THE UNIVERSITY of York Centre for Reviews and Dissemination

Evidence to inform the commissioning of social prescribing

- There is little good quality evidence to inform the commissioning of a social prescribing programme
- Most of the available evidence tends to describe evaluations of pilot projects but fails to provide sufficient detail to judge either success or value for money
- There may be evidence for relevant interventions that have yet to be evaluated as part of a social prescribing programme
- Evidence on the cost effectiveness of social prescribing schemes is lacking
- If existing knowledge is to be improved, evaluation of new schemes should be comparative by design and address when, for whom and how well does a scheme work? What effects does it have? What does it cost?

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Background

Social prescribing is a way of linking patients in primary care with sources of support within the community. It provides GPs with a non-medical referral option that can operate alongside existing treatments to improve health and well-being. While there is no widely agreed definition of social prescribing, or 'community referrals', reports on social prescribing include an extensive range of prescribed interventions and activities. Some examples are given in the box 1.

The Department of Health have previously proposed the introduction of social prescriptions for those with long-term conditions.¹ The aim being to promote integrated health and social care, partnered with the voluntary and community sector. Schemes such as exercise-on-prescription projects have been established or piloted in a number of areas and said to have been 'very successful'.¹⁻³ NHS England are promoting access to non-clinical interventions from voluntary services and community groups as a way of making general practice more sustainable.⁴

Box 1. Social prescribing interventions						
•	Community education groups	•	Fishing clubs			
•	Arts, creativity, learning and exercise on referral	•	Gym-based activities			
•	Self-help groups	•	Guided/health walks			
•	Computerised CBT	•	Green Gym/ gardening clubs			
•	Bibliotherapy/self-help reading	•	Cycling			
•	Group activities on referral	•	Swimming and aqua-therapy			
•	Volunteering	•	Team sports			
•	Time Banks	•	Exercise and dance classes			
•	Signposting information and guidance	•	Physical activity			
•	Supported education and employment	•	Learning new skills			
•	Adult learning	•	Mutual aid			
•	Knit and natter clubs	•	Befriending			

This briefing is a rapid appraisal and summary of existing sources of synthesised and qualityassessed evidence, primarily systematic reviews and reports of formal evaluations. These were identified by searching DARE, Cochrane Database of Systematic Reviews and NHS EED for relevant systematic reviews and economic evaluations. As few relevant reviews were identified, we conducted quick searches of MEDLINE, ASSIA, Social Policy and Practice, NICE, SCIE and NHS Evidence to locate details of any relevant guidance or service evaluations. We also searched the websites of the Kings Fund, Health foundation, Nuffield Trust and NESTA to locate any reports of relevant evaluations in UK settings.

Effectiveness

We found few systematic reviews specifically looking at the effectiveness of social prescribing.⁵⁻⁷ The studies included in the systematic reviews identified were all of poor quality, with small numbers, short follow up times and differences in the outcomes measured.

We found a good quality systematic review examining the effect of exercise referral schemes in primary care on physical activity and improving health outcomes.⁵ The review included eight trials (5190 participants), six conducted in the UK. Participants were mainly sedentary, aged 54 to 71, with evidence of cardiovascular risk factor(s). The main referrer was the GP; follow-up ranged from two to 12 months. There were no significant differences in physical activity, physical fitness, or clinical outcomes between exercise referral schemes compared with usual care, alternative exercise interventions, or exercise referral schemes plus behaviour change interventions. Two trials reported a significant reduction in depression but not anxiety for exercise referral schemes compared with usual care. Limitations in each of the small number of included studies leave uncertainty about the effectiveness of exercise referral schemes on physical activity and improving health outcomes.

A second systematic review aimed to evaluate the effect of prescribed physical activity/exercise on non-exercise physical activity/energy expenditure in healthy adults.⁶ The review authors found no evidence to suggest that exercise training has a significant effect on non-exercise physical activity/ energy expenditure. Although this was a well conducted review, the quality of all 31 included studies was poor. The same non-significant effect of exercise referral interventions on self-reported physical activity at 12 months was found in another review.⁷ Both reviews found the likelihood of any effect in individual studies was highest for the comparison of exercise referral schemes to no intervention and weakest when compared with advice given face to face.

We are aware of reviews of the effectiveness of interventions that could be socially prescribed but have not been evaluated as part of such a programme. These include, for example, community based exercise programmes⁸, dance movement therapy⁹, music therapy¹⁰, and aquatic exercise¹¹.

Other evidence sources

Given the quality and quantity of evidence from systematic reviews, we also looked at nonsystematic reviews and evaluations of social prescribing initiatives.

A literature review and qualitative assessment of social prescribing for Bristol CCG primarily identified qualitative studies and very little formal research into impact.¹² Neither the initial report nor a subsequent paper provide any methodological details of the review so we cannot comment on the reliability of the findings.¹³ The review found no clear agreement about the definition of social prescribing but some evidence that some specific social prescription interventions can have a positive impact on people's lives. These included exercise programmes such as: gym-based activity; guided/health walks; green activity; cycling; swimming and aqua-therapy; team sports; and exercise and dance classes. Robust evidence was found to support the mental health benefits of physical activity for clinical and non-clinical populations. However what works to increase the uptake of exercise was less clear.

A non-systematic review looking at arts on prescription, found evidence to support the idea that active involvement in creative activities can promote well-being, quality of life and health.¹⁴ Evidence exists for the benefit of arts interventions but not in relation to social prescribing.¹⁵ The authors of this review identified numerous small scale evaluations via project websites and contact with providers. Where empirical work was identified the report gives a number of examples and concludes that the findings were positive and researchers enthusiastic about the role of Arts on Prescription.

A review of reviews found evidence of the efficacy and effectiveness of a number of interventions for addressing depression and anxiety disorders at primary care level.¹⁶ The included reviews looked at interventions that could potentially be part of a social prescribing programme, but the evaluations were not undertaken in that context. The interventions included guided self-help, Cognitive Behaviour Therapy (CBT), computerised CBT and structured group physical activity programmes.

A number of bodies have published reports that describe social prescribing interventions and briefly mention evaluations of specific projects.^{1-3, 17, 18} These evaluations all appear to be limited by poor design and or reporting, making it difficult to adequately assess the impact, effectiveness or reflect the costs involved in the programmes evaluated. Many of the reports also refer to the same or similar examples, producing a momentum for social prescribing that does not appear to be supported by robust research evidence of effect.

From the reports identified, Table 1 includes details of a selection of those where more formal, validated evaluation methods have been used. These examples all demonstrate the problems of evaluating complex interventions. Although they all look at data before and after the introduction of social prescribing, the lack of a control introduces a high risk of bias. There are a number of considerations in interpreting the findings of these evaluations. These include: the use of proxy outcomes (e.g. patient well-being; reduction in unplanned admissions); whether validated tools have been used and if so have they been used as intended; the necessary and appropriate use of

assumptions and their validity (e.g. in SROI models); whether steps have been taken to mitigate the effects of potential confounding factors.

Small scale pilot evaluations can only ever give tentative indications of effect. Despite this, rigorous conduct and transparent reporting are essential. Missing information in reports makes it difficult to assess who received what, for what duration with what effect and at what cost. Evaluations of this type therefore only represent a starting point and need to be corroborated by further explanation and larger scale comparative evaluation.

There is no NICE guidance on social prescribing but some of their published guidelines include recommendations for interventions that could be used in a social prescribing programme. For example in the NICE Depression: Evidence Update April 2012 found some additional support for the existing recommendation for physical activities programmes.¹⁹⁻²¹

A comprehensive "Building Capabilities" scoping study provides a detailed overview of the evidence base around capability building, support mechanisms, and the transformations underway in the field of capacity building and infrastructure of front line voluntary organisations. The report highlights the complexities of capability building and the lack of evidence to support the development of the voluntary sector.²²

Cost effectiveness

We found one RCT that assessed the cost effectiveness of a social prescribing project based around 26 primary care surgeries in Avon.²³ The researchers worked with 90 patients who were referred to a voluntary organisation to manage their access onto a social prescribing project. Referral resulted in clinically important benefits compared with usual general practitioner care in managing psychosocial problems; but at a higher cost. Beneficiaries of the project were seen to be less depressed and less anxious but their care was more costly compared with routine care and their contact with primary care was not reduced. However this study did not look at the long term savings or compare the costs with referral to a specialist and secondary care.

No other more recent evidence evaluating the cost effectiveness of social prescribing schemes was identified.

Implications

There is little in the way of supporting evidence of effect to inform the commissioning of a social prescribing programme. What evidence there is tends to briefly describe the evaluation of small scale pilot projects but fails to provide sufficient detail to judge either success or value for money. Evidence on the cost effectiveness of social prescribing schemes is lacking.

There may be evidence for interventions of interest but that have yet to be evaluated as part of a social prescribing programme.

Given the lack of evidence, consideration needs to be given to the evaluation of new schemes. If we are to improve existing knowledge, these should be comparative by design and seek to address when, for whom and how well does the scheme work? What effects does it have? What does it cost? Rigorous conduct and transparent reporting are essential.

Initiative	Intervention and delivery	How was it evaluated?	Quality of evidence
Measuring the economic impact of Wellspring Healthy Living Centre's Social Prescribing Wellbeing Programme for low level mental health issues encountered by GP services. ²⁴ Predominantly funded by Henry Smith and Tudor Trust since 2010. www.wellspringhlc. org/	 GP-referred patients are offered 12 weeks of one to one support followed by 12 months of group support around a particular activity. 1 to1 intervention: key-worker helps set and supports achieving wellbeing goals through tailored interventions such as peer-support groups, creative arts, physical activities, cooking courses or complementary therapies. Follow up peer-support groups offer weekly get-togethers for social contact and mutual support to help build resilience, personal responsibility. Each week the group focusses on an agreed activity such as crafts and arts, relaxation techniques, healthy eating and cooking, gift making etc. to support mental wellbeing. 128 patients took part in the scheme between May 2012 and April 2013. 	 Independent evaluation commissioned. Evaluation/data collection methods: Focus groups to define social prescribing. Reviews of GP attendance and prescription data 12 months before and 12 months after their referral to the programme (n=40) (linked to WWQ tool results at individual level). Social return on investment (SROI) method used to measure extra-financial value relative to resources invested. Initial scoping existing research ID key stakeholders – interviews (n=24) and focus groups (n=24 patients) to find outcomes for impact map Prospectively measured outcomes identified The following scales were used pre and post participation in the scheme: The Wellspring Wellbeing Questionnaire (WWQ) to assess benefits of outcomes identified in terms suitable for the commissioners using: PHQ9 and GAD7 tools to assess depression and anxiety ONS's Well-being Index/ Integrated Household Survey (IHS) (6 questions) International Physical Activity Questionnaires (IPAQ) UK's Family Expenditure Survey (1 question only) WWQ administered at baseline (128 completed) and at 3 months (70 completed) + 1 to1 interview option (n=40). Findings used to inform SROI. 	Uncontrolled before and after – high risk of bias Evaluation identified outcomes and used range of appropriate methods to collect data for each. WWQ used selected questions from two validated instruments: may render findings invalid in the format used. Some demographic details reported but other characteristics of patients missing. No details of reason for referral but baseline assessments for anxiety and depression taken. Inferences used for SROI calculation of cost effectiveness clearly stated; some extrapolated from a small number of patients.

Initiative	Intervention and delivery	How was it evaluated?	Quality of evidence
The social and	Two year pilot: 5% most intensive users of health services (and carers) were referred on for case management and social prescribing interventions	Independent evaluation commissioned.	Uncontrolled before and after - high risk of bias.
of the Rotherham Social Prescribing		Analyses of subsets of those referred: 12 month cohort (n=108) and six month cohort (n=451).	Small cohort and short follow up time prevent detection of any significant changes.
Pilot: Main Evaluation Report. ²⁵ Commissioned by NHS Rotherham. Originally funded April 2012 to March 2014 www.varotherham. org.uk/social- prescribing-service/	 1,607 patients were referred from 29 GP practices to the social prescribing service and from there 1,118 were referred to 24 funded voluntary and community sector (VCS) serviced delivering 31 separate social prescribing services). In parallel, 200 referrals were made to nonfunded VCS provision and 300 to statutory services. Majority of patients were elderly: 87% >60; 75% > 70; 10% >90. Most common referrals were for: information and advice: community activity: physical 	 Evaluation/data collection methods: Analysis of patient management and monitoring data Analysis of hospital episodes data for a cohort of referred patients Interviews with public sector stakeholders, project staff, and those delivering services Case studies involving service beneficiaries Online survey of funded VCS providers SROI analysis A tool was specifically developed for the service and used pre and post participation in the scheme to 	Characteristics of patients included in analyses not reported. Not clear which interventions were received by patients or how many. Referral data presented but not the conditions of those referred nor actual 'take up'. Effects of case management not accounted for in analysis. Case studies were well constructed and clearly reported. SROI analysis reported in detail, including the assumptions and inferences made.
	activities; befriending; and enabling.	measure patient well-being.	the well-being scale is: tool not validated.
Arts on Prescription in Sefton Programme Report 2009. ²⁶ Founded in Nov 2006 by Sefton MBC & NHS Sefton www. creativealternatives. org.uk/	An 'arts on prescription' programme that offers a range of creative activities to those experiencing mild to moderate depression, stress or anxiety. Activities included: arts and crafts core workshops (six months); specialist workshops in creative writing, cooking, gardening, photography and walking the labyrinth (run over 8-10 weeks); events and outings; and exhibitions and public artwork. Total capacity of 72 patients per year. At July 2009 - 355 individuals were 'referred' to the programme, 187 of whom have been assessed and have been accepted onto the programme. In addition to depression and anxiety many patients report other mental health diagnoses, such as obsessive compulsive disorder, as well as physical health problems, alcohol addiction and serious difficulties in their social and family relationships.	 Evaluation undertaken by the Principal Arts Development Officer, responsible for the programme. Evaluation/data collection methods: All patient support via telephone and in person is tracked to capture essential information/patient feedback Artist workshop diaries Mood maps to identify changes in mood and stress pre and post workshop events Open-ended review questionnaire and Lifestyle questionnaire administered by post Open-ended follow-up questionnaires The HAD (Hosptial Anxiety and Depression) scale and COOP chart (a measure of functional status), completed in the presence of the Referral Officer, were used pre and post participation in the scheme (n=64). 	Uncontrolled before and after - high risk of bias. Use of validated HAD scale and COOP chart appropriate. Supplemented with a lifestyle questionnaire devised locally specifically for the programme – not validated. Data reported appropriately. Patient demographics and additional issues reported. Data from Mood maps and workshop diaries fully reported. Overall clear reporting of each of the different measures.

Initiative	Intervention and delivery	How was it evaluated?	Quality of evidence
Evaluation of Dundee Equally Well Sources of Support: Social Prescribing in Maryfield Evaluation Report Four. ²⁷ Original scheme ran from March 2011 for 4 months, extended to June 2012. Funded within existing resources. www.understanding glasgow.com/asset_ based_approaches/ stobswellbeing	Open to referrals from GPs and Health Visitors. Link workers then contact the patient to arrange an initial consultation, followed by up to three further consultations, depending on complexity of social and support needs and levels of distress. 123 referrals. The scheme accepts patients with poor mental wellbeing, mild to moderate depression and anxiety, long term physical/ mental conditions, and/or frequent attenders in primary care. People experiencing acute episodes of psychosis and people with primary issues of drug or alcohol misuse are excluded. Depending on patient need, link workers facilitate access to a range of local sources of support, activities and opportunities in the community.	 Evaluation was carried out independently. Framework for evaluation was based on a Contribution Analysis theory of change. Evaluation/data collection methods: Data from GP prescriptions (patient demography and reasons for referral) (N=123) Pre and post intervention measures completed by patients (N=16) Link worker notes and reflections Interviews with a purposive sample of patients who had completed the scheme (N=12) Semi-structured face to face interviews with GPs (N=2) and link workers (N=3) The following scales were used pre and post participation in the scheme: WEMWBS – to assess positive mental wellbeing WSAS - to assess functional impairment 	Uncontrolled before and after - high risk of bias. Referral and engagement data given in detail but no information about patient condition characteristics to relate data to specific activity participation/non-participation. No data from the WEMWBS (Warwick and Edinburgh Mental Wellbeing Scale) or WSAS (Work and Social Assessment Scale) is presented. Detailed reporting of qualitative data. (This is one of a series of reports on the Equally Well project by the same authors.)
Social prescription and the role of participatory arts programmes for older people with sensory impairments. ²⁸ Service commissioned by Voluntary Action Rotherham in 2011/12 www.sense.org.uk/	A social prescribing service for older people with sensory impairments experiencing social isolation. A 12-week programme run by Sense, a voluntary sector organisation. GPs given a multi-sensory awareness event and training toolkit, then able to refer to project coordinator (PC). PC initiates personalised recruitment process (inc. transport and communications needs). Practical art and craft workshop programme delivered (no specific details provided). 12 patients with hearing and/or visual impairment and other age related issues were specifically identified for the project. Average patient age >80.	 Evaluation undertaken by members of Sense. Mixed-methods approach: Evaluation/data collection methods: Semi-structured interviews with arts facilitators, support staff and resource centre manager Case studies constructed – including input from others such as family members The following scales were used pre and post participation in the scheme: Dynamic Observation scale - extended version developed (data collected every three weeks) WEMWBS (completed at first and last sessions) 	Uncontrolled before and after - high risk of bias. No details of actual intervention. Validated instruments used but amended. Narrative reporting of outcomes not supported by provision of data. No information about how input from family members was gathered. Not all data collected for all 12 patients: methods designed for triangulation and contextualisation but given lack of details provided on co-existing health and other factors and the interventions delivered unable to verify reliability of results. Conflict of interest is clearly stated.

References

1. Department of Health, White paper. Our health, our care, our say: a new direction for community services Crown Copyright; January 2006.

2. Horne M, Khan H, Corrigan P. Health for people, by people and with people. Part of the Nesta People Powered Health series. http://www.nesta.org.uk./publications/health-people-people-and-people: April 2013.

3. Langford K, Baeck P, Hampson M. More than Medicine: New services for people powered health. Part of the Nesta People Powered Health series. http://www.nesta.org.uk./publications/more-medicine-new-services-people-powered-health: November 2013.

4. Dyson B. Improving general practice: a call to action. Phase one report. NHS England. http://www.england.nhs.uk/ ourwork/qual-clin-lead/calltoaction/igp-cta/ph-one-report/ March 2014.

5. Pavey TG, Taylor AH, Fox KR, Hillsdon M, Anokye N, Campbell JL, et al. Effect of exercise referral schemes in primary care on physical activity and improving health outcomes: systematic review and meta-analysis BMJ. 2011;343:d6462:http://www.crd.york.ac.uk/CRDWeb/ShowRecord.asp?AccessionNumber=12011006829.

6. Washburn RA, Lambourne K, Szabo AN, Herrmann SD, Honas JJ, Donnelly JE. Does increased prescribed exercise alter non-exercise physical activity/energy expenditure in healthy adults? A systematic review. Clinical obesity. 2013;4: 1-20.

7. Orrow G, Kinmonth AL, Sanderson S, Sutton S. Effectiveness of physical activity promotion based in primary care: systematic review and meta-analysis of randomised controlled trials. . BMJ. 2012;344:e1389

8. Desveaux L, Beauchamp M, Goldstein R, Brooks D. Community-based exercise programs as a strategy to optimize function in chronic disease: a systematic review. Medical Care. 2014;52(3):216-26.

9. Koch S, Kunz T, Lykou S, Cruz R. Effects of dance movement therapy and dance on health-related psychological outcomes: a meta-analysis. Arts in Psychotherapy. 2014;41(1):46-64.

10. Lee J, Thyer BA. Does Music Therapy Improve Mental Health in Adults? A Review. Journal of Human Behavior in the Social Environment. 2013;23:591–603.

11. Barker AL, Talevski J, Morello RT, Brand CA, Rahmann AE, Urquhart DM. Effectiveness of aquatic exercise for musculoskeletal conditions: a meta-analysis. Archives of Physical Medicine and Rehabilitation. 2014;95(9):1776-86.

12. Kimberlee RH. Developing a Social Prescribing approach for Bristol. Bristol Health and Well-being Board. https://www.bristol.gov.uk/committee/2013/ot/ot049/11287.pdf October 2013.

13. Kimberlee R. What is social prescribing? Advances in Social Sciences Research Journal. 2015;2(1).

14. Bungay H, Clift S. Arts on Prescription: A review of practice in the UK. Perspectives in Public Health 2010;130(6):277-81.

15. Blomdahl C, Gunnarsson AB, Guregard S, Bjorklund A. A realist review of art therapy for clients with depression. Arts in Psychotherapy. 2013;40(3):322-30.

16. Bunting B BL, Ferry F, Fullerton D, O'Neill S, MacAuley D, McCormack, B, McKenna H, Mulholland C, Ryan A. Rapid Review of Mental Health in Primary Care. HSC Research & Development Division Public Health Agency, Northern Ireland: 2011.

17. Age Concern Yorkshire and Humber. Social Prescribing. A model for partnership working between primary care and the voluntary sector. http://www.ageuk.org.uk/Documents/EN-GB/For-professionals/Health-and-wellbeing/Social_Prescribing_Report.pdf?dtrk=true 2012.

18. Scottish Development Centre for Mental Health. Developing Social Prescribing and Community Referrals for Mental Health in Scotland. http://www.scotland.gov.uk/Resource/Doc/924/0054752.pdf: Nov 2007.

19. NICE Evidence Update 13 – Depression (April 2012) https://www.evidence.nhs.uk/evidence-update-13

20. NICE guidelines [CG90] Depression in adults: The treatment and management of depression in adults. October 2009. http://www.nice.org.uk/guidance/cg90/chapter/1-guidance

21. Krogh J, Nordentoft M, Sterne JAC, Lawlor DA. The effect of exercise in clinically depressed adults: systematic review and meta-analysis of randomized controlled trials. Journal of Clinical Psychiatry. 2011;72:529-38.

22. Macmillan R, Paine AE, Kara H, Dayson C, Sanderson E, P. W. Building Capabilities in the Voluntary Sector: What the evidence tells us. Research Report 125. Third Sector Research Centre, Sheffield Hallam University: September 2014.

23. Grant C, Goodenough T, Harvey I, Hine C. A randomized controlled trial and economic evaluation of a referrals facilitator between primary care and the voluntary sector. BMJ. 2000;320:419-23.

24. Kimberlee R, Ward R, Jones m, Powell J. Measuring the economic impact of Wellspring Healthy Living Centre's Social Prescribing Wellbeing Programme for low level mental health issues encountered by GP services. University of the West of England, Bristol: March 2014.

25. Dayson C BN. The social and economic impact of the Rotherham Social Perscribing Pilot: Main Evaluation Report. Centre for Regional Economic and Social Research, Sheffield Hallam University: September 2014.

26. Sefton MBC & NHS Sefton. Arts on Prescription in Sefton. Programme Report 2009. http://www.artsforhealth.org/ resources/CA%20Report%202009.pdf.

27. Friedli L, Themessl-Huber M, Butchart M. Evaluation of Dundee Equally Well Sources of Support: Social Prescribing in Maryfield Evaluation Report Four. September 2012.

28. Vogelpoel N, Jarrold K. Social prescription and the role of participatory arts programmes for older people with sensory impairments. Journal of Integrated Care. 2014;22(2):39-50.