Preface

This guidance provides the case for change in relation to the development of liaison psychiatry services from the current heterogeneous patchy collection of rudimentary to gold standard services and sets the minimum service specifications required to achieve the cost and quality outcomes suggested by the evaluation of RAID. It also contains advice to commissioners on how to optimise the models to fit with local service pathways and demand. The four effective models are termed Core, Core24, Enhanced24 and Comprehensive.

This guidance was commissioned by the Strategic Clinical Network for Mental Health, Dementia and Neurological Conditions South West.

This guidance is part of a suite of four related documents, each with increasing levels of detail:

- **Liaison Psychiatry Services: Guidance** - sets out the key consideration to be made when commissioning liaison psychiatry services.

- **An Evidence Base for Liaison Psychiatry - Guidance** - sets out the evidence gathered from lay people, professionals, commissioners and the literature about what is needed from liaison psychiatry services.

- **Developing Models for Liaison Psychiatry Services - Guidance** - provides the technical information needed for commissioning liaison psychiatry services.

- **Model Service Specifications for Liaison Psychiatry Services** - sets out exemplar service specifications for four models of liaison psychiatry.
With thanks and appreciation

We would like to recognise and appreciate the contribution of the following people for their work in putting together this guidance:

- people with an experience of our services, commissioners and commissioning supporters
- the Faculty of Liaison Psychiatry at the Royal College of Psychiatrists
- the Academy of Emergency Medicine
- the National Clinical Director for Mental Health
- the Centre for Mental Health
- the Strategic Clinical Network for Mental Health, Dementia and Neurological Conditions South West
- the research and development team at Devon Partnership NHS Trust, and
- Dr William Lee, Reader in Psychiatric Epidemiology, Plymouth Peninsula Schools of Medicine and Dentistry.

Dr Peter Aitken's time was funded by the National Institute for Health Research (NIHR) Collaboration for Leadership in Applied Health Research and Care for the South West Peninsula (PenCLAHRC).

The views and opinions expressed in this paper are those of the authors and not necessarily those of NHS England, the NIHR or the Department of Health.
Defining liaison psychiatry

Liaison psychiatry, also known as Psychological Medicine, is the medical specialty concerned with the care of people presenting with both mental and physical health symptoms regardless of presumed cause. The specialty employs the bio-psychosocial model being concerned with the inter-relationship between the physiology, psychology and sociology of human ill health.

Liaison psychiatry services are designed to operate away from traditional mental health settings, in the main in general hospital emergency departments and wards, and medical and surgical outpatients.

Liaison psychiatry teams are multidisciplinary, clinically led by a consultant liaison psychiatrist who will have higher specialty training in general adult psychiatry with sub specialty endorsement in liaison psychiatry. Many liaison psychiatrists will also have higher specialty training in general medicine or general practice.

Liaison psychiatrists, as well as being in a position to diagnose and prescribe, can also formulate and deliver brief psychotherapeutic interventions most commonly cognitive behavioural therapy or psychodynamic interpersonal therapy.

The multidisciplinary liaison psychiatry team will typically include specialist mental health nurses, psychological therapists, occupational therapists and social workers.

Liaison psychiatry services hold expert knowledge on the safe operation of the mental health act in general health settings and provide expertise to capacity assessments.

Methodology

To find our way from the available evidence to established models of care likely to return the benefit suggested by RAID, we convened three expert groups and reviewed the literature.

These three groups were:

- lay people with an experience of services
- commissioners and their supporters, and
- professionals working in liaison psychiatry services.
Expert opinion was collected from focus groups, survey and one-to-one interviews. The narrative emerging from these sessions was reviewed against the literature to check that statements made were defensible within the evidence base and learning from emerging service models.

Connections were made with other relevant work being undertaken by the Centre for Mental Health, the Royal College of Psychiatrists Faculty of Liaison Psychiatry, the Joint Commissioning Panel of the Royal Colleges of General Practice and Psychiatry, the Department of Health Product Review Group and the Willet review of unplanned and emergency care and resulting concordat.

A Steering Group governed the process. Members of the Steering Group were:

- Peter Aitken, Chair of the Faculty of Liaison Psychiatry, Royal College of Psychiatrists, Consultant in Psychological Medicine, Director of Research and Development, Devon Partnership NHS Trust
- Maureen Casey, Devon Partnership NHS Trust
- Iola Davies, Representative, Mental Health Alliance South West
- Andrew Haytread, GP, Torbay and South Devon CCG and member of Strategic Clinical Network for Mental Health, Dementia and Neurological Conditions South West
- Adrian James, Clinical Director, Strategic Clinical Network for Mental Health, Dementia and Neurological Conditions South West
- Julie Kell, Commissioning Manager, North Somerset Clinical Commissioning Group and Payment by Results in Mental Health Adviser, Strategic Clinical Network for Mental Health, Dementia and Neurological Conditions South West
- Anthony Harrison, Consultant Nurse (Liaison Psychiatry), Bristol Psychiatric Liaison Service, Avon and Wiltshire Mental Health Partnership NHS Trust
- Fran Redman, Quality Improvement Lead, Strategic Clinical Network for Mental Health, Dementia and Neurological Conditions South West
- Alex Stirzaker, Clinical Lead for IAPT, Strategic Clinical Network for Mental Health, Dementia and Neurological Conditions South West
Case for change

What the evidence tells us about need

80% of all hospital bed days are occupied by people with co-morbid physical and mental health problems (Royal College of Psychiatrists, 2013). Hospital episode statistics show a much higher use of hospital services by people also using mental health services. For example, 78% of mental health service users accessed hospital services at least once in the year 2011 – 2012 compared to 48% of non-mental health service users. And 71% were admitted to hospital as an emergency, compared to 40% of non-mental health service users (Health and Social Care Information Centre, August, 2013).

Prevalence: Common mental disorders alongside chronic disease

Evidence shows that 25% of all patients admitted to hospital with a physical illness also have a mental health condition, and in most cases this is not treated whilst the patient is in hospital. In terms of long-term conditions, 25 – 33% of patients with a long-term physical health problem also have a concurrent mental illness that increases the risk of physical health complications and increases the costs of treating the physical illness (Naylor et al, 2012).

Prevalence: Emergencies and unplanned care for self-harm and suicide

5% of all Emergency Department (ED) attendances are due to mental disorders. Self-harm is predominant within this group, accounting for 150,000 – 170,000 ED attendances per year in England (Royal College of Psychiatrists and British Association for Accident and Emergency Medicine, 2004). These presentations are often resource heavy and labour intensive. Chronic repeat attenders to ED account for 8% of all ED attendances. The most common reason for frequent attendance is an untreated mental health problem (National Confederation, 2009).

Prevalence: Alcohol and related disorders

Alcohol-related admissions to hospital doubled in the 11 years up to 2007 (National Audit Office, 2008).

Prevalence: Delirium and dementia and frail older people

The prevalence of mental health conditions amongst older people inpatient in the general hospital is estimated at 60% (Parsonage et al, 2012). The use of acute hospital services by
people with dementia is rising. Emergency admissions for people with dementia account for nearly 10% of all hospital admissions. 95% of acute hospital admissions for people with dementia occur in an emergency, with over 60% of these coming through ED, even though 25% of all emergency presentations in people with dementia are preventable (Parsonage et al, 2012).

**Prevalence: Serious mental illness and its poor health outcomes**

About 1 in 100 people has a severe mental illness, a category that includes schizophrenia, bipolar disorder and severe depression amongst others. Schizophrenia affects around 400,000 people in England (NICE, 2002) and bipolar disorder about 544,631 people (NICE, 2006). These patients are at considerably increased risk of physical ill-health compared to the general population, with poorer health and health outcomes (Marder et al, 2004).

**Demand for services: where we know liaison psychiatry services can work**

In an acute care hospital setting we know six key patient groups stand to benefit from effective Liaison Psychiatry:

1. People who self-harm and need medical or surgical treatment.
2. People with physical or psychological consequences of alcohol and drug misuse.
3. Frail elderly people where there is diagnostic confusion between delirium, depression and dementia and a perceived need for basic physiological support, nursing and further investigation.
4. People already known to have severe mental illness.
5. People admitted with primarily physical symptoms that on assessment have mainly psychological or social causation.
6. Vulnerable groups including homeless people, people with personality disorder, people who may be subject to domestic violence and abuse, children and young people at risk.

Working age adults have traditionally been the main patient group for liaison psychiatry services. However, although they make up 45% of inpatient admissions, they only make up 30% of bed-days. Older adults, by contrast, make up 65% of total bed-days, and they make up 80% of hospital bed days taken up by people with mental and physical problems (Parsonage et al, 2012). Services for older age adults should therefore be prioritised, and
working age adult services targeted at people presenting with more complex needs. Children and adolescent services tend to be based within a CAMHS team (Woodgate and Garralda, 2006) and there is increasing interest from professionals, lay people and commissioners to create all-age liaison psychiatry teams to include children.

In emergency departments, the main focus of liaison psychiatry work is on self-harm, severe mental illness and alcohol-use for adults of working age, and delirium and dementia for older adults. The high number of self-harm presentations in England each year means that this should therefore be a key focus for hospital-based services. There has been a 50% increase in the use of Emergency Care in the last decade, and there is evidence that the urgent and emergency care system is finding it increasingly difficult to meet indicators such as the four-hour wait time in Emergency Departments and ambulance handover targets. The literature suggests that there is a need to find solutions that will increase the flow of patients through the health and care system (The King’s Fund, 2013). There is therefore clear demand for a service such as liaison psychiatry that will help support the movement of patients through the system.

Out-of-hospital provision represents an important extension of liaison psychiatry. Providing services at outpatient and primary care level reduces the number of referrals to secondary care services: “The way ahead for the long-term development of liaison psychiatry is likely to lie primarily in the expanded provision of community-facing services” (Parsonage et al, 2012). This is of particular relevance to the support of people with long-term conditions: “The prevalence and cost of mental health co-morbidities among people with long-term conditions is such that developing community-based collaborative care services with an integrated liaison psychiatry component should be high priority for all clinical commissioning groups working with local providers” (Parsonage et al, 2012:5). Overall, it is estimated that there are 4.6 million people with co-morbid physical and mental health conditions and the cost is currently around £10.5 billion a year (Naylor et al, 2012).

People presenting with medically unexplained symptoms account for 20% of new presentations to primary care and 20 – 40% to out-patient referrals and the overall cost to NHS is estimated at £3 billion a year. Generally, patients presenting with medically unexplained symptoms should be looked after in primary care but options for service models and evidence-based interventions have yet to be established (Parsonage et al, 2012).

NICE guidance recommends availability of specialist perinatal mental health care. Only 25% of commissioners have fully developed and implemented policy for perinatal mental health,
and only 21% of mental health providers have a specialist perinatal team (Parsonage et al, 2012). Liaison psychiatry services may be extended to bridge this gap.

The development of any new liaison psychiatry service, therefore, should consider providing support to primary and community-based services to address the needs of people with long-term conditions, medically unexplained symptoms and gaps in perinatal mental health provision.

Supply: what we know about existing liaison psychiatry service models

There is significant variation in the provision of liaison psychiatry services in general hospitals in England, which have historically developed according to the availability of local enthusiasm and funds. There is a paucity of robust data from which to calculate cost-benefits in relation to the patient, hospital or system. Few service evaluations have been published. Services that have been constructed carefully in the context of local demand and surrounding pathways, like RAID model at the City Hospital in Birmingham and the optimal liaison psychiatry model in North West London show a benefit of approximately £4 for every £1 invested.

It has been difficult to be precise about how much should be spent on liaison psychiatry. In 2013 the Department of Health’s Care Pathways and Packages Project surveyed provision through the Finance Development Network. The survey included questions about costs of services, and responses from 13 commissioners indicated a mean payment per provider to be between £1 and £4 per head of population per year. The report found that 59% of the services are paid for by mental health block contracts, although commissioners reported that figure to be 96%. This disparity shows the need for better understanding of the services that come under the title of psychological medicine or liaison psychiatry (Rigby, 2013).

A report for the South West Strategic Clinical Network for Mental Health, Dementia and Neurological Conditions reviewed liaison psychiatry services in the South West of England, showing that the region is similar to the national picture in the very different models of provision being provided. It found an incomplete, patchy range of services, covering a range of hours, supported by professionals of varying grades without a common system of measurement of outcome or model of care. The costs per service ranged between £237,000 and £641,000, with two areas working on block contracts and not specifying costs, and one area not able to provide information on costs (Minghella, 2013).
To begin to address this gap Aitken in the Southwest, then Lee across England, has conducted the first expert-led surveys of liaison psychiatry services to English hospitals with an emergency department (see Appendix 1). Recognising that expertise in the model of care being sought was an essential skill for the researcher, Aitken and Lee used their own experience and that of their peer network in the Faculty of Liaison Psychiatry, Royal College of Psychiatrists, to contact all hospitals and check their provision of service against the criteria for Core, Core 24, Enhanced 24 and Comprehensive services as set out in this document. (Lee 2014 in press)

The findings are stark. Only 2% had comprehensive services, and only 6% would meet or exceed the specification of RAID. Many services call themselves RAID but in reality only 14% meet or exceed the criteria for Core 24 and only 39% meet or exceed the criteria for Core. Around 60% of services are inadequate for the purpose of return on investment and within that group, many of the services offered seemed unlikely to the researchers to offer a reliable quality of care or outcome (see Appendix 1).

The Southwest of England is broadly representative of the national regional picture. It lacks an example of a comprehensive service, has no example of Enhanced 24 and a few services meeting Core. It has rather more aspiring to the RAID name but falling short on specification, with most services inadequate.
Table 1: Hospitals in the South West of England and their current state of liaison psychiatry model fidelity by the proposed criteria for Core, Core24, Enhanced24 and Comprehensive Service.

<table>
<thead>
<tr>
<th>Hospital</th>
<th>No of Beds</th>
<th>Population Served</th>
<th>ED Inadequate or None</th>
<th>Core</th>
<th>Core24</th>
<th>Enhanced24</th>
<th>Comprehensive</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bristol Royal Infirmary</td>
<td>503</td>
<td>400,000</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cheltenham General Hospital</td>
<td>494</td>
<td>560,000</td>
<td>X</td>
<td></td>
<td>X</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Derriford Hospital, Plymouth</td>
<td>1100</td>
<td>700,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Frenchay Hospital, Bristol</td>
<td>650</td>
<td>500,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Gloucestershire Royal Hospital</td>
<td>802</td>
<td>560,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Great Western Hospital, Swindon</td>
<td>400</td>
<td>300,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Musgrove Park Hospital, Taunton</td>
<td>700+</td>
<td>340,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>North Devon District Hospital, Barnstaple</td>
<td>423</td>
<td>160,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Royal Cornwall Hospital, Truro</td>
<td>760</td>
<td>383,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Royal Devon and Exeter, Exeter</td>
<td>877</td>
<td>350,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Royal United Hospital, Bath</td>
<td>565</td>
<td>500,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Salisbury District Hospital, Salisbury</td>
<td>455</td>
<td>225,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Southmead Hospital, Bristol</td>
<td>1000+</td>
<td>400,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Torbay District Hospital, Torbay</td>
<td>500+</td>
<td>300,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Weston General Hospital, Weston Super Mare</td>
<td>320</td>
<td>212,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yeovil District Hospital, Yeovil</td>
<td>370</td>
<td>185,000</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Most liaison psychiatry services in the Southwest are based within acute care hospitals. Most are inadequate. Some also work in community hospitals and other community settings. Most are separate teams. Typically, they operate in office hours either 5 or 7 days a week. The teams tend to be made up of nurses and psychiatrists, with few psychologists or other therapists. Administrative and business support is often weak or absent. There are no distinct service models for children. Some have a separate older people’s team.

In the main they provide some or all of the following:

- Advice, training and coaching on the management of mental health problems to other professionals in the general hospital.
- Bio-psychosocial assessment, formulation and diagnosis for people experiencing impaired mental wellbeing and for people whose physical symptoms are unexplained.
- Risk assessment for harm to self and others and care planning.
- Rapid response to requests for assessment in ED including assessment and management of people who have self-harmed.
- Arrangement of appropriate follow-up after discharge.

The majority of services help operate the Mental Health Act and offer support to Mental Capacity Act assessments.

The presentations addressed by services around the country differ quite substantially. Some of the variation is due to the adjacent services provided. For example, if a service has a separate alcohol liaison team, those cases may not be seen within the general liaison psychiatry service. Services also differ in the age range of people seen and the severity of mental health problems being presented. Services have different referral and response times ranging from within the hour to within the week.

In terms of similarities between services, people who self-harm are generally the largest and most important client group and the emergency department as their main source of referrals. Few services are able to provide ongoing therapeutic intervention after discharge.
Impact: What are the benefits we might expect from an effective model of liaison psychiatry service?

There is now growing evidence for the impact of liaison psychiatry services. Descriptive evidence shows a list of benefits including decreased length of stay, reduction in psychological distress, improved service user experience, improved dementia care and enhanced knowledge and skill of general hospital clinicians (Parsonage et al, 2012).

Benefits apparent in the literature include:

- Improved service user experience
- Increased knowledge and understanding of mental health issues amongst general hospital staff
- Improved care outcomes
- Reduced emergency department waiting times
- Reduced admissions, re-admissions and lengths of stay
- Reduced use of acute bed by patients with dementia
- Reduced risk of adverse events
- Improved compliance of acute trusts with legal requirements under the Mental Health Act (2007) and Mental Capacity Act (2005)
- Reducing psychological distress following self-harm, and reducing suicide
- Improved compliance with NHS Litigation Authority Risk Management Standards and the Clinical Negligence Scheme for Trusts (CNST) (Joint Commissioning Panel for Mental Health, 2012).

For long-term conditions in particular, there is evidence that mental health intervention can improve health outcomes and reduce costs of care, and overall that integrated care leads to improved outcomes in both mental health and physical health and savings in health care costs (Naylor et al, 2012).

There are also softer benefits from liaison psychiatry staff supporting or taking the emotional burden of complex work from general hospital staff.
Cost benefits
There is now evidence from the RAID liaison psychiatry for dementia model that for every £1 invested up to £4 of value is returned to the local health economy. We have created the four models based on this evidence extrapolated from RAID and the Optimal Service in North West London modified for size, demand on their emergency departments and adapted for an urban or rural context.

RAID model
Evidence from RAID underpins the model we term Enhanced24. RAID was created to fill a particular context around Birmingham City Hospital. The RAID service now costs £1.4 million per year and has an average of 250 referrals per month associated with older people who may have delirium and/or dementia. It has been found to significantly reduce length of stay and re-admissions as well as improving the health and wellbeing of these patients. Reduced length of stay was estimated to save between £1.5 and £3 million, Medical Admissions Unit admission avoidance saved £0.3 million and £1.5 - £6 million was estimated to be saved through reduced re-admissions. Overall, a benefit:cost ratio of 4:1 is estimated, with nearly 90% of total benefits being in terms of reduced bed use amongst the over 65s and a significant reduction in length of stay from patients with dementia (Parsonage and Fossey, 2011).
North West London Optimal Liaison Psychiatry Model
A North and West London collaboration built on the evidence from RAID by modifying the model skill mix and staffing ratios to provide an effective core service twenty four hours a day, seven days a week reflecting their urban demand. This is the basis for the model we call Core24.

This model has been piloted at sub-optimal level in four hospitals and is now being implemented across all North West London acute hospitals. Implementing the model is expected to reduce beds by 2-10%. The cost across all acute hospitals is projected to be around £11 million, with an expected financial impact of between £6 million net cost (per annum) to £13 million net savings.

The sporadic and unplanned growth of liaison psychiatry services around the country means that in many places rudimentary liaison psychiatry services exist. Whilst they employ some service elements that other models have indicated would produce quality and cost effectiveness, it is suggested that they are at a level for which there is no evidence of likely return on investment.
Growing evidence of effectiveness

The four service models proposed in this document represent the minimum and optimum service specifications supported by the current evidence base likely to return value at the level found with RAID and expected in North West London:

1. **Core**
   
   Key elements are extrapolated from evidence from RAID and the North West London Optimal Model. Provided there is no, or patchy, 24 hour demand, these services should be expected to return on investment but at a lower level.

2. **Core24**
   
   There is evidence that this service model, applied where there is 24 hour demand for services, will return on investment at or near the level of RAID. Key elements of this model are derived from the North West London Optimal Model.

3. **Enhanced24**
   
   Clear published evidence of return on investment, this is the Rapid Assessment, Intervention and Discharge model for patients presenting with delirium and/or symptoms of dementia (RAID).

4. **Comprehensive**
   
   Contains all the elements of Core and Enhanced24 and will return on investment at or near the level of RAID. Key elements are based on the model in Leeds and other major centres providing regional and supra-regional services.
Description of recommended liaison psychiatry service models for hospitals

Transformation in the way acute hospital care is provided in the next decade suggests a need for four models for commissioners to consider, to be adapted to the nature of the work of the hospitals and the clinical pathways.

Each model builds on the previous level from the core minimum regarded to be effective in managing emergency department and admissions work sufficient to return the cost and quality benefit suggested in this guidance:

1. **Core** Liaison Psychiatry Services, working or extended hours only.
2. **Core24** Liaison Psychiatry Services, twenty-four hours, seven days a week.
3. **Enhanced24** Liaison Psychiatry Services, twenty-four hours, seven days a week with extensions to fill local gaps in service and some outpatient services.
4. **Comprehensive** Liaison Psychiatry Services, twenty-four hours, seven days a week, enhanced with inpatient and outpatient services to specialties at major centres.
Core Liaison Psychiatry Services

These services have the minimum specification likely to offer the benefit suggested by the literature. Core will serve acute health care systems with or without minor injury or emergency department environments where there is variable demand across the week, including periods of no demand where a 24-hour staffed response would be uneconomical. This model mainly serves emergency and unplanned care pathways.

Core24 Liaison Psychiatry Services

These services have the minimum specification likely to offer the benefit suggested by the literature where there is sufficient demand across the 24 hours period to merit a full service. Typically these acute health care systems are hospital based in urban or suburban areas with a busy emergency department. This model mainly serves emergency and unplanned care pathways.

Enhanced 24 Liaison Psychiatry Services

These services have enhancements to the minimum specification to fit in with gaps in existing pathways and services. Often they have additional expertise in addictions psychiatry and the psychiatry of intellectual disability. Demography and demand may suggest additional expertise with younger people, frail elderly people or offenders, crisis response or social care. This may extend to support for medical outpatients. This model mainly serves emergency and unplanned care pathways but extends to support elective and planned care pathways where mental health problems co-exist.

Comprehensive Liaison Psychiatry Services

Comprehensive services are required at large secondary care centres with regional and supra-regional services. These services include Core24 level services but will have additional specialist consultant liaison psychiatry, senior psychological therapists, specialist liaison mental health nursing, occupational and physiotherapists. They support inpatient and outpatient areas such as neurology, gastroenterology, bariatric surgery, plastic and reconstructive surgery, pain management and cancer services. They may support other condition specific elements such as chronic fatigue / ME and psychosexual medicine. Comprehensive services run over office and extended hours supported by the core service running twenty four hours, seven days a week. They may include specialist liaison psychiatry inpatient beds. This model serves emergency and unplanned care pathways as well as elective and planned care pathways where mental health problems co-exist.
Detailed service model descriptions

Core Liaison Psychiatry Services - a working-hours model

The service operates weekday office hours with out-of-hours cover provided by a duty psychiatrist on-call and out of hours services.

These services have the minimum specification likely to offer the benefit suggested by the literature. Core will serve acute health care systems with or without minor injury or emergency department environments where there is variable demand across the week including periods of no demand where a 24-hour staffed response would be uneconomical. This model mainly serves emergency and unplanned care pathways.

The Core model sets out three main areas of work for a liaison psychiatry service:

1. Direct patient care (assessment, diagnosis and provision of mental health care for patients referred to the team).
2. Support and training to general hospital staff relating to mental health needs.
3. Interfacing with other parts of the health and social care system.

This model has five main functions:

1. To provide a timely response to all mental health presentations in the emergency department within one hour and inpatient wards within 24-hours.
2. To use time to listen to the people referred, collect information from multiple sources and make a bio-psychosocial formulation, psychiatric diagnosis, risk management plans and contribute to appropriate treatment and discharge plans, working in partnership with agencies in primary care and community services.
3. To offer brief evidence based psychological interventions as inpatient or short-term follow up of up to 5 sessions.
4. To work with general hospital teams to optimise length of stay and accelerate care to out-of-hospital pathways.
5. To consult with hospital staff regarding the care and management of their patients, provide advice regarding medicines management, behavioural management, alcohol related issues, eating disorders, access to mental health services, the management of frequent attenders, use of the mental health act and provide expertise to capacity assessments and Safeguarding.
The team should work in close relationship with any health psychology services within the hospital, to ensure collaborative working and clear pathways.

Table 2: Core Liaison Psychiatry Service summary

<table>
<thead>
<tr>
<th>Core Liaison Psychiatry Service</th>
<th>Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Example Number of Beds</td>
<td>c 500</td>
</tr>
<tr>
<td>Consultants</td>
<td>2 wte</td>
</tr>
<tr>
<td>Other Medical</td>
<td>0.6wte</td>
</tr>
<tr>
<td>Nurses</td>
<td>2 Band 7 (TL) 6 Band 6</td>
</tr>
<tr>
<td>Other Therapists</td>
<td>0</td>
</tr>
<tr>
<td>Team manager</td>
<td>1 Band 7</td>
</tr>
<tr>
<td>Admin (Band 2, 3 and 4)</td>
<td>2.6</td>
</tr>
<tr>
<td>Clinical Services Manager</td>
<td>0.2 Band 8</td>
</tr>
<tr>
<td>Business support (band 5)</td>
<td>0</td>
</tr>
<tr>
<td>Total Whole Time Equivalent</td>
<td>14.4</td>
</tr>
<tr>
<td>Hours of Service</td>
<td>9-5</td>
</tr>
<tr>
<td>Age</td>
<td>16+</td>
</tr>
<tr>
<td>Older Person</td>
<td>Yes</td>
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<tr>
<td>Drug and Alcohol</td>
<td>No</td>
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<tr>
<td>Out Patient</td>
<td>No</td>
</tr>
<tr>
<td>Specialities</td>
<td>No</td>
</tr>
<tr>
<td>Approx Costs</td>
<td>£0.7M</td>
</tr>
</tbody>
</table>
The consultants should have expertise in self-harm, addictions, the care of older people and medically unexplained symptoms. The team manager runs the service. The band 7 nurses are clinical leaders for each of the adult and older people sub-teams.

Training

A comprehensive range of training should be offered for students and substantive members of staff. Subjects taught will include: suicide and self-harm; drug and alcohol misuse; psychiatric emergencies; Mental Health Act; cognitive impairment; delirium; capacity; asthma COPD; mental health; somatoform disorders; confusing diagnoses; personality disorder and Safeguarding.

What is needed to make it work well

- A suitable location in the acute care hospital with safe clinical and office space for the work.
- Appropriate information, record keeping and communication infrastructure to enable capturing and sharing of patient-specific data and communication with general practice within 24-hours of the person being seen.
- Support from hospital leadership, especially for training and awareness-raising.
Core24 Liaison Psychiatry Service

These services have the minimum specification likely to offer the benefit suggested by the literature where there is sufficient demand across the 24-hour period to merit a full service.

Typically these acute health care systems are hospital-based in urban or suburban areas with a busy emergency department.

This model extends the Core Liaison Psychiatry Service to provide a 24-hour, seven day a week service, with rapid response to the emergency department as well as on wards.

This model mainly serves emergency and unplanned care pathways.

Key elements

- 13 nurses working on shifts.
- Team consultants available beyond office hours and for some periods at weekends.
- Outside of these hours, rapid access to consultant support provided by on-call services using provision already in place.
- Substantial time is given to supporting and training mainstream hospital staff.
- There is a single point of contact for all patients (16+) in hospital with diagnosed or suspected mental health conditions of any severity.
- Co-ordination with out-of-hospital care providers and housing services.
- Integrated within broader health and social care system.
- Single management structure.
Table 3: Core24 Liaison Psychiatry Service summary

<table>
<thead>
<tr>
<th>Core24 Liaison Psychiatry Service</th>
<th>Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Example Number of Beds</td>
<td>c 500</td>
</tr>
<tr>
<td>Consultants</td>
<td>2wte</td>
</tr>
<tr>
<td>Other Medical</td>
<td>2wte</td>
</tr>
<tr>
<td>Nurses</td>
<td>6 Band 7</td>
</tr>
<tr>
<td></td>
<td>7 Band 6</td>
</tr>
<tr>
<td>Other Therapists</td>
<td>4</td>
</tr>
<tr>
<td>Team Manager Band 7</td>
<td>1</td>
</tr>
<tr>
<td>Clinical Service manager Band 8</td>
<td>0.2 - 0.4</td>
</tr>
<tr>
<td>Admin Band 2, 3 and 4</td>
<td>2</td>
</tr>
<tr>
<td>Business support (band 5)</td>
<td>1</td>
</tr>
<tr>
<td>Total Whole Time Equivalent</td>
<td>25.2 - 25.4</td>
</tr>
<tr>
<td>Hours of Service</td>
<td>24/7</td>
</tr>
<tr>
<td>Age</td>
<td>16+</td>
</tr>
<tr>
<td>Older Person</td>
<td>Yes</td>
</tr>
<tr>
<td>Drug and Alcohol</td>
<td>Yes</td>
</tr>
<tr>
<td>Out Patient</td>
<td>No</td>
</tr>
<tr>
<td>Specialities</td>
<td>No</td>
</tr>
<tr>
<td>Approx Costs</td>
<td>£1.1M</td>
</tr>
</tbody>
</table>

At some sites, at least one of the nurses will be a specialist alcohol nurse and some sites may choose to replace one of the therapist roles with something site specific e.g. substance-abuse nurse.

The inclusion of band 7 nurses is crucial so that they can provide leadership and make discharge decisions.
Even if the hospital has fewer than 500 beds, in order to provide a 24/7 service there will still need to be a team of 13 nurses. The model can only really be reduced if the hospital has limited-hours minor injuries unit or no emergency department.

This model also includes integration with community provision and local authority teams and factors in improving communication with GPs and specialist. There is a focus on enhanced data capture and recording. This model does not, however, include post-discharge follow-up clinics for patients as with RAID, preferring instead to build links at primary and community care levels.

**Enhanced 24 Liaison Psychiatry Services**

These services have enhancements to the minimum specification to fit in with gaps in existing pathways and services.

Often they have additional expertise in addictions psychiatry and the psychiatry of intellectual disability.

Demography and demand may suggest additional expertise with younger people, frail elderly people or offenders, crisis response or social care. This may extend to support for medical outpatients.

This model mainly serves emergency and unplanned care pathways but extends to support elective and planned care pathways where mental health problems co-exist.

**Key additional elements**

- They have more consultant liaison psychiatrist time.
- They include follow up clinics, including for self-harm, substance misuse and general and old age psychiatry.
- They develop extensions to manage gaps within existing surrounding pathways of care.
Table 4: Enhanced24 Liaison Psychiatry Service summary

<table>
<thead>
<tr>
<th>Enhanced24 Liaison Psychiatry Service</th>
<th>Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Example Number of Beds</td>
<td>c 500</td>
</tr>
<tr>
<td>Consultants</td>
<td>4wte</td>
</tr>
<tr>
<td>Other Medical</td>
<td>2wte</td>
</tr>
<tr>
<td>Nurses</td>
<td>3 Band 7</td>
</tr>
<tr>
<td></td>
<td>7 Band 6</td>
</tr>
<tr>
<td>Other Therapists</td>
<td>2</td>
</tr>
<tr>
<td>Team Manager Band 7</td>
<td>1</td>
</tr>
<tr>
<td>Clinical Service manager Band 8</td>
<td>0.2 - 0.4</td>
</tr>
<tr>
<td>Admin Band 2, 3 and 4</td>
<td>2</td>
</tr>
<tr>
<td>Business support (band 5)</td>
<td>1</td>
</tr>
<tr>
<td>Total Whole Time Equivalent</td>
<td>22.2 – 24.4</td>
</tr>
<tr>
<td>Hours of Service</td>
<td>24/7</td>
</tr>
<tr>
<td>Age</td>
<td>16+</td>
</tr>
<tr>
<td>Older Person</td>
<td>Yes</td>
</tr>
<tr>
<td>Drug and Alcohol</td>
<td>Yes</td>
</tr>
<tr>
<td>Out Patient</td>
<td>Yes</td>
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<tr>
<td>Specialities</td>
<td>No</td>
</tr>
<tr>
<td>Approx Costs</td>
<td>£1.4M</td>
</tr>
</tbody>
</table>

The consultant workforce is larger with two consultants for older people, one for adult and one for addictions. The band 7 nurses each lead an adult, older people and addictions sub-team.
Comprehensive Liaison Psychiatry Services

Comprehensive services are required at large secondary care centres with regional and supra-regional services.

These services include Core24 level services but will have additional specialist consultant liaison psychiatry, senior psychological therapists, specialist liaison mental health nursing, occupational and physiotherapists.

They support inpatient and outpatient areas such as diabetes, neurology, gastroenterology, bariatric surgery, plastic and reconstructive surgery, pain management and cancer services.

They may include other condition specific elements such as chronic fatigue and psychosexual medicine teams.

Some may include specialist liaison psychiatry inpatient beds.

Comprehensive services run over office and extended hours supported by the core service running twenty four hours, seven days a week.

This model serves emergency and unplanned care pathways as well as planned and elective care where mental health problems co-exist.
These services require staffing rotas to support specialist beds and consultant input from medical disciplines other than psychiatry, an example being immunology.

Table 5: Comprehensive Liaison Psychiatry Service summary

<table>
<thead>
<tr>
<th>Comprehensive Liaison Psychiatry Service</th>
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</tr>
</thead>
<tbody>
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</tr>
<tr>
<td>Other Medical</td>
<td>2</td>
</tr>
<tr>
<td>Nurses</td>
<td>2 Band 8b</td>
</tr>
<tr>
<td></td>
<td>17 Band 6</td>
</tr>
<tr>
<td></td>
<td>10 Band 5</td>
</tr>
<tr>
<td>Other Therapists</td>
<td>16</td>
</tr>
<tr>
<td>Team Manager Band 7</td>
<td>3</td>
</tr>
<tr>
<td>Clinical Service manager Band 8</td>
<td>1</td>
</tr>
<tr>
<td>Admin Band 2, 3 and 4</td>
<td>12</td>
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<tr>
<td>Business support (band 5)</td>
<td>1</td>
</tr>
<tr>
<td>Total Whole Time Equivalent</td>
<td>69</td>
</tr>
<tr>
<td>Hours of Service</td>
<td>24/7</td>
</tr>
<tr>
<td>Age</td>
<td>16+</td>
</tr>
<tr>
<td>Older Person</td>
<td>Yes</td>
</tr>
<tr>
<td>Drug and Alcohol</td>
<td>Yes</td>
</tr>
<tr>
<td>Out Patient</td>
<td>Yes</td>
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<tr>
<td>Specialities</td>
<td>Yes</td>
</tr>
<tr>
<td>Approx Costs</td>
<td>£4.5M</td>
</tr>
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</table>
Summary of models

Table 6: High level summary of differences between models

<table>
<thead>
<tr>
<th></th>
<th>Core</th>
<th>Core 24</th>
<th>Enhanced 24</th>
<th>Comprehensive</th>
</tr>
</thead>
<tbody>
<tr>
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<td>c 500</td>
<td>c 500</td>
<td>c 500</td>
<td>c 2000</td>
</tr>
<tr>
<td>Consultants</td>
<td>2</td>
<td>2</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>Other Medical</td>
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<td>2</td>
<td>2</td>
</tr>
<tr>
<td>Nurses</td>
<td>2 Band 7 6 Band 6</td>
<td>6 Band 7 7 Band 6</td>
<td>3 Band 7 7 Band 6</td>
<td>2 Band 8b 17 Band 6 10 Band 5</td>
</tr>
<tr>
<td>Other Therapists</td>
<td>0</td>
<td>4</td>
<td>2</td>
<td>16</td>
</tr>
<tr>
<td>Team Manager Band 7</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>3</td>
</tr>
<tr>
<td>Clinical Service manager Band 8</td>
<td>0.2</td>
<td>0.2 - 0.4</td>
<td>0.2 - 0.4</td>
<td>1</td>
</tr>
<tr>
<td>Admin Band 2, 3 and 4</td>
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<td>2</td>
<td>2</td>
<td>12</td>
</tr>
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<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Total Whole Time Equivalent</td>
<td>14.4</td>
<td>25.2 - 25.4</td>
<td>22.2 – 24.4</td>
<td>69</td>
</tr>
<tr>
<td>Hours of Service</td>
<td>9-5</td>
<td>24/7</td>
<td>24/7</td>
<td>24/7</td>
</tr>
<tr>
<td>Age</td>
<td>16+</td>
<td>16+</td>
<td>16+</td>
<td>16+</td>
</tr>
<tr>
<td>Older Person</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Drug and Alcohol</td>
<td>No</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
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<tr>
<td>Out Patient</td>
<td>No</td>
<td>No</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Specialities</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>Approx Costs</td>
<td>£0.7M</td>
<td>£1.1M</td>
<td>£1.4M</td>
<td>£4.5M</td>
</tr>
</tbody>
</table>

Exemplar service specifications for these models are included in document 4 ‘Model Service Specifications for Liaison Psychiatry Services’.

Further recommendations are made to consider the possibilities for community-based liaison psychiatry services, such as MUS clinics, outpatient clinics, long-term conditions clinics based in primary care, and primary care based services.
Adapting for local need

Many services already exist partly serving the work of liaison psychiatry. The evidence suggests that many of these services, whilst working hard, are insufficient to deliver the cost and quality benefits suggested by the evaluation of RAID. Nevertheless, it makes sense to test this assumption in each locality by setting out what is already available and how much is being spent on it.

It is recommended that the following be undertaken before decisions are made about the type of liaison psychiatry service to commission.

1. **Undertake demand / supply analysis**
   - Start with analysis of need (prevalence)
   - Analyse data on current activity – attendance at ED; admissions to hospital
   - Acknowledge problems with coding of mental health problems/co-morbidities; what assumptions can be made?
   - Review and cost current liaison psychiatry services
   - Map ‘gaps’

2. **Identification of activity**

Having established the local situation, the next step is to build a picture of the likely work. National statistics, hospital episode statistics, information from emergency department, mental health trusts, first responder and pre-hospital agencies can inform the pattern of demand. The outputs from these pieces of work should be used to construct a model of service best suited to the locality.

Use hospital system information including Hospital Episode Statistics (HES) and the mental health minimum data set to estimate:

1. numbers and demographic of people seen
2. nature of their problems
3. times of day when seen, and
4. any outcome data.
3. Identification of existing skills-set

Look for

1. Nurses working with self-harm. Note: numbers, grades and hours worked, who employs them.

2. Psychiatrists in-reaching to the hospital or providing outpatient clinics for general hospital consultant-to-consultant referrals Note: programmed activities and specialism served, who employs them.

3. Psychologists working in health psychology, neuropsychology, clinical psychology. Note: numbers, grades, hours worked, employer.

4. IAPT workers, counsellors and other professions allied to medicine trained in psychological therapies. Note: numbers, hours worked, who employs them.

5. Out of hours on call arrangements. Note: who provides, grades of staff, nursing, psychiatry, social work.

6. Management, administrative & supervision arrangements for all of this work.

4. Financial audit

Describe how all the existing liaison psychiatry work is commissioned, where budgets sit, and their value.

Consider current service provision and methods of delivery (models) in relation to recommendations from this guidance.

The four model service specifications recommended in this guidance can then be selected from and adapted for local use.

For an example of how to find the optimal service model for your locality can be found in Appendix 3 of document 2 ‘An Evidence Base for Liaison Psychiatry - Guidance’.
Outcomes and effectiveness

This is particularly complicated in liaison psychiatry services where attributing clinical impact is difficult. Benefits fall in terms of both quality and cost. They can be understood to occur at four levels:

1. The person and their carers using the system, their experience and outcome.
2. The referrer and their team, their experience and their clinical outcome.
3. The hospital system in terms of its flow and capacity and ability to do its work.
4. The health care system interested in placing people on the right care pathway most cost effective for their needs.

Expert consensus favours using a balanced scorecard approach. This has been detailed by Parsonage et al (2012), but more work needs to be undertaken to ensure that:

- This approach provides the best pragmatic fit within both mental health and acute hospital systems, without adding unnecessary extra burdens on reporting or data collection.
- The different ways of measuring and collecting information are considered in more depth.
- A common currency can be found so that the system level benefits are apparent to all.

A detailed paper on outcomes for liaison psychiatry is expected in early 2014.
References

Health and Social Care Information Centre (August, 2013) HES-MHMDS Data Linkage Report, Summary statistics - 2012-13, Experimental statistics

Joint Commissioning Panel for Mental Health (2012) Guidance for commissioners of liaison mental health services to acute hospitals. Available at www.jcpmh.info

The King’s Fund (2013) Health Select Committee Inquiry; Emergency services and emergency care evidence from the King’s Fund


National Confederation (2009) Briefing Issue 179 Healthy Mind Healthy Body


Royal College of Psychiatrists (2013): College Report 183; Liaison Psychiatry for Every Acute Hospital; Integrated Mental and Physical Health Care


Appendix 1: Summary of ‘Targeted crowdsourced rapid survey of Liaison Psychiatry services in England’

Background
Adequate Liaison Psychiatry services are now recognised as paying for themselves several times over by reducing length of stay and readmissions to general hospitals. Policy developments required an estimate of current provision of Liaison Psychiatry in England, so as to know what increase in provision would be required for the all of England’s acute hospitals with Emergency Departments to benefit from adequate provision of Liaison Psychiatry. This was on a very short timescale of two months.

Method
A “Google Doc” on-line spreadsheet was created with fields pertaining to Liaison Psychiatry provision, hours of work, role, activities and funding for each Acute Trust in England with one or more Emergency Department (Acute Trusts with more than one hospital with an Emergency Department were represented on multiple rows of the spreadsheet). Acute Hospitals without Emergency Departments were excluded. Links to the spreadsheet (allowing for contributions) were passed to liaison mental health professionals known to the lead author initially and then on a closed email list for British Liaison Psychiatry professionals. Respondents were orientated to the policy and timing situation and asked to complete the fields pertaining to their acute hospital and others for which they knew the provision directly into the on-line spreadsheet. After this, the remaining liaison services were ‘cold called’ by the research team and asked about their services by telephone. Authentication by email or other requested approached were complied with. Unfilled details of each acute hospital (number of beds, whether it is a major trauma centre, etc.) were completed where possible by examining Trust, NHS Choices, Care Quality Commission and NHS England websites.

Results
All 171 acute hospitals in England with Emergency Departments had some data returned. Sufficient data to describe the service model as ‘Inadequate’, ‘Core’, ‘Core24’, ‘Enhanced24’ or ‘Comprehensive’ were obtained in 168 (98%) of cases. The first phase of data collection started on 12th December 2013, the second phase on 20th December 2013 and the third phase on 10th January 2014. Data collection was completed on 26th January 2014.

Using the Liaison Psychiatry service models defined in this document, most (103 (61%)) acute hospitals in England with Emergency Departments had inadequate
Liaison Psychiatry services. There were 42(25%) Core services, 14(8%) Core24 services, 6(4%) Enhanced24 services and 3(2%) Comprehensive services. Among England’s 22 Adult Major Trauma Centres (25 EDs) the proportions of inadequate and Core services was less and the proportions of Core24, Enhanced and Comprehensive services were greater:

<table>
<thead>
<tr>
<th></th>
<th>Inadequate</th>
<th>Core</th>
<th>Core24</th>
<th>Enhanced24</th>
<th>Comp.</th>
<th>Total*</th>
</tr>
</thead>
<tbody>
<tr>
<td>MTC</td>
<td>14(56%)</td>
<td>5(20%)</td>
<td>3(12%)</td>
<td>1(4%)</td>
<td>2(8%)</td>
<td>25(15%)</td>
</tr>
<tr>
<td>nMTC</td>
<td>89(62%)</td>
<td>37(26%)</td>
<td>11(8%)</td>
<td>5(3%)</td>
<td>1(1%)</td>
<td>143(85%)</td>
</tr>
<tr>
<td>Total</td>
<td>103(61%)</td>
<td>42(25%)</td>
<td>14(8%)</td>
<td>6(4%)</td>
<td>3(2%)</td>
<td>168(100%)</td>
</tr>
</tbody>
</table>

Conclusion
Most acute hospitals in England with Emergency Departments had inadequate Liaison Psychiatry services, so the significant benefits to patients and to acute hospitals are not currently being realised in England.

Acknowledgements
This was a crowdsourced project with many contributors, whose participation is greatly appreciated. First among equals is Sarah Laidler. The remainder are (possibly not exhaustively), Abrar Hussain, Alex Mitchell, Alex Thomson, Anna Fryer, Annabel Price, Anne Abe, Bob Taylor, Chris Schofield, Chris Smith, Christopher Hilton, Damien Longson, David Okai, Eliza Johnson, Else Guthrie, Eric Craig, Fiona Ellis, Geoff Lawrence Smith, Geraldine Swift, Gina Waters, Gosia Raczek, Graham Ash, Jackie Waghorn, Janet Butler, Jenny Cook, Jim Bolton, Rob Stewart, Julia Ryder, Justin Shute, Kate Chartres, Lena Rane, Luke Solomans, Marc Mandell, Marcus Hughes, Mark Ridell, Matt Hagger, Matt Rowett, Matthew Hotopf, Nora Turjanski, Pavan Joshi, Peter Aitken, Peter Trigwell, Philip Dick, Pramod Kumar, Praveen Singh, Rachel Cross, Ross Overshott, Sarah Burlinson, Sarah Cohen, Sarah Hepburn, Sean Cross, Stella Morris, Stephen Taylor, Tom Manders and Victoria Spencer.

References
2. ‘Liaison psychiatry in the modern NHS’, Michael Parsonage, Matt Fossey & Carly Tutty, Centre for Mental Health 2012.