REVIEW ARTICLE



Historical empathy and medicine: Pathography and empathy in Sophocles' *Philoctetes*

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Abstract

The aim of this article is to explore the ways in which the engagement with Greek tragedy may contribute fruitfully to the unfolding of empathy in medical students and practitioners. To reappraise the general view that classical texts are remote from modern experience because of the long distance between the era they represent and today, I propose an approach to Greek tragedy viewed through the lens of historical empathy, and of the association between past situations and similar contemporary experiences, in particular. After a brief examination of the concept of empathy, its links with literary reading, and the discussion of these interrelations within the training of narrative medicine, and narrative ethics in particular, the focus turns to selected parts of Sophocles' *Philoctetes*, such as the disease scene—an ancient example of pathography. Here Neoptolemus' empathy for Philoctetes' situation and its consequences are explored with specific interest in the modern readers' affective response in connection with their own experiences in medical practice. Neoptolemus' ethical conflict, which is resolved by his decision to care for Philoctetes, and the problematic nature of this attitude are both indicative of the aim of Greek tragedy to problematize universal issues and thus to point towards the instability of human life and the fluidity of human nature. Realizing through historical empathy the precariousness of human existence may lead to a better understanding and hence better care for others and open new perspectives in the development of empathy within the context of contemporary medical education and practice.

Keywords Empathy · Narrative medicine · Narrative ethics · Historical empathy

Introduction

Empathy is a complex notion which has been examined by several disciplines, including psychology, philosophy, neurosciences, and medicine, and thus has received various definitions accordingly.¹ Furthermore, the boundaries between empathy and related concepts, such as theory of mind (ToM), mentalizing, perspective–taking, sympathy, and compassion, are often blurred and there is no unanimous agreement among researchers about their distinctions and subcategories (Singer and Tusche 2009, p. 254; Preckel et al. 2018, pp. 1–2; Yaseen and Foster 2019, pp. 8–9; Guidi and Traversa 2021).² This results to a terminological minefield with more than forty–three different definitions of empathy (Cuff et al. 2016, pp. 146–147, table 1) and with numerous questions yet unanswered. Hence, there is a need for the delineation of the term "empathy" by each author, as Pinotti and Salgaro (2019, pp. 141, 154) and recently Zhou et al. (2021) also remark. A more inclusive working definition, and the one from which the following discussion begins, derives from the approach of empathy in an interdisciplinary context as the ability based on neural networks developed from young age to perceive and share the feelings of others as well as the capacity to understand our own and others' mental states. Thus, empathy is viewed from both its affective and cognitive aspects.

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¹ Pinotti and Salgaro (2019, pp. 141–158), Yaseen and Foster (2019, pp. 3–11) offer recent reviews of the term. Guidi and Traversa (2021) discuss the term "clinical empathy" in the context of the medical practice.

 $^{^2}$ For example, Trieu et al. (2019, pp. 17–35, esp. 17–18), Stietz et al. (2019, pp. 1–8) and Tholen et al. (2020, p. 1) suggest a distinction between the cognitive and emotional aspects of empathy while Cuff et al. (2016, pp. 146–147) and recently Guidi and Traversa (2021) offer accounts of works which include both. For the differences

The association of empathy with prosocial or moral behavior is another much disputed matter among scholars and researchers: recent representative examples for it and against it are the works of Bazalgette (2017) and Bloom (2016) respectively. Brief reviews of this subject are also found, for example, in Singer and Tusche (2009, pp. 253–254), Pinotti and Salgaro (2019, pp. 146–147). Compassion has also received attention from this perspective; defined as the feeling of concern and motivation to help, it is distinguished from empathy as "compassion is feeling *for* and not feeling *with* the other" (Singer and Klimecki 2014, p. R875; Preckel et al. 2018, p. 1). Therefore, compassion-ate responses are based on "other–oriented feelings and the activation of prosocial motivation and behavior" (Singer and Klimecki 2014, p. R878).³

Literary reading and empathy in medicine

The interrelations between reading and empathy have been examined with various empirical studies which indicate the link between the two (Kidd and Castano 2013, reappraised by van Kuijk et al. 2018; Kidd and Castano 2019; Mar and Oatley 2008, p. 182; Djikic et al. 2013, pp. 28-47; Johnson 2012, pp. 150–155).⁴ The surge of neurosciences led to an increase of scholarly attention to the interaction between readers' engagement with fiction and empathetic behavior in real life (Pinotti and Salgaro 2019, p. 145 offer a recent review). Shalev and McCann (2020, pp. 608-609) discuss the overlap of the "narrative comprehension network" with neural networks thought to be involved in theory of mind and conclude that "the neuroscientific literature posits convincingly that empathy is a teachable competency with an identifiable neural signature and suggests that humanistic endeavors-such as engagement in fiction-increase empathy".

Literary critics, particularly those working within the interdisciplinary field of cognitive literary studies, have explored this interrelation from many aspects.⁵ Two of them are of particular interest in the following discussion: "narrative empathy" and "emotional immersion". According to

Keen (2013, Sect. 1), narrative empathy is "the sharing of feeling and perspective–taking induced by reading, viewing, hearing, or imagining narratives of another's situation and condition" (see also Keen 2018, pp. 127–133). Ryan (2015, p. 10) remarks the paradox that the fate of fictional characters can generate emotional reactions to readers with physical symptoms such as crying, even though readers know very well that these characters never existed. For Ryan (2015, p. 9) this is due to the emotional immersion, "the emotional involvement with the fate of the characters".

The link between literature and empathy has also been examined in medical contexts. Narrative medicine is an interdisciplinary approach of medicine and humanities which argues, among others, that the development of narrative competence achieved through the close reading of literary texts promotes empathy and thus practitioners' understanding of their patients and their narratives (representative examples are the works of Charon 2006, 2017a, b; Whitehead 2014; Marini 2016). Even though narrative medicine has been a generally well-received and influential movement, some of its principles, especially the insistence on the training of narratological skills and its relation to empathy, have been questioned (Ahlzén 2019; Neilson 2022; O'Mahony 2013). For example, Ahlzén (2019) concludes that empathy may be affected by reading literature under certain carefully specified circumstances but argues that the "narratological theory apparatus may at times stand in the way for the plot" and specific narrative skills should not be considered a necessary or even contributing condition for the clinicians' interest in stories of illness.⁶ Nevertheless, contemporary health challenges, such as the facts that patients live longer, with more illness complexity and comorbidity than in previous generations (Dosani 2021) and that their narratives are more complex and require further interpretation (Zaharias 2018a, b), increase the physicians' need to be more attentive to meaning-creating processes.⁷ "The norms of narrative competence govern the interaction with the patient in a way sensitive to a whole host of cultural, emotional, and contextualized aspects" (Vannatta and Vannatta 2013, p. 43) and help physicians fully understand the stories of their patients including the implicit meaning of narratives (Kalitzkus and Matthiessen 2009; Vannatta and Vannatta

Footnote 2 (continued)

between empathy and sympathy see Yaseen and Foster (2019, pp. 8–9) and Pinotti and Salgaro (2019, pp. 146–47).

³ Crawford (2021) also remarks that "compassion takes empathy one step further by taking some sort of action to try to help the suffering".
⁴ See also Mc Donald et al. (2015) on the role of the implicit memory in the link between fiction reading and the development of empathy and Fox et al. (2020) on psychological research regarding one's own extended effortful cognitive processing and the shaping of future behavior in the long term.

⁵ A representative example is Zunshine (2006, 2010). For a brief review see Richardson (2015, p. 235).

⁶ Neilson (2022) takes a step further and criticizes the "instrumentality of health humanities pedagogy", followed, among others, by the Charonian Narrative Medicine with particular emphasis on the systematic teaching of close reading in clinical settings as a biomedical technique.

⁷ For example, the patients' medical history, the case studies presented and discussed by doctors, the interpretation of laboratory test results and above all the patients' own description of the ways they experience their illness are various kinds of narratives to which medical practitioners need to respond accordingly.

2013). The engagement with literature leads to an expanded and vicarious experience which is essential to the practice of medicine with empathy (Vannatta and Vannatta 2013; Zaharias 2018a; Scott–Conner and Agarwal 2021). This also facilitates the practitioner to elicit the full exact spectrum of the patient's symptoms and risk factors (Schattner 2012) and thus make more accurate diagnoses.⁸

Representative examples which demonstrate the benefits of narrative competence for medical practitioners are offered in Dosani (2021) who uses close reading in psychiatric practice, Vannatta and Vannatta (2013) who refer to cases of domestic abuse where the reading of related novels makes doctors more sensitive to the "unsaid" evidence for it in the clinic, and Scott-Conner and Agarwal (2021) who in their discussion of narrative medicine training in surgical education emphasize the need for recording a patient's story in the medical record with a language rich in metaphor, found in great literature, which can also contribute to other health care providers' understanding and empathic responses. Schattner (2012) also refers to cases in varied medical settings, where patients' clues and expressions of affect were not acknowledged by physicians, especially in primary care where the motivation of many visits are psychosocial problems which need to be addressed, and proposes that narrative competence is essential to the effective practice of empathic medicine.⁹ Therefore, the dismissal of narrative skills as unnecessary, which has been proposed by scholars against narrative medicine, does not correspond to the complicated circumstances of contemporary clinical practice in which narrative competence, as shown above, can have positive outcomes including an empathic understanding of the patient. As Charon (2016, p. 348) rightly argues, both plot and form require attention.

The paucity of reliable empirical studies which demonstrate a link between narrative medicine training and the development of empathy has also been presented as an argument against narrative medicine (Ahlzén 2019). Nevertheless, Ahlzén (2019) admits that it is hard to prove in a solid empirical way that literature can improve clinical practice (see also O'Mahony 2013). Various recent qualitative and quantitative studies have concluded that narrative medicine may be linked to heightened empathy despite the challenges in "quantifying the long-term impact of narrative medicine objectives, such as fostering empathy and ethical decision-making" (Remein et al. 2020; Milota et al. 2019; Arntfield et al. 2013; Schattner 2012).¹⁰ Remein et al. (2020) in their review acknowledge that it is unclear how transferable the results of any specific narrative medicine intervention may be (see also Fioretti et al. 2016), but a common conclusion of all recent reviews is that narrative medicine education can lead to a range of positive outcomes for health sciences professionals, including enhancing empathy (Remein et al. 2020; Milota et al. 2019; Barber and Moreno-Leguizamon 2017).¹¹ Regarding studies and reviews on specific kinds of literature, some recent representative examples are the qualitative study of Vannatta and Vannata (2013) who suggest that the use of literature improves the doctor's empathy and subjective attunement to narratives of abuse and the article of Schoonover et al. (2020) who offer a review of studies on the use of poetry, which as part of a narrative medicine intervention may increase empathy.¹²

Another criticism of the principles of narrative medicine in relation to empathy is that eliciting the patients' stories might lead some of them to feel uncomfortable or forced and distressed and this might have negative results on the relationship between patient and doctor (Kalitzkus and Matthiessen 2009; Ahlzén 2019; Mitchell 2014; O'Mahony

⁸ The link between the study of literature and the development of abstract clinical competencies related to empathy, such as accurate interpretation, imagination, ethical issues, and moral reflection has also received attention (Hojat 2009; Zaharias 2018a, b). Furthermore, Zaharias (2018a) remarks that the use of principles of literary analysis to the patient narrative also leads to self–reflection, which offers insight into the self and the practitioner's own effect on the interaction.

⁹ Roche (2017) also refers to cases where constant pain may lead to iatrogenic stigmatization and remarks that through patients' storytelling and physicians' narrative competence pain physicians can develop empathic skills and help patients manage pain and suffering.

¹⁰ Yang et al. (2018) emphasize that narrative medical education will be effective if it is continued throughout the professional life of medical staff. Greenhalgh (2006) notes that narrative techniques "provide the opportunity to generate insights that cannot be gained using the traditional tools of the quantitative researcher" and based on this McDonald et al. (2015) suggest that there may be a case to further develop qualitative work in this area.

¹¹ Barber and Moreno-Leguizamon (2017) in their review also raise the issue that no study included a patient-reported outcome measure. The number of participants in narrative medicine interventions is also small but they acknowledge the benefit of education in small groups. Gull et al. (2002), for example, who had a larger interdisciplinary group of participants, conceded difficulties in managing it. The effectiveness of narrative medicine for increasing empathy may also be related to its cultural acceptance by students (Daryazadeh et al. 2020). ¹² Muszkat et al. (2010), for example, demonstrated that their poetry programme was perceived by students as increasing their capacity for empathy. In the study of Lancaster et al. (2002) students reported increased empathy as the most valuable aspect of the close reading of literature on specific themes. Fox et al. (2020) also showed that the practice of close reading was tied to the skill of perspective-taking as the analysis of their workshop texts helped medical students generate empathy and craft strategies for combating weight stigma in their own future medical practice. Two recent studies of the use of narrative medicine programmes in pediatric psycho-oncology and palliative care also support the use of narrative medicine to foster empathic behaviors (Lorenz et al. 2021; Sagin et al. 2021 respectively). In the latter it is worth noting that many students "chose to take on the perspective of, and empathize with, their patients" even though this was not a part of the intervention.

2013). Kalitzkus and Matthiessen (2009, p. 84) rightly demonstrate that, since disease, disability, deprivation, and death are not stories but facts, "the biggest challenge in taking a narrative approach is knowing when to stop." O'Mahony (2013, pp. 614–615) further argues that the "superhuman empathy of a Rita Charon" might make medical students feel themselves to be failures if they cannot achieve it. It is worth considering, though, that a common issue in clinical practice is that when dealing with illness and patients' own stories of the ways they experience it, physicians may tend to neglect the changes in their patients' everyday life and existential issues, such as suffering, fear, and the inescapable uncertainty arising from this situation (Piemonte 2018, pp. 31–32; Shapiro 2008). Many doctors also believe that they should be detached from the suffering and pain of their patients in order to be objective in their practice of medicine (Yaseen and Foster 2019, pp. 11, 13). Studies have shown that even medical students experience an increased lack of empathy as they proceed in their studies (Yaseen and Foster 2019, pp. 9, 71 and Guidi and Traversa 2021 offer brief reviews; against Jeffrey 2019, especially pp. 185-215). The result is that young doctors, in particular, have not been prepared to confront suffering and handle it accordingly and this may lead to burnout, fatigue, and a feeling of meaninglessness (Piemonte 2018, pp. 98–99; Jeffrey 2019, pp. 73–98).¹³

This is where empathy and the engagement with literature to cultivate it may have a significant role for medical practitioners. The place of empathy, and of emotions in general, in clinical decision-making has recently been regarded as an important part of the narrative ethics of healthcare in which the context of ethical practice is the care of the patient (Irvine and Charon 2017, p. 128). As Irvine and Charon (2017, pp. 128–129) emphasize "rather than being seen as interfering with clinical judgment, emotions of empathy or compassion are recognized to be a source of care". In the frame of narrative medicine the literary narrative ethics offers the intellectual foundations to the practice of the narrative ethics of healthcare (Irvine and Charon 2017, p. 122). Therefore, "in addition to the clinical practice of helping patients, families, and clinicians arrive at fitting decisions about healthcare, teaching narrative ethics entails training in the close reading of literary, legal, and clinical texts" (Irvine and Charon 2017, p. 124).

The question immediately raised is how the close reading of texts within the frame of narrative medicine may lead to the development of empathy. Close reading as a main procedure of New Criticism, a literary theory which focused on internal textual features and structure (Abrams and Harpham 2012, pp. 242–243; Cain 2018, pp. 11–21; Duarte et al. 2020, pp. 1, 3–4), is the detailed analysis of the complex interrelationships and meanings of the words on the page rather than of the contexts which surround them (Cain 2018, p. 20; Eagleton 1996, p. 38). One of the advantages of close reading in narrative medicine is the familiarization of doctors with the interpretation of complicated literary texts. All the elements of a story, such as its plot, its genre, its diction, its temporal and spatial natures, are required for the reader to extract its ethical, personal or affective meaning (Irvine and Charon 2017, pp. 112–113). Thus, a doctor who has become an efficient reader has the ability to approach the complex illness stories with more understanding (Charon 2017a, pp. 165, 166; Schneider et al. 2019, pp. 173, 176). As Charon (2006, p. 110) remarks, "developing skill as a reader or a clinician entails knowing which of one's countless registers to bring to bear on each interpretive situation". Close reading requires training as does the reading of many clinical "texts", for example, a normal chest X-ray. This is why "good readers make good doctors", as Charon (2006, p. 113) argues, and the training involves the introduction of students and physicians "to great literary texts and giving them the tools to make authentic contact with works of fiction, poetry, and drama" (Charon 2006, x).

Such a contact may in turn lead to a change within the readers, who are affected and thus altered by their reading (Charon 2006, p. 126), an effect which according to Keen (2013) "can be considered an aspect of ethics in narrative discourse". Gadamer (2004) introduced the notion of the fusion of horizons through which "we expand our own vision of reality, our own state of being, indelibly changing us toward the next encounter with a text" (Irvine and Charon 2017, p. 112). According to Gadamer an authentic experience of a work of art involves a living relationship to it and "does not leave him who has it unchanged" (Inwood 2005, p. 349).¹⁴ This approach endows the theoretical background of narrative medicine with a wider scope, since in the traditional concept of close reading the reader's response was not a matter of attention. In the reader response criticism and the reception theory within it, in both of which the focus turns to the readers and their reception of the texts, the meaning of the text is created and is the result of its interaction with a reader (Reader Response Criticism) or readers of a certain period (Reception Theory) (Abrams and Harpham 2012, pp. 330–333, 336–337; Eagleton 1996, pp. 67–75; Culler 1997, p. 123). Central to the reception theory is the notion of the "horizon of expectations", which is a term used for the set of cultural norms, assumptions, and criteria shaping the way

¹³ Yaseen and Foster (2019, pp. 12–13) and Guidi and Traversa (2021) discuss the association of burnout and reduced empathy with diagnostic errors.

¹⁴ Taylor (2002, pp. 126–142) discusses Gadamer's account of the fusion of horizons in attempts to understand different societies and epochs.

in which readers understand and interpret a text or an artwork at a given time. It may be formed by such factors as the prevailing conventions or current moral codes (Baldick 2001, p. 116).

Both New Criticism and Reader Response theories include many different views and trends and, even though they were introduced as contradictory theories, elements of both may be particularly useful in the field of narrative medicine. Charon (2017a, p. 164) suggests a combination of "the timeless practice of close reading with attention to the roles of emotion and intersubjectivity in how the reader reads". With the increase of interest in neurosciences and cognition, theoretical models which combine, among others, the interdisciplinary study of human mind (including emotions and empathy, in particular) and structural elements of the texts, emerged, such as Eder's (2003) work on narratology and cognitive reception theories.¹⁵ Eder proposes this "convenient collective term for theories that recruit concepts from cognitive science in their efforts... to understand how texts or narratives are understood" emphasizing the emotional side of reception (Eder 2003, p. 284; Herman 2013, Sect. 3.2c).¹⁶ In his brief discussion of structures of emotional influence Eder (2003, p. 290) refers to the works of film theorists such as Plantinga (1999) on scenes of empathy but then focuses only on the character in feature films. There is no analysis of other areas, which, as he suggests, may be successfully explored within this framework; such areas are the structures involved, among others, in perspective and in the readers' emotional engagement with characters (Eder 2003, p. 295). Both proposed areas could be of particular interest for narrative medicine, as this approach may endow Charon's suggested model with a wider scope by taking into account recent interdisciplinary directions in the research of empathy.

"We must go to the past if we are to make new the present": Greek tragedy and historical empathy in contemporary medicine

Martingale (2013, p. 181) makes this thought–provoking statement in his discussion of the classical reception and the notion of a "new humanism". Could this apply to medicine and in which respects? Narrative medicine has focused on texts drawn primarily from English and American

literature. The ancient Greek culture has received little systematic scholarly attention, even though Meineck (2020b, p. 267) highlights that "under the aegis of narrative medicine, texts such as Homer's Iliad and Odyssey and the ancient Greek plays... have provided fertile ground for the kind of joint close readings and collective reflections central to the effectiveness of many of these programs".¹⁷ Greek tragedy problematizes universal issues regarding the human nature, and especially suffering and its effects. The Greek tragic plays have been read and performed from the fifth century B.C. until today, continue raising timeless questions, and provoke much discussion about ever-present issues. Yet, the lack of interest in Greek tragedy may be due to its peculiarities, such as the special generic conventions of these texts which make them less familiar to contemporary readers than, for example, the works of Shakespeare, Tolstoy and other authors who also refer to the past.¹⁸ Another reason may be the general view of classical texts as obsolete and remote from modern experience, since there seems to be a long temporal and sociocultural distance between the era they represent and today. These reasons make the contextualization of Greek tragedy a complicated task for the modern reader as the plays reflect a specific historical period in the past, within which they were produced and whose particular circumstances they evoke: the democratic city-state of Athens in the fifth century B.C.¹⁹ The significance of taking the context of the Greek plays into account may be exemplified, among others, with a brief reference to the notion of communal action: the number of Athenian citizens was relatively small and democratic citizenship meant active

¹⁵ Hamilton and Schneider (2002) opened the way towards the cognitive reception theories, by tracing cognitive criticism's roots in reception theory.

¹⁶ Waugh (2006, p. 550) describes this tendency in aesthetics as "cognitive aesthetics of reception".

¹⁷ Meineck (2020b) brings the example of the "Warrior Chorus" productions with Aquila theatre which have shown how ancient drama can be a popular resource in health humanities programs. Recently, and during the COVID-19 pandemic in particular, there has been a kind of reinvention of Greek tragedy: Rushton et al. (2020) in the discussion of the events presented by the Theater of War for Frontline Medical Providers, namely dramatic readings of scenes from ancient Greek plays for audiences of medical providers, point out that "ancient Greek plays about chronic and terminal illness, moral distress, the challenges of witnessing suffering... can be used to forge a common vocabulary for openly engaging doctors, nurses, students, and other health-care professionals in creating constructive dialogue, fostering understanding, compassion, and a renewed sense of community". Another exception are the works of Bleakley and Marshall (2012); Bleakley et al. (2014); Marshall and Bleakley (2008, 2009, 2011, 2013, 2017) and Rodulson et al. (2015) on Homer, especially Marshall and Bleakley (2009, pp. 7-12, and 2017, pp. 104-121) where empathy is approached within the frame of pity.

¹⁸ Such conventions are the open–space performances within specific religious contexts, the adherence to subjects drawn from the mythic past, the stylized structure of the plays with the choral interventions, the masked performance by actors, the three–actor rule and the female roles played by men.

¹⁹ For a discussion of the very few and doubtful cases of productions of tragic plays outside Athens see Kampourelli (2016, pp. 8–11).

and constant participation in numerous political activities (including military ones, as Rushton et al. 2020; Meineck 2020a, c emphasize) and an intensified sense of community, especially at times of suffering, which cannot easily be captured today.²⁰ The consideration of the specific historical context of the Greek plays allows their interpretation as part of another culture from a past time, yet closely related to ours, by reflecting on which "we seek to know more about ourselves" (Meineck 2020a, p. 58). The engagement with historical empathy, a particular concept of empathy associated with the study of the past, seems appropriate here and may contribute fruitfully to the direction proposed by Meineck.

The recent sociocultural shift in history led to the consideration of empathy as a significant component of historical empathy, a widely used but also disputed concept among historians and history educators.²¹ Endacott and Brooks (2013, 2018), followed by Bartelds et al. (2020, p. 529), have recently proposed an approach of historical empathy as both the cognitive and affective engagement with historical figures to better understand the lived experiences, decisions and actions of people in the past, pointing out that affective connections with these figures are made "to one's own similar yet different life experiences" (Endacott and Brooks 2013, p. 43). As Bartelds et al. (2020, p. 529) remark "this activity seems similar to the process of understanding someone's experiences, decisions, and actions in the present". One of the conclusions of their empirical study in historical empathy is that "students and teachers see a clear link between historical empathy and empathy in daily life" (Bartelds et al. 2020, p. 546). Endacott and Brooks (2013, p. 46; 2018, pp. 215–216) have specifically proposed the inclusion of a "reflection" phase in their model for the promotion of historical empathy; in this phase the focus is on making connections between the past and the present which may inform the students' thoughts, emotions, and actions in the present. Through historical empathy, in particular, the appreciation of the complexity of situations faced by people in the past and the need to act for the good of others can ultimately lead students to the formation of moral judgments about the past which may help them face the ethical issues of today (Endacott and Brooks 2013, p. 45).

Even though these studies in historical empathy have tended to emphasize its aim to foster citizenship competencies (Endacott and Brooks 2018, pp. 208, 219; Bartelds et al. 2020, p. 531), the proposed link between historical empathy and empathy in everyday life may be useful when examined in new contexts. Discussing medical history Koretzky (2018, p. 2080) argues that "there is another role for history in medical education, in addition to, not instead of, teaching content knowledge. That is, to deliver emotion, to train students in empathy".

The study of ancient literary texts and Greek tragedy, in particular, may open new perspectives in the examination of historical empathy in this context. Sullivan (2011, pp. 547-548) has argued for the close intersections between cultural medical history and literature stressing the unchanging impulse to use stories to make sense of aspects of human experience. The convergence of history and fiction was introduced by postmodern approaches to history which challenged the empirical Rankean history and its assumptions about the objective reconstruction of facts and the diametrical opposition between history and fiction (for example, White 1978, 2005). The main objection to Ranke's principles lies in the incompleteness and unreliability of the surviving record (Hower 2018; McCullagh 2004). Boldt (2014) following Jenkins (2009) demonstrates that only a fraction of what has occurred in the past (about 1%) can be recounted. In addition, the selection and interpretation of evidence depend on historians' judgment and thus can only be arbitrary and subjective (a brief review is found in Boadu 2020). Thus as Boldt (2014, p. 472) acknowledges "Ranke's approach to history worked in the nineteenth and early twentieth century but historical writing and the nature of history has moved on" (see also Hower 2018). According to the postmodern approaches historians must consider "the assertion that our representation of the past has no greater claim to truth than that of novelists and poets" (Green and Troup 2016, p. 206). For example, White (1978, p. 82) criticizes historians' "reluctance to consider historical narratives as what they are- verbal fictions". The acceptability of literature as a primary source for academic history furthered this confluence of history and fiction (Hower 2018) and, as Humphrey remarks (2020, p. 95), the once-acclaimed history/ fiction division is now recognized by all historians as "an oversimplification". Therefore, the concept of historical empathy may be applied, beyond the strictly historical (in the Rankean sense), namely "real, non-fictional", situations, to literary texts referring to past human experience. Boldt (2014, p. 463) interestingly remarks that "the power of great novels is not that they are fiction; it is that they are true. How would it otherwise explain that some of the greatest writers in the past are still read today, writers such as

²⁰ Meineck (2020a, c) and Rushton et al. (2020) point out that the audience and actors were all male, with military experience, since Athens was actively at war most of the time of the production of the plays, and had also experienced a plague (430–428 B.C.). Thus, in this perspective, the Theatre of Dionysus was "a collective space where actors voiced the unspoken suffering of citizens" (Rushton et al. 2020, p. 305).

²¹ Moore (2019, pp. 55–69) reviews the suggested areas of overlap and "variations in alignment" between psychological empathy and historical empathy. Aspects of historical empathy have been matters of controversy (for a review see Endacott and Brooks 2018, pp. 203–213), principally due to the dangers of presentism (Alleman and Brophy 2003, p. 108), egoistic drift, and false interpretations.

Charles Dickens, Shakespeare and Goethe?... And the truth in their fiction makes their novels more powerful than any other book". According to Endacott (2014, p. 14) one of the most important aspects of historical empathy is the sense of "shared human experience". Thus, texts such as the Greek tragic plays, which draw on diachronic human thoughts and feelings, may be particularly useful in promoting historical empathy as a stimulus for the development of empathy in medical practice.

Taking the above into account, the following discussion of Greek tragedy is based on the meanings created by both a close reading of the text *and* its reception by modern readers with particular attention to the links made between past situations and contemporary similar life experiences. Aspects of narratology and cognitive reception theories, such as the emphasis on the received story (Eder 2003, p. 281) and on structures which have been related to empathy, will illuminate the ways in which such associations may be drawn through the physicians' and students' reading and their own experiences in medical practice.²² Therefore, the view of Greek tragedy explored here focuses on its interpretation as a dynamic work of art of value in the development of empathy in medicine today.

Aristotle described the effect which the plays had on ancient spectators by referring to the feelings of "pity and fear" and the consequent "catharsis" in his definition of Greek tragedy in Poetics 6, 1449b24-8: "tragedy is a representation (mimēsis)... which achieves, by means of pity and fear, the purification (katharsis) of such emotions" (Finkelberg 2014, p. 137). The interpretation of "pity and fear" has caused much scholarly debate but what is of importance for this discussion is that the powerful effect of the tragic plays, and especially the characters' suffering, on the spectators has been acknowledged since antiquity, irrespective of whether these feelings are vicarious (Halliwell 2002, p. 217; Nanay 2018, pp. 1371-1380) or self-centered (Konstan 2006, p. 155).²³ Recently Meineck (2020b, p. 267) has made the interesting point that the Aristotelian term of eleos which is usually translated as "pity," is possibly misleading and he suggests that the term "empathy" is more apt. He justifies this translation based on "the little we do know of the ways in which drama was received in the classical period:...it possessed the power to move the soul." According to Miall (2018, p. 114-116) Aristotle is the first theorist

to draw attention to audience response, centuries before the emergence of the reader response and reception theories discussed above.

Similar feelings arise when one reads the tragic plays today or watches their modern adaptations on stage. Bryan Doerries, a director and classicist for whom Greek drama is an artistic means to heal traumatic experiences, especially of veterans who had returned home from the wars in Iraq and Afghanistan, points out that "when people see their own private struggles reflected in 2500–year–old stories, something powerful happens. They open up. They quote lines from the plays and relate those lines to harrowing, personal stories" (Doerries 2015).

Recently "pathography", that is, the literary genre based on patients' (and their families' and caregivers' in some cases) stories and their experiences of illness, has received particular attention (Whitehead 2014, pp. 112-113; Marini 2016, p. 194). Pathographies and their emotional effect on the other dramatic characters (as may well be assumed on the spectators, too) are also found in the corpus of surviving ancient tragic plays. A representative example is Sophocles' *Philoctetes*. Even though this tragic play is not as well known as other tragedies, such as Sophocles' Antigone or Oedipus Rex and Euripides' Medea, its reception within medicine in recent times has been notable: Philoctetes has been performed at the Institute for the Medical Humanities, University of Texas Medical Branch in Galveston, in 2008, so that medical students would achieve a better understanding of the complexity of pain and illness and the play has been used, among others, for therapy programmes at the Vincent's Trauma and Wellness Center in New York (Novillo-Corvalán 2014, pp. 131-132).

Several texts have drawn on the myth of Philoctetes but as the plot may not be familiar, a brief summary of the Sophoclean version of the story is offered. On the way to Troy with the Greek fleet Philoctetes was bitten by a snake which guarded the shrine of Chryse, where the Greeks went to sacrifice. Philoctetes was then abandoned, ill, by the Greeks on the uninhabited island of Lemnos because his cries of pain were unbearable for the army to hear. He has spent ten years there. The play begins as Odysseus and Neoptolemus, Achilles' son, come to Lemnos to take Philoctetes to the Greek camp in Troy because Hercules' bow, which Philoctetes possesses, is necessary for the capture of Troy. Odysseus and Neoptolemus plan to deceive Philoctetes and the chorus, Neoptolemus' sailors, consent to it. When Philoctetes enters, Neoptolemus pretends that he wants to take Philoctetes home and manages to get his bow. However, after Philoctetes is seized with an attack of his disease, Neoptolemus reveals the truth to Philoctetes. Odysseus enters suddenly and temporarily controls Neoptolemus but then the young hero enters to give Philoctetes his bow back. They decide to sail to Greece, but Hercules appears as a

²² From this perspective, following Eder (2003, p. 281), the readers are viewed as "a particular historically and socioculturally defined group of recipients". Attention is not drawn to the variability of individual reader responses which are usually taken into account in empirical studies (such as the recent study by Fernandez–Quintanilla 2020, p. 141).

²³ For a recent review of the Aristotelian pity and fear see LaCourse Munteanu (2012), especially pp. 129–130, 138, 206.

deus ex machina and predicts that Troy will be the place of Philoctetes' cure and glory. The play ends with Philoctetes' farewell to Lemnos.

As shown above, the main themes of the play are illness and chronic pain, abandonment and isolation, and, most significantly for this article, Neoptolemus' ethical dilemma whether to deceive an ill, disabled person and thus follow Odysseus' (and the Greek authorities') orders or decide to care for those in need and thus become the advocate of Philoctetes' values. While the issues of illness, pain and abandonment have received some scholarly attention, Neoptolemus' value conflict and the unfolding of empathy with a crucial twist in the plot have been neglected.²⁴ Nevertheless, the universality of the ancient text lies in the existence of similar contemporary inner conflicts and ethical situations in patient care which (especially young) doctors have to face.²⁵ Questions arise regarding how empathy is involved in cases in which there is a conflict between values, such as when the "medical culture of efficiency and detachment" may become more important than care (Piemonte 2018, p. 120), and thus which attitude a doctor (and a medical student and prospective doctor) should have towards a patient. Recently dramatic readings of scenes from ancient Greek plays, including Philoctetes, have been presented for audiences of medical providers by the Theater of War for Frontline Medical Providers (a collaboration between Theater of War Productions, the Johns Hopkins University Program in Arts, Humanities, and Health, and the Berman Institute of Bioethics, USA) and as Rushton et al. (2020) point out "it is in the ambiguity of these scenes that clinicians seem to find comfort in discovering that they are not alone in their own moral discomfort" especially due to the issues they may be facing during the COVID-19 pandemic.

As mentioned in the discussion of Eder's (2003) theoretical framework above, several aspects of fictional worlds have been proposed in film and literary studies in the fields of narratology and cognitive reception theories as eliciting empathetic emotions, such as the duration and narrative context of a scene (Plantinga 1999), the vivid use of settings (Keen 2007, p. 93), and the perspectives adopted in the presentation of the story (Keen 2007; Fernandez-Quintanilla 2020). These are features which also receive attention in examples of close readings of texts (Charon 2017b, pp. 180-207) and will be explored, taking the norms of Greek tragedy into consideration, in the examination of the tragic text below. Furthermore, Fernandez–Quintanilla (2020, pp. 140-141) who bases her study on the theoretical ground that "reader experiences are the result of the dynamic interaction between incoming textual information and the reader's prior knowledge and experiences" has shown empirically that textual and reader dimensions are equally relevant to experiences of empathy (Fernandez-Quintanilla 2020, p. 141). Taking the above into account, the following analysis focuses on both the text and the experiences of medical practitioners and students, which are likely to affect their responses.

One of the norms in the surviving Greek tragic plays is that the action takes place in front of the palace, the place of political and social power. Nevertheless, in Philoctetes there is an exceptional use of the setting which is identified as a primitive cave in the marginalized, uninhabited island of Lemnos (11.1-2). There is no escape from this location, since the island is surrounded by sea and no ship is available to Philoctetes. The setting functions as an affective and suggestive symbol of Philoctetes' isolation and suffering from the beginning of the play. Philoctetes' confinement in an island in complete social and political isolation is reinforced by his lameness, which further confines him in an already restricted space (Kampourelli 2016, pp. 143–144). The only human element around is his echo (ll.189-90) and his sole interlocutors are "the inlets, the headlands and the jagged rocks of the island" (11.936-40) (the translations of Philoc*tetes* are taken from Taplin 2015).

Perspective and the viewpoints of the characters have also been proposed to contribute to readers' empathy (Keen 2007, p. 93; Fernandez–Quintanilla 2020, pp. 129–139). Before Philoctetes' own emotional description based on his harsh experiences (II.285–99), both the location and his illness are presented through various accounts (idealized depiction, direct report of the interior, and presentation of the cave from the outside with particular emphasis on Philoctetes' movement difficulties, by Odysseus in II.16–23, Neoptolemus in II.27–39 and the chorus in II.144–47 respectively). All of them are offered by foreigners who have arrived there to deceive him, not by Philoctetes' friends or assistants (Kampourelli 2016, pp. 142–143).

Therefore, from the first lines of the play the setting and the accounts through different perspectives reinforce the theme of the inhuman conditions of Philoctetes' life and his complete isolation. Simultaneously, though, they underscore the difficult situation which Neoptolemus will be called to handle. Odysseus stresses the need for the deceitful plan (ll.79–85), acknowledging that Neoptolemus is not inclined

²⁴ For example, Novillo–Corvalán (2014, pp. 127–142) focuses on Philoctetes' illness story and its reception and only makes a passing reference to "Neoptolemus' ethical struggle in the context of the tensions of the drama" (Novillo–Corvalán 2014, p. 132) without any further account of it or its relation to the theme of empathy. Doerries (2017) makes a brief connection between Neoptolemus' difficult situation and his own experience as a caregiver for his ill father, without any reference to the young character's dilemma, too.

²⁵ Ricoeur (1991, pp. 22–23) emphasizes that tragedy, epic and comedy, to cite only those genres known to Aristotle, develop a sort of understanding, the narrative understanding, "which is much closer to the practical wisdom of moral judgment than to science, or, more generally, to the theoretical use of reason".

by nature to deceive others. Yet, for a brief time he should give himself to Odysseus, devoid of shame, since victory is a pleasant prize, and then emerge as righteous at another time.

Neoptolemus' attitude and decisions will also receive attention from different points of view during the play.²⁶ While Odysseus' argument is based on the principle that "the end justifies the means", Neoptolemus is still reluctant here to act against his nature and virtue as represented by his father, Achilles (and Philoctetes later in the play). He is willing to assist Odysseus to follow the orders of the leaders of the Greek expedition in Troy by using force but not guile. This introduction to Neoptolemus' character predicts his future attitude towards Philoctetes and prepares the readers for one of the most crucial points in the plot of the play.

These lines may be interpreted in an innovative way by a contemporary audience, especially medical students and doctors. It is as if Odysseus assumes the role of a "mentor" for Neoptolemus who needs to follow new principles in order to reach a serious decision. Through the engagement with historical empathy, the difficult task the young hero is facing and needs to undertake against his values appears to have many similarities to tough decisions which young doctors need to make and to future challenges medical students are asked to prepare for.

As the play progresses, despite his initial doubts Neoptolemus finally consents to Odysseus' plan and proceeds with the deceit when Philoctetes appears. He manages to gain Philoctetes' trust and is even invited by the lonely hero himself, who considers Neoptolemus his friend, to enter the cave with him. At this important dramatic point Sophocles offers an impressive example of pathography and presents an acute episode of Philoctetes' disease on stage. Despite previous references to his cries of pain and details of it by other characters and mainly by Philoctetes himself, the disease scene in the middle of the play (ll.731-55) is a moment of extreme dramatic significance which leads to the culmination of the young hero's dilemma (11.756-806). Interestingly, Keen (2007, p. 79) argues that "empathy with plot situation gravitates toward *middles* of plots, when problems and enigmas have not yet been solved or brought to closure". Philoctetes vividly presents his suffering with long cries of pain shouting that this is his end and even asks Neoptolemus to ampulate his painful leg. Neoptolemus is puzzled until he admits that "this sickness bears down on Philoctetes horribly" (1.755). Philoctetes even addresses death whom he says that he calls regularly as the end of this suffering but without

success. Neoptolemus reacts to all this with silence until in line 806 he justifies this attitude by expressing the reason for it: "I have [long] been feeling anguish for your sufferings".

Neoptolemus' internal affective state for Philoctetes is viewed as a process which begun long ago. The visualization of Philoctetes' illness motivates Neoptolemus' (and the readers') empathy, since he, as an internal spectator, has experienced Philoctetes' suffering as an eye-witness. Keen (2007, p. 71) in her study about empathetic characters among college students found out that a character's negative affective states, such as those provoked, among others, by suffering and experiencing painful obstacles, make a reader's empathizing more likely. Moreover, Sophocles presents Neoptolemus break his long silence (11.782-805), an indication of his internal turmoil, to express in line 806 his emotional response to what Philoctetes is going through; he is participating in Philoctetes' situation and cannot simply observe it from an emotional distance. The process of developing empathy for the suffering of the other is explicitly displayed.

Plot twists according to Keating (2013, p. 57) create suspense for future events. After his acute episode of pain and suffering Philoctetes is falling asleep. When he wakes up he is ready to leave Lemnos in the hope that he is returning to his homeland in Greece, as Neoptolemus promised him. Taking into consideration Neoptolemus' empathy as already expressed in his own words an important question arises: will they be going to Troy as the Greek leaders and the duty obligate or is Neoptolemus going to reveal the truth and take Philoctetes to his homeland, as promised?

At this crucial dramatic moment indicative questions which may further promote the readers' historical empathy and, thus their engagement with the characters and their situation, may be to contemplate which the ending of the play could be and which their expectations of Neoptolemus' reaction from now on are. They may also consider which character they empathize with, how they would react if they were one of these characters and whom they would choose and why. Most significantly, the dramatic action may bring to mind parallels from their everyday experience, their attitude towards illness and their patients, as well as related value conflicts during clinical work. It is of interest that in Keen's (2007, p. 80) view situational empathy, "which responds primarily to aspects of plot and circumstance", principally involves recognition by the reader of prior or current experience.

Such questions focus on the affective response to the young hero's empathy and inner conflict by doctors and medical students and can lead to many correlations and actually a "re–living" of what Neoptolemus needs to cope with in a new context based on the experiences of contemporary readers. According to Irvine and Charon (2017, pp. 119–120) narrative ethics focuses on what has happened to a patient to lead to this situation and what alternative endings

²⁶ This may be explained by the focus on the new character, since in both the Aeschylean and Euripidean versions of the myth Odysseus was followed by Diomedes. Thus, the inclusion of the dramatic character of Neoptolemus in this play is another innovation of Sophocles to emphasize the theme of the dilemma of the young hero (Taplin 2015, p. 143).

to this story can be imagined. Learning to view a story from different perspectives and create alternative possible plots, immersing into the world of the other and participating in his emotional situation, and finally, thinking about the way he reacts to the suffering around him and about the choices he makes in a context familiar to our own experiences, is what actually empathy does in real life. This is the kind of involvement Aristotle referred to with the feelings of "pity and fear" leading to the "catharsis".²⁷

Having considered possible different perspectives, it is interesting to examine the choice of plot the tragic poet made. The previous expression of empathy turns into action with Neoptolemus' reversal which is presented climactically (ll.895–926). At first, he asks questions which indicate his despair and confusion. Then he refers to his internal pain and mental anguish due to the failing of his nature. This culminates at the agonizing question of what he should do (with particular emphasis on his "torment") and finally at the revelation of the truth.

Sommer (2013, pp. 157–158) argues that "literary works or dramatic performances make use of empathy, either by representing empathic behavior or by creating scenarios that actively engage their audience's capacity for empathy". In Neoptolemus' case both may be detected. Apart from the representation of empathy as Neoptolemus turned into a participant of Philoctetes' pain before, by revealing his ethical struggle and the truth, he is also becoming the internal "observer" who gradually takes the protagonist's (Philoctetes') side. In the creation of scenes the triangular constellation of protagonist, antagonist, and observer (who is normally the reader or the spectator of a performance) has been considered an essential constituent of narrative empathy as the observer chooses a side (Sommer 2013, p. 157). Even though the focus of the play is mainly on the wound of Philoctetes and his physical illness, Sophocles draws attention to Neoptolemus' inner torment and its resolution. His reversal is the effect of empathy whose implications and consequences are climactically presented (and shared by the readers).

In his discussion of the *scenes of empathy* in films Plantinga (1999, p. 239) remarks that "the pace of the narrative momentarily slows and the interior emotional experience of a favored character becomes the locus of attention". The means by which this is achieved is a "prolonged concentration on the character's face". Even though the means by which audience attention is achieved in such scenes in films cannot apply to the tragic plays, given the conventions of Greek tragedy (a masked performance in an open theatre), the vivid and powerful way Neoptolemus expresses his internal conflict through his words draws the readers' attention to it and may elicit strong empathetic emotions, similar to those described by Plantinga. The empirical study of Fernandez–Quintanilla (2020, p. 138) showed that "readers' self–reported empathy with characters tends to happen when the stories allow access to the characters' situation and mental states", especially emotions.

Interestingly Plantinga (1999, p. 253) further argues that to "contextualize empathy, films often attempt to elicit an empathetic response after a protagonist has undergone some kind of trial or sacrifice". Neoptolemus' choice to reveal the truth to Philoctetes is neither easy nor effective. As he initially states that he is obliged to follow the public duty (11.925-26), Philoctetes reacts in a furious way and declines any suggestions for returning to Troy. At the end, despite Odysseus' threats against him, Neoptolemus decides to take Philoctetes to his homeland, defying duty, and thus empathy has led to compassion, a motivation to actually help the one in need (ll.1402–8).²⁸ It is of interest that Duarte et al. (2020) in their recent pilot study in close reading used texts dealing with different aspects of care and illness, such as observation of illness from the outside, a description of illness as it is experienced, a situation of care, all of which are found in *Philoctetes*, in a sequence of events culminating in the choice for care. Nevertheless, Sophocles wrote the play in the specific cultural conditions of the fifth century B.C. and the Greek tragic convention is that the ending should follow the traditional myth. Thus Hercules appears as a *deus ex* machina and persuades Philoctetes to sail with Neoptolemus to Troy where he will find healing for his wound and be reintegrated into society. The conquest of Troy will be accomplished after the hero is cured and the divine plan will be fulfilled. Nevertheless, it should be taken into account that, even though the future seems bright for Philoctetes, lines 1440–41 imply a warning for both Neoptolemus and him.²⁹

Hercules

And do remember this when you are laying low that land:

respect the province of the gods.

For Philoctetes the future is related to the promise of his physical cure but it also raises the question whether this will be followed by his "internal" cure as a member of the community after his reintegration into society and its norms, both

²⁷ Catharsis in this context is closely related to "transformative catharsis", as proposed by Highland (2005, pp. 160–162). For a recent review of the concept of catharsis see La Course Munteanu (2012, pp. 238–250).

²⁸ As mentioned in the introduction, the concept of compassion which is followed in this article is differentiated from empathy and is based on the activation of prosocial motivation and behavior, thus on taking action to try to help.

²⁹ Novillo–Corvalán (2014, pp. 128–144) presents the ending as optimistic focusing on the theme of the cure.

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social and religious. The main warning, though, is addressed to Achilles' son. Despite his initial doubts, Neoptolemus has been presented as a pious and compassionate follower of his father's virtue. Nevertheless, according to works of earlier Greek literature, during the conquest of Troy he will be involved in a highly impious act, the slaughter of Priam, the old king of Troy, at the altar of Zeus; this will lead to his own murder at Delphi by Orestes as a form of divine punishment for his impiety (Taplin 1987, pp. 75–77; Ussher 1990, on ll.1440-44). Sophocles hints here at the problematic future of his young dramatic character, already known from the literary tradition. Therefore, the ambivalent ending of the play may lead readers, who have been trained in close reading and thus in finding intertextual connections, to view the play and especially Neoptolemus' dilemma and decision in a new perspective: the resolution of his value conflict with the involvement of empathy, his compassion and actual care in contrast to the deception of an ill person as ordered by duty towards the official authorities, and finally the problematic nature of this attitude when juxtaposed to Neoptolemus' future choices as known in the mythological tradition are indicative of one of Greek tragedy's main features, namely that the tragic poets do not aim to offer clear answers to the themes they present. They rather problematize these issues and thus point towards the instability of human life and the fluidity of human nature. Realizing through the engagement with historical empathy the vulnerability and precariousness of human beings and their existence may lead to a better understanding and hence better care for others. This is why the reception of Greek tragedy by modern readers, especially medical students and practitioners, based on their own experiences and their "horizon of expectations", may open new perspectives in the development of empathy and compassion in contemporary medical education and practice.

Conclusions

In his discussion of empathy and history Kohut (2012, p. 242) argues that "our own experiences enable us to empathize with the experiences of others, experiences different from our own but sufficiently related or comparable to enable us to imagine our way, to think our way, inside them". I have suggested above that the view of historical empathy from this perspective offers many opportunities for the interpretation of Greek tragedy in ways which may promote empathy in medical contexts. By setting the focus on diachronic ethical issues, such as suffering, empathy, and related value conflicts, as well as the vulnerability and fickleness of human nature, the Greek tragic plays may lead to a deeper understanding and caring for the others.

This is of great importance in medical practice since a doctor who attends the patient's performance and story needs to fulfill a demanding and multifaceted task, as Charon (2006, p. 4) rightly remarks. The doctor assumes simultaneously the roles of a listener, a reader of an illness "story" and a spectator of its performance and needs to produce complex meanings in order to understand his/her patient, show care and reach the right medical decisions accordingly. In this framework ancient Greek tragedy may contribute fruitfully to the corpus of the texts which are used for the training of medical students and physicians. This does not imply a lack of regard for other kinds of literature and artworks or an intention to compare Greek tragedy with the rest of the literary and narrative corpus. Instead, it proposes the enrichment of the corpus by adding to it these previously neglected plays and, thus, offering a wider perspective within the training of narrative medicine.

It has been proposed that the close reading of great literature develops the narrative competence necessary to understand moral complexity and ambiguity (Irvine and Charon 2017, p. 126). As Charon (2017a, p. 163) observes there is an "upsurge in interest in the emotional and moral consequences of reading" which is promising for the future. The analysis of pathography and empathy in Sophocles' Philoctetes presented above, with the questioning of universal issues, offers an indicative sampling of the wide range of possibilities which the tragic plays open up towards this direction in contemporary medicine. This may function as a starting point for further reading of the Greek tragic plays by medical students and doctors, in the hope that this approach will offer them new insights in clinical practice and their understanding of human nature and their patients, in particular.

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References

- Abrams, M.H., and Geoffrey Galt Harpham. 2012. A Glossary of Literary Terms, 10th ed. Boston: Wadsworth Cengage Learning.
- Ahlzén, Rolf. 2019. Narrativity and medicine: Some critical reflections. Philosophy, Ethics, and Humanities in Medicine. https://doi.org/ 10.1186/s13010-019-0078-3.
- Alleman, Janet, and Jere Brophy. 2003. History is alive: Teaching young children about changes over time. *The Social Studies* 94 (3): 107–110. https://doi.org/10.1080/00377990309600191.
- Arntfield, Shannon L., Kristen Slesar, Jennifer Dickson, and Rita Charon. 2013. Narrative medicine as a means of training medical students toward residency competencies. *Patient Education and Counseling* 91 (3): 280–286. https://doi.org/10.1016/j.pec.2013. 01.014.
- Baldick, Chris. 2001. *The Concise Oxford Dictionary of Literary Terms*. Oxford: Oxford University Press.
- Barber, Sarah, and Carlos J. Moreno-Leguizamon. 2017. Can narrative medicine education contribute to the delivery of compassionate care? A review of the literature. *Medical Humanities* 43: 199–203. https://doi.org/10.1136/medhum-2017-011242.
- Bartelds, Hanneke, Geerte M. Savenije, and Carla van Boxtel. 2020. Students' and teachers' beliefs about historical empathy in secondary history education. *Theory & Research in Social Education* 48 (4): 529–551. https://doi.org/10.1080/00933104.2020. 1808131.
- Bazalgette, Peter. 2017. *The Empathy Instinct: How to Create a More Civil Society*. London: John Murray.
- Bleakley, Alan, and Robert J. Marshall. 2012. The embodiment of lyricism in medicine and Homer. *Medical Humanities* 38 (1): 50–54. https://doi.org/10.1136/medhum-2011-010138.
- Bleakley, Alan, Robert Marshall, and David Levine. 2014. He drove forward with a yell: Anger in medicine and Homer. *Medical Humanities* 40 (1): 22–30. https://doi.org/10.1136/ medhum-2013-010432.
- Bloom, Paul. 2016. Against Empathy: The Case for Rational Compassion. New York: Harper Collins.
- Boadu, Gideon. 2020. "Hard" facts or "Soft" opinion? History teachers' reasoning about historical objectivity. *Journal of International Social Studies* 10 (1): 177–202.
- Boldt, Andreas. 2014. Ranke: Objectivity and history. *Rethinking History* 18 (4): 457–474. https://doi.org/10.1080/13642529.2014. 893658.
- Cain, William E. 2018. British and American New Criticism. In *A Companion to Literary Theory*, ed. David H. Ritcher, 11–23. Chichester West Sussex: Wiley.
- Charon, Rita. 2006. Narrative Medicine: Honoring the Stories of Illness. New York: Oxford University Press.
- Charon, Rita. 2017a. Close Reading: The Signature Method of Narrative Medicine. In *The Principles and Practice of Narrative Medicine*, ed. Rita Charon, Sayantani Dasgupta, Nellie Hermann, Craig Irvine, Eric R. Marcus, Edgar Rivera Colón, Danielle Spencer, and Maura Spiegel, 157–179. New York: Oxford University Press.

- Charon, Rita. 2017b. A Framework for Teaching Close Reading. In The Principles and Practice of Narrative Medicine, ed. Rita Charon, Sayantani Dasgupta, Nellie Hermann, Craig Irvine, Eric R. Marcus, Edgar Rivera Colón, Danielle Spencer, and Maura Spiegel, 180–207. New York: Oxford University Press.
- Charon, Rita, Nellie Hermann, and Michael J. Devlin. 2016. Close reading and creative writing in clinical education: Teaching attention, representation, and affiliation. Academic Medicine 91 (3): 345–350. https://doi.org/10.1097/ACM.000000000 000827.
- Crawford, Dana R. 2021. Compassion and empathy in basic medical science teaching: A suggested model. *Cureus* 13 (12): e20205. https://doi.org/10.7759/cureus.20205.
- Cuff, Benjamin M.P., Sarah J. Brown, Laura Taylor, and Douglas J. Howat. 2016. Empathy: A review of the concept. *Emotion Review* 8 (2): 144–153. https://doi.org/10.1177/1754073914558466.
- Culler, Jonathan D. 1997. *Literary Theory: A Very Short Introduction*. Oxford: Oxford University Press.
- Daryazadeh, Saeideh, Payman Adibi, Nikoo Yamani, and Roya Mollabashi. 2020. Impact of a narrative medicine program on reflective capacity and empathy of medical students in Iran. *Journal of Educational Evaluation for Health Professions*. https://doi.org/ 10.3352/jeehp.2020.17.3.
- Djikic, Maja, Keith Oatley, and Mihnea C. Moldoveanu. 2013. Reading other minds: Effects of literature on empathy. *Scientific Study of Literature* 3 (1): 28–47. https://doi.org/10.1075/ssol.3.1.06dji.
- Doerries, Bryan. 2015. When people see their own struggles reflected in ancient stories, something powerful happens. Guardian (Opinion, Mental Health), December 26, 2015. https://www.theguardian.com/commentisfree/2015/dec/26/when-people-see-theirown-struggles-reflected-in-ancient-stories-something-power ful-happens. Accessed 08 July 2021.
- Doerries, Bryan. 2017. The healing power of Greek tragedy: Do plays written centuries ago have the power to heal modern day traumas? A new project raises the curtain on a daring new experiment. Interview by Jeff MacGregor. Smithsonian Magazine, November, 2017. https://www.smithsonianmag.com/arts-cultu re/healing-power-greek-tragedy-180965220/. Accessed 08 July 2021.
- Dosani, Sabina. 2021. The value and benefit of narrative medicine for psychiatric practice. BJPsych Bulletin 45: 274–276. https://doi. org/10.1192/bjb.2020.45.
- Duarte, António M., Cecilia Beecher Martins, Maria C. Marques, and Filipe C. Mesquita. 2020. Deepening the analysis of literary texts among university students using close reading and writing: A pilot study. Anglo Saxonica 17 (1): 1–13. https://doi.org/10.5334/ as.25.
- Eagleton, Terry. 1996. *Literary Theory: An Introduction*, 2nd ed. Minneapolis: University of Minnesota Press.
- Eder, Jens. 2003. Narratology and Cognitive Reception Theories. In What is Narratology? Questions and Answers Regarding the Status of a Theory, ed. Tom Kindt and Hans-Harald Müller, 277–301. Berlin: de Gruyer.
- Endacott, Jason L. 2014. Negotiating the process of historical empathy. *Theory and Research in Social Education* 42 (1): 4–34.
- Endacott, Jason, and Sarah Brooks. 2013. An updated theoretical and practical model for promoting historical empathy. *Social Studies Research and Practice* 8 (1): 41–58.
- Endacott, Jason, and Sarah Brooks. 2018. Historical Empathy Perspectives and Responding to the Past. In *The Wiley International Handbook of History Teaching and Learning*, ed. Scott Alan Metzger and Lauren McArthur Harris, 203–225. Hoboken: Wiley.
- Fernandez-Quintanilla, Carolina. 2020. Textual and reader factors in narrative empathy: An empirical reader response study using

focus groups. *Language and Literature* 29 (2): 124–146. https:// doi.org/10.1177/0963947020927134.

- Finkelberg, Margalit. 2014. Aristotle's Theory of Tragedy. In *The Encyclopedia of Greek Tragedy*, ed. Hannah M. Roisman, 137–140. Oxford: Wiley-Blackwell.
- Fioretti Chiara, Ketti Mazzocco, Silvia Riva, Serena Oliveri, Marianna Masiero, and Gabriella Pravettoni. 2016. Research studies on patients' illness experience using the narrative medicine approach: A systematic review. *British Medical Journal Open* 6: e011220. https://doi.org/10.1136/bmjopen-2016-011220.
- Fox, Rachel, Kelly Park, Rowan Hildebrand-Chupp, and T. Vo. Anne. 2020. Working toward eradicating weight stigma by combating pathologization: A qualitative pilot study using direct contact and narrative medicine. *Journal of Applied Social Psychology* 00: 1–14. https://doi.org/10.1111/jasp.12717.
- Gadamer, Hans-Georg. 2004. *Truth and Method*, 2nd ed. London: Continuum.
- Green, Anna, and Kathleen Troup. 2016. *The Houses of History: A Critical Reader in History and Theory*, 2nd ed. Manchester: Manchester University Press.
- Greenhalgh, Trisha. 2006. What Seems to Be the Trouble? Stories in Illness and Healthcare. Oxford: Radcliffe Publishing.
- Guidi, Clarissa, and Chiara Traversa. 2021. Empathy in patient care: From 'clinical empathy' to 'empathic concern.' Medicine, Health Care and Philosophy. https://doi.org/10.1007/ s11019-021-10033-4.
- Gull, S.E., R. O'Flynn, and J.Y.L. Hunter. 2002. Creative writing workshops for medical education: Learning from a pilot study with hospital staff. *Medical Humanities* 28: 102–104. https://doi.org/ 10.1136/mh.28.2.102.
- Halliwell, Stephen. 2002. The Aesthetics of Mimesis: Ancient Texts and Modern Problems. Princeton: Princeton University Press.
- Hamilton, Craig A., and Ralf Schneider. 2002. From Iser to Turner and beyond: Reception theory meets cognitive criticism. *Style* 36 (4): 640–658.
- Herman, David. 2013. Cognitive Narratology (Revised Version). In *The Living Handbook of Narratology*, ed. Peter Hühn, Jan Christoph Meister, John Pier, and Wolf Schmid. Hamburg: Hamburg University.
- Highland, James. 2005. Transformative katharsis: The significance of Theophrastus's botanical works for interpretations of dramatic catharsis. *The Journal of Aesthetics and Art Criticism* 63 (2): 155–163. https://doi.org/10.1111/j.0021-8529.2005.00192.x.
- Hojat, Mohammadreza. 2009. Ten approaches for enhancing empathy in health and human services cultures. *Journal of Health and Human Services Administration* 31 (4): 412–450.
- Hower, Jessica S. 2018. 'All good stories': Historical fiction in pedagogy, theory, and scholarship. *Rethinking History* 23 (1): 78–125. https://doi.org/10.1080/13642529.2018.1456096.
- Humphrey, Lynne. 2020. The Holocaust and the law: A model of "good history"? *Rethinking History* 24 (1): 94–115. https://doi.org/10. 1080/13642529.2019.1655852.
- Inwood, Michael J. 2005. Galamer, Hans–Georg. In *The Oxford Companion to Philosophy*, ed. Ted Honderich, 349. Oxford: Oxford University Press.
- Irvine, Craig, and Rita Charon. 2017. Deliver Us from Certainty: Training for Narrative Ethics. In *The Principles and Practice of Narrative Medicine*, ed. Rita Charon, Sayantani Dasgupta, Nellie Hermann, Craig Irvine, Eric R. Marcus, Edgar Rivera Colón, Danielle Spencer, and Maura Spiegel, 110–133. New York: Oxford University Press.
- Jeffrey, David Ian. 2019. Exploring Empathy with Medical Students. Cham: Springer.
- Jeffrey, Lorenz F., Matthew C. Darok, Lisa Ho, Maria S. Holstrom-Mercader, Andrew S. Freiberg, and Cheryl A. Dellasega. 2021. The impact of an unconventional elective in narrative medicine

and pediatric psycho-oncology on humanism in medical students. *Journal of Cancer Education*. https://doi.org/10.1007/ s13187-021-02029-8.

- Jenkins, Keith. 2009. At the Limits of History: Essays on Theory and Practice. London: Routledge.
- Johnson, Dan R. 2012. Transportation into a story increases empathy, prosocial behavior, and perceptual bias toward fearful expressions. *Personality and Individual Differences* 52 (2): 150–155. https://doi.org/10.1016/j.paid.2011.10.005.
- Kalitzkus, Vera, and Peter F. Matthiessen. 2009. Narrative-based medicine: Potential, pitfalls, and practice. *The Permanente Journal* 13 (1): 80–86. https://doi.org/10.7812/tpp/08-043.
- Kampourelli, Vassiliki. 2016. *Space in Greek Tragedy*. London: Institute of Classical Studies, University of London.
- Keating, Patrick. 2013. Narrative dynamics in the competitive reality show. *Storyworlds* 5 (1): 55–75.
- Keen, Suzanne. 2007. Empathy and the Novel. Oxford: Oxford University Press.
- Keen, Suzanne. 2013. Narrative Empathy. In *The Living Handbook of Narratology*, ed. Peter Hühn, Jan Christoph Meister, John Pier, and Wolf Schmid. Hamburg: Hamburg University.
- Keen, Suzanne. 2018. Empathy Studies. In A Companion to Literary Theory, ed. David S. Richter, 126–138. Oxford: Wiley-Blackwell.
- Kidd, David Comer, and Emanuele Castano. 2013. Reading literary fiction improves theory of mind. *Science* 342 (6156): 377–380. https://doi.org/10.1126/science.1239918.
- Kidd, David Comer, and Emanuele Castano. 2019. Reading literary fiction and theory of mind: three preregistered replications and extensions of Kidd and Castano (2013). Social Psychological and Personality Science 10 (4): 522–531. https://doi.org/10. 1177/1948550618775410.
- Kohut, Thomas. 2012. A German Generation: An Experiential History of the Twentieth Century. New Haven and London: Yale University Press.
- Konstan, David. 2006. The Emotions of the Ancient Greeks: Studies in Aristotle and Classical Literature. Toronto: Toronto University Press.
- Koretzky, Maya Overby. 2018. Seeing the present through the past: History, empathy, and medical education. *Journal of the Ameri*can Medical Association 320 (20): 2079–2080. https://doi.org/ 10.1001/jama.2018.17253.
- LaCourse Munteanu, Dana. 2012. *Tragic Pathos: Pity and Fear in Greek Philosophy and Tragedy*. Cambridge: Cambridge University Press.
- Lancaster, Tim, Ruth Hart, and Selena Gardner. 2002. Literature and medicine: Evaluating a special study module using the nominal group technique. *Medical Education* 36: 1071–1076. https://doi. org/10.1046/j.1365-2923.2002.01325.x.
- Mar, Raymond A., and Keith Oatley. 2008. The function of fiction is the abstraction and simulation of social experience. *Perspectives* on *Psychological Science* 3 (3): 173–192.
- Marini, Maria Giulia. 2016. Narrative Medicine: Bridging the Gap between Evidence-Based Care and Medical Humanities. Cham: Springer.
- Marshall, Robert, and Alan Bleakley. 2008. Putting it bluntly: Communication skills in the *Iliad. Journal of Medical Ethics* 34 (1): 30–34. https://doi.org/10.1136/jmh.2008.000264.
- Marshall, Robert, and Alan Bleakley. 2009. The death of Hector: Pity in Homer, empathy in medical education. *Medical Humanities* 35 (1): 7–12. https://doi.org/10.1136/jmh.2008.001081.
- Marshall, Robert, and Alan Bleakley. 2011. Sing, Muse: Songs in Homer and in hospital. *Journal of Medical Ethics* 37 (1): 27–33. https://doi.org/10.1136/jmh.2010.006387.
- Marshall, Robert, and Alan Bleakley. 2013. Lost in translation. Homer in English; the patient's story in medicine.

Medical Humanities 39 (1): 47–52. https://doi.org/10.1136/ medhum-2012-010307.

- Marshall, Robert, and Alan Bleakley. 2017. *Rejuvenating Medical Education: Seeking Help from Homer*. Newcastle Upon Tyne: Cambridge Scholars Publishing.
- Martindale, Charles. 2013. Reception—A new humanism? Receptivity, pedagogy, the transhistorical. *Classical Receptions Journal* 5 (2): 169–183. https://doi.org/10.1093/crj/cls003.
- McCullagh, C. Behan. 2004. *The Logic of History: Putting Postmodernism in Perspective*. London and New York: Routledge.
- McDonald, Paula, Katy Ashton, Rachel Barratt, Simon Doyle, Dorrie Imeson, Amos Meir, and Gregoire Risser. 2015. Clinical realism: A new literary genre and a potential tool for encouraging empathy in medical students. *BMC Medical Education*. https:// doi.org/10.1186/s12909-015-0372-8.
- Meineck, Peter. 2020a. Post-Conflict Resolution and the Health Humanities. In *The Routledge Companion to Health Humanities*, ed. Paul Crawford, Brian Brown, and Andrea Charise, 54–59. Abingdon: Routledge.
- Meineck, Peter. 2020b. Classics. In *The Routledge Companion to Health Humanities*, ed. Paul Crawford, Brian Brown, and Andrea Charise, 267–270. Abingdon: Routledge.
- Meineck, Peter. 2020c. Masks. In *The Routledge Companion to Health Humanities*, ed. Paul Crawford, Brian Brown, and Andrea Charise, 292–295. Abingdon: Routledge.
- Miall, David S. 2018. Reader-Response Theory. In A Companion to Literary Theory, ed. David H. Richter, 114–125. Chichester West Sussex: Wiley.
- Milota, Megan M., G.J.M.W. van Thiel, and J.J.M. van Delden. 2019. Narrative medicine as a medical education tool: A systematic review. *Medical Teacher* 41 (7): 802–810. https://doi.org/10. 1080/0142159X.2019.1584274.
- Mitchell, Christine. 2014. Qualms of a believer in narrative ethics. *Hastings Center Report* 44: S12-15.
- Moore, Hugh Geoffrey. 2019. Organic Historical Reasoning: Redefining the Concept of Historical Empathy. Unpublished PhD diss., University of Cumbria (awarding body Lancaster University). https://doi.org/10.17635/lancaster/thesis/697.
- Muszkat, Mordechai, Arie Ben Yehuda, Scott Moses, and Yaakov Naparstek. 2010. Teaching empathy through poetry: A clinically based model. *Medical Education* 44 (5): 503. https://doi.org/10. 1111/j.1365-2923.2010.03673.x.
- Nanay, Bence. 2018. Catharsis and vicarious fear. European Journal of Philosophy 26 (4): 1371–1380. https://doi.org/10.1111/ejop. 12325.
- Neilson, Shane. 2022. A logical development: biomedicine's fingerprints are on the instrument of close reading in Charonian narrative medicine. *Medical Humanities*. https://doi.org/10.1136/ medhum-2021-012301.
- Novillo-Corvalán, Patricia. 2014. Reinterpreting the Wound of Philoctetes: Literature and Medicine. In *Medicine, Health and the Arts* (*Approaches to the Medical Humanities*), ed. Victoria Bates, Alan Bleakley, and Sam Goodman, 128–144. Oxon & New York: Routledge.
- O'Mahony, Seamus. 2013. Against narrative medicine. *Perspectives in Biology and Medicine* 56 (4): 611–619. https://doi.org/10.1353/pbm.2013.0032.
- Piemonte, Nicole M. 2018. Afflicted: How Vulnerability Can Heal Medical Education and Practice. Cambridge: The MIT Press.
- Pinotti, Andrea, and Massimo Salgaro. 2019. Empathy or empathies? Uncertainties in the interdisciplinary discussion. *Gestalt Theory* 41 (2): 141–158. https://doi.org/10.2478/gth-2019-0015.
- Plantinga, Carl. 1999. The Scene of Empathy and the Human Face on Film. In *Passionate Views: Film, Cognition, and Emotion*, ed. Carl Plantinga and Greg M. Smith, 239–255. Baltimore: Johns Hopkins University Press.

- Preckel, Katrin, Philipp Kanske, and Tania Singer. 2018. On the interaction of social affect and cognition: Empathy, compassion and theory of mind. *Current Opinion in Behavioral Sciences* 19: 1–6. https://doi.org/10.1016/j.cobeha.2017.07.010.
- Remein, Christy DiFrances, Ellen Childs, John Carlo Pasco, Ludovic Trinquart, David B. Flynn, Sarah L. Wingerter, Robina M. Bhasin, Lindsay B. Demers, and Emelia J. Benjamin. 2020. Content and outcomes of narrative medicine programmes: A systematic review of the literature through 2019. *British Medical Journal Open* 10: e031568. https://doi.org/10.1136/bmjop en-2019-031568.
- Richardson, Alan. 2015. Imagination: Literary and Cognitive Intersections. In *The Oxford Handbook of Cognitive Literary Studies*, ed. Lisa Zunshine, 225–245. Oxford: Oxford University Press.
- Roche, Jenny, and Dominic Harmon. 2017. Exploring the facets of empathy and pain in clinical practice: A review. *Pain Practice* 17: 1089–1096. https://doi.org/10.1111/papr.12563.
- Rodulson, Victoria, Robert Marshall, and Alan Bleakley. 2015. Whistleblowing in medicine and in Homer's *Iliad. Medical Humanities* 41 (2): 95–101. https://doi.org/10.1136/ medhum-2015-010673.
- Rushton, Cynda H., Bryan Doerries, Jeremy Greene, and Gail Geller. 2020. Dramatic interventions in the tragedy of the COVID–19 pandemic. *The Lancet* 396 (10247): 305–306. https://doi.org/10. 1016/S0140-6736(20)31641-X.
- Ryan, Marie-Laure. 2015. Narrative as Virtual Reality 2: Revisiting Immersion and Interactivity in Literature and Electronic Media. Baltimore: John Hopkins University Press.
- Sagin, Alana, Matthew S. Ellman, Ruhi R. Shariff, Christopher A. Jones, Kate Tindall, and Caitlin H. Siropaides. 2021. A multicenter qualitative analysis of medical student narratives after a palliative care elective. *American Journal of Hospice and Palliative Medicine* 38 (9): 1126–1134. https://doi.org/10.1177/10499 09120971565.
- Schattner, A. 2012. Who cares for empathy? QJM 105 (3): 287–290. https://doi.org/10.1093/qjmed/hcr215.
- Schneider, Gregory, Marin Gillis, and Heidi von Harscher. 2019. Developing Empathy through Narrative Medicine. In *Teaching Empathy in Healthcare*, ed. Yaseen Zimri and Adriana Foster, 165–178. Cham: Springer.
- Schoonover, Kimberly L., Daniel Hall-Flavin, Kevin Whitford, Mark Lussier, Alison Essary, and Maria I. Lapid. 2020. Impact of poetry on empathy and professional burnout of health-care workers: A systematic review. *Journal of Palliative Care* 35 (2): 127–132. https://doi.org/10.1177/0825859719865545.
- Scott-Conner, Carol E.H., and Divyansh Agarwal. 2021. Applications of narrative medicine to surgical education. *The American Sur*geon. https://doi.org/10.1177/00031348211029851.
- Shalev, Daniel, and Ruth McCann. 2020. Can the medical humanities make trainees more compassionate? A neurobehavioral perspective. Academic Psychiatry 44: 606–610. https://doi.org/10.1007/ s40596-020-01180-6.
- Shapiro, Johanna. 2008. Walking a mile in their patients' shoes: Empathy and othering in medical students' education. *Philosophy*, *Ethics, and Humanities in Medicine*. https://doi.org/10.1186/ 1747-5341-3-10.
- Singer, Tania, and Olga M. Klimecki. 2014. Empathy and compassion. Current Biology 24 (18): R875–R878. https://doi.org/10.1016/j. cub.2014.06.054.
- Singer, Tania, and Anita Tusche. 2009. Understanding Others: Brain Mechanisms of Theory of Mind and Empathy. In *Neuroeconomics: Decision Making and the Brain*, ed. Paul W. Glimcher, Colin F. Camerer, Ernst Fehr, and Russell A. Poldrack, 251–268. London: Elsevier Academic Press.
- Sommer, Roy. 2013. Other Stories, Other Minds: The Intercultural Potential of Cognitive Approaches to Narrative. In *Stories and*

Minds: Cognitive Approaches to Literary Narrative, ed. Bernaerts Lars, Dirk de Geest, Luc Herman, and Bart Vervaeck, 155–174. Lincoln: University of Nebraska Press.

- Stietz, Julia, Emanuel Jauk, Sören Krach, and Philipp Kanske. 2019. Dissociating empathy from perspective-taking: Evidence from intra- and inter-individual differences research. *Frontiers in Psychiatry* 10: 26. https://doi.org/10.3389/fpsyt.2019.00126.
- Sullivan, Erin. 2011. Culture, literature, and the history of medicine. *Medical History* 55 (4): 541–548. https://doi.org/10.1017/S0025 727300004993.
- Taplin, Oliver. 1987. The mapping of Sophocles' *Philoctetes. Bulletin* of the Institute of Classical Studies 34: 69–77.
- Taplin, Oliver. 2015. Sophocles: Four Tragedies, Oedipus the King, Aias, Philoctetes, Oedipus at Colonus. Oxford: Oxford University Press.
- Taylor, Charles. 2002. Gadamer on the Human Sciences. In *The Cambridge Companion to Gadamer*, ed. Robert J. Dostal, 126–142. Cambridge: Cambridge University Press.
- Tholen, Matthias G., Fynn-Mathis Trautwein, Anne Böckler, Tania Singer, and Philipp Kanske. 2020. Functional magnetic resonance imaging (fMRI) item analysis of empathy and theory of mind. *Human Brain Mapping* 41: 2611–2628. https://doi.org/ 10.1002/hbm.24966.
- Trieu, Michelle, Adriana Foster, Zimri S. Yaseen, Courtnie Beaubian, and Raffaella Calati. 2019. Neurobiology of Empathy. In *Teaching Empathy in Healthcare*, ed. Yaseen Zimri and Adriana Foster, 17–39. Cham: Springer.
- Ussher, R.G. 1990. Sophocles: Philoctetes with an Introduction, Translation and Commentary (Classical Texts Series). Warminster: Aris & Phillips.
- Van Kuijk, Iris, Peter Verkoeijen, Katinka Dijkstra, and Rolf A. Zwaan. 2018. The effect of reading a short passage of literary fiction on theory of mind: A replication of Kidd and Castano (2013). *Collabra* 4 (1): 7. https://doi.org/10.1525/collabra.117.
- Vannatta, Seth, and Jerry Vannatta. 2013. Functional realism: A defense of narrative medicine. *The Journal of Medicine and Philosophy* 38 (1): 32–49. https://doi.org/10.1093/jmp/jhs060.
- Waugh, Patricia. 2006. Literary Theory and Criticism: An Oxford Guide. Oxford: Oxford University Press.
- White, Hayden V. 1973. Metahistory: The Historical Imagination in Nineteenth-Century Europe. Baltimore: John Hopkins University Press.
- White, Hayden V. 1978. *Tropics of Discourse: Essays in Cultural Criticism*. Baltimore: Johns Hopkins University Press.

- White, Hayden V. 2005. Introduction: Historical fiction, fictional history, and historical reality. *Rethinking History* 9 (2–3): 147–157. https://doi.org/10.1080/13642520500149061.
- Whitehead, Anne. 2014. The Medical Humanities: A Literary Perspective; Overview. In *Medicine, Health and the Arts: Approaches to the Medical Humanities*, ed. Victoria Bates, Alan Bleakley, and Sam Goodman, 107–127. London: Routledge.
- Wood, David. 1991. On Paul Ricoeur: Narrative and Interpretation. London: Routledge.
- Yang, Ningxi, Han Xiao, Yingnan Cao, Shiyue Li, Hong Yan, and Yifang Wang. 2018. Does narrative medicine education improve nursing students' empathic abilities and academic achievement? A randomised controlled trial. *Journal of International Medical Research* 46 (8): 3306–3317. https://doi.org/10.1177/03000 60518781476.
- Yaseen, Zimri, and Adriana Foster. 2019. What Is Empathy? In *Teaching Empathy in Healthcare*, ed. Yaseen Zimri and Adriana Foster, 3–16. Cham: Springer.
- Zaharias, George. 2018a. What is narrative-based medicine? Narrative-based medicine 1. *Canadian Family Physician Medecin De Famille Canadien* 64 (3): 176–180.
- Zaharias, George. 2018b. Learning narrative-based medicine skills: Narrative-based medicine 3. *Canadian Family Physician Medecin De Famille Canadien* 64 (5): 352–356.
- Zhou, Yi Cheng, Shien Ru Tan, Chester Guan Hao Tan, Matthew Song Peng Ng, Kia Hui Lim, Lorraine Hui En Tan, Yun Ting Ong, Clarissa Wei Shuen Cheong, Annelissa Mien Chew Chin, et al. 2021. A systematic scoping review of approaches to teaching and assessing empathy in medicine. *BMC Medical Education* 21: 292. https://doi.org/10.1186/s12909-021-02697-6.
- Zunshine, Lisa. 2006. Why We Read Fiction: Theory of The Mind and the Novel. Columbus: Ohio State University Press.
- Zunshine, Lisa. 2010. Theory of Mind and Experimental Representations of Fictional Consciousness. In *Introduction to Cognitive Cultural Studies*, ed. Lisa Zunshine, 192–213. Baltimore: John Hopkins University Press.

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