriate?	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Was the research design appropriate to address the aims of the research?	1	1	1	1	1	1	1	1	?	1	1	1	1	1	1	1	1	1	1	1	1
Was the recruitment strategy appropriate to the aims of the research?	1	1	1	?	1	1	1	1	?	1	1	1	1	1	1	1	1	1	1	1	1
Was the data collected in a way that addressed the research issue?	1	1	1	0	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Has the relationship between researcher and participants been adequately considered?	1	1	0	?	1	1	0	?	0	0	1	1	1	1	1	1	0	?	0	0	1
Have ethical issues been taken into consideration?	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Was the data analysis sufficiently rigorous?	1	1	1	1	1	1	1	0	1	1	1	1	1	0	1	1	1	1	1	1	1
Is there a clear statement of findings?	1	1	1	1	1	1	1	0	1	1	1	1	1	1	1	1	1	1	1	1	1
Is it clear whether the researchers critically examined their own role, potential bias and influence?	1	0	1	?	1	0	1	?	0	0	1	1	0	0	0	1	1	?	0	0	1
Is this research valuable	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1

Note: CASP = Critical Appraisal Skill Programme checklist (CASP, 2018)

Key: 1: study judged to satisfy criteria; 0 = study judged not to satisfy criteria; ? = unable to determine



### **Appendix 3 - Data extraction example**

Gault, I., 2009. Service-user and carer perspectives on compliance and compulsory treatment in community mental health services. Health Soc. Care Commun. 17 (5), 504–513.			
Supporting data (if presented)	Concepts	2nd order	3rd order
	<b>Main themes and concepts related to planning</b>	Author interpretation - preserve as much context as possible and use authors language. Found in results and discussion sections.	A new interpretation that applies across studies (emergent). Continuously review these interpretations against new themes and concepts, discard and develop accordingly. These concepts should relate to the question.
	Loss of credible identity	Participants felt that becoming a mental health patient (although the term service user is in common usage, participants described the process as becoming a patient), had caused them to lose a previously credible identity and to become someone whose voice no longer counts	Self and identity - hospitalisation represents a change in self-concept, a loss to be coped with Transition. .
<i>I was at work I had a life before this. I was all right, I was going to university. p.509</i>		Many participants talked about how they (or their carer) felt they had lost a valid identity by becoming an involuntary patient.	Theme of loss - reaction to loss, reaction to change.
<i>They talk about me behind my back, then they tell me what the team decided, the second time, they didn't even have a ward round thing, the nurses just came up and said 'right you're sectioned again' I thought What?, it was a bit of a liberty. p.508</i>		The consequence of 'becoming a patient' was a loss of autonomy and feeling coerced. This could mean many things but most important was how others now made the decisions about their lives.	Loss of freedom - an intrusion of others into personal agency. Transition into roles - role confusion/regression - emergence of unresolved crisis? Erickson. Trust vs mistrust, autonomy versus shame, industry vs inferiority
<i>To stand up for me when I can't do it for myself. p.509</i>		Advocacy makes a difference, having a carer or relative on your side means having more chance of being heard.	Drawing on relationships as a resource

<i>I don't have a husband or any family to stick up for me. p. 509</i>		The mental health system was often perceived as adversarial, perhaps reflecting the legal elements of mental health care. Therefore, it was important to have someone to help represent them; for example, when trying to get discharged from hospital.	them and us - who is us?  Relationships – adversarial or caring? Oscillations and tensions.
<i>Being a good patient leads to getting my freedom back (i.e. escaping the ward). p.509</i>	Playing the game	most of the participants had worked out strategies that led to improved outcomes and less direct coercion	strategy, coping, resilience - playing a different role, providing relief to care staff
		When people made use of these strategies, when they collaborated (or made it look as though they were collaborating) with professionals, the end goals or consequences were more favourable.	
<i>They didn't even consult with me; they just gave me injections. I said to them about the side effects. But they didn't do anything, I had to take myself off to the GP. p. 510</i>	Therapeutic incompetence	Staff became unhelpful and incompetent if they failed to take user perspectives into account or prescribed medication that made people actually feel unwell.	Pts are finding ways to make up for limitations in the system
<i>Do they know what they are doing? (SU) It took them 20 years to get me on the right medication. (SU) They need much more education about the second-generation anti-psychotics. (SU) p. 510</i>		Many participants were concerned at how long it had taken to get to a stage where they felt that they were getting therapeutic benefit and adequate support. As a consequence, they often mistrusted professionals when prescribing and/or administering medication	angels and devils', system on a pedestal vs system in the swamp. Projection and attachment. Inconsistent caregivers. – maybe this is too polemic/dramatic – strong emotional responses.
		Service-users and carers could feel more confident in the competence of these professionals as their experience demonstrated that being heard, led to better treatment outcomes	Skilled communication - a facilitator of collaborative relationships. Internal representations of secure predictable staff.

		Experience services as unwilling to listen or offer respect, but instead concentrate on risk management.	What impact of risk sensitive/averse others on decision making?
		Where services see risk rather than people, this feels unhelpful and coercive.	Restrictive harness. Systemic, figurative and literal restraint.
		As Chambers (2005) noted, unintended consequences can arise from coercion; SUs resist through non-compliance. This may lead to deterioration in mental health and even necessitate compulsory admission, reinforcing feelings of coercion. This is unpleasant and does not necessarily produce better outcomes (Kisely et al. 2004).	
		Communicative competence is experienced as therapeutic competence as the consequence for SUs is effective care and treatment.	
		Concern about risk leads to seeking systems to control and predict behaviour	

#### **Appendix 4 - Reflexivity statement**

## **Meta-ethnography reflexivity statement**

### *Relevant experience*

Earlier in my career I worked as a nursing assistant on a psychiatric rehabilitation unit and more recently spent my third year of clinical psychology training working in a psychiatric rehabilitation unit. As well as changes to the physical environment resulting from ongoing building and redecoration, the unit's clinical leadership changed frequently during my short stay. Five different consultant psychiatrists, two ward managers and two deputy ward managers all served as key elements of the decision-making system over the year giving me the opportunity to participate in a wide range of processes and observe their impact on the people I worked with. My role included promoting psychological reasoning in treatment planning meetings and with colleagues, conducting psychological assessment and formulation with individuals and colleagues, devising plans for psychosocial treatments with patients, and conducting individual and group therapies with patients

These experiences shaped the research question in that regular fortnightly treatment planning meetings occupy an important position for all concerned in inpatient life, as do less formal and arguably less auditable moments of clinical decision making at other times.

### *Assumptions*

I am interested in the role of different information sources and social influence in healthcare decision making and the need for compassionate interpersonal engagement in the context of emotionally challenging clinical situations. This translates to an expectation that professionals reflect on their position and emotional reactions in decision making and that services should seek to provide opportunities for this. Related to this is the expectation that adult psychiatric services should strive for plurality, acceptance, and transparency of process



which may contrast with some manifestations of paternalistic models of care. This could establish a bias against, or blindness to the advantages of traditionally medical approaches, and possibly binary thinking in respect to questions around autonomy and authority.

#### *Relationship of researcher to material*

Accounts in some original studies and authors' interpretations resonated strongly with my own emotional reactions in treatment planning meetings. It was clear how important it was to constantly re-read studies, search for context and balance in first and second order interpretations and discussion sections. Nonetheless, these reactions will have affected the final interpretive account. A feature of my chosen profession are the opportunities afforded for reflection. Being aware that there is less emphasis on, and certainly protected time for reflective clinical supervision in nursing and psychiatry was a sobering thought especially imagining those legally/professionally responsible for safety on wards. This reflection is likely to have influenced the interpretation and translation of themes relating to authority, control, coercion and compassion and the suggestions for clinical implications. Pragmatic solutions which could fit into routine practice were conceived of and emphasised, perhaps at the expense of solutions which would go further to address more significant cultural and systemic problems.

## **Appendix 5 - Empirical paper ethics documentation**



[Redacted]  
Trainee Clinical Psychologist  
North Wales Clinical Psychology Programme  
43 College road  
Bangor  
LL57 2DG  
[psp4e9@bangor.ac.uk](mailto:psp4e9@bangor.ac.uk)

Chairman/Cadeirydd – Dr Nefyn Williams PhD, FRCGP  
Email: [rossella.roberts@wales.nhs.uk](mailto:rossella.roberts@wales.nhs.uk)  
[Debra.slater@wales.nhs.uk](mailto:Debra.slater@wales.nhs.uk)  
[sion.lewis@wales.nhs.uk](mailto:sion.lewis@wales.nhs.uk)  
Tel/Fax: 01248 384 877

23<sup>rd</sup> January 2017

Dear [Redacted]

**Re: Confirmation that R&D governance checks are complete / R&D approval granted**

**Study Title** Admissions to psychiatric units in North Wales: associations with geographical area and levels of multiple deprivation.  
**IRAS reference** 218773  
**REC reference** 16/WA/0393

Thank you for submitting your R&D application and supporting documents. The above research project was reviewed at the meeting of the BCUHB R&D Internal Review Panel

The Panel is satisfied with the scientific validity of the project, the risk assessment, the review of the NHS cost and resource implications and all other research management issues pertaining to the revised application.

**The R&D Office, on behalf of the Internal Review Panel, is pleased to confirm that all governance checks are now complete and to grant approval to proceed at Betsi Cadwaladr University Health Board sites as described in the application.**

The documents reviewed and approved are listed below:

Document:	Version:	Date:
R&D form	V5.3.2	16/12/2016
SSI form	V5.3.2	04/01/2017
Protocol	V1	03/11/2016
Data Collection form	V1	04/11/2016
Summary CV: Saville		04/11/2016
Summary C [Redacted]		04/11/2016
Summary C [Redacted]		04/11/2016
Evidence of Insurance (UMAL)		Expires 31/07/2017
Risk assessment		03/01/2017
REC favourable opinion letter		12/12/2016

All research conducted at the Betsi Cadwaladr University Health Board sites must comply with the Research Governance Framework for Health and Social Care in Wales (2009). An electronic link to this document is provided on the BCUHB R&D WebPages. Alternatively, you may obtain a paper copy of this document via the R&D Office.

Attached you will find a set of approval conditions outlining your responsibilities during the course of this research. Failure to comply with the approval conditions will result in the withdrawal of the approval to conduct this research in the Betsi Cadwaladr University Health Board.

If your study is adopted onto the NISCHR Clinical Research Portfolio (CRP), it will be a condition of this NHS research permission, that the Chief Investigator will be required to regularly upload recruitment data onto the portfolio database. To apply for adoption onto the NISCHR CRP, please go to: <http://www.wales.nhs.uk/sites3/page.cfm?orgid=580&pid=31979>.

Once adopted, NISCHR CRP studies may be eligible for additional support through the NISCHR Clinical Research Centre. Further information can be found at: <http://www.wales.nhs.uk/sites3/page.cfm?orgid=580&pid=28571> and/or from your NHS R&D office colleagues.

To upload recruitment data, please follow this link: [http://www.crncc.nihr.ac.uk/about\\_us/processes/portfolio/p\\_recruitment](http://www.crncc.nihr.ac.uk/about_us/processes/portfolio/p_recruitment). Uploading recruitment data will enable NISCHR to monitor research activity within NHS organizations, leading to NHS R&D allocations which are activity driven. Uploading of recruitment data will be monitored by your colleagues in the R&D office. If you need any support in uploading this data, please contact [debra.slater@wales.nhs.uk](mailto:debra.slater@wales.nhs.uk) or [sion.lewis@wales.nhs.uk](mailto:sion.lewis@wales.nhs.uk)

If you would like further information on any other points covered by this letter please do not hesitate to contact me.

On behalf of the Panel, I would like to take this opportunity to wish you every success with your research.

Yours sincerely,

Dr Nefyn Williams PhD, FRCGP  
Associate Director of R&D  
Chairman Internal Review Panel

Copy to:

Sponsor: Hefin Francis  
School of Psychology, Bangor University  
Brigantia Building  
Bangor  
Gwynedd  
LL57 2AS [h.francis@bangor.ac.uk](mailto:h.francis@bangor.ac.uk)

Academic Supervisor: Dr Mike Jackson  
School of Psychology, Bangor University  
Brigantia Building  
Bangor  
Gwynedd  
LL57 2AS [mike.jackson@bangor.ac.uk](mailto:mike.jackson@bangor.ac.uk)

Chris Saville  
School of Psychology, Bangor University  
Brigantia Building  
Bangor  
Gwynedd  
LL57 2AS [c.saville@bangor.ac.uk](mailto:c.saville@bangor.ac.uk)

**R&D**  
Research & Development  
Betsi Cadwaladr University Health Board

Cyfeiriad Gohobaeth ar gyfer y Cadeirydd a'r Prif Weithredwr / Correspondence address for Chairman and Chief Executive:

Swyddfa'r Gweithredwyr / Executives' Office,  
Ysbyty Gwynedd, Penrhosgarnedd, Bangor, Gwynedd LL57 2PW  
Gwefan: [www.pbc.cymru.nhs.uk](http://www.pbc.cymru.nhs.uk) / Web: [www.bcu.wales.nhs.uk](http://www.bcu.wales.nhs.uk)

**Y&D**  
Ymchwil a Datblygiad  
Betsi Cadwaladr University Health Board

Pwyllgor Moeseg Ymchwil Cymru 4  
Wales Research Ethics Committee 4  
Wrexham

Mailing address:  
Health and Care Research Wales Support Centre  
Castlebridge 4  
15-19 Cowbridge Road East  
Cardiff  
CF11 9AB

Telephone: 02920 785736  
Email: [tracy.biggs@wales.nhs.uk](mailto:tracy.biggs@wales.nhs.uk)  
[norbert.ciumageanu@wales.nhs.uk](mailto:norbert.ciumageanu@wales.nhs.uk)  
Website : [www.hra.nhs.uk](http://www.hra.nhs.uk)

18 January 2018

D [REDACTED]  
North Wales Clinical Psychology Programme  
43 College Road  
Bangor  
LL57 2DG

Dea [REDACTED]

**Study title:** Admissions to psychiatric units in North Wales: associations  
with geographical area and levels of multiple deprivation  
**REC reference:** 16/WA/0393  
**Amendment number:** AM01  
**Amendment date:** 04 January 2018  
**IRAS project ID:** 218773

The above amendment was reviewed on 18 January 2018 by the Sub-Committee in correspondence.

#### **Ethical opinion**

The members of the Committee taking part in the review gave a favourable ethical opinion of the amendment on the basis described in the notice of amendment form and supporting documentation.

The Sub-Committee noted that the amendment pertains to a request to obtain similar admission data for all other Health Boards in Wales from NHS Wales Informatics Service

On the basis of the submitted documentation the Sub-Committee decided that this amendment raises no ethical issues.

## Approved documents

The documents reviewed and approved at the meeting were:

<i>Document</i>	<i>Version</i>	<i>Date</i>
Notice of Substantial Amendment (non-CTIMP)	AM01	04 January 2018
Research protocol or project proposal	2	03 January 2018

## Membership of the Committee

The members of the Committee who took part in the review are listed on the attached sheet. No declarations of interest were made in relation to this amendment.

## Working with NHS Care Organisations

Sponsors should ensure that they notify the R&D office for the relevant NHS care organisation of this amendment in line with the terms detailed in the categorisation email issued by the lead nation for the study.

## Statement of compliance

The Committee is constituted in accordance with the Governance Arrangements for Research Ethics Committees and complies fully with the Standard Operating Procedures for Research Ethics Committees in the UK.

We are pleased to welcome researchers and R & D staff at our Research Ethics Committee members' training days – see details at <http://www.hra.nhs.uk/hra-training/>

<b>16/WA/0393: Please quote this number on all correspondence</b>
---

Yours sincerely,



**Dr Kathryn Ann Clarke**  
Chair, Wales REC 4

e-mail: [tracy.biggs@wales.nhs.uk](mailto:tracy.biggs@wales.nhs.uk)

*Enclosures: List of names and professions of members who took part in the review*

*Copy to: Debra Slater, Betsi Cadwaladr University Health Board*

**Partner Organisations:**

Health Research Authority, England

NIHR Clinical Research Network, England

NHS Research Scotland

NISCHR Permissions Co-ordinating Unit, Wales

HSC Research &amp; Development, Public Health Agency, Northern Ireland

**2. Summary of amendment(s)**

This template **must only** be used to notify NHS/HSC R&D office(s) of amendments, which are **NOT** categorised as Substantial Amendments.

If you need to notify a **Substantial Amendment** to your study then you **MUST** use the appropriate Substantial Amendment form in IRAS.

No.	Brief description of amendment <i>(please enter each separate amendment in a new row)</i>	Amendment applies to <i>(delete/ list as appropriate)</i>		List relevant supporting document(s), including version numbers <i>(please ensure all referenced supporting documents are submitted with this form)</i>		R&D category of amendment <i>(category A, B, C)</i> <i>For office use only</i>
		Nation	Sites	Document	Version	
1	We would like to add a new investigator – Mark Golightly, a trainee clinical psychologist. We would also like to look at the relationship between population density and psychosis admission rates (the original project looked at socioeconomic deprivation and psychosis admission rates)	England	All sites or list affected sites			
		Northern Ireland	All sites or list affected sites			
		Scotland	All sites or list affected sites			
		<u>Wales</u>	All sites or list affected sites			
			Study is analysis of routinely collected data, so no study site per se.			
2						
3						
4						
5						

[Add further rows as required]

**Partner Organisations:**

Health Research Authority, England

NHS Research Scotland

HSC Research &amp; Development, Public Health Agency, Northern Ireland

NIHR Clinical Research Network, England

NISCHR Permissions Co-ordinating Unit, Wales

**3. Declaration(s)****Declaration by Chief Investigator**

- I confirm that the information in this form is accurate to the best of my knowledge and I take full responsibility for it.
- I consider that it would be reasonable for the proposed amendment(s) to be implemented.

Signature of Chief Investigator: .....

Print name: Chris Saville .....

Date: 10/07/2018 .....

**Optional Declaration by the Sponsor's Representative (as per Sponsor Guidelines)***The sponsor of an approved study is responsible for all amendments made during its conduct.**The person authorising the declaration should be authorised to do so. There is no requirement for a particular level of seniority; the sponsor's rules on delegated authority should be adhered to.*

- I confirm the sponsor's support for the amendment(s) in this notification.

Signature of sponsor's representative: .....

Print name: IFAN HUW ELCT'S .....

Post: COLLEGE MANAGER. ....

Organisation: BANGOR UNIVERSITY. ....

Date: 12<sup>th</sup> July 2018 ' .....



**Partner Organisations:**  
 Health Research Authority, England  
 NHS Research Scotland  
 HSC Research & Development, Public Health Agency, Northern Ireland  
 NIHR Clinical Research Network, England  
 NISCHR Permissions Co-ordinating Unit, Wales

<b>Details of Lead Sponsor:</b>	
Name:	Huw Ellis, College Manager, College of Human Sciences
Contact email address:	Huw.ellis@bangor.ac.uk
<b>Details of Lead Nation:</b>	
Name of lead nation <i>delete as appropriate</i>	England / Northern Ireland / Scotland / <u>Wales</u>
If England led is the study going through CSP? <i>delete as appropriate</i>	Yes / No
<b>Name of lead R&amp;D office:</b>	Betsi Cadwaladr University Health Board

## 2. Summary of amendment(s)

This template **must only** be used to notify NHS/HSC R&D office(s) of amendments, which are **NOT** categorised as Substantial Amendments.  
**If you need to notify a Substantial Amendment to your study then you MUST use the appropriate Substantial Amendment form in IRAS.**

No.	Brief description of amendment <i>(please enter each separate amendment in a new row)</i>	Amendment applies to <i>(delete/ list as appropriate)</i>		List relevant supporting document(s), including version numbers <i>(please ensure all referenced supporting documents are submitted with this form)</i>		R&D category of amendment <i>(category A, B, C) For office use only</i>
		Nation	Sites	Document	Version	
1	Use measures of social capital as well as Welsh Index of Multiple Deprivations measures.	England	All sites or list affected sites			
		Northern Ireland	All sites or list affected sites			
		Scotland	All sites or list affected sites			
		<u>Wales</u>	<u>All sites</u>			
2	Use 2018 admission data as a replication dataset	Wales, all sites				
3						
4						
5						

[Add further rows as required]

**Partner Organisations:**

Health Research Authority, England

NHS Research Scotland

HSC Research &amp; Development, Public Health Agency, Northern Ireland

NIHR Clinical Research Network, England

NISCHR Permissions Co-ordinating Unit, Wales

**3. Declaration(s)****Declaration by Chief Investigator**

- I confirm that the information in this form is accurate to the best of my knowledge and I take full responsibility for it.
- I consider that it would be reasonable for the proposed amendment(s) to be implemented.

Signature of Chief Investigator: ..... 

Print name: .....Chris Saville.....

Date: ...4.3.19.....

**Optional Declaration by the Sponsor's Representative (as per Sponsor Guidelines)***The sponsor of an approved study is responsible for all amendments made during its conduct.**The person authorising the declaration should be authorised to do so. There is no requirement for a particular level of seniority; the sponsor's rules on delegated authority should be adhered to.*

- I confirm the sponsor's support for the amendment(s) in this notification.

Signature of sponsor's representative: ..... 

Print name: IFAN Huw Eccis

Post: College Manager

Organisation: Bangor University

Date: 21.3.2019

## ANNUAL PROGRESS REPORT TO MAIN RESEARCH ETHICS COMMITTEE (For all studies except clinical trials of investigational medicinal products)

To be completed in typescript and submitted to the main REC by the Chief Investigator. For questions with Yes/No options please indicate answer in bold type.

### 1. Details of Chief Investigator

Name:	Dr Christopher W N Saville
Address:	North Wales Clinical Psychology Programme Brigantia Building Penrallt Road Bangor Gwynedd LL57 2AS
Telephone:	01248 388740
E-mail:	<a href="mailto:c.saville@bangor.ac.uk">c.saville@bangor.ac.uk</a>
Fax:	

### 2. Details of study

Full title of study:	Admissions to psychiatric units in North Wales
Name of main REC:	Wales REC 4 (Wrexham)
REC reference number:	
Date of favourable ethical opinion:	
Sponsor:	Bangor University

### 3. Commencement and termination dates

Has the study started?	<b>Yes</b> / No
If yes, what was the actual start date?	14/2/17
If no, what are the reasons for the study not commencing?	
What is the expected start date?	
Has the study finished?	Yes / <b>No</b>
If yes, complete and submit "Declaration of end of study" form, available at <a href="http://www.nres.npsa.nhs.uk/applications/after-ethical-review/endofstudy/">http://www.nres.npsa.nhs.uk/applications/after-ethical-review/endofstudy/</a>	
If no, what is the expected completion date?	1/3/2020

Annual progress report (non-CTIMP), version 4.4, dated November 2014

<i>If you expect the study to overrun the planned completion date this should be notified to the main REC for information.</i>	
If you do not expect the study to be completed, give reason(s)	An amendment was made for two follow up analyses to the original analyses, conducted by two trainee clinical psychologists, Mark Golightly and [REDACTED]. We are keeping the study open in order to give these studies, and the original, time to undergo peer review at academic journals – if reviewers have comments we want to have access to the data to be able to address them.

#### 4. Registration

Is the study a 'clinical trial'? (Defined as first 4 categories on the IRAS filter page)  (For CTIMP please use CTIMP progress reporting template)	Yes / <b>No</b>
Is the study registered on a publically accessible database? (Registration of clinical trials is a condition of approval for studies approved after 30 September 2013)	Yes / <b>No</b>
If yes, please provide the name of the database and the registration number  Database: Registration number:	
If no: a. What is the reason for non-registration? It was originally not pre-registered as the project was a last minute change of educational project for a student, and we didn't find time. If our amendment is approved, we will look if we can pre-register that before using the data, but pre-registration can be an issue if you have already seen some of the data, as we have.  b. What are your intentions for registration? If our amendment is approved, we will look if we can pre-register that before using the data, but pre-registration can be an issue if you have already seen some of the data, as we have.	

#### 5. Site information

Do you plan to increase the total number of sites proposed for the study?	Yes / <b>No</b>
If yes, how many sites do you plan to recruit?	

## Word Counts

<b>Title Page:</b>	<b>39</b>
<b>Thesis Abstract:</b>	<b>218</b>
 <b>Chapter 1:</b>	
Abstract	147
Word count without references:	8846
Word count with references:	11,172
Tables and figures:	2763
 <b>Chapter 2:</b>	
Abstract	183
Word count without references:	3592
Word count with references:	4558
Tables and figures:	359
 <b>Chapter 3:</b>	
Word count without references:	3819
Word count with references:	5079
 <b>Appendices</b>	
Word count:	1895
 Total word count without references:	16,257
Total word count with references:	20,809
Total of all tables, figures and appendices:	5017