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Can narrative medicine education contribute to the delivery of compassionate care? A review of the literature

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INTRODUCTION

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Narrative Medicine has emerged as a discipline from within the medical humanities¹ and takes inspiration from philosophy, literature, poetry, art and social sciences theories. In particular, it is underpinned by philosophical approaches such as phenomenology, postmodernism and narratology, proposing that clinicians must attend to the lived experience of their patients and apply the science to the person.² Meanwhile, the link between medicine and literature is evident in the growing volume of texts written about professionals', or lay people's experiences of illness and disease.3-8 In exploring this link further, Charon has contributed greatly to consolidate the theory of Narrative Medicine. She defines it as 'medicine practiced with the narrative competencies to recognise, absorb, interpret and be moved by the stories of illness'. She suggests that, in exploring texts and reading them closely, one finds the tools of language such as metaphor, plot, character and temporality. She suggests that learning such skills enables clinicians to recognise that same language when it appears in clinical interaction practice. This 'narrative competence' can be fostered through education initiatives that particularly explore literature, creative and reflective writing, storytelling and poetry.

As Lewis² explains, the question is about what kind of healthcare we want to deliver. Those who practise Narrative Medicine suggest that the adoption of this approach may help marry the art and science, thus improving quality in delivering a more person-centred type of care.² 10 With its emphasis on the patient experience, Narrative Medicine complements the current dominance of productivity, efficiency and evidence-based care. Similarly, Narrative Medicine contributes to attempts to go beyond the positivist dominance in healthcare that threatens quality of care, as science alone cannot help us to understand the unpredictability and frailty of people. 11–13 To secure support for Narrative Medicine education, there is a need for evidence to prove that it is indeed effective. Therefore, this literature review aimed to determine whether education in Narrative Medicine might result in more compassionate care (bearing witness and care to others' pain and suffering) for adults in need of healthcare.

METHODOLOGY AND METHODS

A literature review, as a type of secondary research, is a way of critically, systematically and synthetically obtaining an overall picture of a topic or issues

based on a set of primary research evidence. For example, this literature review aimed to examine whether education in Narrative Medicine might result in more compassionate care for adults in need of healthcare. Thus, the main steps followed to complete this literature review are discussed.

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Scope

The search of the literature for this review began with a broad reading around Narrative Medicine to achieve a good understanding of the theory and its suggested application in practice. The Cochrane and the evidence for policy and practice information and coordinating centre databases were searched, and it was found that no systematic reviews had previously been undertaken on the subject. Some literature reviews addressing the effectiveness of humanities in medical education were found but these did not explicitly explore Narrative Medicine. This is one of the first reviews to relate Narrative Medicine with compassionate care.

A systematic literature search was then performed using the databases of Sage publications, EBSCOhost and the Greenwich University library catalogue. Search terms were informed by the prior reading and included the following: Narrative Medicine and, in turn, creative writing or reflective writing or poetry or storytelling. The words 'medical education', 'evaluation' and 'study' were also used until saturation was reached and no new articles emerged. The search was limited to English language items published between 2000 and 2015 to ensure that up-to-date sources were obtained. Reference lists of identified material were also checked and a key author search was performed. This primary search identified 20 possible sources.

Inclusion and exclusion criteria

- ▶ Primary studies that demonstrated explicitly an attempt to evaluate an educational initiative related to Narrative Medicine. This could include a specific Narrative Medicine course or a creative and/or reflective writing initiative, including poetry.
- Studies targeted at clinicians and related to adult care only.
- ▶ Studies published after 2000.
- ▶ Studies that took the form of opinion or commentary pieces were excluded, as was grey literature or unpublished work.
- Other arts-based medical education such as film, photography, drama or theatre were excluded, as were any sources with no obvious educational element and any relating to children.

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Box 1 Studies appraised by this review

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Quantitative study
1. Tsai and Ho¹⁶

Combined quantitative and qualitative studies

- 2. Shapiro et al¹⁹
- 3. Misra-Hebert et al²⁰
- 4. Lancaster *et al*²²

Qualitative studies

- 5. Clandinin and Cave²⁴
- 6. Lazarus and Rosslyn²⁸
- 7. Arntfield et al²⁶
- 8. Gull et al²⁹
- 9. DasGupta and Charon²⁷

Nine studies were selected; one was quantitative, three combined quantitative and qualitative research and five were qualitative (box 1). The majority of the studies focused on medical students at different stages in their training as part of medical humanities education. There were three studies involving qualified physicians; however, there were none involving nurses or other members of the healthcare team as recommended in the literature. The majority of the research was from North America, but two studies were from the UK and one was from Taiwan, suggesting a wider appeal of Narrative Medicine than exclusively North America, although it remains limited at a global level. 12 All the studies demonstrated positive outcomes associated with a Narrative Medicine intervention at a small scale and none included a patient-reported outcome measure. Each study was appraised using tools and guidance designed by the evidence for policy and practice information and coordinating centre¹⁴ and the critical appraisal skills programme.¹⁵

RESULTS AND ANALYSIS Quantitative study

In a quantitative study, Tsai and Ho¹⁶ used a quasi-experimental design to examine whether Narrative Medicine could enhance clinical performance as measured by objective, structured, clinical examination (OSCE). While this design lends itself to the comparison of a randomly selected intervention group with a case-matched control, this study did not employ a preintervention OSCE measurement in either group which might have strengthened the approach.¹⁷ A t-test of significance was conducted, which is suitable for a small sample with groups of unequal sizes.¹⁸ The results showed that the case group performed better on the two communication stations (p=0.03), but there was no difference across the 12 stations when taken as a whole (p=0.24). Tsai and Ho¹⁶ demonstrated that Narrative Medicine can improve performance in terms of communication and, critically, this is one of the few studies to have demonstrated an objective behavioural outcome. There are, however, significant limitations and questions regarding rigour, not least because the study is relatively brief. There is no explanation of volunteer recruitment, ethical approval and consent process or why a quasi-experimental design was chosen. Neither do the authors provide any details on how the training course was facilitated and by whom. There are no tables detailing the rating items or questions for the OSCE scores; hence, there is minimal ability to appraise the findings as reported. Adding a qualitative measure to the study might have increased the validity of the findings, incorporating students' experiences through an analysis of their narrative accounts. The authors recommend further studies to assess the impact of Narrative Medicine education on patient-reported outcomes and, on the basis of this study, plan to expand their training.

Combined quantitative and qualitative studies

In a combined study, Shapiro et al¹⁹ mixed qualitative analysis of subjective, objective, assessment and plan notes (SOAP) with a quantitative analysis of OSCE outcomes. In contrast to Tsai and Ho, 16 they measured learning rather than a behavioural outcome in the OSCEs. They used a five-point Likert scale response to one question concerning empathy and another addressing the impact on treatment plans. Likert scales are methods of ascertaining attitudes in research and they require 10-15 statements to be robust. 17 Meanwhile, Shapiro et al 19 used only two statements, which is a significant limitation. Rather than t-test analysis, they use a non-parametric exact test (Wilcoxon signed rank test), which is also appropriate for a small sample but more appropriate where distribution is nonnormal.¹⁷ This was also favoured by Misra-Hebert et al²⁰ in their analysis of empathy scores. The qualitative analysis appears robust with clear thematic analysis conducted and validated by both researchers. They were able to demonstrate statistical significance and suggested improved empathy from the SOAP notes analysis. However, the results must be interpreted with caution as their sample size was reduced by a change to the course set up during the study years. This prevented them from implementing the humanities education for the first half of the year in 2002-2003. The study was further limited by the absence of any control group and the lack of a long-term follow-up to measure any sustained impact. The results cannot be generalised beyond this particular medical school but are certainly transferrable. However, this research does seem to demonstrate an impact of a feasible amount of Narrative Medicine education on students' ability to empathise and plan care. Additionally, the study is well written with details and data presented in tables and appendices, thus allowing transparency in all aspects of the study. The authors sought appropriate ethics approval and acknowledged their funding source.

In their study, Misra-Hebert et al^{20} applied the Jefferson scale of empathy (ISE) to 40 physicians pre-Narrative Medicine, intra-Narrative Medicine and post-Narrative Medicine education. This is a validated 20-item scale designed to assess empathy in medical students.²¹ It has been extensively tested and is therefore considered an appropriate tool for this study. The non-parametric method of statistical analysis suits the small sample and the findings showed significantly increased scores on the JSE in the intervention group but not in either of the control groups (p=0.02). However, this must be interpreted with caution as it is plausible that the JSE scores may have improved purely as a result of peer support from the Narrative Medicine group sessions. Credible qualitative analysis was made using a grounded theory approach involving a comprehensive iterative analysis and coding system of the reflective writings by all three researchers. The participants received CPD accreditation. It is a small sample (n=40) within one institution and cannot therefore be generalised but instead potentially transferrable to other contexts as is the case with qualitative research. More significant results might be generated by a larger sample, making differences between the intervention group and the controls more apparent. The study is transparent with tables and appendices showing the data, coding form and details of reflective sessions offered. However, the authors do not express their

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personal interest in Narrative Medicine nor do they state in what way they are qualified to facilitate reflective writing sessions. Although ethics approval was granted, the authors do not specifically indicate that consent was sought from participants to publish extracts of their writing within the paper.

In another study, Lancaster et al²² used a nominal group technique to evaluate a special study module (SSM) for medical students in literature and medicine. This is a robust method of evaluation involving group decision-making in social research.²³ Although labour-intensive, this method increases the validity, as it has both quantitative and qualitative elements. However, the study is small with a self-selected sample of five cases. The use of ranking in the evaluation process results in an average view as opposed to a consensus, which limits the findings. In a similar way to the other studies involving modules for medical students, this study relates to a short intervention with no long-term follow-up or ability to demonstrate a behavioural outcome in students. The university clearly benefited from having a visiting lecturer with comprehensive experience of teaching Narrative Medicine. This raises feasibility issues for anyone seeking to replicate such an initiative and is likely to have favoured a more positive evaluation by the students. This study is unique in making specific mention of social theoretical perspectives that relate to Narrative Medicine and the potential to include this in future module design. The article includes comprehensive tabular information about the evaluation process and themes, thus affording transparency, although the authors do not make specific reference to their personal interest in Narrative Medicine.

Qualitative studies

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319 320 In a qualitative study, Clandinin and Cave²⁴ used parallel reflective charts in their study with four medical students. This approach is advocated by Charon⁹ as a powerful reflective tool for promoting Narrative Medicine. They describe and analyse one parallel chart using narrative methodology to demonstrate the outcomes of the study. Narrative research is rooted in contemporary humanism and suits the analysis of individual case studies such as this.²⁵ Throughout the analysis, reference is made to the parallel chart and the dialogue from the discussion as evidence of the findings—many examples are quoted in an attempt to validate themes. The authors suggest that Narrative Medicine education for doctors facilitates reflection in practice and helps them develop their own professional identity, thus contributing to their personal growth. The study contains a small sample size and the researchers interpreted their data by 'close reading'. The researchers are keen to promote narrative inquiry and are themselves skilled in narrative reflective practice, thus demonstrating the traditions in qualitative research of acknowledging and accepting that bias can exist. They make specific reference to supporting doctors with regard to the ethical concerns raised by the Narrative Medicine process. This is important and reflects the findings of other studies reporting the need for small groups well facilitated by skilled educators. 26 27

In their study, Lazarus and Rosslyn²⁸ evaluated a SSM where a significant component was devoted to poetry and literature and students were required to keep reflective journals. This is the study in which there was an unusual emphasis on strengthening students' 'knowledge and understanding of people's experiences and emotions' when they are ill.²⁸ In the first year, evaluation was conducted by group discussion which was used to develop a five-point Likert scale questionnaire for the second year (but with only five statements). However, the small number of evaluations in the second year (n=10) meant that no

statistical analysis was possible, suggesting that the development of a Likert scale during the first year was an oversight as the small numbers would have been known in advance. Instead, the authors interpreted their data qualitatively by using a thematic analysis. The authors clearly state their interest and previous experience in relevant Narrative Medicine education and acknowledge a grant from the university with which to fund the project. No ethical approval is mentioned nor is there evidence of explicit consent from the students to include excerpts from their contributions in the paper. There is a clear recommendation, however, for long-term follow-up of educational initiatives like these and the measurement of actual rather than potential impact in clinical practice.

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In the meantime, Arntfield et al^{26} thoroughly evaluated a Narrative Medicine module for fourth-year medical students. The module was facilitated by lecturers experienced in Narrative Medicine and 12 students participated. The lectures included close reading of literature, reflective writing exercises and discussion within small groups. The authors evaluated the intervention using grounded theory involving an initial anonymous survey followed by a focus group. They used the emergent themes to develop a 'concept map', which is in keeping with a grounded theory approach in generating new concepts and theories from the data.¹⁷ They uniquely attempted some long-term follow-up using an email survey, although the response rate was low at 25%. They used an iterative thematic analysis of all the data together, coding independently and then collectively returning to the raw data to resolve any discrepancies. They increased the validity by using triangulation, returning to transcripts and notes taken during the groups. Uniquely, they explicitly identified the need to overcome a perceived counterculture. For example, Narrative Medicine was considered 'fluffy' and non-essential by peers, yet those who undertook the course unanimously believed that Narrative Medicine training would make them better doctors. The findings are consistent with the evidence of the benefits of Narrative Medicine education, corroborated in this literature review. The study accomplishes sound ethical considerations mentioned throughout the paper, including participants' consent, ethics approval and confidentiality within the group discussions. Funding is also acknowledged. The authors highlight the need to measure actual rather than perceived changes in attitude and behaviour but suggest that the appetite for this will depend on the extent to which Narrative Medicine education is incorporated into curricula.

In another study, Gull et al²⁹ conducted a pilot study evaluating creative writing workshops with hospital staff in the UK. They freely admit that they had no experience of delivering such an initiative but were seeking a more creative approach to teach medical students in future. Thus, a participant observation methodology is suitable for gaining insights into the first-hand experience. 18 Uniquely, the participants were interdisciplinary, which the authors reported as a strength in their findings, echoing Charon's claim that Narrative Medicine fosters community and understanding of others. Interestingly, the most favoured workshop concerned expressions of illness and death in which the authors noted much self-reflection. Rather than seeing this as a strength, they report that it is something to be cautious of in future initiatives, citing the difficulties of managing emotions raised by Narrative Medicine methods. They warn against too much reflection within the process, even though this was highly valued in their findings.²⁷ They conceded some difficulties in managing a relatively large mixed group, stating the need to revisit initial ground rules to help manage this. The researchers achieved some soundness in their results by having participated in, recorded, discussed and coded their themes; furthermore, the participants viewed their paper and were able to make comments and modifications prior to finalisation. There is no clear mention of whether ethics approval was sought or any funding allocated. As a result, the main lesson learnt here is that Narrative Medicine initiatives are enjoyable but must be well planned and carefully implemented.

Finally, DasGupta and Charon²⁷ evaluated six reflective writing seminars undertaken with second-year medical students. The seminars were facilitated by DasGupta and evaluation was by questionnaire after the last seminar. No specific methodology is stated but a robust iterative thematic analysis was undertaken by the authors. Once again, the seminars were well received, a now common thread across most studies. Both positive and negative themes emerged in the analysis, for example, words such as 'enlightened', 'relief' and 'healing' and also 'embarrassing', 'confusion' and 'vulnerability'. Most reported a perceived enhanced empathy, having gained insights from both patients and their own experience shared within the group. The sessions were recommended as part of the curriculum but within small safe groups, which is another recurrent finding in the literature. The study's size comprised n=11 questionnaires. Additionally, there was an increased response rate in the second year. Of note, all the participants were women although, in mitigation, the authors report that findings from other comparable seminars involving both genders have reported similar outcomes. Ethical considerations are emphasised in respect of ground rules and confidentiality afforded to participants in the groups, but there is no mention of consent to include quotes from their evaluations.

Thematic analysis

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Four key themes emerged from the literature reviewed here and were consistently reported among the findings and discussion of the studies. They also reflect the broader literature on Narrative Medicine and its potential for developing a more personcentred approach to healthcare.

Communication

Communication is used here as an umbrella term for the findings, indicating an ability to attend, represent and affiliate with patients.³⁰ Predominantly, this was reported in the studies in terms of empathy which, it is argued, is enhanced by Narrative Medicine education.³ For example, Lancaster et al²² found that students reported increased empathy as the most valuable aspect of studying literature. In a similar way, Arntfield et al²⁶ found that students overwhelmingly reported enhanced communication characterised by empathic skills such as listening and valuing different perspectives or worldviews. Although the qualitative studies gave rich examples of how this was reported by participants in terms of narrative, objective measurements are also demonstrated by Tsai and Ho¹⁶ and Misra-Hebert et al²⁰ in the outcomes of the OSCE and JSE scores, respectively. While empathy was most powerfully demonstrated in those studies that included narrative reflective writing, even the studies with less intense Narrative Medicine education showed a positive impact on empathy and communication, for example, Shapiro et al. 15

Personal and professional growth

Every study included in this review reported on personal growth as a positive outcome of the study intervention. This was embodied by an ability to become conscious of thoughts, feelings and possible prejudices through the Narrative Medicine education processes. Professional growth also demonstrated an ability to show a greater understanding of peers fostering the

sense of 'community' suggested by Charon.³⁰ Once again, the studies that included reflective writing seemed to demonstrate the more profound effect on personal growth, thus supporting the argument that it is the writing of experiences that fosters the greatest impact.²⁷ ³¹ In writing about personal experiences of illness or case studies, participants reported greater awareness of their own humanity as well as that of their patients. This 'personal knowledge' development reveals the two-way relationship between clinician and patient, with each affecting the other. Such a skill is said to be fostered by Narrative Medicine education, promoting more compassionate care (bearing witness to others' pain and suffering) and job satisfaction.³² ³³

Pleasure

All but one study reported some aspect of pleasure as an outcome of the intervention. This included simple enjoyment, stress relief and a break from science curricula or heavy workloads. In the interventions with medical students, there was an overwhelming recommendation for the course, often with a suggestion that it should be mandatory.²² ²⁵ ²⁸ In the meantime, Gull *et al*²⁹ have hypothesised that the enjoyment of Narrative Medicine may improve self-confidence as writing allows representation of self and others. More broadly, the pleasure theme attests to the ability of Narrative Medicine to foster holistic care and compassion. It is a reminder of the reason for becoming a clinician, thus corroborating the wider supporting literature.⁹ ³⁴ This review suggests that the time afforded to reflect in this way is welcomed by both students and qualified clinicians.

Educational structure

The last theme relates to practical considerations regarding Narrative Medicine content and structure. Participants seemed to value small group sessions facilitated by skilled facilitators experienced in Narrative Medicine. Indeed, Gull $et\ al^{29}$ struggled to manage a larger group, commenting specifically on the need to manage the reflective process carefully. There is a practical ethical consideration here as Narrative Medicine clearly requires personal disclosure and involves potentially difficult or sensitive issues. The feasibility of resourcing such initiatives in both medical schools and clinical practice is questioned by Lancaster $et\ al.^{22}$ This formed part of the argument by Shapiro $et\ al.^{19}$ in favour of using smaller amounts of Narrative Medicine interspersed in the medical student curriculum, although they warn that students may have benefited less as a result of reduced exposure.

CONCLUSION

This literature review has considered whether there is sufficient evidence to demonstrate that Narrative Medicine education results in compassionate care (bearing witness and care to others' pain and suffering) based on nine primary research studies. Although the studies suggest that Narrative Medicine is beneficial, there is insufficient large-scale data to establish a higher clinical value. This is because there is a paucity of evidence demonstrating any behavioural outcomes in terms of follow-ups to individuals trained in Narrative Medicine or their long-term assessment, let alone the impact on patients. Additionally, studies have focused predominantly on medical education and doctors, and there is no representation of nursing or other members of the multidisciplinary health team. This does not reflect Charon's recommendations for the application of Narrative Medicine in an interdisciplinary way to promote collaboration, nor does it reflect the role of nursing in personcentred healthcare.³⁵ In the same way, theory influences how

practitioners choose to conduct and interpret research and provides the foundation on which practice is based.³⁶ Unfortunately, all the studies reviewed lack recognition or a theoretical link detailing the relationship between the research conducted with phenomenology, narratology, critical theory or postmodernism from which Narrative Medicine derives inspiration. Nonetheless, the findings in this review are in keeping with other literature reviews concerning results in humanities-based education: increase communication between doctors and patients, personal growth including self-reflection and enjoyment in learning Narrative Medicine, and the benefit of education in small groups.³⁷ ³⁸

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REFERENCES

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- 1 Halperin EC. Preserving the humanities in medical education. *Med Teach* 2010;32:76–9.
- 2 Lewis BE. Narrative medicine and healthcare reform. J Med Humanit 2011;32:9–20.
- 3 Bolton G. Medicine and literature: writing and reading. *J Eval Clin Pract* 2005:11:171–9.
- 4 Carel H. Illness. Durham, UK: Acumen, 2010.
- 5 Frank A. The wounded storyteller. Chicago: University of Chicago Press, 1995.
- 6 Bauby JD. Diving bell and the butterfly. Vintage International, 1997.
- 7 Guratnam Y. *Death and the migrant*. Bloomsbury Academic, 2013.
- 8 McCourt J. Crushed: my NHS summer. The University of Buckingham Press, 2012.
- 9 Charon R. Narrative medicine: honouring the stories of illness. Oxford University Press. 2006.
- 10 Charon R. Narrative medicine: form, function, and ethics. Ann Intern Med 2001:134:83.
- 11 Gilbert P. The compassionate mind. London: Constable, 2010.
- Moreno-Leguizamon C, Patterson J, Gomez Rivadeneira A. Incorporation of social sciences and humanities in the training of health professionals and practitioners in other ways of knowing. Res Humanit Med Educ 2015;2:18–23.
- 13 Misak CJ. Narrative evidence and evidence-based medicine. J Eval Clin Pract 2010:16:392–7.
- 14 Evidence for Policy and Practice Information and Co-ordinating Centre. Guidelines for the reporting of primary empirical research studies in education. 2015. http:// www.eppi.ioe.ac.uk/
- 15 Critical Skills Appraisal Programme. CASP checklists. Oxford, 2014. http://www.casp-uk.net/
- 16 Tsai SL, Ho MJ. Can narrative medicine training improve OSCE performance? Med Educ 2012;46:1112–13.

- 17 Polit D, Hungler B. Nursing research principles and methods. J.B. Lipincott Company, 1995.
- 18 Denscombe M. The Good Research Guide for small scale social research projects. Open University Press, 1998.
- 19 Shapiro J, Duke A, Boker J, et al. Just a spoonful of humanities makes the medicine go down: introducing literature into a family medicine clerkship. Med Educ 2005;39:605–12.

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- 20 Misra-Hebert AD, Isaacson JH, Kohn M, et al. Improving empathy of physicians through guided reflective writing. Int J Med Educ 2012;3:71–7.
- 21 Hojat M, Mangione S, Nasca TJ, et al. The Jefferson scale of physician empathy: development and preliminary psychometric data. Educ Psychol Meas 2001;61:349–65
- 22 Lancaster T, Hart R, Gardner S. Literature and medicine: evaluating a special study module using the nominal group technique. Med Educ 2002;36:1071–6.
- 23 Harvey N, Holmes CA. Nominal group technique: an effective method for obtaining group consensus. Int J Nurs Pract 2012;18:188–94.
- 24 Clandinin DJ, Cave MT. Creating pedagogical spaces for developing doctor professional identity. *Med Educ* 2008;42:765–70.
- 25 Squire C, Andrews M, Tamboukou M. Introduction: what is narrative research? SAGE, 2013.
- 26 Arntfield SL, Slesar K, Dickson J, et al. Narrative medicine as a means of training medical students toward residency competencies. Patient Educ Couns 2013;91:280–6.
- 27 DasGupta S, Charon R. Personal illness narratives: using reflective writing to teach empathy. Acad Med 2004;79:351–6.
- 28 Lazarus PA, Rosslyn FM. The arts in medicine: setting up and evaluating a new special study module at Leicester Warwick Medical School. *Med Educ* 2003;37:553–9.
- 29 Gull SE, O'Flynn R, Hunter JYL. Creative writing workshops for medical education: learning from a pilot study with hospital staff. *Med Humanit* 2002;28:102–4.
- 30 Charon R. *Narrative medicine: attention, representation, affiliation*. Ohio State University Press, 2005:261–70.
- 31 Wald HS, Reis SP. Beyond the margins: reflective writing and development of reflective capacity in medical education. J Gen Intern Med 2010;25:746–9.
- 32 Holmes V, Gregory D. Writing poetry: a way of knowing nursing. *J Adv Nurs* 1998:28:1191–4
- 33 Levine RB, Kern DE, Wright SM. The impact of prompted narrative writing during internship on reflective practice: a qualitative study. Adv Health Sci Educ Theory Pract 2008:13:723–33.
- 34 Greenhalgh T, Hurwitz B. Narrative based medicine: dialogue and discourse in clinical practice. BMJ Books. 1998.
- 35 Young S. Beyond "Hot Lips" and "Big Nurse": creative writing and nursing. Composition Stud 2005;33:75–91.
- 36 Alderson P. The importance of theories in health care. BMJ 1998;317:1007–10.
- 37 Ousager J, Johannessen H. Humanities in undergraduate medical education: a literature review. Acad Med 2010:85:988–98.
- 38 Perry M, Maffulli N, Willson S, et al. The effectiveness of arts-based interventions in medical education: a literature review. Med Educ 2011;45:141–8.