Social Science & Medicine 93 (2013) 212–219

Contents lists available at SciVerse ScienceDirect

Social Science & Medicine

journal homepage: www.elsevier.com/locate/socscimed

Connections and consequences in complex systems: Insights from a case study of the emergence and local impact of crisis resolution and home treatment services

Ben Hannigan*

Cardiff School of Nursing and Midwifery Studies, Cardiff University, Eastgate House, 35-43 Newport Road, Cardiff CF24 0AB, United Kingdom

ARTICLE INFO

Article history:
Available online 17 February 2012

Keywords:
UK
Case study
Community mental health care
Complexity
Crisis resolution and home treatment
Mental health policy
Service interfaces
Health systems

ABSTRACT

In this article the broad contours of a complexity perspective are outlined. Complexity ideas are then drawn on to frame an empirical examination of the connections running between different levels of organisation in health and social care, and to underpin investigation into the intended and unintended local system consequences of service development. Data are used from a study conducted in the UK's mental health field. Here, macro-level policy has led to the supplementing of longstanding community mental health teams by newer, more specialised, services. An example includes teams providing crisis resolution and home treatment (CRHT) care as an alternative to hospital admission. Using an embedded case study design, where 'the case' examined was a new CRHT team set in its surrounding organisational environment, ethnographic data (with interviews predominating) were generated in a single site in Wales over 18 months from the middle of 2007. In a large-scale context favourable to local decision-making, and against a background of a partial and disputed evidence base, the move to establish the new standalone service was contested. Whilst users valued the work of the team, and local practitioners recognised the quality of its contribution, powerful effects were also triggered across the locality's horizontal interfaces. Participants described parts of the interconnected system being closed to release resources, staff gravitating to new crisis services leaving holes elsewhere, and the most needy service users being cared for by the least experienced workers. Some community mental health team staff described unexpected increases in workload, and disputes over eligibility for crisis care with implications for system-wide working relations. Detailed data extracts are used to illustrate these connections and consequences. Concluding lessons are drawn on the use of evidence to inform policy, on the significance of local contexts and system interfaces, and on anticipating the unexpected at times of change.

Introduction

In this article complexity thinking is used to underpin a case study of the connections running between different levels of organisation in health and social care, in which the wider system consequences of change are also explored. Complexity ideas are used heuristically (cf. Anaf, Drummond, & Sheppard, 2007), and data generated in a United Kingdom (UK) mental health setting are drawn on.

Complexity thinking, as Waldrop (1992) writes, is wide-ranging and transdisciplinary, whilst Urry (2005) observes in the context of a generalised 'complexity turn' a particular infiltration of ideas into the social sciences from the end of the 1990s. In an early contribution Byrne (1998) outlines some of the hallmarks of this perspective. These include a concern with irreducible wholes, and the outcomes of interaction within interdependent systems. In conditions characterised by interrelationships a perturbation in one place can trigger a disproportionate, unforeseen, impact elsewhere. In the case of change in public services, these non-linear effects are akin to what Rittel and Webber (1973) have elsewhere termed 'waves of consequences'. Movements of this type mean systems are continually engaged in processes of 'emergence'. Byrne (1998) also writes of systems being nested, so that each can be thought of as simultaneously sitting above and below (and interacting with) other systems of different scale. Alongside these vertical (macro/meso/micro) links run the horizontal connections joining systems of equal level.

Increasingly ideas of this type are being brought to bear on the health and social care arena (see for example: Plsek & Greenhalgh, 2001; Rouse, 2008). Assumptions that top-down, mechanistic, relationships bind the worlds of policymaking, local service

* Tel.: +44 (0)29 20917726.
E-mail address: hanniganb@cardiff.ac.uk.

0277-9536/$ – see front matter © 2012 Elsevier Ltd. All rights reserved.
doi:10.1016/j.socscimed.2011.12.044

development and care delivery are yielding to alternatives emphasising tensions, contradictions and unpredictability (Chapman, 2004; Geyer & Rihani, 2010). Informed by the foundational idea of systems existing at different, but interlocking, levels (Plsek, 2001), themes of interrelationship and change can be considered across (inter)national macro-level health and social care systems and also within smaller, nested, meso-level systems where interdependent networks of people and organisations collectively concerned with local service provision coexist. At a still smaller scale are dynamic, micro-level, systems comprising paid and unpaid workers sharing responsibilities for face-to-face care to individuals. A complexity perspective can inform questions about (for example) the use of evidence in macro-level policy and the links from here to service development at meso-level. It also informs ideas about meso-level distinctiveness, with care systems at this scale emerging in ways which reflect local interactions between constellations of people, organisations and events. In this context, complexity thinking underpins the observations that what 'works' in one place may not 'work' in others, and that services may develop only when local actors learn what helps in their environments. Used in empirical studies, a complexity approach supports responses to Griffiths' (2003) call for closer examination of the connections running both within, and across, care systems of different scale.

Mental health systems

Contributing to the particular complexity found in mental health systems are divisions of work which are typically both intricate and fluid (Hannigan & Allen, 2006; Hannigan & Allen, 2011; Hannigan & Allen, in press). Fundamental ideas and practices remain vulnerable to challenge (Pilgrim, 2007), and policymakers' solutions to identified problems can prove contestable (Hannigan & Coffey, 2011). As in all systems, adjustments in mental health services (such as, for example, introducing a new type of team) can trigger wider, and potentially unintended, effects. With some exceptions (see for example: Tansella & Thornicroft, 1998; Pilgrim & Rogers, 1999) it is striking in this context how little attention has been paid to understanding system interrelationships in this field.

Like many other mental health systems around the globe in which deinstitutionalisation has occurred the system across the UK remains organisationally fragmented (Knapp & McDaid, 2007). Here as in other relatively well-resourced parts of the world provision is made through primary care, hospitals and increasingly specialised community teams (Thornicroft & Tansella, 2004). Improving the functioning of these systems has become an international priority (see for example: World Health Organization, 2009), and in the UK since the middle of the 1990s this has been reflected through the identification of mental health as an area for sustained action (Lester & Glasby, 2010). In Wales, where data in the study reported on here were generated, the authority to make macro-level health policy lies with the Welsh Government. At meso-level, responsibilities for services are shared by National Health Service (NHS) health boards and their local authority and non-statutory sector partners. Here, as in other parts of the UK, particular policy and service development attention has been paid to community care (Pilgrim & Ramon, 2009). Interprofessional community mental health teams (CMHTs), which from the late 1970s onwards became the principal vehicles for the provision of secondary care to people living in defined geographical areas, have been supplemented by newer services dedicated to the support and treatment of groups differentiated by characteristics such as level and/or type of need (Burns, 2004). Examples include teams and services providing assertive outreach, early intervention for people with psychosis, and crisis resolution and home treatment (CRHT) care (Department of Health, 2001). In the case of CRHT services, these are known to have emerged in large numbers (Jones & Robinson, 2008; National Audit Office, 2007; Onyett et al., 2006). Welsh policy identifies these as a priority (Welsh Assembly Government, 2005a) and implementation guidance specifies that they should provide:

> a rapid response in the form of assessment and where appropriate support and treatment to adults for a brief period who are experiencing a mental health crisis, as an alternative to hospital admission. [Services should offer] people experiencing severe mental health difficulties the opportunity to be treated in the least restrictive environment with increased choice in the management of their mental health problems (Welsh Assembly Government, 2005b, p. 3).

Macro-level policy for Wales draws explicitly on favourable systematic reviews of the international evidence for home treatment (Burns et al., 2001) and crisis care (Irving, Adams, & Rice, 2006) to underpin the case for change. In their review, Burns et al. (2001) also note a historic lack of sustainability of home treatment services and argue for further UK studies. The relative absence of a UK-specific evidence base left initial policy for crisis services open to challenge. Pelosi and Jackson (2000), for example, contest the relevance of results in which intensive home-based care has been compared with hospital or clinic-based services rather than with services of the type routinely provided by UK CMHTs. Brimblecombe, O'Sullivan, and Parker (2003) draw a similar contrast between the relatively open-ended care provided by original home treatment teams positively evaluated in Madison in the US (Stein & Test, 1980), Sydney in Australia (Hoult, Reynolds, Charbonneau-Powis, Weekes, & Briggs, 1983) and in London (Marks et al., 1994) with the time-limited services offered by modern CRHT teams in the UK.

With debates persisting over approaches to the organisation and delivery of mental health care (Molodynski & Burns, 2008), crisis services came to UK prominence with support from influential advocates (see for example: Smyth & Hoult, 2000) as a favoured solution to problems identified across both the community and hospital parts of the system. In the absence of product champions (Burns, 2004), CMHTs lost the unequivocal backing of policymakers in the face of suggestions that they lacked focus and were fractured through interprofessional conflict (Galvin & McCarthy, 1994; Lankshear, 2003). These teams were also described as being difficult to manage (Onyett, Standen, & Peck, 1997). Additional, pressing, problems were identified in the hospital part of the system. Bed occupancy was shown to be high, and opportunities for meaningful therapeutic intervention scarce (Sainsbury Centre for Mental Health, 1998). In Wales the physical environment for inpatients was found to be poor (Wales Collaboration for Mental Health, 2005). Improving care for people in crisis was identified by users and carers as a priority (Naylor, Wallcraft, Samele, & Greatley, 2007), and CRHT services (along with other new types of mental health team) were identified as a means to unify disparate groups of professionals around clear and agreed goals (Peck, 2003).

The study: purpose and objectives

Although results are being reported from UK studies investigating the outcomes for people in receipt of community crisis care (see for example: Johnson, Nolan, Hoult, et al. 2005; Johnson, Nolan, Pilling, et al., 2005) very little, still, is known of the processes through which CRHT services are introduced or their initial and enduring system effects. Anecdotal evidence points to tensions between staff in crisis teams and in hospitals (Smyth, 2003), and recent research highlights some practitioners' concerns that new services may undermine continuity of care