Person-centred Integrated Care Networks for healthy ageing in place: a scoping review

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Introduction

In response to the escalating challenges posed by global population ageing and increased longevity (Kontis et al., 2017), policy and practice have shifted from institutional care models towards strategies for ageing in place.Ageing in place has been defined by the Centre for Disease Control and Prevention (CDC) as enabling older individuals to remain safely and independently in their own homes, regardless of age or ability, for as long as possible. Ageing in place, however, encompasses more than just living in one's own home; it involves maintaining active roles within communities, supported by adequate housing, educational, cultural, and recreational resources (Thomas & Blanchard, 2009). Indeed, the importance of neighbourhood environments, including social connections and amenities, plays such a pivotal role for individuals as they age (Bigonnesse & Chaudhury, 2021), that the term "ageing in community" has been formulated as an alternative to emphasise the importance of social networks.

In alignment with the WHO's Healthy Ageing framework, ageing in place is closely linked to the concept of "quality ageing", , which prioritises maintaining functional ability to enhance well-being (Bosch-Farré et al., 2020). Policymakers and healthcare providers favour this approach due to its economic advantages, reducing the need for costly institutional care while enabling older individuals to remain integrated in their communities (Lewis & Buffel, 2020).

The attachment to familiar environments, emotional ties to neighbourhoods, and the sense of security and stability fostered by these settings are key reasons why older adults prefer to age in place (Coleman & Wiles, 2020). Studies also suggest that older adults desire autonomy and independence even when faced with disability (Boldy et al., 2011). Surveys reveal that 87% of Americans aged 65 and over prefer to remain in their current residence rather than move to a care facility (AARP, 2014), and similar findings in the UK highlight this preference for independent living (UKHCA, 2019) Those who successfully age in place report higher levels of life satisfaction and reduced loneliness compared to those in institutional settings (Andrew & Meeks, 2018).

However societal and economic changes challenge high quality ageing in community settings. As adults age, they may face chronic conditions and declining mobility, increasing their need for support. Therefore, the availability of primary care services, social support from family or neighbours, and adequate housing are essential to ensuring well-being for older adults (Rolls et al., 2011). However, austerity-driven reforms have diminished public funding for elder care services, leading to fewer publicly funded care options and reductions in voluntary-sector services (Fernandez et al., 2013). Compounding these issues is the declining availability of family caregivers due to changing social dynamics, such as increased labour participation among women, rising divorce rates, and smaller family sizes (Colombo et al., 2011). Workforce shortages in the care sector further exacerbate the challenge (SkillsforCare, 2020).

While the WHO's Integrated Care for Older People (ICOPE) framework proposes successful integrated care requires comprehensive assessments, shared decision-making, support for self-management, and multidisciplinary care teams (WHO, 2017), the fragmentation of services and inefficiencies in care systems pose significant barriers to ageing in place. Effective care systems should integrate community-based models that prioritise delaying institutional care by meeting older adults' diverse health and social needs (Bookman, 2008). Despite efforts to promote integrated care, challenges remain in coordinating health and social services to meet older adults' needs effectively (Fabbricotti, 2003). Integrated care models prioritise person-centred approaches, ensuring that care aligns with individuals' preferences and goals (McCance & McCormack, 2017). Person-centred care involves empowering individuals to take control of their health and well-being, promoting collaborative decision-making between patients and healthcare providers (Anderson & Funnell, 2010). This approach contrasts with traditional healthcare paternalism, emphasising personalised care and autonomy (Morgan & Yoder, 2012).

The United Kingdom offers examples of community-based care, such as the Elderly Persons Integrated Care Systems (EPICS), introduced alongside the 1990 NHS and Community Care Act. The EPICS model, inspired by the On Lok model in the USA, provided holistic, multidisciplinary care through community hubs, but ultimately ceased due to leadership changes and funding issues. Despite its discontinuation, EPICS provided an early blueprint for integrated care models, though it lacked attention to intergenerational relationships and dementia care.

In response to the growing importance of community-based care models and the increasing focus on person-centred approaches, it becomes essential to explore how these strategies can effectively support older adults as they age in place. Integrated care systems that prioritise the individual's needs and promote collaboration between healthcare providers, communities, and families have the potential to reduce the need for institutional care. However, gaps remain in understanding how these systems function across different contexts and how they impact the well-being of older adults.

Building on the principles of person-centred care and integrated health systems, the Enabling Person-centred Integrated Care Networks study[1] seeks to investigate contemporary models of person-centred integrated care (PIC) networks. By examining community-based PIC networks, the research aims to understand their effectiveness in maintaining older adults' health and well-being, while minimising transitions to more intensive care settings. Employing a scoping review methodology, the study has mapped existing literature on community-based PIC networks, identifying their purpose, key components, and evidence regarding their success in supporting ageing in place.

Methodology:

. While scoping studies lack a universally accepted definition or standardised guidelines for execution and reporting (Pham et al., 2014), they are characterised by comprehensive, systematic literature searches aimed at identifying all relevant sources on a particular topic. The primary objective of scoping reviews is to map the available evidence and identify knowledge gaps, rather than synthesising conclusions on effectiveness (Munn et al., 2018). Unlike systematic reviews, scoping reviews do not involve meta-analyses or the evaluation of research quality (Arksey & O'Malley, 2005). However, they are valuable for showcasing the scope, nature, and characteristics of existing knowledge while highlighting future research directions.

[1] MRC xxx Helen Hamlyn Trust xxx

For this review, we followed a protocol developed in March 2024 based on Potter, Malli, and Harper (2023), and grounded in Arksey and O'Malley's (2005) framework. This approach consists of five key stages: defining the research question, identifying relevant studies, selecting studies, charting data, and collating, summarising, and reporting the results.

Stage 1: Formulating the Research Question

The overarching research question guiding this scoping review was: What practice-based models of person-centred integrated care (PIC) networks exist at the local/neighbourhood level to support the health and well-being of older people, and what evidence is available regarding their effectiveness in promoting healthy ageing in place?

We also explored the following sub-questions to aid data extraction from selected studies:

What are the aims and expected outcomes of current PIC network models?

What are the core components of these models?

How extensively has each PIC network model been evaluated for its effectiveness in achieving its anticipated outcomes?

Stage 2: Identifying relevant studies

Table 1. Search terms used to identify relevant studies in academic databases and grey literature.

Domain	**Equivalent / related search terms**
Population: older people AND	"older adults" OR "older people" OR "senior citizen" OR elder* OR seniors OR "senior citizen*" OR frail* OR aged OR "oldest old"
Concept: integrated care networks AND	"integrated care" OR "care network" OR "community care model" OR "care coordination"
Context (geographic): community-based support (neighbourhood level) AND	neighbourhood OR neighbourhood OR local OR community
Context (process): healthy ageing in place	"healthy ageing" OR "healthy aging" OR "ageing in place" OR "aging in place" OR "ageing at home" OR "aging at home" OR "living at home" OR "living in the community"

We identified key search terms with no restrictions on publication year or study design to ensure a comprehensive and broad search across multiple databases (Table 1). The databases included MEDLINE/PubMed, Web of Science, CINAHL, Scopus, and PsycINFO, among others. To capture grey literature, we conducted Google searches using predefined combinations of search terms, in addition to consulting relevant organisations such as the World Health Organization, Age UK, and The Health Foundation. All identified sources were imported into a reference management system, where duplicate entries were systematically removed before further analysis.

In addition to academic databases, grey literature was sourced by screening results from Google and reviewing the websites of policy and voluntary organisations focused on integrated care and healthy ageing. This included organisations such as the Centre for Policy on Ageing, Centre for Ageing Better, the UK Department of Health and Social Care, The King's Fund, EngAgeNet, and the International Foundation for Integrated Care. These steps ensured that we captured a diverse range of evidence on person-centred integrated care (PIC) networks, contributing to a comprehensive review of the topic.

Stage 3: Study selection

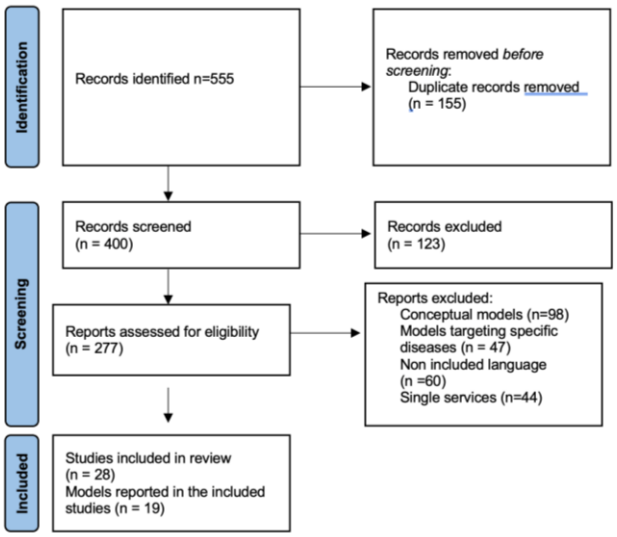
The criteria outlined in Table 2 were independently applied by two researchers to select relevant studies. The target population, 'older people,' was generally defined as individuals aged 60 years or older, following the United Nations definition and consistent with the terminology used by England's National Health Service. However, we acknowledged the flexibility in defining 'older age,' particularly for studies addressing support networks for conditions commonly associated with older age, such as frailty, even if some participants were younger than 60.

The initial screening phase focused on titles and abstracts. Both researchers independently reviewed a selection of sources to ensure the consistent application of the inclusion criteria. Studies that met the criteria proceeded to full-text review, and reasons for exclusion were documented. Any disagreements between the researchers were resolved through discussion, with a third researcher available to mediate if necessary. After the full screening process, reference lists of included studies were also examined to identify any additional relevant sources.

Table 2. Inclusion and Exclusion Criteria for study selection.

Inclusion criteria	Exclusion criteria
Correct population: older people living independently at home	Older people living in residential care/care homes/nursing homes or with 24-hour presence of paid care staff
Home is in the general community (i.e. neighbourhood is not age-segregated), including retirement housing where links to the wider community are maintained	Age-segregated developments without immediate links to the general community
Practice-based model of integrated care: Focused on operational delivery of multiple care services, either in research trials or natural settings.	Papers focused on conceptual models
Neighbourhood/local community level of operation.	Larger regional, district, or state-level operations (e.g., Integrated Care Boards).
Operational configuration of a network: Describes financial or management structures that coordinate multiple care providers.	Single services or interventions, or informal connections between services.
Network includes health and general care services: Includes support from voluntary sector organisations.	Networks restricted to health care providers only (e.g., services entirely within the NHS).
Models focused on general support for ageing: Includes addressing frailty or complex care needs.	Models targeting specific diseases or patient populations (e.g., Parkinson's), or models based on end-of-life care.

Table 3. Flowchart of the literature search and retieval process.



Stage 4: Charting data

Data were extracted from each selected study using a structured template, capturing key information across the following fields: author names, publication year, source (e.g., journal

name and volume number), study design and methodology, network model name or description, year of implementation (and discontinuation if applicable), geographic setting, aims and anticipated outcomes, targeted population, financial structure, management structure, components of the network (e.g., services provided, mechanisms for service coordination), and evaluation evidence.

To ensure consistency, data extraction for the first 10% of selected studies was conducted independently by two researchers. Following this, one researcher handled data extraction for each study, with regular research team meetings held to review emergent findings, address any issues, and maintain uniformity in the approach.

Stage 5: Collating, Summarising, and Reporting Results

After completing the data extraction process, the results were collated and summarised to identify the scope and characteristics of the existing evidence on person-centred integrated care (PIC) networks. This included analysing the structure, operation, and effectiveness of the models to determine their role in supporting healthy ageing in place. Findings were summarised to identify common themes and knowledge gaps, with recommendations for future research.

Findings

Different Models of Networks Identified

Through this scoping review, 17 distinct models of integrated care were identified, each varying significantly in implementation, structure, and objectives. These models include:

1. **Leeds Neighbourhood Network (LNN) (UK)**
2. **Birmingham Neighbourhood Network Schemes (UK)**
3. **Naturally Occurring Retirement Community (NORC)** (USA, Australia, Canada)
4. **Integrated Neighbourhood Approach (INA)** (The Netherlands)
5. **Village-to-Village Network** (USA, Manchester, UK)
6. **Buurtzorg Model** (Netherlands, UK)
7. **PACE (Program of All-Inclusive Care for the Elderly) (USA)**
8. **Active Caring Community** (Brussels)
9. **Bromley by Bow Centre (UK)**

10. **Carewell Programme (The Netherlands)**
11. **CAPABLE (Community Aging in Place, Advancing Better Living for Elders)** (USA)
12. **IPA (Integrated Care for Older Persons)** (Canada)
13. **INSPIRE "Integrated Services for People in Need of Rehabilitation and Assistance." (Switherland)**
14. **SIPA (System of Integrated Care for Older Persons) (Canada)**
15. **Community-Based Integrated Service (CBIS)** (South Korea)
16. **ElderHelp San Diego Concierge Club** (USA)
17. **EPICS (Elderly Persons Integrated Care Systems)** (UK)
18. **Just for US (USA)**
19. **SUSTAIN (Europe)**

Characteristic of included studies

Based on the scoping review, a total of 19 integrated care models were identified, implemented across different countries. The majority of these models (7) were based in the United States, followed by 4 in the United Kingdom, 2 in Canada, 3 in the Netherlands, 1 in Belgium, one in Switherland and 1 in South Korea. These models illustrate a wide variety of approaches, reflecting the differing healthcare systems, cultural contexts, and policy environments in which they operate.

Structure and components of the models

Two Forms of Horizontal Integration in Care Models

This review identified two main models for horizontal integration: one-stop shop models and linkage models, each with distinct approaches to the coordination of care for older adults.

One-stop shop models consolidate multidisciplinary services in a single location to address both the medical and social care needs of older adults. Examples include PACE, the Bromley by Bow Centre, and the EPICS model. In these models, general practitioners (GPs) and healthcare providers are central to the care coordination process, creating a structure where healthcare services are tightly integrated with social support. These models aim for full integration, forming new structural entities by bringing together existing organisations. However, motivating primary care physicians to engage proactively in holistic care delivery and facilitating data-sharing has proven to be challenging (Goodwin et al., 2021). The resource-intensive nature of full integration also poses significant hurdles, as it requires substantial investment in infrastructure and a commitment to cross-organisational collaboration. Linkage models, on the other hand, involve partnerships between multiple service providers—public, private, and voluntary sectors—who coordinate care while retaining their autonomy. These models rely heavily on community care and third-sector contributions, such as non-profits, charitable organisations, and social enterprises, which play a critical role in delivering services to older adults (Anderson & Hussey, 2000). In these networks, informal community support from unpaid family carers, friends, and neighbours is a crucial component, providing practical assistance with tasks such as light housekeeping, meal preparation, and transportation. Linkage models are particularly reliant on multidisciplinary collaboration and partnerships between stakeholders from various sectors, including government and non-governmental organisations. They attempt to bridge the communication gap between medical and non-medical services, providing a holistic support system for older adults that encompasses health, social care, and community participation. However, these models often lack the formal involvement of the healthcare system. Instead, their focus is placed on social support, connectedness, and civic participation, with referrals to external care management or home healthcare services when necessary (Goodwin et al., 2021).

In both one-stop shop and linkage models, well-being and health are conceptualised as more than just the absence of illness. Instead, these models embrace a more holistic approach, addressing the social determinants of health and recognising the importance of community-based care for the overall well-being of older adults. This shift represents a movement away from the traditional biomedical model towards an integrated system that meets both the medical and non-medical needs of the population.

One commonality across both one-stop shop and linkage models is the use of a case manager or care coordinator, although the title and specific responsibilities of this position may differ. The role of the coordinator typically extends beyond simple navigation between services, encompassing a range of responsibilities such as comprehensive assessment, identification of needed services, facilitation of access, ongoing monitoring, care coordination, and evaluation. In some models, this role is performed by professionals with clinical expertise, such as nurses (e.g., Elder Help), while in others, it is carried out by social workers or community coordinators without clinical expertise (Izumi et al., 2018).

Care coordinators must have a strong understanding of the community assets and local health and care systems. They play a critical role in negotiating with the system and ensuring that older adults receive the appropriate services in a timely manner. However, despite the significance of this position, few models report providing specialised training for care coordinators, leaving a gap in ensuring consistency and quality of care across models.

Effectiveness and Suitability of Models

The evidence suggests that fully integrated one-stop shop models are better suited to serve older adults with severe, complex, and long-term care needs, as they offer a higher degree of coordination between medical and social services. Conversely, linkage models may be more appropriate for individuals with lower-level needs, as they provide flexible, community-based support that is less resource-intensive (Goodwin et al., 2021).

In both models, the involvement of community-based programmes, informal care from family and non-kin relations, and partnerships across various sectors create a comprehensive support system that addresses the wider social determinants of health. However, the sustainability of informal care networks—given the increasing demands on unpaid carers—and the reliance on voluntary sector contributions remain significant challenges for linkage models (Anderson & Hussey, 2000).

Goals of the models

Upon examining the goals of integrated care models, it is clear that while there are shared objectives, notable divergences exist in their approaches. A common priority across all models is to empower individuals to age in place, enabling them to remain in their homes with dignity while minimising hospital admissions or transitions to institutional care. These models are largely intervention-based, rather than preventive (notable exception the BNNs), and typically achieve their goals through the deployment of multidisciplinary teams and community-based support networks. However, only a minority of these models explicitly focus on financial efficiency or cost containment. For example, initiatives like SIPA and CAPABLE include economic analyses to evaluate the cost-effectiveness of their interventions and assess the financial implications of their implementation.

Furthermore, some models place particular emphasis on addressing social isolation, a critical factor in the well-being of older adults, as seen in the Village and Leeds Neighbourhood Network (LNN) models. These models aim to foster social connections and provide community support to mitigate loneliness among the elderly.

Despite these commonalities, only a limited number of models within this review explicitly prioritise the enhancement or maintenance of physical and mental health. For instance, models such as INA and CAPABLE incorporate elements of self-management, encouraging older adults to actively participate in managing their health conditions. However, the majority of models do not focus on bolstering self-management skills.

Funding of the models

The funding structures of the integrated care models revealed significant variability. While some models received full government funding (e.g. Active Caring Neighbourhood/ Community), others operated on a mixed funding basis, combining partial government support with out-of-pocket payments from service users. For instance, the Village model is entirely

reliant on participant contributions, illustrating a dependency on direct financial input from individuals, which may limit accessibility to economically disadvantaged populations.

Despite the diversity in funding mechanisms, concerns about financial sustainability were widespread across several models. Many models expressed apprehension about their long-term viability, primarily due to their reliance on multiple, often inconsistent, funding streams. This uncertainty is particularly acute when future funding from governmental sources or grants is not guaranteed, posing significant challenges to the continuity of care and the ability of these models to deliver essential services over time.

Only a minority of the models demonstrated financial efficiency. For example, models such as SIPA have successfully reduced costs related to institutional care. However, these savings were often offset by the increased costs associated with providing comprehensive community-based care. This cost shift reflects the broader challenge of sustaining community care systems, where the delivery of integrated services—while beneficial to patient outcomes—requires considerable financial investment in both personnel and infrastructure, potentially undermining the scalability of such models in resource-constrained environments.

Targeted population

There are notable variations in the targeted populations and age criteria across the integrated care models. Many models, such as ElderHelp, PACE, Prisma, INA, Buurtzorg, and Active Caring Communities, focus primarily on frail older adults. Frailty is a highly prevalent condition among the elderly and is a well-established risk factor for adverse health outcomes, including increased morbidity, hospitalisation, and mortality (Clegg et al., 2013; Fried et al., 2001). However, while frailty is common in older age, it is not an inevitable consequence of ageing. Research suggests that frailty can be mitigated or even prevented through early intervention and appropriate support, emphasising the importance of proactive and preventive care approaches within integrated care models (Cesari et al., 2016).

By targeting frail older adults, these models aim to address complex care needs and improve overall quality of life. However, the inclusion of a broader spectrum of the ageing population, particularly those at risk of becoming frail, could help prevent the progression of frailty and reduce the burden on healthcare systems. Thus, while frailty-focused models provide critical

support, a more holistic approach that includes preventive measures for a wider ageing population may yield better long-term outcomes.

Discussion

It has been suggested that for an integrated model to be effective it needs to be comprised of the following elements: (1) a single point of entry, (2) holistic care assessments, (3) comprehensive care planning, (4) care co-ordination and (5) a well-connected provider network an (6) and support from a multidisciplinary team of care professionals (Nies, 2009). In most cases the models adhere to these standards. However, there are numerous limitations and criticisms discussed in the following section. It should also be highlighted that although these models assist older people in navigating the complexities of the care continuum, they do not fully address the fragmentation and gaps within the system. Many models have not been assessed for sustainability and rely on precarious funding, thus providing only a temporary solution.

Lack of Rigorous Evaluation

Although many models report positive outcomes, such as improved well-being for older adults and decreased use of public resources, a substantial portion lack rigorous evaluation. Few models have undergone comprehensive assessments of their cost-effectiveness, making it difficult to determine their overall efficiency and sustainability. Furthermore, there is a lack of research into user perspectives in the majority of models, which raises questions about the extent to which these models improve patient experiences and satisfaction. Without this crucial data, it is challenging to develop a complete picture of the models' real-world impact.

Lack of Integration of Care Technologies

A notable finding from the scoping review is the reluctance of most models to integrate advanced care technologies. Many models adhere to a "low-tech, high-touch" approach, leaving a significant gap in the understanding of how innovations such as assistive technologies

(AT), ambient intelligence (AmI), ambient assisted living (AAL), and artificial intelligence (AI) could enhance care delivery for ageing populations (Marikyan et al., 2019). Concerns among older adults and researchers about the potential negative effects of these technologies—such as fostering social isolation or institutionalising the home environment—may explain the hesitance to adopt them (Milligan, 2003). Nevertheless, research shows that when used appropriately, technologies can promote both socialisation and autonomy among older individuals, addressing their medical and social needs (Friedewald & Da Costa, 2003).

The COVID-19 pandemic underscored the potential of technology to play a pivotal role in delivering care and mitigating social isolation. Despite the proven benefits, particularly for telehealth and telecare, many models have not capitalised on these innovations. As the World Health Organization (WHO) highlights, technology has the potential to revolutionise care and improve the experiences of ageing in place, but it should be viewed as a complementary tool rather than a standalone solution.

Unaddressed issues: Housing and Environmental Considerations

While many integrated care models assume that ageing in place is the preferred option for older adults, this approach should not be seen as a universal solution. The success of ageing in place is deeply contingent upon the quality of the environment in which older adults live. As Smith (2009) and Golant (2008) argue, older adults living in substandard housing or deteriorating neighbourhoods may face significant barriers to accessing appropriate care, leading to unmet needs and potentially hazardous living conditions. The physical, social, and economic contexts of their homes and neighbourhoods play a critical role in determining whether ageing in place is a positive experience or one fraught with challenges.

Moreover, prolonged ageing in place, particularly without adequate support, can result in both mental and physical exhaustion for older individuals and their caregivers. This is especially true when informal support systems (e.g., family members, friends) or formal services (e.g., home care aides) are insufficient or unavailable (Horner & Boldy, 2008). In such cases, the experience of ageing in place can become isolating and burdensome, contributing to a decline in the overall well-being of both the older adults and their caregivers.

The issue of housing adequacy is central to discussions about ageing in place, yet few integrated care models comprehensively address it. For instance, while models such as CAPABLE and ElderHelp recognise the importance of housing modifications to meet the evolving needs of ageing individuals, many other models overlook this critical aspect. The CAPABLE model, for example, focuses on home repairs and modifications in addition to health interventions, illustrating a more holistic approach to ageing in place. However, such comprehensive models remain the exception rather than the norm.

Many older adults continue to live in homes that were not designed or modified for the physical limitations that often accompany ageing. Inadequate housing can exacerbate mobility issues, limit access to necessary services, and even pose safety risks. For example, homes without accessible features such as grab bars, wheelchair ramps, or widened doorways may increase the likelihood of falls or other accidents. A study by the Centre for Ageing Better (2020) found that nearly one-third of individuals aged 50 and older in the UK consider their homes ill-suited to their future needs, indicating a widespread issue that has yet to be fully addressed. This lack of accessible, affordable housing can make ageing in place a less viable option for many.

Beyond the home itself, the broader neighbourhood environment also plays a crucial role in facilitating successful ageing in place. Factors such as the availability of local services (e.g., healthcare, grocery stores), public transportation, neighbourhood safety, and community relationships all impact the ability of older adults to remain active and engaged within their communities (World Health Organization, 2007). The built environment, including public spaces, roads, and green areas, also affects mobility and social participation. For instance, inadequate sidewalk maintenance, unsafe street crossings, and limited public transport options can severely restrict the ability of older individuals to access services or participate in social activities, leading to increased isolation (Buffel et al., 2012).

The Age-Friendly Cities initiative, spearheaded by the World Health Organization (WHO), highlights the importance of creating urban areas that cater to the needs of older adults, with accessible infrastructure, housing, and services. Yet, many current integrated care models do not incorporate these considerations at a neighbourhood level, focusing primarily on medical and social care without addressing the physical environment. Research on models like the Village-to-Village Network suggests that while these programs succeed in building social connections, they may still struggle to engage homebound individuals or those with mobility

issues due to the lack of accessible transportation and public infrastructure (Graham et al., 2018).

Therefore, the concept of ageing in place should not be considered in isolation from the broader physical and social environment. Without addressing issues related to housing adequacy, community infrastructure, and neighbourhood safety, the push for ageing in place may inadvertently contribute to further isolation and a decline in the quality of life for many older adults. This underscores the need for comprehensive solutions that integrate housing, environmental, and social considerations into the development of integrated care models. Governments and policy-makers must also play a critical role in ensuring the availability of affordable and accessible housing for older populations, particularly as public responsibility for eldercare continues to shift towards community and family-based systems of support.

Sociodemographic Disparities

Certain integrated care models, like the Village model and ElderHelp Concierge, operate on user-pay schemes, making them more accessible to wealthier, predominantly white, middle-class populations (Graham et al., 2014). This creates barriers for older adults from racial and ethnic minority backgrounds, who are often at a higher risk of poverty and poor health outcomes (Fret et al., 2020). Minority groups, particularly those with lower income, are more likely to rely on nursing home care due to limited access to integrated care and financial constraints (Pearson et al., 2019). This is only addressed in the Just for Us model in the USA.

Sociodemographic factors, such as income, race, and education, are often stronger predictors of long-term care admissions than physical health status (Shapiro & Tate, 1985). This highlights the underrepresentation of minority groups in these models, raising concerns about whether they adequately meet the needs of economically disadvantaged populations. Additionally, cultural barriers and a lack of culturally sensitive services further marginalise minority populations, making it difficult for them to access or benefit from these models (Ihara et al., 2004).

Volunteerism in Integrated Care Models

Some integrated care models focus on fostering mutual exchange, aid, and reciprocity within communities, emphasising the importance of strengthening neighbourhood relationships through a culture of "neighbours helping neighbours." This approach, while well-intentioned, has been criticised for relying on a romanticised and nostalgic notion of community spirit, which critics argue has diminished in modern times (Phillipson et al., 2001; Savage et al., 2004). Despite these critiques, volunteerism remains the backbone of many integrated care models, serving as a key component in delivering non-medical services.

Volunteerism is frequently used to provide various forms of non-medical assistance, such as light housework, meal preparation, transportation, advocacy, and opportunities for social interaction. These informal caregiving efforts are crucial in several models, including the Village and ElderHelp networks. Volunteerism not only reduces operational costs but also enables older adults to engage as active contributors, rather than being perceived solely as passive recipients of care (Wacker & Roberto, 2013). This involvement helps to challenge ageist stereotypes, portraying older adults as individuals with agency who contribute to the well-being of their communities (Calasanti & Slevin, 2001; Yuan et al., 2018).

In models such as the Village-to-Village network, older adults play an active role in governance, service provision, and decision-making, thus fostering a sense of empowerment and ownership over their care. Volunteerism in this context aligns with the principle of active ageing, which promotes continued social participation and engagement in meaningful roles after retirement (Warburton & McDonald, 2009; Walsh & O'Shea, 2008). Studies suggest that engaging in volunteerism enhances self-perception, self-efficacy, and provides social recognition, thereby minimising feelings of dependency and marginalisation (Gabriel & Bowling, 2004). Additionally, volunteerism is associated with reduced functional decline, providing a formal role for older adults to maintain social and physical activity (Morrow-Howell, 2003).

However, the increasing reliance on older volunteers raises concerns about their well-being, particularly when overburdened with caregiving responsibilities. Role overload and

insufficient time for other meaningful activities can lead to burnout, particularly when formal support and training are lacking (Windsor et al., 2008). Older volunteers without partners may experience heightened vulnerability to the negative effects of excessive caregiving, further underscoring the need for regular review and formal support mechanisms to ensure their well-being (Overgaard et al., 2018). Volunteerism must remain a choice and should be used to augment, rather than replace, formal care services, particularly in communities where formal services are inadequate (Fast & de Jong Gierveld, 2008).

Informal Caregiving in Integrated Care Models

Informal caregiving, primarily provided by family members, can also result in significant emotional and physical strain. Caregivers often report a diminished quality of life, financial burden, and increased health issues, including depression and weight fluctuations (Wolff et al., 2016). Despite the crucial role they play, many models fail to provide adequate support for informal carers. A study found that 90% of family caregivers had never received formal training in how to care for an ageing individual, further exacerbating caregiver burnout and financial strain (Burgdorf et al., 2019). Ensuring that models of care provide adequate support and training for caregivers is imperative to balance the negative aspects of caregiving with its potential benefits.

It is also is essential to consider the gendered nature of caregiving. As numerous studies have shown, caregiving responsibilities disproportionately fall on women, reinforcing existing gender inequalities in both informal and formal care (Lee & Tang, 2015). The reliance on unpaid female caregivers is a structural issue that integrated care models must address to promote equitable care distribution and prevent the further marginalisation of women.

Of particular importance is the convey of informal and formal care. The literature highlights several models of how formal and informal caregivers interact in these contexts, including hierarchical compensatory models, substitution models, task-specific models, and complementary models. Each model represents a different way of balancing responsibilities between formal healthcare providers and informal, family-based caregiving networks. The way in which these relationships are navigated can have a significant impact on the well-being of both the care recipient and the caregivers themselves, as well as on the

overall effectiveness of the care model. Therefore, understanding the complexities of these formal-informal care relationships and exploring the best ways to coordinate care between these diverse actors is essential to improving integrated care models and ensuring the sustainability of caregiving networks.

However, while in many care models, both service users and their families actively participate in care planning and management, none of the existing models provide detailed descriptions of how the "convoy of care"—the partnership between formal and informal caregivers—is structured or negotiated (Kemp et al., 2013). The convoy of care involves a range of caregivers, both professional and non-professional, who may or may not share close relationships with the care recipient or with one another.

Intergenerational Solidarity and Care Networks

Intergenerational solidarity and connectedness are critical to achieving successful ageing in place, as ageing occurs within a person's physical, social, and cultural context. Research indicates that intergenerational communities, or age-friendly communities that foster interaction between different age groups, can significantly alleviate ageism, loneliness, and social isolation, thereby promoting healthy ageing (Lee & Zhong, 2019; United, 2015). These interactions enable older adults to feel more connected to their communities and reduce the stigma often associated with ageing. According to the World Health Organization (WHO) Global Age-friendly Cities Guide, intergenerational activities are seen as more beneficial and desirable than activities solely designed for older adults (WHO, 2007). However, despite the evidence supporting the benefits of such initiatives, most existing integrated care models are age-segregated. These models typically focus on older populations alone and often do not incorporate volunteers from a wide range of age groups, limiting the potential for fostering intergenerational relationships.

Given the proven benefits of multigenerational interaction, there is a clear need to integrate intergenerational elementsinto current models for older adults. These elements could encourage more collaborative and supportive communities, where people of all ages contribute to and benefit from the care and well-being of their older members.

Conclusion

This scoping review has provided valuable insights into the variety and complexity of integrated care models aimed at supporting ageing in place for older adults. While these models offer promising frameworks for addressing both medical and social care needs, significant challenges remain. Many of the reviewed models incorporate essential components, such as multidisciplinary collaboration, care coordination, and a single point of entry. However, several critical areas require further attention, including sustainability, equity, and cultural inclusivity.

First, the lack of rigorous evaluation in many models, particularly with respect to cost-effectiveness and long-term sustainability, makes it difficult to assess their real-world impact.

Moreover, the reliance on volunteerism and informal care raises questions about the burden on caregivers and the potential for burnout without adequate support systems. Addressing these gaps is crucial for ensuring that the benefits of ageing in place can be sustained over time.

Additionally, the scoping review highlighted disparities in access to integrated care services, particularly for economically disadvantaged and minority populations. The sociodemographic inequities in some user-pay models point to the need for more inclusive and equitable approaches. Incorporating culturally tailored services and ensuring access to affordable care for all older adults should be a priority in the development of future models.

Finally, the review identified a notable absence of intergenerational and environmental considerations. The integration of intergenerational elements into care models, alongside improved attention to housing and neighbourhood infrastructure, is essential for fostering age-friendly environments that support healthy ageing in place.

Overall, while current integrated care models represent a significant step forward in supporting older adults to age in place, there is a clear need for innovative, sustainable,

and inclusive solutions that address the full spectrum of needs faced by ageing populations. Future research should focus on addressing these gaps to create care systems that are resilient, adaptable, and equitable for all.

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